



Existing Conditions DRAFT

Parking and Transportation Demand Management Plan

University of Montana, Missoula

November 2015



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EXISTING CONDITIONS

Every day during the academic year, thousands of students, faculty, staff and visitors travel to, from, between, and within the University of Montana’s Mountain Campus, the Missoula College Campus, and nearby properties owned and operated by the University. As of spring 2015, the campus population included 8,804 undergraduate students, 2,259 graduate students (including law school students), 902 faculty members (Full-time equivalent, or FTE positions), and 2,023 staff. A total of 1,859 students were enrolled at Missoula College, the University of Montana’s two-year degree program. The College is currently located at a campus on South Avenue East, but will soon relocate to a site under development just north of the Clark Fork River from the University’s main Mountain Campus.

To inform and serve as a basis for the development of appropriate actions and strategies for the University of Montana Transportation Plan, this report provides a summary of current existing conditions of access and connectivity to campus destinations and mobility for campus affiliates. The report includes a summary of available programs and services provided by the University, the Associated Students of the University of Montana (ASUM), and their City and regional partners, such as the Missoula Urban Transportation District (MUTC/Mountain Line), and the Missoula Ravalli Transportation Management Association (TMA).

CAMPUS LOCATIONS

The location of the main Mountain Campus of the University of Montana, West Campus, South Campus housing, and the existing and planned campuses of Missoula College, are shown in Figure 1-1. The main campus of the University of Montana – often referred to as the “Mountain Campus” – is located approximately one mile southeast of Downtown Missoula. The campus lies immediately south of the Clark Fork River, west of Mount Sentinel, and north of East Beckwith Avenue. The Mountain Campus houses the University of Montana’s administrative offices, classrooms, and research facilities, the Mansfield Library, and the University Center. The main campus also houses athletics and event centers, including the Adams Center and associated Student Recreation Center, the Washington Grizzly Stadium (Football/Soccer), the Dennison Theater, and the Performing Arts and Radio-TV Center.

Figure 1 University of Montana and Missoula College Campus Locations



Data Sources: Missoula County GIS, Montana NRIS, UMM

Missoula College is a two-year Associates degree unit of the University of Montana that provides technical and occupational education in 35 different programs, from business operations and health care – including registered nursing – to energy and industrial technologies. Industrial Technology programs are located at the West Campus, located at 3639 South Avenue West. As of 2015, all Missoula College programs are housed on the Missoula College Campus located at 909 South Avenue West, situated between the Missoula County Fairgrounds and Sentinel High School – approximately 1.5 miles southwest of the University of Montana’s main Mountain Campus.

In 2016, Missoula College programs will be relocated to a new campus building currently under construction on the site of the former East Broadway Park and Ride lot, which was operated by UDASH and served by Mountain Line Route 4. The site is owned by the University of Montana and is located on the north side of the Clark Fork River, just across from the University of Montana’s main Mountain Campus. A Final Environmental Assessment for the Missoula College re-location project was certified in May 2014.

The University Villages are unfurnished apartment residences for graduate and undergraduate students of the University of Montana and selected faculty and staff members, located between the 300 and 800 blocks of South Avenue E, approximately one mile SW of the Mountain Campus.

The Lewis and Clark Village is a University of Montana owned and operated residential complex located on the South Campus (3000 South Higgins Avenue, approximately one mile away from both the current site of the Missoula College campus and the main Mountain campus of the University of Montana. The Village offers furnished three and two bedroom apartments for currently enrolled students who have completed 60 or more credits (or students with 30-59 credits who have maintained a grade point average of 3.0 or higher).

TRANSPORTATION SERVICE PROVIDERS

Many different organizations are directly and indirectly involved in the provision and maintenance of access to the University of Montana’s Mountain Campus, and the affiliated Montana Campus.

Associated Students of the University of Montana (ASUM)

The Associated Students of the University of Montana (ASUM) Office of Transportation increases transportation options and awareness on the University of Montana campus in Missoula. With the exception of parking, which is managed by the UM Police Department (UMPD), ASUM plans and manages transportation services for UM and Missoula College students, faculty, staff and other campus affiliates. This includes planning, managing and operating:

- five fare-free UDASH bus routes serving the UM Mountain Campus and surrounding areas of Missoula,
- pedestrian and bicycle facilities and services, including bike sharing and bike rental programs,
- selected ridesharing and transportation demand management programs

As the home of the UM Office of Transportation, ASUM often serves as the University’s de facto liaison to regional transportation service providers and planning agencies, including the City of

Missoula, the Missoula Parking Commission, Mountain Line/MUTD, the Missoula Ravalli Transportation Management Association, and the Missoula Metropolitan Planning Organization.

The programs and activities of the ASUM Office of Transportation are supported by a student-initiated fee of \$35.00 per semester. ASUM also receives a small cash contribution from the University Faculty Association.

University of Montana Police Department (UMPD)

On-campus parking permit sales, management, and enforcement are carried out by the University of Montana Police Department (UMPD). A range of citations are issued by the UMPD for violations including meter expiration, improper permit issue, and illegal parking.

With the exception of weekend sporting events, special coordinators work with the UMPD to reserve requisite parking for event participants and attendees (See page 39 for more information on Event Parking Management). For weekend sporting events, including football and basketball games, parking lots are staffed with paid, non-UMPD parking attendants, and all parking revenues are retained by the Athletics Department.

Mountain Line / Missoula Urban Transportation District (MUTD)

The Missoula Urban Transportation District (MUTD) plans and operates public transportation services within a 36 square mile service area in the Missoula, Montana Metropolitan Area, including the University of Montana and Missoula College. MUTD services, which are branded and marketed as “Mountain Line Transit,” include:

- Twelve fixed-route bus transit lines, with service every 15-60 minutes, Monday-Saturday
- Curb-to-curb paratransit services for passengers eligible under the Americans with Disabilities Act (ADA)
- Senior van services, providing door to door and package delivery assistance for senior citizens not eligible for paratransit services
- Vanpool services in collaboration with the Missoula Ravalli Transportation Management Association (MRTMA), and
- Special services, including transportation to events such as the Western Montana Fair.

MUTD is governed by a seven-member Board of Directors whose members are appointed by Missoula County and the City of Missoula.

Missoula Ravalli Transportation Management Association (MRTMA)

The Missoula-Ravalli Transportation Management Association (MRTMA) is a non-profit organization dedicated to “helping Western Montana residents make better transportation choices today and in the future by developing comprehensive transportation alternatives designed to: minimize traffic, reduce parking congestion, protect the environment, and improve quality of life.” In support of its mission, MRTMA provides vanpool service to residents in Missoula, Ravalli, Lake, and Mineral Counties. MRTMA also offers ride matching services for carpooling and provides informative presentations and materials to local schools and employers encouraging shared rides and use of non-auto modes of transportation. The organization is primarily funded

by grants from the Montana Department of Transportation, the City of Missoula, the County governments within its service area, and major employers, including the University of Montana. MRTMA also receives “in-kind” support from the University, as the MRTMA office building was constructed on University-owned property.

Missoula Parking Commission

The Missoula Parking Commission (MPC) works with government, business, and citizens to provide and manage parking and parking alternatives. Its revenue comes from three main sources: parking tickets, parking meters, and leased parking. The MPC has historically provided matching funds and donations to TDM programs in the region. In recent years, the MPC has contributed funds to the following programs: Missoula-in-Motion (MIM), Missoula Ravalli TMA (MR TMA), Out to Lunch Shuttle Bus, Mountain Line, EZ Pass Program, First Night Shuttle Bus, and the Missoula Bicycle Pedestrian Program.

Although the MPC works collaboratively, it operates and manages City parking resources with a significant degree of autonomy. The City Council retains authority to set jurisdictional boundaries and to establish or amend the parking fine structure, but all other parking supply and management decisions are within the jurisdiction of the MPC. The Commission is governed by a five-member board of directors, with each member appointed by the Mayor to serve a four-year term.

MULTIMODAL TRANSPORTATION FACILITIES AND SERVICES

This section provides an overview of the existing transportation facilities, programs and services provided by the University of Montana and other City and regional service providers. It begins with a description and map of existing bicycle and pedestrian facilities in the area, including on-campus bicycle parking, and a map identifying places subject to multiple collisions involving bicyclists from 2008-2013, and then describes and illustrates the routes of public transit bus lines serving the campus community, including services operated by ASUM (UDASH) and MUTD (Mountain Line). The section concludes by identifying the names and average daily motor vehicle traffic volumes of streets and highways providing access to and connectivity between the University of Montana’s Mountain Campus and the current and future sites of Missoula College.

Bicycle and Pedestrian Facilities

Bicycling is one of the easiest and fastest ways to get to and circulate within the University of Montana’s Missoula campus. As it is a primary means of access to campus for many students, faculty and staff, offers health benefits, and reduces demand for other, more expensive campus access programs, including parking, the University supports and promotes bicycling through a comprehensive program of infrastructure, facilities and services.

To make cycling a viable option for those who do not own a bicycle or those who must travel within or from campus at times and on days when they’ve used other modes of transportation to commute to campus, the following programs promote short and long-term bicycle access for campus affiliates:

- For short trips, the Office of Transportation’s Yellow U Bike bikeshare program provides bikes that can be checked out for up to 48 hours. Anyone with a campus identification card (GrizCard) can get a key from the Mansfield Library during regular library hours,

and then pick up a shared yellow bike from behind the parking garage closest to the library. During the academic year, bikes are available for checkout up to five days per week. Students may check out up to four bikes at once if they have family or friends visiting.

- For students looking to have access to a bicycle for personal use, the ASUM Office of Transportation offers both bike loan and bike rental services.
 - Commuter bicycles can be rented for \$60 per semester by anyone registered for six or more credits. The bike rental fee covers the cost of bicycle maintenance throughout the semester and includes lights, basket, lock, and a helmet.
 - Through a partnership with the Missoula Federal Credit Union, current student members who are interested in buying a new bicycle are eligible for an 18-month, zero interest loan of up to \$1,000.

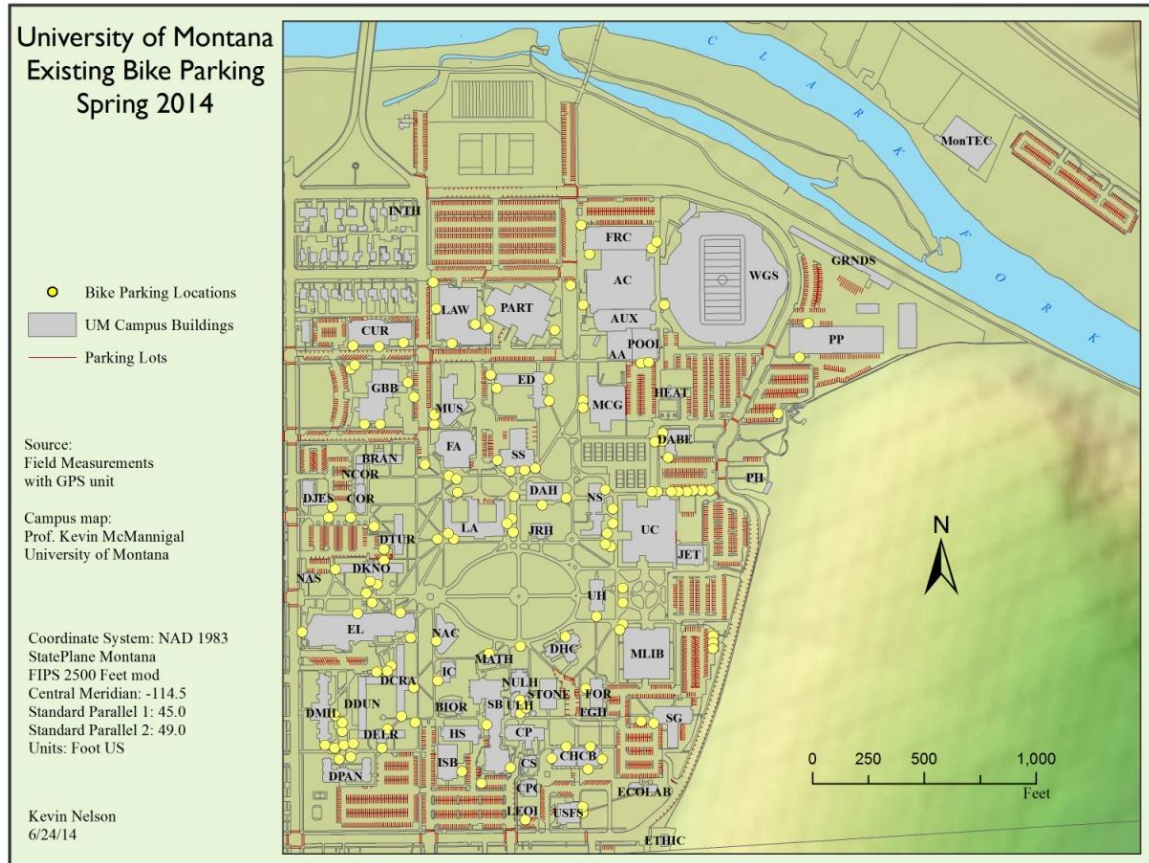
To normalize and promote bicycling for all types of trips, and all weather conditions, ASUM sponsors a **#30daysofbiking Challenge** – a student pledge to “ride our bikes every day in April, no matter the weather, no matter the distance.”

To normalize and promote bicycling for transportation for all types of trips, and all weather conditions, ASUM sponsors a number of programs, including:

- Walk & Roll Week, which is an annual, week-long celebration of active and sustainable transportation, sponsored by ASUM. Held during the third week of September, this campus-wide program helps new students learn about multimodal travel choices and encourages all affiliates to initiate sustainable, non-auto commute and travel patterns at the beginning of each academic year. Affiliates who bike, walk, bus, or carpool/vanpool to campus can pick up a free raffle ticket in the University Center each day, and be eligible to win one of dozens of prizes during a Friday drawing.
- #30daysofbiking challenge, a student pledge to “ride our bikes every day in April, no matter the weather, no matter the distance.” Participants in the #30daysofbiking challenge are encouraged to share their experience with the UM community via Instagram and Twitter, with prizes awarded to select students who post photos from their rides.

These programs are intended to remove barriers to bicycle and pedestrian access and to introduce new students and other campus affiliates to a campus culture where biking and walking are accepted as primary means of transportation.

