

APPENDIX B

A brief summary of National and State transportation milestones is presented. NOTE: Brackets [] indicate a location in what is now West Virginia.

- 1743** The first established road recorded in what is now WV is built, connecting Winchester, Virginia (VA), to the home of Colonel Morgan. Morgan, the first European settler, in what is now Bunker Hill, WV [Berkeley County].
- 1760** Since neither the Maryland (MD) charter of 1632 nor the Pennsylvania (PA) charter of 1681 is precise about territory, Britain orders a survey to settle a dispute between the Calverts of MD and the Penns of PA over where their land begins and ends. Charles Mason and Jeremiah Dixon are hired for \$75,000 to conduct the survey.
- 1764** Mason and Dixon begin the survey about 10 miles west of Delmar, MD.
- 1767** The Mason-Dixon survey ends just northwest of Morgantown [Monongalia County] where the surveyors were stopped by Indians. The *Mason-Dixon Line* was approved two years later.
- 1782** The first improved road into the Greenbrier Valley is built connecting Warm Springs, VA, and Lewisburg [Greenbrier County].
- 1784** Surveyors extend the *Mason-Dixon Line* 23 miles to the southwest corner of PA. The total length of the survey line, which separates PA from MD and VA, and Delaware (DE) from MD, is 320 miles.
- 1785** The Virginia General Assembly incorporates the James River Company to connect the James River with the New and Great Kanawha Rivers by building a road over the Allegheny Mountains to the Falls of the Great Kanawha River. This route generally follows the path of the *Old Kanawha Trail* and becomes known as the *James River and Kanawha Turnpike*.
- 1786** The Virginia General Assembly authorizes the first road directly connecting the eastern and western settlements in VA. Known as a "State road," although not built entirely from public funds, the road connects Winchester to Morgantown [Monongalia County], via Romney [Hampshire County].
- 1788** A "State road" is built from Winchester to Clarksburg [Harrison County], via Philippi [Barbour County].
- 1789** A "State road" is constructed from Clarksburg to Point Pleasant [Mason County].
- 1794** The first regular federal postal route is established from Hagerstown, MD, between Morgantown [Monongalia County] and Brownsville, PA. Another postal route is established between Morgantown [Monongalia County] and Wheeling [Ohio County].
- 1800** Timothy Palmer builds the Nation's first timber-covered bridge at Middle Ferry, Philadelphia, PA.
- 1801** Judge James Finley builds the Nation's first suspension bridge, a 70-foot chain-link structure over Jacobs Creek near Greensburg, PA.
- 1802** The first federal financial aid specifically for the construction of roads is incorporated into the **Ohio Statehood Enabling Act**. The Act provided five percent of the proceeds of the sale of public (federal) lands in OH to be set aside for roads.

- 1806** The US Congress appoints a committee to determine a route to the West that will access the wilderness beyond the Ohio River. It was used as a means to carry the mail, transport emigrants to the frontier, promote political unity of the East and the West, and enable the movement of troops and supplies. The route chosen becomes known as the *National Road* (also called the *National Pike*, the *Cumberland Road*, and the *Bank Road*).
- 1818** The *National Road* is completed from Cumberland, MD, to Wheeling [Ohio County].
- 1823** The first macadam (tar and chip) road surface in the Nation is constructed between Hagerstown and Boonsboro, MD.
- The Virginia General Assembly orders surveys for a highway that will extend from Staunton, VA, to the mouth of the Little Kanawha River near Parkersburg [Wood County]. This highway becomes known as the *Staunton-Parkersburg Turnpike*.
- 1827** The *Northwestern Turnpike* is incorporated. This route, which connects Winchester, VA, and Parkersburg [Wood County], is intended to compete with the *National Road* by providing a shorter route to the west.
- 1836** The US Corps of Engineers builds the Nation's first cast-iron bridge, an 80-foot arch span, over Dunlap Creek in Brownsville, PA.
- 1838** The *Northwestern Turnpike* is completed.
- The *Charleston and Point Pleasant Turnpike* is completed, connecting Charleston [Kanawha County] to the West.
- 1840** The Nation's first two iron truss highway bridges are built over the *Erie Canal*.
- 1846** The Nation's first wooden plank road opens to traffic in Syracuse, NY.
- 1847** The *Staunton-Parkersburg Turnpike* is completed.
- 1848** The *Giles, Fayette and Kanawha Turnpike*, connecting Kanawha Falls [Fayette County] and Pearisburg, VA, is completed.
- 1849** Charles Ellet builds the 1,010-foot *Wheeling Suspension Bridge* over the Ohio River. When completed, it was the longest bridge span in the world.
- 1850** The Virginia General Assembly authorizes the survey and construction of the *Princeton-Red Sulphur Springs Turnpike*, connecting Princeton [Mercer County] and Red Sulphur Springs [Monroe County].
- 1851** The *Weston and Gauley Bridge Turnpike* is incorporated and construction of the road begins.
- 1861** Union troops take command of the *Philippi Covered Bridge*, using it as a barracks, in the first land battle of the Civil War.
- 1863** By proclamation of President Abraham Lincoln, WV becomes the Nation's 35th state on June 20. All previously existing road laws of VA are adopted with virtually no change.
- 1871** Portland cement is manufactured for the first time in the US at Allentown, PA. New York and Philadelphia become the first cities to use asphalt paving.

