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LITTLE ROCK, ARK.

STATE OF ARKANSAS

FIFTH
BIENNIAL REPORT

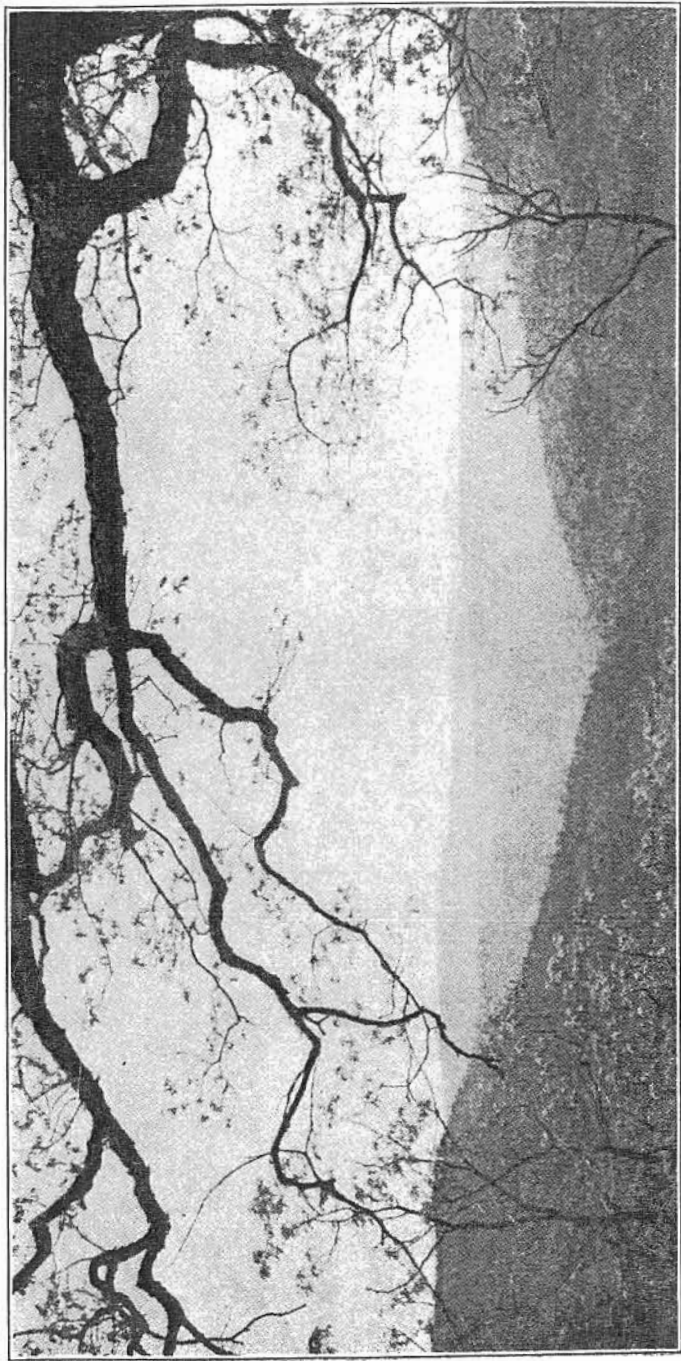
of the

Department of
State Lands, Highways
and Improvements



For the Period Ending June 30, 1922

Press of
H. G. Pugh & Co.
Little Rock



Many of the principal highways of Arkansas traverse the mountainous regions. This picture was taken from a point on the Russellville-Harrison Road in the Southern part of Newton County and illustrates the wonderful scenery to be found by the auto traveler.

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LETTER OF TRANSMITTAL.

To the Governor and the General Assembly of the State
of Arkansas:

In compliance with Act No. 7 of the Acts of 1921, we submit herewith the Fifth Biennial Report of the Department of State Lands, Highways and Improvements for the year 1921 and the first six months of the year 1922.

Your particular attention is invited to the general summary of our recommendations on maintenace, road improvement district laws, motor vehicle and gasoline taxes and the collection of same, and the establishment of a system of adequate State highways.

Respectfully submitted,

HERBERT R. WILSON, Chm.,
J. S. TURNER, Member,
JNO. B. FORDYCE, Member.

**DEPARTMENT OF STATE LANDS, HIGHWAYS
AND IMPROVEMENTS.**

State Highway Commission.

Herbert R. Wilson, Chairman.....	Little Rock
J. S. Turner, Member.....	Ozark
J. R. Fordyce, Member.....	Hot Springs
Guy A. Freeling, Secretary.....	Little Rock

Highway Division.

R. C. Limerick, State Highway Engineer.....	Little Rock
G. Hunter Sykes, District Engineer.....	Little Rock
A. W. Buford, District Engineer.....	Forrest City
F. L. Hargett, District Engineer.....	Pine Bluff
Richardson Ayres, District Engineer.....	Hope
W. C. Hight, District Engineer.....	Fayetteville
O. L. Hemphill, Office Engineer.....	Little Rock
N. B. Garver, Bridge Engineer.....	Little Rock

Advisory Board.

Edgar Brewster, Chairman.....	Pine Bluff
G. P. Stocker, Member.....	Fayetteville
R. C. Limerick, Member.....	Little Rock

Land Division.

Joe A. Bailey, Deputy Commissioner.....	Little Rock
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Automobile Division.

George M. Allen, Deputy Commissioner.....	Little Rock
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SUMMARY OF RECOMMENDATIONS.

Throughout the body of this report will be found a number of recommendations by the Commission for the material betterment of the Department and the improvement of the Highway situation in Arkansas. These recommendations in brief are as follows:

Provide for the designation of a State System of Highways of approximately 6,700 miles and make it the duty of the State Highway Commission to adequately maintain this system by the use of patrol maintenance, appropriating adequate funds for the purpose. Give the Commission ample authority to carry out the work economically and efficiently.

Provide for the proper marking of the designated system of roads and provide for the policing of the system by State employes with authority to enforce traffic regulations and the motor vehicle license laws.

Provide for the increase of the motor vehicle license fees, increasing the minimum rate on passenger cars to \$15.00 and on 1-ton trucks to \$25.00, with proportionate increases for larger vehicles. Provide for a tax of \$15.00 per quarter on log wagons and an increase in dealers' license fees to \$100.00.

Provide for an increase in the gasoline tax to three cents per gallon and the collection of same at the source.

Provide for the amendment of Act 302, increasing certain salaries and allowing the Department to employ adequate personnel to handle the work effectively.

Provide for the amendment of the general road law, raising the limit of assessed benefits to 40% and eliminating some of the unnecessary procedure now required. Provide for the approval of the sale of bonds and the award of any contract before such instrument becomes valid.

Provide for the direct supervision of all construction work on the designated system of State Highways by the Department and require road improvement district funds for such work to be placed in escrow and paid out only on estimates approved by the State Highway Commission.

Provide for Internal Improvement Land Records to be completed and brought up to date.

Provide that the method of the sale of Islands be changed to conform with the procedure as in the sale of school land.

HIGHWAY DEPARTMENT

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**STATE AND FEDERAL LAWS AFFECTING THE
ORGANIZATION OF THE STATE HIGH-
WAY DEPARTMENT.**

Act 302, 1913: On March 31, 1913, Governor Oldham approved Act 302, which had been passed by the Legislature, creating the State Highway Department and making it a part of the Department of State Lands, changing the name of the Department to that of State Lands, Highways and Improvements. This Act provides that the Commissioner of State Lands shall be Commissioner of the new Department and shall be Ex-officio Chairman of the State Highway Commission and that two other Commissioners shall be appointed by the Governor for terms of office of two years. The Act provided for the collection of a license fee of \$10.00 per annum on motor vehicles, the amount collected, less the fees allowed, to be placed in the hands of the State Treasurer to the credit of the Highway Improvement Fund, this fund to be used to pay the expenses of the Department. The salary of the Commissioner was fixed at \$2,500.00 per annum and that of the State Highway Engineer at \$3,000.00

Act 338, 1915: In 1915 developments in road building and the need for improved roads indicated the necessity of the passage of some legislation of a general character which would provide for the creation and establishment of Road Improvement Districts. The constitutional limitations preventing the issuance of State or County bonds delayed any real progress in road building until some law could be placed on the statute books allowing communities to band together into a corporate unit for the purpose of constructing needed improvements and assessing the cost against the property benefited.

After much consideration the Legislature passed Act No. 338, commonly known as the Alexander Law. This Act permits the organization of improvement districts, specifies the procedure to be followed and fixes the amount of money that can be raised against the real property as 30% of the total assessed valuation of the property included in the boundaries of any district.

While this general law is workable, in many cases a number of Road Improvement Districts have found it cumbersome and not adaptable to their particular needs and for these reasons may be credited a great many of the Special

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Acts passed by recent Legislatures. To sum up the principal objections to this Act, they can be given briefly as follows:

1. The limit of 30% of the assessed real property valuation does not permit in many cases the raising of sufficient funds to build roads of the type justified. This limit should be raised to 40% with the provision to allow a greater increase where a majority of the property owners desire.

2. The long drawn out procedure works to the disadvantage of the improvement and is cumbersome.

3. The Act provides for approval of the procedure by the County Judges. It would be well to make the County Judge ex-officio member of the Commission.

4. The Act does not fix the compensation of Attorneys. This should be done so as to cover a reasonable fee for organization and a schedule of fees for extra services.

5. The maintenance provisions of the Act are very poor. An annual tax should be fixed so as to provide for maintenance and the actual performance of maintenance work should be placed under the control of the State Highway Department.

6. The Act permits the issuance and sale of bonds by the Commissioners. As these men are frequently not acquainted with such matters, all bond sales should be approved by some State authority before becoming valid.

7. The Act permits the road district to call on the State Highway Department for supervision of the work. This provision should be made mandatory when the improvement forms a part of a designated system of highways and the Commissioners should be required to place the district funds in escrow to be spent by the State Highway Department.

Federal Aid Act: Shortly after the passage of this Act the Federal Government saw the necessity of taking a part in road building activities and aiding the several States in their work, and on July 11, 1916, Congress enacted a law generally known as the Federal Aid Road Act. This Act provided for the participation of the Federal Government in road building under the direction of the Secretary of Agriculture and appropriated funds. This Act was amended on February 28, 1919, at which time additional aid was ap-

appropriated. The annual appropriation made available under the act and its amendment are as follows:

1917	.....	\$ 82,689.10
1918	.....	165,378.20
1919	.....	1,090,247.99
1920	.....	1,596,436.09
1921	.....	1,685,178.09
Total	.....	\$4,619,929.47

Act 105, 1917: The provisions of the original Federal Aid Road Act were such that the State of Arkansas could not avail itself of the money appropriated unless some additional legislation was passed. Consequently, at the 1917 session of the State Legislature Act 105 was passed and approved binding the State to an agreement with the Act of Congress and enlarging the personnel of the State Highway Department.

Advisory Board Created: At this time an Advisory Board was created for the purpose of recommending to the State Highway Commission the apportioning and distribution of both State and Federal Aid funds. The Advisory Board as created consisted of the State Highway Engineer, the Professor of Civil Engineering at the State University and a third member appointed by the Governor. An appropriation of \$496,134.60 of the Highway Improvement Fund was made for State Aid to Counties and Road Improvement Districts and to enable the State to meet the requirements of the Federal Aid Act.

Special Acts: Shortly after the close of the War in 1918 the whole country, because of the extremely high prices received for farm products, assumed a very bright economic outlook. Everyone had money, property values were high, money was cheap and easy to borrow and as a consequence this surplus of funds and the high valuation brought on a crying desire among the people for good roads and many miles of them. The result of this condition was that when the Legislature met in January, 1919, and January, 1920, scores of Special Acts were passed creating road improvement districts. As a matter of fact, at these two sessions 457 such bills were enacted covering approximately 9,000 miles of roads.

This condition, as predicted by many at the time, was very deplorable, as many projects were given life that should never have been started and the fact that the enor-

mous program was initiated at the time when prices were at their peak has cost the State many hundreds of thousands of dollars. The effect of the over-ambitious program has also had its influence on future work and instead of the road program progressing along normal lines it will be marked by periods of great activity followed by periods of inactivity.

The regular session of the 1919 Legislature appropriated \$950,000.00 as State Aid for the biennial period.

During the summer of 1920 the pendulum of road activity began its backward swing and its course was accelerated by the campaign for State and County offices. Scores of attacks were made on the Highway Department and on the program in general, and as a consequence a very antagonistic Legislature met in session in January, 1921.

1921 The 1921 Legislature was a notable one for its opposition to any constructive legislation along the road building lines. During its course only five new districts were created while repealing acts were passed for 53 districts that had been created by previous Legislatures. This feature might have been well and good if its tearing down policy had ended there but a decided movement gained headway to give to the counties all of the revenue collected as a license on automobiles.

A hard fight was made by the friends of the Highway Department with the result that instead of 100% of the revenue going to the counties it was divided in the ratio of 70% for the counties and 30% for the State.

This situation, in our opinion, has had more effect on the delay in the completion of the road program and in the securing of a connecting system of roads than any one other thing. State Aid was seriously needed to complete many projects that were out of funds and had issued bonds to the limit and the effect of taking these funds from the Department has delayed these districts several years in the final completion of their work.

Acts 494 and 606, 1921: To offset this movement and to give the Department as much revenue as possible, Act 494 and Act 606 were prepared and passed.

Act 494 provided for a change in license fees on automobiles and trucks, the former being based on a charge of 25 cents per horse power and 25 cents per hundredweight and the latter based on a sliding scale. Act 606 provided for the collection of one cent per gallon tax on gasoline used by vehicles using public highways. The revenue brought in by these two Acts enabled the Legislature to appropriate as State Aid for the biennial period \$600,000.00.

Because of the change in the fiscal year from April to July this Legislature also appropriated \$100,000.00 as a deficiency.

Recent Federal Road Act: The Federal Act appropriating aid covered the period from 1916 to 1921. The Congress realizing that its cooperation and assistance must not end, enacted a law which was signed by the President on November 9, 1921, continuing Federal Aid to states and revising its previous law in many particulars. Arkansas' pro rata share of the appropriation made under this Act amounts to \$1,254,142.20.

This law is a very commendable and satisfactory one, as it brings nearer the time when the Arkansas Highway Department can be built up as a real Highway Department to take care of construction, reconstruction and maintenance. The principal provisions of this Federal Act may be summed up briefly as follows:

1. The State must designate a system of connected highway not to exceed 7 per cent of the total public road mileage of the State. This system shall be divided so that not more than 3 per cent shall be primary or interstate roads and the balance of the mileage shall be intercounty roads.

2. Funds to match Federal Aid shall be raised by the State or political sub-division thereof.

3. Construction and reconstruction shall be handled under the direct supervision of the State Highway Department.

4. A fund for maintenance of the system of roads established must be raised and maintenance must be carried on by the State in a systematic manner and with State funds.

5. Roads constructed as primary roads must be surfaced 18 feet wide unless some physical, economical, traffic or legal conditions justify a less width.

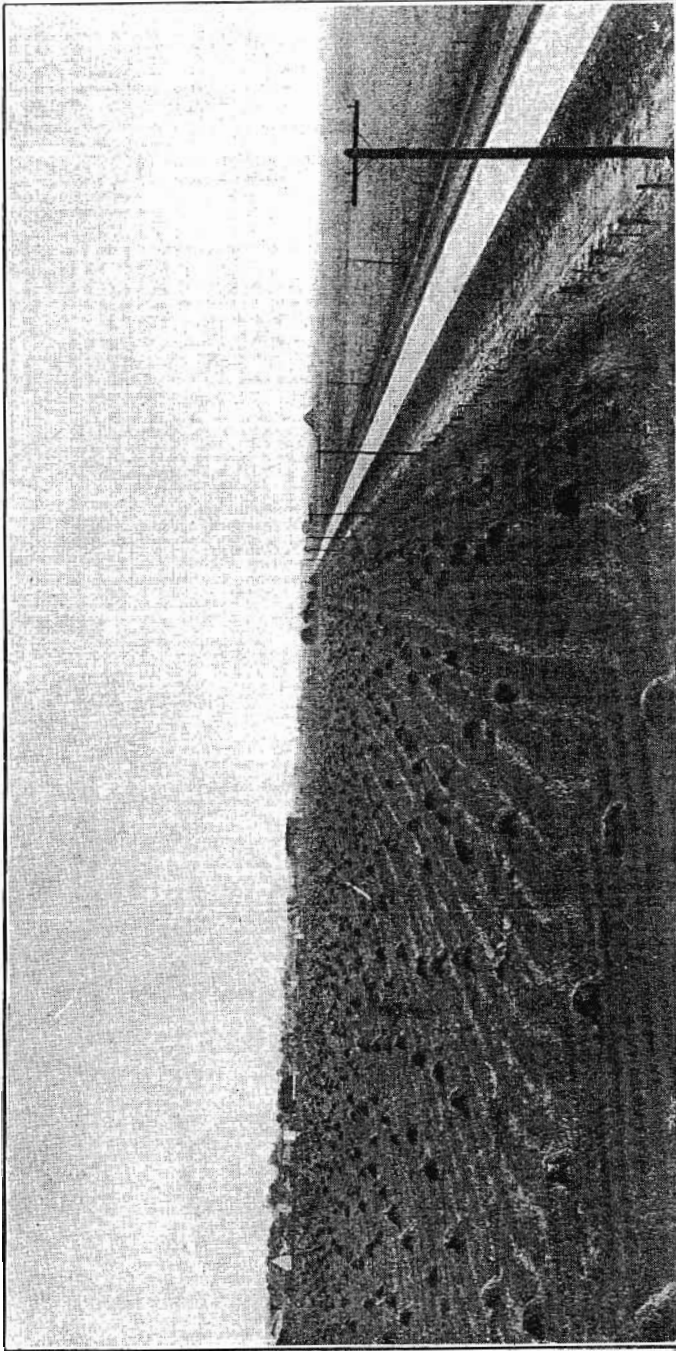
6. States not able to comply with the provisions of this Act because of Constitutional restrictions are given three years in which to pass enabling legislation.

It can readily be seen that the provisions outlined, if carried out practicably and fairly, will give the State of Arkansas eventually a system of well built, well located and well maintained roads, roads over which vehicles can travel from point to point throughout the year to the material up-building and uplifting of the State and its people.

On June 19, 1922, the Congress passed a further Act

amending slightly the Act of November 9, 1921, and authorizing additional appropriations of Federal Aid, Arkansas' pro rata of which are as follows:

1923	\$ 836,094.80
1924	1,086,881.00
1925	1,254,142.00



Arkansas County has under process of construction a very fine system of roads to take care of the enormous rice crops that are raised annually. The above photograph shows a section of paved road between Stuttgart and Almyra built by the Northern Road Improvement District of Arkansas County with the assistance of the State Highway Department and the Bureau of Public Roads. The type is Warrenite pavement on macadam base, 16 feet wide.

REORGANIZATION OF THE STATE HIGHWAY DEPARTMENT.

Shortly after the first of January, 1921, the Highway Commission determined to reorganize the Highway Department. The plan fixed upon was to reduce the technical personnel in the main office at Little Rock and to divide the State into five districts, placing an engineer in each. In accordance with this plan the State was divided as follows:

Districts: **District No. 1:** A. W. Buford, District Engineer; Headquarters, Forrest City, includes the counties of Clay, Craighead, Crittenden, Cross, Greene, Independence, Jackson, Lawrence, Lee, Mississippi, Monroe, Phillips, Poinsett, Randolph, Sharp, St. Francis and Woodruff.

District No. 2: W. C. Hight, District Engineer; Headquarters, Fayetteville, includes the counties of Baxter, Benton, Boone, Carroll, Cleburne, Crawford, Franklin, Fulton, Izard, Johnson, Madison, Marion, Newton, Searcy, Stone, Van Buren and Washington.

District No. 3: Richardson Ayers, District Engineer; Headquarters, Hope, includes the counties of Clark, Columbia, Hempstead, Howard, LaFayette, Little River, Logan, Miller, Montgomery, Nevada, Pike, Polk, Scott, Sebastian and Sevier.

District No. 4: F. L. Hargett, District Engineer, Headquarters, Pine Bluff, includes the counties of Arkansas, Ashley, Bradley, Calhoun, Chicot, Cleveland, Dallas, Desha, Drew, Grant, Lincoln, Jefferson, Ouachita and Union.

District No. 5: G. Hunter Sykes, District Engineer, Headquarters, Little Rock, includes the counties of Conway, Faulkner, Garland, Hot Spring, Lonoke, Perry, Pope, Prairie, Pulaski, Saline, White and Yell.

Purpose of Re-organization: The purpose of this reorganization was to bring the State Highway Department in much closer touch with the problems confronting the various Road Improvement Districts and Counties, to secure a closer and more careful and frequent inspection of the work, to get better results for the money spent on construction and maintenance and to form the

foundation for a further expansion of the Highway Department.

Duties of District Engineers: To carry out these plans the District Engineers are required to make periodic inspections and reports on all construction and maintenance work and to keep in close touch with Boards of Commissioners and County Judges in order to assist in the proper planning of proposed new work and the proper supervision of authorized work. The district engineers are charged with the collection and preparation of various data and statistics on the work under way, the assistance of the Department in handling of War Equipment, the assistance of the County authorities in the collection of the Gasoline taxes and the making of surveys and plans for any districts to be organized under the Alexander Law.

While this reorganization has been in effect slightly more than a year, it is working smoothly and accomplishing the desired results. Many expressions of the good work done by these district engineers have been received from officials and tax payers over the State.

In the reorganization process the personnel of the Little Rock office was reduced to a minimum and has been kept that way since. As a matter of fact, the work has increased to such an extent that the force is not ample to take care of the work satisfactorily. The work necessary for securing approval by the Bureau of Public Roads of plans, project statements, project agreements and vouchers is very great and this coupled with the numerous requests for information, the hundreds of reports on construction work, the details of handling carefully the many projects that are in precarious financial condition, taxes the department to the limit.

STATE HIGHWAY SYSTEM.

Need For a Designated System of Roads The general tendency under the plan of building roads by Special Improvement District is towards a widely scattered mileage of disconnected improvements, providing no regularity of types and no through roads. Realizing this danger the Highway Department early in 1920 set about to prepare a tentative State System of roads, showing inter-state routes as well as intercounty connections. A great deal of care was taken in the preparation of the map showing this system. Maps of each county were drawn on a scale of 1 inch per mile and on these maps were shown every road provided for by general law or Special Act as well as those links which were essential to the connected system. After these maps were prepared for the counties, a map on the scale of 8 miles to the inch was prepared covering the State and on this map was outlined a system of primary and secondary roads which provided an ample number of interstate and intercounty roads.

Changes in System as Required by Federal Aid Road Act Approved November 9, 1921: Previous to the passage of the recent Federal Aid Road Act and its approval on November 9th, 1921, it was the intention of the State Highway Department to build to the system as outlined and eventually secure the approval of the State Legislature of the system as the State Highway System of Primary and Secondary roads. However, the provisions of the new Federal Aid Act have forced the Department to make many changes as the Federal System of roads must be confined to 7% of the total public road mileage of the State, not more than three-sevenths of which shall be primary or interstate roads and the balance secondary or intercounty roads.

At the time of passage of the Federal Act it was estimated that there were 71,960 miles of public highways in the State and on this basis the Federal System of roads must be limited to 5,037 miles, not more than 2,159 miles of which shall be primary and 2,878 miles secondary roads. The law is so written that a lesser mileage of primary roads and a greater mileage of secondary roads than the proportion indicated above may be designated at this time, and it has been decided that advantage will be taken of this provision of the law.

State Highway System Selected and Mileage: Immediately after the passage of this new Federal law and an interpretation of it was received from representatives of the Bureau of Public Roads, the Commission made a careful study of the plan that could be outlined to correlate the tentative system of roads outlined by the Department with the system that would be required by the Federal Government. In studying the plan it was easily deduced that in order to provide a well connected and serviceable system of roads for the State the original tentative system could not be reduced materially and that it would be necessary to supplement the selected Federal System of Primary and Secondary roads by a connecting system of roads to be known as State roads. It was also readily recognized that in order to provide a satisfactory trunk line system of highways connecting the different sections of the State a large part of the 2,159 miles of primary roads must be shown in the Federal System. Working along these lines a system of roads has been outlined composed of 1,751 miles of Federal Primary roads, 3,239 miles of Federal Secondary roads and 1,648 miles of State roads, as is shown by the accompanying map. This system has been worked out based on the assumption that the Bureau of Public Roads will approve Federal Aid on work done on the Primary System where the surfacing is built to meet traffic needs and not 18 feet wide. The Federal Act requires that primary roads be built 18 feet wide unless some physical, legal, economical or traffic conditions justify a lesser width and should the Bureau take the narrow point of view of requiring 18-foot widths of surfacing regardless of funds available and traffic requirements, it will materially delay the progress of the work.

Our dealings with the Bureau of Public Roads lead us to believe that a broad policy of handling the work is being formulated and that there will be no particular difficulty in proceeding under the law in this regard.

Description of Roads: A map is attached showing the system of highways which has been outlined to meet the provisions of the Act and also showing the roads known as State roads, which have been added to properly form a great State Highway System. In designating the highways shown it is the policy to fix them by control points only so that in the future any necessary and desirable relocations can be made. A description of the roads is as follows:

Primary Federal Aid Roads.

Little Rock to Memphis, through Lonoke, Hazen, Brinkley and Forrest City.

Little Rock to Louisiana, through Pine Bluff, McGehee and Lake Village.

Little Rock to Louisiana, through Sheridan, Princeton, Camden and El Dorado.

Little Rock to Texarkana, through Benton, Malvern, Arkadelphia, Prescott and Hope.

Little Rock to Fort Smith, through Conway, Morrilton, Russellville, Clarksville, Ozark and Van Buren.

Little Rock to Missouri, through Cabot, Searcy, Newport, Walnut Ridge, Pocahontas and Corning.

Mesa to Helena, through Clarendon and Marvel.

Benton to Waldron, through Hot Springs and Mt. Ida.

Louisiana to Missouri, through Texarkana, Ashdown, DeQueen, Mena, Waldron, Greenwood, Fort Smith, Van Buren, Fayetteville and Rogers.

Conway to Missouri, through Clinton, Marshall, Harrison and Eureka Springs.

Turrell to Walnut Ridge, through Marked Tree and Jonesboro.

Memphis to Missouri, through Marion, Osceola and Blytheville.

Secondary Federal Aid Roads.

Barton to Piggott, through Marianna, Forrest City, Wynne, Harrisburg, Jonesboro and Paragould.

Jonesboro to Barfield, through Lake City, Manila and Blytheville.

Rector to Missouri Line, east.

Walnut Ridge to Missouri Line, through Walcott and Paragould.