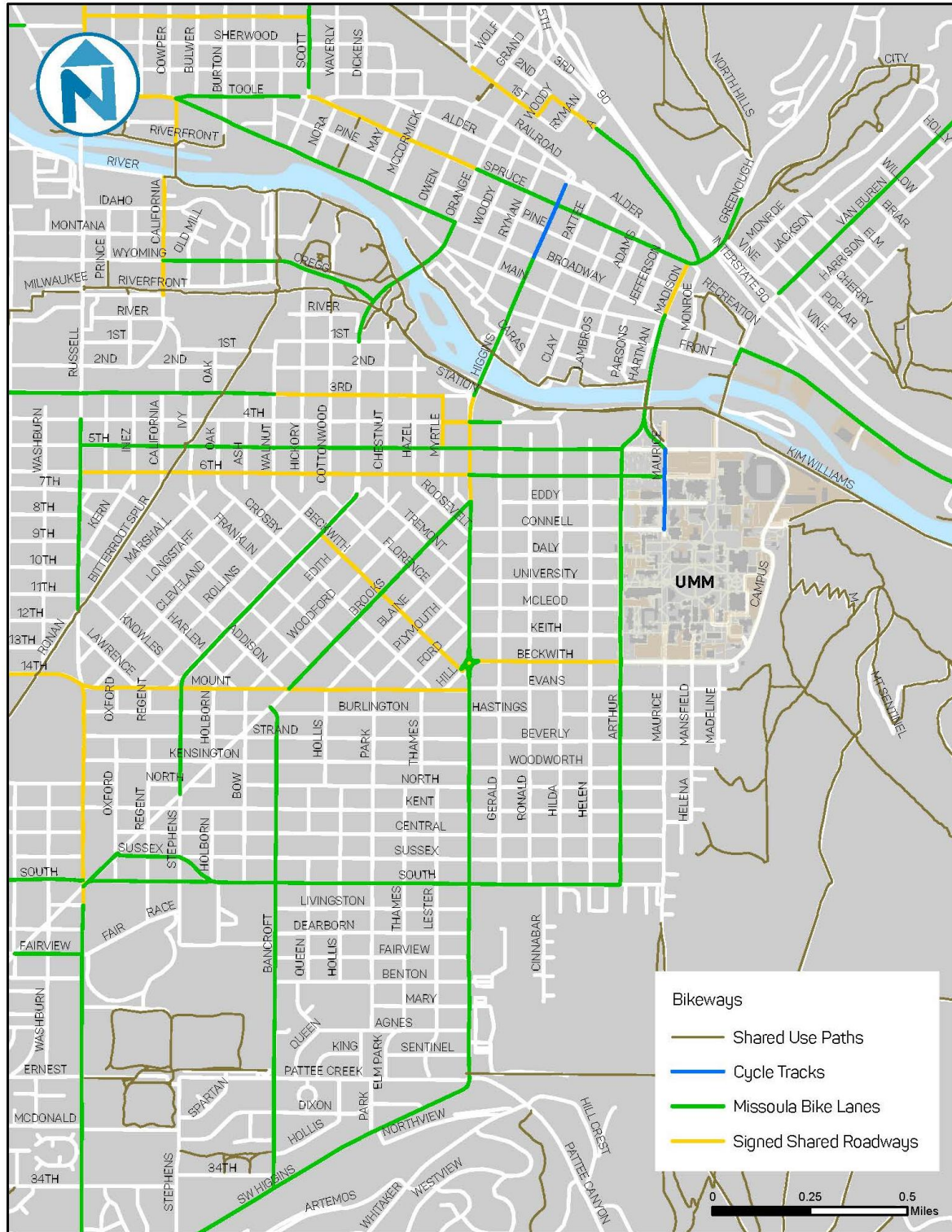
Figure 2 On-Campus Bike Parking Facilities



Source: Associated Students of the University of Montana, 2015.

Figure 1-3 shows bikeways in the vicinity of the Mountain Campus. Corridors that provide designated bicycle facilities to the campus include Arthur Avenue (bike lanes) and Maurice Avenue (cycle track). In addition, bike lanes exist along E. Broadway Street, providing access to the future site of Missoula College on East Broadway.

Figure 3 Missoula Bicycle Facilities

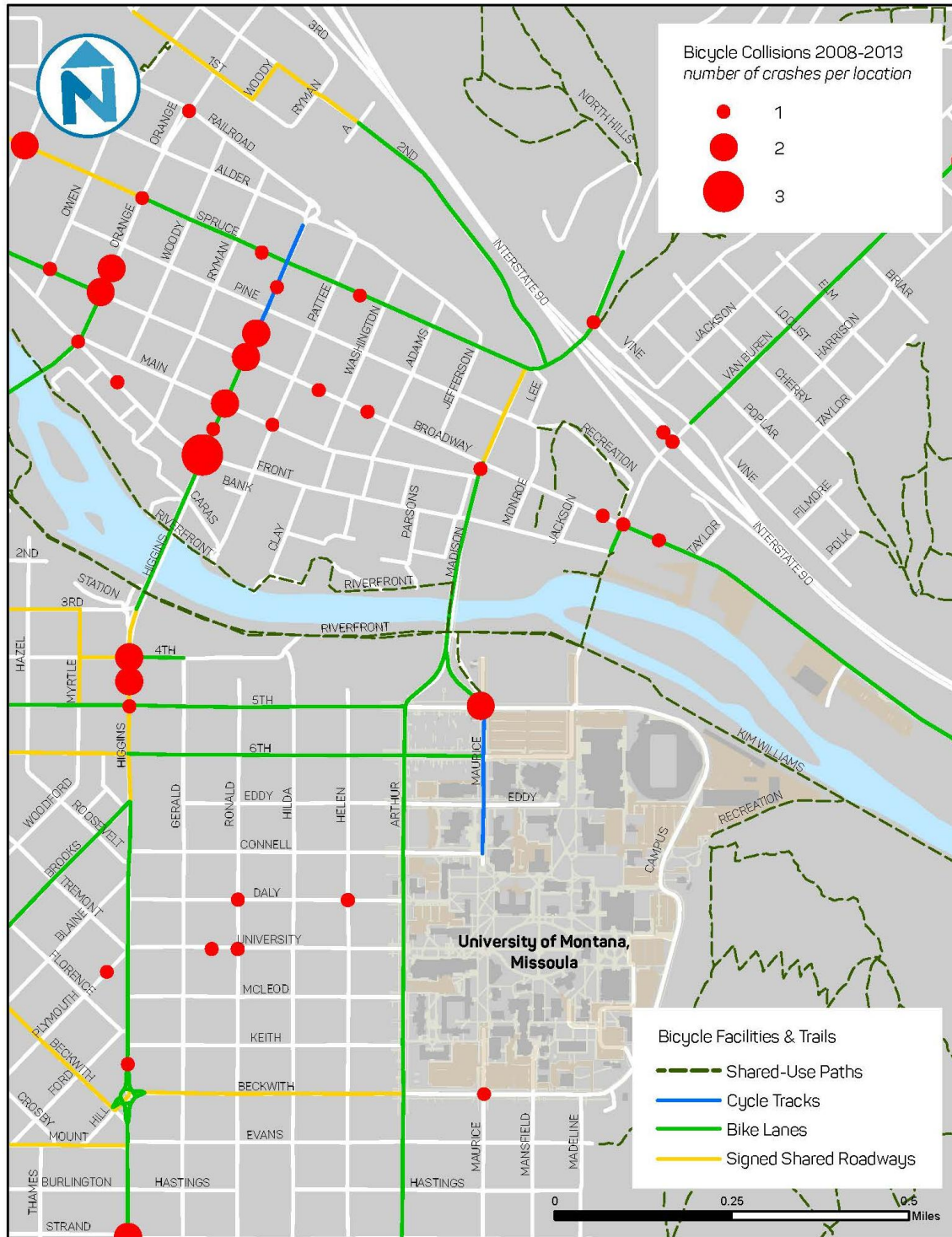


Data Sources: Missoula County GIS, Montana NRIS, UMM

Figure 1-4 shows the locations of police-reported collisions involving bicyclists from 2008-2013. Despite the presence of bike lanes along the corridor, Higgins Avenue experienced a particularly high number of collisions from Spruce Street in downtown Missoula to S. 5th Street. Intersections near the Mountain Campus where collisions occurred include Maurice Avenue at S. 5th Street and Maurice Avenue at E. Beckwith Avenue.

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Figure 4 Collisions Involving Bicyclists (2008-2013)



Data Sources: Missoula County GIS, Montana NRIS, UMM

Transit

Bus service to the University of Montana's Mountain Campus and the current and future sites of Missoula College are provided by University operated UDASH routes and several routes operated by Mountain Line public bus service provided by the Missoula Urban Transportation District (MUTD). All UDASH and Mountain Line services are free and open to the public.

UDASH

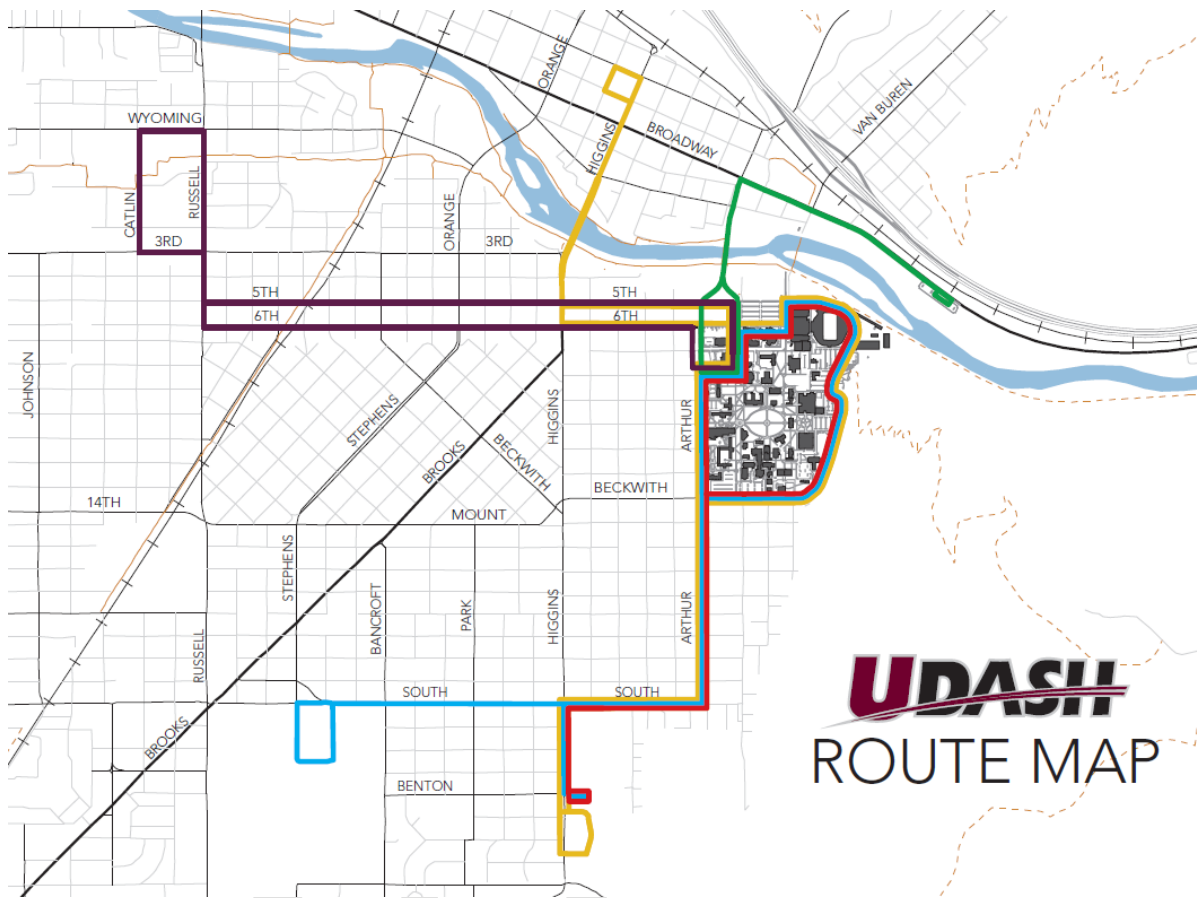
Five UDASH fixed-route bus routes are designed to provide direct connections to and from the main Missoula campus and Missoula College for University affiliates and members of the general public. The Services, which are free and open to the public, include the:

- Red Line from the Mountain Campus to the Lewis and Clark Transfer Center, serving University Villages.
- Blue Line from the Mountain Campus to the current location of the Missoula College Campus.
- Purple Line connecting 5th Street, 6th Street, and Russell Streets to the Music Building on the Mountain Campus.
- Gold Line, which provides late night service and direct connections between downtown Missoula, the Mountain Campus, and South Campus housing and parking.
- Green Line, connecting main campus to the East Broadway park-and-ride lot on the north side of the Clark Fork River (Note that service on the Green Line has been suspended for the 2015-2016 academic year, as work proceeds on construction of the new Missoula College building on East Broadway. Service will be restored, when the new Missoula College building opens in 2016).

UDASH also operates special shuttles during football games and commencement services.

The University of Montana Bus Study – which recommended the recent establishment of the Purple Line, and selected changes to other routes – provides more detailed information on the frequency, span of service, ridership, and productivity of each of these UDASH lines, and other recommendations for service enhancements. The route map for UDASH is presented in Figure 1-5.

Figure 5 UDASH Route Map



Source: Associated Students of the University of Montana

Mountain Line

Mountain Line operates fixed-route and paratransit bus services in and around Missoula. The University's main campus is directly served year-round by the following three Mountain Line routes:

- Route 1, serving the Downtown Transfer Center, Missoula College, and Southgate Mall.
- Route 8, serving 5th and 6th Streets, Community Hospital, and Southgate Mall.
- Route 12, serving the Downtown Transfer Center, the Lewis and Clark Transfer Center, and South Hills.

The system is unique in that it operates as a “zero-fare” system that does not require users to pay a fare upon boarding. This three-year demonstration project, aims to increase annual ridership by 400,000 trips, and is funded in part by the University of Montana, ASUM, and 12 other community partners.¹

¹ <http://www.mountainline.com/your-future-mountain-line/zero-fare/>

Motor Vehicle Circulation

This section provides an overview of street and highway infrastructure supporting motor vehicle access to the University of Montana’s main campus in Missoula, Missoula College and other remote campus facilities, as well as recent information on travel conditions for motor vehicle circulation near the campus, as measured by intersection level-of-service (LOS).

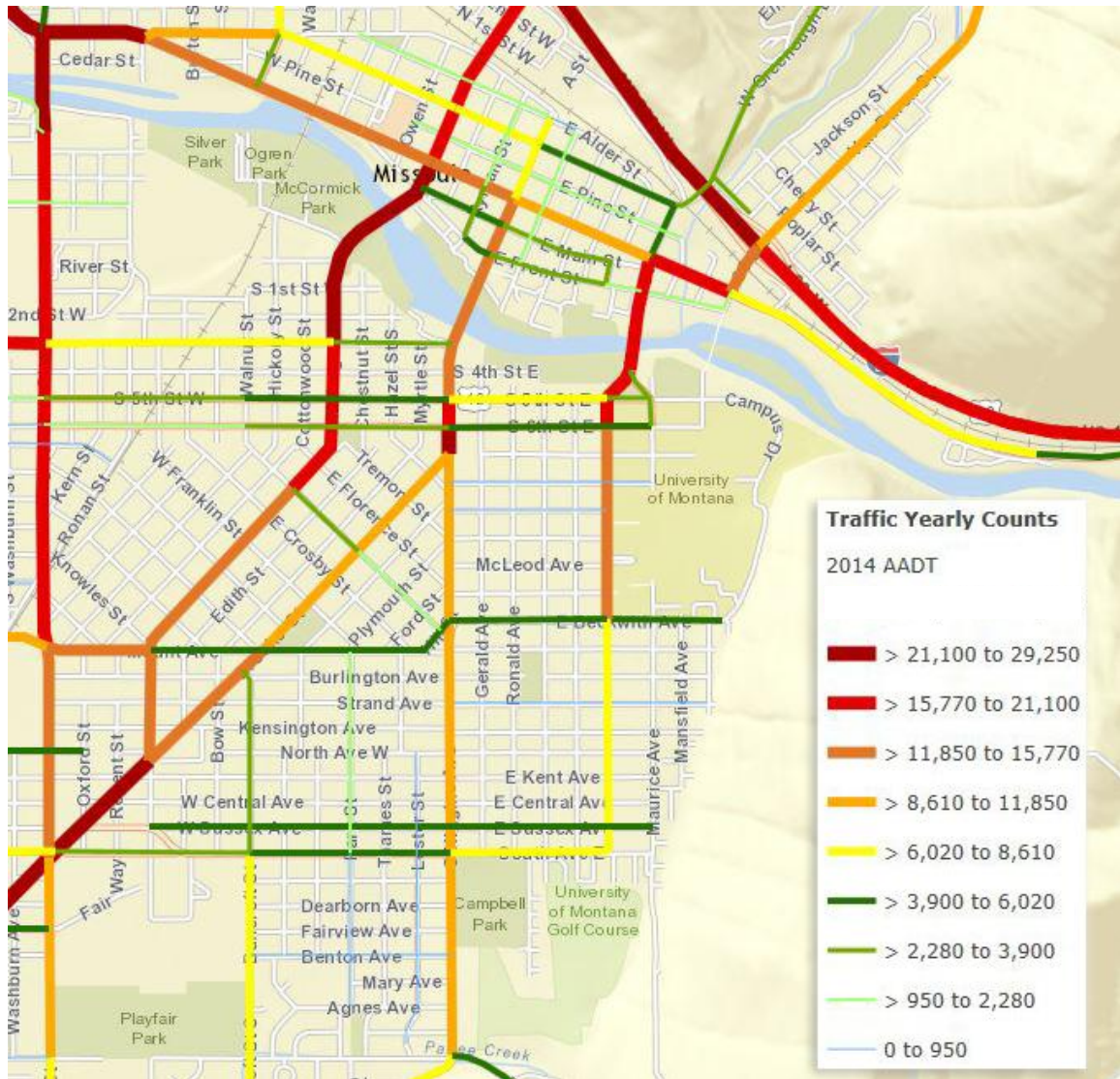
The busiest corridors surrounding main campus are the north-south arterials that cross the Clark Fork River to downtown Missoula and Interstate-90. Figure 1-6 provides annual average daily traffic (AADT) volumes for the corridors that lead to campus. Figure 1-7 shows AADT for arterial corridors in the vicinity of the main campus.

