

LAND USE PLAN

INTRODUCTION

The land use plan for the Fond du Lac area is based upon and integrated with the sewer service area planning process. The Fond du Lac Sewer Service Area Plan was adopted by the East Central Wisconsin Regional Planning Commission on June 5, 2001. This planning process allocates growth areas within local jurisdictions to meet projected needs for sewer development over the next 25 years. The growth area needs are based on county population projections developed by Wisconsin Department of Administration (DOA). East Central disaggregates the county population to the town, village, and city level and then prepares employment projections based upon labor force participation and commuting patterns. This methodology, explained in Appendix A, provides a consistent data set and a coordinated urban planning process. Like the transportation/land use plan, the sewer service area plans are updated every five years.

The three land use plan alternatives described as scenarios in this report were all based upon the sewer service area planning process. This process developed control totals for population and employment projections and growth forecasts. The Fond du Lac Urbanized Area is projected to grow at a moderate but steady rate through the future 2035 planning horizon as depicted in Exhibit 32. Population is expected to increase by over 16,000 people in the study area between 1990 and 2035. Employment is projected to reach a level of over 51,000 employees, an increase of over 15,000 jobs. Approximately 49 percent of jobs are expected to be in the service sector, while retail (15.6 percent) and manufacturing (18.8 percent) account for a much smaller share.

EXHIBIT 32

POPULATION PROJECTIONS FOR THE FOND DU LAC STUDY AREA

Urban Area Municipality	1990	2000	2005	2010	2015	2020	2025	2030	2035
City of Fond du Lac	37,755	42,203	43,273	44,619	45,918	47,210	48,306	49,204	50,434
Village of North Fond du Lac	4,302	4,557	4,780	4,961	5,138	5,316	5,473	5,609	5,785
Town of Byron	1,634	1,550	1,606	1,630	1,651	1,670	1,680	1,683	1,697
Town of Empire	2,485	2,620	2,765	2,868	2,968	3,069	3,158	3,235	3,334
Town of Fond du Lac	2,310	2,027	2,337	2,457	2,578	2,700	2,813	2,917	3,042
Town of Friendship	2,210	2,406	2,507	2,584	2,658	2,732	2,794	2,845	2,915
Town of Taycheedah	3,383	3,666	3,850	3,988	4,122	4,257	4,375	4,476	4,608
Study Area Total	55,523	59,029	61,118	63,107	65,033	66,954	68,599	69,969	71,815

Source: U.S. Census Bureau, 1990, 2000; ECWRPC 2004

EXHIBIT 33

EMPLOYMENT PROJECTIONS FOR THE FOND DU LAC STUDY AREA

Sector	2000	Share	2035	Share
Manufacturing	8,264	23%	9,718	19%
Service	14,944	43%	25,448	49%
Commercial/Retail	6,100	17%	8,049	16%
Wholesale	1,340	4%	1,660	3%
Trade	1,952	6%	4,487	9%
Other Employment	2,596	7%	2,293	4%
Total Employment	35,196	100%	51,655	100%

Source: ECWRPC, 2005

Once the population and employment projections were established through the service area planning update, land use growth forecasts were prepared for the year 2020. The growth acreage is listed in Exhibit 34 includes a need for almost 1,557 acres of residential development to the year 2020 and 563 acres of commercial and industrial land needs. Total urban area growth acreage is projected to need approximately 2120 acres.

EXHIBIT 34

FORECAST LAND USE ACREAGE NEEDS
FOND DU LAC URBANIZED AREA 2020

Acreage Needs	Town of Friendship	Village of North Fond du Lac	Town of Fond du Lac	City of Fond du Lac	Town of Empire	Town of Taycheedah	Town of Calumet	Town of Byron*	Total
Residential	118.8	151.9	0	1063.67	48.6	141.13	32.82	--	1556.92
Commercial/Industrial	48	152.4	48	272.62	12	24	6	--	563.02
Total	166.8	304.3	48	1336.29	60.6	165.13	38.82	--	2119.9

*Town of Byron not included in Fond du Lac area SSA
Source: ECWRPC 1999

LAND USE ALTERNATIVES

The land use alternatives are described by three scenarios and include Full Build Scenario, Compact Scenario and Current Plans Scenario for the year 2035 (the selected alternative). These scenarios are illustrated in [Exhibit 36](#), [Exhibit 45](#), Exhibit 49 in this section. The scenarios depict the representative land use growth through the year 2035 and beyond. The analysis used in this planning process is intended to illustrate the difference between the effects of varied land use policies and growth patterns over time.

