CHAPTER II EXISTING LAND USE

Introduction

The term "land use" describes the way in which we, as a society and individuals, decide how to use our land. In early history people primarily used the land for farming and they built shelter for themselves on the land. Today, we use our land in many more ways. We have natural lands and developed land. Developed land uses can take many forms: residential land, commercial, industrial, and institutional, to name a just a few. Unfortunately, conflicts can arise between different land uses. For example, people generally don't want to live next to industrial areas, and often precious natural resources are lost to development. To resolve such conflicts and protect our environment, we have established various ways to regulate land use. Most towns use zoning, subdivision, and site plan regulations to assure that land is used wisely. Proper land use should also be analyzed through long range planning.

The purpose of this chapter is to examine Bradford's existing land uses and regulations. This chapter lays the groundwork for the future land use chapter, in which goals for future land use and management will be discussed. Before a town can determine how and where its land uses should change, there must be a solid understanding of what factors influenced land use in the past, what exists today, and how land use regulations have shaped the way land is being used. This chapter will summarize Bradford's existing zoning, subdivision, and site plan review regulations; examine how land is currently used; review recent growth trends; and discuss basic land use constraints.

To understand why Bradford looks the way it does today, it is helpful to review how the town has grown and evolved over time. First settled in 1771 and incorporated in 1787, Bradford was originally settled by people exploring the new frontier. The first settlers found a land of rivers, lakes, and forested hillsides, but they quickly set about taming the land and building small farms.

In 1794 the Town voted to make Bradford Center the civic and business center of the town, but development was also taking place in the Corners (now Main Street and Route 114) where roads from Henniker, Warner, and Sutton converged. Less than a mile west of the Corners, the Mills developed, there Todd Pond provided water power, so mills, a hotel, and homes were built.

The railroad came to Bradford in the mid 1800's and drastically changed the town. In 1800, 740 people lived in Bradford, but the population boomed to 1,341 by 1850. The railroads connected Bradford to Claremont and Concord, which in turn connected New Hampshire to Boston and Canada. Bradford became a summer retreat and several large hotels were built to accommodate visitors who came to Bradford for a summer of recreation.

In 1896, the first cottage settlement was built on Lake Massasecum. This is important because as railroad use declined and automobile ownership increased, the nature of summer visits to Bradford changed. When the railroads brought people to town, visitors would build a community based on the hotels in the center of town. In contrast, when people bought summer cottages and camps in Bradford, they traveled independently and spread out from the town center.

Another great change for Bradford, and other small New Hampshire towns, was the disappearance of small east coast family farms. The Industrial Revolution brought many jobs to cities like Concord and Manchester, and people found they could make a better living in urban areas. In addition, as the west opened up, many farmers left New Hampshire in search of more fertile soil. A nation wide farm depression in the 1920's and the Great Depression in the 1930s also hurt New Hampshire farmers. Bradford's population plummeted from 1,341 people in 1850 to 805 people in 1900, and then only 606 people in 1950.

In the last 50 years Bradford has seen a great recovery, but it is not the self sustaining community it once was. In 2000, the population of Bradford was 1,454, slightly higher than in 1850. However, many people work in other towns and cities, making Bradford somewhat a bedroom community. Bradford also has many seasonal residents who only spend the summers in Bradford. Subsequently, residential land use in Bradford has increased sharply in the last 30 years, while the level of commercial and industrial development has increased only marginally. The two main industries that have been in Bradford for some time, mining and timber harvesting, remain viable today. However, farming is no longer a common land use in Bradford, and the town center does not provide all of the services that residents need. Today, Bradford is a small, quiet, primarily residential community, but it will face many growth pressures in the coming years.

ORDINANCES AND REGULATIONS

The Planning Board and Zoning Board of Adjustment manage land use in Bradford. The Planning Board manages the subdivision and development of land through its zoning ordinance, subdivision regulations, and site plan review regulations. Some of these regulations are relatively new tools for Bradford. While the subdivision regulations were adopted in 1971, the zoning ordinance and site plan regulations were not adopted until 1989. As towns evolve and grow, it is common for regulations to be updated and altered to address new issues. In this section the existing regulations are reviewed, and in the future land use chapter, suggestions for possible updates will be made.