- 1873** The WV Legislature allows county courts to let road maintenance contracts to the lowest bidder if approved by the local voters.
- 1877** *Yellowstone National Park* is allotted \$15,000 for roads, the first such appropriation in a National park.
- 1878** The first American all-steel bridge spans are built for the *Missouri River Bridge* at Glasgow, Missouri.
- 1881** County sheriffs are given the responsibility of collecting WV's road taxes.
- 1885** Karl Friedrich Benz of Mannheim, Germany, builds the first reliable internal combustion engine automobile. The three-wheeled vehicle has an electric ignition, a water-cooling system, differential gear box, and surface carburetor.
- 1889** The Nation's first reinforced concrete bridge is built in *Golden Gate Park*, San Francisco, California (CA).
- 1890** The National Good Roads Movement begins when organized bicyclists launch a public relations campaign to stir sentiment favorable to "more and better road building."
- 1891** New Jersey enacts the first state-aid road program in the Nation.
- WV's capitation or poll tax is enacted, requiring all males over 21 years of age be levied a one dollar fee to be used exclusively for maintenance, repair and construction of the State Local System of county roads in which the tax is collected. In lieu of payment, this tax could be "worked out" by laboring on the roads for one day.
- 1892** Massachusetts is the first state to create a State Highway Commission.
- 1893** The **Agriculture Appropriation Act of 1893** appropriates funds for determining the best methods of road building and the best systems of road management. As a result, the Office of Road Inquiry is established within the US Department of Agriculture.
- The US Congress appropriates \$10,000 for an experimental program of rural mail delivery.
- The Nation's first brick pavement on a rural road is placed near Cleveland, OH.
- 1896** The US Post Office Department establishes the first experimental rural delivery routes from Charles Town, Halltown, and Uvilla, WV.
- 1897** The Office of Road Inquiry initiates construction of short sections of object lesson roads as a means of demonstrating the method for good road construction.
- 1899** The Office of Road Inquiry becomes the Office of Public Road Inquiries. The **River and Harbour Act of 1899** requires permits to build bridges over navigable waters.
- 1901** The Nation's first highway-user tax, a vehicle registration fee of one dollar, is implemented in NY.
- The Nation's first highway tunnel of substantial length, constructed to accommodate automobile traffic, is completed. The *Third Street Tunnel* passes through Bunker Hill in downtown Los Angeles, CA.

- 1902** The American Automobile Association (AAA) is organized to combat restrictive legislation concerning vehicle registration requirements and other regulations.
- 1905** The **Agriculture Appropriation Act of 1905** merges the Division of Tests of the Bureau of Chemistry with the Office of Public Road Inquiries to form the Office of Public Roads.
- 1906** Vanadium alloy steel becomes available in the US. As a result, Henry Ford redesigns his big, heavy touring car into a much smaller and lighter vehicle: the Model T.
- 1907** WV's county courts are authorized to macadamize, and keep in good repair, any toll road or turnpike abandoned by its owner or operator, and to condemn land needed for roads and highways. This action is considered by many to be the beginning of the Good Roads Movement in the State.
- 1908** Maryland adopts an inter-county seat trunkline system, the first such system to be placed under state control for construction and maintenance.
- State aid for WV's public highways is first provided to the counties and is apportioned based on the amount of road taxes levied and collected in the counties. The State will pay one third of the cost of construction on approved State-aid projects, while the county and its districts are to provide the remaining two thirds.
- 1909** Wayne County, Michigan, builds the Nation's first rural public road surfaced with Portland cement concrete.
- The WV Legislature establishes the State Road Fund (designating certain tax receipts to it), the Office of the State Commissioner of Public Roads, and the offices of county road engineers.
- 1910** Officials of thirty state and interstate organizations, including highway departments, railroads, good roads associations, and others, form the American Association for Highway Improvement.
- 1911** The WV Legislature abolishes the Office of the State Commissioner of Public Roads, the State road tax, State-aid for highways, and the State Road Fund, and enacts legislation whereby all roadwork is placed under the direct authority of the county court and the county road engineer.
- The first penetration macadam road in WV is built in Harrison County. The road extends west of Clarksburg along the old *Northwestern Turnpike*.
- 1912** The **Post Office Appropriation Act of 1912** provides \$500,000 for use on the Nation's post roads in those states requesting such aid; however, each state or its subdivision must match the federal dollars on a two-to-one basis.
- The **Agriculture Appropriation Act of 1912** set aside ten percent of the receipts from the National forests as a "10-percent fund" for financing forest highways.
- The American Association for Highway Improvement becomes the American Highway Association.
- 1913** The WV Legislature creates the State Road Bureau.
- 1914** The American Association of State Highway Officials (AASHO) is organized to provide assistance to state highway departments. As one of its first acts, the organization prepares, for the consideration of the US Congress, a bill authorizing federal aid to highways.

1915 The Office of Public Roads becomes the Office of Public Roads and Rural Engineering.

1916 The **Federal Aid Road Act of 1916** provides federal aid (an appropriation of \$75 million for five years) to the states for the improvement of any rural road over which the US mail is, or might later be, transported; changes the appropriation factors to equal amounts (one third each) according to area, population, and rural post road mileage; and requires states to provide fifty percent of the funds to establish a state highway department and to be responsible for the maintenance of the highways.

1917 The WV Legislature replaces the State Road Bureau with the State Road Commission, agrees to match federal funds with State funds, and agrees to maintain all roads constructed with Federal-Aid funds. For the first time in WV, automobile registration and license fees are collected.

1918 The Office of Public Roads becomes the Bureau of Public Roads.

1919 The **Post Office Appropriation Act of 1919** appropriates \$200 million for improvements of rural post roads, many damaged during World War I, and directs the transfer of surplus war material, equipment, and supplies from the War Department to the Department of Agriculture.



A Mountain Road -- 1919

1920 The **Good Roads Amendment of 1920**, authorizing the issuance of no more than \$50 million in bonds for the construction of roads to connect the county seats within West Virginia, is passed by popular vote.

1921 The **Federal Highway Act of 1921** requires that each state designate seven percent or less of its total road mileage as a Federal-Aid system, increases the limit of federal participation in road costs to \$20,000 per mile, and requires pavement surface width of interstate roads be a minimum of 18 feet.

The WV Legislature issues \$15 million in road bonds and designates revenues from motor vehicle licenses to the newly created State Road Fund.

1922 The US Army produces the "Pershing Map," depicting for the first time the main roads of prime importance in time of war. All the routes on this map are eventually incorporated into the Federal-Aid system.