Figure 6 Annual Average Daily Traffic for Campus Access Corridors 2014

Street/Corridor Segment	Annual Average Daily Traffic (Vehicles)
Arthur Avenue (5 th St to 6 th St)	16,090
Arthur Avenue (6 th St to Eddy)	11,880
Arthur Avenue (Central to Sussex)	7,400
Beckwith Avenue (E of Madeline)	5,540
Beckwith Avenue (Ronald to Hilda)	3,930
Connell Avenue (Ronald to Hilda)	660
Daly Avenue (Ronald to Hilda)	760
Madison Street Bridge	18,980
Maurice Avenue (5 th St to Madison St Bridge)	3,510
6 th Street E (Arthur to Maurice)	4,040
6 th Street E (Ronald to Hilda)	5,100
5 th Street E (Arthur to Maurice)	3,110
5 th Street E (Ronald to Hilda)	6,560

Source: Montana Department of Transportation

Figure 7 Annual Average Daily Traffic 2014



Source: Montana Department of Transportation

Ridesharing and Vanpooling

The Missoula Ravalli Transportation Management Association (MRTMA) operates the “iride” vanpool service, with a fleet of 24 vanpool vehicles. As of 2015 iride vans provide shared rides on 20 routes to, from, and within Missoula County. These include seven iride vanpools delivering regular commuters to the University of Montana’s main Mountain Campus².

Vanpool services are open to members of the public who complete online registration with the MRTMA. New regular vanpool routes formed when a minimum of four people register with proximate origin(s) and destination(s) and a common commute schedule.

² Information per phone interview with MRTMA Executive Director Lyn Hellegaard, on August 4, 2015.

Fares range from \$105-\$140 per month, depending on the distance and the number of days per week traveled. Two of the seven University of Montana vanpools are currently operated fare free, with a full subsidy provided by the University of Montana Foundation (these routes are for employees of the Yellow Bay Biological Center in Polson).

From January to December of 2014, MR TMA vanpools provided more than 31,600 shared rides, to over 155 regular commuters, at a total of 75 work sites throughout Western Montana.

Among the many routes that current and prospective future vanpool riders are interested in is a potential vanpool shuttle between the University of Montana's Bitterroot College in Hamilton and the main Mountain Campus in Missoula.

MRTMA also offers ridematching services aimed at facilitating regular and ongoing carpool commuting to the University of Montana and other major employment sites and destinations in Missoula County³.

TRAVEL DEMAND ANALYSIS

Travel Surveys

To understand patterns of travel to, from, and within campus, including potential future demand for parking and non-auto access to campus, ASUM added a series of transportation-related questions to online surveys of campus affiliates in 2014 and 2015. The 2014 survey was sent to all students, staff and faculty at both the UM Mountain Campus, and Missoula College. However, the 2015 survey was limited to student affiliates. Although the 2015 survey asked respondents to identify their affiliation with the University, and many indicated that their primary affiliation with the University is as an employee (many employees take classes during their tenure), the sample of faculty and staff was not broad enough to draw conclusions about employee travel patterns and preferences for the 2015 calendar year. As a result, this report profiles employees responses to the 2014 campus travel survey (see Figure 9), and all student responses to the 2015 travel survey, to paint a picture of University travel patterns and parking demand, while drawing distinctions between different types of affiliates at the UM Mountain and Missoula College campuses.

Rate of Response

Figure 1-8 shows the total number of 2015 survey responses by student affiliates of the main Mountain Campus of the University of Montana, Missoula. The breakdown of undergraduate responses by class is presented in Figure 1-10. More than three-quarters of undergraduate respondents were either in the Junior or Senior class. This is notable as both are likely to have a higher propensity to live off-campus than first or second-year students. In addition to main Mountain Campus affiliates, four Missoula College campus affiliates completed the 2015 survey. Due to the low level of response from Missoula College affiliates, these responses were not evaluated separately, but instead combined with all other responses for analysis of University-wide access and travel patterns. Shown in Figure 9 is the breakdown of employee respondents to the 2014 Travel Study on the basis of campus location and employment status. A vast majority of employee respondents indicated working at the Mountain Campus full-time as either staff (58%) or faculty (27%).

³ MR TMA Ridematching website: <http://www.mrtma.org/carpool-rideshare-application.html>

Figure 8 "Primary Affiliation" of 2015 Student Travel Survey Respondents

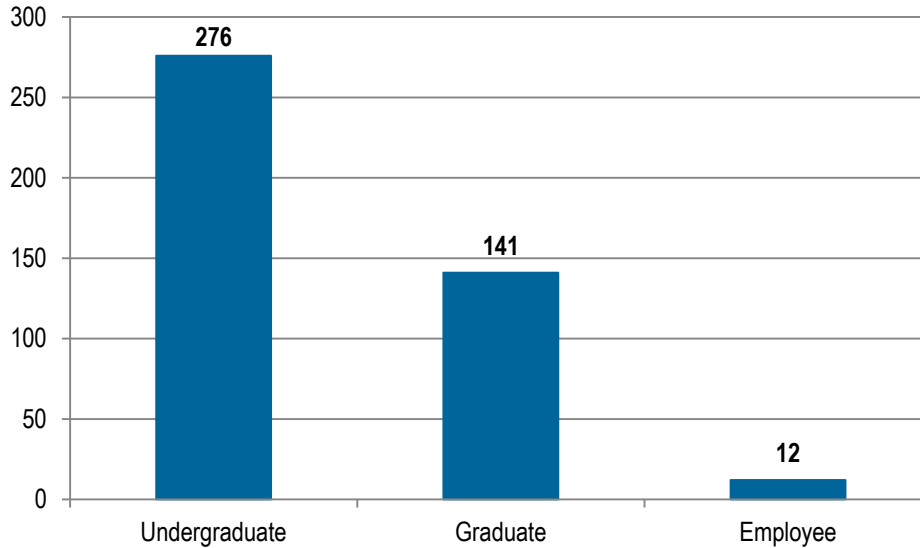


Figure 9 "Primary Affiliation" of 2014 Employee Travel Survey Respondents

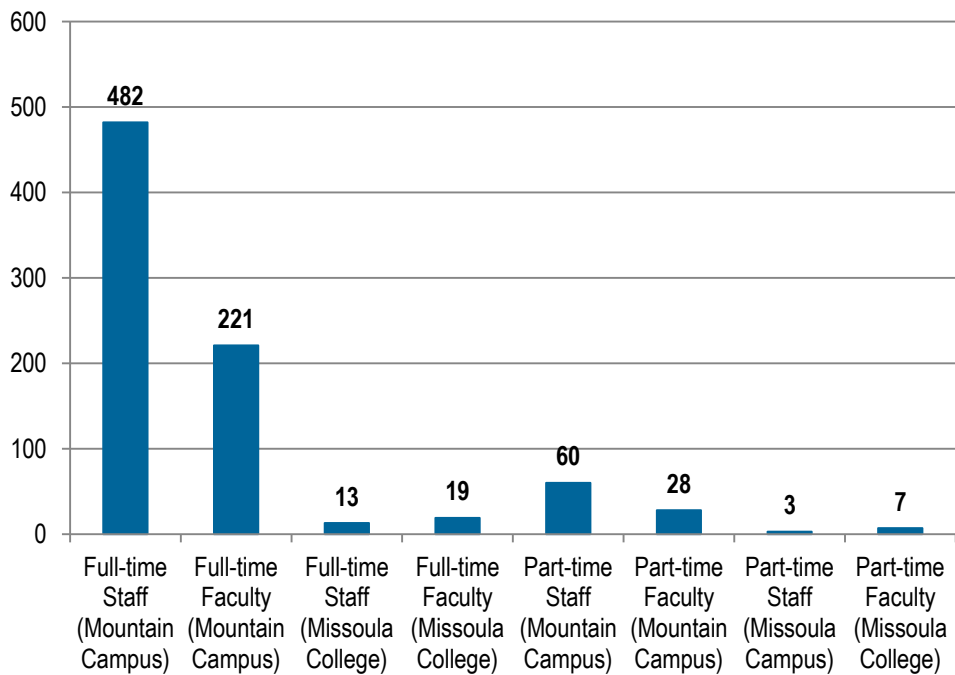
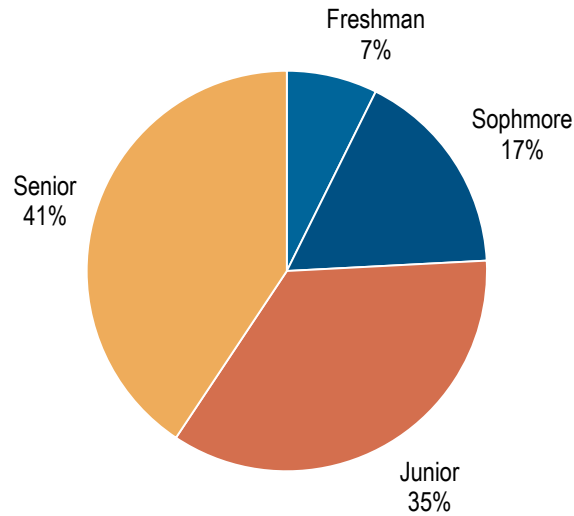


Figure 10 Class of Undergraduate Respondents, 2015 UM Student Travel Survey



Place of Residence

This section details where campus affiliates reside, including where students live while enrolled in classes and their place of permanent residence, if different (Note: for purposes of this transportation plan, permanent residence is defined as the City or County in which students attended high school, and/or the family home to which they may return during breaks in the UM academic schedule). Figure 1-11 shows the distribution of on-campus housing locations for 2015 student survey respondents. Figure 1-12 provides a breakdown of the ZIP codes from which off-campus student resident affiliates of the main campus commute. Nearly half of respondents indicated living in the 59801 ZIP Code, which includes the main Mountain Campus and much of central Missoula south of the Clark Fork River, while more than a third of respondents indicated that they commute from other City of Missoula ZIP Codes, such as 59802, 59803, and 59808. Figure 1-13 lists the ZIP codes from which the highest number of Mountain Campus student respondents claimed permanent residence in the 2015 survey.

Figure 11 On-Campus Housing Locations of 2015 Student Travel Survey Respondents

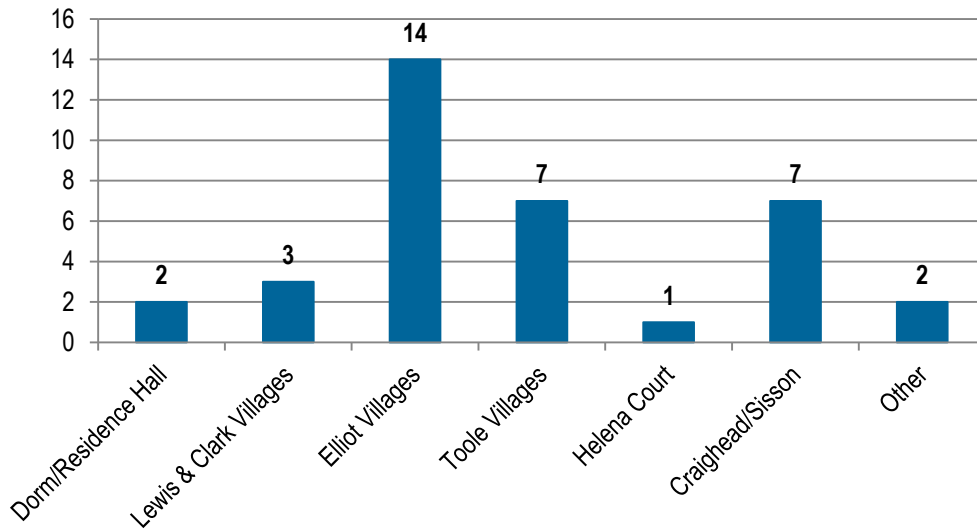


Figure 12 Off-campus Housing Locations of 2015 Student Travel Survey Respondents

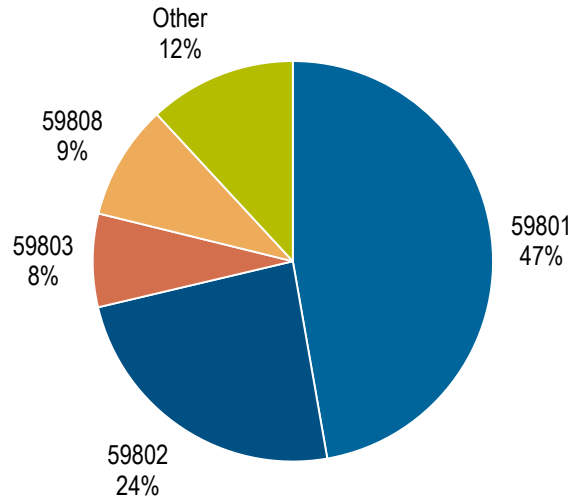


Figure 13 Top Places of Permanent Residence – All 2015 Student Travel Survey Respondents

ZIP Code	City	County
59801	Missoula	Missoula
59802	Missoula	Missoula
59808	Evato, Wye	Missoula
59803	Missoula	Missoula
59870	Stevensville	Ravalli

Figure 1-14 shows the relative density of student and employee home addresses in Missoula and surrounding areas. Main campus has the highest density of employee and student housing locations followed by the University District. Other Missoula neighborhoods with a considerable density of employees and students include Rose Park and downtown Missoula.

Figure 1-15 shows the relative density of housing locations for faculty and staff. Missoula neighborhoods with high concentrations of employees include the University District, Rose Park, Riverfront, Westside, and Lower Rattlesnake.

