

CHAPTER 1

INTRODUCTION AND BACKGROUND



1.1 INTRODUCTION

The city of Bozeman and the surrounding area is experiencing tremendous growth that includes a mixture of commercial, residential, industrial, retail and office. This growth, coupled with the existing transportation system constraints, has necessitated the update of the community's current Transportation Plan. The existing Plan was completed in 2001, is commonly referred to as the "2001 Update" and provides a blueprint for guiding transportation infrastructure and associated decision making principles. Because of steadily increasing growth, and the community's increasing interest in transportation related matters, the governmental entities have decided to update their regional Transportation Plan. To that end, the consulting firm of Robert Peccia & Associates was retained to assist in developing the *Greater Bozeman Area Transportation Plan (2007 Update)* project.

This update is intended to offer guidance for the decision-makers in the greater Bozeman community. It contains a multi-modal analysis of the transportation system in the Bozeman area. This Plan includes an examination of the traffic operations, road network, transit services, non-motorized transportation system, trip reduction strategies, and growth management techniques. This document also identifies the problems with the various transportation systems and offers recommendations in the form of improvement projects and progressive programs that will help relieve existing problems and/or meet future needs.

A word of caution is appropriate. The previous focus of much of the transportation across the United States has been to move cars. This has necessitated more and larger roadways at extensive costs. The time is right in the Bozeman community, and the rest of western Montana, to begin to focus on moving people. Although the roadway needs will be well defined and will be the standard by which community transportation infrastructure is measured, the decision makers and community at large must recognize the need for alternatives. These alternatives include more and better bicycle and pedestrian facilities, a focus on transit service, a desire to explore alternative transportation, and the willingness to forge partnerships with adjacent jurisdictions. Growth in the Bozeman Area is well documented and explained later in **Chapter 3** of this document. Impacts to the transportation system resulting from this growth are a measurable and identifiable quantity, and the community must be prepared to deal with it accordingly.

1.2 STUDY AREA

All transportation plans begin by defining the study area. Sometimes this study area follows governmental boundaries such as city limits, but most often they include land outside city limits in which future growth is seen as likely to occur. As part of the 2007 update to the *Greater Bozeman Area Transportation Plan*, an evaluation of the past Transportation Plan's Study Area Boundary was undertaken in consultation with the City of Bozeman and Gallatin County, the Montana Department of Transportation, and the Bozeman Area Transportation Coordinating Committee (TCC). Subsequently, adjustments were deemed necessary and made to the Study Area Boundary in an effort to capture those areas likely to see future growth that may impact the community's transportation system.