Corning to Piggott.

Paragould to Corning.

Newport to Marked Tree, through Harrisburg.

Bald Knob to Marion, through Augusta, Wynne and Earle.

Clarendon to Jelks, through Cotton Plant.

Des Arc to Cotton Plant.

Wheatley to Marianna, through Moro.

Marianna to Chatfield, through Hughes.

Hazen to Higginson, through Des Arc.

Pine Bluff to Lonoke, through Coy.

Little Rock to Stuttgart, through England.

Pine Bluff to Hazen, through Stuttgart.

Stuttgart to Dumas, through DeWitt and Gillette.

- Gillette to Helena, through Ferguson.
- DeWitt to Marvel, through St. Charles.
- Dumas to Watson.
- Watson to McGehee.
- Texarkana to Luna Landing, through Lewisville, Magnolia, El Dorado, Hamburg and Lake Village.
- McGehee to Louisiana Line, through Dermott and Montrose.
- Pine Bluff to Hamburg, through Star City and Monticello.
- Star City to Warren.
- Dermott to Prescott, through Monticello, Warren, Hampton and Camden.
- Pine Bluff to Magnolia, through Rison, Fordyce and Camden.
- Warren to Rison.
- El Dorado to Hot Springs, through Hampton, Fordyce, Princeton and Arkadelphia.
- Princeton to Poyen.
- Magnolia to Haynesville, Louisiana.
- Pine Bluff to Hot Springs, through Sheridan and Malvern.
- Hot Springs to Oklahoma Line, through Glenwood, Dierks and DeQueen.
- Lewisville to Nashville, through Hope and Washington.
- Murfreesboro to Mt. Ida, through Kirby and Womble.
- Foreman to Lewis Ferry.
- Ashdown to DeQueen, through Ben Lomond.
- Arkadelphia to Ben Lomond, through Murfreesboro and Nashville.
- Mena west to Oklahoma Line.
- Russellville to Waldron, through Ola and Plainview.
- Perry to Greenwood, through Ola, Danville and Boonville.
- Magazine to Altus, through Paris.
- Hot Springs to Morrilton, through Whittington and Perryville.
- Fayetteville to Oklahoma Line, through Lincoln.
- Bentonville to Oklahoma Line, through Gentry and Siloam Springs.
- Rogers to Missouri Line, through Rogers and Sulphur Springs.
- Russellville to Missouri Line, through Jasper and Harrison.
- Morrilton to Calico Rock, through Clinton and Mt. View.

Sylamore to Marshall, through Big Flat.
 Marshall to Yellville, through Rush.
 Bellfonte to Mountain Home, through Yellville.
 Mountain Home to Newberry, through Calico Rock.
 Conway to Beebe, through Vilonia.
 Searcy to Heber Springs, through Pangburn.
 Heber Springs to Conway, through Quitman and Green-
 brier.
 Heber Springs to Batesville.
 Newport to Mammoth Spring, through Batesville,
 Melbourne and Salem.
 Batesville to Mammoth Spring, through Evening Shade
 and Hardy.
 Hardy to Hoxie, through Imboden and Powhatan.
 Cave City to Powhatan, through Strawberry.
 Pocohontas to Missouri Line, north.
 Pocohontas to Imboden.

State Connecting Roads.

Piggott to Missouri Line, north.
 Marked Tree to Osceola, through Lepanto.
 Pocahontas to Mammoth Spring, through Dalton.
 Melbourne to Ash Flat.
 Bradford to Batesville, through Pleasant Plains.
 Newport to Dryden, through Grubbs.
 Stuttgart to Roe.
 Grady to DeWitt, through Waldstein.
 Lonoke to Cabot.
 Hamburg to Eudora, through Parkdale.
 Dermott to Halley.
 Monticello to Tillar.
 Hamburg to Louisiana Line, south.
 Warren to El Dorado, through Hermitage and Moro
 Bay.
 Heber Springs to El Paso, through Rosebud.
 Sheridan to Benton.
 Prescott to Waldo.
 Lewisville to Louisiana Line, through Walnut Hill.
 Little Rock to Thornburg.
 Perryville to Conway, through Houston.
 Hot Springs to Danville, through Rover and Jessieville.
 Mt. Ida to Rover, through Washita.
 Womble to Mena.
 Wickes to Dierks, through Baker Springs.
 Nashville to Dierks.
 Mineral Springs to Fulton, through Saratoga.
 Ashdown to McNab.

- Foreman to Arkinda.
 Waldron to Oklahoma Line, through Bates.
 Dardanelle to Fort Smith, through Paris and
 Charleston.
 Van Buren to Gravette, through Evansville, Summers
 and Siloam Springs.
 Bentonville to Missouri Line, through Bella Vista.
 Ozark to Huntsville.
 Huntsville to Marble.
 Clarksville to Harrison, through Boxley.
 Boxley to Missouri Line, through Kingston and Berry-
 ville.
 Dover to Marshall, through Hector.
 Clinton to Lurton, through Witt Springs.
 Yellville to Omaha, through Lead Hill.
 Mountain Home north to Missouri Line.
 Mountain Home to Missouri Line, through Henderson.
 Henderson to Salem.
 Lurton to Winslow.
 Jelks to Newport.
 Rison to Erin, through Staves.
 Prescott to Delight.
 Fayetteville to Eureka Springs, through Huntsville.

Serviceability of the System Proposed: A study of this map in relation to the State as a whole shows that each County and County Seat is given necessary connections. The primary system of roads traverses 50 counties out of the 75 and actually passes through the County Seats of 42 counties.

The 1920 census of the State shows a total population of incorporated towns of 487,047 and of this total 464,212 people will be served directly by some part of the system. Reducing these figures to percentages the data shows that 95 per cent of the urban population will be served directly, and, on the same basis, it is safe to assume that the same percentage of the rural population will be served.

STATUS OF STATE AND FEDERAL APPROPRIATIONS.

Funds Available: The funds which have become available as aid in the construction of improved roads in Arkansas are made up of appropriations by the State Legislature and appropriations by the Congress of the United States. In a measure, these funds have been comparatively limited particularly for the reason that Arkansas engaged in a very extensive road program which requires approximately 75 to 80 million dollars to complete. When the first appropriations were made it was the intention that the State and Federal Government would bear 50 per cent of the cost of the work but as time went on and a large amount of work was provided for and undertaken it was impossible to maintain this ratio on all projects.

The statement below shows the appropriations that have been made by the State and Federal Governments since the organization of the State Highway Department:

Federal Aid Appropriations.

1917	\$ 82,689.10
1918	165,378.20
1919	1,090,247.99
1920	1,596,436.09
1921	1,685,178.09
1922	1,254,142.20
1923	836,095.00
1924	1,086,881.00
1925	1,254,142.00
Total	\$9,051,189.67

State Aid Appropriations.

Period and Appropriations	Amount Reverted	Net Amount Available	
1917-1919	\$ 496,134.60	\$ 90,223.54	\$ 405,911.05
1919-1921	950,000.00	66,812.25	983,287.35
.....-1921	100,000.00	.....	.....
1921-1923	600,000.00	.....	600,000.00
Totals	\$2,146,134.60	\$157,035.79	\$1,989,198.41

It is to be noted that the Federal appropriation for 1924 does not become available until July 1, 1923, and that for 1925 until July 1, 1924. No agreements with the Federal Government covering the use of these two appropriations

can be made until the appropriations actually become available.

The State Aid appropriations shown are made by the Legislature with funds derived from the license fees on automobiles and the tax on gasoline used by motor vehicles. The comparatively small appropriation made for the years 1921-1923 is caused by the fact that during these years 70 per cent of the license fees and 50 per cent of the gasoline taxes were returned directly to the counties in which collected.

Method of Making Allotments of Aid: When State and Federal funds first became available for distribution by the State Highway Department, some attempt was made to pro rate these funds among the several counties on a mileage, area and population basis. The plan worked very satisfactorily until the gigantic program of road building was inaugurated in 1919 and with some of the counties doing an immense amount of work, others a small amount and still others none, it became evident that some other method of distribution must be determined upon.

After many of the road improvement districts proceeded to award contracts during the inflated times of 1919 and 1920 and accomplished a great deal of their work, it developed in the early part of 1921 that many of them could not possibly complete the projected improvements unless additional funds were provided. The severe reversal of economic conditions, coupled with the reduced land values and prices for agricultural products prevented even an attempt to issue additional bonds in many of the districts. It was therefore necessary for the State to use all of its energies and resources to assist these practically bankrupt road improvement districts and to this end the Advisory Board and Highway Commission determined on a policy of using all available funds to complete unfinished work, particularly that mileage which formed part of the System of State Highways. This policy carried out has accomplished the desired results as far as funds available permitted but it has tended to the distribution of aid to the various counties on an unequal ratio. Considering the results accomplished, however, it is the opinion of the Commission that the policy pursued has been justified.

Statistics: There is given below some statistics showing the status of State and Federal Aid allotments and payments and the allotments of aid to the respective Counties of the State.

Table I.
Statement Showing Status of Federal Aid Allotments and Payments to July 1, 1922.

Fed. Proj. No.	District.	County.	Allotment.	Cancellation.	Net Allotment.	Amount Paid.	Balance to Be Paid.
1	1	Carroll	\$ 13,878.27		\$ 13,878.27	\$ 13,878.27	
2	2	Camp Pike	57,984.00	3,265.04	54,718.96	54,718.96	
3	1	Pulaski	6,840.93		6,840.93	6,840.93	
4	1	Sevier	17,441.52		17,441.52	17,441.52	
5	1	Miller	11,590.86		11,590.86	11,590.86	
6	2	Lawrence	2,500.00		2,500.00	2,500.00	
7	1	Lawrence	2,558.48		2,558.48	2,558.48	
8	3	Miller	3,169.00	3,169.00			
9	1	Lonoke	31,391.80		31,391.80	31,391.80	
10	1	Monroe	2,085.83		2,085.83	2,085.83	
11	1	Cross	10,000.00		10,000.00	10,000.00	
12	1	Woodruff	10,000.00		10,000.00	10,000.00	
13	2	St. Francis	10,000.00		10,000.00	7,462.06	2,537.94
14	19	St. Francis	5,467.10		5,467.10	5,467.10	
15	4	Jefferson	10,000.00		10,000.00	10,000.00	
16	5	Prairie	10,000.00	10,000.00			
17	1	Lawrence	7,500.00		7,500.00		
18	1	Craighead	53,000.00	7,500.00	45,500.00	12,904.96	40,095.04
19	4	Benton	15,637.13		15,637.13	15,637.13	
20	1	Craighead	60,836.16		60,836.16	60,836.16	
21	1	Poinsett	32,442.82		32,442.82	12,069.36	20,373.46
22	1	St. Francis	15,000.00	15,000.00			
23	2	Lafayette	22,000.00	239.28	21,760.72	21,760.72	
24	4	Jackson	68,800.00		68,800.00	68,800.00	
25	5	Ashley, Chicot, De- sha, Drew, Lincoln	567,000.00		567,000.00	567,000.00	
26	2	Jefferson	30,000.00	30,000.00			
27	2	Johnson	105,000.00		105,000.00	17,742.55	87,257.45
27	2	Columbia	40,046.05		40,046.05	37,272.50	2,773.55

Table I (Continued)
Statement Showing Status of Federal Aid Allotments and Payments to July 1, 1922.

Fed. Proj. No.	District.	County.	Allotment.	Cancellation.	Net Allotment.	Amount Paid.	Balance to Be Paid.
28	3	St. Francis	104,000.00		104,000.00	92,153.10	11,846.90
29	1	Craighead	33,000.00		33,000.00	23,136.30	9,863.70
30	1	Franklin	107,000.00		107,000.00	82,200.92	24,799.08
31	4	Cleveland	38,000.00		38,000.00	38,000.00	
32	4	Hope, Fulton, Emmett.	53,000.00		53,000.00	53,000.00	
33	4	Hempstead	26,100.00		26,100.00	20,685.91	5,414.09
34	1	Cross	29,200.00	16,000.00	13,200.00	10,699.00	2,501.00
35	2	Little Rock-Hot Springs	87,500.00		87,500.00	72,716.23	14,783.77
36	2	Pulaski	137,500.00		137,500.00	84,605.55	52,894.45
37	1	Washington	44,000.00		44,000.00	22,331.07	21,668.93
38	1	Howard, Sevier	70,000.00		70,000.00	57,469.62	12,530.38
39	6	Grant	16,000.00	15,000.00	1,000.00		1,000.00
40	4	Washington, Hope, Columbus	19,000.00	19,000.00			
41	1	Hempstead	126,438.00		126,438.00	52,157.94	74,280.06
42	5	Clark	95,801.40	95,801.40			
43	9	Crawford	11,200.00		11,200.00	3,427.93	8,772.07
44	9	Lincoln, Desha	37,000.00		37,000.00	37,000.00	
45	10	Lonoke	21,000.00		21,000.00	21,000.00	
46	2	Lonoke	22,000.00		22,000.00	18,000.00	4,000.00
47	4	Grant	90,000.00		90,000.00	71,891.42	18,108.58
48	1	Crittenden	15,000.00	15,000.00			
49	2	Independence	21,300.00	21,300.00			
50	2	Helena, Old Town	106,800.00		106,800.00	80,940.03	25,859.97
51	2	Phillips	64,156.00		64,156.00	48,601.12	15,554.88
52	3	Conway	12,600.00	12,600.00			
53	5	Woodruff	30,000.00	30,000.00			
54	5	Crittenden	85,000.00		85,000.00	85,000.00	
55	5	West Helena, Marvel	21,400.00		21,400.00	21,400.00	
55	5	Hazen, LaGrue, Slovac	21,400.00		21,400.00	21,400.00	

Table I (Continued)
Statement Showing Status of Federal Aid Allotments and Payments to July 1, 1922.

Fed. Proj. No.	District	County	Allotment	Cancellation	Net Allotment	Amount Paid	Balance to Be Paid
56	3	Cleveland	8,700.00		8,700.00	8,700.00	
57	1	Logan	16,670.00	16,670.00			
58		Saratoga, Fulton, McNab	17,400.00			17,400.00	
59		No. Ark. No. 2					
60	1	ton, Izard	244,649.30	144,649.30	100,000.00		100,000.00
61	3	Benton	130,000.00	130,000.00			
62	7	Washington	54,500.00	20,000.00	34,500.00	34,500.00	
63		No. Ark. No. 1	15,500.00	15,500.00			
64	2	White	48,000.00		48,000.00	41,089.08	6,910.92
65		Jackson	55,400.00	55,400.00			
66		Lawrence	80,000.00	80,000.00			
67	7	Little River	140,000.00	65,000.00	75,000.00		75,000.00
68	7	Dallas	51,500.00		51,500.00	10,196.67	41,303.33
69	3	Grant	16,000.00	16,000.00			
70		Marshall, Witt Springs	17,500.00		17,500.00	17,500.00	
		Searcy, Van Buren, Pope, Newton	53,000.00		53,000.00		53,000.00
71	6	Crittenden	50,000.00	50,000.00			
72	4	Lincoln	17,040.00		17,040.00	13,095.19	3,944.81
73	3	Searcy	12,200.00		12,200.00		12,200.00
74	4	Searcy	15,600.00	15,600.00			
75	2	Dallas	40,000.00		40,000.00	40,000.00	
76	3	Dallas	20,000.00	20,000.00			
77	4	Union	50,000.00	50,000.00			
78	3	Lincoln	20,500.00		20,500.00	17,469.28	3,030.72
79	5	Conway	56,000.00		56,000.00		56,000.00
80	5	Arkansas	148,250.00		148,250.00		148,250.00
81	5	Grant	10,640.00	10,640.00			

Table I (Continued)
Statement Showing Status of Federal Aid Allotments and Payments to July 1, 1922.

Fed. Proj. No.	District.	County.	Allotment.	Cancellation.	Net Allotment.	Amount Paid.	Balance to Be Paid.
82	8	Little River	30,522.74		30,522.74	30,522.74	
83	4	Sevier	24,500.00	7,500.00	17,000.00	17,000.00	
84	1	Conway	62,156.59	62,156.59			
85	4	Conway	98,000.00		98,000.00	72,859.19	25,140.81
86	1	Cleveland	115,000.00	70,000.00	45,000.00		45,000.00
87	1	Pope	50,000.00		50,000.00	16,990.79	33,009.21
88	Southwest Arkansas	Clark, Montgomery, Garland, Hot Springs, Pike	82,855.59	82,855.59			
89	1	Sharp	23,500.00	23,500.00			
90	2	Nevada	68,000.00	68,000.00			
91	Northern	Arkansas	137,000.00		137,000.00	137,000.00	
92	4	Grant	24,400.00		24,400.00	21,890.92	2,509.08
93	7	Crittenden	138,000.00		138,000.00	121,189.89	16,810.11
94	8	Crittenden	50,000.00		50,000.00	50,000.00	
95	9	Crittenden	170,000.00		170,000.00	130,228.23	39,771.77
96	Ozark Trail	Poinsett	67,000.00		67,000.00		67,000.00
97	7	Howard	55,000.00		55,000.00	38,937.05	16,062.95
98	12	Woodruff	20,800.00		20,800.00		20,800.00
99	Osceola, Little River	Mississippi	80,000.00		80,000.00		80,000.00
100	1	Mississippi	100,000.00		100,000.00		100,000.00
101	1	Polk	141,436.07		141,436.07	21,868.03	119,568.04
102	Conway, Damascus	Faulkner	69,631.20		69,631.20		69,631.20
103	Conway, Vilonia	Faulkner	33,247.40		33,247.40	29,270.90	3,976.50
104	Conway, Palarm	Faulkner	62,815.80		62,815.80		
105	1	Union	17,000.00		17,000.00		
106	2	Union	31,000.00	31,000.00			
107	3	Union	26,000.00	26,000.00			

Table I (Continued)
Statement Showing Status of Federal Aid Allotments and Payments to July 1, 1922.

Fed. Proj. No.	District.	County.	Allotment.	Cancellation.	Net Allotment.	Amount Paid.	Balance to Be Paid.
108	2	Benton	75,800.00	17,000.00	58,800.00	18,262.35	40,537.65
109	1	Baxter	74,750.00	47,500.00	27,250.00	5,541.81	21,708.19
110	Gaines' Landing	Chicot	4,200.00	4,200.00			
111	Roberts	Ashley, Chicot	7,500.00	7,500.00			
112	4	St. Francis	10,000.00	10,000.00			
113	8	Lawrence	12,600.00		12,600.00	9,085.05	3,514.95
114	Arkansas, Missouri	Lonoke	7,800.00		7,800.00	7,800.00	
115	Madison, Carroll	Madison, Carroll	60,000.00	60,000.00			
116	North Little Rock, Galloway	Pulaski	21,000.00		21,000.00	21,000.00	
117	Little Rock, Spring Lake	Pulaski	48,000.00	48,000.00			
118	Dermott, Collins	Drew, Chicot	83,797.00	82,797.00	1,000.00		1,000.00
119	Blytheville, Manila, Leachville	Mississippi	40,000.00		40,000.00		40,000.00
120	Blytheville, Garfield	Mississippi	18,600.00	18,600.00			
121	Helena, Ferguson	Phillips	60,000.00		60,000.00	35,493.90	24,506.10
122	3	Sevier	32,700.00	32,700.00			
123	12	Prairie	9,000.00	9,000.00			
124	2	Craighead	37,500.00		37,500.00	20,113.50	17,386.50
125	Arkansas, Missouri	Pulaski	30,000.00	30,000.00			
126	4	Saline	11,500.00		11,500.00		11,500.00
127	1	Columbia	41,046.04	16,046.04	25,000.00		25,000.00
128	3	Cleveland	10,000.00	10,000.00			
129	22	Jefferson	20,000.00		20,000.00	20,000.00	
130	5	Benton	15,000.00	15,000.00			
131	7	White	24,000.00		24,000.00	24,000.00	
132	1	Pope	30,000.00		30,000.00	15,299.72	14,700.28
133	Arkansas, Missouri	Lonoke	20,000.00		20,000.00	20,000.00	
134	No. Ark. No. 1	White	52,000.00		52,000.00	38,268.00	13,732.00

Table I (Continued)
Statement Showing Status of Federal Aid Allotments and Payments to July 1, 1922.

Fed. Proj. No.	District	County	Allotment	Carried-Over	Net Allotment	Amount Paid	Balance to Be Paid
135	Bridge	Sebastian	100,000.00		100,000.00	75,240.50	24,759.50
136	4	Lawrence	30,000.00	30,000.00			
137	West Helena, Marvel	Phillips	35,000.00		35,000.00	35,000.00	
138	6	Penion	33,000.00				
139	1	Pope	35,000.00		35,000.00		
140	Helena, Ferguson	Phillips	100,000.00		100,000.00		
141	2	Conway	75,000.00		75,000.00		
142	1	Howard, Sevier	35,000.00		35,000.00		
143	Conway, Vilonia	Faulkner	20,000.00		20,000.00		
144	Conway, Damascus	Faulkner	25,000.00		25,000.00		
145	Bridges	Marion	8,500.00		8,500.00		
146	Bridges	Scott	17,500.00		17,500.00		
147	West Helena, Marvel	Phillips	35,000.00		35,000.00		
148	18	Woodruff	10,000.00		10,000.00		
149	Bytheville, Manila, Leachville	Mississippi	50,000.00		50,000.00		
150	10	Pulaski	95,000.00		95,000.00		
151	10	Pulaski	5,000.00		5,000.00		
152	1	Miller	20,000.00		20,000.00		
153	3	Newton	10,000.00		10,000.00		
154	8	Crittenden	8,000.00		8,000.00		
155	3	Monroe	1,000.00		1,000.00		
156	4	Monroe	1,000.00		1,000.00		
157	Caddo Bridge	Pike	13,000.00		13,000.00		
158	1	Cross	8,000.00		8,000.00		
159	Bridge	Sharp	5,000.00		5,000.00		
160	Hope	Hempstead	1,000.00		1,000.00		
161	1	Clark	1,000.00		1,000.00		

Table I (Continued)
Statement Showing Status of Federal Aid Allotments and Payments to July 1, 1922.

Fed. Proj. No.	District	County	Allotment	Carrollton	Net Allotment	Amount Paid	Balance to Be Paid
102	1	Clark	1,000.00		1,000.00		1,000.00
103		Faulkner	1,000.00		1,000.00		1,000.00
104		Port Smith, Van Buren	35,000.00		35,000.00		35,000.00
105	3	Lonoke	1,000.00		1,000.00		1,000.00
106	6	Little River	1,000.00		1,000.00		1,000.00
107		Phillips	30,000.00		30,000.00		30,000.00
108	3	Monroe					
109	2	Johnson					
110	2	Pope	1,000.00		1,000.00		1,000.00
111	2	Pope					
112	4	Grant	6,500.00		6,500.00		6,500.00
113	2	Chicot	1,000.00		1,000.00		1,000.00
114		Faulkner					
115		Conway, Damascus					
116		Little Rock, Hot Springs					
117		Little Rock, Hot Springs					
117	1	Garland	1,000.00		1,000.00		1,000.00
117	2	Washington	1,000.00		1,000.00		1,000.00
118	2	Lonoke					
119		Bay St. Francis					
120		Bay St. Francis					
121	5	Baxter	60,000.00	60,000.00			
122	4	Henton	9,000.00	9,000.00			
123	2	Calhoun	60,000.00	60,000.00			
124	1	Greene	14,000.00	14,000.00			
125	3	Independence	7,380.00	7,380.00			
126		No. Ark. No. 1	20,250.00	20,250.00			
127		Arkansas, Missouri	36,000.00	36,000.00			
128		Delta	50,000.00	50,000.00			
129		Carlisle, Hamilton	10,000.00	10,000.00			

Table I (Concluded)
Statement Showing Status of Federal Aid Allotments and Payments to July 1, 1922.

Fed. Proj. No.	District.	County.	Allotment.	Cancellation.	Net Allotment.	Amount Paid.	Balance to Be Paid.
5.	Lonoke	1,000.00	.....	1,000.00	.....	1,000.00
8.	Lonoke	1,000.00	.....	1,000.00	.....	1,000.00
.....	Madison	10,000.00	10,000.00	.....	.....	.....
.....	Richland Township.....	1,000.00	.....	1,000.00	.....	.....
.....	Tate's Bluff, Chidester.....	9,500.00	9,500.00	.....	.....	1,000.00
4.	Ouachita	16,000.00	16,000.00	.....	.....	.....
.....	Poinsett	16,500.00	16,500.00	.....	.....	.....
2.	Polk	10,000.00	10,000.00	.....	.....	.....
.....	Hazen, Des Arc	40,000.00	40,000.00	.....	.....	.....
.....	Western	50,000.00	50,000.00	.....	.....	.....
.....	Albert Pike	13,000.00	13,000.00	.....	.....	.....
.....	Poteau Valley.....	12,000.00	12,000.00	.....	.....	.....
5.	Searcy	80,000.00	80,000.00	.....	.....	.....
.....	Fort Smith	10,000.00	10,000.00	.....	.....	.....
5.	St. Francis	28,350.00	28,350.00	.....	.....	.....
3.	Washington	15,200.00	15,200.00	.....	.....	.....
5.	Washington	12,500.00	12,500.00	.....	.....	.....
.....	Beebe, Antioch, Lonoke.....	30,000.00	30,000.00	30,000.00	.....	30,000.00
1.	Woodruff	21,250.00	21,250.00	.....	.....	.....
.....	Pulaski, Perry	83,650.00	83,650.00	.....	.....	.....
.....	Greene, Craighead, Poinsett	75,000.00	75,000.00	.....	.....	.....
4.	Fulton, Izard	25,000.00	25,000.00	.....	.....	.....
.....	Benton, Madison, Washington .....	.....	.....	.....	.....	.....
Totals.....	\$8,463,953.08	\$2,604,269.24	\$5,859,683.84	\$3,270,182.45	\$2,589,501.39

Table II.