- 1923** The Nation's first parkway, New York's *Bronx River Parkway*, is opened to traffic. The four-lane, low-speed, access-controlled recreational road connects the public parks of northern New York City with city reservoirs in Westchester County.
- The WV Legislature issues \$15 million in road bonds and enacts the State's first gasoline tax (2¢ per gallon). The proceeds from this tax are to be deposited in the State Road Fund and are to be used for repair, maintenance, and reconstruction of roads and highways, and for the payment of interest on State road bonds.
- 1924** The US Congress authorizes the Secretary of the Interior to construct, reconstruct and improve roads and trails in the National parks and appropriates \$10 million over four years for such roads.
- 1925** The Joint Board on Interstate Highways devises the sign details and the numbering system of all US Numbered Route Highways. The numbering system uses even numbers for east/west routes, odd numbers for north/south routes, and multiple digit numbers for long distance routes.
- The WV Legislature issues \$20 million in road bonds and increases the gasoline tax, first to 3¢ per gallon, and then to 3.5¢ per gallon.
- 1927** The first national manual on rural traffic control signs, the *Uniform Manual for Highway Signs*, is published by American Association of State Highway Officials (AASHO).
- The first metropolitan area traffic counting in the Nation occurs in the Cleveland area. The count is completed with the cooperation of the Bureau of Public Roads.
- The WV Legislature authorizes the issuance of an additional \$15 million in road bonds and increases the gasoline tax to 4¢ per gallon.
- 1928** WV voters approve the **Good Roads Amendment of 1928**, authorizing the issuance of \$35 million in road bonds.
- 1929** The WV Legislature issues \$20 million in road bonds and creates the State Bridge Commission.
- 1930** The US Congress advances \$80 million to the states for matching regular Federal-Aid apportionments.
- The National Conference on Street and Highway Safety issues the *Manual on Street Traffic Signs, Signals and Markings*, the Nation's first manual on urban traffic signs.
- The WV Legislature issues \$15 million in road bonds.
- 1931** The WV Legislature authorizes the reissuing of \$10 million in bonds.
- 1932** The **Emergency Relief and Construction Act of 1932** appropriates \$120 million in advances to the states to match Federal-Aid funds (which are to be repaid by deduction from regular Federal-Aid apportionments over a period of ten years) and allows one percent additions to the Federal-Aid highway systems.
- The first federal gasoline tax (1¢ per gallon) is enacted.
- The **WV Tax Limitation Amendment of 1932** passed, while the Great Depression is at its worst in the State. This limits the amount of funds that might be raised from local property taxes

to such a degree that it is determined the counties will no longer be able to finance the construction and maintenance of local roads.

The WV Legislature abolishes the State Bridge Commission. All responsibilities of the Commission are transferred to the State Road Commission.

1933 The **National Industrial Recovery Act of 1933** provides \$400 million in grants to the states without the requirement that they be matched by state funds. For the first time, the funds may be used for construction on "secondary and feeder roads" not on the Federal-Aid system and for projects on urban streets that are extensions of the Federal-Aid highway system to and through municipalities.

The federal gasoline tax is increased to 1.5¢ per gallon.

The WV Legislature passes an act that places practically all roads on the State Road System and relieves the counties of the responsibility of their upkeep; 4,417 miles are officially designated as the new State Primary System of roads, while the Secondary System contains an additional 29,098 miles of roadway.

1934 The **Hayden-Cartwright Act of 1934** appropriates \$200 million for unmatched grants to the states; provides recession emergency funds of at least 25 percent of total cost for feeder routes; authorizes expenditures not to exceed one and a half percent of the federal funds for surveys, plans, and engineering investigations; abolishes the limit on federal payment per mile of road; requires states to use not less than one percent of their apportionments for the improvement of roadsides; and further provides for a one-third reduction of the Federal-Aid allotment to any state that increases its percentage diversion of highway-user funds.

The federal gasoline tax is decreased to 1¢ per gallon.

The WV State Road Commission issues its first permits for trucks.

WV's first Forest Highway Funds are used in the *Monongahela National Forest* in Pendleton County.

1935 The **Emergency Relief Appropriation Act of 1935** provides \$200 million for the elimination of railroad grade crossing hazards.

The first *Manual on Uniform Traffic Control Devices for Streets and Highways* is issued by AASHO.

With the completion of the last segment in Nebraska, US 30 becomes the Nation's first paved transcontinental highway.

The first segment of the German Autobahn opens to traffic. The network becomes a model for the US Interstate Highway System.

The WV Legislature authorizes the reissuance of \$10 million in road bonds and initiates the "privilege tax," a two percent tax levied on motor vehicles at the time of certification, which is deposited into the State Road Fund and used to match Federal-Aid funds allocated to the State for highway construction and maintenance.

1936 The **Agricultural Appropriations Act of 1936** allows a state to use as much as one and a half percent of its matched federal aid for plans, surveys and engineering investigations for future

work; this money provides the stimulus and the means for statewide highway planning surveys in every state.

The WV Legislature appropriates a \$2 million surplus from the General Fund to the State Road Fund, and gives the State Road Commission the right to acquire by eminent domain any bridge or bridge site across any stream separating WV from an adjoining state.

1937 The WV gasoline tax is increased to 5¢ per gallon.

1938 The **Federal-Aid Highway Act of 1938** authorizes landscaping and roadside development with regular Federal-Aid funds and also authorizes the construction of rest areas along main highways.

1939 The Bureau of Public Roads is transferred from the US Department of Agriculture to the Federal Works Agency and renamed the Public Roads Administration.

1940 The **Federal Highway Act of 1940** gives the Commissioner of Public Roads specific authority to give priority to defense highways in approving Federal-Aid projects.

The federal gasoline tax is increased to 1.5¢ per gallon.

The *Pennsylvania Turnpike* opens to traffic. This 160-mile toll facility is the prototype of the modern, high-speed Interstate highway.

The *Tacoma Narrows Bridge*, a 2,800-foot suspension bridge over Puget Sound in Washington, fails due to the aerodynamic forces caused by high winds. This failure leads to considerable research and improvement of future structures (see below).



A Mountain Road -- 1940

1941 The **Defense Highway Act of 1941** appropriates funds for construction on the strategic highway network and authorizes funds, without apportionment, for projects on access roads. The funds are to be available with or without state matching, and are usable for purchasing right-of-way and for off-street parking.

The *Market Street Bridge* in Weirton (Brooke County) and the *Silver Bridge* in Point Pleasant are purchased by the State and freed from toll.