Zoning Ordinance

The Town of Bradford's zoning ordinance was enacted in 1989, and most recently amended in 2004. Zoning ordinances control the way land can be used so that the health, safety and general welfare of the community are protected. Zoning spells out what and where particular uses are allowed within the town. The ordinance sets lot size, frontage and setback requirements, and contains standards for parking, signs, junk yards, and gravel pits. Bradford has three zoning districts. These districts area described below, and can be seen on **Map 1**, **Existing Zoning**.

> The Residential Business District

This zoning district applies to most of the town center. Permitted uses in this district are mining and excavation; single-family and multi-family dwellings; bed and breakfast establishments; home businesses; and commercial and industrial developments.

Dimensional requirements for lots in this district are one dwelling or business per two buildable acres; 250' of road frontage; 30' side and rear setbacks from adjacent

properties; a front setback of 50' from the edge of the right of way or 75' from the center of an accepted public road, whichever is greater; and a maximum structure height of 35'.

Conservation District

This zoning district applies to areas which are above 1200 feet in elevation. The intent of this zone is to minimize development density so open spaces, forest resources, recreational opportunities, and scenery can be preserved. Permitted uses in this district are (residential) cluster development; single-family housing; forestry; and agriculture.

Dimensional requirements for lots in this district are a minimum of 5 acres (10 acres for cluster development); 400' of road frontage; 30' side and rear setbacks from adjacent properties; a front setback of 50' from the edge of the right of way or 75' from the center of an accepted public road, whichever is greater; and a maximum structure height of 35'.

> Residential Rural District

This zoning district applies to all areas outside of the town center and at elevations lower than 1200 feet. Permitted uses in this district are (residential) cluster development; single-family housing; home businesses; bed and breakfast establishments. Uses permitted by Special Exception include accessory dwelling units and commercial and industrial development.

Dimensional Requirements for lots in this district are one dwelling per two buildable acres (10 acres for cluster development); 250' of road frontage; 30' side and rear setbacks from adjacent properties; a front setback of 50' from the edge of the right of way or 75' from the center of an accepted public road, whichever is greater; and a maximum structure height of 35'.

The Residential Rural District is the largest district in Bradford as show in Chart II-1 below and Map 1.

3%

Residential Business District (740 acres)

Conservation District (5,950 acres)

Residential Rural District (16,775 acres)

Chart II-1
Percentage of Total Land Area in Each Zoning District

Source: Bradford Zoning Ordinance

In addition to the three zones described above, Bradford's zoning ordinance also contains essentially three overlay zones: the floodplain development, wetlands, and shoreland protection ordinances. The floodplain development ordinance, which was adopted in 1988, is an "overlay" zone which applies to any development proposed within flood hazard areas. "Overlay" zones add additional regulations to those that exist in the underlying zone for the purpose of preserving natural features or achieving unique goals. The wetlands ordinance was adopted in 1989 to protect wetland areas. The Shoreland Protection Act is a state law that has been incorporated in the Bradford zoning ordinance. The Shoreland Protection Act governs development in certain shoreland areas. In all cases, the more restrictive regulation prevails. The zoning ordinance also addresses rules for the development of telecommunication facilities.

Subdivision Regulations

Bradford's subdivision regulations were authorized by Town Meeting in 1971. When a property owner subdivides one parcel of land to create two or more new parcels, approval must be sought from the Bradford Planning Board. When reviewing proposed subdivisions, the Planning Board follows the procedures outlined in the subdivision regulations. The purpose of these regulations is to ensure the orderly and harmonious development of the town and to prevent scattered or premature development that could impact the health, safety, and general welfare of the community. The subdivision regulations outline survey requirements for subdivisions and other lot adjustments, legal processes, and requirements for road construction.

Site Plan Review Regulations

The Town of Bradford's site plan review regulations, which were authorized by Town Meeting in 1989, apply to the development or expansion of non-residential uses and multi-unit dwellings (defined as any structure containing more than two dwelling units). The site plan regulations also apply to the application of sewage sludge. The purpose of the regulations, as they relate to new

developments and expansions, is to ensure that sites are developed in a manner that protects the environment, does not negatively affect other property owners, and is safe and attractive.

Bradford's site plan review involves examination of issues such as building layout and appearance, natural and man-made features, screening, safety, environmental impacts and effects on community character. The regulations outline standards for buffers, screening, parking, pedestrian access, erosion and sediment control, lighting, street access, water supply, sewage disposal, and flood hazard areas. They also explain the procedures for plan submission and review.