State Aid Proj. No.	District	County	Total Allotment.	Cancellations.	Net Allotment.	Amount Paid.	Balance to Be Paid.
14	1	Arkansas	\$ 9,000.00	\$	\$ 9,000.00	\$ 9,000.00	\$
199	Roberts	Arkansas, Jefferson	4,550.00		4,550.00	4,550.00	
76	1	Baxter	250.00		250.00		250.00
240	2	Baxter	5,000.00		5,000.00	3,750.00	1,250.00
29	1	Benton	10,000.00		10,000.00	10,000.00	
181	2	Benton	5,000.00		5,000.00		5,000.00
180	3	Benton	22,000.00		22,000.00		
44	1	Boone	49,500.00		49,500.00	39,500.00	10,000.00
110	2	Boone	10,000.00		10,000.00	9,458.55	541.45
61	Bradley	Bradley	7,500.00		7,500.00	7,500.00	
241	1	Calhoun	3,718.00		3,718.00		3,718.00
1-25-90	1	Carroll	55,968.31	12,000.00	43,968.31	43,968.31	
65	2	Carroll	25,000.00		25,000.00	25,000.00	
166	3	Carroll	7,650.00		7,650.00	7,650.00	
167	4	Carroll	7,650.00		7,650.00	7,650.00	
222	1	Cleveland	15,000.00		15,000.00		15,000.00
265	Van Buren, Winslow	Crawford	9,500.00		9,500.00		9,500.00
204	4	Crawford	1,000.00		1,000.00	1,000.00	
86	2	Crittenden	4,000.00	1,000.00	3,000.00	3,000.00	
87	3	Crittenden	8,000.00	8,000.00			
85	4	Crittenden	23,000.00		23,000.00	23,000.00	
6	1	Cross	10,250.44		10,250.00	10,250.44	
34	County	Dallas	12,534.03	7,699.97	4,834.06	4,834.06	
151	1	Dallas	3,500.00		3,500.00		3,500.00
153	3	Dallas	10,000.00		10,000.00		
82	1	Desha	5,000.00	5,000.00			
2	1	Faulkner	15,000.00	15,000.00			
36	County	Faulkner	10,149.74	4,527.29	5,622.45	5,622.45	

Table II (Continued).

State Aid Proj. No.	District.	County.	Total Allotment.	Cancellations.	Net Allotment.	Amount Paid.	Balance to Be Paid.
103	1.....	Franklin	30,000.00		30,000.00	30,000.00	
79	County.....	Franklin	14,200.00	1,586.42	12,613.58	12,613.58	
28	1.....	Grant	13,523.84	6,274.38	7,249.46	7,249.46	
113	2.....	Grant	3,000.00		3,000.00	3,000.00	
112	3.....	Grant	10,000.00		10,000.00	7,500.00	2,500.00
164	4.....	Grant	6,500.00		6,500.00		6,500.00
142	5.....	Grant	10,640.00		10,640.00	10,640.00	
143	7.....	Grant	19,000.00		19,000.00	19,000.00	
244	8.....	Grant	12,000.00		12,000.00	12,000.00	
249	9.....	Grant	4,000.00		4,000.00	4,000.00	
127	Hope, Fulton, Emmett.....	Hempstead	1,000.00		1,000.00	1,000.00	
128	Saratoga, Fulton, McNab.....	Hempstead	5,100.00		5,100.00	5,100.00	
146	Washington, Hope, Colum bus.....	Hempstead	19,000.00		19,000.00	7,000.00	12,000.00
170	Cross Roads.....	Hempstead	22,000.00		22,000.00	22,000.00	
157	Prescott, Blevins.....	Hempstead, Nevada	20,680.00		20,680.00	20,680.00	
23	County.....	Howard	4,036.80		4,036.80	4,036.80	
98	1.....	Howard	25,000.00	7,320.29	17,679.71	17,679.71	
269	1.....	Hot Spring	5,000.00		5,000.00		5,000.00
161	1.....	Independence	10,000.00		10,000.00	10,000.00	
248	Batesville, Cave City.....	Independence	2,000.00		2,000.00	2,000.00	
47	1.....	Jackson	33,000.00		33,000.00	28,205.00	4,795.00
48	4.....	Jackson	20,000.00		20,000.00	20,000.00	
41	1.....	Jefferson	3,000.00		3,000.00	3,000.00	
165	3.....	Jefferson	3,000.00		3,000.00	3,000.00	
49	4.....	Jefferson	15,500.00		15,500.00	15,215.00	285.00
50	5.....	Jefferson	30,000.00	10,000.00	20,000.00	20,000.00	
15	15.....	Jefferson	30,000.00		30,000.00	30,000.00	

Table II (Continued).

State Aid Proj. No.	District.	County.	Total Allotment.	Cancellations.	Net Allotment.	Amount Paid.	Balance to Be Paid.
4	19	Jefferson	7,000.00		7,000.00	7,000.00	
91	County	Jefferson	9,000.00		9,000.00	9,000.00	
93	2	Johnson	25,000.00		25,000.00	10,000.00	15,000.00
141	1	Lafayette	8,900.00		8,900.00	8,900.00	
51	2	Lafayette	8,200.00		8,200.00	8,200.00	
13	1	Lawrence	23,794.44		23,794.44	23,794.44	
11	2	Lawrence	7,411.69		7,411.69	7,411.69	
242	4	Lawrence	12,500.00		12,500.00	4,000.00	8,500.00
45	5	Lawrence	11,850.00		11,850.00	11,850.00	
46	6	Lawrence	33,700.00		33,700.00	33,700.00	
84	7	Lawrence	3,500.00		3,500.00	2,975.00	525.00
55	County	Lee	20,000.00		20,000.00	10,000.00	10,000.00
163	1	Lincoln	2,000.00		2,000.00	2,000.00	
195	1	Lincoln	10,621.75	10,621.75			
69	2	Lincoln	12,500.00		12,500.00	1,878.25	
185	3	Lincoln	13,500.00		13,500.00	13,500.00	
186	4	Lincoln	6,000.00		6,000.00	4,500.00	1,500.00
124	2	Little River	4,200.00		4,200.00	4,200.00	
148	5	Little River	5,420.00		5,420.00	5,420.00	773.24
136	7	Little River	20,000.00		20,000.00	20,000.00	20,000.00
147	8	Little River	4,477.26		4,477.26	4,477.26	
130	1	Logan	16,670.00		16,670.00	16,670.00	
88	1	Lonoke	2,000.00	2,000.00			
19-20	2	Lonoke	5,003.65	122.76		4,880.89	
10	3	Lonoke	5,169.00	2,000.00		3,169.00	
3	4	Lonoke	19,000.00		19,000.00	19,000.00	
208	Arkansas, Missouri	Lonoke	18,000.00		18,000.00		18,000.00
149	Madison, Carroll	Madison-Carroll	50,000.00		50,000.00	26,500.00	23,500.00
9	1	Miller	25,500.00	20,000.00		5,500.00	

Table II (Continued).

State Aid Proj. No.	District.	County.	Total Allotment.	Cancellations.	Net Allotment.	Amount Paid.	Balance to Be Paid.
7	1	Monroe	47,408.20		47,408.20	41,328.17	6,080.03
17	1	Montgomery	8,000.00	92.09	7,907.91	7,907.91	
150	5	Montgomery	42,000.00		42,000.00	29,480.00	12,520.00
16	26	Montgomery	20,000.00	4,742.56	15,257.44	15,257.44	
74	1	Newton	20,200.00		20,200.00	15,950.00	4,250.00
73	2	Newton	17,000.00		17,000.00	14,450.00	2,550.00
72	3	Newton	30,000.00		30,000.00	30,000.00	
97	County	Onachita	7,000.00		7,000.00	7,000.00	
27	1	Perry	18,410.40		18,410.40	15,855.73	2,554.67
246	County	Perry	10,000.00		10,000.00	10,000.00	
83	2	Phillips	55,000.00		55,000.00	55,000.00	
31	1	Poinsett	57.18		57.18		57.18
32	County	Pope	15,127.07	109.51	15,017.56	15,017.56	
33	County	Pope and Newton	20,000.00		20,000.00	20,000.00	
250	2	Pope	2,000.00		2,000.00	2,000.00	
106	1	Prairie	17,000.00		17,000.00	17,000.00	
24	3	Prairie	6,000.00		6,000.00	6,000.00	
5	4	Prairie	75,000.00		75,000.00	75,000.00	
105	5	Prairie	22,526.27		22,526.27	22,526.27	
207	Stuttgart	Prairie, Arkansas	3,000.00		3,000.00	3,000.00	
102	6	Prairie, Woodruff	25,000.00		25,000.00	25,000.00	
12	Camp Pike	Prairie, Woodruff	58,585.92	2,504.91	56,081.01	56,081.01	
66	County	Pulaski	30,000.00		30,000.00	30,000.00	
80	County	Pulaski	60,000.00	25,000.00	35,000.00	35,000.00	
92	7	Pulaski	10,000.00		10,000.00	7,948.89	2,051.11
18	1	Randolph	1,500.00		1,500.00	1,500.00	
57	3	Randolph	33,039.11		33,039.11	33,039.11	
200	4	Saline	12,550.00		12,550.00	12,550.00	
21	1	Scott	15,000.00	15,000.00			

Table II (Concluded)

State Aid Proj. No.	District.	County.	Total Allotment.	Cancellations.	Net Allotment.	Amount Paid.	Balance to Be Paid.
94	County	Scott	25,000.00	12,470.44	12,529.56	12,529.56	
245	Bridge	Scott	17,500.00		17,500.00		17,500.00
40	1	Searcy	14,545.49		14,545.49	13,843.01	702.48
43	1	Sebastian	19,600.92	19,600.92			
78	Fort Smith, Van Buren	Sebastian	25,000.00	2,558.58			
8	1	Sevier	5,923.94		22,441.42	22,441.42	
115	2	Sevier	25,500.00		5,923.94	5,923.94	
190	4	Sevier	10,500.00		25,500.00	25,500.00	
247	7	Sevier	5,000.00		10,500.00	10,500.00	
35	1	Sharp	29,362.08	8,862.08	5,000.00	5,000.00	
260	County	Sharp	2,500.00		20,500.00	20,500.00	
37	1	St. Francis	8,250.00		2,500.00	5,000.00	2,500.00
38	2	St. Francis	10,750.00		8,250.00	5,000.00	3,250.00
60	2	Stone	40,000.00		10,750.00	9,000.00	1,750.00
239	Sylamore	Stone	2,000.00		40,000.00	38,300.00	1,700.00
68	1	Van Buren	51,000.00		2,000.00	2,000.00	
254	2	Van Buren	3,500.00		51,000.00	51,000.00	
174	Beebe, Antioch, Lonoke	White	12,500.00		3,500.00	3,500.00	
58	Bridges	Woodruff	4,631.76		12,500.00	2,500.00	10,000.00
22	1	Woodruff	17,500.00		4,631.76	4,631.76	
158	3	Woodruff	15,000.00		17,500.00	17,500.00	
95	County	Yell	17,890.37		15,000.00		15,000.00
101	1	Yell	20,000.00		17,890.37	17,890.37	
	Total		\$2,176,627.66	\$ 214,715.70	\$1,961,911.96	\$1,676,808.80	\$ 285,103.16

Table III Statement Showing Status of Federal and State Aid Allotments to All Counties of the State to July 1, 1922.

	Allotment State Aid.	Cancellations.	Net Allotments State Aid.	Allotments Federal Aid.	Cancellations.	Net Allotments Federal Aid.	Total State and Federal Aid Allotted.
Arkansas	\$ 9,264.32\$		\$ 9,264.32\$	\$ 285,250.00\$		\$ 285,250.00\$	\$ 294,514.32
Ashley				94,292.58	1,300.94	92,991.64	92,991.64
Baxter	5,250.00		5,250.00	134,750.00	107,500.00	27,250.00	32,500.00
Benton	37,000.00		37,000.00	222,937.13	81,000.00	141,937.13	178,937.13
Boone	62,500.00		62,500.00				62,500.00
Bradley	7,500.00		7,500.00				7,500.00
Calhoun	3,718.00		3,718.00	60,000.00	60,000.00		
Carroll	100,911.15	12,000.00	88,911.15	19,021.11	5,142.84	13,878.27	3,718.00
Chicot				209,133.24	20,748.72	188,384.52	102,739.42
Clark				131,176.09	2,738.09	128,438.00	188,384.52
Clay							128,438.00
Cleburne							
Cleveland	15,000.00		15,000.00	171,700.00	80,000.00	91,700.00	106,700.00
Columbia				81,092.09	16,046.04	65,046.05	65,046.05
Conway				372,812.59	62,156.59	310,656.00	310,656.00
Craighead				220,068.60	35,722.44	184,336.16	184,336.16
Crawford	10,500.00		10,500.00	95,801.40	95,801.40		10,500.00
Crittenden	35,000.00	9,000.00	26,000.00	536,000.00	80,000.00	456,000.00	482,000.00
Cross	10,250.44		10,250.44	65,385.83	16,000.00	49,385.83	59,636.27
Dallas	26,084.03	7,699.97	18,384.06	111,500.00	20,000.00	91,500.00	109,884.06
Desha	5,000.00	5,000.00		155,994.89		155,994.89	155,994.89
Drew				105,143.94	72,447.34	32,696.60	32,696.60
Faulkner	25,149.74	19,527.29	5,622.45	221,694.40		221,694.40	227,316.85
Franklin	30,000.00		30,000.00	107,000.00		107,000.00	137,000.00
Fulton				156,790.04	114,790.04	42,000.00	42,000.00
Garland	14,200.00	1,536.42	12,613.58	24,630.10	24,630.10		12,613.58
Grant	78,663.84	6,274.38	72,389.46	95,540.00		95,540.00	126,239.46
Greene				26,899.77	26,899.77		

Table III Statement Showing Status of Federal and State Aid Allotments to All Counties of the State to July 1, 1922.
(Continued)

	Allotment State Aid.	Cancellations.	Net Allotments State Aid.	Allotments Federal Aid.	Cancellations.	Net Allotments Federal Aid.	Total State and Federal Aid Allotted.
Hempstead	59,935.89		59,935.89	90,400.00	19,000.00	17,400.00	131,335.89
Hot Spring	5,000.00		5,000.00	5,132.30	5,132.30		5,000.00
Howard	29,036.80	7,320.29	21,716.51	86,629.70		86,629.70	108,346.21
Independence	12,000.00		12,000.00	115,216.55	94,216.55	21,000.00	33,000.00
Izard				111,572.71	74,572.71	37,000.00	37,000.00
Jackson	59,000.00		53,000.00	160,200.00	91,400.00	68,800.00	121,800.00
Jefferson	101,785.68	10,000.00	91,785.68	60,000.00	30,000.00	30,000.00	121,785.68
Johnson	25,000.00		25,000.00	105,000.00		105,000.00	130,000.00
Lafayette	17,000.00		17,000.00	22,000.00	239.28	21,760.72	38,760.72
Lawrence	92,756.13		92,756.13	144,190.86	117,500.00	26,690.86	119,446.99
Lee	20,000.00		20,000.00	50,000.00	50,000.00		20,000.00
Lincoln	44,621.75	21,233.50	23,378.25	147,672.35		147,672.35	171,050.60
Little River	34,097.26		34,097.26	171,522.74	65,000.00	106,522.74	140,620.00
Logan	16,870.00		16,870.00	16,670.00	16,670.00		16,670.00
Lonoke	49,172.65	4,122.76	45,049.89	102,969.00	13,169.00	89,800.00	134,849.89
Madison	45,357.16		45,357.16	67,857.16	67,857.16		45,357.16
Marion				8,500.00		8,500.00	8,500.00
Miller	25,500.00	20,000.00	5,500.00	40,000.00		40,000.00	45,500.00
Mississippi				298,600.00	18,600.00	280,000.00	280,000.00
Monroe	47,408.20		47,408.20	34,391.80		34,391.80	81,800.00
Montgomery	70,000.00	4,834.65	65,165.35	7,936.06	7,936.06		65,165.35
Nevada	7,844.11		7,844.11	68,000.00	68,000.00		7,844.11
Newton	70,200.00		70,200.00	26,766.58		26,766.58	96,966.58
Ouachita	7,000.00		7,000.00	9,500.00	9,500.00		7,000.00
Perry	28,410.40		28,410.40	17,250.00	17,250.00		28,410.40
Phillips	55,000.00		55,000.00	451,800.00		451,800.00	506,800.00
Pike				55,419.04	42,419.04		13,000.00
Poinsett	57.18		57.18	150,470.61	51,027.79	99,442.82	99,500.00

Table III Statement Showing Status of Federal and State Aid Allotments to All Counties of the State to July 1, 1922.
(Concluded)

	Allotment State Aid.	Cancellations.	Net Allotments State Aid.	Allotments Federal Aid.	Cancellations.	Net Allotments Federal Aid.	Total State and Federal Aid Allotted.
Polk	31,127.07	109.51	31,017.56	157,936.07	16,500.00	141,436.07	141,436.07
Pope	142,901.27		142,901.27	119,233.42		119,233.42	150,250.98
Prairie	153,585.92	27,504.91	131,081.01	50,400.00	29,000.00	21,400.00	164,301.27
Pulaski	34,539.11		34,539.11	323,175.00	59,956.04	263,218.96	394,239.97
Randolph	12,550.00		12,550.00	40,000.00	40,000.00		34,539.11
Saline	57,500.00	27,470.44	30,029.56	36,809.00	25,309.00	11,500.00	24,050.00
Scott	14,545.49		14,545.49	80,500.00	63,000.00	17,500.00	47,529.56
Searcy	44,600.92	22,159.50	22,441.42	72,800.00	27,600.00	45,200.00	59,745.49
Sebastian	46,923.94		46,923.94	215,000.00	30,000.00	185,000.00	157,441.42
Seyler	31,862.08	8,862.08	23,000.00	137,411.23	40,200.00	97,211.23	144,135.17
Sharp	19,000.00		19,000.00	28,500.00	23,500.00	5,000.00	28,000.00
St. Francis	42,000.00		42,000.00	154,467.10	35,000.00	119,467.10	138,467.10
Stone							42,000.00
Union				124,000.00	124,000.00		
Van Buren	54,500.00		54,500.00				54,500.00
Washington	12,500.00		12,500.00	243,550.00	61,050.00	182,500.00	182,500.00
White	42,756.76		42,756.76	136,500.00	12,500.00	124,000.00	136,500.00
Woodruff	37,890.37		37,890.37	83,400.00	12,600.00	70,800.00	113,556.76
Yell				130,000.00	130,000.00		37,890.37
Totals	\$ 2,176,627.66\$	214,715.70	\$ 1,961,911.96\$	\$ 8,463,953.08\$	\$ 2,604,269.24\$	\$ 5,859,683.84\$	\$ 7,821,595.80

Summary: A summary of these tables shows the following data:

Federal Aid.

Gross Amount Allotted.....	\$8,463,953.08
Amount Cancelled.....	2,604,269.24
Net Amount Allotted.....	5,859,683.84
Amount Paid	3,270,182.45
Balance to be Paid.....	2,589,501.39

State Aid.

Gross Amount Allotted.....	\$2,176,627.66
Amount Cancelled.....	214,715.70
Net Amount Allotted.....	1,961,911.96
Amount Paid.....	1,676,808.80
Balance to be Paid.....	285,103.16

The table showing allotments to counties indicates that all the counties of the State with the exception of Clay, Cleburne, Green and Union have had the use of either State or Federal funds, or both. The four counties noted have built no improved roads and the Department has not been in position to assist them up to the present time.

FEDERAL AID AND FEDERAL AID PROJECTS.

Cooperation With Federal Government Difficult: Federal and State cooperation will always be difficult under existing laws, particularly for the reason that the Federal laws are based on direct cooperation between the Bureau of Public Roads and the State Highway Department and no recognition is given the County or Road Improvement District. The State Highway Department in turn has no direct supervision of work undertaken by Road Improvement Districts and in a measure is only a clearing house. The ideal way to correct this trouble would be a change in the State Constitution, however, the Commission is of the opinion that a great improvement could be made by amending certain laws in existence and making other necessary ones.

For a long time there appeared to be a general sentiment that Federal Aid in the construction of roads was not desirable and that the cost incident to securing the aid and the annoying delays experienced in waiting Federal approval was not worth the amount received. This feeling has practically disappeared for it is now a well established principle that Federal Aid will continue for years to come and even though the amount of funds available from this source in any one year is not great, the sum total over a period of years will be of material assistance to the State in the completion of its system of highways.

Cooperation with the Federal Government, while not as good as desired, is believed to be as close as possible under existing laws. The requirements of the Bureau of Public Roads have become more rigid from year to year and the time required for securing preliminary and final approval of projects and plans much longer. The fact that the Washington Office of the Bureau delegates practically no authority to the District representative and the fact that there is no disbursing officer for this section other than at Washington materially delays all Federal Aid Projects.

Federal Requirements More Rigid: Since the passage of the Federal Aid Road Act in November, 1921, the requirements of the Bureau of Public Roads have become very extensive. Wider roadbeds must be constructed, wider and stronger bridges and culverts are required and wider and thicker pavements must be laid. Adjusting conditions in Arkansas to these requirements has consumed a great deal of time, especially for the reason that a large part of the Federal appropriations have had to

be used to aid in the completion of roads in those improvement districts which had almost expended the total funds available.

Time Required For Securing Approval Federal Aid Projects: Persons not familiar with the requirements of the Federal law often wonder why so much time is necessary to inaugurate and complete Federal Aid projects. A statement of the procedure followed will tend to clear this uncertainty. A district

or county proposing to construct a road forming a part of the approved system of Federal Aid Highways makes application to the State Highway Department for aid. After a thorough investigation of the project by the engineers of the Department and the determination that the type and kind of improvement is justified, the Advisory Board and Highway Commission allot to the specific project a certain amount of aid. Immediately the officials in charge of the project are notified and requested to prepare and submit certain data which is compiled into what is called a "Project Statement." This statement, accompanied by the proper forms, is sent to the Little Rock Office of the Bureau of Public Roads, where Federal Engineers make a thorough check of it and a preliminary field inspection. If all features are approved the Project Statement is forwarded to the District Office at Fort Worth and thence to Washington, where final approval is given by the Secretary of Agriculture. This operation requires on an average of six weeks. In the meantime plans in detail are prepared and submitted for check by the State Highway Department and the local office of the Bureau of Public Roads. In checking these plans a field inspection is necessary and after all features are agreed upon and notice has been received of the approval of the Project Statement, they are forwarded to the District Engineer for his approval and authority to advertise or proceed with the construction work. This procedure consumes a minimum of two weeks. The work can be advertised and bids taken after the approval of the Project Statement, but no contract can be awarded until the necessary authority has been given by the Federal District Engineer. After the award of the contract, work begins and as soon as possible the necessary contracts and bonds, together with a showing of funds available, are sent to the Washington office. On the basis of these data the "Project Agreement" between the State and the Federal Government is prepared and signed. This procedure generally requires about two or three months. Provided work

has been under way, a voucher can be submitted to the Treasury at Washington through the Bureau of Public Roads immediately on execution of the agreement. Vouchers require from three to five weeks for payment after leaving the Department.

There is no doubt but that the time necessary to initiate and complete road projects in which the Federal Government is participating is entirely too long, however, under existing regulations there seems to be little hope for improvement.

Federal Funds Paid: In spite of the many difficulties under which Arkansas has had to work in handling and using Federal Aid, the State stands high among the several states in regard to percentage of work completed and percentage of available funds secured. Records of the Department show that to December 1, 1922, out of an available appropriation of \$5,874,071.67 Arkansas has collected \$3,953,038.02 or about 67 per cent and by July 1, 1923, the State will have collected a total approximately 98 per cent of this appropriation.

Type of Federal Aid Roads: In order to show how the types of roads being built on Federal Aid projects in Arkansas, compare with those types being built by other states, there is shown below a table prepared by the Department of Agriculture under date of April 1, 1922.

(See Insert Table IV.)

Table IV.
Mileage by Types of Federal Aid Projects Under Construction, and Federal Aid Cost Per Mile. April 1, 1922 in United States.
 (Includes projects entirely completed and those under construction.)

STATES	Graded and Drained Miles	Sand-clay Miles	Gravel Miles	Water-bound Macadam Miles	Bituminous Macadam Miles	Bituminous Concrete Miles	Concrete Miles	Brick Miles	Bridges Miles	TOTAL	
										Miles	Federal Aid Cost Per Mile
Alabama.....	3.2	237.5	280.2	20.8	27.3	23.6	4.7	.....	1.2	598.4	\$ 5,604
Arizona.....	73.9	.....	200.1	.....	.....	4.1	70.5	.....	0.8	349.4	8,397
Arkansas.....	.....	.....	650.7	83.9	52.0	177.7	17.4	.....	1.0	982.7	4,391
California.....	208.7	.....	137.1	.....	45.6	21.4	242.4	.....	1.5	656.7	10,463
Colorado.....	147.0	68.2	149.8	.....	.....	.....	80.0	.....	1.5	444.5	8,122
Connecticut.....	.....	.....	.....	.....	27.1	.....	37.5	.....	.....	64.6	17,690
Delaware.....	.....	.....	.....	.....	.....	.....	27.9	.....	6.2	34.1	13,128
Florida.....	19.2	34.2	10.0	.....	63.4	.....	9.5	53.2	2.0	191.4	15,050
Georgia.....	80.9	761.2	104.5	23.4	58.0	2.5	77.4	0.4	13.4	1,121.9	6,501
Idaho.....	109.1	18.6	257.9	4.3	.....	24.5	8.5	.....	0.7	423.6	7,599
Illinois.....	144.6	.....	.....	.....	3.3	8.1	576.2	20.0	0.3	752.4	15,592
Indiana.....	8.9	.....	.....	7.9	.....	12.0	167.1	.....	0.1	196.0	19,012
Iowa.....	958.5	.....	229.4	.....	.....	.....	212.7	21.2	.....	1,421.8	5,284
Kansas.....	148.1	.....	112.9	8.4	40.4	.....	214.2	87.1	.....	611.2	10,864
Kentucky.....	211.4	.....	39.1	60.8	66.6	.....	21.8	.....	0.1	399.7	11,152
Louisiana.....	7.3	.....	653.1	3.2	.....	5.7	.....	.....	.....	669.3	5,430
Maine.....	.....	.....	50.5	.....	88.9	.....	22.4	.....	0.2	162.1	16,100
Maryland.....	2.7	.....	23.9	0.1	27.3	5.8	111.3	.....	.....	171.1	13,712
Massachusetts.....	.....	.....	3.5	4.6	66.6	31.3	54.8	.....	.....	160.8	16,875
Michigan.....	.....	.....	201.2	16.6	.....	51.0	212.0	.....	.....	480.8	12,186
Minnesota.....	167.3	18.0	1,669.7	.....	.....	20.9	195.8	.....	0.1	2,071.7	4,080
Mississippi.....	159.0	.....	469.9	11.3	5.3	.....	47.9	6.3	.....	699.7	5,954
Missouri.....	78.3	.....	311.3	43.9	72.0	2.6	125.5	1.7	0.6	635.8	7,933
Montana.....	233.6	.....	450.1	16.0	7.9	.....	26.1	.....	1.2	724.9	5,433
Nebraska.....	1,437.2	67.6	86.9	.....	.....	.....	9.2	7.5	0.5	1,608.9	2,860
Nevada.....	31.2	.....	133.1	.....	.....	.....	31.4	.....	0.2	195.9	7,454
New Hampshire.....	.....	.....	84.8	15.1	16.4	22.5	.....	.....	0.1	138.9	7,867
New Jersey.....	.....	.....	3.4	.....	1.3	5.0	90.9	.....	.....	100.6	17,497
New Mexico.....	245.4	5.1	507.4	.....	.....	.....	21.3	.....	1.3	780.5	3,473
New York.....	.....	.....	.....	.....	142.2	.....	248.9	.....	.....	391.2	17,662
North Carolina.....	86.6	601.7	75.6	19.0	42.4	72.0	28.3	.....	0.6	926.1	6,608
North Dakota.....	1,026.5	5.0	134.0	.....	.....	.....	1.9	.....	1.3	1,168.7	2,891
Ohio.....	14.7	.....	6.5	89.1	117.7	72.7	214.3	156.6	.....	671.6	11,977
Oklahoma.....	27.4	2.0	327.9	.....	0.6	25.8	133.2	0.4	3.0	520.3	10,637
Oregon.....	96.7	.....	271.4	25.6	.....	40.5	41.4	.....	0.3	476.0	9,027
Pennsylvania.....	.....	.....	.....	.....	7.5	86.5	522.8	21.8	.....	638.7	19,465
Rhode Island.....	.....	.....	.....	.....	8.7	27.6	2.3	.....	.....	38.6	16,513
South Carolina.....	8.5	533.0	114.4	.....	3.0	8.3	39.6	0.2	5.8	712.7	4,910
South Dakota.....	155.5	.....	670.6	.....	.....	.....	.....	.....	0.5	826.7	4,690
Tennessee.....	20.5	.....	54.9	134.8	206.4	7.4	24.6	.....	0.4	449.1	13,284
Texas.....	111.5	42.4	1,663.0	488.4	60.5	28.8	109.6	.....	2.3	2,506.5	5,070
Utah.....	136.8	.....	79.6	9.3	.....	7.7	34.7	.....	0.9	269.0	7,350
Vermont.....	.....	.....	35.6	1.4	14.7	.....	3.5	.....	.....	55.3	12,880
Virginia.....	.....	105.9	52.1	101.2	64.7	12.5	72.5	.....	0.4	409.3	10,098
Washington.....	26.5	.....	210.0	.....	.....	.....	140.2	.....	1.0	377.7	11,162
West Virginia.....	117.9	1.0	18.2	4.3	73.3	11.4	70.2	11.3	.....	307.6	9,934
Wisconsin.....	243.8	111.2	435.9	10.3	9.6	.....	222.5	.....	0.1	1,033.4	5,432
Wyoming.....	447.6	53.3	100.2	.....	.....	1.2	18.4	.....	2.2	622.8	4,712
TOTALS.....	6,986.0	2,663.9	11,070.4	1,203.7	1,420.7	821.1	4,645.3	393.9	45.6	29,250.7	\$ 7,415
.....	23.9	9.1	37.9	4.0	4.9	2.8	15.9	1.3	0.2	100%	.....
.....	.....	.....	.....	.....	.....	.....	.....	.....	0.1	100%	.....