Because of the slow and steady growth rate, projections for the next approximately 30 years do not create a large enough difference in land usage to adequately illustrate the true long term effects of

land use policy directions on transportation needs, although analyzing the three above mentioned scenarios will be a useful in making practical and efficient transportation and land use planning decisions.

The full build and compact scenarios use nearly the same control total for projected population, dwelling units, employment and vehicles. A slight variation in totals occurs because of varying household size in different minor civil divisions (MCDs). For the purpose of transportation planning, the Fond du Lac study area is divided into smaller geographic units known as Transportation Analysis Zones (TAZs), as seen in [Exhibit 89](#) in Appendix B. These TAZs contain specific existing and projected socio-economic data sets for each scenario. The trips rates listed below in Exhibit 35 are used to generate trip outputs for the noted trip types in all three model scenarios.

EXHIBIT 35

AUTO OCCUPANCY RATES BY TRIP TYPE

Trip Type	Trip Rate
Work	1.17
Shopping	1.62
School	1.48
Non-Home Based	2.55
External Trips	1.47

Source: WisDOT 2005

Full Build Scenario. The Full Build Scenario proposes what the urbanized area would look like if the entire urbanized area is developed ([Exhibit 36](#)). Based on current rates of growth it is anticipated that this occurrence could be 100 years or more down the road. It is projected that this scenario would include roughly 267,000 people, 101,000 households, and roughly 100,000 students. Persons per household would average roughly 2.65 persons, while there would be approximately 3 households per acre.

In terms of employment, the urbanized area would consist of roughly 185,000 employees. A breakdown of employment sector estimates is listed below in Exhibit 37. Employees per person would average 0.69, while employees per household would average roughly 1.84.

EXHIBIT 37

EMPLOYEES BY SECTOR FULL BUILD SCENARIO

Sector	Employees
Retail	48,703
Service	55,704
Manufacturing	60,951
Wholesale	5,991
Trade	8,508
Other	5,246
Total	185,103

Source: ECWRPC 2005

With regards to land use acreage, it is assumed that all vacant and undeveloped land within the urbanized area would be developed in some capacity. Exhibit 38 provides a breakdown of projected land use acreages by land use type for the Full Build Scenario. It is also noted that resource protection areas are not included within the urban developed acreage total, due to the fact that these totals will remain constant throughout all scenarios and are not classified as developable acreage.

EXHIBIT 38

ACREAGE BY LAND USE TYPE
FULL BUILD SCENARIO

Land Use Type	Acreage
Residential	33,566
Parks and Recreation	1,290
Retail	4,358
Service	5,267
Manufacturing	4,385
Wholesale	320
Trade	1,240
Other	5,717
Resource Protection*	5,101
Total Urban Developed Acres	56,143

* Acreage not included within the total.
Source: ECWRPC 2005

Employees per acre density is clearly dominated by the wholesale sector with nearly 19 employees per acre projected, followed by manufacturing, retail, service, trade, and other.

EXHIBIT 39

DENSITIES BY EMPLOYMENT SECTOR
FULL BUILD SCENARIO

Employment Sector	Employees per Acre
Retail	11.18
Service	10.58
Manufacturing	13.90
Wholesale	18.71
Trade	6.86
Other	0.92

Source: ECWRPC 2005

All of this projected socioeconomic data allows the model to generate a variety of different trip types within the transportation network, including person trips, auto trips, and truck trips. By using the trip generation rates noted earlier within this chapter and the socioeconomic data, it is projected that roughly 1.3 million person trips would occur on the transportation network within this particular scenario within a 24 hour period. This equates to roughly 5 trips per person, per day on the transportation network.