2004 EXISTING LAND USE

The total land area of Bradford is approximately 22,000 acres with another 445 acres in water area. The best way to examine the use of this land is to examine the tax records of the town, which classify land by use. Using the tax record information as a guide, the subcommittee working on this chapter established ten land use categories for Bradford. These are detailed below and shown on the accompanying map titled Existing Land Use.

A differentiation was made between two types of conservation land: "land held in conservation" and "permanently protected land". This was done because some mechanisms for conserving land are not permanent. For example, a conservation easement may have a time limit, or a parcel that was originally held for conservation could be sold for development in some cases.

A differentiation was also made between "single family residential" and "single family residential and current use". This was done because some parcels are strictly residential parcels, meaning that they are made up of a house and a yard. Whereas, other parcels have a small section that is residential and a much large portion that has been put into current use. Without making this distinction, the town appeared dominated by either straight residential use or by current use.

Table II-1 Land Use, 2003

Land Use	Acres	% of
		Town
Single Family Residential	3,712	16.9%
Single Family Residential and Current Use	8,394	38.3%
Multi-Family Residential	58	0.3%
Commercial	161	0.7%
Commercial and Current Use	329	1.5%
Current Use Only	7,496	34.2%
Town owned	300	1.4%
Utility owned	4	0.0%
Land held in conservation	1,203	5.5%
Permanently protected land	285	1.3%
Total	21,942	100%

Sources: Town Tax Records and subcommittee input

Single Family Residential

Nearly seventeen percent (16.9%) of Bradford is made up of traditional single family lots. Most of these are located around the downtown and Lake Massasecum. Many are also located along West Meadow Road and West Road. The parcels range in size dramatically, from quite small in town to very large in some of the outer areas.

Single Family Residential and Current Use

Many Bradford residents with larger lots have chosen to build a house on a small portion of their parcel and put the rest into Current Use (The current use tax assessment system allows undeveloped portions of parcels which are 10 acres or larger to be assessed at a lower tax rate.) Parcels that are part residential and part Current Use make up 38.3% of town, and most are located away from the town center and Routes 103 and 114, but still along major local roads.

Multi-Family Residential

Only 58 acres or .3% of Bradford's land is developed as multi-family residential. Almost all of these parcels are located in the center of town.

Commercial

One hundred and sixty-one acres in Bradford are solely commercial use. These commercial parcels are all located along Routes 103 and 114 and Old Warner Road.

Commercial and Current Use

The owners of two large commercial parcels have chosen to keep their business on a small part of the parcel and put the remainder into current use. These two parcels make up 329 acres. One is located along Route 114 and the other is along Route 103.

Current Use Only

Some property owners have chosen to keep entire parcels undeveloped and in the Current Use tax system. This results in large areas of undeveloped land. However, property owners can change the current use status of their land and develop it whenever they desire. The largest areas of Current Use land are in the western and southern portions of town, along Old Mountain Road, East Washington Road, and County Road. Current Use is the largest land use in Bradford. Land in Current Use only makes up 34.2% of town, and land that is both residential and Current Use makes up another 38.3%, a total of 72.5%.

Town Owned

The Town of Bradford owns some conservation land and some other land that is used for community facilities. The conservation land that the Town owns is included in the conservation totals. Three hundred other acres are owned by the town and used for facilities such as town parks, the transfer station, the community center, and Town Hall.

Utility owned

Several small parcels are owned by utility companies. PSNH holds 1.52 acres of land on Old Warner Road, as well as .57 acres on Water Street. The telephone utility owns .4 acres of land on East Main Street.

Land Held in Conservation

"Land held in conservation" is land that is currently conserved (by some other means other than Current Use) but could change in the future. For example, the Town or the State might choose to sell conservation land. While this may be unlikely in some cases, it is possible. Bradford Bog, the Bradford Springs Hotel Site, the Pearl Town Forest, the West Meadow Wetland, and Low State Park were all designated by the chapter subcommittee as lands held in conservation. This form of conservation land makes up 1,203 acres or 5.5% of town.

Permanently Protected Land

"Permanently protected land" is land that is permanently protected from development. This is done through covenants or through purchase of the land by conservation groups. Aiken Pasture/Town Forest, and the Blitzer and Nelson Farm easements are included in this land category, which makes up 1.3% of Bradford.