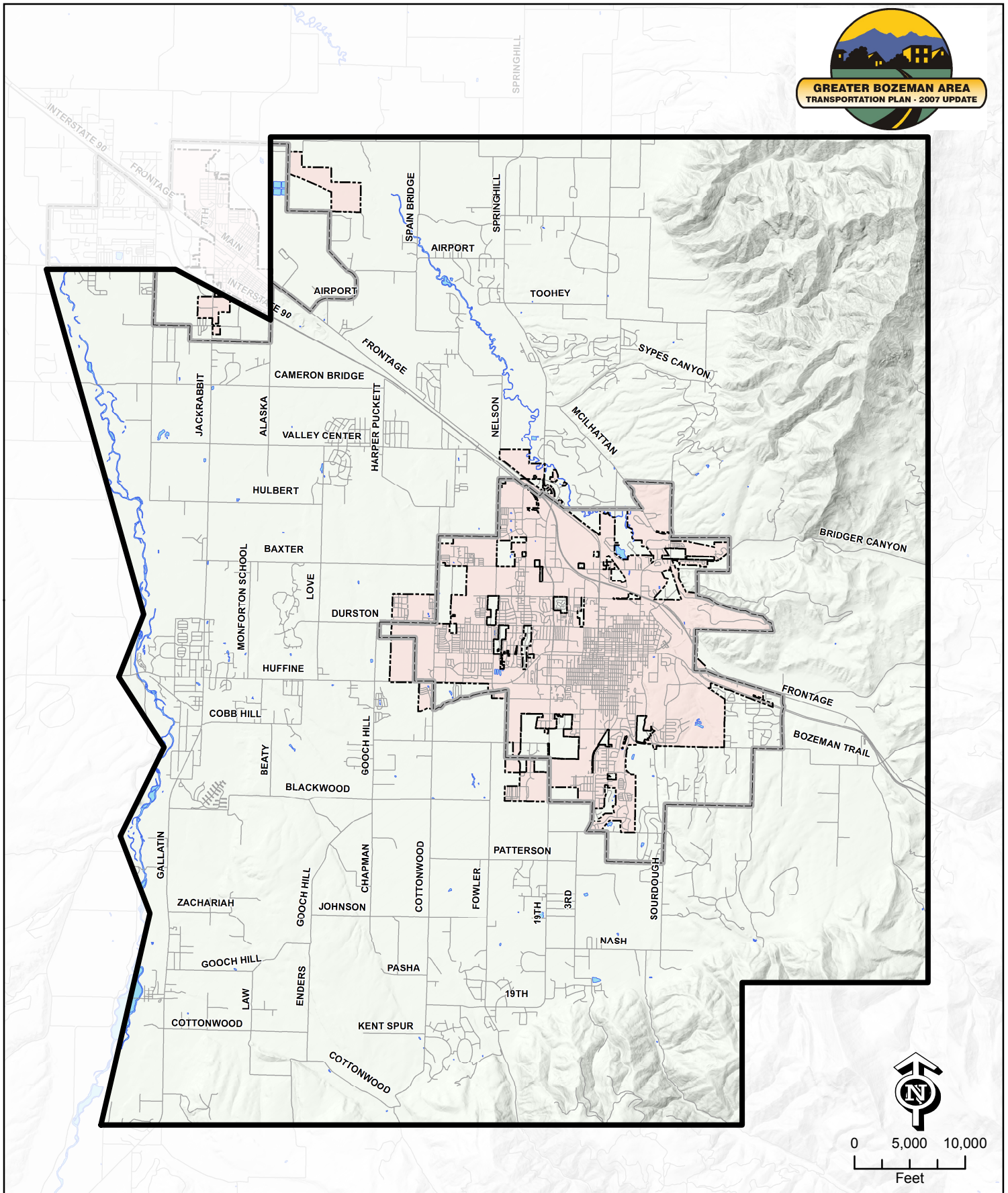
For the purposes of this Plan, the study area boundary includes the entire city limits of Bozeman, as well as a substantial portion of unincorporated lands surrounding the City. These lands are generally located to the north and south of the City proper, and extend from an eastern limit of the Bridger Mountains to a western limit of the Gallatin River.

The study area boundary was developed for two primary reasons. First, to include land where recent growth has occurred or is anticipated to occur in the foreseeable future and second, to include the 2001 *Transportation Plan's* study area.

It should be recognized that there are many other areas that are not formally included in the study area boundary that will exhibit development patterns affecting the area transportation system. These areas include, but are not limited to, the City of Belgrade, the Gallatin Gateway area and east along Interstate 90. These are not included in the study area due to both funding and jurisdictional constraints, however, cursory attempts and land use forecasting will be made to evaluate overall transportation impacts through the travel demand modeling process. The new study boundary includes everything in the previous study area, along with additional areas that are developing and/or forecast to develop over the planning horizon of the study (i.e. the year 2030). Therefore, no land was removed from the study area.




The study boundary is shown on **Figure 1-1** and was used for all aspects of the *Greater Bozeman Area Transportation Plan (2007 Update)*. This study boundary includes all of the major employers in the area, and includes all of the land that may be used for employment centers in the next twenty years. It also includes developing residential land uses in the area, and those areas likely to increase the housing supply in the future and subsequently add traffic onto the transportation network.

It is important to recognize that areas outside of the formal study area boundary will still have an effect on the transportation system within the study area boundary. To that end, land use changes outside of the "formal" boundary are still accounted for and incorporated into the travel demand model; however, precise transportation system impacts are not identified for facilities outside of the "formal" study area boundary.



0 5,000 10,000
Feet

Legend

-  Study Area Boundary
-  City Boundary
-  Urban Boundary

← **TCC #6**

*Greater Bozeman Area Transportation Plan
(2007 Update)*

**Study Area Boundary
Figure 1-1**



1.3 TRANSPORTATION PLANNING GOALS AND OBJECTIVES

The overall goal of this project is to update the existing 2001 community Transportation Plan. This existing plan was originally developed by Robert Peccia and Associates. The intent of this project is to take an entirely fresh look at the condition of transportation issues in the Greater Bozeman area.

