

## Warning Concerning Copyright Restrictions

The Copyright Law of the United States (Title 17, United States Code) governs the making of photocopies or other reproductions of copyrighted materials.

Under certain conditions specified in the law, libraries and archives are authorized to furnish a photocopy or other reproduction. One of these specified conditions is that the photocopy or reproduction is not to be used for any purpose other than private study, scholarship, or research. If electronic transmission of reserve material is used for purposes in excess of what constitutes "fair use," that user may be liable for copyright infringement.

University of Nevada, Reno

Stimulating Nevada's Highway Infrastructure and The Use of Debt Financing  
Instruments

A thesis submitted in partial fulfillment of the requirements for the degree of  
Bachelor of Science in Business Administration in  
Economics and Finance  
and the Honors Program

By

Michael Pansky

Professor Federico Guerrero, Ph. D., Thesis Advisor

May 2012  
THE HONORS PROGRAM

We recommend that the thesis  
Prepared under our supervision by

Michael Pansky

Entitled

Stimulating Nevada's Highway Infrastructure and The Use of Debt Financing  
Instruments

Be accepted in partial fulfillment of the  
requirement for the degree of

Bachelors of Science in Business Administration in Finance and Economics

---

Federico Guerrero, Ph. D., Thesis Advisor

---

Tamara Valentine, Ph. D., Director, Honors Program

May 2012



## **Abstract**

This paper assesses Nevada's Highway Infrastructure and the role of financial instruments in developing Nevada's Highway Infrastructure. As America's single greatest asset necessary for every aspect of the U.S. economy infrastructure provides a new standard to that allows resources for the future. Examples of infrastructure in Nevada that are deficient are roads, bridges, and drinking water. In America, we have bonds that help develop infrastructure and safe investments backed by federal aid programs. Grant Anticipated Revenue Vehicle Bonds or GARVEE Bonds are tax-exempt debt financing tools that are backed by annual federal appropriations for federal aid transportation projects. The State of Nevada should enact the use these bonds, and other programs similar under the Transportation Infrastructure Finance and Innovation Act. The significance of this thesis is to locate safe investment opportunities for growth and development in the Nevada, while bringing our infrastructure to the necessary capabilities needed for our growing population.

### **Acknowledgements**

I wish to personally thank my thesis advisor Dr. Federico Guerrero, not only for without whom this project would have never been completed, but also for pushing me in my Economics class I took with him. It drove me to not only add my finance major, but really gave me a clear distinction of what a mentor is, not always in the foreground of the project, but giving me room to really grow and work in my own capacity. I extend a large thank you to Dr. Tamara Valentine for continually pushing me to meet my deadlines and really helping each and every student through the long, arduous process. I would like to extend additional thanks to the teachers of the Department of Economics and Department of Finance, who gave me the opportunity and skills to proceed with this project and overall drive to pursue dual degrees and an MBA after graduating in May.

## Table of Contents

Abstract .....	i
Acknowledgements .....	ii
Table of Contents .....	iii
List of Tables.....	iv
List of Figures .....	v
<b>I. Stimulating Nevada’s Highway Infrastructure and The Use of Debt Financing</b>	
Instruments.....	1
Background of Issue.....	3
<b>II. Debt Financing Instruments.....</b>	
Qualifications of GARVEE Bond Projects .....	10
Current GARVEE Activity Map .....	11
<b>III. California use of GARVEE Bonds .....</b>	
Statistics of Federal Highway Accounts.....	14
<b>IV. Independent Studies on Use of GARVEE Bonds .....</b>	
Legal Cases Involving GARVEE Bonds.....	18
<b>V. Nevada .....</b>	
<b>VI. Conclusion .....</b>	
References.....	23
Appendix A: Breakdown of State Use of GARVEE Bonds... ..	27
Appendix B: Assumptions for GARVEE Bonding Capacity Sensitivity Analyses .....	31
Appendix C: Comparison of Federal Highway Trust Fund Account Receipts Allocation	32
Appendix D: Nevada DOT Department Summary .....	33
Appendix E: Nevada DOT Department Breakdown .....	34
Appendix F: United States Federal Code, Title 23 .....	40
Appendix G: California Government Code .....	41

List of Tables.....	iv
Table 1: Direct vs. Indirect GARVEE Bonds.....	9
Table 2: Four Factor Analyses.....	13
Table 3: Summary of Results for GARVEE Bonding Capacity Sensitivity Analysis. .	13
Table 4: Net Highway Account Revenues for 2010 .....	15
Table 5: Volume of Highway “Innovative Finance” Activity.....	18
Table 6: Estimated Highway Fund Needs and Revenue .....	21
Table 7: Pros and Cons of GARVEE Bonds .....	25



List of Tables.....v

Figure 1: Current GARVEE map as of December 31, 2011 .....11

Figure 2: Motor Fuel Attribution .....14

Figure 3: Estimated Highway Fund Needs vs. Revenue .....26



## **Stimulating Nevada's Highway Infrastructure and The Use of Debt Financing Instruments**

Through the implementation of financing instruments Nevada can develop a plan to bring its highway infrastructure into the future. In doing so, this would be accomplished through the use of debt financing instruments. Through the use of the debt financing tools discussed in my thesis, Nevada will become structurally efficient while not passing off the costs on taxpayers. The effects are on people living in the state who deal with these growing concerns every day. By taking necessary steps now the State of Nevada will be an example of how other states should go about their own infrastructure needs. Evidence shows that the use of innovative financial tools in developing infrastructure is essential of future projects for growth.

Through research I have determined that the use of debt financing instruments such as Grant Anticipated Revenue Vehicle Bonds is essential to the advancement of Nevada's Highway Infrastructure needs. My thesis will be if the impending work on infrastructure in Nevada is warranted of debt financing instruments. Specifically related to highway development, the U.S. Department of Transportation's (DOTs) Federal Highway Authority has a three prong test to determine the legitimacy of these concerns. (US Department of Transportation, 2011) The three pong test is based on the size of the project, revenue stream, and willingness of Nevada Department of Transportation (DOT) to reserve future funds to satisfy debt. Nevada's crippling infrastructure is in dire need for debt instruments for financing Nevada's current economic situation is dismal.

I began by researching what areas of Nevada's infrastructure could use improvement the most. This is needed to focus a plan of attack on what type of financial

tools would benefit the state in improving infrastructure. After narrowing the innovative tools used an evaluation of their cost effectiveness and implantation ability in Nevada is established. By starting with the problem in Nevada the thesis provides an attack head on with a cause and effect solution. My thesis will build on everything I have learned through my finance and economic classes. This has given me the necessary tools to look at the past, present, and future economic issues with implementation and development of financing infrastructure growth. No changes have come since the Prospectus besides added some text based research that has repetitively lead me back to my anticipated results.

My thesis problem that I am researching is a crucial topic for Nevada to move into the next century as an efficient and growing economy. Nevada's economy is the main scope of the project in that the implementation behind the results will establish a precedent on the issue. The Senate Select Committee on Economic Growth and Employment for the State of Nevada would be interested in my research. The significance of these finding can essentially be used in many different ways. There have already been numerous studies on Nevada's infrastructure and the necessity to build. As well as studies of how to create jobs to bring us out of the highest unemployment rate this state has ever seen. In addition to studies of how financing these projects can be attained. However, this will be the first study that incorporates all aspects and essentially answers the main question.

## **Background of the Issue**

Nevada's highways are a major hub of transportation for businesses on the west coast. Most of the financial debt instruments are used for highway transportation because essentially the majority of the taxes collected are excised and distributed from highway usage. The highway fund is a collective tax from local states, and the federal government imposed on gasoline that is distributed through the Federal Highway Authority to corresponding states. Numerous financial instruments through research have arisen including but not limited to State Infrastructure Banks (SIBs)—revolving funds to make or guarantee loans to approved projects; Grant Anticipation Revenue Vehicles (GARVEEs)—which are state issued bonds or notes repayable with future federal-aid; and credit assistance under the Transportation Infrastructure Finance and Innovation Act (TIFIA)—including loans, loan guarantees, and lines of credit. These are mentioned solely for the fact that there is reference within laws attached in the appendix that refers to these instruments. The focus is on GARVEE Bonds as those are what I have established to be the most effective financial tool for our state based on the needs established for Nevada. By starting with the problem in Nevada I will be able to attack it head on with a cause and effect solution. Numerous studies have been presented in other states and I believe that by interpreting these results I can formulate a more strict opinion on the topic.

The State of Nevada is at a crucial point of expansion of our highway infrastructure. The background of the issue can be summed up from Nevada's Report Card for American Infrastructure. The Report Card for America's Infrastructure provides a state by state breakdown of infrastructure needs. In Nevada, the top three infrastructure

concerns in descending numerical order are roads, bridges, and drinking water. The main discerning evidence shows that Nevada's Highway Infrastructure is experiencing:

- 59% of Nevada's major urban highways are congested.
- Vehicle travel on Nevada's highways increased 117% from 1990 to 2007.
- Nevada's transportation department has identified 10 mega projects costing an estimated \$4.8 billion that need to be completed by 2015 to avoid gridlock in urban areas.

(American Society of Civil Engineers, 2012)

Moving on from the breakdown of Nevada's infrastructure needs was an article written by David Puentes and David Warren published by The Brookings Institute, which is a nonprofit policy think tank located in Washington D.C. that conduct independent research and provide recommendations that are consistently ranked as the most influential and most quoted articles. Later in the research the article from the Brookings Institute provided a contrast to other research because this one is an overview of all the benefits and negatives to financing with GARVEE Bonds as well as the history. Essentially it formulated in the thesis statement, but this article is a broad spectrum look at GARVEE Bonds. As a reference article it will be essential to checking the conclusions brought up. It is more of a look from the past to compare notes from the past seven years as this article was published in 2005. After the Brookings Institute article a few others were looked at that did not provide too much info in developing my argument, however did clarify several issues that will be discussed. One was prepared by the joint committee on taxation that was scheduled for a public hearing before the House Committee on Ways and Means. This work was not necessarily beneficial to the total scope of the project as it

relates mainly to tax exempt bonds and rules governing them. However, it also gave a good contrast with tax credit bonds and rules related to these bonds as compared to the previous articles and the rules on GARVEE Bonds. This article actually led me to a testimony, given by Jayetta Z. Hecker, the Director of Physical Infrastructure Issues, is before the Committee on Finance and Committee on Environment and Public Works in the US Senate. This will be discussed more specifically later but this article laid out the foundation for the past of transportation funding. Originally the idea was that these Bonds would be used essentially for developing nations or cities, so the article by, Patricia Clarke Annez, who is the Urban Advisor in the Transport and Urban Development Department at the World Bank, was essential. The thesis needed to establish how this would work in developing nations because when looking at what isn't working in Nevada it was good to get perspective of where essentially the state might have started from.

Throughout the print readings were several websites that will be discussed at the end of the background of the issue section, but mainly related to the use of GARVEE Bonds in the State of California. While Nevada is not on the same scale of revenue or capacity as the State of California they do share many of the concerns we have for road development in dealing with west coast expansion of commerce delivered through the northern part of the state. While researching how the State of California does infrastructure expansion and their use of GARVEE Bonds I found a chart from the Department of Transportation Federal Highway Authority. This chart was essential to the research as a comparison of current amount received to previous amounts of appropriations from the highway account. As Nevada and every other state pays into the account, the chart expresses the percentage to total that each state pays into the system as

well as how much they receive as a percentage and a total. It is separated by year 2010 and years 1957 to 2010 as a comparison. The next two print documents were published by the State of Nevada in 2006 and 2008 as official statements' from the governor's office of the tax money collected and bonds amount allocated for highway improvement. Unfortunately 2008 was the last year I was able to obtain the information, but was the first year of Governor Jim Gibbons. This subsequently is also where our economy started to dip into a recession and the tax bond revenue was down to \$129,970,000. (State of Nevada, 2008) Although it was planned to decrease the highway improvement revenue the state of the economy was turning south at this time. The demographic information as well as past taxes collection information was crucial in seeing what a negative downturn in the economy would do to our borrowing as a state. This report was considerably more in depth with a breakdown of the money received from transportation.

While looking through the libraries resources a former thesis written by Kelly Wilkin of the University of Nevada, Reno for her Master's of Science was brought up as a potential source. Her thesis was a formal evaluation of the prevalence, magnitude, and behavior of cost overruns in Nevada highway infrastructure construction projects. This paper was quite interesting and led to quite a bit of information that was used in the own project. The main focus is on how individual aspects of a project are skewed in costs and duration. However, looking at this information helped to determine the other costs associated with these highway construction projects that can be accounted for and many that aren't normally accounted for. The last print article needed to be discussed as the background of the issue was a series of briefing papers that were prepared for the National Surface Transportation Policy and Revenue Study Commission by the Mercator



Advisors LLC. This was an evaluation of innovative finance tools as transportation financing mechanisms. This group of advisors is recommending the use of GARVEE Bonds as one of their numerous policy tools that have been around for the past few decades. The main contrast that makes this article essential is the fact that it specifies for large, long-lived, non-revenue generating assets, like highway development for example. These papers established first-rate research and laid the foundation for a background the issue.

### **Debt Financing Instruments**

Grant Anticipated Revenue Vehicle Bonds or GARVEEs as they are referred to in the vaguest sense are securities issued as debt instruments when money comes from a source upfront before a project is started. (U.S. Department of Transportation, 2011) In the case of funding for transportation finance the anticipated funds come from Title 23 Federal-aid funding costs.