In summary, currently the three largest land uses in Bradford are: single family and Current Use on the same parcel (3.8.3% of town), Current Use only (34.2% of town), and single family residential (16.9% of town). The three smallest land uses are: utility owned land (virtually 0%), multi-family residential (.3%), and commercial (.7%). The Future Land Use Chapter will address the ideal balance of land use that Bradford should strive for in the coming years.

INCREASE IN HOUSING UNITS

As shown above in Table II-1, residential land use (residential parcels, parcels that are both residential and current use, and multi-family parcels) makes up 55.5% of the land in Bradford. Bradford has experienced a tremendous amount of residential growth in the last thirty yeas, but, as shown in Table II -2 and Chart II-2 below, the majority of that growth occurred between 1970 and 1990. Between 1970 and 1980, the number of housing units increased by 243. The next decade it increased by 221. However, between 1990 and 2000, the total number of units only increased by 21.

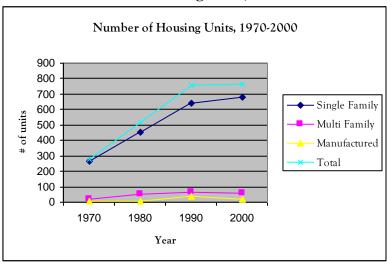
There has been an increase in all types of housing (single family, multi-family, and manufactured) over the last thirty years; the number of single family homes has increased the most. There was an increase in multi-family and manufactured units between 1970 and 1990, but there was slight drop in both between 1990 and 2000. This is could be due to the replacement of manufactured units with traditional construction, conversion of older multi-family units back into single family homes, conversion of seasonal homes to year-round homes, or the loss of structures to fire.

Table II-2 Number of Housing Units, 1970-2000

Occupied Housing Units by Type								
	1970	1980	1990	2000				
Single Family	263	456	641	680				
Multi Family	20	55	63	60				
Manufactured	9	9	37	22				
Total	277	520	741	762				

Source: US Census

Chart II- 2 Number of Housing Units, 1970-2000



Source: US Census

By examining the number of building permits issued in recent years, one can begin to assess whether or not the number of housing units will remain somewhat steady or increase dramatically again. In the years between 1970 and 1990, the Town of Bradford must have, on average, issued about 23 new building permits for residential construction each year. Table II-3 below shows that in recent years the Town has issued an average of about 15 permits each year. However, one large housing development could upset this trend. For more information on housing trends, see the Housing Chapter of this Master Plan.

Table II-3 New Residential Building Permits by Housing Type 2000-2004

	2000	2001	2002	2003	2004
Single Family	10	6	16	11	9
Multi-Family	0	0	0	0	0
Manufactured Housing	4	7	2	3	0
Total	14	13	18	14	9

Sources: NH Office of Energy and Planning website (data center), www.nh.gov/oep, and Town records

INCREASE IN COMMERCIAL AND INDUSTRIAL DEVELOPMENT

The Town reviews site plans for non-residential (commercial and industrial) and multi-family developments. This includes a variety of businesses that can range from a small shop to a quarry. Home businesses are required to go through site plan review if an accessory building in the Rural Residential District is being used for the business and must meet Zoning Ordinance criteria.

Reviewing the number of site plans approved is a general way to measure the increase in commercial and industrial development (since only one new multi-family development has been approved in recent years, the site plan approval figures represent commercial and industrial development almost exclusively.) Table II-4 below shows the number of site plans approved over the last 10 years. Site plan revisions were also included in these figures because revisions frequently indicate the expansion of a business. The number of site plans approved had remained relatively steady over the last decade. Notable new developments have included OE Trucking, Pizza Chef, the Kellco Academy, and Bradford Storage.