This Transportation Plan Update is intended to facilitate community goals and improve the transportation infrastructure and services within the Greater Bozeman area to meet the needs of existing and future land use. The Plan will address regional transportation issues, overall travel convenience, traffic **safety, property access, and** potential special issues such as traffic calming and multi-modal connections. The Plan will include recommendations for short-term Transportation System Management (TSM) improvements as well as recommended modifications and capital improvements to the “Major Street Network (MSN)”. The Plan will address all modes of transportation in a balanced attempt to meet the current and future transportation needs of the Greater Bozeman area while **keeping** in compliance with state and federal requirements.

With this background in mind, it is important to recognize that “Goals and Objectives” have been developed to guide this Transportation Plan Update. These are presented later in this section. It is also appropriate, however, to present the existing goals that are found in the various planning level documents found within the community.

Greater Bozeman Area Transportation Plan (2001) and the Bozeman 2020 Community Plan Goals

1. Maintain and enhance the functionality of the transportation system.
2. Ensure that a variety of travel options exist which allow safe, logical, and balanced transportation choices.
3. Encourage transportation options that reduce resource consumption, increase social interaction, support safe neighborhoods, and increase the ability of the existing transportation facilities to accommodate a growing city.
4. Establish and maintain an integrated system of transportation and recreational pathways, including bicycle and pedestrian trails, neighborhood parks, green belts, and open space.

In response to issues and concerns raised during the development of this transportation planning process, it is suggested that transportation related goals and objectives be refined to reflect the diversity of competing transportation interests and the inherent limitations of just focusing on automobile traffic. To that end, the “Goals and Objectives” **found on the following page** are presented for consideration by the community as transportation system development is considered over the planning horizon of this document.



“Goals and Objectives” for the Greater Bozeman Area Transportation Plan (2007 Update)

Goal #1: Provide a safe, efficient, accessible, and cost-effective transportation system that offers viable choices for moving people and goods throughout the community.

Objectives:

- ♦ Plan and implement a logical, efficient, long-range arterial and collector transportation system to ensure that public and private investments in transportation infrastructure support other land use decisions of the community.
- ♦ Plan a logical, efficient long-range arterial system that can be systematically implemented by right-of-way reservations and advance acquisition procedures.
- ♦ Meet the current and future needs of the greater Bozeman area that can be maintained with available resources.
- ♦ Provide adequate emergency service access to all residents inside and outside of the Study Area Boundary.
- ♦ Develop a “Major Street Network” classifying existing roadways by functional usage (as well as future corridors) within the Study Area Boundary.
- ♦ Address the needs of business and commerce both locally and regionally.
- ♦ Plan for adequate access to high volume traffic generation points.
- ♦ Conduct a comprehensive data collection effort that will include vehicular counts, truck counts, bicycle movements and pedestrian usage at the intersections identified for the study.
- ♦ Review the most recent three-year accident history and crash statistics to evaluate potential safety problems and possible mitigation efforts that can improve and/or resolve identified concerns on the existing transportation system.
- ♦ Examine population and employment growth trends to assess demographic changes and how those changes may affect transportation system users over the twenty year planning horizon.
- ♦ Develop a 20-year traffic model that can be used to predict future transportation system needs as growth occurs within the Study Area Boundary limits.
- ♦ Identify current and foreseeable traffic problems.

Goal #2: Make transit and non-motorized modes of transportation viable alternatives to the private automobile for travel in and around the community.

Objectives:

- ♦ Support alternatives to single occupancy vehicles.
- ♦ Establish safe pedestrian and bicycle access in designated areas by:
 - Considering pedestrian/bicycle needs when planning and designing new roads.
 - Considering improvement and dedication of bikeways and pedestrian paths through developing area.
 - Providing widened shoulders where possible to accommodate pedestrians/bicycles on existing roadways, with a preference for physical separation between motorized and non-motorized traffic.
- ♦ Encourage mixed-use development that integrates compatible residential, office, and commercial uses to reduce the need for automobile trips.

- ◆ Encourage walkable neighborhoods, both within existing developed areas and new residential and commercial subdivisions.
- ◆ Recommend policies and decisions to ensure bicyclists and pedestrians can access and conveniently cross all major roadways and highways.
- ◆ Identify and incorporate, as applicable, Transportation Demand Management (TDM) strategies to provide alternatives to private vehicle travel.
- ◆ Consider equestrian needs, where appropriate, when planning and designing new roads.

City #5

Goal #3: Provide an open public involvement process in the development of the transportation system and in the implementation of transportation improvements, and assure that community standards and values, such as aesthetics and neighborhood protection, are incorporated.