*“States can thus receive Federal-aid reimbursements for a wide array of debt-related costs incurred in connection with an eligible debt financing instrument, such as a bond, note, certificate, mortgage, or lease; the proceeds of which are used to fund a project eligible for assistance under Title 23. Each of these instruments is considered a GARVEE when backed by future Federal-aid highway funding, but most frequently, a bond is the debt instrument used. Specifically, as stated in Section 122 of Title 23, debt financing instrument-related costs eligible for Federal-aid reimbursement include interest payments, retirement of principal, and any other cost incidental to the sale of an eligible debt issue. The issuer may*

*be a state, political subdivision, or a public authority.”* (U.S. Department of Transportation, 2011)

GARVEEs essentially speed up construction times and help spread the cost of a transportation network over the lifespan of the highway as opposed to upfront solely in the construction period. (Wilkin, 2006) What states need to look at is if financing through debt upfront outweighs the plan currently in place using current receivables to fund highway development. The use of GARVEE Bonds is most appropriate for large, long-lived, non-revenue generating assets. GARVEEs can be used in conjunction with advanced construction under Title 23, Section 115 which allows states to begin a project even in the absence of sufficient Federal-aid obligation authority to cover the Federal share of project costs.

*“Prior to the NHS Act in 1995 that introduced GARVEEs, it would have been necessary to obligate the Federal share of debt service payments within the bounds of obligation authority available during the current authorization period. With the changes brought about by the NHS Act, it became possible to obligate Federal funds for debt service expenses over a longer period bond to fund a Federal-aid eligible project and annually convert the Federal share of the debt service payment as a reimbursable cost through the partial conversion of advance construction.”* (U.S. Department of Transportation, 2011)

There are four different types of GARVEE Bonds, Backstopped, Naked, Direct, and Indirect. Backstopped GARVEEs involve the pledge of a separate revenue source. (The Brookings Institute) These could come from sources such as a state’s gas tax,

general obligation authority, vehicle registration revenues, or toll revenues, to improve the creditworthiness of the bond. Naked GARVEE Bonds are non-recourse GARVEEs where the creditworthiness and payments due of the bond is dependent on future federal funds, thus making bond insurance a highly sought after commodity. (Puentes & Warren, 2005) This thesis refers solely to Direct GARVEE Bonds which use Federal assistance to directly reimburse the debt that is paid back to investors, and are permitted under Title 23, Section 122 federal –aid funding. While Indirect Bonds are not codified by Title 23, they are considered when financing is needed with anticipated revenues, but does not meet Federal-aid requirements, so it is reimbursed from state funding. This leaves Indirect GARVEE Bonds harder to issue because state legislatures need to appropriate funds for these construction projects. Table 1 shows the difference between the two bonds.

Table 1

*Direct vs. Indirect GARVEE Bonds***Direct GARVEE Bond vs. Indirect GARVEE Bond**

	Eligible Project	FHWA Approval	Regulations	Flexibility in Using Bond Proceeds	Interest and Issuance Costs Reimbursable
<b>Direct GARVEE Bond</b>	Federal	Yes	Federal	No - Bond proceeds used for specified projects(s)	Yes
<b>Indirect GARVEE Bond</b>	Federal and State	No	State	Yes - Bond proceeds used for any eligible project	No

Note. (US Department of Transportation, 2011)

### **Qualifications of GARVEE BOND Program**

Candidates for GARVEE financing are larger projects (or programs of eligible projects) that have the following characteristics:

- They are large enough to merit borrowing rather than pay-as-you-go grant funding, with the costs of delay outweighing the costs of financing. Other borrowing approaches may not be feasible or are limited in capacity;
- They do not have access to a revenue stream (such as local taxes or tolls) and other forms of repayment (such as state appropriations) are not feasible, which makes it difficult to securitize and create a secondary market for the bonds; and
- The sponsors (generally state DOTs) are willing to reserve a portion of future year Federal-aid highway funds to satisfy debt service requirements.

GARVEE proceeds may not be used as the non-Federal match toward a Federal-aid project.

(U.S Department of Transportation, 2011)

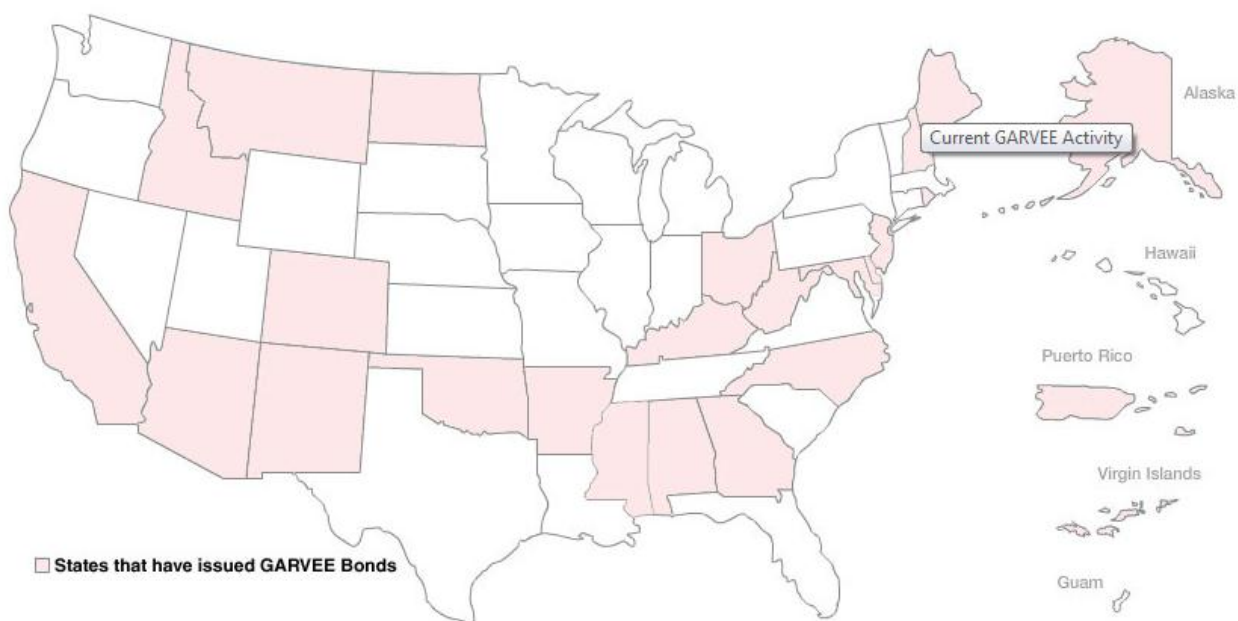
### Current GARVEE Activity Map

Currently there are 23 U.S. states as well as, the District of Columbia, Puerto Rico, and the Virgin Islands that have issued GARVEE Bonds as shown in Figure 1.

Figure 1

*Current GARVEE map as of December 31, 2011*

Current GARVEE Map as of December 31, 2011



Note. (U.S Department of Transportation, 2011)

For a current breakdown of each state by: maturity, issuing amount, insurer, rating, and project financed refer to Appendix A.

### California's use of GARVEE Bonds

The State of California was chosen for research in the thesis for several reasons. First, California shares a close proximity to the State of Nevada. Second, many of the large proposed projects needed in the state share highways with California. Third, many of the businesses established in the State of Nevada are California Based, but incorporated separately for tax benefits. Lastly, it provided the most available analysis on the use of GARVEE Bonds in my research. In the State of California projects are eligible under Title 23 of United States Code, but must also have environmental clearance and a completed project design to be allotted financing using GARVEE Bonds under the California Transportation Commission (CTC). California used Direct GARVEE Bonds. However state and/or local funds can be used for matching purposes outside the debt service. The appropriateness of a proposed project is determined through the State of California Code Section 14553.8. (See Section Statues, Subsection State of California) In the State of California GARVEE guidelines specify that:

*“The anticipated economic, safety, and other benefits of the project and its early construction will be included in considering and determining the appropriateness of GARVEE financing. In making this determination, the Department utilizes the Life-Cycle Benefit/Cost Evaluation Model provided by the Department's Division of Transportation Planning, Office of Transportation Economics.”*(California Department of Transportation, 2009)

California State Treasurer Bill Lockyer wrote an analysis of GARVEE Bonding Capacity for 2011. It is a written analysis for the CTC in compliance with provisions under Sections 14550 through 14555.9. The analyses shows bonding capacity for 2011

from \$1.81 to \$3.35 billion under varying market conditions. This analysis demonstrates a wide range of circumstances, including policy, revenues, and market factors that change capacity for GARVEE financing. Table 2 summarizes the range of assumptions used in the sensitivity analysis. With The results of the four analyses are found below in Table 3.

Table 2

*Four factor analyses*

Factors	Range of Assumptions
Final Maturity	Two scenarios: at 6 and 12 years from date of issuance
Assumed Interest Rates	Two scenarios: one at 'AA' MMD market rates on March 1, 2011 and one at 100 basis points above the March 1, 2011 'AA' MMD market rates

Note. (Martinovich, 2007)

Table 3

*Summary of Results for GARVEE Bonding Capacity Sensitivity Analysis.*

Summary of Results for GARVEE Bonding Capacity Sensitivity Analyses		
Final Maturity Amortization Period	Base Case March 1, 2011 'AA' MMD Scale	Market Sensitivity Case Base Case plus 100 Basis Points
6 years	\$1.87 billion	\$1.81 billion
12 years	\$3.35 billion	\$3.16 billion

Note. (Martinovich, 2007)

Results show that the capacity for the State of California's future use of debt financing with GARVEE Bonds depends on several factors including but not limited to, market conditions, maturity structure of the bonds, and revenues from federal matching funds. (See Appendix B) As noted in the Summary of Assumptions for GARVEE Bonding Capacity Sensitivity Analyses in Appendix B the market conditions are broken down by the base case and a market sensitivity case.

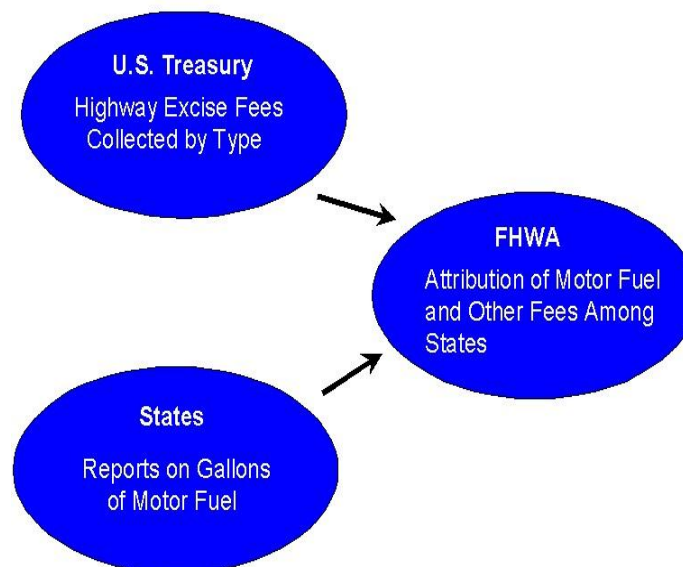
## Statistics of Federal Highway Account

Each year highway users in Nevada and California pay billions of dollars in highway excise taxes that go to the Highway Trust Fund, but most of the money actually comes from large corporations. Each State is guaranteed at least 92% of its highway user percentage attributions to the Highway Account of the Highway Trust Fund. Figure 2 what components make up the Federal Highway Account. With a breakdown of what fees go into the Highway Account can be seen below in Table 4.

Figure 2

### *Motor Fuel Attribution*

## Motor Fuel Attribution



Note. (US Department of Transportation, 2011)



Table 4

*Net Highway Account Revenues for 2010*

<b>Fee Category</b>	<b>Amount (\$ Millions)</b>
Gasoline	\$20,320
Diesel and Special Fuel	\$7,063
Truck and Trailer Sales	\$1,562
Truck Tires	\$318
Heavy Vehicle Use	\$887
Interest and Other	\$14,742
<b>TOTAL</b>	<b>\$44,892</b>

Note. (US Department of Transportation, 2011)

One issue that does need to be discussed before we can specifically dive into how much Nevada received in its portion of Highway Funds is how the Highway Account Revenues are attributed to the States. The Federal Highway Authority has developed a set of procedures for allocating Highway Account revenues to each state. It is as follows:

*“Attribution relies on state reports of the consumption of each type of motor fuel: gasoline, gasohol, special fuels (mostly diesel), and other alternative fuels. States report on fully taxed fuels, exempt sales, partially exempt sales, full and partial refunds, and fuels taxed at reduced rates. Attributions are made separately for gasoline and gasohol, based predominantly on the state reports. FHWA includes government use of gasoline in gasoline attributions, but excludes government use of diesel fuel in diesel attributions. There are federal fees assessed on heavy vehicles which are not fuel taxes. These include a tax of 12 percent on the retail prices of truck sales for vehicles with over 33,000 pounds gross vehicle weight, and for truck trailer sales of over 26,000 pounds gross vehicle weight; a*

*graduated tax on heavy tires of 15 cents per pound over 40 pounds, plus 30 cents per pound over 70 pounds, plus 50 cents per pound over 90 pounds. A heavy vehicle use tax is applied to trucks of 55,000 pounds and over gross vehicle weight, at \$100 plus \$22 dollars per 1,000 pounds in excess of 55,000 pounds, with a maximum of \$550 per truck. These non-fuel based fees are attributed to the states in the same proportions as special fuels are attributed to the individual states.” (US Department of Transportation, 2011)*

The State of Nevada in 2010 paid \$251,430,000 in taxes that went into Highway Trust Fund, which totaled \$30,174,795. This represents a .833% of the total amount collect in the Highway Trust Fund. While Nevada only paid .833% of the total amount it was distributed \$410,421,000 or .945% of total allocations of \$43,433,788. This gives Nevada a reasonable apportionment to allocation ratio of 1.63. (Appendix C) The way this system is classified is a pay-as-you-go system in which you receive money year after year from what is allocated. (US Department of Transportation, 2010)

### **Independent Studies on Use of GARVEE Bonds**

According to a study done by the United States General Accounting Office (GAO) Testimony before the Committee on Finance and Committee on Environment and Public Works in the U.S. Senate, FHWA's innovative finance techniques provide states with greater flexibility when deciding how to put together project finance. (General Accounting Office) By using alternative financing mechanism, states have been able to finance large transportation projects that pay-as-you-go financing would not have been sufficient for. For example:

*“Faced with the challenge of Interstate highway needs of over \$1.0 billion, the state of Arkansas determined that GARVEE bonds would make up for the lack of available funding. In June 1999, Arkansas voters approved the issuance of \$575 million in GARVEE bonds to help finance this reconstruction on an accelerated schedule. The state will use future federal funds, together with the required state matching funds and the proceeds from a diesel fuel tax increase, to retire the bonds. The GARVEE bonds allow Arkansas to rebuild approximately 380 miles, or 60 percent of its total Interstate miles, within 5 years.”* (United States General Accounting Office, 2002)

However the GAO found in their research that State Department of Transportation's are not always willing to use the alternative financing mechanisms because they have a philosophy against committing federal aid funding to debt services. While the State of Nevada does, not all states have the provisions of authority to use these financing mechanisms such as GARVEE Bonds. Mercator Advisors LLC came to a similar conclusion in a commission briefing paper published in 2007 where they

established that leveraging tools such as GARVEE Bonds can play an important role when generating cash up front. As show below in Table 5, from 1995-2006 GARVEE Bond usage was just under \$5.7 billion dollars.