Summary of Table on Types: This table has been summarized as to percentages of types. The computations shown as follows:

	Per Cent
Total percentage for United States for Graded, Sand Clay, Gravel and Water-bound Macadam roads	74.9
For Arkansas, same types.....	74.7
Total percentage for United States for Bituminous Macadam, Bituminous Concrete, Concrete and Brick roads.....	24.9
For Arkansas, same types.....	25.2

The figures indicate conclusively that the average type of highway being constructed in Arkansas on Federal Aid projects compares favorably with the average type of road being constructed over the whole country.

Arkansas Federal Aid Projects: Arkansas Federal Aid projects are numerous and are scattered over all parts of the State; only a few of them do not form a part of the State System of roads which has been designated by the Highway Department and the Federal Government. The types are varied. There is shown below a complete table of all existing Federal Aid projects, their location, length, type, cost, aid allotted and their construction status:

(See Insert Table V.)

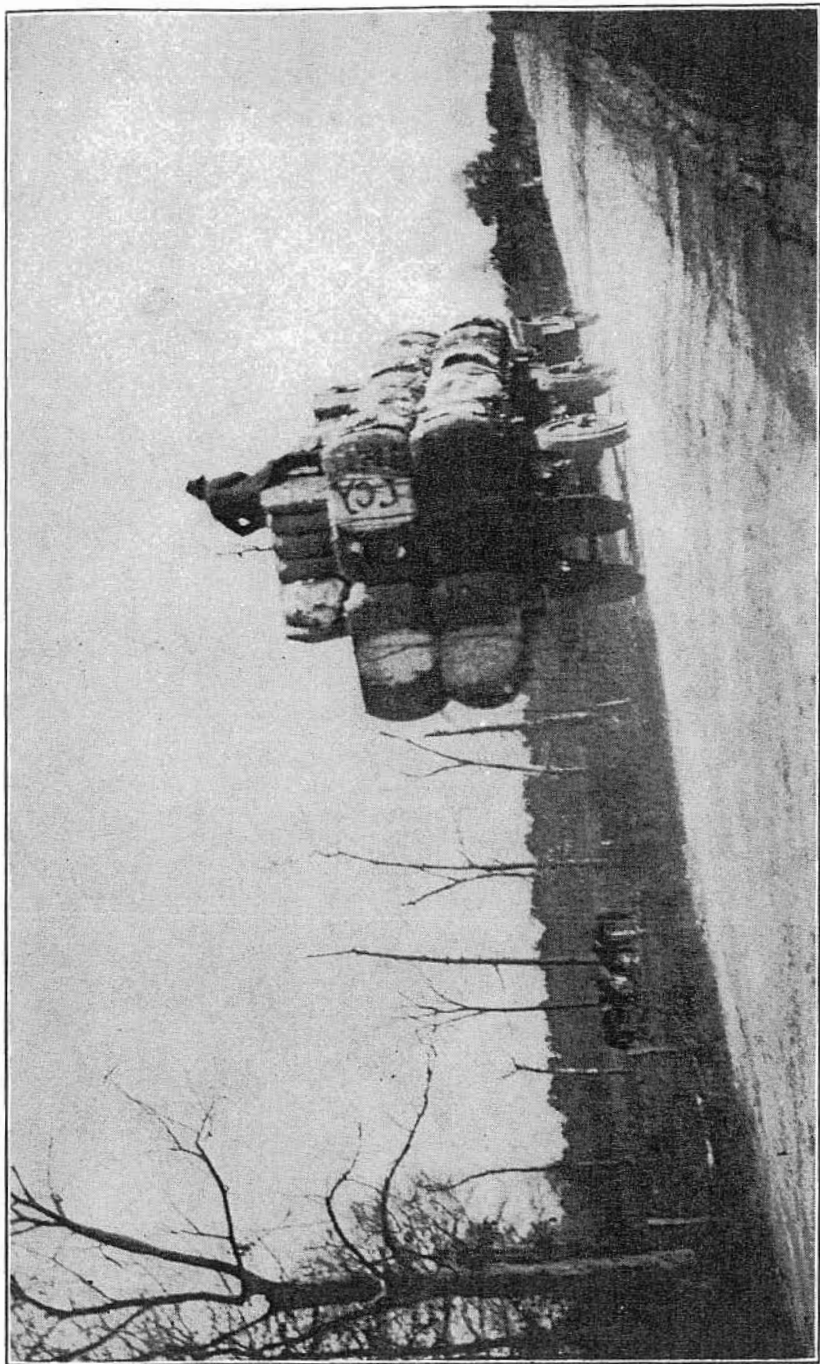
From a study of the table the following facts are deduced:

Public Roads	17	13.1
of plans and approval by Bureau of		
Total number of projects waiting completion	6	4.6
Total number of projects ready to begin work	7	5.4
for funds and result of litigation		
Total number of projects awaiting provisions	6	4.6
Total number of projects held up for material		
Total number of projects under construction	31	23.8
Total number of projects completed	63	48.5
Total number of Federal Aid Projects	139	100.0

The table also shows that the estimated cost of all aid items included in Federal Aid projects submitted is \$17,521,369.65 with the total amount of aid allotted equalling \$6,693,304.36. The total mileage of all types of road included in Federal Aid Projects is 1,369.59 with 651.12 miles included in projects which have actually been completed. A summary of the Federal Aid mileage relative to types and amount in completed projects and those proposed and under construction is as follows:

Type	Mileage in completed projects	Mileage under construction and proposed	Total
Bridges	0.61*	0.37†	0.98
Cement Concrete	12.35	81.15	93.50
Stone Base	31.45	19.38	50.83
Bituminous Concrete on Concrete Base	125.57	30.58	156.15
Bituminous Concrete on Bituminous Macadam	15.35	125.75	141.07
Surface Treated Macadam	18.48	21.25	39.73
Surface Treated Gravel	6.42		6.42
Macadam		6.81	6.81
Gravel	440.89	443.21	884.10
Totals	651.12	718.47	1,369.59

* 3197 feet; † 1,075 feet.



Loads which are being carried by the improved roads of Craighead County. This truck and trailer is transporting twenty-nine bales of cotton.

WORK OF THE STATE HIGHWAY DEPARTMENT.**Outline of Work of Department.**

The work of the Highway Department covers the broad field of administration, finance, construction and maintenance and is made very difficult because of inadequate laws not giving the department direct control of the work. The routine work required in handling correspondence has been unusually heavy because of the extended procedure involved in operating State and Federal Aid projects. The work necessary in meeting Federal requirements, the preparation and checking of plans, specifications and estimates, the securing and disbursing of Federal funds, the supplying of information to firms and individuals keeps the office force constantly busy.

Preliminary Surveys and Estimates.

Petitions Received: During the early part of 1921 there was practically no effort made to organize Road Improvement Districts under the General Road Law. With improving conditions, however, the sentiment for improved roads has increased. There have been received and filed 36 petitions and the department has made surveys, plans and estimates for 25 projects under the Alexander Law.

Mileage and Estimated Cost: The roads surveyed aggregate 238 miles in length and the work is estimated to cost approximately \$1,960,000.00. Petitions filed show that 24 counties were represented. The following table gives a list of petitions filed and shows action taken on them:

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TABLE VI.
Road Surveys made in 1921 and 1922 by State Highway Department, under Alexander Road Law.

County	When Received	Description and Location	Length	Type	Estimated Cost	Remarks
Calhoun	Feb. 15, '21	Dallas County Line to Thornton	7.53	Graded-gravel	\$ 7,608.78	
Chicot	Mar. 6, '22	Lake Village to Sunny-side	8.82	Gravel	83,364.28	
Columbia	Mar. 3, '22	Magnolia-E m e r s o n -B r i s t e r	19.14	Gravel	206,718.90	
Craighead	Feb. 17, '22	Jonesboro West and East to Co. Line	7.43	Gravel	122,488.63	Abandoned
Craighead	May 12, '22	Jonesboro West				
Craighead	Nov. 20, '22	Jonesboro-Bono				
Cross	Apr. 28, '22	Birdseye-Cherry Valley				
Greene	Feb. 6, '22	Paragould North and South	3.91	Gravel	49,285.28	Survey not made
Greene	Sept. 5, '22	Paragould-Gainesville-Stonewall				Abandoned
Greene	Nov. 8, '22	Paragould South-Craighead County Line				Survey made. Plans not yet prepared.
Independence	Mar. 14, '22	White River Bridge and Road	0.44	Gravel-steel	250,000.00	Survey not made
Jackson	1921	R. I. D. No. 8				
Jackson	July 7, '22	White Co. Line, Grand Glaize and Laterals	9.25	Gravel	103,186.69	
Jackson	July 22, '22	Grand Glaize, Newport	15.77	Gravel	202,039.69	
Jackson	Sept. 5, '22	Old Grand Glaize Ferry-Engleside-Newport				
Jefferson-Grant	Apr. 6, '21	R. I. D. No. 1	8.60	Gravel	73,356.10	Survey made. Plans not yet prepared.
Lincoln	Apr. 15, '22	Hamilton South-Jefferson County Line	14.66	Gravel	128,575.05	
Marion	July 1, '21	Yellville-Rush	10.67	Gravel	34,423.15	

Table VI. (Continued)
 Road Surveys made in 1921 and 1922 by State Highway Department, under Alexander Road Law.

Mississippi.....	May 19, '22	Pecan Point-Wilson R. I. D.	9.90	Gravel	85,085.00	Survey being made
Mississippi.....	May 19, '22	Joiner-Shawnee R.I.D.	10.06	Grading	21,047.15	Abandoned
Monroe.....	Mar. 2, '22	St. Charles-Turner				Abandoned
Newton.....	Aug. 17, '21	Walnut-Deer				
Newton.....	Aug. 17, '21	Walnut-Nail				
Newton.....	Dec. 3, '21	Boxley-Walnut-Johnson County Line				Abandoned
Newton.....	Dec. 22, '21	Johnson County Line				
Newton.....	Nov. 30, '21	Walnut-Nail	7.71	Graded	30,574.50	
Perry.....	July 1, '21	Boxley-Johnson County Line	22.37	Graded	59,911.50	
Pike.....	Feb. 27, '22	Perryville-Thornburg	4.11	Macadam	27,462.17	
Poinsett.....	July 30, '22	Nathan	27.14	Gravel	160,722.27	
Prairie.....	Nov. 22, '21	St. Francis R. Bridge and Road				Survey made. Plans not yet prepared.
Pulaski.....	Feb. 24, '22	Fairmont-Slovak	10.34	Gravel	101,104.02	
Saline.....	July 31, '22	Fort Roots R. I. D.	0.11	Concrete	8,350.76	
Searcy.....	Oct. 27, '21	Pulaski County Line				Survey made. Plans not yet prepared.
Sevier.....	Mar. 22, '21	Miller Place				
Washington.....	Mar. 2, '22	Marshall - Weston Grove	29.03	Graded	169,545.75	Survey not made
Washington.....	June 7, '22	Paraclyfta-Ben Lomond				
		Winslow - Strickler R. I. D.	9.43	Graded	35,595.78	
		Brentwood - Low Gap-Bassett				
TOTALS			238.42		\$1,960,445.45	Survey not made

State Standard Plans.

In order to have bridges and structures designed and built to meet present and future traffic and to comply with the constantly changing requirements of the Federal Government, it has been necessary for the department to make many new standard plans.

Loads on Bridges: Loads have increased to such an extent that the bridges and culverts upon the principal system of highways must be designed to carry safely a 15-ton truck load for one line of traffic and two such loads for two lines of traffic. The fact that these loads are usually being hauled at a rapid rate of speed requires that in addition an impact allowance be made in designing bridges. Tests made recently show this impact force in some cases increases the normal load on structures as much as 600 to 700 per cent.

Widths of Bridges: In the past it has generally been assumed that a bridge, having a sixteen-foot roadway was ample to take care of all ordinary highway traffic. The impetus given truck transportation by the construction of improved roads has practically forced the construction on main highways of bridges with an eighteen-foot clear roadway and in some cases it has been desirable to make them wider.

Standard Plans Available: Below is given a list of standard plans which have been prepared by the department and are available for use by counties and road improvement districts over the State:

Fifteen Foot Clear Roadway, Wood Floors.

Steel I-Beam Bridge.....	11-34 ft. spans
Low riveted trusses.....	40, 50, 60, 70, 80, 90 ft. spans
High riveted trusses.....	100, 110, 120, 130, 140 ft. spans
High pin connected trusses.....	120, 130, 140, 150, 170 ft. spans

Sixteen Foot Clear Roadway, Wood Floors.

Steel I-Beam Bridge.....	11-34 ft. spans
Low riveted trusses.....	40, 50, 60, 70, 80, 90 ft. spans
High riveted trusses.....	100, 110, 120, 140 ft. spans

Eighteen Foot Clear Roadway, Wood Floors.

Steel I-Beam Bridge.....	11-34 ft. spans
Low riveted trusses.....	40, 50, 60, 70, 80, 90 ft. spans
High riveted trusses.....	100, 110, 120, 140 ft. spans

Eighteen Foot Clear Roadway, Combination Floors.

Low riveted truss.....	80 ft. span
High pin connected truss.....	200 ft. span

Timber pile and timber framed bent bridges	3 and 4 pile bents
Plain concrete piers and abutments.....	6-34 ft. height
Reinforced concrete piers and abutments	8, 10, 12, 14, 16, 18, 20, 24 ft. height
Reinforced concrete culverts.....	2-8, 3-10, 10-20 ft. spans

State Standard Specifications.

Specifications Being Revised: For the past several years it has been found necessary to change and revise the State Standard Specifications to meet changing conditions and to remedy certain defects and conflicting statements in the original ones. In 1920 it was decided to completely revise the original specifications and some little work was done at that time, however no results were accomplished. During 1922 a great deal of exhaustive work has been done so that at this time the rough draft of the revised specifications has been completed and it is expected that early in 1923 this draft will be completely checked and approved by the Bureau of Public Roads and ready to be turned over to the printer.

An attempt is being made in revising the specifications to make them applicable to all classes of highway work and to make them so clear and specific that the possibility of litigation based on them will be reduced to a minimum.

Cooperation With County and Road Improvement District Officials.

Standardizing County Bridge and Road Work: One of the most important parts of the work of the Highway Department during the past two years has been that of cooperating fully with County and Road Improvement District officials to the end of securing for funds expended the maximum return. An effort has been made to standardize the construction of county bridges and culverts by advising with the County Judges and furnishing plans where these officials have not been able to employ engineers. Particular care has also been given to all work done by the counties toward the substantial improvement of the county roads. The department's district engineers have been ready at all times to assist in the proper location of the county roads and the satisfactory organization of the work to secure best results.

When all of the counties of the State realize that the Highway Department was organized for their benefit and understand that the department is always ready to assist

in the solution of any county highway or bridge problem and when these counties use this service to the full extent, a great deal more useful work can be accomplished.

Inspections.

A very large part of the department's activity during the past two years has been given to inspection work. In 1921 when it was determined to divide the State into districts and appoint district engineers in each, the primary object was to give adequate State supervision of all highway work.

Construction and Maintenance Inspections: Inspections are made at regular intervals of all construction and maintenance work and conferences are held with county and road improvement district officials in order to secure best results and promote harmony. Detail reports of inspections are made by District Engineers and filed with the department, copies of which are sent to the local engineer in charge of the work and the proper officials.

Plans Checked: All plans for proposed improvements are thoroughly checked in the main office and are checked in the field to determine whether the type of improvement is justified and the specific plans adequate. Ordinarily this work is done in conjunction with engineers representing the Federal Government, provided the State contemplates granting Federal Aid.

The Highway Commission is of the opinion that the best results are accomplished when the State Highway Engineers made a sufficient number of personal inspections of the work to become perfectly familiar with what it being done in the field and to coordinate the activities in the several districts. Carrying out this plan the State Highway Engineer has spent at least a fourth of his time traveling over the State and has given his particular attention to those districts applying for aid and those in a very poor financial condition.

In the final analysis the Commission is of the opinion that for highway work to progress satisfactorily and safely under existing laws, it is absolutely necessary that frequent and periodic inspections be made of all construction and maintenance work and that all plans for proposed improvements be checked very carefully before approval.

Log of Highways.

Accurate Road Guide Necessary: With the very rapid increase in travel by automobile over the highways of the country and the marked increase in the State of Arkansas it has become very necessary, in the opinion of the Commission, to prepare for these users of our roads a compact, accurate and authentic log. The passage of the Federal Highway Act requiring the designation of a system of roads also makes such a publication desirable.

Progress of Work: Working to this end the Highway Department has undertaken to log all of the roads included in the proposed State Highway System and at this time has completed approximately 4,500 miles of a total of 6,700. The data is being compiled in convenient book form and when completed will be published and sold at a cost to cover the actual cost of preparation and printing. It is expected that the official log will be available for distribution by the Spring of 1923 and will serve as a valuable guide to automobile tourists.

This work is being done by the regular personnel of the department and coordinates very well with the periodic inspection work of the District Engineers.

Expansion of Department Needed.

Adequate Personnel Necessary: The work of the Highway Department has increased to such an extent that the personnel employed cannot handle it in an entirely satisfactory manner. The regular State appropriation provides for only a few men to handle the engineering work and the Commission has been forced to employ additional engineers and pay their salaries out of State and Federal Aid funds as provided in Act 105 of 1917. It would be much more satisfactory if a regular appropriation could be made to care for all personnel and this appropriation made in such a way that a sufficient number of competent men can be employed to take care of the work promptly and expeditiously.

Organization Must be Flexible: In an organization handling the work that comes before the State Highway Department it is essential that there be some flexibility so as to care for the seasonal variations in the work. It generally happens that during the spring, summer and fall months many requests for surveys are received and many more than the ordinary number of inspections must be made of maintenance and construction

work and it is during these seasons that the force employed should be considerably increased. Any provision made for appropriations should recognize this condition and adequately take care of it.

ROAD IMPROVEMENT DISTRICTS.

Road Improvement District Plan Necessary: Of necessity, practically all improved roads in Arkansas have been built by Road Improvement Districts, organized either under the general State law or by Special Act. This method has been followed because the provisions of the State Constitution prevent the counties and the State from selling bonds for public improvements. Opinion has crystalized to such an extent that it is generally believed that the Road Improvement District plan is not by any means an ideal one and should be modified or done away with as soon as a change in the Constitution can be made placing on the State at least the responsibility of constructing and maintaining State roads.

Arkansas, during the years of 1919 and 1920, carried to excess the principle of building roads under the district plan and excentuated the unsatisfactory conditions which resulted because the vast amount of work undertaken was initiated during times of extremely high prices.

Weaknesses of General Road Law Cause of Many Special Acts: The general act governing the organization of improvement districts was designed to give adequate protection to the land owner and tax payer and at the time of its passage was considered adequate to permit the building of any type of road desired by the particular community included in an improvement district. As prices began to mount in 1918 and 1919 it was realized by many of those persons attempting to provide for improved roads that the limit of 30 per cent of the assessed valuations as the total amount of benefits would not provide ample funds for the improvement. This condition may be shown by the following data which was compiled two years ago, using for the study 63 representative road improvement districts:

Number of districts (Alexander Law and Special Act)	63
Number of miles embraced.....	1,842 Miles
Average length of road to district.....	30.2 Miles
Average estimated cost per mile.....	\$14,500.00
Average assessed valuation per mile.....	\$36,000.00
Average acreage per mile.....	3,180
Average assessed valuation per acre of land in district	\$11.52

Average Assessed Benefits Under General Law: Under the general road law the average maximum cost per mile could not exceed 30 per cent of \$36,600.00, or \$10,980.00. As this amount will not, on the average, build anything better than a gravel road where shipped material is used, and when there is an average amount of grading and bridges, it is very apparent that in the average district it is either necessary to build a cheap road or have the limit of assessment raised.

Average Cost Per Mile of Roads, 1919: This condition is further evidenced by the fact that the average cost of all types from graded earth to concrete roads has been approximately \$14,500.00 per mile, or 32.1 per cent in excess of the average cost per mile permissible under the general road law. The figures further show the average cost per mile has been 39.6 per cent, or approximately 40 per cent of the average assessed valuation per mile, instead of the 30 per cent as limited by the general law.

Average Assessed Valuation Per Acre: The above figures show the assessed valuation per acre of land embraced in the average district is \$11.52, but this amount includes the assessed valuation of public utilities and cities and towns, all prorated upon an acreage basis. The actual valuation of the land above is probably not in excess of \$8.00 per acre.

It is the opinion of the Commission that the time required to organize a road improvement district under the general law and the limitation of 30 per cent for benefits has been responsible, more than anything else, for the creation of so many districts by Special Act of Legislature. The table below shows the Special Acts passed by the various State Legislatures:

Table VII.

Year	Number of Acts Creating New Dists.	Number of Curative, Amendatory and Repealing Acts	Total
1913	9	3	12
1915	15	.....	15
1917	15	5	20
1919	133	44	177
1920 (Special)	140	140	280
1921	5	53	58
Totals	317	245	562

In addition to the above approximately 200 road im-

provement districts have been provided for under the general law.

Many Districts Abandoned: In considering these figures it must be recognized that many of the districts provided for and organized have been either voluntarily abandoned or repealed and that the totals shown do not represent the total number of active districts, but do indicate what had been done in a legislative way towards providing for roads by the Improvement District plan.

Road Improvement District Progress and Statistics.

Facts Concerning Road District Progress Not Generally Known: Because of the fact that road construction work in Arkansas is done either by Road Improvement Districts or by counties and there is no central source through which all details of construction and expenditures must pass, the true status of the highway program is not well known or appreciated by the general public. In order to secure a statement of this condition the Highway Department has been making a detailed and exhaustive study of the work accomplished by all agencies over the state and has succeeded in compiling some very interesting information.

To set forth this information clearly it is thought best to classify the work in accordance with the types of roads proposed, under construction and completed and to show expenditures to December 1, 1921, expenditures during 1922, estimated cost, bonds issued and sold, other resources, such as county funds and allotments of State and Federal Aid. Space does not permit the detailed data to be shown, however a summary of it is as follows:

Table VIII.

Type	Miles Proposed	Miles With Grading Completed	Miles With Base Course Completed	Miles With Surface Course Completed	Miles Fully Completed Road	Miles on Which no Work Done
Graded	992.74	770.62	.....	.....	770.62	222.12
Gravel	3,369.95	2,898.20	2,305.35	2,256.30	2,256.10	471.75
Macadam	436.58	325.96	221.10	221.10	221.10	110.62
Surface Treated Gravel	23.70	22.70	22.70	22.70	22.70	1.00
Surface Treated Macadam	110.46	51.89	45.89	45.89	45.89	58.57
Asphaltic Macadam	385.10	363.54	260.07	149.91	148.91	21.56
Asphaltic Concrete	350.72	305.23	254.39	244.39	244.39	45.49
Cement Concrete	247.78	216.18	120.27	106.27	106.27	31.60
TOTALS	5,917.03	4,954.32	3,229.77	3,046.56	3,815.98	962.71

Total amount expended to December 1, 1921.....	\$52,056,217.83
Total amount expended during 1922.....	8,354,696.83
Gross amount expended to date.....	\$60,410,914.66
Total estimated cost of mileage shown above.....	81,811,579.36
Total amount of bonds sold.....	62,331,704.09
Total amount realized from sale of bonds.....	59,337,361.88
Total amount of other resources	903,196.03
Total amount of State and Federal Aid allotted.....	9,224,368.33

The table below shows the mileage of the several types of road completed to December 1, 1920, during 1921 and during the past year, as well as that mileage of the proposed work yet to be completed.

Table IX.
Yearly Progress Arkansas Road Work.