EXHIBIT 40

PERSON TRIP OUTPUTS
FULL BUILD SCENARIO

Person Trip Type	# of Person Trips
Home-Based Work Trips	204,431
Home-Based Shopping Trips	195,045
Home-Based School Trips	104,276
Home-Based Other Trips	359,395
Non-Home Based Trips	435,907
Total	1,299,054

Source: ECWRPC 2005

Out of the 1.3 million person trips, it is projected that about 973,000 would occur by automobile usage. Automobile trips include internal trips, trips which have an origin and destination both within the travel model network, along with external to internal trips, those that originate outside the model yet have a destination within the network, and external to external trips, those that have an origin and destination outside the network, but travel through it. Exhibit 41 breaks down the auto trips by trip type for the Full Build Scenario.

EXHIBIT 41

AUTO TRIP OUTPUTS
FULL BUILD SCENARIO

Trip Type	# of Auto Trips
Home Based Work Trips	174,931
Home Based Shopping Trips	120,524
Home Based School Trips	70,505
Home Based Other Trips	141,134
Non-Home Based Trips	296,712
Total Internal Auto Trips	803,806
External to External	37,297
External to Internal	131,928
Total EE/EI Auto Trips	169,207
Total Auto Trips	973,013

Source: ECWRPC 2005

Truck trips also account for a substantial number of trips generated within the transportation network. It is projected that approximately 56,000 internal truck trips will be generated on the Fond du Lac Urbanized Area transportation network on a given day for the Full Build Scenario, most of which will be single unit trucks. By including external to internal truck traffic and external to external truck traffic, over 74,000 truck trips would occur on the network.

EXHIBIT 42

INTERNAL TRUCK TRIP OUTPUTS
FULL BUILD SCENARIO

Truck Trip Type	# of Trips
Single-Unit	41,799
Combination	14,495
Total Trucks	56,294

Source: ECWRPC 2005

EXHIBIT 43

TOTAL TRUCK TRIP OUTPUTS
FULL BUILD SCENARIO

Trip Type	# of Trips
External to Internal	11,965
External to External	5,908
Internal to Internal	56,294
Total Truck Trips	74,167

Source: ECWRPC 2005

Therefore, by adding the projected total of auto trips and truck trips, it is anticipated that there would be over 1 million trips occurring within the Fond du Lac Urbanized Area on a given day for the Full Build Scenario.

EXHIBIT 44

TOTAL TRIP GENERATION OUTPUTS
FULL BUILD SCENARIO

Trip Type	# of Trips
Auto	973,013
Truck	74,224
Total	1,047,237

Source: ECWRPC 2005

With regards to total daily vehicles miles traveled, the travel demand model forecasts that this would total roughly 6,303,982 miles traveled per day on the transportation network, with trucks accounting for about 502,990 miles.

In terms of total daily vehicles hours traveled, the travel demand model estimates that this would come out to be 472,939 hours traveled per day on the transportation network, with trucks accounting for about 37,100 hours. These projected statistics are staggering and would have a severe impact on the existing transportation network within the urbanized area. The average vehicle speed on the transportation system would be roughly 13 miles per hour. The majority of the existing transportation network would be deficient in some capacity. Deficiencies will be discussed within the Alternative Analysis Chapter.

Compact Scenario. In order to illustrate a more efficient land use alternative, the Compact Scenario ([Exhibit 45](#)) was compiled. This land use scenario maximizes the use of land in a compact and contiguous development pattern. The analysis of the Compact Scenario measures the relationship of this denser land use pattern to the present landscape, effects on the environment and on the existing transportation system. In this case land uses would be mixed, employment densities would be slightly higher, residential development would be denser averaging roughly 10 households per acre, and much of the Metropolitan Planning Area would remain as agriculture with supporting rural land uses.