Table 5

*Volume of Highway “Innovative Finance” Activity (since 1995, \$ in millions)*

GARVEE Bonds	\$ 5,759
State Infrastructure Banks	5,068
TIFIA / Other Credit Assistance	2,543
<b>TOTAL</b>	<b>\$ 13,370</b>

Note. (Mercator Advisors LLC, 2007)

The Mercator Advisors also recognized that while \$13 billion in context may seem like a lot, the aggregate amount of highway capital investment from federal, state and local sources during that same period was estimated at \$661 billion. The conclusion they drew also reflected a study sponsored by the U.S. Chamber of Commerce, which sought to analyze how best to fund surface transportation. It was reported that to maintain the nation’s highways’ would cost roughly \$50 billion annually. To improve upon the transit system would outlay in excess of \$100 billion (Merchant Advisors LLC, 2007). Multiple studies have shown that alternative financing in the future for various expensive infrastructure projects will be necessary.

#### **Legal Cases Involving GARVEE Bonds**

While most studies show the numbers on GARVEE Bond usage, the legal ramifications of using such Bonds was established in a case from the Oklahoma City

University School of Law, which does not find legal recourse to implementing such bonds, but as to how they are implemented. In 2002, the Oklahoma Supreme Court denied the Department of Transportation's application for approval of \$100 million GARVEE Bond. Oklahoma legislature provided itself with an escape hatch in the event the court would strike down the use of the bonds. The court required a review by a separate Council of Bond Oversight (CBO) and state legislature quickly filled those positions. The Question as stated in the Bond case is one of separation of powers. In 1987, Oklahoma legislature reformed the process of issuing bonds by state government with "significant systematic oversight." The legislature established a ruling that a review by both executive and legislative branches would be necessary instead of purely on executive offices. They established committees that violated the state constitution, multiple entities, and members of the legislature were unconstitutionally exercising executive powers. (Spiropoulos, 2003) But, the problem does not stop there, what if private companies were issuing these same tax exempt bonds in the hopes to acquire financing for large private highways? Tax- Exempt Bonds is where interest is paid on the loans is excluded from Federal Income Taxes. Because it is non-taxable, investor will take lower rates of interests on a comparable taxable investment.

*"Generally, governmental bonds are not subject to restrictions that apply to bonds used to finance private activities. For example, governmental bonds are not subject to issuance cost, maturity, and annual volume limitations that generally apply to qualified private activity bonds."* (US Congress, 2008)

## Nevada

The Nevada Department of Transportation provided a Department Summary of Programs relating to Nevada Highway Infrastructure Development with high priority in fiscal year 2012. These numbers provided by Susan Martinovich, Director of Nevada Department of Transportation, shows Nevada's ongoing federal and state mandated needs of \$659,039,805 that come from the Highway Fund, and \$479,746,554 the come from other sources. (Martinovich, 2011) None of this money comes from The State of Nevada's General Fund. (Appendix D) For a complete breakdown of Appendix D please refer to Nevada DOT Department Breakdown. (Appendix E)

Finally The Nevada Highway Users Coalition, which is a statewide group of group of citizens, business leaders, labor unions, elected officials and community organizations concerned about Nevada's transportation infrastructure, provides a graph and chart breakdown of estimated highway fund needs versus revenue for fiscal years 2009-2016. (See Figure 2) While the revenue for the State of Nevada shows considerable gains each year, the costs for major projects is growing exponentially. While this graph provides in general terms what is needed based on a visual approach they also provide a chart of a projected breakdown of these costs year over year, and the order of completion. (See Table 6)

Table 6

## Estimated Highway Fund Needs and Revenue

Estimated Highway Fund Needs and Revenue Fiscal Years 2009 - 2016 (Millions of Dollars by Year of Revenue/Expenditure)									
		2009	2010	2011	2012	2013	2014	2015	2016
<b>Major Projects</b>	<b>Total Estimated Cost*</b>								
I-15 North (Design/Build) - US95 to Craig	169	107	62						
I-15 Express Lanes - Bellway to Sahara***	30	30							
I-15 South (Phase I) - SR160 to Tropicana***	210 to 250	42 to 50	84 to 100	84 to 100					
US95 NW (Package 1) - Rainbow to Ann	130 to 175	26 to 35	52 to 70	52 to 70					
US395 Northbound - Moana to I-80	80 to 100	16 to 20	32 to 40	32 to 40					
Boulder City (Phase I)	180 to 230	18 to 23	54 to 69	54 to 69	54 to 69				
I-15 NEON (Phase I) - I-15 Direct Connections to US95***	545 to 655		55 to 66	109 to 131	109 to 131	109 to 131	109 to 131	55 to 66	
I-15 South (Phase II) - Sloan to SR160	135 to 160		27 to 32	54 to 64	54 to 64				
I-80 Early Action Projects - Robb to Vista	180 to 225		18 to 23	54 to 68	54 to 68	54 to 68			
I-15 North (Phase II) - Craig to Speedway	105 to 140			21 to 28	42 to 56	42 to 56			
US95/CC215 - System to System Interchange	90 to 150			18 to 30	36 to 60	36 to 60			
US395 - McCarran to Golden Valley	70 to 95			14 to 19	28 to 38	28 to 38			
I-15 NEON (Phase II) - MLK Connector	345 to 465				35 to 47	69 to 93	86 to 116	86 to 116	69 to 93
I-15/CC215 North - System to System Interchange	130 to 160				13 to 16	39 to 48	39 to 48	39 to 48	
US95 NW (Package 2) - Ann to Kyle Canyon	140 to 195				14 to 20	42 to 59	42 to 59	42 to 59	
I-515 (Phase I) - I-15 to Maryland Parkway	790 to 1070				79 to 107	178 to 241	178 to 241	178 to 241	178 to 241
US395 CC Freeway (Phase IIB) - Fairview to Carson St.	140 to 170				28 to 34	56 to 68	56 to 68		
Pyramid Highway - Nugget to De La Plata	450 to 600				45 to 60	90 to 120	113 to 150	113 to 150	90 to 120
I-15 North (Phase III) - Speedway to Apex	115 to 140					12 to 14	35 to 42	35 to 42	35 to 42
I-15 South (Phase III) - Stateline to Sloan	110 to 140						22 to 28	44 to 56	44 to 56
Major Projects - Subtotal	4144 to 5319	239 to 265	384 to 462	492 to 619	591 to 770	755 to 996	680 to 883	592 to 778	416 to 552
Current Construction Obligations		144	150	150					
<b>Preservation Needs</b>		335	290	300	309	319	330	340	351
<b>NDOT Expenditures and Other Projects**</b>		284	304	324	344	364	384	404	424
<b>Other Agencies &amp; Bond Obligation</b>									
Other Agencies		229	251	245	245	254	265	275	286
Current Bond Obligation		89	89	84	81	81	70	63	63
<b>Total Annual Needs</b>		1320 to 1346	1469 to 1547	1595 to 1722	1569 to 1748	1773 to 2014	1728 to 1931	1674 to 1860	1540 to 1676
<b>Annual Revenue into the Highway Fund (Federal and State)***</b>		1035	892	903	834	852	870	888	957
<b>Annual Deficit</b>		285 to 311	577 to 655	692 to 819	735 to 914	921 to 1162	858 to 1061	786 to 972	583 to 719
Estimated Annual Revenue Needed to Support Bonding****		22 to 24	68 to 76	124 to 142	182 to 215	256 to 307	324 to 392	386 to 469	432 to 525
<b>Cumulative Deficit</b>		285 to 311	862 to 966	1554 to 1785	2289 to 2699	3210 to 3861	4068 to 4922	4854 to 5894	5437 to 6613

Estimated project delivery schedules are based on current available information. Funding ability, environmental issues, and/or right-of-way impacts may impact schedule and cost.

\* Estimated cost includes design, right of way, and construction by year of expenditure.

\*\* Includes all other NDOT expenditures including, but not limited to, salaries, operating, and equipment. Other projects include Safety, Bridge, Enhancement, Economic Development, District Contracts, and Stewardship.

\*\*\* Includes up to \$100 million per year from LVCVA (Fiscal Years 2009, 2010, and 2011) and excludes any other 2007 AB595 revenue.

\*\*\*\* Assumes a level payment, 5% simple interest, and does not take into account coverage ratios. Assumes a series of 20-year bonds with a reliable revenue source to fund the bond payments through 2035.

Note. (Nevada Highway User Coalition, 2008)

## Conclusion

While GARVEE are very innovative financial tools, they can also be used as a tool of destruction. The future role of the federal government in transportation cannot be used as a negotiating point when state and federal level legislatures come to the table. The federal government could very well walk away from these loans and leave state billions in debt with no way to finance projects that at that point will have already been built. I do feel caution should be used if the GARVEE Bond is being used on a project that might normally have difficulty getting approved. Laid out in Table 7 are the pros and cons established through the research about the use of GARVEE Bonds. (See Table 7) Future research needs to be done before they are implemented in a more concise fashion in the State of Nevada. The state legislature should detail out state guidelines that correspond with federal guidelines on the use of the GARVEE Bonds and how to apply them to projects. State DOTs and transit agencies need explicit knowledge of how to implement these programs. The State of Nevada Legislature should establish the criteria for usages. Understanding their own state budget and constraints, they should be setting terms of the bonds and provisions for backstops. While setting strict guidelines on what projects necessitate the use of debt related financing. Finally, I feel that state and federal government should be helping the regional transit authorities such as the MPOs or Metropolitan Planning Organization discussed earlier to receive these types debt related financing when factoring their plans for new projects. By adhering to these recommendations significant changes to Nevada's infrastructure would be forthcoming and implemented in proper fashion.



## References

- American Society of Civil Engineers. (2011). *Report card for America's infrastructure: Nevada*. Retrieved from website: <http://www.infrastructurereportcard.org/state-page/nevada>.
- California Department of Transportation, Office of Innovative Finance. (2009). *Grant anticipation revenue vehicles (garvee) bond program*. Retrieved from website: <http://www.dot.ca.gov/hq/innovfinance/garveebond.htm>
- Martinovich, S. State of Nevada, Department of Administration Division of Budget and Planning. (2011). *Department summary: Department of transportation*. Retrieved from website: <http://nevadabudget.org/index.php/publications/executive-budget/318-2011-2013-executive-budget>
- Mercator Advisors LLC. (2007). Evaluation of innovative finance tools as a transportation financing mechanism. *Commission Briefing Paper, 5A(13)*, 1-10.
- Nevada Highway User Coalition, (2008). *Estimated highway fund needs and revenue*. Retrieved from website: [http://www.fixnrroads.com/pdf/HighwayFundNeedsvRevenue\\_2.pdf](http://www.fixnrroads.com/pdf/HighwayFundNeedsvRevenue_2.pdf)
- Puentes, D., & Warren, D. The Brookings Institute, Metropolitan Policy Program. (2005). *Today's roads with tomorrow's dollars: Using garvee bonds to finance transportation projects*.
- Spiropolous, Andrew C. (2003). *Constitutional law: The garvee bonds case and executive power*. Manuscript submitted for publication, School of Law, Oklahoma City University,

State of Nevada, (2008). *State of Nevada highway improvement revenue (motor vehicle fuel tax) bonds series 2008*. Carson City:

US Congress, Joint Committee on Taxation. (2008). *Present law and issues related to infrastructure finance*

US Department of Transportation, Federal Debt Financing Tools. (2011). *Grant anticipation revenue vehicles (garvees)*. Retrieved from website:  
[http://www.fhwa.dot.gov/ipd/finance/tools\\_programs/federal\\_debt\\_financing/garvees/qualified\\_projects.htm](http://www.fhwa.dot.gov/ipd/finance/tools_programs/federal_debt_financing/garvees/qualified_projects.htm)

US Department of Transportation, Federal Highway Authority. (2010). *Comparison of federal highway trust fund highway account receipts attributable to the states and federal-aid apportionments and allocations from the highway account fiscal years 1957 - 2010*. Retrieved from website:  
<http://www.fhwa.dot.gov/policyinformation/statistics/2010/pdf/fe221.pdf>

US General Accounting Office. (2002). *Transportation infrastructure: Alternative financing mechanism for surface transportation*

Wilkin, K. R. (2006). *Cost estimation performance of Nevada highway infrastructure construction*. (Master's thesis, University of Nevada, Reno).