Type	Miles Proposed	Miles Completed to Dec. 1, 1920	Miles Completed During 1921	Miles Completed During 1922	Miles to be Completed
Graded	992.74	180.0	386.17	204.45	222.12
Gravel	3,369.95	273.0	1,349.92	633.18	1,113.85
Macadam	436.58	47.0	159.11	14.99	215.48
Surface Treated Gravel	23.70	10.0	12.70	.....	1.00
Surface Treated Macadam	110.46	20.0	22.20	3.69	64.57
Asphaltic Macadam	385.10	48.0	44.68	56.23	236.19
Asphaltic Concrete	350.72	17.0	207.69	19.70	106.33
Cement Concrete	247.78	20.0	63.57	22.70	141.51
TOTALS	5,917.03	615.0	2,246.04	954.94	2,101.05

The important features to be remembered in connection with these figures are that the proposed work covers a mileage of 5,917 of which 3,816 miles have actually been completed, that the estimated cost of this work is approximately \$82,000,000.00 and that approximately \$62,300,000.00 in bonds have been sold. These figures show clearly the vast amount of work undertaken by the State and its wonderful progress in completing its program.

COUNTY DATA.

It frequently happens that information is desired relative to county assessments, county road mileage and other statistics. In order to supply this demand a series of tables will be given below containing such information of value.

Table X.
 Population, Area, Average Elevation and Assessed Valuations of the Counties of Arkansas.

COUNTY	Population 1920	Area in Acres	Average Elevation in Feet	Assessed Valuation Real Property 1922	Assessed Valuation Personal Property 1922	Total Assessed Valuation 1922
Arkansas	21,483	640,000	250	87,487,026	\$2,501,558	\$9,988,584
Ashley	23,410	601,600	210	5,083,987	2,254,034	7,338,021
Baxter	10,216	375,040	800—1400	1,674,675	721,281	2,395,956
Benton	36,253	560,640	1200—1500	8,192,447	3,695,175	11,888,622
Boone	16,998	389,120	1000—1800	2,887,022	1,376,875	4,263,897
Bradley	15,970	421,760	250	3,022,163	2,137,053	5,159,216
Calhoun	11,807	402,360	250	2,451,712	974,919	3,426,631
Carroll	17,786	410,240	1200—1800	2,841,290	1,363,237	4,204,527
Chicot	21,749	388,480	137	4,993,365	1,442,118	6,435,483
Clark	25,632	564,480	250—300	5,147,674	2,259,445	7,407,119
Clay	27,276	418,560	290	5,923,862	1,919,201	7,843,063
Cleburne	12,696	381,440	500	1,770,559	750,098	2,520,657
Cleveland	12,260	385,920	204	1,897,945	672,991	2,570,936
Columbia	27,670	502,400	322	3,750,175	2,480,604	6,230,779
Conway	22,578	360,220	286—771	3,306,356	1,335,364	4,641,720
Craighead	37,541	439,680	271	9,768,226	3,308,428	13,076,654
Crawford	25,739	379,820	400—800	5,595,150	2,242,566	7,837,716
Crittenden	29,309	372,480	220	9,481,273	1,410,152	10,891,425
Cross	18,379	396,160	215—300	6,561,154	984,217	7,545,371
Dallas	14,424	434,560	285	2,735,391	1,395,370	4,130,761
Desha	20,297	478,080	140—200	4,947,294	1,058,353	6,005,647
Drew	21,822	542,080	281	3,606,615	2,052,453	5,659,068
Faulkner	27,681	416,640	400	3,692,170	1,566,214	5,258,384
Franklin	19,364	387,840	489	3,643,987	1,723,265	5,367,252
Fulton	11,182	400,000	582	1,501,615	796,210	2,297,825
Garland	25,785	403,840	500—1200	9,433,611	4,961,029	14,394,640
Grant	10,710	407,680	310	1,901,997	788,129	2,690,126
Greene	26,105	359,040	293	5,706,085	2,411,531	8,117,616

Table X (Continued)
 Population, Area, Average Elevation and Assessed Valuations of the Counties of Arkansas.

COUNTY	Population 1920	Area in Acres	Average Elevation in Feet	Assessed Valuation Real Property 1922	Assessed Valuation Personal Property 1922	Total Assessed Valuation 1922
Hempstead	31,602	465,380	350	5,773,145	2,642,359	8,415,504
Hot Spring	17,784	392,320	329	3,241,582	1,845,746	5,087,328
Howard	18,565	385,280	391	2,551,937	1,415,607	3,966,644
Independence	23,976	437,680	451	4,313,253	2,709,728	7,022,983
Izard	13,871	373,126	700	1,595,995	954,381	2,550,376
Jackson	25,446	405,760	240	6,642,083	2,257,617	8,899,700
Jefferson	60,330	377,920	251	15,615,420	6,931,667	22,547,087
Johnston	21,062	432,000	500	1,074,615	1,287,622	2,362,237
Jaffayette	15,352	336,000	278	3,014,485	1,731,308	4,745,793
Lawrence	22,098	378,880	260	5,361,801	2,065,693	7,427,494
Lee	28,852	381,640	220	5,957,845	2,308,080	8,265,934
Lincoln	18,774	365,000	200	2,736,205	725,241	3,461,449
Little River	16,301	349,440	350	3,579,134	1,927,335	5,506,469
Logan	25,866	464,640	500—3000	4,433,688	2,089,705	6,523,393
Louise	33,400	508,106	234	7,396,298	2,324,623	9,720,921
Madison	14,918	535,000	1200	1,533,725	1,085,320	2,619,045
Marion	10,154	413,440	784	1,889,350	675,275	2,564,625
Miller	24,921	398,720	297	7,039,816	3,731,514	10,771,330
Mississippi	47,320	506,880	250	11,835,855	3,904,129	15,739,975
Monroe	21,601	385,920	200	5,448,150	1,194,813	6,642,963
Montgomery	11,112	570,240	700	1,245,055	595,940	1,840,975
Nevada	21,934	396,800	283	2,504,280	1,680,396	4,184,676
Newton	11,199	541,440	800	1,121,289	380,081	1,501,370
Ouachita	20,636	409,120	230	5,030,306	2,659,624	7,689,930
Perry	9,965	553,280	675	2,009,650	603,213	2,612,863
Phillips	41,530	442,880	200	9,772,085	5,157,624	14,929,709
Pike	12,397	384,610	506	1,894,073	954,388	2,848,461
Poinsett	20,848	461,440	284	6,330,445	1,952,374	8,282,819

Table X (Continued)
 Population, Area, Average Elevation and Assessed Valuations of the Counties of Arkansas.

COUNTY	Population 1926	Area in Acres	Average Elevation In Feet	Assessed Valuation - Real Property 1922	Assessed Valuation - Personal Property 1922	Total Assessed Valuation 1922
Polk	16,412	541,440	1,300	3,889,392	1,614,350	5,503,742
Polk	27,493	528,920	617	4,893,019	2,192,698	6,995,717
Prairie	17,447	432,000	211	1,514,635	1,409,742	6,124,377
Pulaski	109,464	498,560	250	16,097,870	23,707,760	69,805,630
Randolph	17,713	418,560	220	2,524,753	1,736,406	4,281,159
Saline	16,781	496,000	350	3,761,150	1,782,900	5,544,050
Scott	13,232	620,800	910	1,884,300	886,334	2,764,634
Seaway	14,580	430,720	650	1,861,746	839,014	2,700,760
Sebastian	56,739	339,840	500	18,474,690	19,540,831	29,015,521
Sevier	18,301	366,080	212	3,863,460	1,723,572	5,587,032
Sharp	11,132	389,760	430	1,426,565	748,672	2,175,237
Sh. Francis	28,385	401,920	250	6,870,621	2,477,974	9,348,592
Stone	8,779	391,040	850	903,110	500,201	1,403,311
Union	29,691	670,720	250	6,797,239	9,429,233	16,217,472
Van Buren	13,666	467,200	500	1,032,761	465,160	1,497,921
Washington	35,498	611,200	1450	8,680,910	4,046,521	12,727,431
White	34,693	663,680	306	6,803,133	2,863,687	9,668,820
Woodruff	21,547	369,280	206	5,167,803	1,510,898	6,678,701
Yell	25,655	614,200	577	4,285,975	1,828,252	6,114,227
Total	1,752,204	33,616,000		\$306,589,565	\$179,184,078	\$485,773,643

Table XI.
Road Mileage Data—Counties of Arkansas

COUNTY	Proposed State Highway System			Road Improvement Districts		Types of Improved Roads			
	Miles Public Road	Primary	Secondary	State	Total		No. of Dist.	Mileage	Estimated Cost
Arkansas	1963	.....	98.65	24.30	122.95	4	207.80	\$4,545,492.31	Gravel and Asphalt
Ashley	1200	.....	89.85	42.16	132.01	3	54.51	979,960.45	Gravel and Concrete
Baxter	1420	.....	41.00	42.88	83.88	2	34.50	375,000.00	Macadam
Benton	1693	.....	36.70	25.00	132.37	6	239.96	1,895,673.00	Gravel
Boone	800	.....	27.00	37.83	109.76	2	53.18	195,988.00	Graded and Gravel
Bradley	750	.....	.....	29.00	59.00	.....	.....	.....	.....
Calhoun	805	.....	67.35	.....	67.35	.....	.....	.....	.....
Carroll	1270	43.30	.....	44.20	87.57	6	95.19	481,707.00	Gravel
Chicot	421	40.78	.....	12.58	87.21	5	92.25	1,887,042.02	Gravel and Asphalt
Clark	1100	38.60	41.95	.....	80.55	2	158.08	1,522,954.00	Gravel
Clay	955	19.50	57.10	6.00	82.60	.....	.....	.....	.....
Cleburne	1550	.....	64.87	29.00	93.87	.....	.....	.....	.....
Cleveland	1600	.....	57.25	1.00	58.25	3	40.90	1,150,972.00	Gravel
Columbia	795	.....	63.05	7.00	70.05	2	27.87	306,979.00	Gravel
Conway	824	22.27	39.32	.....	61.59	5	137.07	2,431,000.00	Gravel, Macadam, Asphalt
Craighead	1041	32.22	49.00	12.60	93.82	4	73.64	1,813,990.51	Asphalt
Crawford	1569	48.45	.....	27.40	75.85	4	102.84	1,140,046.60	Graded
Crittenden	884	53.12	22.30	.....	75.42	7	280.83	6,051,425.00	Gravel and Concrete
Cross	752	.....	53.20	.....	53.20	4	78.02	1,696,975.00	Gravel
Dallas	1100	35.40	59.70	16.80	101.90	3	233.30	1,065,596.00	Gravel
Desha	250	30.10	60.55	7.80	98.45	2	51.37	1,114,614.14	Gravel and Asphalt
Drew	1651	7.20	66.70	21.40	95.30	2	16.80	413,305.40	Asphalt
Faulkner	725	44.87	38.30	8.00	91.17	5	92.49	1,818,200.95	Asphalt
Franklin	980	24.45	4.40	35.00	63.85	1	23.90	383,500.00	Gravel
Fulton	1000	.....	47.65	23.00	70.36	1	29.00	183,000.00	Gravel
Garland	437	34.80	35.40	17.00	87.20	2	35.80	562,620.00	Graded and Gravel
Grant	1530	28.50	43.10	25.20	96.80	9	144.57	1,255,740.96	Gravel
Greene	798	.....	67.30	.....	67.30	.....	.....	.....	.....

Table XI (Continued)
Road Mileage Data—Counties of Arkansas

COUNTY	Miles Public Road	Proposed State Highway System			Road Improvement Districts			Types of Improved Roads	
		Primary	Secondary	State	Total	No. of Dist.	Mileage		Estimated Cost
Hempstead	1288	21.65	37.50	21.50	80.65	6	86.68	1,050,821.99	Gravel
Hot Spring	1600	28.25	38.35	66.60	66.60	1	28.45	20,000.00	Graded and Gravel
Howard	1320	.....	39.15	50.00	89.75	4	35.25	690,989.27	Gravel
Independence	912	.....	68.70	31.22	99.92	2	46.95	244,000.00	Gravel
Izard	1750	.....	67.62	17.85	85.47	2	50.49	325,000.00	Gravel
Jackson	746	42.20	20.70	33.10	96.00	4	90.36	1,103,000.00	Gravel
Jefferson	1570	40.40	79.60	.....	129.00	12	162.33	1,217,566.99	Gravel, Concrete, Asphalt
Johnson	629	33.90	.....	22.00	55.90	2	50.60	677,534.92	Macadam and Asphalt
LaFayette	715	.....	30.55	26.00	56.55	2	31.80	317,603.57	Gravel
Lawrence	496	39.86	57.10	.....	96.96	9	179.97	1,596,880.10	Gravel
Lee	716	.....	69.50	.....	69.50	7	89.35	651,920.18	Gravel and Asphalt
Lincoln	415	13.35	35.40	29.15	77.90	7	140.41	1,778,756.01	Gravel
Little River	750	46.00	16.30	23.00	85.30	7	7.40	71,000.00	Macadam and Asphalt
Logan	1654	.....	39.00	37.00	76.00	1	177.36	1,750,297.15	Gravel, Macadam, Asphalt
Lonoke	911	38.86	54.25	19.50	112.61	12	70.29	246,600.00	Graded and Gravel
Madison	1500	.....	133.35	133.35	133.35	1	.....	.....	.....
Marion	1100	.....	46.05	23.30	69.35	.....	.....	.....	.....
Miller	401	55.80	21.35	.....	77.15	1	72.60	575,000.00	Gravel
Mississippi	1995	46.60	36.60	20.40	103.60	9	341.49	5,885,437.50	Concrete and Asphalt
Monroe	465	36.70	33.60	70.30	70.30	4	46.22	962,897.81	Gravel
Montgomery	660	35.85	27.25	32.90	96.00	3	63.50	170,109.16	Graded and Gravel
Nevada	499	17.60	22.00	34.90	74.50	1	5.50	50,000.00	Gravel
Norton	694	2.00	40.40	75.45	117.85	5	94.10	360,808.36	Graded and Gravel
Ouachita	599	34.20	57.40	10.00	101.60	1	18.27	46,223.17	Gravel
Perry	447	.....	38.20	17.60	55.80	1	38.25	177,462.17	Graded and Gravel
Phillips	905	26.05	62.85	.....	88.90	4	113.37	3,997,032.34	Concrete and Asphalt
Pike	583	.....	77.00	6.00	83.00	2	4.60	63,584.51	Graded and Gravel
Poinsett	607	24.50	49.40	20.00	93.90	7	126.72	2,410,854.93	Gravel and Concrete

Table XI (Continued)
Road Mileage Data—Counties of Arkansas

COUNTY	Miles Public Road	Proposed State Highway System			Road Improvement Districts			Types of Improved Roads	
		Primary	Secondary	State	Total	No. of Dist.	Mileage		Estimated Cost
Polk	851	47.65	10.80	26.70	85.15	2	64.55	930,000.00	Gravel
Pope	835	25.74	43.90	38.50	108.14	4	121.85	1,185,321.43	Shale and Asphalt
Prairie	1296	33.50	55.75	4.20	93.45	11	108.89	1,542,767.85	Gravel and Macadam
Fulaski	619	76.35	10.60	27.23	114.18	9	195.77	5,889,926.74	Mac'd'm, Conc'te, Asphalt
Randolph	1085	26.70	32.70	35.00	94.40	3	19.35	178,725.00	Gravel and Macadam
Saline	837	47.20	.....	25.70	72.90	3	47.20	1,860,660.00	Gravel and Concrete
Scott	922	59.50	22.40	23.20	105.10	B.D.	Bridge	25,000.00	.....
Searcy	982	41.80	27.35	33.75	102.90	4	31.93	351,647.69	Gravel
Sebastian	954	28.80	14.50	18.00	61.30	3	17.95	1,137,836.00	Shale and Asphalt
Sevier	670	23.25	62.00	.....	85.25	8	138.95	1,602,022.16	Gravel
Sharp	577	.....	61.10	9.30	70.40	1	13.09	85,000.00	Graded and Gravel
St. Francis	808	43.60	27.87	.....	71.47	6	160.84	2,549,250.00	Gravel
Stone	775	.....	40.50	20.23	60.73	2	26.50	132,497.00	Graded and Gravel
Union	1330	28.15	71.55	21.15	120.85	1	12.00	100,000.00	Graded
Van Buren	1500	33.29	23.50	44.00	100.79	6	74.34	457,368.77	Graded
Washington	1011	36.85	32.50	59.70	129.05	5	105.00	988,500.00	Gravel
White	1075	48.00	56.18	32.00	136.18	3	77.33	1,529,449.40	Gravel
Woodruff	1200	.....	51.60	7.40	59.00	8	95.05	1,573,068.35	Graded and Macadam
Yell	1408	.....	90.80	41.70	132.50	2	62.65	731,970.90	Graded and Macadam
Total	74525	1751.41	3238.57	1647.93	6637.91	.....	.....	.....	.....

HIGHWAY FINANCE, BONDS AND BOND ISSUES.

Highway finance is a subject that has come before the people of practically every State in the Union during the past few years. The steadily increasing demand for more and better highways arising from the increase in motorized traffic and the increased developments of the country has resulted in a financial problem so great as to make it imperative that much study be given the question.

Division of Cost of Highway Construction and Maintenance: The fundamental questions involved in the solution of this vexing problem are, first, the determination as to what part of the cost of improved highways should be borne by the present tax payer and what part by future generations and, second, how should the cost be divided between the user of the road and the tax payer in general. The satisfactory determination of these questions will settle for some time to come the ultimate method of highway financing.

Permanent and Temporary Portions of Improvement: In settling these perplexing questions certain facts must be kept in mind. In any kind of a well projected and executed highway improvement there are certain parts of the work that may be classed as permanent, and other parts as temporary or semi-permanent. Such features as the location, the right-of-way, the subgrade and many of the structures are classed as permanent and are handed down to posterity. The surfacing may be classed as temporary or semi-permanent, dependent upon the type and quality of work, the traffic and the care taken of the improvement. In this consideration it should be well understood that maintenance, in addition to its usual definition, should also be understood to include reconstruction—or in other words, that type of maintenance which would preserve the improvement from year to year in as good state as when originally completed.

High Types Required by Motor Vehicle Traffic: It must again be recognized that while the high types of roads required under present day conditions of motor transportation are built for a special class of users, it cannot be said that roads are built entirely for this class of traffic. The regular development of the country would demand improved roads, possibly of lower type, but in any event it is granted that real property is materially

benefitted, land values are increased and educational facilities for the whole people are improved.

Ideal Method of Financing: Considering these facts it is believed that the ideal method of financing highway improvements is to levy an ad valorem state tax or sell State bonds for sufficient funds to add to the fees derived from licensing motor cars and trucks and Federal Aid to build roads of the State Highway System as rapidly as economically desirable and then to collect a sufficient tax on gasoline to provide for all maintenance and reconstruction charges. In this way the future generation would assist in paying the cost of that part of the improvement passed on to them, the general taxpayer would help pay for his share of the development, the motor vehicle owner would bear the cost of building the road to the higher standard required for his particular benefit and the road user would take care of the investment.

Plan of Financing Followed by Other States: In determining a method of highway finance some states have followed one plan, others different ones. Missouri and Alabama, for example, have sold bonds, using to retire principal and interest the annual collections of automobile license fees. New York and Pennsylvania have sold State bonds, paying for them with an ad valorem tax. Minnesota and Louisiana levy sufficient taxes on motor vehicles and gasoline to build and maintain its State roads. Texas sells county ad valorem bonds and Arkansas road improvement district bonds. It is apparent that the trend of opinion is away from large long time bond issues for financing the total construction cost of highway improvements and toward a greater tax on the actual beneficiaries of the roads for sufficient annual charges to cover the cost of a normal construction program and adequate maintenance.

Arkansas' Problem of Financing: Arkansas' problem of financing, however, is a more difficult one than fixing a policy at this time. Highway development in this State has gone to such an extent that approximately \$62,000,000.00 in bonds have already been sold by Road Improvement Districts for the purpose of building about 5,917 miles of improved highway, approximately 65 per cent to 70 per cent of which form a part of the selected system of State Highways. Unfortunately, practically all of this large amount of money has been incurred as a debt on the real property in the road improvement districts,

the personal property escaping all taxation and the motor vehicle owner and user of the road paying only a fraction of the cost. A very deplorable condition exists in the fact that whereas this large sum has been provided for construction, hardly any adequate provision has been made for the preservation of the investment by provision for adequate, careful and continuous maintenance.

No Probability For Immediate Relief of Taxpayers: Considering the poor state of maintenance and the absolute necessity of making some satisfactory provision for this work, not only to secure the annual Federal appropriations of aid but to preserve the investment that the taxpayers have in work done, it is the opinion of the Highway Commission that at this time nothing material can be done to lighten the tax burden now existing. The Commission recognizes the fact that something along this line must be done for the taxpayers within a short time, but it is believed that any provision for material assistance must be postponed at least two years and possibly four years. Within that time it is expected that the revenues from the license of motor vehicles and gasoline taxes can be built up to such an extent that there will be surplus funds to assist Road Improvement Districts in meeting principal and interest payments on bonds.

Future Policy Outlined: With that revenue to be expected from the auto license and gasoline taxes, the State should, in our opinion, bend every effort to first, maintain the roads on the State Highway System in an entirely satisfactory manner; second, provide a fund to match, dollar for dollar, Federal aid granted the State; third, complete work undertaken by road improvement districts which have expended their available funds and have not secured the promised improvements; fourth, complete connecting links, and fifth, assist those districts which have completed their construction work but have not paid their contracted indebtedness.

Bonds.

Criticism of Arkansas Bonds Not Justified: Practically all financing of Road Improvement District construction work in Arkansas has been done by the issuance and sale of bonds. From time to time much criticism has been made of these Arkansas securities by misrepresentations and untruthful statements published in other sections of the country fostered by the discontent of objecting and disgruntled taxpayers within the State.

It is generally recognized now, however, that Arkansas Improvement District Bonds are first class and are well protected with ample property valuation behind them. At times delays, more or less serious, have occurred in meeting interest payments when due but these cases are rare and it has generally been found, after a very thorough investigation that the percentage of delinquent taxpayers compares favorably with other states.

Percentage of Taxes Levied Which Have Been Collected: During 1921 the Mississippi Valley Group Investment Bankers Association of America made an exhaustive study of the conditions of bonds sold by Arkansas Road Improvement Districts and prepared the following table:

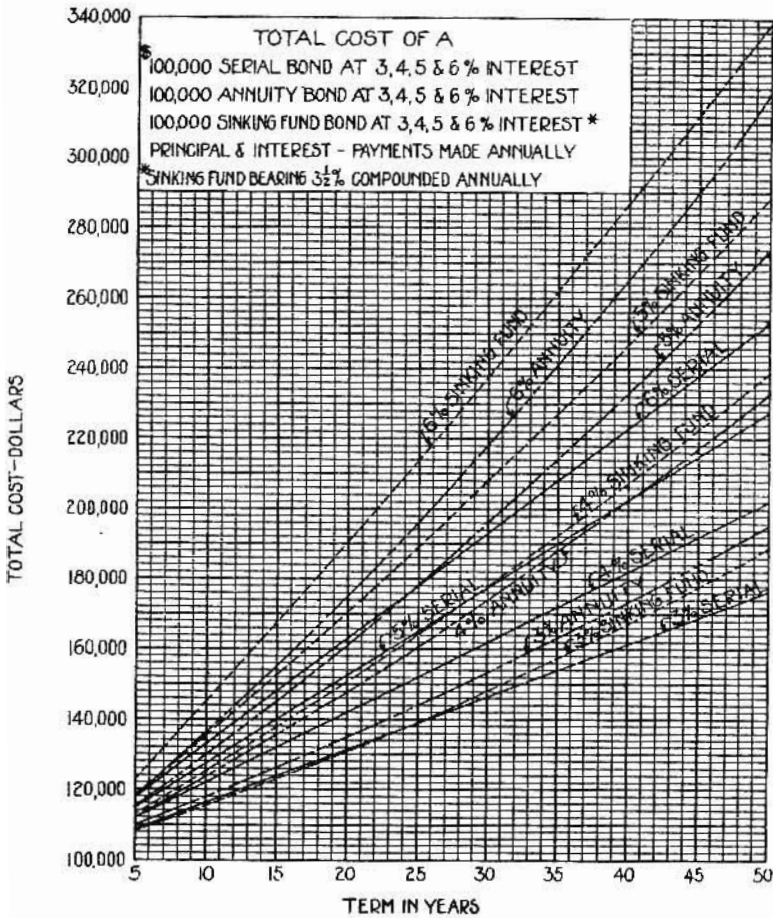
**State and County Tax Collections—1915-1919.
Totaled and Averaged.**

State	Per Cent Real Property	Per Cent Personal Property	Per Cent Both Classes
Illinois .....	.....	.....	99.6
Arkansas	99.0	95.4	97.2
Indiana	98.8	93.8	96.3
Missouri	93.5	92.6	93.0

Improvement District Tax Collections: Other compilations made by this Association covering 41 improvement districts scattered over 14 representative counties show that the average amount collected was 98.75 per cent of the total tax levied. As in every case where bonds are issued, a tax of 10 per cent more than needed to meet principal and interest requirements is levied, the delinquency of 1.25 per cent may be considered negligible.