Demographic projections in terms of population, the number of households, total employment, and student enrollment would be roughly the same as the Full Build Scenario. Employment by sector would differ, due to the difference in land use acreage and densities.

EXHIBIT 46

EMPLOYEES BY SECTOR
COMPACT SCENARIO

Sector	Employees
Retail	29,616
Service	85,147
Manufacturing	37,021
Wholesale	7,404
Trade	11,106
Other	14,808
Total	185,102

Source: ECWRPC 2005

Under a Compact Scenario, the Fond du Lac Urbanized Area would develop in a manner that implements an efficient use of land. Specifically, the land use patterns maximize the use of land by utilizing compact and contiguous development. Infill development will be promoted and enforced before any peripheral sprawl is allowed. This scenario assumes a greater number of people in a smaller amount of area and preserves the majority of farmland and other developed land, in exchange for more dense developments. Land use acreage by land use type for the Fond du Lac Urbanized Area is broken down in Exhibit 47. It is noted that resource protection areas are not included within the urban development acreage total, due to the fact that these totals will remain constant throughout all scenarios and are not classified as developable acreage.

EXHIBIT 47

ACREAGE BY LAND USE TYPE
COMPACT SCENARIO

Land Use Type	Acreage
Residential	10,071
Parks and Recreation	3,642
Retail	1,181
Service	2,760
Manufacturing	1,931
Wholesale	931
Trade	2,172
Other	857
Resource Protection*	5,101
Total Urban Developed Acres	23,545

* Acreage not included within the total.
Source: ECWRPC 2005

Employees per acre density for the Fond du Lac Urbanized Area is clearly dominated by the service sector. Employee density by sector is listed in Exhibit 48.

EXHIBIT 48

EMPLOYEE DENSITY BY SECTOR
COMPACT SCENARIO

Employment Sector	Employees per Acre
Retail	25.08
Service	30.85
Manufacturing	19.17
Wholesale	7.95
Trade	5.11
Other	17.27

Source: ECWRPC 2005

As in the Full Build Scenario, this projected socioeconomic data allows the model to generate a variety of different trip types within the transportation network, including person trips, auto trips, and truck trips. By using the same auto occupancy rates noted earlier and socioeconomic data forecasts, it is projected that the number of person, auto, and truck trips under the Compact Scenario for the Fond du Lac study area would closely resemble those from the Full Build Scenario. However, the vehicle miles and hours traveled would greatly differ. It is estimated within the Compact Scenario, a total of 4,189,869 miles traveled would occur within the Urbanized Area in a 24 hour period, with trucks accounting for roughly 385,000 miles. In terms of hours traveled, this would total roughly 252,842 hours, with trucks accounting for roughly 22,000 hours. The average speed within the network would be roughly 17 mile per hour.

However, when the auto occupancy rates are adjusted for the future based on density under this particular scenario, the number of person trips, vehicle miles traveled, and hours traveled by automobile is greatly reduced. The future trip generation rates are shown in Exhibit 49.

EXHIBIT 49

FUTURE AUTO OCCUPANCY RATES BY TRIP TYPE

Trip Type	Trip Rate
Work	2.34
Shopping	3.24
School	2.96
Non-Home Based	5.10
External Trips	2.94

Source: WisDOT 2005

By using these rates, the number of automobile trips would be reduced from roughly 973,000 to 500,956 over a 24 hour period within the Fond du Lac study area. Denser land use patterns and street and highway deficiencies caused by congestion would trigger an increase in the use of alternative modes of transportation (biking, walking, transit, etc.). Since auto trips would be greatly reduced, therefore reducing congestion, the number of truck trips and truck trip rates would not be greatly affected.

Vehicle miles and hours traveled would also be greatly reduced due to the reduction in the number of automobiles on the network. With regards to total daily vehicles mile traveled, the Fond du Lac travel demand model forecasts that this would total roughly 2,798,356 miles traveled per day on the transportation network, with trucks accounting for 373,917 miles. The total daily miles traveled with the future auto occupancy rates for this scenario is roughly two-thirds of the total for the Compact Scenario with the base year trips rates. Truck trip mileage is down slightly due to denser land use patterns.