Table II-4 Site Plans Approved 1994-2004

	1994	1995	1996	1997	1998	1999	2000	2001	2002*	2003	2004	2005	Total
Site Plans	3	5	3	2	3	7	2	5	7	5	1	1	44
Approved													

Source: Planning Board meeting summaries *2002 figure includes one multi-family development Note: Site plan revisions are also included

Home Businesses

Home businesses are defined in the Bradford site plan regulations and zoning ordinance as any business use conducted entirely within a dwelling unit or accessory unit that is clearly incidental or secondary to the residence. Home based businesses are defined as not changing the character of the dwelling and having no visible outside storage, emission of dust, noise, fumes, vibration or smoke, or additional street parking or traffic. It is generally perceived that there has been an increase in home based businesses in Bradford in recent years due the freedom provided by personal computers and the Internet. If there were a steep increase in home based businesses this would represent another type of land use. In addition, if several home businesses are established close together they have the potential to in essence create a new land use district without changing the underlying zoning. This has the potential to change the character of an area. For

example, if several home businesses are established in an area and all have signs, the area can look more commercial than residential. Thus, this is an issue that the Town will need to continue to monitor.

Unfortunately, since only home businesses in accessory units in the Rural Residential District are required to go through site plan review, there is no firm data to confirm an increase or decrease in home businesses. However, the U.S. Census tracks commuting patterns and counts the number of people who work at home. As shown in Table II-5 below, the number of people working from home in Bradford has decreased according to the Census. However, it should be noted that these figures do not indicate whether someone has a home business or is simply telecommuting to an office in another town. For a more detailed review of home businesses, refer to the Population and Economics Chapter of this master plan.

Table II-5 Number of People Who Work from Home

	Total Commuters	Number that Work at Home	Percentage that Work at Home
1990	685	56	8.2%
2000	813	56	6.9%

Source: 1990 and 2000 U.S. Census

In the 2004 Community Survey, Bradford residents were asked how many members of their household had a home based business. As shown in Table II-6 below, 12.8% responded that one person had a home business. Two percent (2.2%) responded that two people in the household had home businesses. This is slightly higher than the number indicated by the census. It may be because only a portion of Bradford's residents responded to the survey.

Table II-6 Number of Survey Respondents That Have a Home Business

Persons	Total	Percent
0	311	85.0%
1	47	12.8%
2	8	2.2%
Grand Total	366	100.0%

Source: 2004 Master Plan Community Survey

NUMBER OF SUBDIVISIONS

In addition to tracking building permits and site plans, it is important to monitor the number of new lots created. New lots are created when a property owner subdivides a larger lot. A property owner typically requests subdivision approval before selling and/or developing new homes on the new lot(s), so it is important to have a sense of how many new lots are being created because it can be an indication of how many new homes might be built in coming years.

Table II-7 below, shows the number of new lots created in Bradford for a ten year period between 1994 and 2004. Often when a property owner submits a subdivision application, the

original, or parent parcel, is included in the total number of new lots. In this table, however, the parent lot has been left out, because that is not in actuality a new lot. It existed before, and will continue to exist after the new lots are created from it.

Table II-7 Number of New Lots Created 1994-2004

	1994	1995	1996	1997	1998	1999	2000	2001	2002	2003	2004	2005	Total
News	3	2	1	1	7	6	17	1	20	6	31	5	100
Lots													
Created													

Source: Planning Board meeting summaries

While the number of new lots created has fluctuated a great deal from year to year, it is important to note that between 1994 and 1997 the Town approved a total of seven new lots. In contrast between 2000 and 2003, 44 new lots were created. This is a significant number for a town that in 2000 had 762 dwellings. In January 2006, the Planning Board gave conditional approval for a 22 lot subdivision on Old Warner Road. Occasionally two or more lots are merged, but this not a frequent enough occurrence to off set increase in subdivisions in recent years.

CONSERVATION LAND

Generally speaking, the conservation of land in Bradford is a high priority. In the 2004 Community Survey, 83% of those who responded said that conservation of land was important or very important, and 88.7% said that Bradford's rural atmosphere/scenery was important or very important. Land can be conserved through current use tax assessment, conservation easements, ownership by conservation focused organizations, or individual owners choice.

The current use tax assessment system allows undeveloped portions of parcels which are 10 acres or larger to be assessed at a lower tax rate (the "current use" rate) than other parcels in town with the stipulation that such "current use" lands remain undeveloped. Any change that disqualifies the land from the current use assessment would result in a penalty equal to ten percent of the fair market value of that property.

The current use system has played an important role in preserving open space throughout the state as well as in Bradford. The significantly lower tax rates assessed on "current use" lands has made it possible for many land owners to retain ownership of their property as open space. However, in some towns the profit that can be gained from developing land makes the tax penalty less of a hindrance, and people opt to take land out of current use. As shown below in Table II-8, the number of acres in current use in Bradford has dropped slightly since 1999.