Table 7

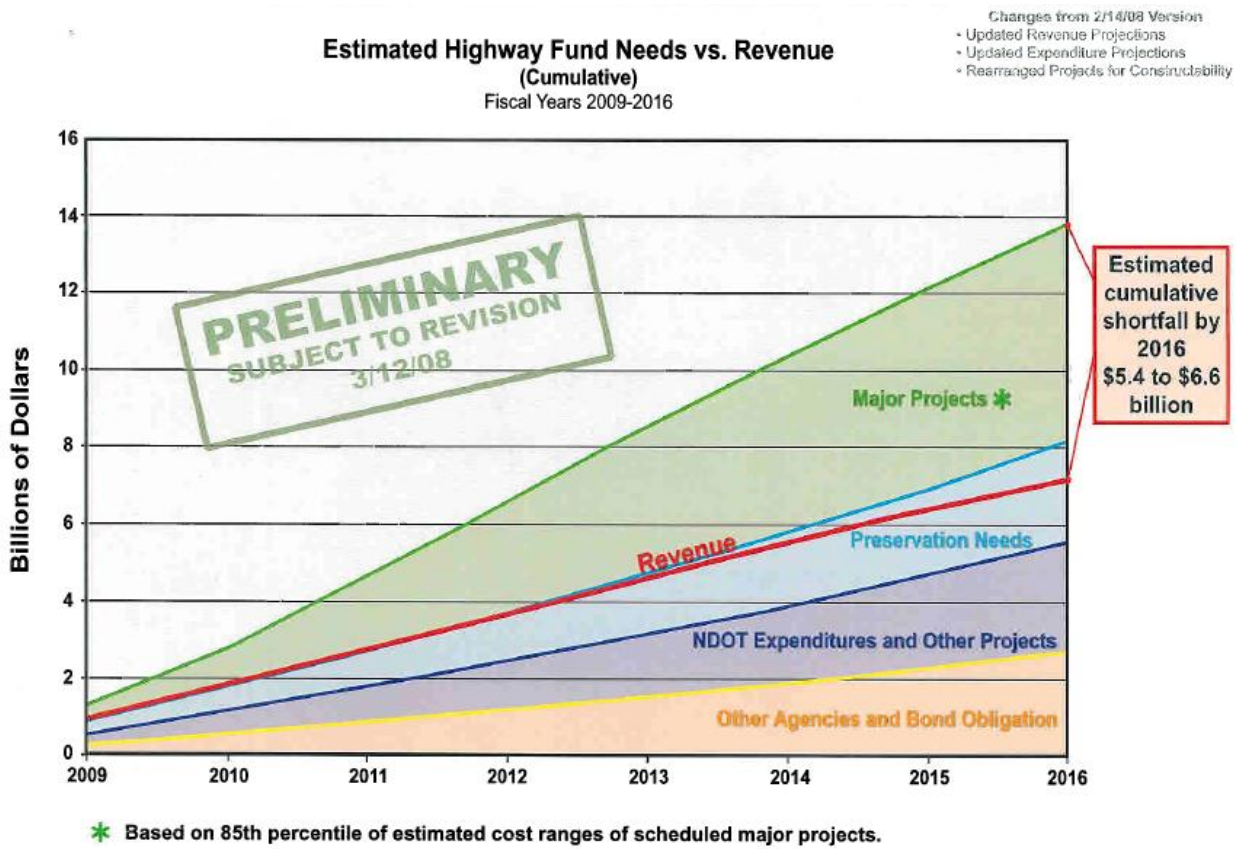
*Pros and Cons of GARVEE Bonds*

Positives	Negatives
<p><b>1. Accelerated project delivery</b> GARVEEs allow projects to get built quicker as opposed to pay as you go financing. Upfront financing, not pay-as-you-go.</p>	<p><b>1. Interest and other debt related costs</b> GARVEE Bonds like traditional bonds do not produce revenue and add to debt. Increase the size of project now while decreasing them later when paying off debt.</p>
<p><b>2. Speeding up projects can result in cost savings</b> Real estate, materials, and services purchased sooner, savings can accrue by short-cutting inflation costs associated with the project.</p>	<p><b>2. Risks regarding federal reauthorization</b> The most distinguishing feature of GARVEEs is that investors are accepting the risk that Congress will not continue to authorize highway funds for the full term of the bonds. If for any reason, federal dollars do not pay off the loan, states are responsible for interest payments.</p>
<p><b>3. GARVEEs can fund large project which normally would require a variety of financing tools</b> While being self explanatory it is worth noting that the scope of current projects is going beyond traditional highway investments.</p>	<p><b>3. Used to avoid taxing or other traditional revenue sources</b> Most States find it preferable to issue GARVEEs as opposed to raising gas taxes and debates in public referendums.</p>
<p><b>4. Possible avoidance of state debt limits</b> Because GARVEEs have their own source of repayment, anticipated federal funds, they do not often count against states statutory limits on how much debt they can accumulate as with general debt obligations.</p>	<p><b>4. GARVEEs are generally only useful for states</b> Metropolitan planning organizations (MPOs) are not able to use GARVEEs even though their plans are usually what are chosen.</p>
<p><b>5. Avoiding bond referenda</b> Unlike municipal bonds for transportation, in many states GARVEE issuances are not subject to public referendum.</p>	<p><b>5. GARVEEs are sometimes thought to make bad projects better</b> Securing funding should not preclude proper planning. A good project will provide tangible benefits that traditional financing cannot.</p>

(Puentes &amp; Warren, 2007)

**Figure 3**

*Estimated Highway Fund Needs vs. Revenue*



## Appendix A

### Breakdown of State Use of GARVEE Bonds

State	Number of Issue	Issues (Millions)	Final Maturity	Rating Moody's/S&P/Fitch	Project Financed	Insurer	Backstop
<b>Alabama</b>							
<a href="#">back to top</a>							
	Apr-02	200.00	2017	Aa3/Aa	County Bridge Program	MBIA	No Backstop
<b>Alaska</b>							
<a href="#">back to top</a>							
	Apr-03	102.81	2021	Aa2/AA/AA	Eight Road and Bridge Projects	FGIC	No Backstop
<b>Arizona</b>							
<a href="#">back to top</a>							
	Jun-00	39.41	2004	Aa3/AA-IAA-		MBIA	
	May-01	142.89	2008	Aa3/AA-IAA-		None	Funds from Federal and State Highway and Road Sub-Account (Certain sub-account transfers. 2001 and 2004 Issues Insured.)
(July 03 excludes \$26.3 million in proceeds used to refund outstanding June 2000 bonds)	Jul-03	122.70	2015	Aa3/AA-IAA-	Maricopa freeway projects	None	
	May-04	51.00	2014	Aa3/AA-IAA		Ambac	
	Oct-04	104.39	2016	Aa3/AA-IAA		Ambac	
	Dec-07	68.00	2014	Aa3/AA-IAA		None	
	Apr-09	55.42	2016	Aa3/AA-IAA	Controlled-access highway projects	None	No Backstop
	Jan-11	158.59	2026	Aa2/AA/AA	Controlled-access highway projects and State routes	None	No Backstop
<b>Arkansas</b>							
<a href="#">back to top</a>							
(exclude \$253.225M, S2010 Refunding Bonds)	Mar-00	175.00	2010	Aa2/AA/na		None	Full faith and credit of state, plus state motor fuel taxes.
	May-01	185.00	2012	Aa2/AA/na	Interstate Highways	None	
	Jul-02	215.00	2013	Aa2/AA/na		None	
<b>California</b>							
<a href="#">back to top</a>							
	Mar-04	614.90	2015	Aa3/AA-AA-	Eight Road Projects	FGIC, MBIA, Ambac	Insured except 2005 series
	Oct-08	97.64	2020	Aa3/AA-AA-	Eight Road Projects	None	2008 Issue not Insured
<b>Colorado</b>							
<a href="#">back to top</a>							
(Colorado DOT Issued \$414.9 million in April 2004, which was a combined new money and refunding issue.)	May-00	524.36	2015	Aa3/AA/AA		Ambac	
	Apr-01	506.37	2015	Aa3/AA/AA		MBIA	Federal highway funds as allocated annually by CDOT;
	Aug-02	400.16	2016	Aa3/AA/AA	Any project financed wholly or in part by Federal funds	MBIA	Other state funds (Sales Taxes).
	Aug-03	100.00	2016	Aa3/AA/AA		Ambac	
	Apr-04	134.60	2016	Aa3/AA/AA		FGIC	
<b>Delaware</b>							
<a href="#">back to top</a>							
	May-10	113.49	2025	Aa2/AA/-	The US Route 301	None	Federal highway funds allocated annually by DEDOT
<b>District of Columbia</b>							
<a href="#">back to top</a>							
	Feb-11	82.61	2026	Aa2/AA	11th Street Bridges Replacement	None	Includes those funds held in the Transportation Infrastructure Improvement Fund

Georgia							
<a href="#">back to top</a>							
	Jul-06	90.00	2018	Aa3/AAA/AAA		MBIA	
	Jul-06	360.00	2018	Aa3/AA-IAA-		MBIA	
	Aug-06	150.00	2008	P-1/A-1+/F1+	Various Highway Projects	State Street Bank	No Backstop
	Mar-08	600.00	2020	Aa3/AA-IAA-		FSA	
	Feb-09	600.00	2021	Aa3/AA-IAA-		None	
Idaho							
<a href="#">back to top</a>							
	May-06	194.34	2024	Aa3/A+		MBIA	No Backstop
	Mar-08	173.04	2026	Aa3/A+	The six corridors in GARVEE Program: US-95 Garwood to Sagle, US95 Worley to Setters, SH-16, I-84 to South Emmett, I-84 Caldwell to Meridian, I-84 Orchard to Isaacs Canyon, US-30 McCammon to Lava Hot Springs.	Assured	
	Jan-09	172.21	2026	Aa3/A+		None	
	Jan-10	12.45	2017	Aa3/A+		None	
	Jan-10	71.84	2028	Aa3/A+		None	
	Jul-11	72.93	2029	Aa2/NR/A+		None	
Kentucky							
<a href="#">back to top</a>							
	May-05	139.64	2017	Aa3 / AA-IAA-	Three interstate widening and rehabilitation projects	MBIA	No Backstop
	Sep-07	277.91	2019	Aa3 / AA-IAA-		Ambac	
	Feb-10	89.71	2022	AA-IAa3/AA	Louisville Southern Indiana Ohio River Bridges Project		No Backstop
Maine							
<a href="#">back to top</a>							
	Dec-04	48.40	2015	Aa3/NA/AA-	Replacement of the Waldo-Hancock Bridge	Ambac	No Backstop
	Sep-08	50.00	2020	Aa3/NA/AA-	Replacement of the Waldo-Hancock Bridge	None	No Backstop
	Nov-10	50.00	2022	Aa2/NR/AA-	Veterans Memorial Bridge Replacement	None	No Backstop
Maryland							
<a href="#">back to top</a>							
	May-07	325.00	2019	Aa2/AAA/AA	Inter County Connector	None	Irrevocable pledge of state tax revenues deposited in the state's transportation Trust Fund.
	Dec-08	425.00	2020	Aa2/AAA/AA	Inter County Connector	None	Irrevocable pledge of state tax revenues deposited in the state's transportation Trust Fund.

Mississippi							
<a href="#">back to top</a>							
	May-99	200.00	2008	Aa1/AAA/AAA	Highway Projects	None	Motor Fuel Tax
	Jan-05	45.00	2016	Aaa/AAA	Highway Projects (Tunica County)	FGIC	No Backstop
	Oct-05	32.00	2017	Aaa/AAA	Highway Projects (City of Laurel)	FGIC	No Backstop
	Oct-05	102.00	2017	Aaa/AAA	Highway Projects (Harrison County)	FGIC	No Backstop
	Sep-06	145.00	2019	Aaa/AAA	Highway Projects (Madison County)	FGIC	No Backstop
	Oct-07	52.00	2017	Aaa/AAA	Highway Projects (Marshall County)	AMBAC	No Backstop
	Oct-07	31.00	2017	Aaa/AAA	Highway Projects (Desoto County)	AMBAC	No Backstop
	Aug-09	9.49	2014	A1/AA-/NR	Highway Projects (Harrison County)	None	No Backstop
	Aug-09	63.30	2035	A1/AA-/NR	Highway Projects (Harrison County)	None	No Backstop
	Mar-10	24.28	2014	A1/AA-/NR	Highway Projects (Desoto County)	None	No Backstop
	Mar-10	136.78	2040	A1/AA-/NR	Highway Projects (Desoto County)	None	No Backstop
	Jun-10	50.00	2012	A-1/P-1	MSDOT Highway Projects	LOC, B&A Bank	No Backstop
	Mar-11	17.22	2018	Hancock Bank	Private Placements		Private Placements
Montana							
<a href="#">back to top</a>							
	Apr-05	122.75	2020	Aa3/A+	44 miles of US 93 Improvements	MBIA	No backstop
	Jun-08	44.67	2023	Aa3/A+		None	No backstop
New Hampshire							
<a href="#">back to top</a>							
	Nov-10	80.00	2023	Aa2/AA-	I-93	None	No Backstop
New Jersey							
<a href="#">back to top</a>							
	May-06	131.56	2018	A1/A-	Route 52 Causeway Replacement Contract Project	FGIC	No Backstop
New Mexico							
	Sep-98	100.23	2015	A2/A/na	New Mexico SR 44; US 70 Corridor Reconstruction	Ambac	No backstop
	Feb-01	18.54	2011	A2/A/na	New Mexico SR 44; US 70 Corridor Reconstruction	Ambac	No backstop
North Carolina							
<a href="#">back to top</a>							
	Sep-07	287.57	2019	Aa3/AA-/AA-	Portions of 38 Construction Projects	MBIA	No Backstop
	Jul-09	242.50	2021	Aa3/AA-/AA-	Group (44) Projects	None	No Backstop
	Dec-11	145.54	2023	Aa2/AA/AA-	Monroe Connector System	None	No Backstop
North Dakota							
<a href="#">back to top</a>							
	Aug-05	51.45	2020	AA1/AA/na	Highway and bridge projects	FSA	State Highway Fund