In terms of total daily vehicles hours traveled, the model estimates that this would come out to be 106,914 hours traveled per day on the transportation network, with trucks accounting for about 14,595 hours. Total hours traveled for this scenario would be nearly half of the projected hours traveled for the Compact Scenario with base year auto occupancy rates, while hours traveled by truck would be approximately cut by one-third. Due to the reduction in traffic and congestion on the system, the average vehicle speed for this scenario would be roughly 26 miles per hour.

Current Plans Scenario for 2035. (Selected Alternative) A Current Plans Scenario ([Exhibit 50](#)) is also examined which considers growth as it has actually occurred to the present, and with continued application of adopted policies into the future to 2035. The evaluation will compare the general consequences of the other two extreme models of development to this more reality-based scenario. The Current Plans Scenario is based on present development patterns and future projections grounded in sewer service area planning, local plans, the travel demand model, and adopted land use and transportation policy. The map does not depict the entire acreage projected earlier in this section. Excess acreage which allows for market choice is removed as it inflates the actual acreage needs. The detailed analysis of this scenario will measure the development's effects relative to the policies adopted earlier in the planning process and previously discussed in this document.

One of the tools used to depict what land use will look like in the year 2035 was to compile a proposed land use map ([Exhibit 51](#)) of the Urbanized Area based upon local comprehensive plans. The Town of Byron was the only municipality without a land use plan and town zoning was used for this purpose. Although the horizon years for these plans vary, the plans were helpful in projecting land use trends for the year 2035. Under the Current Plans Scenario, the actual amount of land consumed is less than the total proposed by the local communities, particularly in the manufacturing category. Suburban and exurban development are left in place.

General demographics related to this scenario include: a population of roughly 73,000 people, 31,000 households, 51,000 employees, 0.71 employees per person, 1.69 employees per household, and 21,000 students. Persons per household would average roughly 2.38, while households per acre would be just over three at 3.08. A breakdown of employment sector projections is listed in Exhibit 52.

EXHIBIT 52

EMPLOYEES BY SECTOR CURRENT PLANS (2035) SCENARIO

Sector	Employees
Retail	8,049
Service	25,448
Manufacturing	9,718
Wholesale	1,447
Trade	3,923
Other	2,006
Total	50,591

Source: ECWRPC 2005

With regards to land use acreage, projected acreages by land use type are based upon current rates of growth. Projected acreages for the year 2035 are listed in Exhibit 53. It is also noted that resource protection areas are not included within the urban developed acreage total, due to the fact that these totals will remain constant throughout all scenarios and are not classified as developed acreage.

EXHIBIT 53

ACREAGE BY LAND USE TYPE
CURRENT PLANS (2035) SCENARIO

Land Use Type	Acreage
Residential	9,931
Parks and Recreation	--*
Retail	741
Service	3,990
Manufacturing	846
Wholesale	70
Trade	804
Other	5,660
Resource Protection**	5,101
Total Urban Developed Acres	22,042

*Park/Rec acres are included in the Service Acres

** Acreage not included within the total.

Source: ECWRPC 2005

Employees per acre density is clearly dominated by the wholesale sector with over 20 employees per acre projected, followed by manufacturing, retail, service, trade, and other, as seen in Exhibit 54.

EXHIBIT 54

DENSITIES BY EMPLOYMENT SECTOR
CURRENT PLANS (2035) SCENARIO

Employment Sector	Employees per Acre
Retail	10.86
Service	6.38
Manufacturing	11.49
Wholesale	20.58
Trade	4.88
Other	0.35

Source: ECWRPC 2005

City of Fond du Lac. The east and south sides of the City of Fond du Lac experience the greatest changes under the proposed land use, most notably single family and commercial land uses. In particular, the area immediately surrounding the intersection of Johnson Street and the USH 151 bypass (currently under construction) is proposed to be used for commercial purposes. More generally, the entire area west of the USH 151 bypass is proposed as single-family residential. Single family residential land use is also proposed east of the USH 151 bypass, specifically the land north of Johnson Street and south of Ducharme Parkway.