Table II-8 Number of Acres in Current Use

	1999	2000	2001	2002	2003	2004
Farm Land	548	548	548	554	563	672
Forest Land	13,114	11,312	8,857	9,097	9,297	10,986
Forest	NA	2,072	4,674	4,583	4,363	2,868
Land/Stewardship						
Unproductive Land	1,330	1,130	853	853	804	663
Wetland	666	666	554	560	566	484
Total Acres	15,658	15,728	15,486	15,647	15,593	15,675

Source: Town Reports

As mentioned earlier, there are other mechanisms for preserving land other than current use. Some of these mechanisms insure that the property will be conserved forever, and some do not. Six point eight percent (6.8%) or 1,488 acres of land Bradford is currently in some form of conservation other than current use. Low State Forest, Bradford Bog Park, and Pearl Town Forest are examples of parcels included in this 6.8%.

DEVELOPMENT CONSTRAINTS

When planning for how land can or should be used, it is important to consider development constraints. Of the total land area of a town, only a portion is developable. There are natural features of the land that make development either unsafe or unpractical, and there are areas that communities usually want to preserve rather than develop. Development constraints typically include: steep slopes, wetlands, lake and stream buffers, and aquifers.

Bradford's subdivision regulations require a minimum "buildable" lot area. This area must exclude any portion of the lot that is subject to periodic flooding, poor drainage, excessive ledge, or other hazardous conditions. Wetlands are protected by Bradford's wetlands ordinance which requires vegetated buffers be retained around wetlands. Bradford requires the buffering of some lakes and streams through the state Shoreland Protection Act.

POPULATION AND LAND USE COMPARED TO ADJACENT TOWNS

Bradford's land use is influenced by many social and economic factors, as is the land use in neighboring towns. In turn, one town's land use policies, population trends, land forms, and tax rates can impact the land use in an abutting town. Or, more simply, a trend of growth in a region may start in one town and spread to adjoining ones. The towns that abut Bradford are Henniker, Hillsborough, Newbury, Sutton, Warner, and Washington.

As shown in Table II-9 below, three of the towns that abut Bradford - Henniker, Hillsborough, and Warner - have much larger populations. Newbury and Sutton are of similar size to Bradford, and Washington is much smaller. All of Bradford's neighboring towns have seen more population growth than Bradford in the last ten years. Newbury, Warner, and Washington have experienced very large population increases.

Table II-9 Current Population Trends, 1980-2000 Bradford and Abutting Communities

	1990	2000	% Increase,
			1990-2000
Bradford	1,405	1,454	3.5%
Henniker	4,151	4,433	6.8%
Hillsborough	4,498	4,928	9.6%
Newbury	1,347	1,702	26.4%
Sutton	1,457	1,544	6.0%
Warner	2,250	2,760	22.7%
Washington	628	895	42.5%

Source: 1990 & 2000 US Census

It is important for the Town of Bradford to be aware of growth trends both in town and in adjacent communities. Understanding such trends can help identify influences on land use. For more information on growth trends, see the Population and Economics Chapter of this master plan.

SUMMARY

Bradford is a primarily residential community, and much of its land remains undeveloped, some of it in Current Use; however, growth pressures are mounting. Between 1970 and 1990, 464 housing units were added. While that trend slowed between 1990 and 2000, the Town has seen a recent increase in the number of subdivisions with new lots created.

Commercial development has remained somewhat stagnant, but could increase if the number of residents continues to increase. There is also a sense that the number of home based businesses could increase in the future. Local data does not support a recent increase. However, nation wide, more people are able to telecommute and choose where they live.

As development pressures have increased, the interest in land conservation has swelled. Respondents to the Community Survey showed strong support for preserving Bradford's rural character and preserving open space.

Although Bradford has not seen quite as much growth as its neighboring communities, their growth could be an indication of what's to come for Bradford. This chapter has outlined Bradford's current land use to set a baseline or starting point. The other chapters of the Master Plan will build on this base. Future Land Use Chapter will outline specific land use goals.

- Respectfully Submitted, Marcia Keller, Current Land Use Subcommittee Chair

MAPS

Two maps accompany this chapter, the Existing Zoning Map and the Existing Land Use Map.