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Figure 14 Density of Home Locations – All Affiliates (University of Montana Employees and Students)

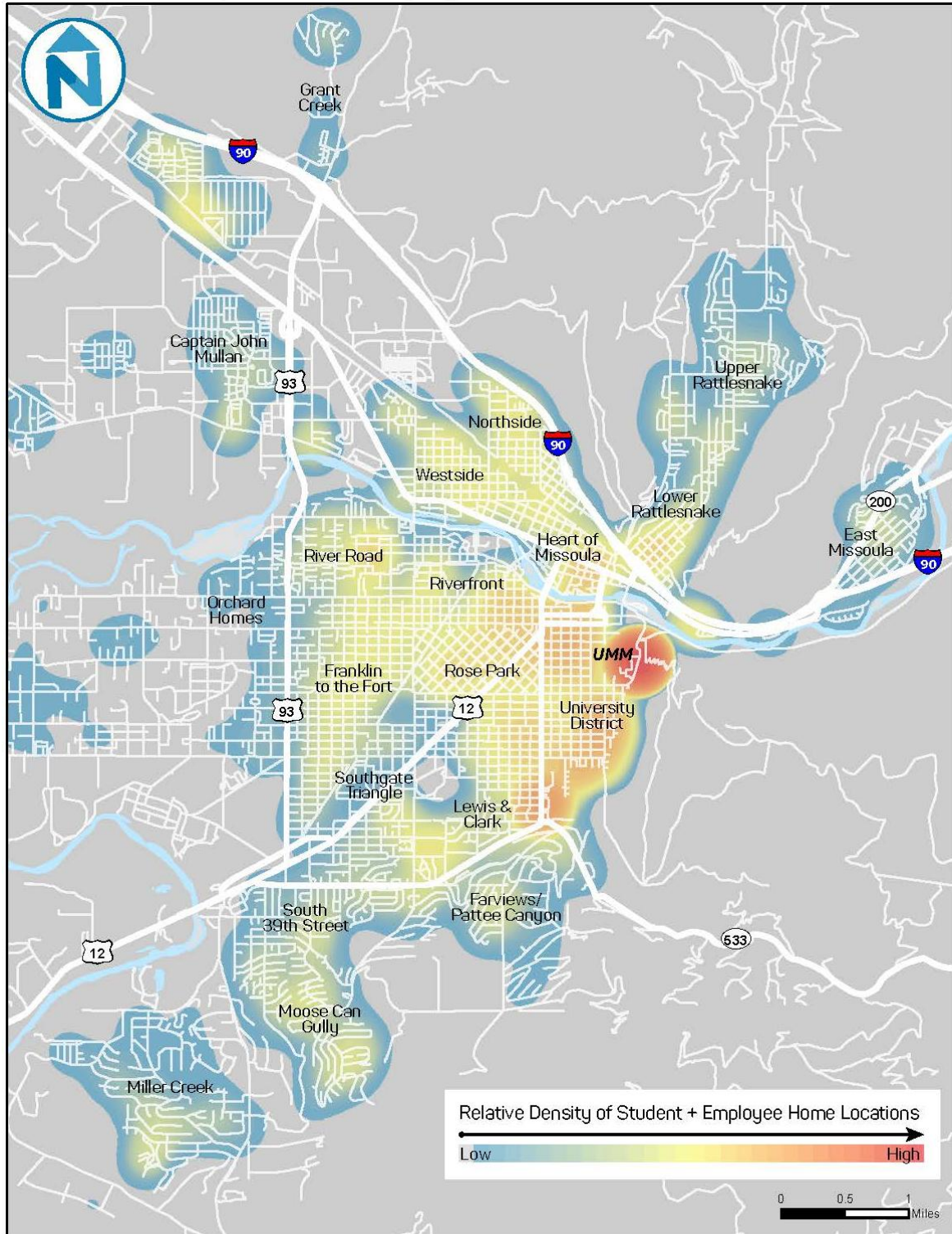
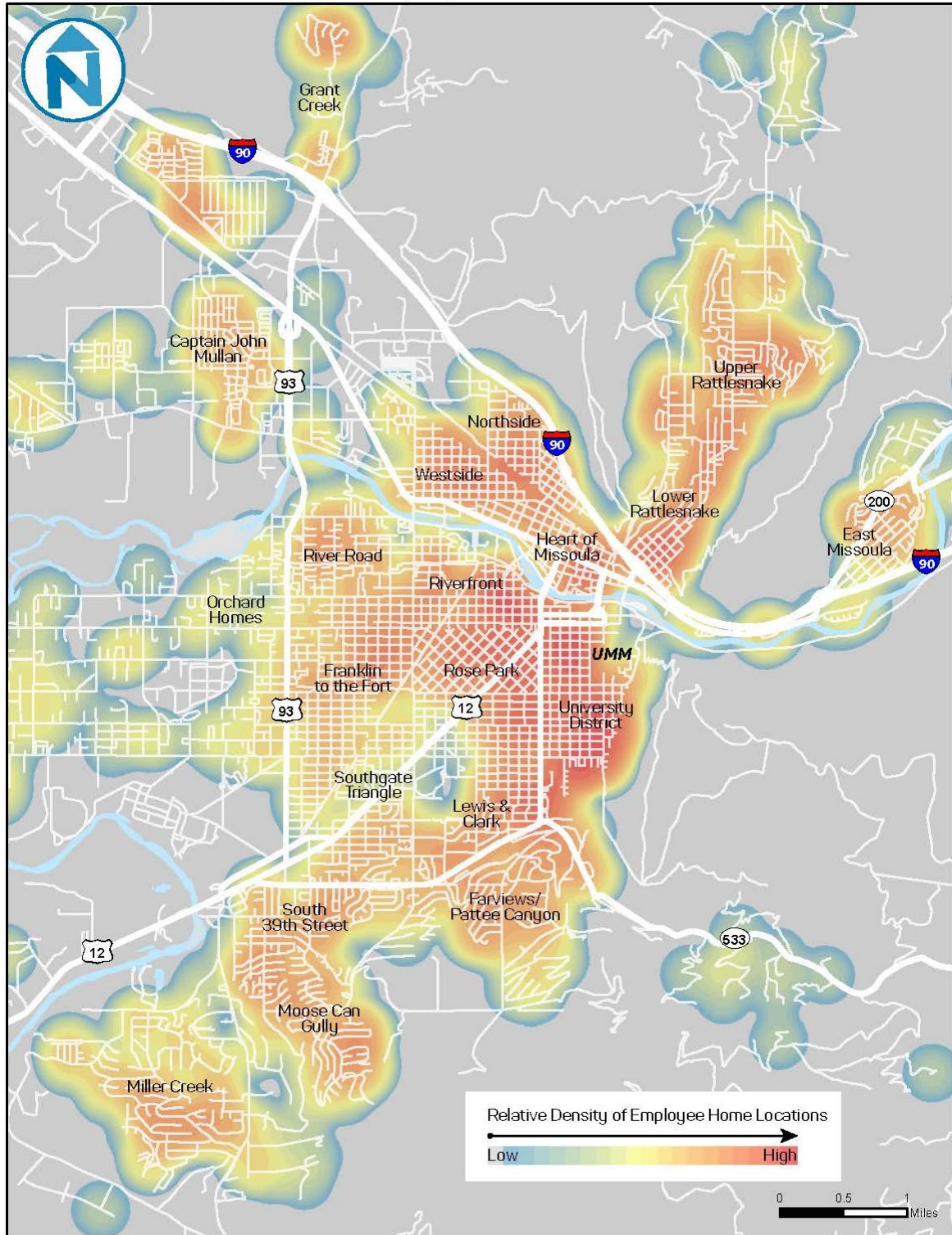


Figure 15 Density of Home Locations – University of Montana, Employees Only



Commute Distance

Figure 16 shows the breakdown of one-way commute distances between home and Main Campus for 2015 student travel survey respondents. Almost 70% of survey respondents indicated commuting three miles or less between home and campus, with just under 15% indicating a commute of less than one mile. Less than 10% of 2015 student travel survey respondents noted a one-way commute of more than 10 miles between their home and campus.

Figure 18 shows the area accessible within a one mile walk, following the City’s street/sidewalk network (as opposed to a straight-line distance, “as the crow flies”). This one-mile “walk shed” represents the area located within an approximately twenty minute walk of campus for a typical pedestrian. Figure 1-19 shows the comparable “bike shed” for campus in which all locations are accessible within a three-mile ride, following the available network of streets and off-street bicycle paths. Using this network-based analysis and the addresses of more than 12,500 students and over 2,700 employees, approximately 41% of students and 22% of employees live within one mile, or about a 20-minute walk of campus, while approximately 78% of students and 62% of employees live within a three-mile bike ride of campus.

Figure 16 Approximate One-Way Commute Distance, 2015 Student Travel Survey Respondents

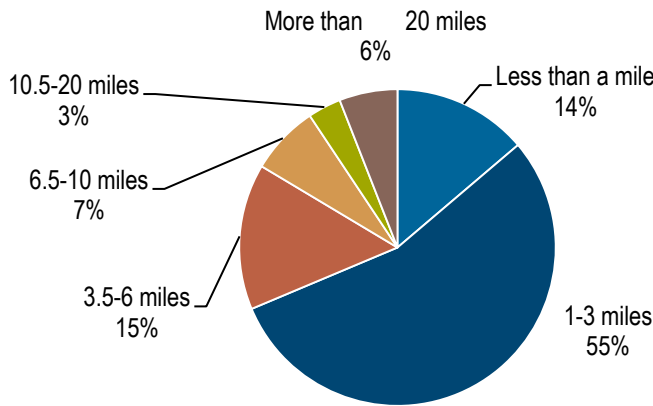


Figure 17 Approximate One-Way Commute Distance by Affiliate Status⁴

Distance to Campus	Undergraduates	Graduate Students
Less than one mile	12.9%	9.8%
1-3 miles	55.7%	68.9%
3.5-6 miles	14.5%	10.6%
6.5-10 miles	6.3%	6.8%
10.5-20 miles	4.7%	2.3%
More than 20 miles	5.9%	1.5%

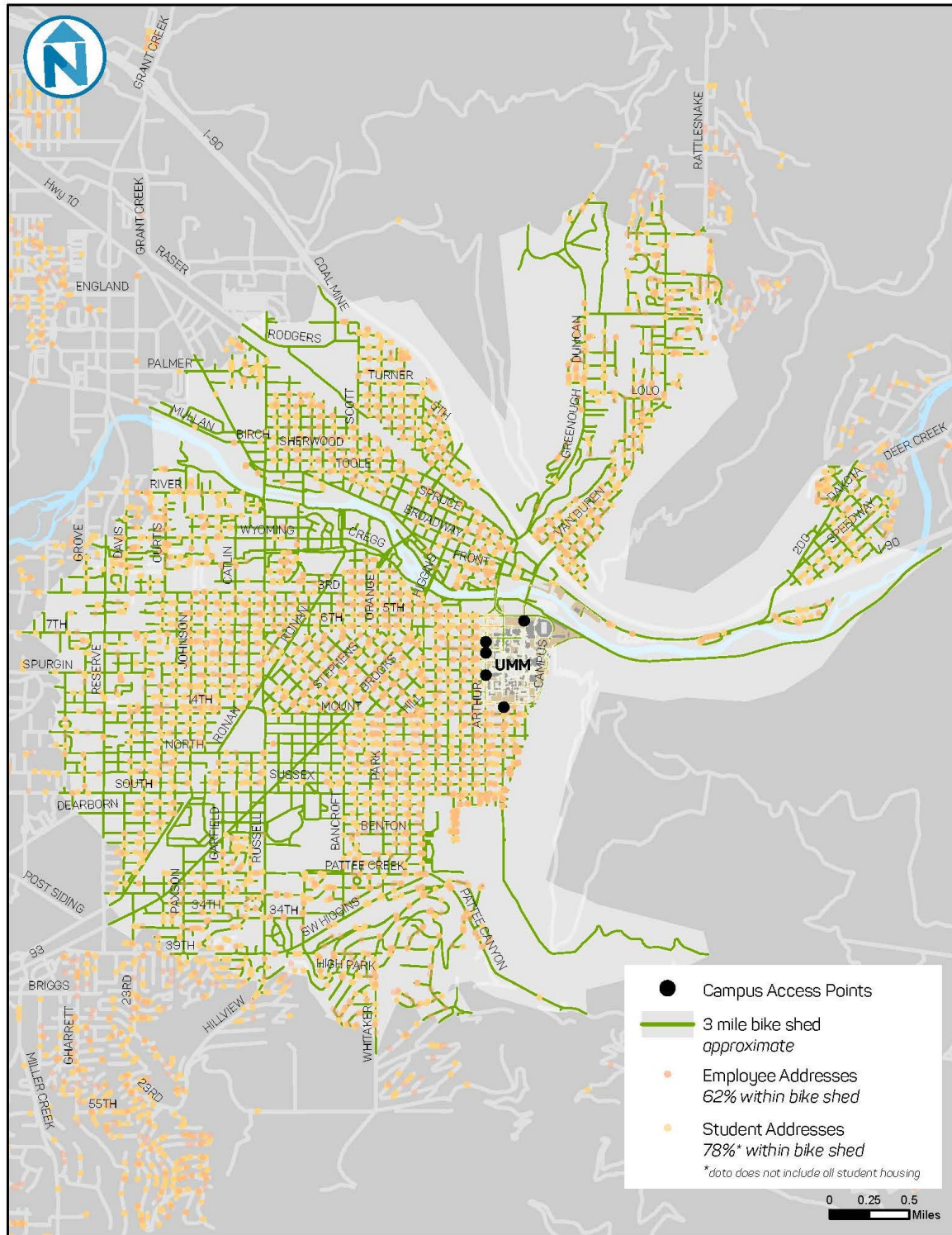
⁴ As no similar question was asked on the 2014 survey, a significant sample of one-way commute distances for employees is unavailable.

Figure 18 Area within One-Mile Walking Distance of UM Missoula Mountain Campus



Data Sources: Missoula County GIS, Montana NRIS, UMM

Figure 19 Area within Three-Mile Bicycle Ride of UM Missoula Mountain Campus



Data Sources: Missoula County GIS, Montana NRIS, UMM

Place of Permanent Residence: Frequency and Mode of Travel to

Figure 1-20 shows a breakdown of the number of trips home to a permanent address that student respondents to the 2015 travel survey indicated taking per year. A significant share of students (41%) noted that the question was “not applicable,” suggesting that a large number of students may originate from the Missoula area and may commute to school from their permanent address. Slightly under a quarter indicated that they travel home just one to two times per year, while less than a fifth travels home three to five times per year.

Figure 1-21 shows the travel modes used by students who indicated in the 2015 travel survey that they regularly travel home to a permanent address outside of Missoula for University breaks and holidays. A significant majority of this group of respondents (62%) indicated that they travel alone by car to reach their permanent address, while 20% fly home to their permanent address.