On the south edge of Fond du Lac, the most prominent land use change is proposed on the land northeast of the intersection of USH 151 bypass and USH 41. In addition, new industrial lands are proposed near the current industrial section, with boundaries from Military Road to Main Street. This proposed industrial area will extend even further southward, to the boundaries of the City, and beyond.

To the north, in a section of the city that is almost completely surrounded by the Village of North Fond du Lac, multi-family residential land uses are proposed, a change from the current agricultural uses.

Village of North Fond du Lac. Proposed land use changes for the Village of North Fond du Lac are primarily in the industrial realm. Within the boundaries of the jurisdiction, the land immediately east of USH 41 and north of Winnebago Street/CTH OO is proposed for industrial uses. No other significant land use changes are proposed for the Village of North Fond du Lac.

Town of Fond du Lac. Under the proposed land use, the Town of Fond du Lac can expect to see the largest changes in industrial land use classification, in addition to changes in single-family residential and commercial properties. Most of these shifts in land use are set to take place immediately adjacent to either USH 41 or the new USH 151 bypass. Lastly, a shift to industrial land use is proposed for the areas north of USH 151 (traditional route) and directly west of USH 41.

Similar to industrial land use, single-family residential land classifications are proposed to see a substantial increase. The largest area of proposed reclassification lies between CTH OOO and USH 151, extending on both sides of Esterbrook Road. A smaller, yet still mentionable reclassification is proposed for the lands adjacent to USH 151 bypass from STH 175 to the border of the township, which is concurrent with CTH K.

Lands classified as commercial will increase under the proposed land use plan. The corridor along business USH 151, immediately before and after the bypass splits off, is proposed to be classified as commercial. A corridor of similar nature is proposed for STH 23, extending from USH 41 to the western border of the town. In addition, commercial land uses are proposed in the triangle of land created by the intersections of USH 41, USH 151 bypass, and STH 175.

Specifically, the area directly south of the USH 151 bypass and west of STH 175 is proposed to be reclassified from agricultural lands to industrial lands. The sliver of land north of the USH 151 bypass and south of the City of Fond du Lac's industrial park is also proposed as industrial lands in the Town of Fond du Lac.

Town of Taycheedah. Proposed land use changes in the Town of Taycheedah are largely single-family residential in nature. The Town proposes an infill of single-family residential classified lands that bridge the gap between existing residences that are there today. Essentially, one large

contiguous block of land, extending from Johnson Street/STH 23 along CTH UU, then STH 149, and eventually hugging CTH OO is proposed to be classified for residential purposes. For the most part, this land lies on or just behind the Niagara Escarpment.

Town of Empire. Like the Town of Taycheedah, proposed land use for the Town of Empire will see the most changes in the area of single-family residential. The land on the western portion of the township may experience a reclassification from agricultural to single-family residential. These residential lands will be focused along the extent of CTH K and USH 45 that lie within the boundaries of the town.

Town of Friendship. The Town of Friendship would see large tracts of land reclassified to both industrial and single-family residential uses under the proposed land use plan. Some commercial lands are proposed along the USH 41 corridor. The majority of proposed industrial lands lie in close proximity to the three major thoroughfares that traverse the town—USH 41, USH 45, and STH 175. One area of industrial reclassification lies just southwest of USH 41, behind the proposed commercial lands. The second large tract of proposed industrial land lies in the wedge of land between STH 175 and USH 45, extending from Franklin Avenue at the south, to Subway Road to the north.

Single-family residential areas are proposed for the land immediately northwest of the Village of North Fond du Lac, between USH 41 and STH 175. Also, single-family residential will be extended further west along the USH 45 corridor, which hugs the shoreline of Lake Winnebago.

Town of Byron. The Town of Byron does not lie completely within the Fond du Lac Metropolitan Planning boundary. The proposed land use changes for the Town of Byron are only proposed for areas outside of the boundary. Nevertheless, a discussion is still useful as the land use decisions in the rural area will inevitably have some affect on the urbanized area.