Ohio							
<a href="#">back to top</a>							
	May-98	70.00	2007	Aa2/AA-IAA-		None	
	Aug-99	20.00	2008	Aa2/AA-IAA-		None	
	Sep-01	100.00	2009	Aa2/AA-IAA-		None	
	Sep-02	135.00	2010	Aa2/AA-IAA-	Various projects including: Spring-Sandusky and Maumee river improvements	None	
	Jan-04	113.77	2011	Aa2/AA-IAA-		None	No Backstop
	Jan-06	99.27	2015	Aa2/AA-IAA-		MBIA	
	Sep-06	180.00	2016	Aa2/AA-IAA-		MBIA	
	Nov-07	210.00	2017	Aa2/AA-IAA-		FSA	
	Oct-08	375.00	2020	Aa2/AA-IAA-		None	
	May-10	215.00	2021	Aa1/AA-IAA-	State Infrastructure Projects	None	No Backstop
	Dec-10	230.00	2018	Aa1/AA-IAA-	State Infrastructure Projects	None	No Backstop
Oklahoma							
<a href="#">back to top</a>							
	Mar-04	47.58	2018	Aa3/na/A+		None	
(With premiums on net proceeds worth \$50 million)	Aug-05	48.88	2020	Aa3/na/A+	Projects in 12 corridors	Ambac	No Backstop
	Mar-07	95.68	2022	Aa3/na/A+		MBIA	
	Nov-08	98.23	2023	Aa3/na/A+		None	
Puerto Rico							
<a href="#">back to top</a>							
	Aug-04	139.88	2021	A2/A/na	Various Transportation Projects	MBIA	No Backstop
Rhode Island							
<a href="#">back to top</a>							
	Nov-03	216.61	2015	Aa3/A+/AA-	Freeway, Bridge and Freight Rail Improvement Projects	FSA	
	Feb-06	184.62	2018	Aa3/A+/AA-		FGIC	No Backstop
	Mar-09	169.40	2021	Aa3/A+/AA-		Assured	
Virgin Islands							
<a href="#">back to top</a>							
	Oct-02	20.80	2009	na/na/BBB	Enighed Pond Port Project and Red Hook Passenger Terminal Building	FSA	No Backstop
West Virginia							
<a href="#">back to top</a>							
	Oct-06	75.97	2015	Aa3/AA-ina	Route 35 Enhancements	FSA	
	Apr-07	33.19	2015	Aa3/AA-ina		FSA	No Backstop
	Mar-09	76.84	2015	Aa3/AA-ina		None	
<b>Total</b>		<b>13,185.50</b>					



## Appendix B

### *Assumptions for GARVEE Bonding Capacity Sensitivity Analyses*

#### DETAILED ASSUMPTIONS FOR SENSITIVITY ANALYSES

Summary of Assumptions for GARVEE Bonding Capacity Sensitivity Analyses		
Base Case – Current Market Conditions		
Factors	Assumptions	Comments
Final Maturity	6 and 12 years	Analyses run at each final maturity listed at left.
Interest Rates	2.01% and 2.91%	Rates indicated relate to each respective final maturity above; listed rates represent the weighted average coupon for a bond issue sizing with level annual debt service.
Annual Revenues	\$2,794,304,282.57	The Treasurer may not authorize the issuance of the bonds if the annual debt service on all outstanding GARVEE obligations would exceed 15 percent of the State's historical annual deposits in the State Highway Account from federal funding.

Market Sensitivity Case – Alternative Market Conditions		
Factors	Assumptions	Comments
Final Maturity	6 and 12 years	Analyses run at each final maturity listed at left.
Interest Rates	3.01% and 3.91%	Rates indicated relate to each respective final maturity above; listed rates represent the weighted average coupon for a bond issue sizing with level annual debt service.
Annual Revenues	\$2,794,304,282.57	The Treasurer may not authorize the issuance of the bonds if the annual debt service on all outstanding GARVEE obligations would exceed 15 percent of the State's historical annual deposits in the State Highway Account from federal funding.

## Appendix C

## Comparison of Federal Highway Trust Fund Account Receipts Allocations

COMPARISON OF FEDERAL HIGHWAY TRUST FUND HIGHWAY ACCOUNT RECEIPTS ATTRIBUTABLE TO THE STATES AND FEDERAL-AID APPORTIONMENTS AND ALLOCATIONS FROM THE HIGHWAY ACCOUNT 1 FISCAL YEARS 1957 - 2010

STATE	PAYMENTS INTO THE FUND 2/				APPORTIONMENTS AND ALLOCATIONS FROM THE FUND 3/				RATIO OF APPORTIONMENTS AND ALLOCATIONS TO PAYMENTS	
	FISCAL YEAR 2010	PERCENT OF TOTAL	CUMULATED SINCE 7-1-56	PERCENT OF TOTAL	FISCAL YEAR 2010	PERCENT OF TOTAL	CUMULATED SINCE 7-1-56	PERCENT OF TOTAL	FISCAL YEAR 2010	CUMULATED SINCE 7-1-56
	(THOUSANDS OF DOLLARS)									
Alabama	579,307	1.920	14,492,310	1.973	633,407	1.919	16,631,096	1.964	1.44	1.15
Alaska	115,125	0.382	1,742,898	0.237	604,383	1.392	10,553,354	1.246	5.25	6.06
Arizona	595,946	1.975	12,740,591	1.734	610,753	1.897	13,777,721	1.627	1.36	1.08
Arkansas	380,384	1.261	9,604,776	1.307	577,539	1.330	10,665,964	1.259	1.52	1.11
California	2,990,437	9.910	74,574,207	10.150	3,999,691	9.209	76,923,483	9.062	1.34	1.03
Colorado	461,516	1.529	10,007,514	1.362	598,641	1.378	11,663,319	1.377	1.30	1.17
Connecticut	301,142	0.998	7,940,276	1.081	553,993	1.275	13,384,859	1.580	1.84	1.59
Delaware	53,451	0.277	2,056,698	0.280	280,054	0.461	3,513,223	0.415	2.40	1.71
Dist. of Col.	22,491	0.075	964,362	0.131	172,458	0.397	4,248,437	0.502	7.67	4.41
Florida	1,590,250	5.270	36,261,335	4.935	2,062,252	4.748	36,268,719	4.262	1.30	1.00
Georgia	1,067,167	3.537	26,059,048	3.547	1,433,381	3.300	25,602,003	3.023	1.34	0.98
Hawaii	80,690	0.267	1,872,896	0.255	199,864	0.450	5,564,606	0.657	2.48	2.97
Idaho	162,845	0.540	3,816,756	0.510	311,107	0.730	6,382,555	0.754	1.97	1.67
Illinois	1,120,449	3.713	28,137,714	3.830	1,527,179	3.516	31,049,482	3.666	1.36	1.10
Indiana	763,887	2.532	19,628,648	2.672	1,042,196	2.400	18,650,550	2.202	1.36	0.95
Iowa	401,067	1.329	9,376,364	1.276	537,751	1.238	10,640,375	1.256	1.34	1.13
Kansas	318,679	1.056	8,418,644	1.146	435,388	1.002	9,557,841	1.128	1.37	1.14
Kentucky	538,081	1.783	13,160,604	1.791	744,958	1.715	14,184,942	1.675	1.38	1.08
Louisiana	535,650	1.776	13,015,493	1.772	670,966	2.005	16,548,531	1.954	1.63	1.27
Maine	154,216	0.511	3,879,792	0.528	221,680	0.510	4,452,358	0.526	1.44	1.15
Maryland	575,336	1.907	12,947,333	1.762	694,180	1.598	16,145,726	1.906	1.21	1.25
Massachusetts	527,269	1.747	13,794,541	1.878	679,614	1.565	19,433,330	2.294	1.29	1.41
Michigan	897,316	2.974	25,285,030	3.442	1,163,503	2.579	24,561,117	2.900	1.30	0.97
Minnesota	539,355	1.787	12,298,318	1.674	797,416	1.836	15,040,745	1.776	1.48	1.22
Mississippi	389,926	1.292	9,618,046	1.309	544,862	1.254	11,231,991	1.326	1.40	1.17
Missouri	743,615	2.464	18,620,585	2.534	1,077,106	2.480	19,218,699	2.269	1.45	1.03
Montana	138,295	0.458	3,429,422	0.467	431,969	0.995	8,481,823	1.001	3.12	2.47
Nebraska	230,412	0.764	5,776,311	0.786	326,414	0.752	6,576,509	0.776	1.42	1.14
Nevada	251,430	0.833	4,069,039	0.603	410,421	0.943	6,321,917	0.740	1.03	1.30
New Hampshire	132,949	0.441	3,075,448	0.419	186,587	0.430	4,019,240	0.475	1.40	1.31
New Jersey	864,243	2.864	21,269,326	2.895	1,074,263	2.473	21,707,543	2.563	1.24	1.02
New Mexico	268,995	0.891	6,217,261	0.846	416,431	0.959	8,074,687	0.953	1.55	1.30
New York	1,221,504	4.048	32,605,924	4.438	1,752,770	4.035	41,993,674	4.958	1.43	1.29
North Carolina	912,879	3.026	21,032,260	2.986	1,140,696	2.647	20,072,018	2.476	1.26	0.96
North Dakota	108,638	0.360	2,517,726	0.343	381,812	0.879	5,646,134	0.667	3.51	2.24
Ohio	1,121,130	3.715	30,021,371	4.086	1,473,065	3.392	29,590,339	3.494	1.31	0.99
Oklahoma	472,069	1.564	12,202,954	1.661	670,233	1.543	12,210,446	1.442	1.42	1.00
Oregon	368,176	1.220	9,273,437	1.262	561,463	1.293	11,233,094	1.326	1.52	1.21
Pennsylvania	1,158,416	3.839	30,841,617	4.198	1,784,735	4.109	38,233,592	4.514	1.54	1.24
Rhode Island	74,049	0.245	2,078,606	0.283	254,072	0.585	5,070,501	0.599	3.43	2.44
South Carolina	583,364	1.933	12,513,689	1.703	687,554	1.583	12,044,269	1.422	1.18	0.96
South Dakota	120,878	0.401	2,706,337	0.368	326,838	0.752	5,956,863	0.703	2.70	2.20
Tennessee	700,014	2.320	17,500,893	2.362	946,059	2.183	17,865,432	2.109	1.35	1.02
Texas	2,851,077	9.449	61,467,289	8.366	3,465,384	7.979	57,252,931	6.760	1.22	0.93
Utah	270,959	0.896	5,829,412	0.793	366,401	0.844	7,640,584	0.902	1.35	1.31
Vermont	64,523	0.214	1,763,892	0.240	225,843	0.520	4,061,517	0.480	3.50	2.30
Virginia	856,743	2.839	19,961,221	2.717	1,188,700	2.553	22,056,058	2.604	1.29	1.10
Washington	567,226	1.880	13,592,062	1.850	798,105	1.838	18,243,593	2.154	1.41	1.34
West Virginia	200,621	0.665	5,449,928	0.742	493,738	1.137	10,917,738	1.289	2.46	2.00
Wisconsin	559,794	1.855	14,131,073	1.923	821,197	1.891	15,023,883	1.774	1.47	1.06
Wyoming	140,614	0.466	3,360,334	0.457	303,800	0.699	5,876,413	0.694	2.16	1.75
Total	30,174,795	100.000	734,704,640	100.000	43,413,891	99.296	842,966,726	99.527	1.43	1.15
American Samoa	-	-	-	-	21,720	0.050	186,245	0.022	-	-
Guam	-	-	-	-	6,596	0.038	448,186	0.053	-	-
N. Marianas	-	-	-	-	5,426	0.013	123,719	0.015	-	-
Puerto Rico	-	-	-	-	248,323	0.572	2,822,771	0.333	-	-
Virgin Islands	-	-	-	-	6,640	0.039	424,073	0.050	-	-
Grand Total	30,174,795	100.000	734,704,640	100.000	43,413,788	100.000	846,971,720	100.000	1.44	1.15

1/ Payments into the Fund include only the net highway user tax receipts and fines and penalties deposited in the Highway Account of the Federal Highway Trust Fund. The \$14,700,000,000 transfer from the General Fund to the Highway Trust Fund is not included in the data. Excluded are motor fuel tax amounts transferred to: the Mass Transit Account of the Highway Trust Fund; and the Leaking Underground Storage Tank Trust Fund. In addition, amounts representing motorboat use of gasoline are transferred to the Aquatic Resources Trust Fund and the Land and Water Conservation Fund.

2/ Total Federal Highway Trust Fund receipts (for apportionment purposes only) are reported by the U.S. Department of the Treasury. Payments into the Highway Trust Fund attributable to highway users in each State are estimated by the Federal Highway Administration.

3/ Includes all funds apportioned or allocated from the Highway Trust Fund except where FHWA does not directly allocate the funds to the States, e.g. portions of Indian Reservation Roads and safety programs.