Figure 20 Trips Home to Permanent Address per Year – All Students (2015 Student Travel Survey)

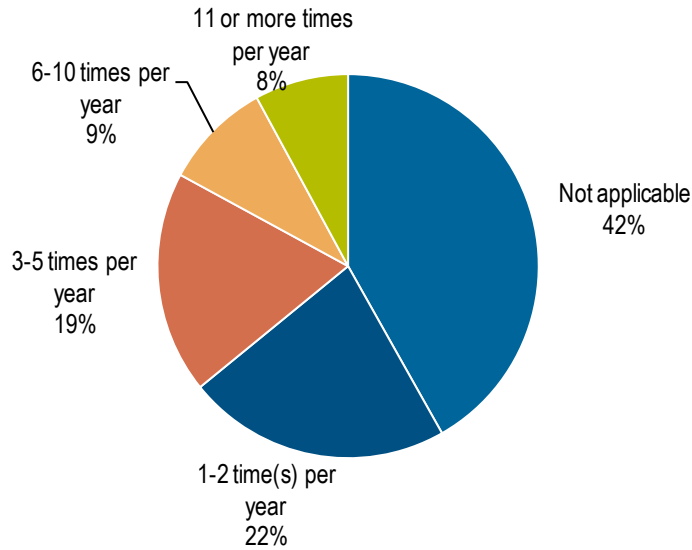
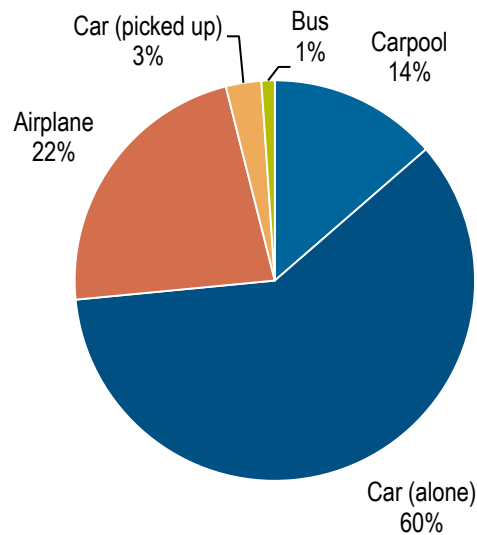


Figure 21 Typical Mode of Travel for All Students who Reported Traveling to Permanent Address for University Breaks (2015 Student Travel Survey)



It is important to note that in the absence of good alternatives for travel to/from their place of permanent residence (i.e. visits home or elsewhere to see family and friends), many students may perceive a need to bring and keep a car or truck on or near campus, even though they may use it infrequently for travel to campus or within town while school is in session. Ridesharing, carsharing and/or user-friendly car rental services can expand students' weekend/inter-City travel needs, making more students comfortable with living in Missoula without a motor vehicle.

Frequency of Travel to Campus

The University of Montana's main Mountain Campus and the Missoula College campus are not conventional nine-to-five employment sites, with peak demand for access and egress during conventional "rush hours." Instead, like many college campuses, there is a variable flow of people arriving and departing and circulating within these campuses to attend classes and work at research centers at various hours on various days of the week. Graduate and undergraduate students, faculty members, and campus staff often have markedly different travel patterns, with students coming and going to classes and campus activities at different times of day, and campus staff more closely following the conventional pattern of commuting in to campus in the morning, returning home in the late afternoon/early evenings four to five days per week.

Frequency: Trips to Campus per Week

Figure 1-22 shows the number of reported round trips to the main Mountain Campus per week by students (2015 student travel survey). Half of all students reported making five to six round trips to campus per week. Less than 15% of respondents indicated that they make fewer than five round trips to campus per week.

Figure 22 Student Round Trips to Main Campus per Week (2015 Student Travel Survey)

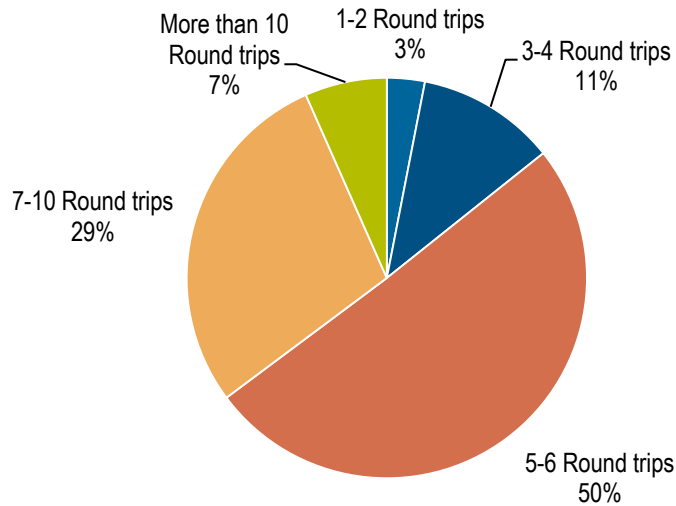


Figure 1-23 shows the days in which 2015 student travel survey respondents indicated that they travel between home and campus. Weekday travel patterns by affiliation are fairly constant, with Fridays experiencing slightly reduced levels of travel by students. The day with the highest volume of home to campus trips was Mondays for undergraduates and Wednesdays for graduate students. Trips to campus on Saturdays are slightly higher than trips to campus on Sundays for students, with travel on weekends 65% less than the average number of weekday trips for undergraduates, and 67% less for graduate students. Shown in Figure 24 are the days in which employee 2014 travel survey respondents indicated that they travel between home and campus. Weekday travel patterns are nearly identical to that of students observed in 2015; however the rate of employees traveling to work on weekends was considerably higher. The average number of weekend trips was 57% the average number of weekday trips for employees versus just 34% for students.

Figure 23 Student Home to Campus Trips by Day (2015 Student Travel Survey)

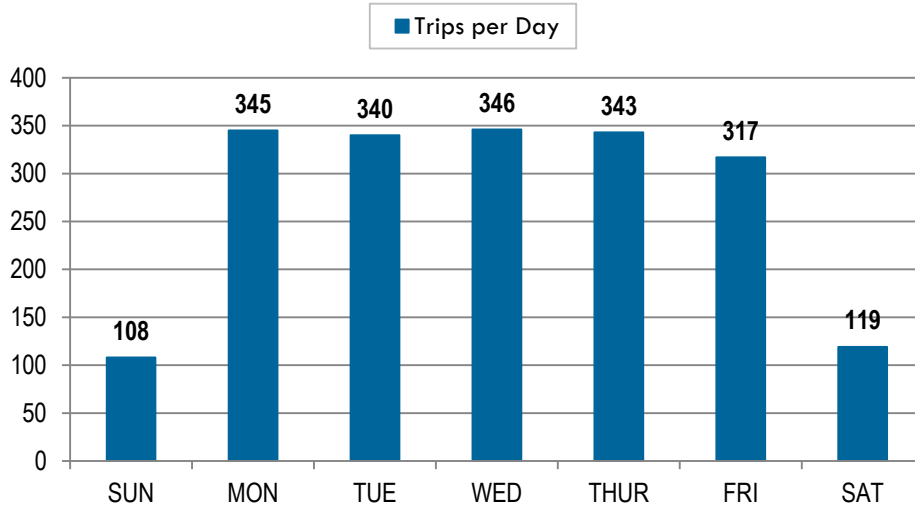
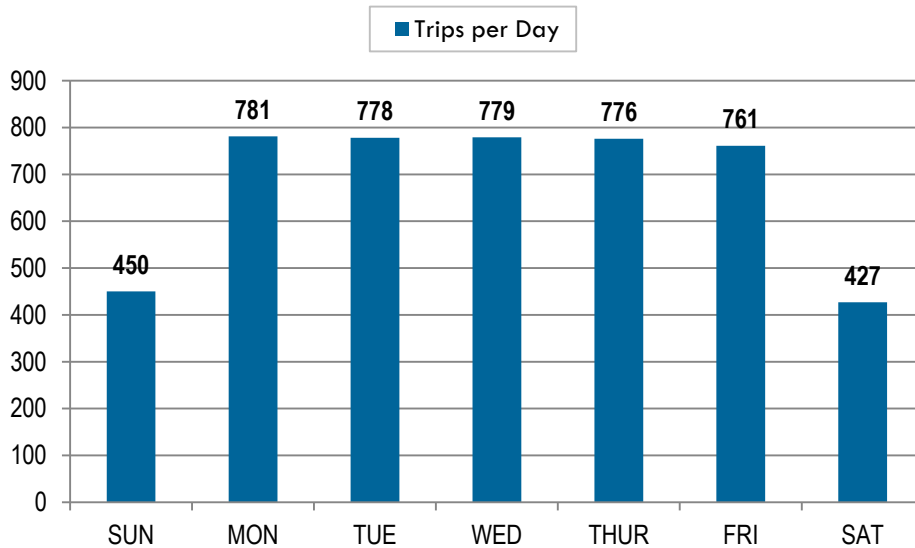


Figure 24 Employee Home to Campus Trips by Day (2014 Travel Survey)



Mode of Travel

This section details the mode of travel for trips to and from University of Montana’s Mountain Campus and the Missoula College Campus.

Figure 25 shows the home-to-campus mode share for all students traveling to the Main Mountain Campus. The largest share (37%) indicated that driving alone is their primary mode of travel between home and campus. Just over a fifth of respondents indicated that they use transit (either UDASH or Mountain Line), while approximately a fifth indicated biking as their primary mode of travel.

Figure 25 Home-to-Campus Mode Share – All Students (2015 Student Travel Survey)

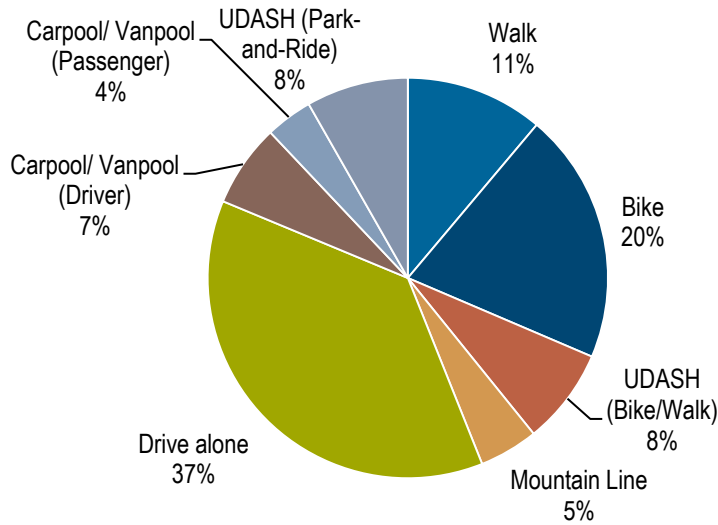
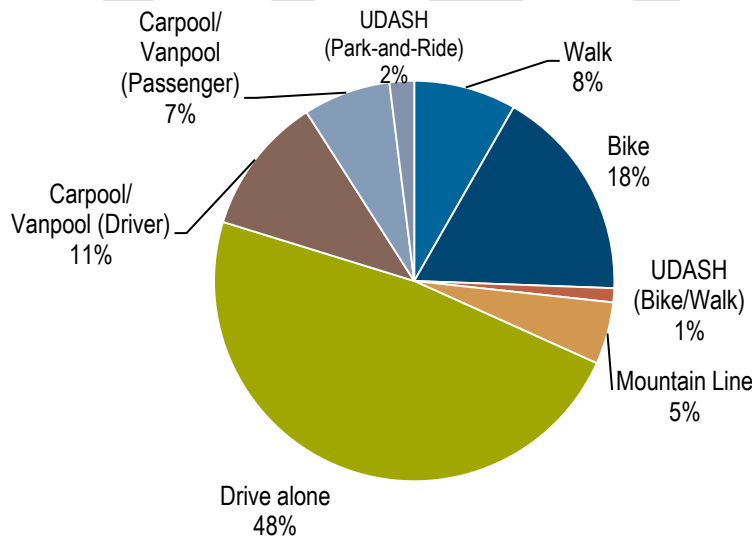


Figure 26 illustrates the home to campus mode share for employees traveling to the Main Campus. Slightly under half (48%) indicated that driving alone is their primary mode of travel between home and campus. At 18%, the second most popular choice was biking, followed by carpool/vanpool as a driver.

Figure 26 Home-to-Campus Mode Share – Employees (2014 Travel Survey)



Figures 27 and 28 show the share of University of Montana campus affiliates who regularly drive alone to campus, reported by ZIP code for students (Fig. 27) and employees (Fig. 28) respectively. Predictably, drive-alone commuting is most common among campus affiliates who live outside of the areas that are easily accessible by walking, bicycling, or taking a short ride on Mountain Line or UDASH bus lines, including zip code 59808 (Captain John Mullan and other areas west of US-

93), from which 69% of both student and employee survey respondents report having commuted by driving alone within the last week. Similarly, zip code 59803, which includes Fairviews/Pattee Canyon, and other areas south of Highway 533 and southwest of the Clark Fork River and Mount Sentinel had 61% of resident employees and 58% of resident students report driving alone to campus within the past week. Only 49% of student commuters and just 40% of employees from the 59801 zip code surrounding the Mountain Campus indicated that they had driven alone to campus within the past week. Nevertheless, this zip code also has the highest concentration of drive-alone commuters, given the many University of Montana students and employees living in the area.

DRAFT

Figure 27 Students Affiliates Who Drive Alone at Least Once Per Week, by ZIP Code (2015 Survey)