1943 The **1943 Highway Act** (amending the Defense Highway Act of 1941) serves as a bridge between wartime and postwar programs by extending the emergency funding programs of the 1941 Act and amending the definition of construction in order to continue the use of Federal-Aid highway funds for the purchase of right-of-way.

1944 The **Federal-Aid Highway Act of 1944** authorizes a 40,000-mile National System of Interstate Highways (although no funds are specifically provided for its construction); provides for a specific system of secondary Federal-Aid highways (to be selected by the states and not limited in size); recognizes, for the first time, a system of urban extensions of rural Federal-Aid highways; and

authorizes, by system in a 45:30:25 ratio, funds for primary, secondary, and urban (ABC) systems for each of three successive years.

The Public Roads Administration, with the help of the Bureau of the Census, develops the "origin-and-destination survey," a sampling technique used to estimate future traffic flows.

The *Shadle Bridge* in Point Pleasant is freed from toll.

1945 "Minimum" and "Desirable" design standards for the Interstate System are developed by AASHO and approved by the Federal Works Administrator.

Good Roads Committees are formed, and \$4 million are earmarked for "farm-to-market" road improvements.

1946 The **General Bridge Act of 1946** requires that, within 20 years of construction or acquisition, tolls be removed from all interstate bridges.

California completes the Nation's first statewide highway needs study.

The *Prince Bridge* in Fayette County, the *Chelyan Bridge* in Kanawha County, the *Parkersburg-Belpre Bridge* and the *Williamstown-Marietta Bridge* in Wood County, and the *St. Marys-Newport Bridge* in Pleasants County are all freed from toll.

1947 The 47-mile *Maine Turnpike* opens to traffic.

The WV Legislature enacts a law permitting the construction of toll roads; creates the Department of Motor Vehicles to regulate driver's licenses and the titling and registration of motor vehicles; and creates the Aeronautics Commission to supervise and control all commercial airports and landing fields, aviation schools, and other phases of aerial activity.

1948 The **General Bridge Act of 1946** is amended to extend the period for removing tolls to 30 years.

WV voters approve the **Fifty Million-Dollar Bond Issue** to provide funds for the construction of a system of State secondary roads and highways.

Construction begins on WV's first limited-access highway – US 119/WV 10 in Logan County.

1949 The Public Roads Administration is transferred to the US Department of Commerce and becomes the Bureau of Public Roads.

1950 The **Federal-Aid Highway Act of 1950** permits states to borrow funds in the bond market against future Federal-Aid apportionments; increases federal participation in right-of-way costs to 50 percent; allows states to use future Federal-Aid apportionments to retire the principal of bonds issued to finance improvements on the Primary System, including the Interstate System; and requires state highway departments to hold public hearings for all projects bypassing cities or towns.

The Bureau of Public Roads publishes the first edition of the *Highway Capacity Manual*.

The *New Hampshire Turnpike* opens to traffic.

- 1951** The federal gasoline tax is increased to 2¢ per gallon. The first federal tax on diesel fuel (2¢ per gallon) is enacted.
- 1952** The **Federal-Aid Highway Act of 1952** authorizes, for the first time, funds solely for the construction of the National System of Interstate Highways. This Act apportions \$25 million, to be matched by the states on a 50:50 basis, for each of the fiscal years 1954 and 1955.
- The 117-miles *New Jersey Turnpike* opens to traffic. The success of this and certain other toll roads marks the beginning of a National toll road movement.
- Colorado builds the 17-mile *Denver-Boulder Turnpike*.
- 1953** Oklahoma completes the 88-mile *Turner Turnpike* between Oklahoma City and Tulsa.
- 1954** The **Federal-Aid Highway Act of 1954** increases the Federal-Aid program to \$875 million per year; earmarks \$175 million in fiscal years 1956 and 1957 for the Interstate System; and increases the federal share to 60 percent on Interstate projects.
- President Dwight D. Eisenhower appoints a Federal Interagency Committee to study highway policy within the Government and asks General Lucius D. Clay to head an advisory committee (thereafter known as the Clay Committee) of prominent citizens to determine National transportation needs and recommend a financing plan.
- In November, the *West Virginia Turnpike* opens to traffic. The two-lane toll road from Charleston to Princeton is the State's first high-speed expressway.
- 1955** The Clay Committee report, *A 10-Year National Highway Program*, is submitted to President Eisenhower.
- West Virginia gasoline tax increases to 6¢ per gallon.
- 1956** The passage of the **Federal-Aid Highway Act and the Highway Revenue Act of 1956** earmarks federal highway-user revenues for federal highway aid by creating the Highway Trust Fund and appropriating into it the proceeds of all federal taxes on motor fuel, tires and tread rubber, and portions of certain other excise taxes, resulting in a wholly highway-user supported "pay-as-you-go" Federal-Aid highway program; requires that the Davis-Bacon Act of 1935 should apply to all contracts for the Interstate System; provides for accelerated completion of the "National System of Interstate and Defense Highways" (the Interstate System); and requires public hearings for projects through cities and towns.
- Missouri becomes the first state to award a contract with the new Interstate Construction funding, for work on US 66 (now I-44) in Laclede County. Additionally, work begins on US 40 (now I-70) in St. Charles County, becoming the first Interstate project to begin construction. The first concrete paving initiated after the enactment of the 1956 Act begins on a two-lane section of US 40 (now I-70), west of Topeka, Kansas.
- The federal gasoline tax and diesel fuel taxes are each increased to 3¢ per gallon.
- 1957** AASHTO announces the numbering scheme for the Interstate System and displays the red, white and blue Interstate shield, which is a combination of designs submitted by Missouri and Texas. The Bureau of Public Roads subsequently approves the numbering plan and the route marker.
- 1958** The **Federal-Aid Highway Act of 1958** requires public hearings for all Interstate System projects.

1959 Federal gasoline and diesel fuel taxes are each increased to 4¢ per gallon.

WV enacts the Motor Carrier Road Tax, imposing a tax on each gallon of gasoline and other fuel used by every motor carrier operating within the State.

WV gasoline tax increases to 7¢ per gallon.