## Appendix D

## Nevada DOT Department Summary

<b>DEPARTMENT SUMMARY: DEPARTMENT OF TRANSPORTATION</b>					
<i>DIVISION: DEPARTMENT OF TRANSPORTATION</i>					
<i>PRIORITY: HIGH</i>					
<b>PROGRAM</b>	<b>STATUS</b>	<b>AUTHORITY</b>	<b>General Fund</b>	<b>Highway Fund</b>	<b>Other</b>
Construction of Roadways and Facilities	Ongoing	Federal Mandate	\$0	\$281,100,268	\$464,907,923
Maintenance of Roadways and Facilities	Ongoing	Federal Mandate	\$0	\$152,032,222	\$3,102,696
Project Delivery	Ongoing	Federal Mandate	\$0	\$80,233,104	\$190,000
Equipment Repair and Maintenance, Fleet Management	Ongoing	Federal Mandate	\$0	\$49,552,665	\$5,714,204
Information Services	Ongoing	Federal Mandate	\$0	\$26,016,764	\$992,530
Multi-Modal, Aviation, Transit, Rail and Safe Routes to Schools	Ongoing	Federal Mandate	\$0	\$20,998,434	\$0
Planning, MPO, Local Government and Stop	Ongoing	Federal Mandate	\$0	\$12,899,037	\$0
General Administration	Ongoing	Federal Mandate	\$0	\$12,756,748	\$672,942
Fiscal	Ongoing	Federal Mandate	\$0	\$12,654,537	\$0
Traffic Management Center and Highway Operations	Ongoing	Federal Mandate	\$0	\$11,094,721	\$3,564,772
District Communications, Stockroom, and Right of Way	Ongoing	Federal Mandate	\$0	\$5,593,226	\$0
Personnel and Payroll	Ongoing	Federal Mandate	\$0	\$4,882,027	\$0
Fight Operations	Ongoing	Other	\$0	\$3,799,582	\$0
Purchasing	Ongoing	Federal Mandate	\$0	\$2,013,993	\$0
Public Information Office	Ongoing	Federal Mandate	\$0	\$1,429,236	\$0
Audit	Ongoing	Federal Mandate	\$0	\$1,050,189	\$0
Civil Rights and Contract Compliance	Ongoing	Federal Mandate	\$0	\$929,853	\$0
Legal	Ongoing	State Statute - Mandatory	\$0	\$1,211	\$0
Bicycle and Pedestrian Program	Ongoing	Federal Mandate	\$0	\$0	\$401,487
<b>HIGH TOTALS</b>			<b>\$0</b>	<b>\$659,039,805</b>	<b>\$479,746,554</b>
<b>DEPARTMENT OF TRANSPORTATION TOTALS</b>			<b>\$0</b>	<b>\$659,039,805</b>	<b>\$479,746,554</b>

## Appendix E

### Nevada DOT Department Breakdown

DEPARTMENT OF TRANSPORTATION		Susan Martinovich, P.E., Director													
<b>DEPARTMENT OF TRANSPORTATION</b>	Nevada Department of Transportation 1283 S. Stewart Street Carson City, NV 89712	Phone: (775) 888-7824 Fax: (775) 888-7115 Email: <a href="mailto:sttenney@dot.state.nv.us">sttenney@dot.state.nv.us</a> Web: <a href="http://www.nevadadot.com">www.nevadadot.com</a>													
<b>Mission Statement</b>	To provide a better transportation system for Nevada through our unified and dedicated efforts.														
<b>Agency Operations Summary</b>	The Nevada Department of Transportation (NDOT) is responsible for the planning, construction, operation, and maintenance of the 5,400 miles of highway and over 1,000 bridges which make up the state highway system. The department is also responsible for an integrated transportation system that supports travel by pedestrians, rail, bike, air, and bus, including providing the funding for the majority of federal funding for Nevada's rural transit needs.														
<b>Strategic Priorities</b>	<ol style="list-style-type: none"> <li>1) To optimize safety.</li> <li>2) To effectively preserve and manage our assets.</li> <li>3) To efficiently operate the transportation system.</li> <li>4) To deliver timely and beneficial projects and programs.</li> <li>5) To be in touch with and responsive to our customers.</li> <li>6) To innovate.</li> <li>7) To be the employer of choice.</li> </ol>														
<b>Budget Highlights</b>	<p>The Governor's Executive Budget recommends:</p> <p>Maintenance and improvements to rest centers, maintenance stations, offices, welcome and interpretive centers.</p> <p>Replacement of radios and equipment to enhance operation of the Nevada Shared Radio System (NSRS). NSRS is a public private partnership between NDOT, the University of Nevada Las Vegas, and Nevada Energy. NSRS resources and components are combined to maximize mobile radio capabilities, advanced technologies, and coverage throughout Nevada while minimizing costs for numerous agency users.</p> <p>An electronic documentation system (EDS) to improve management of construction contracts. The EDS is proposed to replace the existing cumbersome, manual process of administering contracts.</p> <p>Projects funded primarily by Commercial Vehicle Information Systems and Networks (CVISN) federal grants. CVISN uses technology to support safe commercial trucking. CVISN planning is a team effort between NDOT and the Public Safety (DPS) and Motor Vehicle (DMV) Departments.</p> <p>Additionally, as part of the State of Nevada's reorganization efforts, NDOT and the Department of Public Safety's bicycle and pedestrian programs will merge into one NDOT program. It has been determined that a duplication of effort exists between the two programs and that combining them will allow for a more efficient delivery of the safety program and less confusion for the public with only one source to call for information.</p>														
<b>Positions</b>	<table border="1"> <caption>Positions by Fiscal Year</caption> <thead> <tr> <th>Fiscal Year</th> <th>Positions</th> </tr> </thead> <tbody> <tr> <td>2009</td> <td>178,265</td> </tr> <tr> <td>2010</td> <td>178,265</td> </tr> <tr> <td>2012</td> <td>178,241</td> </tr> <tr> <td>2013</td> <td>178,241</td> </tr> </tbody> </table>			Fiscal Year	Positions	2009	178,265	2010	178,265	2012	178,241	2013	178,241		
Fiscal Year	Positions														
2009	178,265														
2010	178,265														
2012	178,241														
2013	178,241														
<b>Activities</b>	<p><b>Audit</b></p> <p>Priority: High      Status: Ongoing</p> <table border="1"> <thead> <tr> <th></th> <th>FY 2012</th> <th>FY 2013</th> </tr> </thead> <tbody> <tr> <td>General Fund</td> <td>\$0</td> <td>\$0</td> </tr> <tr> <td>Highway Fund</td> <td>\$526,063</td> <td>\$524,107</td> </tr> <tr> <td>Other</td> <td>\$0</td> <td>\$0</td> </tr> </tbody> </table> <p><b>Activity Description:</b> The Internal Audit Division provides independent and objective audits in accordance with Generally Accepted Government Auditing Standards issued by the Comptroller General of the United States. The Internal Audit Division is responsible for conducting: 1) cost verification and performance audits; 2) pre-negotiation audits to establish a provisional indirect cost rate to be utilized for contract negotiations and contract payments; 3) pre-stewardship audits to verify that a public entity has an acceptable accounting system to comply with federal cost allowability criteria and documentation requirements; 4) desk reviews of the single audit reports submitted by the sub-recipients (primarily non-profit organizations, including cities, counties, and local governments) to ensure that the sub-recipients are in compliance with federal requirements; and 5) verification of project related audits as defined in federal regulations.</p> <p><b>Authority:</b> Federal Mandate</p>				FY 2012	FY 2013	General Fund	\$0	\$0	Highway Fund	\$526,063	\$524,107	Other	\$0	\$0
	FY 2012	FY 2013													
General Fund	\$0	\$0													
Highway Fund	\$526,063	\$524,107													
Other	\$0	\$0													
<b>Bicycle and Pedestrian Program</b>	<p>Priority: High      Status: Ongoing</p> <table border="1"> <thead> <tr> <th></th> <th>FY 2012</th> <th>FY 2013</th> </tr> </thead> <tbody> <tr> <td>General Fund</td> <td>\$0</td> <td>\$0</td> </tr> <tr> <td>Highway Fund</td> <td>\$0</td> <td>\$0</td> </tr> <tr> <td>Other</td> <td>\$200,169</td> <td>\$201,318</td> </tr> </tbody> </table> <p><b>Activity Description:</b> The bicycle and pedestrian program oversees the planning and development of bicycle facilities statewide. The program works with state and local entities to ensure compliance with design standards, guidelines, and the Americans with Disabilities Act. The program develops the State's Bicycle Plan, Bicycle Touring Map, and coordinates the Governor's Bicycle Advisory Board. Bicycle and Pedestrian staff work with national and local bicycle and walking advocacy groups to provide information, updates, and resources, and provide outreach to</p>				FY 2012	FY 2013	General Fund	\$0	\$0	Highway Fund	\$0	\$0	Other	\$200,169	\$201,318
	FY 2012	FY 2013													
General Fund	\$0	\$0													
Highway Fund	\$0	\$0													
Other	\$200,169	\$201,318													
<b>INFRASTRUCTURE</b>	<b>560</b>														

**DEPARTMENT OF TRANSPORTATION****Susan Martinovich, P.E., Director****DEPARTMENT OF  
TRANSPORTATION**Nevada Department of Transportation  
1283 S. Stewart Street  
Carson City, NV 89712Phone: (775) 888-7824  
Fax: (775) 888-7115  
Email: [sdjenney@dot.state.nv.us](mailto:sdjenney@dot.state.nv.us)  
Web: [www.nevadadot.com](http://www.nevadadot.com)

promote Nevada as a bicycle tourism destination. NDOT staff also work with the Department of Public Safety (DPS) to provide information on safety for bicyclists and pedestrians. DPS and NDOT will merge bicycle and pedestrian programs into one comprehensive NDOT program.

Authority: Federal Mandate

**Civil Rights and Contract Compliance**

Priority: High	Status: Ongoing	
	FY 2012	FY 2013
General Fund	\$0	\$0
Highway Fund	\$485,761	\$484,081
Other	\$0	\$0

**Activity Description:**

The Civil Rights Division oversees NDOT compliance in the following areas: 1) Contract Compliance; 2) Civil Rights; 3) Disadvantaged Business Enterprise Program; 4) Americans with Disability Act; and 5) Limited English Proficiency.

Authority: Federal Mandate

**Construction of Roadways and Facilities**

Priority: High	Status: Ongoing	
	FY 2012	FY 2013
General Fund	\$0	\$0
Highway Fund	\$145,300,887	\$135,799,581
Other	\$232,136,810	\$232,771,313

**Activity Description:**

The Department of Transportation manages the construction of roadways and associated facilities. This entails the assignment of appropriate personnel and resources; providing technical support and training; establishing policies and procedures; and making sound budget decisions pertaining to construction projects. Associated duties include preparation of construction manuals and specifications; providing construction technical expertise to legislative and regulatory agencies; resolving construction claims and disputes; serving as the department's liaison with the construction industry; and administering the construction consultant and consultant partnering programs. The department also assesses the impact of materials on design and construction, including recommendations for cost-effective design alternatives.

Authority: Federal Mandate

**District Communications, Stockroom, and Right of Way**

Priority: High	Status: Ongoing	
	FY 2012	FY 2013
General Fund	\$0	\$0
Highway Fund	\$2,800,835	\$2,782,381
Other	\$0	\$0

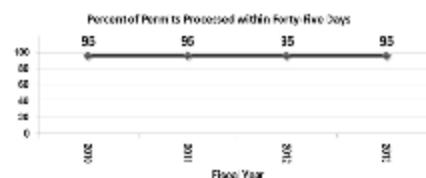
**Activity Description:**

A small subset of district operations is involved in the performance of communications, permit, and stockroom activities. District Right-of-Way staff ensure compliance with permit and other right-of-way requirements. Stockroom personnel support other district divisions in the timely acquisition of equipment, materials, and supplies. District communications staff ensure vital, reliable intra-agency and interagency telecommunications.

Authority: Federal Mandate

**Performance Measure: Percent of Permits Processed within Forty-Five Days**

Percent of permits issued or rejected within forty-five days of receipt. Every encroachment to connect or work on state right-of-way requires a permit. This is a significant component of our service to our customers. Permit issuance will not negatively compromise the highway system or reduce system safety, while meeting the customer's needs for a timely response. The majority of permits are relatively simple; however some are very complicated and require an extended technical review.

**Equipment Repair and Maintenance, Fleet Management**

Priority: High	Status: Ongoing	
	FY 2012	FY 2013
General Fund	\$0	\$0
Highway Fund	\$24,794,198	\$24,758,467
Other	\$2,857,102	\$2,857,102

**Activity Description:**

NDOT's Equipment Division maintains and ensures that the State of Nevada's mobile equipment assets are used efficiently and economically, and properly maintained for the maximum benefit of the state. They also ensure that the composition of the mobile fleet is consistent with technological advances, environmental regulations, and is ready to meet the challenge of the work effort required by the department. The Equipment Division oversees licensed equipment operations, provides technical inspections and assistance, and manages NDOT's fueling system. District equipment repair shops are responsible for the timely maintenance and repair of all fleet equipment.

Authority: Federal Mandate

**Fiscal**

Priority: High Status: Ongoing

**DEPARTMENT OF TRANSPORTATION****Susan Martinovich, P.E., Director****DEPARTMENT OF  
TRANSPORTATION**Nevada Department of Transportation  
1283 S. Stewart Street  
Carson City, NV 89712Phone: (775) 888-7824  
Fax: (775) 888-7115  
Email: [jdjenney@ndot.state.nv.us](mailto:jdjenney@ndot.state.nv.us)  
Web: [www.nevadadot.com](http://www.nevadadot.com)

	FY 2012	FY 2013
General Fund	\$0	\$0
Highway Fund	\$8,170,802	\$8,483,896
Other	\$0	\$0

**Activity Description:**

Fiscal staff monitor, budget, and obligate funding, process accounting transactions, forecast and monitor cash flow, schedule projects, and prepare financial reports, including those mandated by the American Recovery and Reinvestment Act of 2008. Fiscal teams work to maximize the use of federal funds, ensuring that no federal obligation authority is lost, no federal apportionments or grants lapse, and the maximum amount of federal revenue is collected on the earliest possible date. Development and maintenance of accounting systems, financial records, accounting policies and procedures, and systems of internal controls are also a focus of this activity. Fiscal staff provide assurance to the Federal Highway Administration and the department that fiscal-related policy and procedures affecting federal reimbursement conform to federal laws and regulations and are in the best interest of the state. Budgets and expenditures listed for this activity include payments to other agencies for insurance, assessments, and cost allocations.