Objectives:

- ◆ Provide for citizen involvement in the planning and implementation of transportation plans and projects.
- ◆ Respect and ensure the areas natural and historic context and minimize adverse impacts to the environment and existing neighborhoods.
- ◆ Minimize negative transportation effects upon residential neighborhoods.
- ◆ Encourage transportation improvements that preserve the natural panorama of skylines and sightlines, and are compatible with historic resources.
- ◆ Evaluate and identify transportation system needs of area schools, and address existing and future transportation issues as appropriate.
- ◆ Provide for connecting streets among neighborhoods.
- ◆ Meet the unique transportation needs of the areas elderly, disabled and disadvantaged populations

Goal #4: Provide a financially sustainable Transportation Plan that is actively used to guide the transportation decision-making process throughout the course of the next 20 years.

Objectives:

- ◆ Review all existing and on-going planning reports and studies for compatibility.
- ◆ Conduct a financial analysis to ensure the Plan is financially feasible and sustainable.
- ◆ Identify funding mechanisms that may be viable alternatives to the traditional funding programs currently used to fund transportation system improvements.

Goal #5: Identify and protect future road corridors to serve future developments and public lands.

Objectives:

- ◆ Develop a Plan to address forecasted transportation growth needs.
- ◆ Identify future corridors and future connections to existing roadways in order to secure appropriate right of way and improvements.
- ◆ Identify road construction needs to serve developing areas, and encourage development in identified urban areas.

1.4 PREVIOUS TRANSPORTATION PLANNING EFFORTS

In the course of data collection, past plans and studies were obtained. From the review of these documents, applicable issues were incorporated into this Greater Bozeman Area Transportation Plan (2007 Update). The contributing documents are as follows:

- ♦ Gallatin County Growth Policy;
- ♦ Gallatin County Neighborhood Plans;
- ♦ Gallatin County Subdivision Regulations;
- ♦ Gallatin County Trails Plan;
- ♦ Gallatin County Transportation Infrastructure and Recommendations;
- ♦ Streamline Bus Routes;
- ♦ Gallatin County Transportation Needs (Phase I and Phase II);
- ♦ Gallatin County Road Impact Fee Study (currently underway);
- ♦ Bozeman 2020 Community Plan;
- ♦ Design and Connectivity Plan for North 7th Avenue Corridor;
- ♦ North 19th Avenue / Oak Street Corridor Master Plan;
- ♦ Gallatin County Regional Sewer Feasibility Study;
- ♦ Montana Department of Transportation Access Management Plans;
- ♦ City of Bozeman National Citizen Survey;
- ♦ Bozeman Creek Neighborhood Plan;
- ♦ Bozeman Parks, Recreation, Open Space and Trails Master Plan;
- ♦ Bozeman Unified Development Ordinance;
- ♦ Bozeman Impact Fee Update;
- ♦ Montana State University Long Range Plan (i.e. Campus Plan);
- ♦ Bicycle Facility Planning Map (developed by the Bike Board);
- ♦ Western Transportation Institute (WTI) Bozeman Bicycle Network Plan;
- ♦ Greater Bozeman Area Transportation Plan (2001 Update);
- ♦ Greater Bozeman Area 2001 Transportation (Transit) Development Plan Update;
- ♦ Downtown Bozeman Traffic Studies;
- ♦ Miscellaneous Traffic Impact Studies (Gallatin County & City of Bozeman);
- ♦ City of Bozeman Engineering Standards;
- ♦ Gallatin County Road Standards;
- ♦ Greater Bozeman Area Transportation Plan (1993 Update);
- ♦ School Bus Routes;
- ♦ Postal Routes;
- ♦ Fire District Maps;
- ♦ Bozeman Deaconess Hospital "Sub-area" Plan;
- ♦ Locally adopted master plans, public facility plans, and related development regulations;
- ♦ Official Code of the City of Bozeman;
- ♦ Montana Department of Transportation STIP and other Local Planning Documents;
- ♦ U.S. Bureau of Census data;
- ♦ City building permits, County location and conformance permits, and utility records; and
- ♦ Socioeconomic data and projections compiled by the Planning Board, Montana Department of Commerce and/or University of Montana.

1.5 PUBLIC INVOLVEMENT

The primary goal of the communications program for the Greater Bozeman Area Transportation Plan (2007 Update) was to keep the public informed and involved in the project. A second goal of the process was to integrate the opinions and issues identified by the public, as a result of the program, into the project approach and methodology, wherever feasible. The methods that were used to achieve these goals included: guidance from the TCC; outreach to key constituencies (i.e. special interest groups and the general public); education of decision-makers (i.e. Gallatin County Commission and Bozeman City Commission); project newsletters; news releases; and public events.