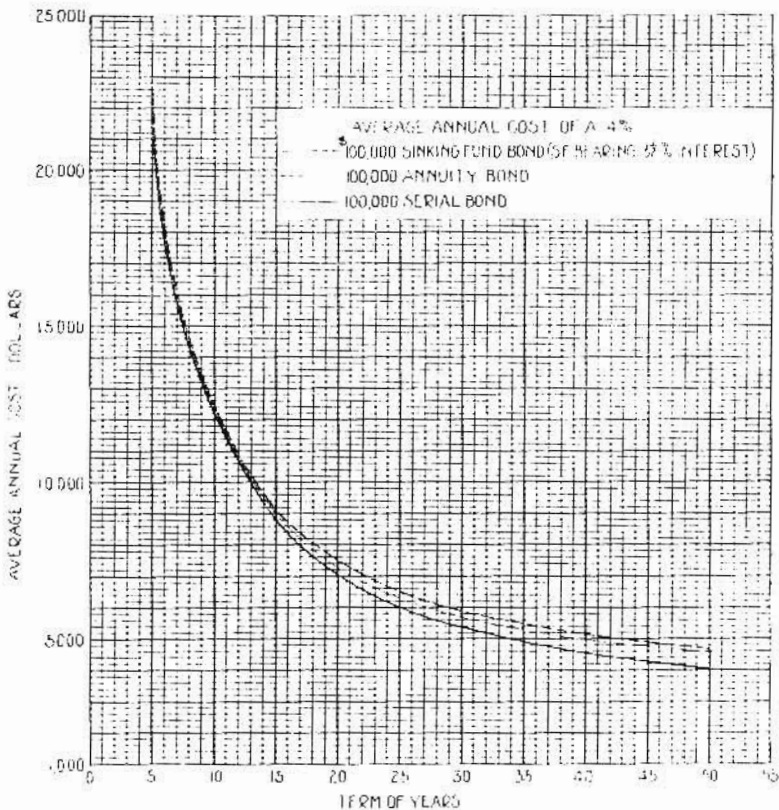
Types of Bonds: It is almost universally the case that Arkansas Road Improvement District Bonds are issued serially to cover a period of 20 years. The interest rate in the majority of cases is 6 per cent, however, many issues are disposed of on a 5½ per cent and a 5 per cent basis. There are three types of bonds generally considered suitable for highway financing, the sinking fund, the annuity and the serial. The annuity bond serves a purpose similar to the serial bond, costs slightly more and has little favor with the bond buyers or the investing public and consequently is never used. The sinking fund bond does not suit the condi-

tions of our road improvement district organizations and consequently the serial type of bond has been found better and more satisfactory and is the cheapest type of bond financing for the improvement district. The figure given below shows graphically the relative cost of the different types of bonds:



**Bonds For
Periods in
Excess of
25 or 30
Years Not
Justified:**

Frequently there is a suggestion that possibly the issuance of bonds for longer periods than 20 or 25 years would lighten materially the burden on the taxpayer. As a principle it may be considered unsound business and public policy to issue bonds extending beyond the life of the improvement. Some States, particularly New Jersey and Delaware, have statutes imposing such limitations and for certain types of highway improvements which are considered temporary, bonds can not be issued for a period in excess of five years. The figure shown below indicates that there is very little advantage to be gained by fixing the term of bonds longer than 25 years.



Little advantage is gained through bonds running more than 25 years

Bond Issue Statistics.

Price Secured For Arkansas Bonds: Until the latter part of 1920 and the early part of 1921, Arkansas Road Improvement District Bonds ordinarily brought par and above on a 6 per cent basis. During the political campaign of 1920 almost every candidate for an important political office made a severe attack on the improvement district plan and this coupled with the decline in value of farm products and a great deal of adverse propaganda spread both in the State and outside created a condition which actually prevented the sale of these securities. During the early part of 1921 those bonds offered for sale brought bids of as low as 72 cents and seldom ever as much as 85 cents. As a consequence very few issues were sold.

Arkansas Bonds Now Selling on an Average of Par: When conditions became so bad all agencies interested in the development of the State went to work to combat the flood of false propaganda and during the latter part of 1921 conditions began to improve. The tabulation shown below covering bond sales in 1922 indicates that Arkansas road bonds have just about reached a par basis again and it is hoped that nothing else will occur to again cause the investor to lose faith in them.

Table XII.
Sales of Road Improvement District Bonds During 1922.

COUNTY	District	When Sold	Amount of Issue	Rate	Price Secured	Terms
Franklin	No. 1	January	\$50,000.00	5½	93.00	Cash
Mississippi	Basset-Waddell	January	75,000.00	6	100.00	Cash on Estimates
Sevier	No. 3	January	30,000.00	6	90.00	Cash
Sevier	No. 11	January	44,500.00	6	94.13	Cash on Estimates
Chicot	Jerome	January	105,000.00	6	100.00	Cash on Estimates
Conway	No. 2	February	200,000.00	6	96.00	Cash on Estimates
Crittenden	No. 6	February	350,000.00	6	94.00	Cash and 4% on Daily Balances
Lincoln-Desha	Douglass-Gould-Star City	February	25,000.00	6	95.00	Cash
Miller	No. 1	February	40,000.00	6	95.25	Cash
Jefferson-Grant	No. 1	February	40,000.00	6	92.30	Cash
Poinsett	Bay-St. Francis	February	150,000.00	6	94.07	Cash on Estimates
Cross	No. 1	March	25,000.00	6	96.52	Cash
Poinsett	Ozark Trail	April	250,000.00	6	97.50	Cash
Phillips	Helena-Ferguson	April	200,000.00	6	94.00	Cash
Pope	No. 2	May	315,000.00	6	100.50	Cash
St. Francis	No. 2	May	218,000.00	6	101.70	Cash on Estimates
Little River	No. 6	May	125,000.00	6	98.00	Cash
Hempstead	Hope	May	30,000.00	6	100.00	Cash and Expenses
Polk	No. 1	May	150,000.00	6	95.00	Cash on Estimates
Washington	No. 1	May	30,000.00	6	95.00	Cash
Searcy	No. 3	June	20,000.00	6	90.00	Cash
Grant	No. 6	June	55,000.00	6	96.50	Cash on Estimates
White	No. Ark. No. 1	June	110,000.00	6	98.00	Cash
Lawrence	Hoxie-Running Water	July	100,000.00	6	98.50	Cash on Estimates
Cross	Parkin	July	225,000.00	6	99.00	Cash on Estimates
Cleveland	No. 1	July	30,000.00	6	99.50	Cash on Estimates
Lonoke	No. 3	July	85,000.00	5½	94.12	Cash on Estimates

Table XII (Continued).
Sales of Road Improvement District Bonds During 1922.

COUNTY	When Sold	Amount of Issue	Rate	Price Secured	Terms
Pulaski-Saline-					
Garland	August	400,000.00	5½	100.15	Cash
Independence-					
Fulton-Izard	August	400,000.00	6	101.00	Cash on Estimates
Cleveland	August	17,500.00	5½	98.00	Cash
Polk	August	140,000.00	6	100.00	Cash on Estimates
Monroe	September	160,000.00	6	102.50	Cash on Estimates
Carroll	September	25,000.00	6	90.00	Cash
Drew-Chicot	October	150,000.00	6	102.00	Cash on Estimates
Chicot	October	100,000.00	6	102.00	Cash on Estimates
Pulaski	November	1,747,000.00	5	98.06	Cash
Mississippi	November	15,000.00	6	98.25	Cash
Lonoke	November	75,000.00	5½	98.10	Cash
Lonoke	November	25,000.00	5½	95.00	Cash

Total amount Bonds sold 1922.....\$6,327,000.00
 Total Amount Realized 6,296,869.32
 Average Price Secured 99.52

The table shown below gives the results of compilations of bond sales made by all road improvement districts divided as to counties. While these figures may not be entirely accurate, they represent the most complete information that can be obtained.

Table XIII.

Bond Sales of Road Improvement Districts Divided as to Counties.

County	No. of Road Imp. Dist.	Bonds Issued and Sold	Amt. Realized
Arkansas	4	\$4,404,000.00	\$4,170,497.55
Ashley	3	880,000.00	830,000.00
Baxter	2	194,000.00	182,000.00
Benton	5	1,712,500.00	1,570,612.50
Boone	2	104,000.00	107,760.00
Bradley .....	..	.....	.....
Calhoun .....	..	.....	.....
Carroll	6	385,500.00	365,257.00
Chicot	5	1,592,200.00	1,574,180.00
Clark	2	625,000.00	581,209.49
Clay .....	..	.....	.....
Cleburne .....	..	.....	.....
Cleveland	3	442,000.00	390,843.60
Columbia	2	214,500.00	198,500.00
Conway	5	1,640,000.00	1,652,525.00
Craighead	4	970,000.00	927,441.09
Crawford	4	1,100.00	1,100.00
Crittenden	7	5,478,000.00	5,232,006.00
Cross	4	1,650,000.00	1,487,942.50
Dallas	3	658,000.00	658,000.00
Desha	2	1,009,800.00	1,008,800.00
Drew	2	366,000.00	369,000.00
Faulkner	5	1,241,000.00	1,201,000.00
Franklin	1	225,000.00	221,500.00
Fulton	1	120,000.00	121,200.00
Garland	2	450,000.00	450,180.00
Grant	9	1,073,500.00	981,722.18
Greene .....	..	.....	.....
Hempstead	6	907,000.00	856,918.79
Hot Spring	1	.....	.....
Howard	4	630,000.00	543,152.00
Independence	2	170,000.00	162,550.00
Izard	2	200,000.00	202,000.00
Jackson	4	670,000.00	670,000.00
Jefferson	12	1,096,478.58	1,095,168.58

Table XIII (Continued)
 Bond Sales of Road Improvement Districts Divided as to
 Counties.

County	No. of Road Imp. Dist.	Bonds Issued and Sold	Amt. Realized
Johnson	2	334,000.00	334,000.00
Lafayette	2	279,500.00	258,786.87
Lawrence	9	1,181,000.00	1,081,242.00
Lee .....	.....	.....	.....
Lincoln	7	515,000.00	502,596.43
Little River	7	1,554,000.00	1,427,752.80
Logan	1	55,000.00	53,102.50
Lonoke	12	1,500,500.00	1,481,328.15
Madison	1	207,000.00	201,600.00
Marion .....	.....	.....	.....
Miller	1	540,000.00	524,482.28
Mississippi	9	4,071,000.00	3,843,210.50
Monroe	4	548,700.00	552,450.00
Montgomery	3	109,000.00	100,090.00
Nevada	1	45,000.00	44,000.00
Newton	5	183,000.00	176,700.00
Ouachita	1	.....	.....
Perry	1	94,000.00	86,750.00
Phillips	4	3,428,000.00	3,301,382.00
Pike	2*	37,584.51	37,584.51
Poinsett	7	1,712,000.00	1,635,806.58
Polk	2	790,000.00	740,000.00
Pope	4	733,000.00	734,525.00
Prairie	11	1,353,230.00	1,327,820.50
Pulaski	9	4,789,161.00	4,762,429.20
Randolph	3	104,500.00	104,330.60
Saline	3	335,000.00	331,010.00
Scott	1	.....	.....
Searcy	4	248,000.00	224,600.00
Sebastian	3	815,000.00	815,000.00
Sevier	8	1,034,000.00	1,377,704.06
Sharp	1	44,500.00	41,888.62
St. Francis	6	1,683,000.00	1,687,600.00
Stone	2	89,000.00	83,872.00
Union	1	.....	.....
Van Buren	6	345,000.00	302,859.42
Washington	5	810,000.00	760,500.00
White	3	1,420,000.00	1,392,949.40
Woodruff	8	1,300,000.00	1,229,068.35
Yell	2	509,000.00	484,768.28

* Bridge District No. 1 included.

CONTRACT PRICES AND THEIR GENERAL TREND.

Contract prices for items entering into road construction fluctuate in a well defined ratio to the market prices for commodities and the prevailing cost of common and skilled labor.

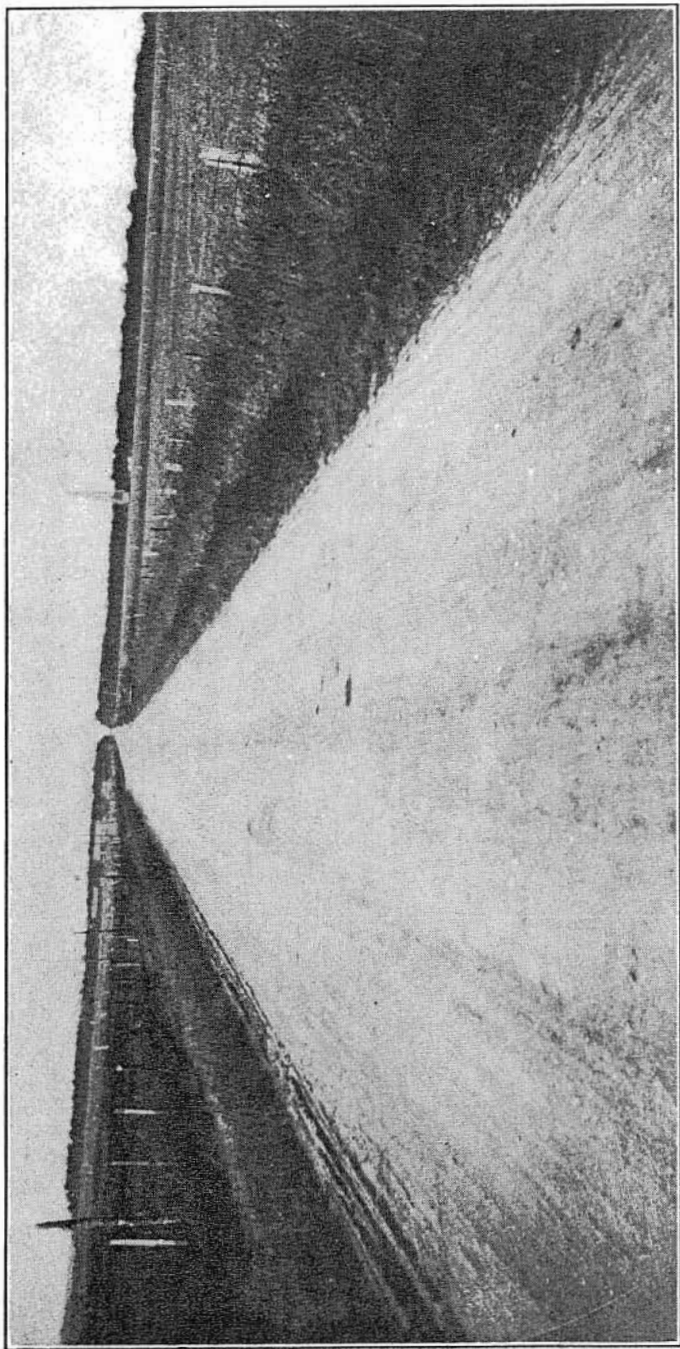
Contract Price Level Reached Peak in Winter 1919-20: In 1917 and 1918 when Arkansas' road program was in its infancy prices were comparatively low. Contracts that were let then and carried over into 1919, 1920 and 1921 generally have caused serious

loss to the contractor, this loss being made up of increased freight charges on materials, increased material charges and greatly increased labor charges. In looking back over the past five years it is to be noted that prices began their uphill climb during the early part of 1919, shortly after the termination of the world war and exactly in unison with the immense road building program undertaken by this State. The peak was reached in the price level during the early months of 1920, and it may be said that even though contract prices for road work were not out of line with prices of staple commodities, they were excessively high. At this point the break came and, since, prices have been seeking a lower level until now it may be considered that they have reached somewhat of a normal

Contract Prices Now Low: basis. It is to be observed that on more recent work for which contracts have been let some of the prices are extremely low

for the class of work and hardly cover more than the actual cost of the work assuming average working and weather conditions.

Range of Peak Prices: In May, 1920, while compiling some statistics, the department made computations based on prices which prevailed at that time and during several months previous. These figures show clearing and grubbing was costing \$200.00 to \$250.00 per acre. Earth excavation 48 to 55 cents per cubic yard, reinforced concrete \$31.50 to \$35.00 per cubic yard, plain concrete \$25.00 to \$29.00 per cubic yard, reinforcing steel 7 to 8 cents per pound, gravel hauling and placing \$1.10 to \$1.25 per cubic yard with an increase per mile of 40 to 50 cents, road gravel 50 and 55 cents per ton, asphaltic concrete pavement \$1.50 to \$1.70, cement concrete pavement 7 inches thick \$3.50 to \$3.80 per square yard and creosoted timber



A gravel road built by the Hazen-La Grue-Slovak Road Improvement District of Prairie County with the assistance of the State Highway Department and the Bureau of Public Roads, Federal Aid Project No. 55.

bridges \$28.00 to \$35.00 per lineal foot. Contractors at the same time were paying for common labor \$3.50 to \$4.00 per day and even at this rate of wage the labor was shiftless and very inefficient.

Prices Trend to Lower Level in 1921: After peak prices for road work were reached in the Spring of 1920, no contracts of importance were awarded until

January, 1921. At that time bids were taken for about 30 miles of gravel road in District No. 6 of Benton County and the prices for which the contract was let indicated clearly the trend to a lower level. Clearing and grubbing was secured for \$120.00 per acre, earth excavation 42 cents per cubic yard, plain and reinforced concrete \$22.00 and \$25.00 respectively and reinforcing steel 6 cents per pound, these units being much lower than in 1920. In April, 1921, Road Improvement District No. 9 of Crittenden County awarded a contract for 7½-inch reinforced concrete pavement for a cost of \$3.88 per square yard. This price was not much lower than the peak, however, but in this particular case the cost of stone and sand, which had to be shipped in from points at long distances, was excessive.

During the balance of 1921 very little additional work was contracted for with the exception of approximately 25 miles of gravel road in another district of Benton County. The price bid for gravel hauled and placed, zero to one mile haul, in this particular case was 80 cents with an average increase of 35 cents for each additional mile, quite a difference when compared with the 1920 range.

Trend of Prices Still Downward in 1922: In 1922 road building activity has increased and quite a mileage of new construction has been initiated. Among the representative contracts have been those for 12 miles of

18-foot reinforced concrete pavement in Poinsett County, 32 miles of gravel road in St. Francis County, 40 miles of asphalt pavement in Pulaski County, 12 miles of asphalt pavement in Mississippi County and 18 miles of 18-foot gravel pavement in Monroe County. The Poinsett County contract was awarded in April and the price fixed for 7½-inch reinforced concrete pavement \$2.48. This price may be compared with the price of \$3.88 for the identical pavement paid by the district in Crittenden County one year previous and the price of \$3.81 for 7-inch plain concrete pavement paid by a Mississippi County district in January of 1920. The St. Francis County job was undertaken in May with prices of \$70.00 per acre for clearing and grubbing, 27 cents per cubic yard for earth excavation, 63

cents per cubic yard for gravel hauled and placed, with an increase of 30 cents for each additional mile and \$19.75 per lineal foot for creosoted timber bridges. The work in Pulaski and Mississippi Counties is of the highest type and was contracted for in September. It is apparent that the prices of \$1.10 per square yard for 2-inch asphaltic concrete pavement, \$1.375 for a Warrenite pavement, \$1.02 for a 5-inch cement concrete base and \$1.65 for 6-inch concrete base are low and approach very nearly the actual cost of the work, not allowing the contractor the usual margin of profit. The work in Road Improvement District No. 3 of Monroe County, awarded only a short time ago, represents the last contract of importance let this year. Earth excavation was bid at 20 cents per cubic yard, gravel hauling and placing at 60 cents with an increase of 30 cents for each additional mile and other items in proportion.

Cost of Bridge Work Reduced: Along with items of grading and surfacing prices for concrete and steel for structures have been materially reduced, especially where local materials are available. On several bridge projects recently contracted for by the department concrete has been bid as low as \$13.50 per cubic yard in place and creosoted pile bridges at \$13.75 per lineal foot.

In summing this data up the following table may be used to show the range of prices during the early part of 1920 and at the present time and the approximate percentage of reduction on contract prices.

Table XIV.
**Range of Prices During Early Months of 1920 and at
 Present Time With Percentage of Reductions.**

Item	Unit	Range of Price Early Months 1920		Range of Prices Latter Months 1922		Average Percentage Reduction
Clearing and Grubbing	Acre	\$200.00-\$250.00		\$70.00-\$125.00		56
Excavation	Cu. yd.	0.48-	0.55	0.20-	0.28	53
Plain Concrete	Cu. yd.	25.00-	29.00	15.00-	18.00	29
Reinforced Concrete	Cu. yd.	31.00-	35.00	20.00-	23.00	34
Reinforcing Steel	Pound	0.07-	0.08	0.04-	0.06	33
Gravel hauled 0-1 mi., spread and rolled	Cu. yd.	1.10-	1.30	0.65-	0.85	37
Gravel haul additional mile	Cu. yd.	0.40-	0.50	0.30-	0.35	28
2-in. asphaltic concrete pavement	Sq. yd.	1.50-	1.70	1.10-	1.40	22
7½-in. rein- forced concrete pavement	Sq. yd.	3.50-	3.90	2.40-	2.60	32
Crossed pile bridge	Lin. ft.	28.00-	35.00	17.00-	20.00	41
Road gravel	Ton	0.50-	0.55	0.35-	0.40	28

**Percentage
of Reduction
in Contract
Prices:**

It is to be noted from this table that the average percentage of reduction in prices varies from 22 per cent to as high as 56 per cent. For all items of construction entering a road project it may safely be assumed that the percentage of reduction at this time, based on peak prices, is approximately 35. This reduction has been caused by some reduction in the price of materials and has also been very materially affected by the reduction in labor charges and improvement in the efficiency of labor.

Contract Prices A warning might be given here to those
Now as Low who will be in responsible charge of pro-
as Can Be spective road work. Conditions have not
Expected: become entirely normal yet, freight rates
are still high and prices bid by contractors
which are so low as not to cover the cost of the work and a
fair profit are likely to lend to future trouble and serious
delays. Do not expect to get much lower prices for road
work than are now being bid by contractors unless there
is a further adjustment of material prices on a lower level
and a reduction in freight rates.

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State	Annual Salary	Term Years	No. of Counties in State	No. of State Divisions for Administration of Roads		Total Personnel †
				Con.	Maint.	

1
2
3
4
5
6
7

DATA ON OTHER STATES

A true conception of Arkansas' road progress, organization and difficulties can only be gained after a study of conditions in other States of the Union, or at least the neighboring States. To begin this study there is given below a table showing the organization of the Highway Commissions in each of the other States:

(See Insert Table XV.)

State Appropriations

Frequently a discussion arises as to where and how State Highway funds are obtained and what division of funds is made between the Counties and the State, specifically referring to the motor vehicle licenses and the gasoline taxes. A table prepared by the American Automobile Association for the year 1922 shows this data in convenient form and is given below:

(See Insert Table XVII.)

Recent State Bond Issues: During the past few years immense sums of money have been made available for highway construction over the United States. Among those States that have recently voted large bond issues are Missouri, with \$60,000,000.00; New Jersey, \$7,000,000; Alabama, \$25,000,000; North Carolina, \$50,000,000, and many others. Arkansas has kept well in line with the other States and has issued approximately \$60,000,000 during the past five or six years.

MAINTENANCE.

Maintenance Now Greatest Problem Before Arkansas: Until the early part of 1920 maintenance of improved roads in Arkansas was an unknown quantity as at that time practically no mileage of improved roads had been completed except near the larger cities.

Conditions have since changed, however, hundreds of miles of all types of road have been built and now the greatest road problem before the State and its people is that of maintenance, a type of maintenance that will preserve the initial investment and keep the roads in such repair that they will be safe, economical and comfortable for the traveling public. Construction of connecting links and completion of work under way is by no means an unimportant feature of the road program but it must be realized that maintenance produces in the minds of the people a desire for more roads by constantly keeping before them the easy riding, well kept highway where roads built at great expense and allowed to deteriorate and go to pieces in two or three years because of lack of maintenance create a disgust in the minds of the taxpayers that is well nigh impossible to overcome.

Lack of Adequate Laws: It is a deplorable fact that very few of the laws creating road improvement districts have provided ample funds for maintenance and have given to the taxpayers sufficient protection in the way of making mandatory the preservation of the investment for at least the life of the bonds issued to construct the improvement. The general law, Act 338, 1915 carried the following provisions in Section 29:

Act 338, 1915: "SECTION 29. The Board of Commissioners shall have, and they are hereby vested with power and authority, and it is hereby made their duty to build, construct and repair such roads, as may be deemed necessary to carry out the improvement contemplated, and in doing so shall expend such sums of money authorized to be levied and collected under the terms of this Act, and all roads built and constructed under the authority of this Act shall be public roads, and after their completion and acceptance by the County Court shall become a part of the general highways of the county, and for the purpose of maintaining the said roads, it shall be lawful for the County Court to supplement by specific allowance out of the general revenue fund of the county, the revenue raised under the provisions of this Act, or if the County

Court deems it to the best interest of the county and the existing road districts as they now exist under the laws of the State of Arkansas, it may direct that the funds above mentioned be supplemented for said purpose out of the three-mill road tax now authorized by law, to the end that the taxes levied under the general laws of the State shall be fairly and equally apportioned between the existing road districts and the said county, and the roads to be maintained under this Act in said road district.

“PROVIDED, HOWEVER, when a majority in acreage, number of land-owners, or in land value within a district shall petition the County Court for an order authorizing the commissioners to issue additional bonds for the purpose of maintaining roads in said Road Improvement District, it shall be lawful for the board to issue said bonds for the purpose of providing funds immediately for said purpose, but no bonds issued for said purpose shall run for a period to exceed fifteen years, nor shall any issue exceed twenty per centum of the assessed value of the real property in a district at the time of said issue, but before any additional bond issue is authorized a date shall be fixed by the court for a hearing on said petition, and public notice given thereof, as provided by Sections 1 and 2 of this Act, and the sufficiency of said petition shall be determined in a like manner, and when an additional bond issue for the purpose of maintaining the roads in said district is authorized, if the County Court finds that the assessment of benefits in force at the time is unequal or that it should be equalized or adjusted the court shall order a reassessment of benefits, which shall be made, advertised, and confirmed in the manner provided by Sections 9 to 14, inclusive, of this Act, and with like effect; Provided, However, if bonds or other interest-bearing evidences of indebtedness is outstanding at the time, the total of the assessment of benefits shall not be lowered, nor shall the additional issue of bonds or the collection of any tax therefor in any manner interfere with the collection of the tax for the payment of the bonds issued prior to that time.”

Maintenance Neglected: While this provision appears adequate, in actual practice the law is not workable. It invariably happens that on completion of any road and its delivery to the County Court there is a feeling that more than enough money has been paid for the improvement and that no more should be spent for further work. It also happens, even where there is a desire to properly maintain improved roads, that the available funds

from the County General revenue and the three-mill road tax do not provide a sufficient fund to give a road even a semblance of proper maintenance. It will be noticed that the law allows the issuance of bonds for maintenance upon a majority petition. This feature would appear to protect the investment but in actual practice it is seldom the case that the people are willing to approve additional levies and as a consequence nothing is done. Even if bonds were authorized it is considered very poor business policy to sell them for the purpose of maintenance. This method is a serious economic error as no financial undertaking would prove successful if long time interest bearing certificates were issued to take care of running expenses. This refers to ordinary maintenance and not to the issuance of bonds for rebuilding of a high type or a better road to meet increased traffic requirements.

Special Act Maintenance Provisions: Of the Special Acts passed creating Road Improvement Districts there are two classes; viz.: those that carry no adequate provision for maintenance leaving this feature to the County Courts and those that specifically provide for the perpetuation of the Board of Commissioners of the Road Improvement District, the levying of an additional assessment where necessary to provide a fund for adequate maintenance and the actual provision for maintenance by the Board of Commissioners.

The first class of Special Acts provide hardly any better safeguard for maintenance than the Alexander Law, the latter class give some protection in that a fund can be raised. None of the provisions are considered ample, for as a general thing, after construction is completed, the Boards of Commissioners do not maintain the same live interest in the improvement.