1962 The **Federal-Aid Highway Act of 1962** increases the total appropriation for the Primary, Secondary and Urban Extensions (ABC) Systems; authorizes the US Secretary of Commerce to make payments for "reasonable and necessary expenses" required for the relocation of families; requires comprehensive planning in urban areas (those with a population of 50,000 or more people); and requires state highway agencies to spend a minimum one and a half percent of apportioned funds for research and planning.

The US Congress approves the *Highland Scenic Highway*, a 165-miles, two-lane forest road between Gorman (Grant County) and Richwood (Nicholas County), which is to be patterned after Virginia's *Skyline Drive*.

1964 WV voters approve the **Better Roads Amendment of 1964**, which allows the issuance of \$200 million in bonds for the construction of free State roads and highways.

1965 The **Appalachian Regional Development Act of 1965** authorizes funds to provide a highway system that will serve areas possessing development potential, but where commerce and communication have been inhibited by a lack of adequate access. Of the thirteen Appalachian states, only West Virginia is located entirely within the Appalachian Region's boundaries.

The **Federal Highway Beautification Act of 1965** is enacted to control the erection and maintenance of outdoor advertising signs, displays, and devices in areas adjacent to the Interstate and Primary systems.

1966 Several federal regulations are enacted.

- The **Department of Transportation Act of 1966** creates the US Department of Transportation to develop and coordinate National transportation policies and programs that are consistent with other National objectives.
- The **Highway Safety Act of 1966** provides a coordinated National safety program by requiring each state to have a highway program designed to reduce traffic accidents; and creates the National Highway Safety Agency.
- The **National Traffic and Motor Vehicle Safety Act of 1966** establishes safety standards for motor vehicles involved in interstate commerce; expands the National driver registry; and establishes both the National Motor Safety Advisory Council and the National Traffic Safety Agency.
- The **National Historic Preservation Act of 1966** requires special planning consideration for historic resources affected by federal public works projects; and
- The **Federal-Aid Highway Act of 1966**, the "4(f)" provision, is intended to mitigate the impact of a transportation project on the land within a park, recreational area, wildlife/waterfowl refuge, or historic site.

- 1967** The **Appalachian Regional Development Act of 1965** is amended to authorize \$715 million for the program over the following four fiscal years.
- The Bureau of Public Roads joins the newly created US Department of Transportation and becomes the Federal Highway Administration.
- The WV Legislature authorizes the issuance and sale of \$20 million in road bonds, and replaces the State's Primary and Secondary systems with a functional road classification system consisting of four systems: Expressway (X), Trunkline (T), Feeder (F), and State Local Service (SLS).
- On December 15, one of the most dramatic and tragic failures of a major engineering structure occurs in Point Pleasant, as the *Silver Bridge*, a 39-year old eye-bar suspension bridge across the Ohio River, collapses, killing 46 people. Subsequent investigations show the failure was initiated by fracture of an eye-bar in the suspension chain and could not have been detected by any current inspection method without disassembly of the eye-bar.
- 1968** The **Federal-Aid Highway Act of 1968** establishes National bridge inspection standards (affected by the collapse of the *Silver Bridge* in 1967); requires a National functional classification study; and requires the extension of Davis-Bacon coverage to all Federal-Aid highway projects.
- WV voters approve the **Roads Development Amendment of 1968** for the issuance of \$350 million in bonds for road construction.
- 1969** The **National Environmental Policy Act of 1969** (NEPA) requires a written evaluation of the environmental impacts of a proposed transportation project. This evaluation must then be made available to interested parties for public comment.
- 1970** The **Federal-Aid Highway Act of 1970** establishes a new Federal-Aid urban system (the D system) in "urbanized" areas (those with populations of 50,000 or more); establishes the Bridge Replacement and Rehabilitation Program; and authorizes "economic growth center development highways" to revitalize and diversify the economy of rural areas and smaller communities. In WV, only Huntington (Cabell County) and Parkersburg (Wood County) are eligible for this program.
- The **1970 Clean Air Act** establishes National Ambient Air Quality Standards (NAAQS) and mandates greater integration of transportation and air quality planning procedures.
- The **Uniform Relocation Assistance and Real Property Acquisition Policies Act of 1970** requires state transportation agencies to pay fair market value for the acquisition of homes within a proposed project right-of-way and to provide suitable housing for persons displaced by the project.
- The WV Legislature authorizes the sale of \$90 million in road bonds; changes the name of the State Road Commission to the Department of Highways; and increases the gasoline tax to 8.5¢ per gallon.
- 1971** The WV Legislature authorizes the sale of \$110 million in road bonds; repeals the capitation tax; and increases the motor vehicle privilege tax to five percent, with all revenues to be deposited into the State Road Fund.

- 1972** Responsibility for the construction and maintenance of roads within WV's State parks and forests, and public hunting and fishing areas, is transferred from the Department of Natural Resources to the Department of Highways.
- 1973** The **Federal-Aid Highway Act of 1973** allows the Highway Trust Fund, for the first time, to be used for public mass transportation systems; allows bicycle facilities and pedestrian walkways to be financed with Federal-Aid funds; and authorizes Federal-Aid funds for noise abatement measures on existing Federal-Aid highways.
- The **Highway Safety Act of 1973** establishes the Highway Safety Improvement Program (HSIP).
- The **Endangered Species Act of 1973** requires the determination of the presence or absence of threatened or endangered species within a proposed project area.
- AASHO becomes the American Association of State Highway and Transportation Officials (AASHTO).
- Funds for construction of the *Highland Scenic Highway* are authorized by the US Congress. This parkway, from Richwood (Nicholas County) to Barton Knob (Pocahontas County), is to be considerably shorter than the route approved in 1962.
- WV voters approve the **Better Highways Amendment of 1973** for the issuance of \$500 million in bonds for road construction.
- 1974** In an effort to reduce the Nation's need for imported oil during a gas crisis, the US Congress establishes a National maximum speed limit of 55 mph.
- 1976** The **Federal-Aid Highway Act of 1976** establishes the Interstate 3R Program (resurfacing, restoring, and rehabilitating). Additionally, the Federal-Aid systems are realigned on a functional classification system basis, resulting in a Federal-Aid system mileage decrease of almost 3,800 miles in WV.
- 1977** The *New River Gorge Bridge* on US 19 in Fayetteville (Fayette County) opens to traffic, completing a major link in the State's Expressway system. This bridge rises 876 feet above the New River and has a length of 3,030 feet, making it the longest single-span, steel arch bridge in the world.
- 1978** The **Surface Transportation Assistance Act of 1978** consolidates safety construction programs by establishing the Hazard Elimination Program; and contains several provisions to accelerate completion of the Interstate System.
- The Highway Performance Monitoring System (HPMS) is developed in an effort to provide data on the conditions, performance, usage, and operating characteristics of the Nation's highways for use in developing and evaluating Federal-Aid Highway Programs and funding levels.
- The WV Legislature increases the gasoline tax to 10.5¢ per gallon.
- The *Winfield Bridge* is freed from toll.
- 1980** Manufacture of ethyl alcohol for personal use in the production of gasohol is permitted in WV, with the stipulation that it may not be sold.