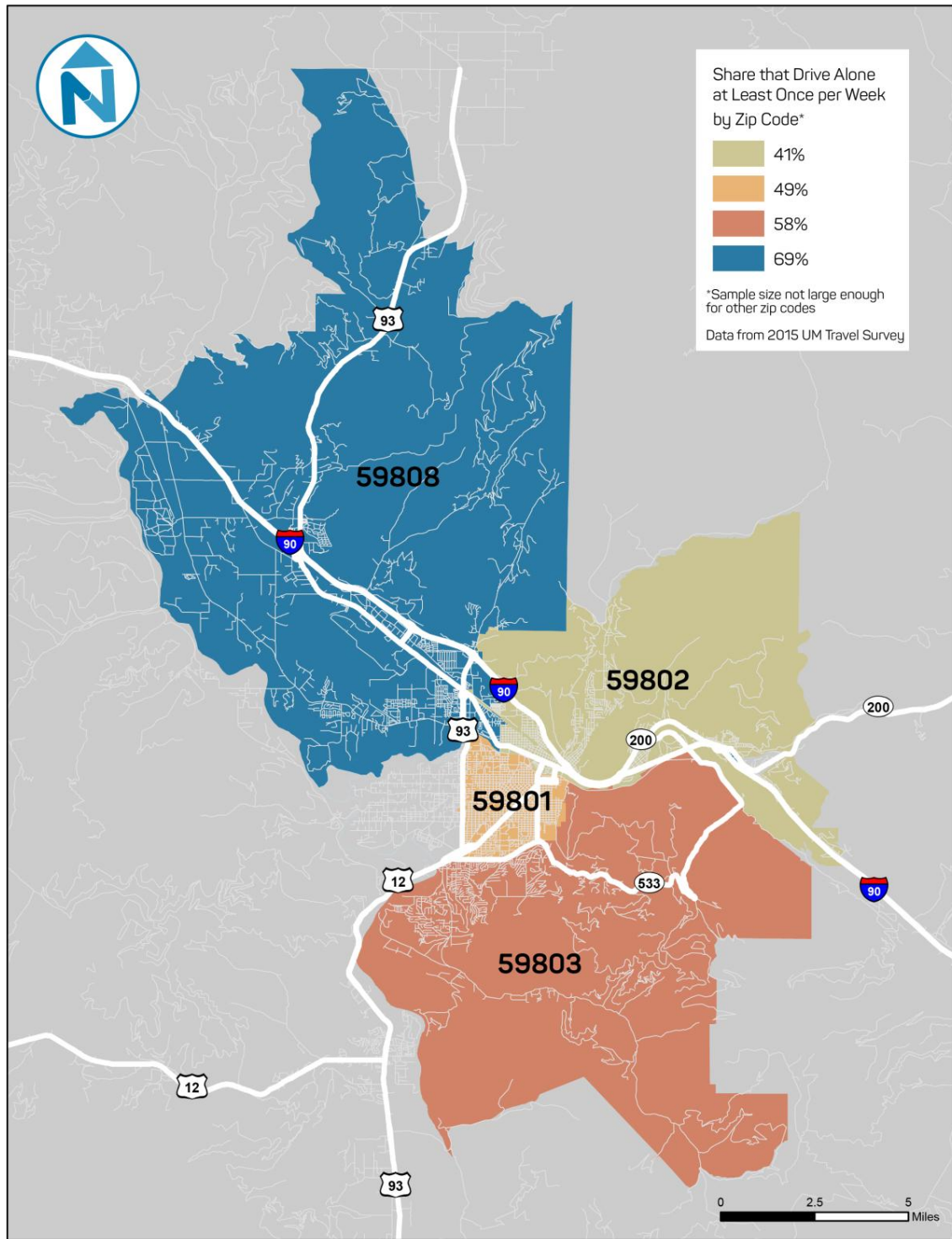
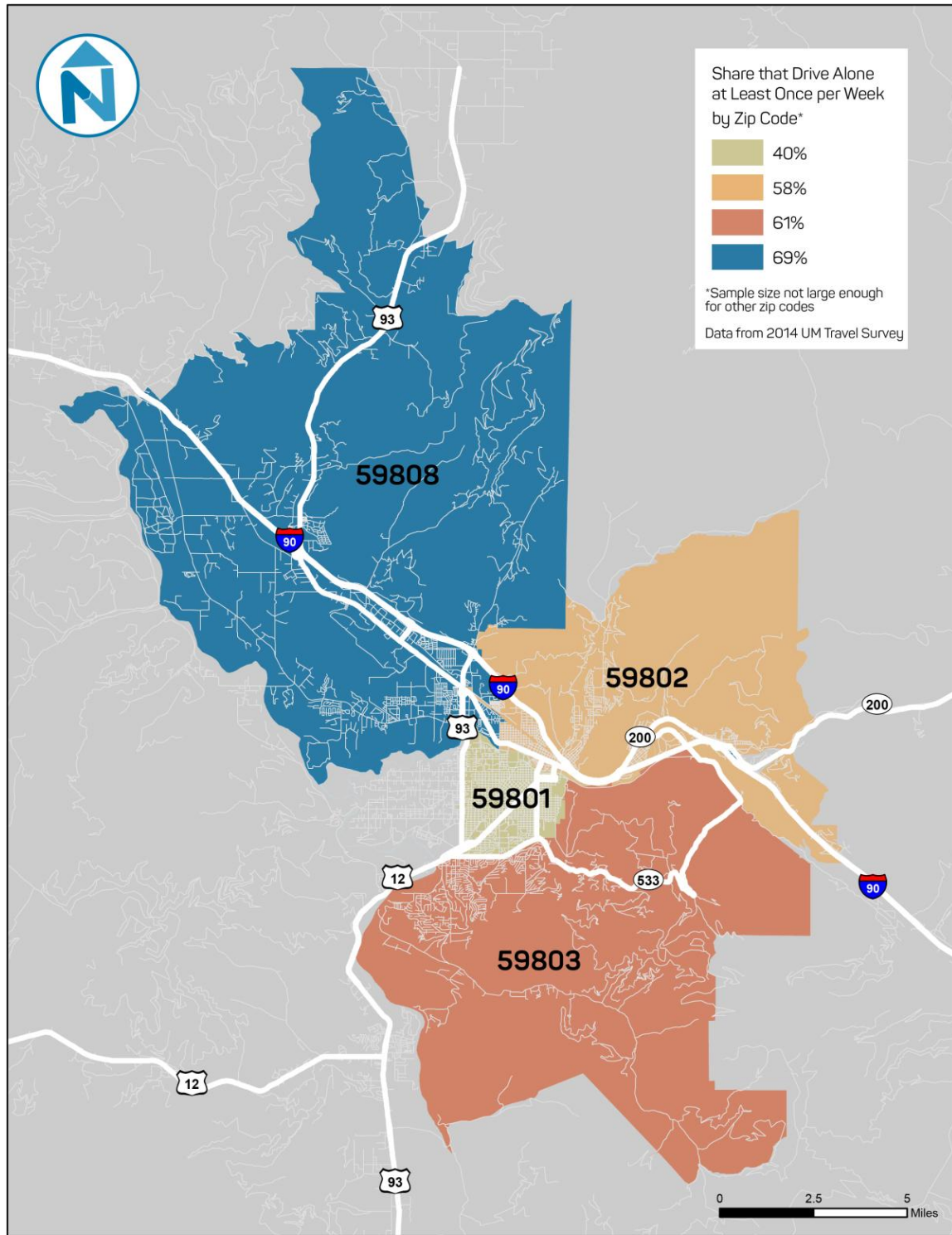


Figure 28 Employee Affiliates Who Drive Alone at Least Once Per Week, by ZIP Code (2014 Survey)



Mode of Travel to Campus by Campus Affiliation

Figure 29 shows the mode shares for travel between home and Main Campus by campus affiliation. Due to the low rate of response by Missoula College affiliates during the 2015 survey, data from the 2014 survey was used to gauge mode share at the campus. Figure 30 details the primary mode share from home to campus for 154 Missoula College students and employees who responded to a travel survey in the Fall of 2014.

Figure 29 Mode Share to Main Mountain Campus by Affiliate Status (2015 Student Travel Survey)

Mode	Undergraduates	Graduate Students	Employees ⁵
Walk	9.4%	14.7%	8.3%
Bike	16.5%	28.1%	17.3%
UDASH (Bike/Walk)	8.9%	5.4%	1.1%
UDASH (Park-and-Ride)	8.8%	7.0%	2.0%
Mountain Line	3.3%	7.7%	5.0%
Carpool/Vanpool (Driver)	6.0%	8.2%	11.2%
Carpool/Vanpool (Passenger)	4.1%	3.1%	7.1%
Drive alone	42.9%	25.9%	48.0%

Figure 30 Mode Share to Missoula College – Students and Employees (2014 Travel Survey)

Mode	Share
Walk	3.2%
Bike	8.8%
UDASH (Bike/Walk)	0.0%
UDASH (Park-and-Ride)	4.0%
Mountain Line	2.7%
Drive alone	66.3%
Carpool/Vanpool (Driver)	11.5%
Carpool/Vanpool (Passenger)	3.5%

Vehicle Parking and Storage

This section provides an account of ASUM travel survey responses indicating where University of Montana and Missoula College affiliates park, when they use a motor vehicle to get to campus, and the type of parking pass or permit used.

⁵ Employee data is derived from the 2014 Travel Survey in order to provide a larger sample size.

Daily parking location

Figure 1-31 shows the shares of parking options used most frequently by campus affiliates who drive all or part of the way to campus. On-campus permit parking was the most popular response for all three affiliate types, with on-street parking off-campus being the second most common for both students and employees.

Figure 31 Frequent Parking Location by Affiliate Status (2014/2015 Travel Surveys)

Parking Location	Undergraduates	Graduate Students	Employees ⁶
Permit parking (UM)	52.3%	39.6%	58.2%
Hourly parking (UM)	15.4%	12.9%	4.7%
Reserved parking (UM)	1.5%	1.0%	14.8%
On-street (Off-campus)	17.4%	35.6%	18.0%
On-street (UM permit required)	2.1%	0.0%	1.3%
Lewis & Clark Park-and-Ride	8.2%	6.9%	1.3%
East Broadway Park-and-Ride	3.1%	4.0%	1.6%

Parking permit utilization

Figure 32 details the shares of parking permit types used by campus affiliates. Full Year permits were the most popular permit type for both undergraduate and graduate students. However, a significant majority of students indicated that they do not have a parking permit. Slightly under half of employee survey respondents use Faculty/Staff parking permits, while just over 10% park in a reserved space.

Figure 33 Parking Permit Share by Affiliate Status (2015 Student Travel Survey)

Permit Type	Undergraduates	Graduate Students	Employees ⁷
Student: Half Year	11%	9.3%	0%
Student: Full Year	20.8%	13.6%	0.5%
Faculty / Staff	2.1%	0.7%	44.9%
Reserved	0.5%	0.7%	10.6%
University Villages	4.8%	7.1%	0.4%
Other	5.2%	5.7%	11.8%
None	55.6%	62.9%	31.8%

⁶ Employee data is derived from the 2014 Travel Survey in order to provide a larger sample size.

⁷ Employee data is derived from the 2014 Travel Survey in order to provide a larger sample size.

PARKING PROGRAM EVALUATION

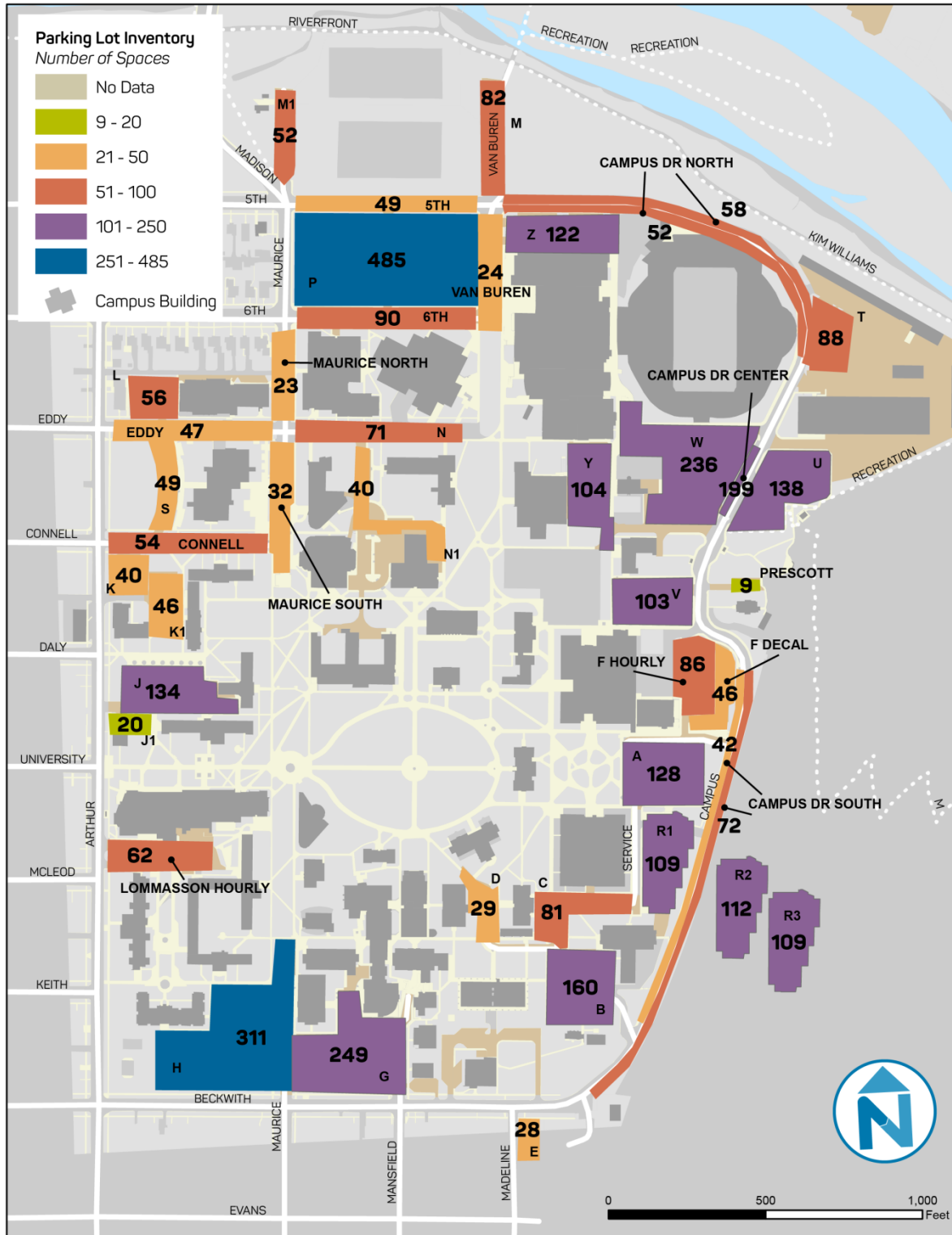
Parking Supply 2015-2016

Figure 1-31 shows a map of the on-campus parking supply for the Mountain Campus, by lot/facility, as of Fall 2015. For the 2015/2016 Academic Year, several changes to the supply of off-street parking on this map are expected:

- The East Broadway Park and Ride, which included 239 spots, immediately across the Clark Fork River from the Mountain Campus, has been closed for construction of the new Missoula College on that site. As of Fall 2015 are no plans to replace those parking spaces.
- Finally, the construction of the Gilke Executive Education building will compromise 49 spaces for the duration of the 2015 calendar year.
- Lot W, which has 236 spaces will be closed from May 2016 through July 2017 while it serves as a staging area for construction of the new Athletic Academic Center.

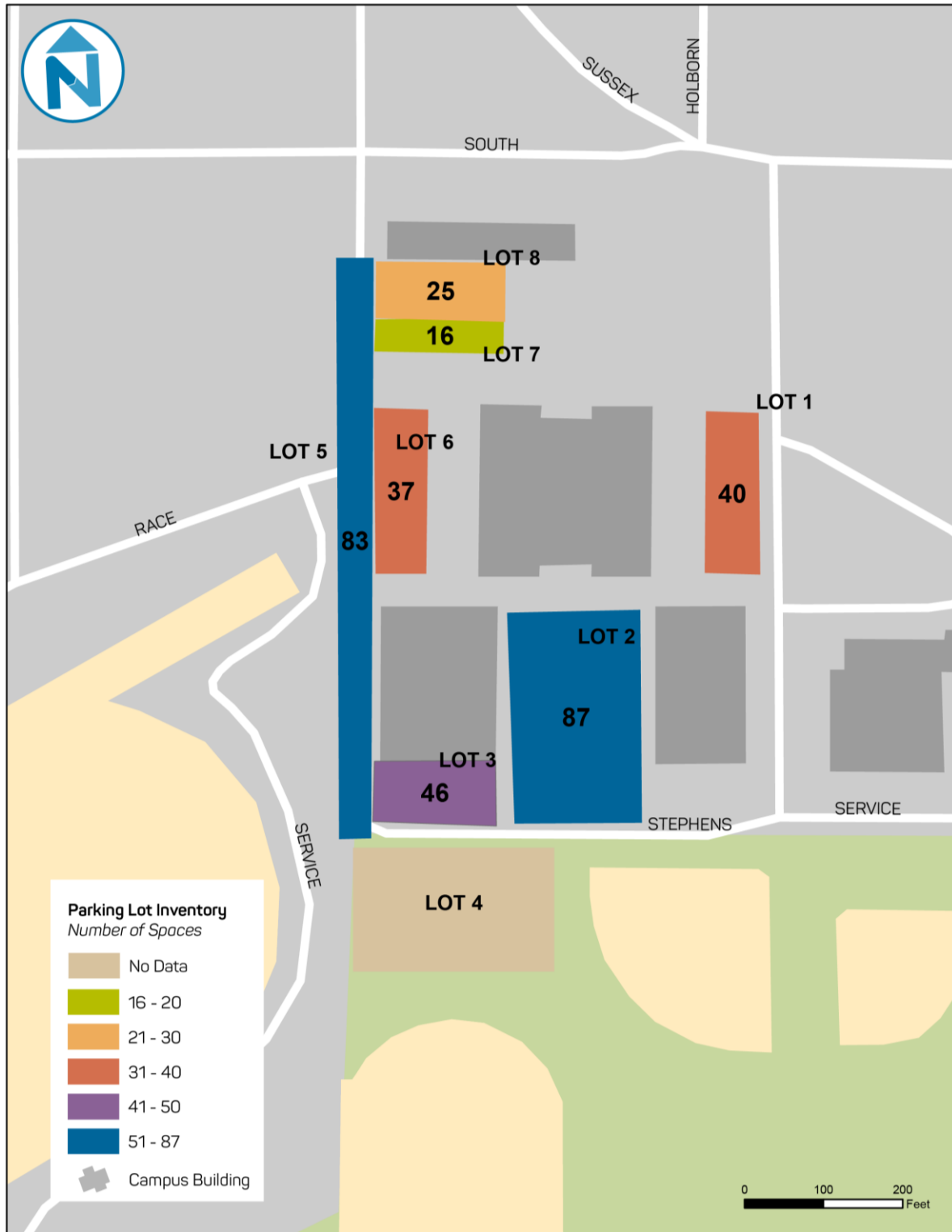
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Figure 34 On-Campus Parking Supply, University of Montana, Main Mountain Campus



Data Sources: Missoula County GIS, Montana NRIS, UMM

Figure 35 Parking Supply, Missoula College Campus, 2015



Data Sources: Missoula County GIS, Montana NRIS, UMM

Parking Permits and Pricing

A parking permit or guest pass is required to park in on-campus spaces throughout the year, Monday through Friday from 7 a.m. to 5 p.m. Parking in decal, reserved, and metered lots is free on weekday evenings after 5 p.m., weekends, and University-observed federal holidays. Figure 36 shows the parking permit options available for campus affiliates for FY15-16, which include rate increases over the previous year. Figure 37 details parking permit sales by type and affiliate for fiscal years from FY12-13 to FY14-15.