Funds Available For Maintenance: To show the impossibility of raising ample funds under these laws, some figures based on the 1922 condition will be given. The total assessed valuation of all real and personal property in the State in 1922 was reported to be \$575,773,643.00. If all counties voted the three-mill tax and actually collected it this tax would return \$1,727,320.00. When it is considered that this fund is handled by the County Judges and must necessarily be used to maintain the total public road mileage of the State, estimated at 75,-

000 miles, an average of \$23.03 per mile per year is available from this source. This, of course, is inadequate.

Under those laws providing for increased assessment it frequently happens that the real property is assessed to the limit and it is impracticable or impossible to raise additional funds.

Acts 424 and 606, 1921: At the 1921 session of the State Legislature the automobile license tax was increased and a tax of one cent per gallon placed on gasoline. The Legislature also provided that 70 per cent of the license tax and 50 per cent of the gasoline tax should be returned to the counties and that the money should be spent for construction and maintenance. It is estimated that the total revenue from these two sources for 1922 will be \$1,000,000 for the former and \$200,000 for the latter.

If this fund could be concentrated under some central authority and used only for maintenance of the designated system of roads it is believed that a great deal of valuable work could be done. However, on the basis of a 6,650-mile system and an average maintenance cost of \$200.00 per mile per annum it can be seen that this fund will not be large enough to sustain the Department, provide maintenance and provide a fund for further aid to construction and reconstruction.

Maintenance of Federal Projects: This condition of maintenance generally over the State is very deplorable, as the Federal laws require the State to guarantee maintenance of projects on which aid has been granted and the State has agreed to the Federal requirements by Legislative Act and by signed Agreement covering each individual project. The State in turn has exacted from the districts and counties specific pledges that maintenance will be taken care of adequately but experience has shown that usually these pledges amount to very little.

Maintenance Provision of Recent Federal Act: It is thought that the 1921 Federal Act appropriating additional aid will bring the whole question of maintenance to a head. One of the provisions of this Act is that the State must provide a fund for the maintenance of the designated system of roads and the actual maintenance work must be done under the direct supervision of the State. This makes it imperative that immediate legislative action be taken and means that if the State desires to continue participating with the Federal Government in road building, practically all of the gasoline tax and the

automobile license tax must be placed as a maintenance fund under the direct supervision of the State Highway Department.

Adequate Maintenance Program: While on this important feature of the future State's activities it may be well to outline briefly what is considered to be a well organized maintenance program. First it must be kept in mind that in such a large system there are all types of improvements, graded, gravel, macadam, surface treated gravel and macadam, asphaltic concrete and concrete, and that the kind of maintenance to be given each type varies considerably.

General Plan: In general, the plan to be followed is to divide the system into small patrol sections supplemented by small gangs for reconstruction and heavy repair work. These patrol and gangs will be under the direct supervision of a resident engineer or a superintendent who will report to a district engineer operating under direct orders from the State Highway Engineer and State Highway Commission.

Specific Policies: The following specific policies are outlined: 1. The system in each County will be divided into patrol sections, averaging from eight to ten miles in length where team patrol is used and 18 to 20 miles where motor patrol is used.

2. A patrolman will be engaged for each section, who will devote all of his time to the work for the entire maintenance season.

3. Patrolmen will be paid a monthly salary ample to attract good men. Where team patrol is used the patrolmen must furnish a satisfactory team and wagon, the State furnishing the grader and all other tools. Where a motor truck will be used the State will furnish all equipment.

4. The patrolman will be responsible for the maintenance of his section and where extra help is needed it will be furnished by the resident engineer or superintendent.

5. The patrolman will report daily and monthly to the resident engineer or superintendent.

6. Small gangs will be organized in each section, equipped for special work such as scarifying, surface treating, heavy grader work, etc., and will operate directly under the resident engineer or superintendent.

7. The year's program will be arranged in advance and a budget prepared covering all work. A fund will be provided to take care of the unexpected or emergency work.

8. A complete cost accounting system will be kept to thoroughly advise the public of what is being done and compare the work done in different localities.

9. The system will be made flexible so as to adequately maintain the whole system of 6,650 miles of roads.

Changes Needed: In considering any system of maintenance the primary features to be desired are, (1) the passage of adequate laws designating a system of roads to be maintained and fixing the whole responsibility of maintenance of this system on the State Highway Department; (2) the provision of an adequate fund to pay for the work to be done, and (3) the actual performance of the work by the State Highway Department. The Commission is thoroughly satisfied that if the Legislature will enact the necessary laws and will provide the requisite funds the Highway Department organization can be quickly expanded to efficiently handle the necessary maintenance and that within 18 months or two years will produce results which will rank Arkansas' system of highways with any in the country.

Average Annual Estimated Cost on Maintenance \$200 Per Mile: In approaching this subject the Highway Department is assuming that every mile of road in the system of 6,650 is to be maintained and that an appropriation of \$1,330,000.00 for 1923 and \$1,500,000.00 in 1924 will be necessary to carry on this work. In arriving at these figures it has been estimated that \$200.00 per mile for the first year will be ample, especially considering the fact that a great deal of the equipment necessary may be secured from the counties of the State and from the surplus war equipment delivered to the department by the Federal Government.

In fixing the estimate at \$200.00 a great deal of study has been given to actual conditions in this State and maintenance costs as reported by other States of the Union. In Arkansas there are only a few cases where maintenance has been taken care of by the patrol system and actual statistics on cost are available. It is also recognized that we have many miles of road recently constructed where the annual charge will not approach \$200.00, however there are many more miles of road that have been neglected and for the next three years will require more than the average amount specified.

Maintenance Cost of Other States: It is not altogether safe to use maintenance costs as developed in other States for a basis of determining probable costs in this State. Conditions vary a great deal, labor prices are not uniform, the quality and character of local materials differ, the character of soils encountered, the seasonal changes in weather, the methods of operation and the amount and kind of traffic all influence the problem. However, there may be given some statistics to show what is being done in several of the representative states.

New York State Maintenance: New York, a State with 700,000 passenger cars and 160,000 trucks, furnishes the following table covering the maintenance costs over a series of years for the different types of roads. The table represents from 5,000 to 8,000 miles of County and State highways and the maintenance work done was performed in a very thorough manner. The costs shown include all items of overhead and general expense.

Table XVIII.

Average Annual Maintenance Cost per Mile of Principal Types for the Past Seven Years, Including Change of Type.

	1915	1916	1917	1918	1919	1920	1921	Average
Bituminous macadam, penetration method, asphalt and tar,	8 510	483	408	557	501	590	753	513
Topeka on concrete base		265	245	435	441	335	299	277
Topeka on macadam base		256	393	1,056	443	985	769	650
Waterbound medm. Brick	1,055	906	970	739	691	797	951	873
First-class concrete	190	176	222	251	217	242	307	234
Second-class concrete	429	141	112	160	214	227	225	173
Gravel	1,050	1,080	1,127	791	761	868	874	936
Average, all types	955	587	918	909	771	704	890	819
Average, all types	750	651	643	608	560	631	744	

Illinois Maintenance Costs: Illinois, another of the states where careful maintenance is given the roads of the designated State Highway System reports the following summary of maintenance costs of 566 miles of road in 1919.

Table XIX.

Summary of Maintenance Costs For Illinois Highways in 1919, All Widths 10 Feet to 18 Feet.

TYPE	Miles	Wearing Surface Average Cost per Mile	Upkeep of Roadside Ditches at Average Cost per Mile	Total Maintenance Average Cost per Mile
Brick	86.90	42.63	76.16	118.79
Cement concrete.....	366.15	54.05	95.81	149.86
Bituminous concert.	19.43	244.75	11.88	256.13
Bituminous mcdm.	74.02	254.01	73.67	327.68
Waterbound mcdm.	26.95	299.45	35.35	334.80
Gravel	42.36	129.24	25.74	154.80

Michigan Maintenance Costs: Michigan has undertaken the maintenance of the system of trunk highways and during 1919, the state and counties participating in the work in the ratio of about 100 to 60. Accurate figures compiled by the maintenance engineer covering 2,763 miles of trunk road are given in the following table.

Table XX.

Summary of Maintenance Costs of Trunk Highways in the State of Michigan.

Type	Miles	Expenditures	Average cost per mile
Earth	1,505	\$192,979.35	\$128.19
Gravel	773	194,718.47	251.99
Macadam	365	178,832.57	490.20
Concrete	120	79,207.22	685.85

The figures for concrete are unusually high because of some unusual work necessary on 80 miles of the total. Eliminating this total the average cost for the concrete road totaled \$264.30. To the above figures should be added \$14.89 per mile for supervision and \$12.75 per mile for equipment. It may be noted here that there are 442,000 passenger cars and 51,000 trucks licensed in Michigan.

Iowa Maintenance Costs: Iowa, one of the great farming states of the Central West, has a total of 460,000 licensed automobiles and trucks, as compared with approximately 82,000 in Arkansas. Recently the Iowa State Highway Commission published some interesting information on the maintenance work undertaken in 1921. The data has been summarized and is given in the following table.

Table XXI.
Summary of Maintenance Cost For the State of Iowa.

Type	Class	Miles	Av. main-tenance costs
Graded	Primary	5,223	297.28
Graded	County	9,489	240.62
Gravel	Primary	1,156	450.83
Gravel	County	1,190	238.40
Hard surfaced	Primary	236	89.28

Motor Vehicle Registration Has Direct Bearing on Maintenance Costs: Many other figures and statistics could be shown but it is believed that considering the facts that the number of licensed motor vehicles in Arkansas is so much smaller than in New York, Illinois, Michigan and Iowa, that climatic conditions with especial reference to frost, are so much milder that in many places in this State local materials are available for maintenance, the estimate of \$200.00 per mile on the average will care for the actual maintenance of our roads during the first year. In fixing any appropriation for this purpose it is the recommendation of this Commission that \$200.00 per mile be used as the minimum average figure for the first year and \$225.00 for the second year, the increase to provide more particularly for the purchase of necessary equipment.

Traffic Regulations.

Traffic Regulations Must Be Enforced: No maintenance of our public highways can be entirely effective, no matter how much money is spent or how well the work is done, if there are no adequate laws regulating traffic and provisions made for enforcing such laws. The high speed automobile and the overloaded truck may do incalculable damage to our improved roads in a very short time. The regulation of this type of traffic is a very important part of any maintenance work and must be seriously considered.

Act 222, 1919: In 1919 the Legislature enacted Act No. 222, providing for the classification of our highways and the compilation of traffic regulations. This was done and the regulations are quoted in full below. The serious defect in the law is that the enforcement of the regulations is not provided for. By all means the law should be amended requiring the State Highway Department to enforce any regulations made and an appropriation for such purpose should be granted.

Classification of Roads and Traffic Regulations.

In conformance with Act No. 222 of the Extraordinary Session of the Legislature October, 1919, approved, the 20th day of October, 1919, the following classification of the roads are hereby made:

Class 1 Highways: All public highways having a hard surface of a total thickness compacted of seven (7) inches or over, said surface being of Portland cement concrete, asphaltic concrete or similar material on a concrete base, vitrified brick on a concrete base, and having a well drained sub-grade, shall be designated as Class 1 Highways.

Class 2 Highways: All public highways surfaced with penetration macadam, water bound macadam, gravel, chert, silica or other surfacing material not properly belonging to Class 1 Highways, said surfacing having a total thickness, compacted, of six (6) inches or over, and having a well drained sub-grade, shall be designated as Class 2 Highways.

Class 3 Highways: All public highways which are improved by grading or dragging the earth surface or which are surfaced with sand or sand-clay mixture, and all other roads not properly belonging under Class 1 or Class 2, shall be designated as Class 3 Highways.

Traffic Regulations.

Gross Weight: Section 1. No vehicle, the gross weight which exceeds twelve and one-half tons shall be operated upon the Class 1 Highways without a written permit from the County Judge.

Section 2. No vehicle, the gross weight of which exceeds ten tons shall be operated upon Class 2 Highways without a written permit from the County Judge.

Class 3 Highways are not included in Section 1 of the above mentioned Acts and therefore no regulations were issued for this class.

Vehicles Other Than Motor Driven: Section 3. There shall not be operated upon Class 1 or Class 2 Highways of Arkansas, any vehicle, except motor driven vehicles, the gross weight of any wheel of which exceeds that given in the schedule below.

Width of tire in inches.....	1	1½	2	2½	
Maximum wheel loads in pounds.....	400	600	800	1000	
Maximum load for 4 wheels.....	1600	2400	3200	4400	
Width of tire in inches.....	3	3½	4	4½	5
Maximum wheel loads in pounds	1400	1800	2200	2700	3200
Maximum load for 4 wheels.....	5600	7200	8800	10800	12800

Brakes: Section 4. In case a vehicle is equipped with a braking device, said brake shall be of friction type and not of a type that will cause a deadlock of the wheels when applied.

Width of Vehicle: Section 5. No motor trucks or trailers hereafter operating upon Class 1 or Class 2 Highways of this State shall have a gauge of more than 75 inches measured from center to center of tires, nor shall be more than 96 inches over all nor over 12 feet and six inches in height.

Metal Tires: Section 6. No motor trucks or trailers, hereafter operating upon Class 1 or Class 2 Highways shall be equipped with driving wheels the tires of which are of metal that may come in contact with the surface of the road or which have a partial contact of the metal with the surface of the road, except where chains or other non-skidding devices are used; provided that should any improved highway be damaged by the use of chains, or other non-skidding devices, the person, company or corporation owning such vehicle shall be liable to arrest and penalties under the Act heretofore mentioned.

Load on Trucks and Trailers: Section 7. On the rear axles three-fourths of the gross weight of a motor truck or trailer, and of its carrying capacity, must be within the limits of the schedules of respective diameter of wheel, size of tires and speed per mile as given in Section 8, provided that with the trailers having two wheels, at least three-quarters of the gross weight of the trailer and its load shall be upon the axle of the trailer.

Section 8. The front axle shall carry the remainder of the weight of a motor truck or trailer and load combined and must be within the limits given in the schedule below.

Table For Regulation of Motor Trucks.

Maximum Wheel Loads in Pounds.

Size of tire in inches	32 wheel	34 wheel	36 wheel	38 wheel	40 wheel	42 wheel	44 wheel
2	700	770	840	910	980	1050	1120
2½	900	990	1080	1170	1260	1350	1440
3	1200	1320	1440	1560	1680	1800	1920
3½	1600	1760	1920	2080	2240	2400	2560
4	1900	2090	2280	2470	2660	2850	3040
5	2200	2420	2640	2860	3080	3300	3520
6	2700	2970	3240	3510	3780	4050	4320
7	3200	3520	3840	4160	4480	4800	5120

For double tires, multiply weights by 2.

Speed: **Maximum Speed:** The following is suggested as the maximum speed for the various loads. No automobile, truck, motor, traction or other engine or steam roller or other power vehicle carrying a weight exceeding four tons, including the vehicle shall be operated upon any Class 1 or Class 2 Highway at a speed greater than 15 miles per hour, and no such vehicle carrying a weight of six tons or over, including the vehicle, shall be operated upon any such highway at a speed greater than six miles per hour when such vehicle is equipped with iron or steel tires, nor greater than ten miles per hour when equipped with tires of rubber or similar substance.

Section 9. These regulations shall not apply to farm implements or to machinery used in road construction.

Section 10. The size of tire and height of wheel shall be taken as that size printed upon the tire by the manufacturer.

Section 11. When a truck is hauling a trailer, the speed shall be regulated by the vehicle having the lowest mile per hour rating.

Other Limits of Load: Section 12. Whenever, in the opinion of the County Judge and by reason of the thawing or rains the roads are in soft condition, the maximum carrying capacity of tires of all vehicles shall be limited to one-half that of the schedule of Section 8 upon due notice being given by the said County Judge.

Section 13. The provisions of these regulations shall not apply to the moving of any vehicle for which a permit or license has been issued by the County Judge. The said permit shall state the condition thereto, shall be in writing and shall not have effect longer than 30 days after its date of issue.

Bridges: Section 14. Nothing in these regulations shall permit the hauling of excessive loads over any bridge the capacity of which is less than that given for the road upon which it is situated or of hauling over any bridge a load greater than that advertised or posted for such bridge.

Section 15. These regulations shall not apply to public highways in cities of the First or Second Class.

Changes May Be Made: Section 16. These regulations are subject to change from time to time as necessary on account of change of classification of the various highways or on account of changes in type of vehicle, or due to local conditions.

Section 17. The traffic regulations accompanying this classification are made in accordance with the Act heretofore mentioned and are subject to the adoption and modification and enforcement by the County Judge of the above county.

REVISIONS IN EXISTING LAWS AND ADDITIONAL LEGISLATION NEEDED.

During the past two years the Commission has been seriously handicapped in placing Arkansas road work, both construction and maintenance, on the proper footing, principally because of inadequate and insufficient laws. Co-operation with the Bureau of Public Roads in securing Federal Aid has been made extremely difficult for the reason that the Commission does not have ample authority over the work. After a thorough study of the existing laws and knowing the needs of the State the Commission is of the opinion that the Legislature should give serious consideration to the following suggested changes in the existing laws and the proposals for new ones.

Act 302, 1913.

This Act was passed when hardly any road building was going on in Arkansas. Since that time the duties and responsibilities of the Department have increased manifold. It is therefore suggested that it be amended as follows:

Increase the salary of the Commissioner to \$5,000.00 and the State Highway Engineer to \$6,000.00 and if a law is enacted charging the State with the maintenance of the System of State Highways to \$7,500.00;

Provide for adequate personnel to fully discharge the duties of the Department and allow for adequate salaries;

Provide that the Department may enter into contracts for road or bridge work where only State and Federal funds are involved.

Act 338, 1915.

This Act, known as the Alexander Law or General Road Improvement District Law, was passed at a time when prices were low and conditions very different from those existing now. The low limit of assessed benefits and the time required to organize an improvement district operating under this law is primarily responsible for the organization of so many of our improvement districts under Special Acts of Legislature. The Commission is of the opinion that the law can be amended to make it entirely workable and offers the following suggestions:

Change the method of organizing districts by eliminating so many petitions and so word the law that is necessary for a petition for a majority in number, valuation or acreage be circulated before any survey is made. If desirable,

provide an optional provision that the petitioners may limit the total cost of the improvement to the taxpayers.

Raise the limit of assessment of benefits to 40 per cent and provide for the still further increase on majority petition.

Provide that the County Judge shall be ex-officio member of the Commission.

Provide that any portion of the improvement on the designated system of highways must be built under the direct supervision of the State Highway Commission.

Provide that any money to be used for the construction of any part of the improvement on the State Highway System shall be placed in escrow to be paid out only on order of the State Highway Commission, approved by the Board of Commissioners.

Provide for the fixing of compensation of attorneys; probably a reasonable fee for organization with a schedule of fees for extra services.

Provide for adequate maintenance after completion by permitting the levy of an annual assessment for this purpose.

Provide for the regulation of the sale of bonds and the approval of any sale by some State agency.

Provide for the approval of all contracts by the State Highway Department before such contracts become valid and before any work can begin.

Act 222, 1919.

This Act, known as the Traffic Regulations Act, should be amended so as to fix the responsibility on the State Highway Department of enforcing the Act on the State System of Highways and a provision for an appropriation for this purpose should be made.

Act 494, 1921.

This Act, known as the Automobile License Act, has a number of defects and the Commission is of the opinion that the following changes should be made.

Provide for a fee of 25 cents per horse power and 55 cents per hundredweight on all passenger cars.

Provide a tax of \$25.00 per year on a 1-ton truck, \$35.00 on a 1½-ton, \$60.00 on a 2-ton, \$90.00 on a 2½-ton, \$125.00 on a 3-ton, \$175.00 on a 4-ton, \$300.00 on a 5-ton and \$500.00 on a 6-ton.

Provide for a tax of \$15.00 per quarter on log wagons.

Provide for a dealers license of \$100.00.

Provide for the supervision of the collection of the

license fees by the State Highway Department and give the Department authority to enforce the law.

Provide for the return of all the revenue derived under this Act to the Highway Improvement Fund for construction and maintenance purposes.

Act 606, 1921.

This Act, known as the gasoline tax law, has been found very inadequate. Many changes are desirable and the Commission recommends the following:

Provide for the collection of the tax from the wholesaler or parent company and permit a rebate to be paid to those users of gasoline other than for motor vehicle purposes.

Provide for the payment of the tax direct to the State Treasury monthly and supervision and checking of accounts by the State Comptroller, making the penalty for false reports very heavy.

Provide for an increase in the tax on gasoline to three cents per gallon.

Provide for the return of all the revenue to the Highway Improvement Fund for construction and maintenance of roads under supervision of the State Highway Department.

New Laws.

Of most importance to the whole State at this time is the question of maintenance. It can be safely said that practically all of our large investments in roads will gradually go to waste if something is not done immediately to provide ways and means for systematic maintenance. The Commission has given a great deal of study to this important feature of the work and recommends to the Legislature that careful and serious consideration be given to the passage of a satisfactory law. Our suggestions are as follows:

Provide for the designation of the selected system of roads as the State Highway System and require that this system in whole be maintained by and under the direct supervision of the State Highway Department. The system not to include that mileage through towns of 2,500 and over.

Provide for the gradual expansion of the State Highway System as conditions make necessary and advisable.

Provide that the system of maintenance employed shall be patrol and modified patrol maintenance.

Provide that the counties may assist in this work by the loan of equipment and require that the work be done

to the satisfaction of the County Judges of the respective counties.

Provide that the State shall maintain those Federal Aid projects not forming a part of the State Highway System.

Provide for the adequate marking of the State Highway System.

Provide for the adequate policing of the system and the enforcement of traffic regulations and allow the Department to employ at least seven State policemen for this purpose.

Provide for an official publication of the Department monthly in order to report at regular intervals the work going on and detailed financial statements.

Provide an appropriation ample to carry on the work of maintenance.

It is also the opinion of the Commission that some arrangement should be made for an attorney for the department and that the Legislature should consider adequate laws for grade crossing eliminations. The latter feature to worked out on some equitable scale of participation between the State, Counties and the railroad companies and provisions should be made for the elimination of our dangerous crossings on some well defined and normal program—not placing an excessive burden on either of the three participants.

FORESTRY WORK.

Located in Arkansas are two comparatively large National Forest Reserves, the Arkansas National Forest, which covers a good portion of Garland, Yell, Montgomery, Polk and Scott Counties and the Ozark National Forest, which lies principally in Pope, Newton, Franklin, Johnson, Stone and Baxter Counties. The forests cover 926,985 acres of mountain land, about 2.8 per cent of the total area of the State and have many miles of the proposed State System of Highways traversing them, affording the traveler many ideal camping sites and some of the most beautiful scenery in the United States.

The Forest Service of the United States is alive to the importance of improving the important highways traversing these areas, and is constantly working to improve as well as possible these roads. The aggregate amount appropriated for road work by the Federal Government for this work has amounted to \$391,608.51 to June 30, 1922. Many of the important roads have either been finished or are under construction or provided for. A recent report gives the following data:

Ozark Forest Road: Part of the principal highway from Russellville to Harrison, is located in the Northern part of Pope County and the Southern part of Newton County and extends for 34 miles. It is a well graded road 16 feet wide and was built at a cost of \$87,651.00, \$20,000.00 of which was paid by the State of Arkansas.

Buck Knob-Oden Road: Located in the Arkansas National Forest on the Albert Pike Highway, is now in the final stages of construction. This road is being built 16 feet wide and is ten miles long and its total cost of \$102,531.00 is being paid for by the Forest Service.

Foran Gap Road: Also located in the Arkansas Forest in the Northern part of Polk County and the Southern part of Scott County, will open up the impassable barrier between Mena and Waldron, both on the Jefferson Highway. A survey has been completed for this road which will be 11.02 miles long and very soon the work is to be placed under contract. The estimated cost is approximately \$90,000.00.

Crystal Springs-Silver Road: This project is located on the Hot Springs-Mt. Ida Road in Montgomery County and

in 2.27 miles long. It will soon be placed under contract and will cost about \$15,000.00.

Sand Gap-Witt Springs Road: In the extreme Southeast corner of Newton County and the Southwest corner of Searcy County there is now being constructed by the Forest Service, at a cost of \$28,000.00, 12 miles of mountain road which will give the little town of Witt Springs an outlet West to the Jefferson Highway. The work is being done under the direction of the Forest Supervisor and is now approximately 75 per cent complete.

Big Flat-Sylamore Road: Connecting Big Flat and Sylamore in Baxter and Stone Counties, the Forest Service has completed an excellent gravel road 15.5 miles long at a cost of approximately \$20,000.00. This road proved to be a very serviceable one to the whole of Searcy County when the Missouri & North Arkansas Railroad suspended operations in 1921.

All of the Forest roads mentioned above form parts of the State System of Highways and there are others that must be improved during the next few years. The Forest Service has always shown a desire to cooperate in our building program and is to be commended for the good work already accomplished.

APPROPRIATIONS.

The following is a true and correct statement at the close of business, June 30, 1922, of the several appropriations made by the Legislature of 1921 for the support and operation of this Department.

Table XXII.

Title of Appropriation	Amount Appropriated	Amount Expended	Balance
Salary of Commissioner, 1921-1923....	\$ 6,500.00	\$ 3,250.00	\$ 3,250.00
Salary of Secretary....	5,400.00	2,700.00	2,700.00
Salary of State Highway Engineer.....	10,000.00	5,000.00	5,000.00
Salary of two Assistant Engineers.....	12,000.00	6,000.00	6,000.00
Salary of Accountant	5,400.00	2,700.00	2,700.00
Salary of one Clerk, Highway Dept.....	3,600.00	1,800.00	1,800.00
Salary of two Clerks, Highway Dept.....	6,000.00	3,000.00	3,000.00
Salary of three Draftsmen	10,800.00	5,400.00	5,400.00
Automobile Division.			
Salary of Deputy.....	4,800.00	2,346.65	2,453.35
Salary of two Clerks..	7,200.00	3,600.00	3,600.00
Salary of Special Tag Clerks	3,600.00	1,800.00	1,800.00
Land Division.			
Salary of Deputy.....	4,800.00	2,400.00	2,400.00
Salary of three Clerks	10,800.00	5,400.00	5,400.00
Salary of one Clerk and Stenographer....	3,000.00	1,500.00	1,500.00
Maintenance Appropriation.			
	106,125.00	70,245.02	35,879.98
Binding Government Plats	2,400.00	2,340.75	59.25
Rebinding Swamp Land Records	768.50	763.00	5.50
Copying Swamp Land Records	5,000.00	3,500.00	1,500.00
Clerks and Register Fees	700.00	284.80	415.20
State Aid Appropria- tion	600,000.00	288,383.63	311,616.37
	<u>\$808,893.50</u>	<u>\$412,413.85</u>	<u>\$396,479.65</u>

The work in the Automobile Division of the Department is increasing materially from year to year because of the natural increase in number of licenses issued and the additional detailed work required by Act 494 of the 1921 Legislature which provided for a new schedule of fees on passenger cars and trucks. The Department must check each license issued and if found in error or incomplete must return the license to the person to whom issued for correction. Act 494 also provides that each dealer must file a monthly report with the Department showing the sales of new and second-hand cars during the preceding month. These reports are checked against the licenses issued in the respective counties and the Collectors are promptly furnished with a list of such cars sold, showing the name and address of the owner and the make, the motor and the serial number of the car. The provisions of the law which have required this detail have undoubtedly resulted in an increased number of paid licenses and from records existing it is believed that the increase has amounted to ten or fifteen thousand. Recommendations made in another part of this report for further change in the law will in our opinion, cause a much larger increase next year, for many of those persons now using motor vehicles without license will be forced to pay.