Former Prisoners of War (POWs) and recipients of the Congressional Medal of Honor are exempted from paying vehicle registration fees.

"Bridge Day" is held for the first time. This annual one-day event allows parachutists to jump from the *New River Gorge Bridge*.

1981 The **Federal-Aid Highway Act of 1981** establishes the Interstate 4R Program (resurfacing, rehabilitation, restoration and reconstruction).

WV now requires child passenger restraint devices in vehicles that regularly transport a child under five years of age.

WV voters reject a road bond amendment for the first time in State history, as the \$750 million **Roads for Jobs & Progress** bond issue is soundly defeated.

1982 The **Surface Transportation Assistance Act of 1982** establishes the Mass Transit Account within the Highway Trust Fund. This Account is to receive one-ninth of the motor fuel tax revenues to be used for transit capital expenditures.

1983 Federal gasoline and diesel fuel taxes are increased to 9¢ per gallon.

WV's five percent wholesale price tax on gasoline and special fuels dedicated to highways is enacted. In effect, this tax increases the State gasoline tax by 4.85¢ per gallon, to 15.35¢ per gallon. (**Note:** hereafter, unless otherwise noted, any WV gasoline tax reported in this chapter includes 4.85¢ per gallon as an equivalent wholesale tax.)

WV's **Grant Anticipation Notes Bill** is enacted. These notes, issued in anticipation of federal money, will finance improvements on I-64 and the WV Turnpike.

WV allows vehicles to legally operate with increased size, weight, and load limitations on certain routes specified in federal law, and on others, which the Commissioner of the Department of Highways may designate.

1984 The **Motor Carrier Safety Act of 1984** sets procedures for determining the safety fitness of carriers.

The federal diesel fuel tax is increased to 15¢ per gallon.

WV voters reject the **Better Schools, Roads and Public Works Construction Amendment** that would impose a statewide levy for schools, and an additional 1¢ in general consumer sales tax for school, highway and bridge construction or replacement. The total bond obligation for highways and bridges would have been \$200 million.

1985 Restrictions are placed on vehicle height, length, and saddle mount in WV.

The WV Legislature creates the New River Parkway Authority to promote recreational, tourism, industrial, economic, and community development of the New River Parkway in Raleigh and Summers Counties.

1986 The **Commercial Motor Carrier Safety Act of 1986** establishes a uniform National program to identify, qualify, and control commercial drivers.

WV voters reject the **Highway and Bridge Improvement Amendment** for the sale of a maximum of \$500 million in road bonds, to be funded by the collection of an additional one percent sales tax.

1987 The **Surface Transportation and Uniform Relocation Assistance Act of 1987** authorizes funds for the Strategic Highway Research Program (SHRP), a cooperative research program directed primarily toward highway construction materials and procedures, and allows a 65 mph maximum speed limit on rural segments of Interstate System highways.

The federal gasoline tax is increased to 9.1¢ per gallon, and the federal diesel fuel tax is increased to 15.1¢ per gallon.

The reconstruction of the *WV Turnpike*, which began in 1973 to meet Interstate System standards with accepted exceptions, is completed at a total cost of almost \$700 million.

1988 In June, the final segment of Interstate 64 (Sam Black Church to Beckley) is opened to traffic, completing WV's Interstate System. This segment contains the \$29 million *Glade Creek Bridge*, which rises approximately 700 feet above Glade Creek in Raleigh County, and has a length of 2,179 feet.

WV's Small Bridge Program is implemented to enhance the existing bridge program, which is intended to preserve and renovate the State's bridges, many of which are structurally obsolete or functionally deficient.

1989 To encourage the use of wood for bridge construction, the US Congress establishes the Timber Bridge Initiative Program, to include research, technology transfer, and demonstration bridges.

The WV Legislature creates the West Virginia Department of Transportation (WVDOT), which has jurisdiction over (among others) the Division (formerly the Department) of Highways, the Parkways, Economic Development and Tourism Authority (WVPEDTA, formerly the WV Turnpike Commission), and the Division (formerly the Department) of Motor Vehicles (DMV).

The WV Special Highway Fund is created. This Fund is to receive monies from the WVPEDTA as reimbursement of State Road Fund monies used to match federal Interstate funds expended to upgrade the WV Turnpike to Interstate System standards. Monies from this Fund may only be used to upgrade or add interchanges, to construct Expressway or Feeder roads, or to upgrade or construct information centers, visitor centers, or rest stops, provided these projects are located within 75 air miles of the WV Turnpike.

WV's Industrial Access Road Fund is established. This fund is to receive one-half percent of all remaining motor fuel revenues, to be dedicated to the State Road Fund. These funds are to be used for construction and maintenance of access roads to industrial sites.

The WV gasoline tax is increased to 20.35¢ per gallon.

1990 The federal gasoline tax is increased to 14.1¢ per gallon, and the federal diesel fuel tax is increased to 20.1¢ per gallon.

The **Clean Air Act Amendments of 1990** establish criteria for attaining and maintaining air quality standards. Areas with levels of pollutants that violate the standards are designated as non-attainment areas (for whichever pollutant is involved) and must reduce the emissions from the source (mobile, stationary or area) causing the pollution.

The Interstate System is renamed the *Dwight D. Eisenhower National System of Interstate and Defense Highways*, in honor of the Nation's 34th President, who approved the Federal Highway Act of 1956, which authorized the Interstate System.