Figure 36 Parking Permit Eligibility and Pricing (2015-2016)

Permit Type	Regulations	Cost
Full Year	Faculty/Staff*/Student	\$225.00
Semester (Fall/Spring)	Student only	\$112.50
Summer		\$76.50
2 Wheel Vehicles	Valid only in 2-wheel motorized vehicle parking areas	\$42.00
Carpool	Must consist of at least 3 commuting (not Residence Halls) members with 3 registered vehicles	\$12 per member
Super Saver Commuter	Valid for periods when park-and-ride buses are not operating and campus is open	\$30.00
Go Green	Valid for electric and hybrid vehicles meeting EPA SmartWay Elite standards	\$75.00
Reserved	Valid only in assigned space	\$555.00
Retiree	Valid in regular A permit lots for retired UM faculty and staff with 15 years of service and lifetime Griz Card	Free

* Staff in one of the bargaining units on campus have access to a reduced-cost permit. For 2015-16, this rate is \$141.00.

Figure 37 Parking Permit Sales (Fiscal Year 2014-2015)

Year	Student (Year)	Student (Sem.)	Faculty/ Staff (Year)	Go Green	Car-pool	Two Wheel	One Day	Five Day
Sold	3,926	1299	1129	80	14	80	3377	3600
Revenue	\$726,310	\$120,157.5	\$208,865	\$4,920	\$420	\$2,800	\$10,131	\$36,000

Source: UM Police Department/ UM Office of Sustainability

Visitor parking is available for purchase on an hourly and daily basis. Single-day and five-day passes are valid in regular decal lots and are sold exclusively at the University of Montana Police Department and the University Center Bookstore and Info Desk; single-day passes are also sold at the UC Box Office and GrizCentral in the Lommasson Center. Hourly parking is available from pay stub dispensers in metered and multi-pay area lots. Free 20-minute parking is permitted at designated centrally located Quick Stop locations without the need for a permit (limit once per

day per vehicle) for quick pick-ups, drop-offs, and deliveries. Figure 38 provides a summary of visitor parking rates on campus.⁸

Figure 38 Visitor Parking Fees

Parking Type	Cost
One Day Pass	\$3.00
Five Day Pass	\$10.00
Hourly	\$1.00 per hour
Quick Stop (20-minute maximum)	Free

Event Parking Management

Parking for participants and attendees at campus events hosted by the Athletics Department or the Adams Center is managed separately from regular campus access and parking. Major events, such as basketball and football games, concerts, plays and other arts performances, typically occur at night (after 5:00 PM), or on the weekends, when demand for parking to access other campus programs, services and activities is relatively low. Since campus parking is generally available free of charge during these off-hours, UMPD does not charge a fee to Athletics or the Adams Center for use of lots P, Z, or other nearby on-campus parking facilities. However, both the Athletics Department and the Adams Center do charge event attendees for parking for selected events. The charge is \$5.00 per vehicle for basketball games and Adams Center events. Parking prices for football games are significantly higher, but vary by lot and by year. Both entities hire their own parking attendants – not UMPD officers – to collect money and manage parking for them.

One challenge is the need to accommodate bus parking for event staging or participant access to on campus venues. When the Adams Center or the Athletics Department need additional space to accommodate buses and event staging in the middle of the day on weekdays, they coordinate with Campus Rec and UMPD to reserve space in Lot Z (located behind Campus Rec). When such reservation is necessary during peak commute periods, the department sponsoring the event pays a fee (typically \$2/space per day) to UMPD to reserve spaces and account for administrative and enforcement costs.

In addition to permits for campus associates and hourly and daily parking for visitors, the University provides the following special use permits shown in Figure 38.

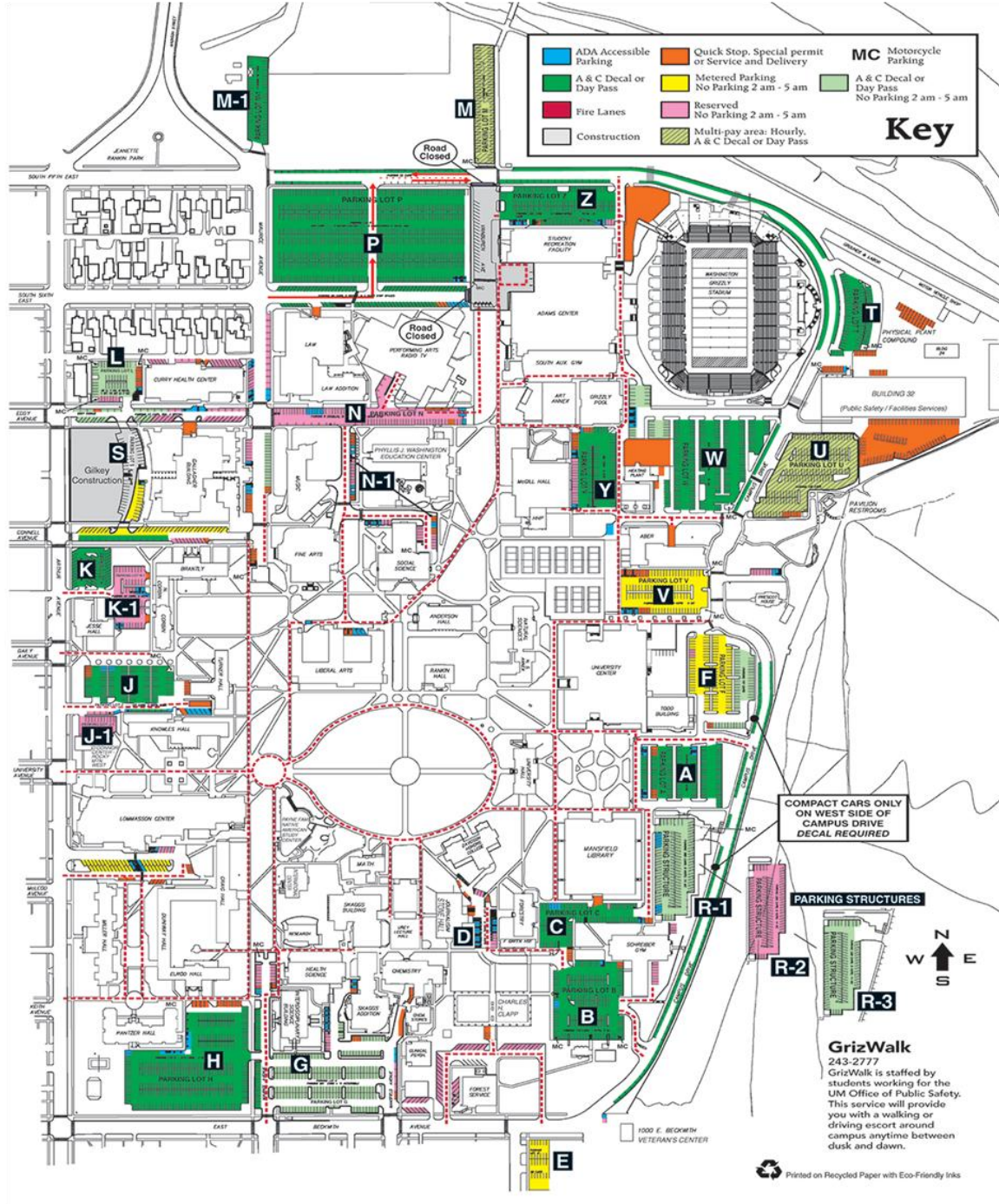
Figure 38 Special Use Parking Permits

Permit Type	Regulations	Cost
Service & Delivery	Valid for short-term (30-minute maximum) pick-ups and deliveries by businesses and vendors	\$20.00
Contractor	Valid in Service areas with time limitations and any regular decal lot for outside contractors working on campus for extended periods	\$92.50 per semester

⁸ <http://www.umt.edu/police/Parking/Parking%20Information/Visitor%20Parking.php>

Parking and Transportation Demand Management Plan | EXISTING CONDITIONS
 University of Montana, Missoula

Figure 39 Parking Permit Eligibility by Facility, Univ. of Montana, Main Mountain Campus (2015)



Source: ASUM, 2015.

Parking Utilization

An essential step in managing public resource, such as the on-campus parking and transportation facilities at the University of Montana and Missoula College, is to collect detailed information on when, where, how and how many people use them. After developing a comprehensive inventory of the capacity and use restrictions of each facility on both campuses, ASUM collected parking utilization data during two full days and one partial day of periodic occupancy counts at all facilities. ASUM staff, students, and volunteers counted the number of vehicles parked in each lot every two hours, between the hours of 10:00 AM and 4:00 PM on Wednesday, October 14th and Thursday, October 15th, noting how many of each type of permit were used in each lot. Data were also collected for some periods at selected campus facilities on Tuesday, October 16th, which served as a test of the data collection methods and procedures.

The findings of this parking data collection effort are illustrated in Figures 40-43.

As of Fall 2015, the University of Montana owns and operates a total supply of more than 5,000 parking spaces serving its affiliated campuses in Missoula. The vast majority of this public parking supply is located on the main Mountain Campus, which maintains a supply of 4,127 parking spaces, including off-street and curbside parking on campus streets. The current site of Missoula College is served by more than 400 parking spaces in eight on-campus parking lots. The University also operates three park and ride facilities – Dornblaser, Lewis & Clark Transit Center, and Lewis & Clark Overflow lots – with a total of 408 additional commuter parking spaces in the South Campus area.

Because it is the primary destination of most commute trips by University of Montana students and employees, and the most detailed parking occupancy data were collected there, this section concentrates on the utilization of parking spaces on the main Mountain Campus.

Figure 40 shows the total number of parking spaces occupied on the main Mountain Campus from 10:00 AM-4:00 PM on both Wednesday, October 14th and Thursday, October 15th. This observation revealed that there were more vehicles parked on Wednesday than on Thursday, during this typical week. On both days, the period of peak parking utilization occurred between 10:00 AM and 12:00 PM. Throughout the two and a half day survey period, the period of peak utilization – that time when the greatest number of vehicles (3,379) were observed on campus – occurred between 10:00 AM and 12:00 PM on Wednesday, October 15th. At that time, approximately 82% of the available parking spaces on the main Mountain campus were filled⁹.

This period of peak occupancy is highlighted on Figure 41, which illustrates the percentage of available parking spaces occupied on the main Mountain Campus throughout the day on Wednesday, October 15th. This chart shows that the highest share of available parking spaces are filled (82%) in the late morning period (10:00 AM-11:59 PM), when many faculty, staff and students have business on campus. After noon, the parking occupancy rate declines to 79% from 12:00-2:00 PM, dropping to 75% from 2:00-4:00 PM.

⁹ Note that during several of the time periods observed the supply of legally available parking spaces was slightly lower than the total inventory of spaces, due to the temporary closure, or blockage of selected lots and spaces for non-transportation purposes. Throughout this report parking occupancy is reported as the percentage of all available parking spaces filled with a parked vehicle during the observed time period

Occupied Parking Spaces per Campus Affiliate

The peak period utilization of 3,379 parking spaces (10:00 AM-12:00 PM on Weds, October 15th) is also notable in relation to the number of students, faculty, and staff on the main Mountain Campus. With a total of 13,988 full time equivalent (FTE) staff, faculty, graduate and undergraduate students on the Mountain Campus (2015), there approximately one vehicle is parked for every four campus affiliates. This low ratio of parked vehicles per affiliate reflects significant share of all campus affiliates who regularly carpool, or use non-auto modes of transportation to reach campus, and the varied schedules of students, staff, and faculty members, many of whom are not on campus at the peak hours.

Figure 40 Parking Spaces Occupied on Main Mountain Campus (Weds.-Thurs., October 14-15, 2015)

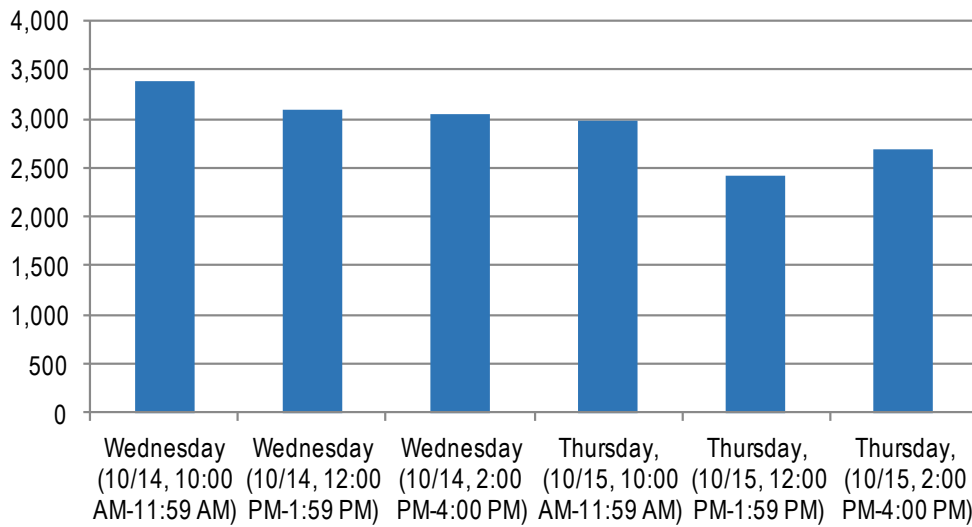


Figure 41 Share of Available On Campus Parking Spaces Occupied by Period, University of Montana, Mountain Campus, Wednesday, October 14, 2015