An initial step in developing the project public outreach campaign was the development of a detailed *Public Participation Plan* to guide public opportunities and input as the project developed. The *Public Participation Plan* was structured around the developed scope of work for this Transportation Plan Update, and utilized several traditional and non-traditional public participation strategies. Furthermore, the *Public Participation Plan* defined the appropriate strategies to be used, defined the sequencing within which the various strategies to be implemented, and charted out a course of action to be followed as the project commenced.

The purpose of the *Public Participation Plan* was to insure a proactive public involvement process that assured the opportunity for the public to be involved in all phases of the planning process. This was accomplished by providing complete information, timely public notice, and opportunities for making comments and full access to key decisions.

The goal of the TCC and the Consultant team was to have significant and ongoing public involvement for this transportation planning process. Education and public outreach were an essential part of fulfilling the local entities responsibility to successfully inform the public about the transportation planning process. All three contracting entities (i.e. Gallatin County, the city of Bozeman and MDT) strove to empower the public to voice their ideas and values regarding transportation issues. The entities also strove to ensure early and continuous public involvement in all major actions and decisions.

TCC #25

The Consultant team understood that the interest of the public in transportation issues has increased with the community's rate of growth, and that updating the Plan provided public outreach opportunities that served to:

- ♦ Educate the public on the critical elements of planning and engineering the community's transportation system;
- ♦ Respond to the increasing interest of the general public to participate in planning of the community; and
- ♦ Increase the public's investment in our Transportation Plan.

A brief summary of some of the project outreach activities utilized during the projects development is contained in the following pages.

Transportation Coordinating Committee (TCC)

The Bozeman Transportation Coordinating Committee (TCC) provided project oversight for this project to serve in an advisory capacity and to review and comment on materials over the project's duration. Meetings were generally held every month (on the fourth Wednesday of the month). Membership was composed of individuals as noted on the acknowledgements page of this document, and generally included representatives from the Montana Department of Transportation, Gallatin County, the City of Bozeman, and local business and citizen interests. The TCC was the principal guiding force behind this Transportation Plan. In addition, a full-day workshop was held on October 1st, 2008 to discuss the information contained in the "Administrative Draft" of the Transportation Plan Update. From that exercise, several projects were modified and/or removed from consideration.

TCC #26

Public Meetings

Three formal public meetings were held during the study process. The first meeting was held at a time when the data collection process was nearing completion. This meeting focused on informing the public about the current transportation problems that had been identified to date, and receiving public comment on which issues should be addressed in the Plan. A variety of key issues were identified. The issues generally fell within four categories: 1) the need to plan for future growth; 2) to relieve traffic congestion; 3) to improve traffic safety; and 4) to provide alternatives to the automobile. Specific problem intersections and roadway corridors were identified and presented at this first meeting.

The second public meeting was held after the analysis of the existing transportation system was completed. Additionally, the effects of population growth on traffic volumes and transportation infrastructure were discussed. Where and potentially when future land use changes (i.e. growth) were also defined and discussed. Again, the public had the opportunity to give their opinions on transportation system issues in the study area, as well as any other concerns they might have.

The third public meeting was held after the preliminary project recommendations were completed and prior to release of an "official" Public draft document. This meeting gave the public the opportunity to review the preliminary project recommendations in their entirety, including a thorough review of recommended projects that not only offered mitigation measures to solve existing transportation issues, but also measures to accommodate future growth issues.

All three public opportunities described above were held at the Bozeman High School cafeteria.

Other Public Outreach Activities

Formal and informal meeting and presentations occurred many times over the course of the project. These are specifically listed in **Table 1-3** later in this chapter.

Public Hearing

One public hearing was conducted near the completion of this planning process to obtain formal public comment on the public draft document before the Gallatin County Commission and separately before the Bozeman City Commission. The public hearing covered all elements of the draft and significant additional time for public comment was provided after the public hearing closed. After reviewing the comments received at the public hearing, the TCC met with the consultant to provide comments and direction in revising the draft document, and developing the final version of the Plan.

News Releases

Television and newspaper articles were used several times during the planning process to help keep the public informed. These news releases generally were issued prior to public meetings (and the public hearing), to generate interest in the process, and to encourage participation by the public.

Internet Access

The results of the traffic studies and analyses conducted during the study process were made available to the public on the Internet website. As sections of the report and graphic displays became available, they were posted on the web site for public review and comment. This enabled the public to stay abreast of the developments occurring during the planning process. It also provided an opportunity for the public to submit comments.