1991 President George Bush signs the **Intermodal Surface Transportation Efficiency Act of 1991 (ISTEA)** which provides authorizations of \$155 billion over the following six years for highway, highway safety, and mass transit projects. The Act also replaces the existing Federal-Aid systems (Interstate, Primary, Secondary, and Urban) with two systems: the National Highway System (NHS), consisting primarily of the existing principal arterial system; and the Interstate System, which is part of the NHS, but receives separate funding. Additionally, the Surface Transportation Program (STP) provides funding for any road not functionally classified as local or rural minor collectors.

Appalachian Corridor E (US 48) is officially redesignated as Interstate 68.

1992 The Commercial Driver's License (CDL) requirement ensures that truck and bus drivers across the country meet uniform standards.

The *Midland Trail* and the *Highland Scenic Highway* are designated West Virginia Byways.

1993 As part of President Bill Clinton's **Omnibus Budget Resolution**, the federal gasoline tax is increased to 18.4¢ per gallon. The federal diesel fuel tax is increased to 24.4¢ per gallon. To reduce the federal deficit, 6.8¢ of each tax is to be deposited in the General Fund.

The WV gasoline tax is increased to 25.35¢ per gallon (the 5¢ increase is to be used solely for matching Federal aid.) WV becomes the 43rd state to enact a mandatory safety belt law, by requiring safety belt use by all front-seat passengers and all back-seat passengers under the age of 19.

1994 The *Coal Heritage Trail* is designated a West Virginia Byway.

West Virginia becomes a member of the International Fuel Tax Agreement (IFTA), a fuel tax reciprocity agreement among the States and the Canadian provinces that simplifies the reporting and payment of all fuel taxes by interstate motor carriers for all IFTA qualified vehicles.

1995 The **National Highway System Designation Act of 1995 (NHS Act)** is enacted. Almost 160,955 miles of highway compose the NHS, with WV's portion consisting of over 1,736 miles. This Act also eliminates the federally mandated 65 mph. national speed limit.

The amount of federal gasoline and diesel fuel taxes, to be deposited into the General Fund to be used for deficit reduction, is decreased to 4.3¢ per gallon of fuel.

The WV Legislature creates the Corridor G Regional Development Authority to promote, develop, and advance the business prosperity and economic welfare of the area adjacent to Corridor G (US 119) in Boone, Lincoln, Logan, and Mingo Counties.

The percentage of funds dedicated to the WV Industrial Access Road Fund is increased to three-fourths percent.

1996 The federal gasoline tax is decreased to 18.3¢ per gallon. The federal diesel fuel tax is decreased to 24.3¢ per gallon. To reduce the deficit, 4.3¢ of each tax continues to be deposited in the General Fund.

The *Highland Scenic Highway* is designated a **National Scenic Byway** by the Federal Highway Administration, becoming one of only 14 such routes in the US

WV designates six new Byways: *Old Route 7*, the *Cheat River Byway*, the *Northwestern Turnpike*, the *Staunton-Parkersburg Turnpike*, the *Little Kanawha Parkway*, and the *Farm Heritage Road*.

The WV Legislature creates the Coalfields Expressway Authority to promote and advance the construction of a modern highway through McDowell, Raleigh, and Wyoming Counties.

The \$550 million **Safe Roads Amendment of 1996** is approved by WV voters. Proceeds of the bonds may be used to match available federal funds for highway construction in WV and for general highway construction or improvements in each of the State's 55 counties.

A State law is enacted requiring that all children under the age of 15 must wear approved protective bicycle helmets while riding a bicycle on public roads, public bicycle paths, and other public right-of-ways.

The first bridge in the US to use fiber-reinforced plastic rebar in the concrete deck is built across Buffalo Creek in McKinleyville (Brooke County).

1997 The WV Legislature creates three highway authorities; The Robert C. Byrd Corridor H Highway Authority is to promote and advance the construction of a modern highway through Randolph, Tucker, Grant, Hardy, Barbour, Upshur, and Lewis Counties; the WV 2 and I-68 Authority is to promote and advance the construction of a modern highway through Wood, Pleasant, Tyler, Wetzel, Marshall, Ohio, Brooke, Hancock, Marion, and Monongalia Counties; and the Little Kanawha River Parkway Authority is to promote and advance the construction of a modern highway through Wirt, Braxton, Gilmer, Calhoun, and Wood Counties.

At the request of the WV Legislature, the WVDOH increases the speed limit to 70 mph on most rural Interstate System segments; 65 mph on most rural Appalachian Development Highway Corridor segments; and 60 mph on certain other rural Expressway segments.

1998 The Orphan Road Program, also known as the Home Access Roads Program (HARP), is made possible through House Bill 4003 passed by the West Virginia Legislature in March, and signed by Governor Cecil H. Underwood.

The Transportation Equity Act for the 21st Century (TEA-21) is enacted as Public Law 105-178. TEA-21 authorizes the federal surface transportation programs for highways, highway safety, and transit for the 6-year period 1998-2003. The TEA-21 Restoration Act provided technical corrections to the original law. TEA-21 enabled the Appalachian Development Highways System corridors to be funded from the Federal Highway Trust Fund.

West Virginia issues the first \$220 million of \$550 million in general obligation bonds authorized in 1996 for general highway construction.

1999 West Virginia issues an additional \$110 million in general obligation bonds for highway construction.

Matching percentages for the Recreational Trails Program Grant change from 50/50 to 80/20, making it easier for sponsors to match grant funds.

2000 West Virginia issues an additional \$110 million in general obligation bonds for highway construction.

The West Virginia Legislature establishes a fee on the issuance of a certificate of title purposed for tire reclamation and environmental clean up.

2001 West Virginia issues the final \$110 million of Safe Road Amendment Bonds approved by voters in 1996. The gasoline and special fuels excise tax rate of 20.5 cents per gallon is extended until 2007 at which time it will revert to 15.5 cents per gallon.

2003 SB 583 creates the Coal Resource Transportation System (CRTS) in 15 southern WV counties, for coal and coal by-products to be transported at weights up to 126,000 pounds. The bill also creates the Coal Resource Transportation Road Fund for the maintenance and improvement of CRTS roads and bridges.