A large tract of land, formerly classified for agricultural purposes, has been proposed as industrial. This land has immediate access to both USH 41 and STH 175. This tract of land lies several miles south of the industrial lands already in existence and also planned in the City and Town of Fond du Lac.

Again, all of this projected data allows the model to generate a variety of different trip types within the transportation network, including person trips, auto trips, and truck trips. By using the trip generation rates noted earlier within this chapter and the socioeconomic data, it is projected that roughly 330,000 person trips would occur on the transportation network within this particular scenario within a 24 hour period. This equates to roughly 5 trips per person, per day on the transportation network.

EXHIBIT 55

PERSON TRIP OUTPUTS
CURRENT PLANS (2035) SCENARIO

Person Trip Type	# of Person Trips
Home-Based Work Trips	53,209
Home-Based Shopping Trips	52,262
Home-Based School Trips	25,452
Home-Based Other Trips	94,908
Non-Home Based Trips	102,788
Total	328,619

Source: ECWRPC 2005

Out of the 328,619 person trips, it is projected that about 203,000 would occur by automobile usage. Automobile trips include internal trips, trips which have an origin and destination within the travel model network, along with external to internal trips, those that originate outside the model yet have a destination within the network, and external to external trips, those that have an origin and destination outside the network, but travel through it. Exhibit 56 breaks down the auto trips by trip type for the Current Trend (2035) scenario.

EXHIBIT 56

AUTO TRIP OUTPUTS
CURRENT PLANS (2035) SCENARIO

Trip Type	# of Auto Trips
Home Based Work Trips	45,668
Home Based Shopping Trips	32,344
Home Based School Trips	17,222
Home Based Other Trips	37,388
Non-Home Based Trips	70,029
Total Internal Auto Trips	202,651
External to External	37,297
External to Internal	131,928
Total EE/EI Auto Trips	169,225
Total Auto Trips	371,876

Source: ECWRPC 2005

Truck trips also account for a substantial number of trips generated within the transportation network. It is projected that approximately 15,000 internal truck trips will be generated on the Fond du Lac Urbanized Area transportation network on a given day for the Current Trend (2035) Scenario, most of which will be single unit trucks. By including external to internal truck traffic and external to external truck traffic, over 33,000 truck trips would occur on the network.

EXHIBIT 57

INTERNAL TRUCK TRIP OUTPUTS
CURRENT PLANS (2035) SCENARIO

Truck Trip Type	# of Trips
Single-Unit	11,300
Combination	4,084
Total Trucks	15,384

Source: ECWRPC 2005

EXHIBIT 58

TOTAL TRUCK TRIP OUTPUTS
CURRENT PLANS (2035) SCENARIO

Trip Type	# of Trips
External to Internal	11,965
External to External	5,908
Internal to Internal	15,384
Total Truck Trips	33,257

Source: ECWRPC 2005

Therefore, by adding the projected total of auto trips and truck trips, it is anticipated that there would be over 400,000 trips occurring within the Fond du Lac Urbanized Area on a given day for the Current Trends scenario.

EXHIBIT 59

TOTAL TRIP GENERATION OUTPUTS
CURRENT PLANS (2035) SCENARIO

Trip Type	# of Trips
Auto	371,876
Truck	33,257
Total	405,133

Source: ECWRPC 2005

With regards to total daily vehicles miles traveled, the travel demand model forecasts that this would total 2,244,743 miles traveled per day on the transportation network in 2035, with trucks accounting for about 205,387 miles. In terms of total daily vehicles hours traveled, the travel demand model estimates that this would come out to be 69,188 hours traveled per day on the transportation network, with trucks accounting for about 6,118 hours.

These projected statistics have a moderate impact on the existing transportation network within the urbanized area. The average vehicle speed on the transportation system would be roughly 32 miles per hour. Portions of the existing transportation network are expected to be deficient in some capacity by 2035. Deficiencies will be discussed within the Alternative Analysis Chapter.