Project Newsletters

Several project newsletters were created and distributed via email to a project email list. Towards the end of the project, there were approximately 915 people on the project e-mailing list.

1.6 COORDINATION SUMMARY

The following tables (**Table 1-1** thru **Table 1-3**) summarize all of the coordination that occurred over the course of this planning project. They encompass all formal and informal meetings, including but not limited to Transportation Coordinating Committee (TCC) meetings and workshops, formal public meetings, and others.

Table 1-1
Summary of Transportation Coordinating (TCC) Activities

Date	Agency or Individual
03/28/2007	Transportation Coordinating Committee (TCC) Meeting No. 1
04/25/2007	Transportation Coordinating Committee (TCC) Meeting No. 2
05/23/2007	Transportation Coordinating Committee (TCC) Meeting No. 3
06/27/2007	Transportation Coordinating Committee (TCC) Meeting No. 4
07/25/2007	Transportation Coordinating Committee (TCC) Meeting No. 5
08/22/2007	Transportation Coordinating Committee (TCC) Meeting No. 6
09/26/2007	Transportation Coordinating Committee (TCC) Meeting No. 7
10/24/2007	Transportation Coordinating Committee (TCC) Meeting No. 8
11/28/2007	Transportation Coordinating Committee (TCC) Meeting No. 9
12/19/2007	Transportation Coordinating Committee (TCC) Meeting No. 10
02/27/2008	Transportation Coordinating Committee (TCC) Meeting No. 11
03/26/2008	Transportation Coordinating Committee (TCC) Meeting No. 12
04/23/2008	Transportation Coordinating Committee (TCC) Meeting No. 13
05/21/2008	Transportation Coordinating Committee (TCC) Meeting No. 14
07/23/2008	Transportation Coordinating Committee (TCC) Meeting No. 15
08/27/2008	Transportation Coordinating Committee (TCC) Meeting No. 16
10/01/2008	Transportation Coordinating Committee (TCC) Meeting Workshop
10/29/2008	Transportation Coordinating Committee (TCC) Meeting No. 17
12/17/2008	Transportation Coordinating Committee (TCC) Meeting No. 18

Table 1-2
Summary of "Formal" Local Government Outreach Activities

Date	Agency or Individual
08/20/2007	Bozeman City Commission Meeting No. 1
08/21/2007	Gallatin County Commission Meeting No. 1
02/06/2008	Gallatin County Commission Meeting No. 2
02/11/2008	Bozeman City Commission Meeting No. 2
12/17/2008	Gallatin County Commission Meeting No. 3
01/20/2009	Bozeman City Commission - Public Hearing
02/10/2009	Gallatin County Commission - Public Hearing

Table 1-3
Summary of "Other" Outreach Activities

Date	Agency or Individual
04/12/2007	Gallatin County Staff Meeting - Planning & Public Works
04/12/2007	Bozeman City Commission - Roadway Design Best Practices Meeting
04/27/2007	City of Bozeman Staff Meeting - Planning & Public Works
05/08/2007	Inter-Neighborhood Council (INC) Project Outreach
06/14/2007	Gallatin County Staff Meeting - Planning & Public Works
06/14/2007	City of Bozeman Staff Meeting - Planning & Public Works
06/15/2007	Bozeman Chamber of Commerce - Eggs & Issues Meeting
06/26/2007	Streamline Transportation Advisory Committee (TAC) Presentation
06/27/2007	Transit Outreach Meeting - Lisa Ballard (Current Transportation Solutions)
06/27/2007	Public Information Meeting #1 (held at Bozeman High School)
07/25/2007	Four Corners Neighborhood Group Meeting
07/25/2007	MDT Director Jim Lynch & Gallatin Gateway Neighborhood Group Meeting
08/09/2007	City of Bozeman/Engineering Inc./PC Development Meeting - Highland
08/21/2007	City of Bozeman Planning Board Presentation
10/17/2007	South Central Association of Neighbors (SCAN) Project Outreach
11/28/2007	Public Information Meeting #2 (held at Bozeman High School)
04/07/2008	Montana State University - Engineering Students/Faculty Presentation
08/12/2008	Gallatin County Planning Board
08/20/2008	Public Information Meeting #3 (held at Bozeman High School)
08/26/2008	Streamline Transportation Advisory Committee (TAC) Presentation
10/07/2008	Northeast Neighborhood (NENA) - Neighborhood Fall Meeting
11/12/2008	Inter-Neighborhood Council (INC) Project Outreach