2004 Statewide changes in roadway gross vehicle weight (GVW) are imposed. All US and WV state routes are increased to an 80,000 lb maximum limit with a 10% tolerance. Use of Federal Bridge Formula is restricted to Interstate Systems only. Heavy vehicles are assigned maximum GVW's based upon configuration and number of axles.

Gasoline and Special Fuel Excise Tax, Motor Carrier Road Tax, and Wholesale Motor Fuel Tax are combined and renamed Motor Fuel Excise Tax. The tax is comprised of a flat rate and variable rate component. The flat rate component is 20.5 cents per gallon until 2007, at which time it reverts to 15.5 cents per gallon without legislative action. The variable rate component is set at 5% of wholesale price per gallon, which may not be less than 97 cents per gallon.

2005 CRTS is expanded to include Braxton and Ohio Counties. A committee is appointed to approve expansion of CRTS to additional counties and routes as requested.

2006 SB 673 allows counties to vote on a service fee for special infrastructure projects within their borders.

SB 759 creates the Highway Pilot Design Build Program Act

2007 HB 2955 continued the flat rate component of the Motor Fuel Excise Tax at 20.5 cents per gallon.

HB 2877 funds entities ensuring public safety on State highways

SB 690 exempts Consumer Sales and Service Tax on highway construction and maintenance materials

2008 SB 265: Valuation of Aircraft: This reduces the personal property taxes on private jets by using the salvage value to determine the taxes.

SB 567: ATVs: Restricts ATVs to the shoulder on paved roads. In the event the road does not have a shoulder, the rider is to stay to the far right on the paved portion of roadway.

SB 686:, WV Infrastructure Council: Will require DOH to consider culvert installation for all utilities, including broadband, when designing a roadway.

HB 4047, Cell Phones: Defines talking on a hand held phone or text messaging a secondary offense subject to fines.

HB 4072 Board of Registration for Professional Engineers: Will require Board to undergo legislative reviews like most other agencies and boards.

HB 4094, Public Employee Training: Requires training to be required for current position and not for advancement. Training for advancement would require commitment of employee to continue working with State Government for 2? Years.

HB 4476:, Public Private Partnerships: As a pilot program, bill would allow the DOH to create public private partnerships to construct roadways.

HB 4524, Ethical Standards of Public Officers, Employees and Lobbyists: Would permit public employees to collect airport frequent flyer miles provided there is no additional cost to the state agency.

2009

SB 384, Control of Highways in Emergencies: The bill requires the fire chief, or other fire commander, to create an incident management team which will collaborate with the DOH and the State Police. The new law further requires the fire chief to call the DOH if he knows or anticipates that the incident will close the road for 2+ hours and the DOH shall respond. Once the incident is determined to be safe, the incident commander shall turn the roads over to the DOH and state police to facilitate the movement of traffic.

HB 2753, Continuation of Pilot Design-Build Program: The bill continues the pilot program with an additional 10 projects for a total of \$150 million, excluding any projects funded through federal stimulus or earmarked allocations.

HB 2218, DOT Rules: The new rules bill creates the memorial highway sign program and will allow scrolling on outdoor advertising. The Traffic Engineering Division will be providing guidance on how the agency will process requests for memorial signs and the information will be included on the DOH website.

2010

SB 183, Diesel-Powered Motor Vehicle Idling Act: Prohibits the idling of diesel powered vehicle of 10,000 lbs or more for more than 15 minutes in an hour. The new law does not apply to construction equipment that cannot be licensed for on-road driving or construction equipment that is not designed primarily for on-road driving, notwithstanding that such equipment may be operated or driven on-road from time to time and in the course or performing its primary functions to power work-related mechanical, safety or electrical operations related to construction operations other than propulsion.

SB 219, Managing State Motor Vehicle Fleet: Requires Dept of Administration to handle all motor vehicles and aircraft owned by State Government. Allows secretary of DOA to designate locations where vehicles may be parked for use by employees. Requires emergency rules.

SB 352, Community Empowerment Transportation Act: Allows municipalities and counties to fund highway projects with approval of the DOT and allows sponsor to sale bonds, create tolls and to use other forms of innovative financing to fund roadway in accordance with stipulates contained in a Master Agreement.

NOTE: New bill also requires developers of commercial access and subdivisions to provide a bond which may be held for a maximum of ten years. The bonding, however, shall not apply to residential development of 100 homes or less.

SB 427, Parkways Authority: Changes name to Parkways Authority and eliminates agency from doing additional economic development and tourism projects. The new law allows the DOT to transfer projects from the DOH to WVPA for further development into a toll road/bridge. The DOH will be reimbursed costs incurred if the project is transferred.

SB 477, Centralized Legislative Reports filing: Requires all agencies to provide copies of any legislative reports to the Legislative Librarian by internet.

SB 527, Require SRA to establish transportation/local rail plan: Requires SRA to develop a transportation and local rail plan for freight and rail passenger service and with consideration of possible connections to multi-modal facilities.

SB 698, Mini-Trucks Requirements: Allows non-registration and titling of farm vehicles, allows vehicles to travel up to 35 miles from one farm to another or for repair, allows mini-trucks to use highway with a farm use exemption certificate.

HB 4172, Allows DMV to issue specialty plates: DMV, in addition to the Legislature, may authorize the use of specialty plates provided that organization meets requirements established by DMV.

HB 4223, Safe of School Children on School Buses: Requires all vehicles to stop when school bus lights are flashing except on CA R/W or where passengers are not permitted to cross. Driver, upon conviction of a 1st offense, is guilty of a misdemeanor with a penalty of \$150-\$500, not more than 6 months jail or both. Three or more offenses are subject to \$500 fine, six months jail, or both. DMV is authorized to suspend the driver's license for 30 days on first offense, 90 days for a second, and 180 days for three or more convictions.

HB 4359, Local Labor on Public Construction Projects: Requires public construction projects of \$500,000 or more to use employees within a 50 mile range. The law does exempt any project which has federal funding.

HB 4450, Land surveyors: Requires county surveyors to be licensed after 1-1-13.