Authority: Federal Mandate

**Flight Operations**

Priority: High Status: Ongoing

	FY 2012	FY 2013
General Fund	\$0	\$0
Highway Fund	\$1,372,091	\$2,427,500
Other	\$0	\$0

**Activity Description:**

The mission of the department's Flight Operations Division is to provide safe, reliable, cost effective, and on-demand air transportation. The division provides a cost effective means of transporting State of Nevada employees throughout the state and to neighboring states through the use of a nine-passenger Cessna Citation II (1987) and a six-passenger Commander 840 (1981). These aircraft save time and money in transporting people, particularly in the rural areas of the state. Both aircraft are utilized in times of national and state emergencies and for public safety response. The Commander is also utilized for aerial photography.

Authority: Other

**General Administration**

Priority: High Status: Ongoing

	FY 2012	FY 2013
General Fund	\$0	\$0
Highway Fund	\$8,386,187	\$8,370,580
Other	\$436,471	\$436,471

**Activity Description:**

The general administration of NDOT is overseen by a Board of Directors and managed by a Director, Deputy Directors, and Assistant Directors. The Director

and her staff work cooperatively with members of the public; federal, state, and local government agencies; regional transportation commissions; contractors and others involved in transportation issues. Federal law requires that state highway departments are responsible for all federal aid highway projects, and the Director's Office is the leader in coordinating these efforts. Per Nevada law, the Director's Office prepares a general highway plan, determines methods of highway construction best adapted to the state, establishes standards and specifications for construction and maintenance of highways, and is responsible for the general supervision of the construction, reconstruction, improvement, maintenance, and repair of all authorized highways, facilities and services. NDOT's Administrative Services division is also part of this activity and handles contract and agreement services, document reproduction, over dimensional permitting, records management, and buildings and grounds functions essential to the day-to-day operations of the department.

Authority: Federal Mandate

**Information Services**

Priority: High Status: Ongoing

	FY 2012	FY 2013
General Fund	\$0	\$0
Highway Fund	\$13,000,300	\$13,018,464
Other	\$498,285	\$498,285

**Activity Description:**

The Information Services Division is responsible for: 1) communications including radio, video, telephone, and e-mail systems; 2) software application development and support; 3) data, systems, communications transport: i.e. fiber; 4) processing of electronic transactions; 5) information protection and security; 6) specialized tools and infrastructure that assimilate data into information such as mapping, surveying, environmental, bridge, and roadways; 7) physical and virtual storage of information, including back-up, recovery, and redundancy, plus disaster recovery essential to business continuity and public safety; 8) desktop management and implementation; 9) technical and end-user support; 10) web services; 11) technology contract and fiscal support, and; 12) coordination of technology infrastructure and planning to meet current and future needs.

Authority: Federal Mandate

**Legal**

Priority: High Status: Ongoing

	FY 2012	FY 2013
General Fund	\$0	\$0
Highway Fund	\$805	\$805
Other	\$0	\$0

**Activity Description:**

NDOT Legal Services team provides day-to-day counsel and legal advice in multiple, diverse areas of law including contracts, torts, condemnation, eminent domain, and construction. The team conducts contract review, policy and regulation drafting, and review and implementation of policy and procedures, and legislation. Legal Services also provides preventative law to decrease

## DEPARTMENT OF TRANSPORTATION

Susan Martinovich, P.E., Director

DEPARTMENT OF  
TRANSPORTATIONNevada Department of Transportation  
1283 S. Stewart Street  
Carson City, NV 89712Phone: (775) 888-7824  
Fax: (775) 888-7115  
Email: [sdjenney@dot.state.nv.us](mailto:sdjenney@dot.state.nv.us)  
Web: [www.nevadadot.com](http://www.nevadadot.com)

liability. Legal staff tort claims adjusters review and adjust tort claims submitted against NDOT. This division also litigates on behalf of and in defense of NDOT and at administrative hearings and all state and federal court levels.

Authority: State Statute - Mandatory

## Maintenance of Roadways and Facilities

	Status: Ongoing	
	FY 2012	FY 2013
General Fund	\$0	\$0
Highway Fund	\$76,120,705	\$75,911,517
Other	\$1,539,848	\$1,582,848

## Activity Description:

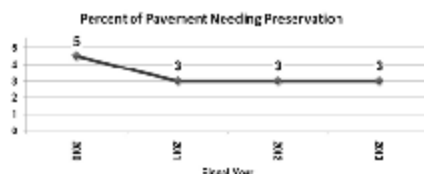
District and state maintenance staff perform a myriad of activities to ensure that the transportation system is well-maintained and operating efficiently. Proper preservation enhances safety and provides substantial cost savings. NDOT tracks the age and condition of highway pavements and bridges as well as weather conditions, accident information, and the type and amount of traffic traveling our roadways. Staff regularly inspect all publically-owned structures, and inspect and test bridge structures and components prior to being placed into service. Maintenance teams respond to natural and manmade emergencies, providing equipment and manpower as needed. District maintenance crews complete roadway betterment projects and ensure roadway safety by performing vital activities such as plowing snow, responding to accidents, and removing debris and safety hazards.

Authority: Federal Mandate

## Performance Measure: Percent of Pavement Needing Preservation

Proactive pavement preservation provides major benefits in maximizing limited funds. Being proactive by maintaining roadways before structural damage occurs to the pavement section is a cost-effective strategy because pavements with structural damage cost approximately four times more to repair.

Pavement condition is also directly related to user vehicle maintenance and safety, and highway capacity. This performance measure calculates the percent of state-maintained pavements needing preservation to be in fair or better condition as rated through the International Roughness Index.

Multi-Modal, Aviation, Transit, Rail and Safe Routes to  
Schools

Priority: High Status: Ongoing

	FY 2012	FY 2013
General Fund	\$0	\$0
Highway Fund	\$10,501,197	\$10,487,237
Other	\$0	\$0

## Activity Description:

NDOT's Aviation Planning Section helps ensure that Nevada's general aviation public and private use airports meet applicable safety requirements and provide maximum utility to their communities and the public. NDOT's Transit Section ensures that federal transit funding is utilized according to guidelines and laws and provides vehicles, planning, training, and operating funding to predominately rural and small urban transit providers across our state. Local transit providers consist of senior centers, small bus companies, Native American reservations and colonies, and elderly and disabled programs. Many transit riders would be homebound if it were not for these vital transportation services. NDOT's Rail Section works to integrate passenger rail into the broader transportation system to help improve mobility, economic competitiveness, community revitalization, and reduce fuel use and emissions. Multi-modal staff also manage the federal Safe Routes to School program which identifies obstacles to children walking and biking to school and assists communities in developing strategies and infrastructure improvements to mitigate these impediments.

Authority: Federal Mandate

## Personnel and Payroll

	Status: Ongoing	
	FY 2012	FY 2013
General Fund	\$0	\$0
Highway Fund	\$2,444,329	\$2,437,888
Other	\$0	\$0

## Activity Description:

NDOT's personnel staff establish positions; recruit; hire; processes employment changes; review position classifications; advise management on employment issues; investigate complaints of discrimination; and mediate workplace conflict. NDOT's Rotational Engineer Program provides outreach to Nevada colleges and universities to recruit and provide college graduates with the necessary skills and experience to seek a variety of career opportunities within the department and prepare themselves for future leadership roles. The Training Section identifies and provides required and recommended training for NDOT employees to perform current duties and prepare the workforce for the future. Safety and Loss Control staff manage NDOT's statewide safety program. Payroll staff are responsible for maintenance and development of payroll records and manuals, reconciliation of payroll accounts, research and correct rejected timesheets and transactions (including NDOT-specific activity and project coding), and examine furlough and overtime usage and selected pay codes.

Authority: Federal Mandate

Performance Measure: Percent of Employees Incurring Workplace Injuries Requiring Medical Attention

## DEPARTMENT OF TRANSPORTATION

Susan Martinovich, P.E., Director

DEPARTMENT OF  
TRANSPORTATIONNevada Department of Transportation  
1283 S. Stewart Street  
Carson City, NV 89712Phone: (775) 888-7824  
Fax: (775) 888-7115  
Email: [sdjenney@dot.state.nv.us](mailto:sdjenney@dot.state.nv.us)  
Web: [www.nevadadot.com](http://www.nevadadot.com)

Employee injuries requiring medical attention are tracked separately because they are more egregious. Most of NDOT's employees work in the field where they are exposed to heavy equipment and traffic. Generally, they also work with rigorous tools that increase the potential for injury. This indicator measures the percent of employees incurring injuries requiring medical attention as documented through the Occupational Safety & Health Administration (OSHA) 300 Log Report.



## Planning, MPO, Local Government and Stip

Priority: High Status: Ongoing

	FY 2012	FY 2013
General Fund	\$0	\$0
Highway Fund	\$6,459,943	\$6,438,064
Other	\$0	\$0

## Activity Description:

NDOT develops the Statewide Transportation Improvement Program (STIP) which identifies Nevada transportation projects and funding as the result of a comprehensive, statewide transportation planning process that includes Nevada's metropolitan planning organizations (MPO) and local governments. This activity includes coordination of multi-state and intra/inter-agency planning efforts. Planning staff also manage the federally-funded Statewide Planning and Research Program and gather statistics and conduct studies to support informed highway planning, policy, and decision making efforts.

Authority: Federal Mandate

## Project Delivery

Priority: High Status: Ongoing

	FY 2012	FY 2013
General Fund	\$0	\$0
Highway Fund	\$30,171,339	\$30,061,765
Other	\$85,000	\$85,000

## Activity Description:

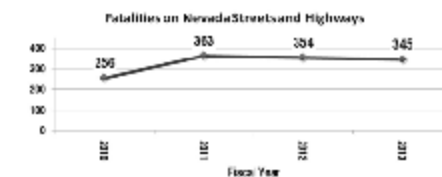
Project delivery staff develop land maps and infrastructure models, professional land surveys, and project plans, specifications, and estimates used to advertise, award, and administer construction projects. This process includes coordination with members of the public, federal, state, and local governments; developers; consultants; and contractors. Implementation of improved safety elements on the roadways and compliance with the National Environmental Policy Act and federal Highway Bridge Program is also critical to project delivery. Project delivery staff also provide analysis, guidance and oversight pertaining to state

and federal laws related to real property. Project delivery teams also ensure investment accountability through analysis of project efficiency, cost-effectiveness, and customer satisfaction.

## Authority: Federal Mandate

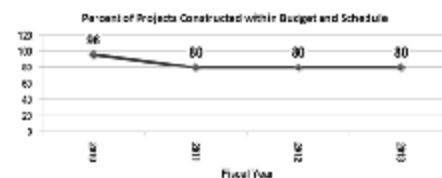
## Performance Measure: Fatalities on Nevada Streets and Highways

All highway users should be provided with safe roadways. Through efforts of engineering, enforcement, education, emergency response, and the safe behavior of drivers, fatal crashes can be reduced. Strategies employed to reduce fatalities will be based on the multi-agency Nevada Strategic Highway Safety Plan. This performance measure lists the number of fatalities on Nevada's streets and highways per calendar year.



## Performance Measure: Percent of Projects Constructed within Budget and Schedule

Because of the complexity inherent in the construction of major highway projects, considerable uncertainty and risk regarding final project estimates and schedules exists. This measure is the percent of projects constructed within an established range for both cost estimate and schedule.



## Public Information Office

Priority: High Status: Ongoing

	FY 2012	FY 2013
General Fund	\$0	\$0
Highway Fund	\$715,854	\$713,282
Other	\$0	\$0

## Activity Description:

This activity is comprised of public information, customer services, multimedia, publications and design, and the public hearings office. The Communications Office is responsible for: 1) media relations; 2) public/employee information relations; 3) photography needed for publications, web pages, and reports; 4) customer service functions including coordination of the Statewide Customer Services Reporting System which tracks approximately 700 contacts per month;



**DEPARTMENT OF TRANSPORTATION****Susan Martinovich, P.E., Director****DEPARTMENT OF  
TRANSPORTATION**Nevada Department of Transportation  
1283 S. Stewart Street  
Carson City, NV 89712Phone: (775) 888-7824  
Fax: (775) 888-7115  
Email: [jdenny@dot.state.nv.us](mailto:jdenny@dot.state.nv.us)  
Web: [www.nevadadot.com](http://www.nevadadot.com)

5) responses to customer correspondence; 6) tort claims records analysis; 7) administration of NDOT's privatized LOGO sign program - these signs provide directional guidance to services such as gas, food and lodging; 8) public litter removal programs; 9) preparation of special design and print maps, displays, and signage for public meetings; and 10) coordination of public hearings and meetings.

Authority: Federal Mandate

**DEPARTMENT OF TRANSPORTATION FUNDING TOTALS**

	FY 2012	FY 2013
General Fund	\$0	\$0
Highway Fund	\$333,814,083	\$325,225,742
Other	\$238,852,872	\$238,883,882

**Purchasing**

Priority: High Status: Ongoing

	FY 2012	FY 2013
General Fund	\$0	\$0
Highway Fund	\$1,008,881	\$1,005,112
Other	\$0	\$0

**Activity Description:**

The Nevada State Purchasing Division has delegated purchasing authority to NDOT within prescribed limits established by statutes, regulations, and policies. Many of these purchases are for unique and specialized items, requiring significant technical expertise. The NDOT Equipment Division purchases equipment designed for use on roads or to be transported over roads, equipment and materials to be used for direct construction or maintenance of roads or roadside facilities, power tools, ancillary equipment, and repair parts associated with the above types of equipment.