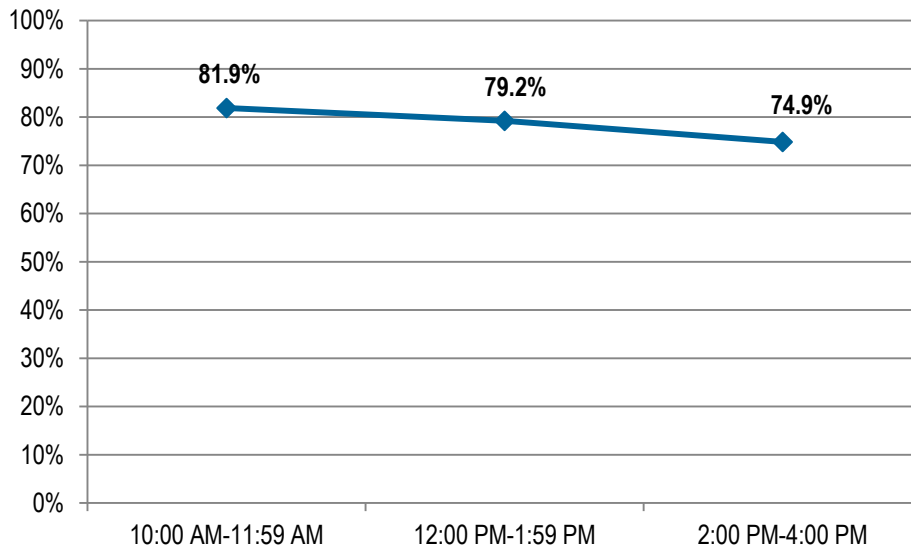
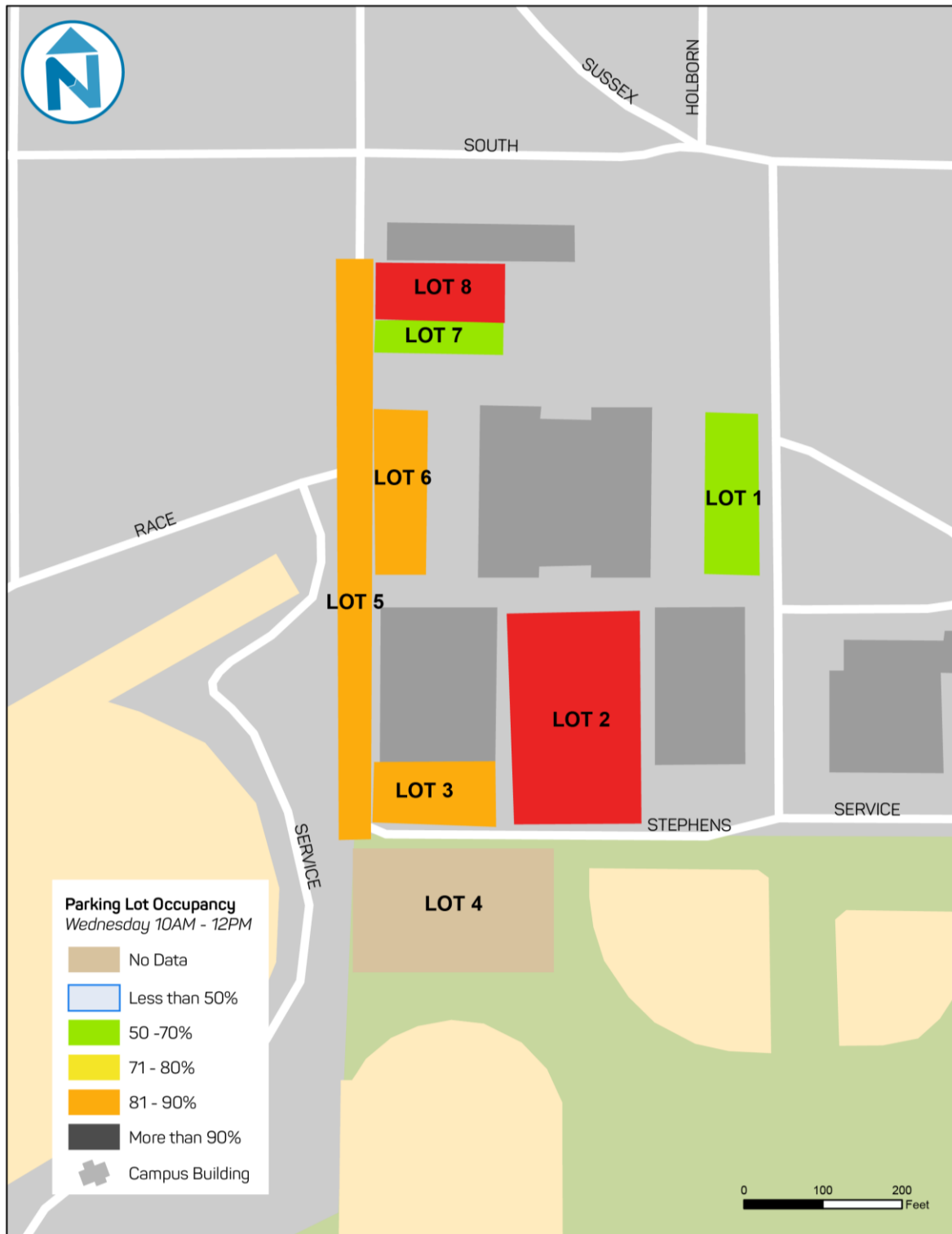


Figure 42 illustrates the occupancy rate for University of Montana parking facilities and segments of on-street parking within the main Mountain Campus during the period of peak demand (10:00 AM-12:00 PM, Wednesday, October 14th, 2015). The map confirms that many of the parking facilities located closest the University Center and generally to the east and north sides of campus were full or nearly full (90% or more occupied) during the peak period. At the same time, many of the lots and on-street parking segments on the west side of campus and other peripheral locations, were occupied at less than 80%. Several lots (M, M1, N, N1, D and S) and on-street segments (Eddy, and segments of Van Buren and Campus Drive North) were less than 70% occupied, with significant available parking capacity, even during the period of peak observed demand.

One common pattern is that metered lots and on-street areas had more availability at the peak period than multi-pay areas (lot U), or facilities open to A&C Decal and Day Pass holders. Reserved parking areas also had lower parking occupancy than general areas open to most decal, permit and pass-holders.

Figure 42 illustrates the occupancy of parking at selected parking facilities on the existing Missoula College campus near Sentinel High School. Lots 2 and 8 had the highest parking occupancy (90% or higher) during the peak period (10:00 AM-11:59 AM on Wednesday, October 15th). The supply of parking at Missoula College is largely unconstrained, as several lots close to the main College buildings (lots 1 and 7) were less than 70% occupied. At the same time, lots 3, 5, and 6 – all located on the west side of the Missoula College campus, had near target occupancy rates of 80-90% during the peak period.

Figure 43 Peak Period Parking Occupancy (10AM-12 PM, Weds, Oct. 14, 2015), Missoula College Campus



TDM PROGRAMS

Associated Students of the University of Montana (ASUM)

The ASUM Transportation (ASUMT) mission is to promote and provide transportation options for the University of Montana community. ASUMT outreach and transportation demand management (TDM) activities include special events and programs, such as the 30 Days of Biking social media contest, Winter Bike to Work & School Day, and an annual celebration of active and sustainable commuting entitled Walk & Roll Week (see Figure 44).

Figure 44 ASUM TDM Promotional Material



Source: Associated Students of the University of Montana

Missoula-in-Motion

Missoula in Motion (MIM) provides education and encouragement to empower Missoula residents to reduce single-occupancy vehicle travel. MIM's two primary programs are the Way to Go! Club, a reward program for using non-single occupant vehicle transportation that allows commuters to exchange earned points for active lifestyle items such as bicycle accessories, hiking gear, and gift cards. The second is the Momentum program, which helps employers and employees walk, bike, take transit, and rideshare to work. MIM also provides transit marketing and outreach to MUTD for transit-related marketing services. Over the years, MIM has built a recognizable brand in the community through its travel options billboards, marketing materials provided to employers, and

its sponsorship of Sunday Streets. The program is funded primarily through Federal Congestion Mitigation and Air Quality Improvement Program funds.

PLANS AND POLICIES

This section provides a summary of policies and relevant findings and recommendations from adopted and in-progress plans and programs affecting access to the University of Montana's Mountain Campus and Missoula College. These include plans and policies of ASUM, the Missoula Urban Transportation District (MUTD), the City of Missoula, Ravalli County, and the State of Montana.

5th and 6th Livable Streets Proposal (2010)

The City of Missoula has dedicated funding to develop and evaluate different treatments for the design and operation of 5th Street and 6th Street, which currently operate as a one-way couplet near the University of Montana's Mountain Campus. The goal of the study is to enhance safety and expand accessibility for users of all modes of travel.

Community Quality of Life Initiative (2012)

This memorandum of understanding was made between the City of Missoula and the ASUM to collaborate in four areas: increasing the inventory of quality, affordable housing for students; improving existing rental stock through basic regulation of residential retail property; improving neighborhoods across the city through a well-staffed quality-of-life program; and improving transportation and parking options for all citizens. Key goals established by the agreement include the development of 1,000 new affordable housing units appropriate for students proximate to the University and downtown Missoula and the creation of alternative parking options for students who use vehicles infrequently in order to free up valuable community real estate.

Missoula Active Transportation Plan (2011)

The Missoula Active Transportation Plan (MATP) provides guidance for the public and private development of active transportation facilities in the Missoula Metropolitan Planning Area within the context of the Missoula County Growth Policy. The MATP establishes a community vision for the bike and pedestrian components of the transportation system, recommends new policies and designs, and provides a list of proposed projects from which the MPO can use to prioritize federal aid transportation funding for bike and pedestrian infrastructure. The plan highlights the University as a key trip generator for active transportation and proposes improvements around the University District including bike boxes and bike signals.

Missoula Bridges Planning Study (2014)

This study was conducted by the Montana Department of Transportation (MDOT), in conjunction with the Federal Highway Administration and the City of Missoula, in order to identify potential bridge improvements for the Higgins Avenue and Madison Street Bridges. The bridges, which span the Clark Fork River to link southern Missoula and the University of Montana's main campus with downtown Missoula, have been deemed structurally deficient and in need of rehabilitation. The study examined existing and projected conditions within the study area, and identified needs and objectives based on comments from the public, stakeholder groups, and a

technical advisory committee. The study recommended two improvement options: a major rehabilitation that would take between one and five years or bridge replacements that could take more than 20 years to complete.

Missoula College East Broadway Site Final Environmental Assessment (2014)

This is the final environmental assessment document for the proposed relocation of Missoula College, as the current site provides limited and inadequate space for institutional functions. The project, which is under construction as of 2015, will include a new facility of approximately 155,500 gross square feet at a site already owned by the University of Montana. The new site provides proximity to the main Mountain Campus while providing adequate access to Interstate 90 and existing bus routes. In addition, parking needs are expected to be met on site and through agreements with neighboring landowners. The existing park-and-ride facility will move to the north side of East Broadway or to an alternate location. Pedestrian and cyclist connections between the two campuses will be provided by East Broadway sidewalks and bike lanes and the Van Buren pedestrian bridge. The University estimates that the new location will serve 2,500 students and employees by its tenth year. The following are key transportation related assumptions/findings of the Environmental Assessment for the new Missoula College location:

- **Traffic:** There would be a minor (~5%) to major (up to ~60%) increase in traffic volume on East Broadway during the peak hours as a result of the new development. Based on the Transportation Impact Study (TIS) the effect to traffic and LOS on studied intersections would be negligible to minor, with most intersections staying at the same LOS or decreasing by one level.
- **Parking:** Previous feasibility studies analyzed 730 parking spaces for the proposed project, however further analysis recommends that 600 parking spaces plus 200 park-and-ride spaces are provided for a total of 800 parking spaces. The Missoula Zoning Ordinance has identified that a maximum of 430 spaces be provided, while parking generation rates suggest that 500 total spaces should be provided.
- **Alternative Modes:** ASUM projects that service would be provided every 10 minutes between Missoula College and the Mountain Campus. An increase in cyclists is unknown due to the low mode share of bikes at the current campus.

Missoula County Growth Policy Update (2015)

Per state requirements, the Missoula County Growth Policy provides a guiding framework to the City Council and Board of County Commissioners for the adoption of zoning ordinances and authorization of public works projects related to regional growth. The overarching goals of the Growth Policy are to manage growth in a proactive manner, considering both immediate and cumulative impacts.

The Policy is currently undergoing a major update called the Our Missoula Growth Policy. The vision for Missoula in 2035, with supporting land use concepts, goals, objectives, and actions is one of managed growth that helps meet the needs of the community's residents. Conservation of the qualities and characteristics that Missoula value are fundamental to reaching a shared vision of a sustainable, livable community with a diversified economy, improved infrastructure and environmental quality, and affordable housing options for all.

Included in the update is information on existing conditions and trends, a summary of countywide goals and objectives, and implementation strategies for achieving goals and meeting objectives. The update notes that the University of Montana is not expected to have a significant influence on population growth over a 20-year horizon due to minimal projected growth in student population.

Missoula Greater Downtown Master Plan (2009)

The Missoula Downtown Master Plan provides a comprehensive strategy for expanding downtown Missoula's economic and cultural role through land use and circulation objectives. Elements of the plan relevant to the University include the following:

- Allocate a significant number of affordable, multi-family housing units targeting university students, faculty, and staff in a redevelopment of a former mill site (Sawmill District)
- Include a mix of market-rate and affordable, multi-family housing units targeting downtown and University of Montana employees as part of the high density Hip Strip infill project
- A downtown streetcar could operate as a local circulator linking major downtown destinations with potential future connections to the University.

Missoula Long Range Transportation Plan Update (2012)

The Missoula Long Range Transportation Plan (LRTP) Update is a revision by the Missoula Metropolitan Planning Organization of the 2008 LRTP. The LRTP works to provide an implementable vision for Missoula's transportation future in the context of the Missoula Growth Policy. The LRTP provides a framework for traffic, transit, and community planning in the region, in addition to serving as a guide for local capital improvement programs. The ASUM served as part of the technical advisory committee for the plan. Key findings from the plan related to the University include:

- High crash rates are concentrated in downtown and west of the University of Montana
- The intersection of Central Avenue and Ronald Avenue in the University District has the highest injury rate of any intersection within the Missoula Metropolitan Planning Organization (MPO) (7.75 injuries per million vehicles)
- The University will continue to be a major trip attractor

Missoula TDM Program Review & Organizational Plan (2012)

This plan provides a review of existing TDM programs and processes in Missoula and provides recommendations to improve TDM programming in the region. As explained in the plan, TDM programs in Missoula are, in large part, funded by Congestion Mitigation and Air Quality (CMAQ) funds. Established as part of the Clean Air Act of 1990, CMAQ funds are provided to each state to help achieve the National Ambient Air Quality Standards (NAAQS). The MPO prioritizes its CMAQ dollars to fund several agencies and programs that provide transportation demand management services to the region. CMAQ dollars are prioritized every four years as part of the Long Range Transportation Plan Update process. CMAQ funding requires a local match, ranging from 13.42% to 20% depending on the type of project. A variety of partners provide matching funds for CMAQ funding, including the City of Missoula and the Missoula Parking Commission,

Missoula and Ravalli Counties, ASUM, and corporate sponsorships. Key issues, opportunities, and recommendations highlighted in the plan related to the University are as follows:

- **Accessibility of Information:** Travel options information is not centralized in one location. There is an opportunity to establish a one-stop-shop (physical and via the Internet) for travel options and develop a unified brand that is led by one organization.
- **Centralized Leadership:** TDM programs are currently managed by multiple organizations; in some cases multiple organizations are responsible for the same programs. There is an opportunity to establish a more centralized TDM program to provide a unified message, define the roles and responsibilities of each organization, and focus marketing and outreach efforts to target populations.
- **ASUM:** ASUM operates under its own budget and governance so is removed from the regional funding structure; ASUM could expand coordination with MUTD to jointly seek funding for transit projects. ASUM has the opportunity to better coordinate with Mountain Line to help implement high-frequency bus service in corridors that serve campus. ASUM could also play a more active role in the funding and coordination of student and faculty vanpools by partnering with MR TMA to expand vanpool service.

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