Authority: Federal Mandate

**Traffic Management Center and Highway Operations**

Priority: High Status: Ongoing

	FY 2012	FY 2013
General Fund	\$0	\$0
Highway Fund	\$5,574,387	\$5,520,334
Other	\$2,081,407	\$1,473,365

**Activity Description:**

NDOT's Operations group is responsible for emergency management and security, highway operations, operations analysis, and intelligent transportation system (ITS) design. ITS refers to efforts to add technology to transportation infrastructure in an effort to manage factors such as vehicles, loads, and routes to improve safety and reduce vehicle wear, transportation times, and fuel consumption. ITS and operations-related projects result in improved roadway operations, and increased capacity and safety. Operations staff also manage the FAST Traffic Management Center (in coordination with the Regional Transportation Commission of Southern Nevada) to ensure freeways in the Las Vegas area coordinate and operate in the best possible manner to maximize capacity and safety.

Authority: Federal Mandate

## Appendix F

*United States Federal Code, Title 23*

Chapter 1

### **§ 122. Payments to States for bond and other debt instrument financing**

- a. Definition of Eligible Debt Financing Instrument. - In this section, the term "eligible debt financing instrument" means a bond or other debt financing instrument, including a note, certificate, mortgage, or lease agreement, issued by a State or political subdivision of a State or a public authority, the proceeds of which are used for an eligible project under this title.
- b. Federal Reimbursement. - Subject to subsections (c) and (d), the Secretary may reimburse a State for expenses and costs incurred by the State or a political subdivision of the State and reimburse a public authority for expenses and costs incurred by the public authority for -
  1. interest payments under an eligible debt financing instrument;
  2. the retirement of principal of an eligible debt financing instrument;
  3. the cost of the issuance of an eligible debt financing instrument;
  4. the cost of insurance for an eligible debt financing instrument; and
  5. any other cost incidental to the sale of an eligible debt financing instrument (as determined by the Secretary).
- c. Conditions on Payment. - The Secretary may reimburse a State or public authority under subsection (b) with respect to a project funded by an eligible debt financing instrument after the State or public authority has complied with this title with respect to the project to the extent and in the manner that would be required if payment were to be made under section 121.
- d. Federal Share. - The Federal share of the cost of a project payable under this section shall not exceed the Federal share of the cost of the project as determined under section 120.
- e. Statutory Construction. - Notwithstanding any other provision of law, the eligibility of an eligible debt financing instrument for reimbursement under subsection (b) shall not -
  1. constitute a commitment, guarantee, or obligation on the part of the United States to provide for payment of principal or interest on the eligible debt financing instrument; or
  2. create any right of a third party against the United States for payment under the eligible debt financing instrument.

## Appendix G

### *California Government Code*

(Code Sections 14550-14555.9) Pertaining to the GARVEE Program

**14550.** The Legislature hereby finds and declares all of the following:

- (a) Between 1970 and 1990, California's population grew by 50 percent, while the total number of miles driven in the state increased by 100 percent.
- (b) Conservative estimates have the state adding an additional 6 million new residents by the end of the next decade.
- (c) Revenues available for investment in California's transportation system have not kept pace with that increasing state population, or with the increased demand on the state's transportation infrastructure.
- (d) California is now home to five of the nation's 10 most congested urban areas.
- (e) Between 1987 and 1995, the number of California drivers who sit idle in traffic congestion has grown by 70 percent, and California drivers now sit idle in traffic congestion more than 300,000 hours per day.
- (f) It is estimated that traffic congestion in California now costs the state's businesses more than two million eight hundred thousand dollars (\$2,800,000) per day in lost time and resources.
- (g) The United States Congress recently authorized states under the federal National Highway System Designation Act of 1995 and the federal Transportation Equity Act for the 21st Century to issue "GARVEE bonds," which are tax-exempt anticipation notes backed by annual federal appropriations for federal aid transportation projects.
- (h) Utilizing grant anticipation notes to finance federal transportation projects can greatly accelerate projects and can result in significant cost savings to the state, since those transportation projects can be completed at present-day costs.
- (i) Funding transportation projects with grant anticipation notes can also deliver projects to the public significantly sooner than traditional funding mechanisms.
- (j) Therefore, it is in the best interest of the State of California to develop these new and innovative methods for funding and accelerating critical transportation infrastructure projects.

**14552.** Unless the context otherwise requires, the definitions in this article govern the construction of this chapter.

**14552.2.** "Eligible Project" means the federally funded portion of any highway or other transportation project that has been designated for accelerated construction by the commission, including, but not limited to, any of the following:

- (a) Toll bridge seismic retrofit projects.
- (b) Projects approved for funding under the Traffic Congestion Relief Act of 2000 (Ch. 4.5 (commencing with Section 14556)).
- (c) Projects programmed under the current adopted State Transportation Improvement Program or the current State Highway Operation and Protection Program.

**14552.4.** "Federal transportation funds" means any funds apportioned to the state by the United States Department of Transportation, including, but not limited to, funds paid pursuant to the Transportation Equity Act for the 21st Century (Public Law 105-178).

**14552.6.** A "note" is a federal highway grant anticipation note issued by the Treasurer under this chapter.

**14553.** (a) The commission may from time to time select and designate eligible projects to be funded from the proceeds of notes, if financing of the project from the proceeds of notes has been approved by the Federal Highway Administration and the regional transportation planning agency, and the project has completed environmental clearance and project design.

(b) Notwithstanding Section 7550.5 of the Government Code, on or before April 1 of each year, the commission, in conjunction with the Treasurer's office, shall prepare an annual analysis of the bonding capacity of federal transportation funds deposited in the State Highway Account in the State Transportation Fund.

**14553.2.** The commission, in cooperation with the department and regional transportation planning agencies, shall establish guidelines for eligibility for funding allocations under this chapter. The guidelines shall be nondiscriminatory and shall be designed to allow as many counties as possible to establish eligibility for funding allocations under this chapter, regardless of the population or geographic location of the county.

**14553.4.** The Treasurer may not authorize the issuance of notes if the annual repayment obligations of all outstanding notes in any fiscal year would exceed 30 percent of the total amount of federal transportation funds deposited in the State Highway Account in the State Transportation Fund for any consecutive 12-month period within the preceding 24 months.

**14553.6.** Funds allocated to a State Transportation Improvement Program project under this chapter, including cost overruns and financing costs, shall be counted against the interregional improvement program share in the case of a project in the interregional improvement program and the county share for the county in which the project is located in the case of a project in a regional improvement program.

**14553.7.** In order to provide security for repayment of the notes, the commission shall adopt a resolution dedicating and pledging any future receipts of federal transportation funds received by the state to the payment of principal of, and interest and premium on the notes, for as long as any notes remain outstanding. That action shall constitute a pledge or receipt of those moneys as collateral within the meaning of subdivision (b) of Section 5450. The pledge shall be governed under Chapter 5.5 (commencing with Section 5450) of Division 6 of Title 1 of the Government Code. The commission shall be deemed a "public body" for purposes of Section 5451, as defined in Section 5450.

**14553.8.** Before notes are issued under this chapter, the commission, in cooperation with the department and the Department of Finance, shall consider and determine the appropriateness of the mechanism authorized by this chapter in comparison to other funding mechanisms, including, but not limited to, pay-as-you-go, federal advance construction, federal incremental advance construction, or other funding methods authorized under federal law to achieve maximum efficiency from the state's federal allocation of transportation funds.

**14553.9.** (a) Upon taking the actions authorized under this article, the commission may request the Treasurer to issue notes to provide funds for the eligible projects.

(b) Notwithstanding Section 7550.5 of the Government Code, on or before April 1 of each year, the commission shall prepare and submit an annual report regarding the preceding calendar year to the Governor and the Legislature. Each report shall compile and detail the total amount of outstanding debt issued pursuant to this chapter and the projects funded by that outstanding debt.

**14554.** (a) In order to provide for the financing of selected projects, the Treasurer may issue tax-exempt or taxable notes under this article. Proceeds of the sale of those notes shall be deposited in the Transportation Financing Subaccount, which is hereby created as a special trust fund in the State Highway Account in the State Transportation Fund. The funds in the subaccount shall be available for use as directed by the commission and administered by the department and to pay costs associated with the issuance or further security of the notes or for capitalized interest of up to 12 months.

(b) Any issue of notes may be secured and made more attractive to capital markets through financial instruments, including, but not limited to, the following:

(1) Credit enhancements, including, but not limited to, letters of credit, bond insurance, and surety bonds provided by private sector financial institutions.

(2) Insurance and guarantees provided by any other agency of the state.

**14554.2.** The Treasurer shall issue notes from time to time pursuant to a resolution from the commission. Those pledges shall be governed under Chapter 5.5 (commencing with Section 5450) of Division 6 of Title 1 of the Government Code. The resolution may contain any of the following provisions, which shall be a part of the contract with the holders of the notes to be authorized:

(a) Provisions pledging receipt of future federal transportation funds to secure the payment of the notes or of any particular issue of notes, subject to those agreements with noteholders as may then exist, and pledging moneys held in funds and accounts pursuant to the note issue, or the earnings thereon. The Treasurer may authorize classes of notes having different priority in the receipt of available federal transportation funds.

(b) Provisions for the investment of proceeds of the notes or of the moneys received by the Treasurer for repayment of the notes.

(c) Provisions setting aside reserves or sinking funds, and the regulation and disposition thereof.

(d) Limitations on the issuance of additional notes, the terms upon which additional notes may be issued and secured, and the refunding of outstanding notes.

(e) The procedure, if any, by which the terms of any contract with noteholders may be amended or abrogated, the amount of notes and the holders thereof that are required to give consent thereto, and the manner in which the consent may be given.

(f) Definitions of acts or omissions to act that constitute a default in the duties of the state to holders of the notes, and provisions on the rights and remedies of the holders in the event of a default.

**14554.4.** Any notes issued under this chapter may be secured by a trust agreement, indenture, or resolution by and between the commission and a trustee. The trustee may be the Treasurer or a bank or trust company chartered under the laws of this state or of the

United States and designated by the Treasurer. The Treasurer may act under the note resolution as the fiscal agent for the notes.

**14554.6.** The notes shall be authorized by resolution or resolutions of the Treasurer, shall be in the form, shall bear the date or dates, and shall mature at the time or times, as the resolution or resolutions may provide, except that no note may mature more than 30 years from the date of its issue. The fixed or variable notes shall bear interest at the rate or rates, be in the denominations, be in the form, be executed in the manner, be payable in the medium of payment at the place or places within or without the state, be subject to the terms of redemption and contain the terms and conditions, that the resolution or resolutions may provide. The notes shall be sold at public or private sale by the Treasurer at, above, or below the par value, on the terms and conditions and for the consideration that the Treasurer shall determine.

**14554.8.** (a) Notwithstanding Section 13340 of the Government Code or any other provision of law, the amounts specified in the annual Budget Act as having been deposited in the State Highway Account in the State Transportation Fund from federal transportation funds, and pledged by the commission under this chapter, are hereby continuously appropriated, without regard to fiscal years, to the Treasurer for the purposes of, and in accordance with, this chapter.

(b) Funds that are subject to Section 1 or 2 of Article XIX of the California Constitution may be used as the state or local principal match for any project that is eligible for federal matching funds and is funded pursuant to this chapter.

**14555.** Upon request of the commission, the Treasurer may issue refunding notes to refund any outstanding notes, and to pay costs associated with that refunding.

**14555.2.** Whenever the Treasurer deems that it will increase the salability or the price of the notes to obtain, prior to or after sale, a legal opinion, other than that of the Attorney General, as to the validity or tax-exempt nature of the notes, the Treasurer may obtain that legal opinion. Payment for those legal services shall be made from the proceeds of the sale of the notes.

**14555.4.** The Treasurer may employ financial, engineering, or transportation consultants or advisers, underwriters, and accountants as may be necessary in his or her judgment in connection with the issuance and sale of any notes of the Treasurer. Payment for these services may be made out of the proceeds of the sale of the notes.

**14555.6.** Section 10295 of the Public Contract Code and Article 4 (commencing with Section 10335) of, and Article 5 (commencing with Section 10355) of, Chapter 2 of Part 2 of Division 2 of the Public Contract Code do not apply to agreements entered into by the Treasurer pursuant to the sale of notes authorized under this chapter.

**14555.8.** Notes issued under this chapter are a legal investment for any state special or trust fund notwithstanding any provision of law limiting the investments that may be made by the special or trust fund. The notes shall be legal investments in which all public officers and public bodies of the state, its political subdivisions, all municipalities and municipal subdivisions, all insurance companies and associations and other persons carrying on an insurance business, all banks, savings and loan associations, savings banks and savings associations, investment companies, all administrators, guardians, executors, trustees and other fiduciaries, and all other persons authorized to invest in notes or in other obligations of the state, may properly and legally invest funds, including capital, in

their control or belonging to them. The notes may be used as security for public deposits. The notes are also securities that may properly and legally be deposited with and received by all public officers and bodies of state or any agency or political subdivision of the state and all municipalities and public corporations for any purpose for which the deposit of notes or other obligations of the state is authorized by law, including deposits to secured public funds.

**14555.9.** Notes issued under the provisions of this chapter may not be deemed to constitute a debt or liability of the state or of any political subdivision thereof, or a pledge of the full faith and credit of the state or of any political subdivision thereof, but shall be payable solely from the funds and revenues pledged therefore. All the notes shall contain on their face a statement to the effect that the State of California shall not be obligated to pay the principal, or the interest on the notes, except from the revenues received by the Treasurer as shall be provided by the documents governing the revenue note issuance, and that neither the faith and credit nor the taxing power of the State of California or of any of its political subdivisions is pledged to the payment of the principal or interest on the notes. The issuance of notes under this part shall not directly or indirectly or contingently obligate the state or any of its political subdivisions to levy or to pledge any form of taxation whatever or to make any appropriation for their payment.