The fact that Collectors are required to make settlements quarterly for both the license and gasoline taxes and the fact that a part of the funds collected are turned over to the County and the balance to the State, has necessitated the employment of additional personnel to check each license and to keep proper record.

There has been compiled a great deal of data relative to automobile registrations and revenues, numbers of cars and trucks of different makes and classes licensed, fees on the several kinds of cars, revenues derived by other States and the automobile laws of the other States. This data is given in a series of tables which follow.

Table XXIII.
Automobile Applications Issued 1913 to October 1, 1922, State of Arkansas.

Counties	1913	1914	1915	1916	1917	1918	1919	1920	1921	Oct. 1, 1922	Total
Arkansas	94	176	285	441	700	1137	1152	1253	1251	1895	8384
Ashley	18	50	105	228	331	574	497	565	660	762	3790
Baxter			4	10	37	47	52	57	144	205	556
Benton	51	192	307	445	702	1011	1540	2683	3031	3332	13194
Boone	3	25	62	111	176	266	346	501	641	710	2844
Bradley	17	29	41	120	216	305	391	420	485	636	2660
Calhoun	3	16	41	68	135	237	282	295	296	414	1777
Carroll	5	31	42	75	138	205	291	457	685	859	2788
Chicot	15	59	80	159	257	438	578	641	661	806	3694
Clark	28	70	88	173	361	581	701	789	739	885	4435
Clay	25	57	104	183	279	458	538	659	920	920	3962
Cleburne	2	9	15	42	89	113	139	177	236	265	1087
Cleveland	6	12	18	55	132	225	246	259	276	326	1555
Columbia	10	31	51	152	378	618	687	711	672	914	4224
Conway	20	80	113	184	308	486	561	707	598	720	3777
Craighead	19	133	159	272	576	885	1017	1233	1290	1712	7335
Crawford	9	57	79	184	335	537	681	821	887	1152	4760
Crittenden	11	23	39	170	389	525	554	634	710	1060	4115
Cross	11	23	49	155	262	377	401	367	456	554	2855
Dallas	16	46	74	145	255	359	399	321	552	582	2949
Desha	16	17	81	155	268	382	434	440	600	708	3131
Drew	19	66	76	154	274	446	533	607	666	783	3624
Faulkner	8	47	74	206	456	669	832	943	902	1122	5259
Franklin	10	48	88	172	324	513	569	719	924	1010	4377
Fulton	7	20	26	44	56	84	118	160	130	222	867
Grant	1	2	3	47	112	184	214	290	413	446	1712
Garland	71	206	291	432	641	987	987	1445	2018	2482	9360
Greene	40	76	111	209	387	543	677	664	684	903	4294
Hempstead	51	92	100	217	468	686	828	880	836	957	5115

Table XXIII. (Continued)
Automobile Applications Issued 1913 to October 1, 1922, State of Arkansas.

Counties	1913	1914	1915	1916	1917	1918	1919	1920	1921	Oct. 1, 1922	Total
Hot Spring	9	34	60	101	174	301	365	442	492	636	2614
Howard	7	18	22	77	196	400	497	526	525	554	2822
Independence	7	33	49	121	307	434	534	627	695	774	3581
Izard	.....	.....	.....	.....	6	22	34	60	83	128	333
Jackson	11	45	56	138	394	689	823	954	893	1057	5060
Jefferson	106	309	443	789	1393	1761	2125	2635	3055	3434	16050
Johnson	9	21	39	115	322	530	639	701	639	594	3609
Lafayette	22	85	117	162	227	329	381	463	541	631	2958
Lawrence	3	24	43	129	316	417	465	610	677	833	3517
Lee	18	51	70	223	458	579	659	666	599	726	4049
Lincoln	7	19	35	80	230	306	270	350	350	445	2092
Little River	9	31	38	64	171	291	389	435	471	401	2300
Logan	11	32	69	186	392	713	840	1007	1127	1220	5597
Lonoke	51	139	203	368	726	1074	1229	1368	1345	1589	8092
Madison	.....	2	5	9	20	47	85	131	186	262	747
Marion	.....	.....	2	11	35	58	57	57	58	100	378
Miller	27	106	156	244	412	667	864	999	1118	1203	5796
Mississippi	76	138	187	427	925	1157	1181	1571	1398	1823	8883
Monroe	19	41	54	125	324	505	486	496	508	577	3135
Montgomery	2	6	8	20	36	101	144	186	214	247	964
Nevada	13	27	39	79	215	418	515	555	565	534	2960
Newton	.....	.....	.....	.....	3	29	12	27	54	81	206
Ouachita	37	64	84	179	322	480	631	773	862	1070	4502
Perry	1	.....	2	33	113	143	164	193	156	181	986
Phillips	46	189	218	470	884	1070	1324	1490	1462	1882	9035
Pike	3	9	22	55	105	172	211	238	266	334	1415
Poinsett	14	35	53	139	257	386	443	395	519	816	3059
Polk	10	40	40	53	149	250	314	438	547	576	2417
Pope	20	62	102	204	351	610	784	858	1037	1250	5278

Table XXIII. (Continued)
 Automobile Applications Issued 1913 to October 1, 1922, State of Arkansas.

Counties	1913	1914	1915	1916	1917	1918	1919	1920	1921	Oct. 1, 1922	Total
Prairie	23	57	82	141	272	445	516	606	704	860	3706
Pulaski	396	1311	1706	2429	4098	5856	7447	9266	11062	12099	55670
Randolph	3	18	23	68	170	199	222	269	328	442	1742
Saline	19	44	71	152	288	349	423	566	696	827	3435
Scott	3	22	36	65	136	263	287	313	331	348	1804
Searcy	.....	.....	.....	15	34	52	49	87	109	145	491
Sebastian	127	435	587	1013	1696	2420	3031	3795	4790	5624	23518
Sevier	20	40	51	102	256	423	611	689	676	677	3545
Sharp	.....	.....	.....	13	37	64	74	112	116	184	604
St. Francis	21	51	95	297	487	507	685	757	822	879	4601
Stone	.....	.....	.....	1	15	22	74	74	110	109	405
Union	15	40	72	191	339	469	524	640	1319	2583	6192
Van Buren	.....	.....	.....	58	111	140	158	213	184	194	1087
Washington	35	132	206	364	631	935	1215	1607	1968	2474	9567
White	36	59	120	192	440	782	925	1007	1182	1567	6310
Woodruff	20	54	53	155	329	588	654	804	630	758	4045
Yell	18	35	46	143	386	599	589	683	625	838	3962
Totals	1892	5594	7980	15008	28248	41730	50194	60537	68308	82108	361599
Estimated Applications October 1 to December 31, 1922	.....	.....	.....	.....	.....	.....	.....	.....	.....	2000	2000
	.....	.....	.....	.....	.....	.....	.....	.....	.....	84108	363599



Fine gravel roads are to be found in many parts of Arkansas. The road shown above, Federal Aid Project No. 98, Road Improvement District No. 12, Woodruff County, is typical of the many miles of roads of this character built during the past several years.

AUTOMOBILE DIVISION

Table XXV (Continued)
 Number and Make of Passenger Cars Licensed in
 Arkansas, 1922.

Make	No.	Make	No.
Maibohm	2	Standard Steel.....	2
Marion	2	Stearns Knight.....	48
Maxwell	1547	Stephens	265
McFarlane	1	Steven	14
Mercer	4	Stoddard Dayton.....	1
Melior	3	Studebaker	1885
Metz	30	Stutz	27
Mitchell	130	Sun	1
Moline King Bee.....	2	Templer	1
Monroe	34	Texan	11
Moon	119	Toyland	1
Marmon	66	Tulsa	16
Nash	566	Velie	189
National	19	Waverly	2
Oakland	612	Wescott	21
Oldsmobile	630	White	8
Olympia	3	Willis St. Claire.....	3
Overland	3516	Winton	20
Packard	110	Willys Knight	313
Paige	493	Yellow Cab	7
Pan American.....	8	Electric.	
Path Finder.....	6	Detroit	26
Patterson	7	Maibohm	15
Peerless	35	Ohio	6
Piedmont	29	Rauch Lange	13
Pierce Arrow	3	Wood	8
Pilot	2	Steamers.	
Pratt	1	Stanley	4
Premier	25	Motorcycle.	
Pullman	12	Excelsior	24
Ranger	1	Harley Davidson	160
Regal	24	Henderson	8
Roamer	19	Indian	36
R. C. H.	1	Metz	1
Reo	402	Pope	3
Saxon	200	Reading Standard.....	2
Sayers Scovall.....	5	Sears	1
Scripps Booth	2	Thor	1
Seneca	3	Wagoner	2
Shaw Cab	6		

Table XXVI.
Kind, Number and Sizes of Trucks Licensed in
Arkansas in 1922.

Make	Tons						
	1	1½	2	2½	3	3½	5
Accason	2	---	2	1	..	..	..
Acme	2	---	13	---	..	..	..
Alco	---	---	---	---	1	..	..
All American.....	2	---	---	---	..	..	..
Allen	1	---	---	---	..	..	..
Apex	---	---	1	---	..	..	..
Apperson	---	1	---	---	..	..	..
Armleder	---	---	---	7	..	5	..
Atteberry	---	---	1	---	..	..	..
Auto Car	---	1	---	---	..	..	..
Bethlehem	6	7	4	4	..	..	..
Buick	14	---	---	---	..	..	..
Bush	1	---	---	---	..	..	..
Business	1	---	---	---	..	..	..
Cadillac	5	8	---	---	..	..	..
Carles	1	---	---	---	..	..	..
Case	1	---	---	---	..	..	..
Chalmers	2	---	---	---	..	..	..
Chandler	1	---	---	---	..	..	..
Chevrolet	64	---	---	---	..	..	..
Climber	4	---	4	---	..	..	..
Clydesdale	2	4	3	---	..	..	..
Cole	---	2	---	---	..	..	..
Collier	1	---	---	---	..	..	..
Commercial	11	1	---	---	..	..	..
Crow Elkhart.....	1	---	---	---	..	..	..
Cunningham	1	---	---	---	..	..	..
Davis	---	---	2	---	..	..	..
Day Elder	3	14	2	3	..	..	..
Dearborn	1	---	2	---	..	..	..
Defiance	---	3	---	---	..	..	..
De Kalb	---	2	---	---	..	..	..
Denby	---	---	1	---	..	..	..
Diamond T.....	1	5	11	---	..	4	..
Dodge	322	14	---	---	..	..	..
Dort	3	1	2	---	..	..	..
Duplex	---	3	---	1	3	..	..
Electric Vehicle....	2	---	---	---	..	..	..
E. M. F.....	1	---	---	---	..	..	..

Table XXVI (Continued)
 Kind, Number and Sizes of Trucks Licensed in
 Arkansas in 1922.

Make	Tons						
	1	1½	2	2½	3	3½	5
Packard	2	7	13	2	3	1	..
Paige	1	..	2	5	..	2	..
Parrot .....	..	..	..	1	..	..	..
Peerless .....	..	..	..	..	7	..	..
Pierce Arrow.....	..	..	7	..	..	..	5
Ranger .....	..	..	1	..	..	..	..
Reo	86	6	3	..	..	..	..
Republic	184	75	61	21	..	1	..
Rockfall .....	..	3	..	..	..	..	..
Sampson	2	..	..	..	..	..	..
Sandon .....	..	..	..	..	1	..	..
Sanford	1	..	..	..	..	1	..
Sayers Scoville ..	..	..	1	..	..	..	..
Seldon	1	..	3	..	..	..	..
Service	6	2	14	4	2	1	..
Standard .....	..	..	1	1	..	..	..
State	1	..	..	..	..	..	..
Stephens	1	..	..	..	..	..	..
Sterling .....	..	..	4	..	..	..	..
Stewart	5	..	1	..	..	..	..
Studebaker	26	..	..	..	..	..	..
Texan .....	..	1	..	..	..	..	..
Traffic	4	5	41	..	..	..	..
U. S.	3	7	4	5	3	..	..
Velie .....	..	2	..	..	..	..	..
Vim	11	..	..	..	..	..	..
White	43	23	86	..	4	3	3
Wichitaw	2	2	13	1	..	1	..
Williams Car- riage .....	..	2	..	..	..	..	..
Willys Knight.....	1	..	..	..	..	..	..
Wilson	3	..	..	..	..	..	..
Winton .....	..	1	..	..	..	..	..
Witson	1	..	..	..	..	..	..
Trailers	54	..	..	..	..	..	..
Semi Trailers.....	28	..	..	..	..	..	..

Table XXVII.
Motor Vehicle Registrations and Revenues, Jan. 1 to July 1, 1922. All States of Union.

STATE.	Motor Cars.		PASSENGER CARS.		Motor Trucks and Private.	Trailers	Motor-cycles.	Total Gross Registration Fees.	Total Gross Gasoline Tax.
	Total.	Private.	Total.	Taxes and Fees (6)					
Alabama	87,129	77,509	74,962	2,547	9,620		598	\$ 1,215,414.33	\$
Arizona	83,121	33,121	32,996	125	(1)		185	292,544.00	70,487.53
Arkansas (4)	74,947	67,900	67,900		7,047		192	900,000.00	175,000.00
California	723,439	689,163	689,163		34,276	3,701	13,713	7,523,675.41	
Colorado	141,756	132,847	132,847		8,909	54	2,118	898,929.66	300,707.14
Connecticut	129,900	107,687	105,560	2,127	22,213	69	2,144	3,155,631.34	348,473.54
Delaware	21,800	21,800	21,800		(1)	66	338	384,727.00	
Dist. of Col.	64,992	58,976	57,568	1,408	6,016		1,859	345,504.25	
Florida	102,789	87,040	84,901	2,139	15,749	390	946	1,440,494.93	(2) 191,191.81
Georgia	126,500	112,500	112,500		14,000		877	1,704,515.49	340,684.02
Idaho	47,094	47,094	47,094		(1)		691	675,201.57	
Illinois	676,748	591,437	591,537		85,311		6,963	7,193,861.31	
Indiana	425,000	380,000	380,000		45,000	1,985	5,152	2,731,403.00	
Iowa	460,069	431,798	431,798		28,271	96	3,089	7,315,221.94	
Kansas	238,742	269,065	269,065		19,877		1,714	3,449,151.00	
Kentucky	129,100	114,307	114,307		14,793		841	2,107,692.65	447,549.97
Louisiana	83,624	70,940	70,940		12,684		395	1,609,850.79	220,000.00
Maine	80,656	69,467	67,741	1,726	11,189	361	1,031	1,213,825.93	
Maryland (4)	130,631	120,776	120,776		9,855		3,752	2,339,009.00	
Massachusetts	337,336	292,850	282,850		54,486	435	8,708	4,588,038.55	
Michigan	493,247	442,055	442,055		51,192	3,823	4,199	7,011,620.87	
Minnesota	335,750	300,750	300,750		35,000	750	2,500	6,059,330.08	
Mississippi (4)	63,420	58,420	58,420		5,000		135	800,000.00	65,000.00
Missouri	346,623	310,822	310,822		35,801	378	2,370	3,175,216.35	
Montana	52,550	47,000	47,000		5,550		246	539,820.00	121,790.28
Nebraska	216,902	198,717	198,717		18,185	294	1,101	2,672,758.64	
Nevada	10,638	10,638	10,638		(1)		80	108,944.54	

New Hampshire.....	42,608	42,608	42,608	(1)	200	1,468	823,165.48	
New Jersey.....	287,859	224,212	216,418	63,647	724	7,364	5,449,955.35	
New Mexico.....	20,702	20,702	20,702	(1)		112	203,243.36	68,621.61
New York.....	866,094	704,517	674,199	161,577	2,705	21,382	10,350,091.57	
North Carolina.....	162,942	147,488	147,488	15,454		1,275	2,200,000.00	400,000.00
North Dakota.....	88,719	86,354	86,354	2,365		584	613,990.60	
Ohio.....	760,000	650,000	650,000	110,000	4,000	17,000	6,342,628.26	
Oklahoma.....	179,000	179,000	179,000	(1)		504	2,196,342.25	
Oregon.....	108,779	96,372	95,884	12,407	222	2,424	2,973,378.84	470,287.22
Pennsylvania.....	716,644	660,262	650,262	56,382	869	15,704	11,046,479.55	1,597,200.89
Rhode Island.....	51,377	41,439	41,096	9,878	7	924	923,220.00	
South Carolina.....	83,809	77,505	77,505	6,304	39	497	690,962.66	
South Dakota.....	111,447	103,731	103,731	7,716		481	760,000.00	
Tennessee.....	118,211	103,733	103,733	14,478		732	1,435,660.98	
Texas.....	449,246	449,246	449,246	(1)		2,821	3,906,230.00	
Utah.....	40,700	34,800	34,800	5,900	65	565	646,815.25	
Vermont.....	37,454	35,276	35,276	2,176		669	680,741.22	
Virginia.....	150,000	130,000	130,000	20,000	123	1,450	2,196,579.20	
Washington.....	183,997	156,575	154,340	27,422	665	2,934	2,980,617.00	405,950.21
West Virginia.....	90,250	86,200	81,600	4,050	64	950	1,656,435.14	
Wisconsin.....	359,230	334,905	334,905	24,325		4,877	3,834,499.00	
Wyoming.....	26,900	24,200	24,200	2,700	10	230	290,596.75	
Totals.....	10,620,471	9,523,864	9,467,874	1,096,605	22,095	149,924	\$134,165,505.97	\$ 5,510,845.79

(1) Included with Passenger Cars.

(2) Collected January 1 to April 7, 1922, when tax was declared void. (3) Law became effective June 1, 1922.

(4) Data Approximate for State.

(5) Where blanks occur these vehicles are included with passenger cars.

Table XXVIII.
License Fees Required For Automobiles.

Year Model	Passenger Capacity	Allen.	Gross Weight	Horse Power	Fee
1913	5	Touring	3615	22.5	\$15.00
1914	5	Touring	3750	27.5	16.00
1914	7	Touring	4150	27.5	17.00
1914-15	2	Roadster	2975	22.5	13.00
1914-15	5	Touring	3125	22.5	11.00
1915-6-7	5	Touring	3635	22.5	15.00
1917-18	5	Touring	3635	22.5	15.00
1919-20-21	5	Touring	3115	19.6	13.00
1921	3	Roadster	3115	19.6	13.00
1921	5	Coupe	4350	19.6	16.00
1921	5	Sedan	4450	19.6	16.00
		Ambassador.			
	2	Roadster	4500	31.5	19.00
	4	Sport	5100	31.5	21.00
	7	Touring	5550	31.5	22.00
	7	Sedan	6150	31.5	23.00
		American.			
	4	Touring	3835	29.00	17.00
	6	Touring	4245	29.00	18.00
		Anderson.			
D	2	Roadster	3220	25.35	11.00
G	4	Sport (Tour.)	3500	25.35	15.00
C	5	Touring	3670	25.35	16.00
X	7	Touring	4010	25.35	16.00
B	4	Coupe	3900	25.35	16.00
E	5	Sedan	4150	25.35	17.00
		Apperson.			
	4	Tourster	4350	37.8	20.00
	4	Sporster	4155	37.8	20.00
	7	Touring	4660	37.8	21.00
	4	Sedancette	4525	37.8	21.00
	7	Touring	4860	37.8	22.00
	7	Sedan	4975	37.8	22.00
		Auburn.			
	2	Roadster	3185	25.35	11.00
	4	Coupe	3795	25.35	16.00
	5	Touring	3700	25.35	16.00
	5	Sedan	4000	25.35	16.00
	7	Sedan	4300	25.35	17.00

Table XXVIII (Continued)
License Fees Required For Automobiles.

Year Model	Passenger Capacity	Body	Gross Weight	Horse Power	Fee
30	5	Touring	2830	15.6	11.00
41	3	Roadster	2850	19.6	12.00
41	5	Touring	3150	19.6	13.00
66	3	Roadster	3100	25.35	14.00
66	5	Touring	3400	25.35	15.00
66	5	Sedan	3700	25.35	16.00
Bour-Davis.					
1916	5	Touring	3650	25.40	15.00
1917-18	5	Touring	3850	29.40	17.00
1919	5	Touring	3650	25.40	15.00
1920-21	5	Touring	3950	29.40	17.00
1920-21	7	Touring	4250	29.40	18.00
Brewster.					
	4	Coupe	4100	25.6	17.00
	6	Touring	4900	25.6	19.00
	6	Sedan	4900	25.6	19.00
Briscoe.					
	2	Roadster	2300	18.23	10.00
	5	Touring	2750	18.23	11.00
	5	Sedan	3000	18.23	12.00
Buick 6 Cylinder.					
C54 1915	2	Roadster	3700	33.7	18.00
C55 1915	7	Touring	4730	33.7	20.00
D41 1916-7	2	Roadster	2750	25.3	13.00
D45 1916-7	5	Touring	3450	25.3	15.00
D46 1916-7	3	Coupe	3225	25.3	14.00
D47 1916-7	7	Sedan	4050	25.3	16.00
D51 1916-7	2	Roadster	3700	33.7	18.00
E49 1917-8	7	Touring	4120	27.3	17.00
E44 1917-8	3	Coupe	3180	27.3	15.00
E50 1917-8	7	Sedan	4690	27.3	19.00
E45 1917-8	5	Touring	3625	27.3	16.00
E46 1917-8	4	Coupe	3660	27.3	16.00
E47 1917-8	5	Sedan	3965	27.3	17.00
1919-20-21	3	Roadster	3265	27.3	15.00
	5	Touring	3700	27.3	16.00
K46	4	Coupe	3700	27.3	16.00
	5	Sedan	4045	27.3	17.00
	7	Touring	4225	27.3	17.00
	7	Sedan	4785	27.3	19.00
K48 1921	4	Coupe	4000	27.3	17.00
K50	7	Touring	4325	27.3	18.00

Table XXVIII (Continued)
License Fees Required For Automobiles.

Year Model	Passenger Capacity		Gross Weight	Horse Power	Fee
Buick 4 Cylinder.					
1915					
C24	2	Roadster	2500	22.5	12.00
C25	5	Touring	3085	22.5	13.00
C36	2	Roadster	3100	22.5	13.00
C37	5	Touring	3730	22.5	15.00
1917-8					
D34	2	Roadster	2225	18.2	10.00
D35	5	Touring	2800	18.2	12.00
E37	5	Sedan	3100	18.2	12.00
1922	2	Roadster	2610	18.23	11.00
	3	Coupe	3010	18.23	12.00
	5	Touring	3130	18.23	12.00
	5	Sedan	3530	18.23	13.00
Bush.					
	2	Roadster	2820	19.6	12.00
	5	Touring	3170	19.6	13.00
Cadillac 4 and 8 Cylinders.					
	2	Roadster	4165	31.25	18.00
	4	Victoria	4650	31.25	19.00
	4	Phaeton	4525	31.25	19.00
	5	Sedan	5040	31.25	20.00
	7	Touring	5085	31.25	21.00
	7	Limousine	5345	31.25	21.00
Case 6 Cylinder.					
	7	Touring	4590	29.4	19.00
	4	Sport	4010	29.4	17.00
	4	Coupe	4250	29.4	18.00
	7	Sedan	4850	29.4	19.00
Case 4 Cylinder.					
1915	5	Touring	3650	24.03	15.00
1916-7	7	Touring	4350	21.03	16.00
Chalmers.					
	2	Roadster	3020	25.35	14.00
	5	Touring	3640	25.35	15.00
	4	Sport	3500	25.35	15.00
	5	Sedan	3955	25.35	16.00
	4	Coupe	3675	25.35	16.00
	7	Touring	4085	25.35	17.00

Table XXVIII (Continued)
License Fees Required For Automobiles.

Year Model	Passenger Capacity	Chandler.	Gross Weight	Horse Power	Fee
	2	Roadster	3051	29.4	15.00
	4	Roadster	3467	29.4	16.00
	4	Dispatch	3474	29.4	16.00
	7	Touring	4035	29.4	17.00
	4	Coupe	3726	29.4	17.00
	7	Sedan	4412	29.4	18.00
	7	Limousine	4490	29.4	19.00
Chevrolet Model "F. B."					
	2	Roadster	2940	21.75	13.00
	2	Coupe	3118	21.75	13.00
	5	Touring	3495	21.75	14.00
	5	Sedan	3697	21.75	15.00
Chevrolet Model 490.					
	2	Roadster	2120	21.75	11.00
	2	Coupe	2340	21.75	11.00
	5	Touring	2650	21.75	12.00
	5	Sedan	2910	21.75	13.00
Cleveland.					
	2	Roadster	2755	21.6	12.00
	3	Coupe	3153	21.6	13.00
	5	Touring	3298	21.5	14.00
	5	Sedan	3629	21.6	14.00
Climber 6 Cylinder.					
	3	Roadster	3500	25.00	15.00
	5	Touring	3950	25.00	16.00
Climber 4 Cylinder.					
	2	Roadster	2750	19.00	12.00
	5	Touring	3350	19.00	13.00
Cole.					
	2	Roadster	3620	39.2	19.00
	4	Sportster	4040	39.2	20.00
	3	Sport Coupe	4130	39.2	20.00
	4	Sport Sedan	4490	39.2	21.00
	7	Tourster	4640	39.2	21.00
	5-6	Sportosine	4900	39.2	22.00
	7	Tourosine	5180	39.2	23.00
	7	Toursedan	5140	39.2	23.00

Table XXVIII (Continued)
 License Fees Required For Automobiles.

Year Model	Passenger Capacity		Gross Weight	Horse Power	Fee
		Columbia.			
	2	Roadster	3100	25.35	11.00
	3	Touring	3550	25.35	15.00
	4	Sport	3380	25.35	15.00
	4	Coupe	3700	25.35	16.00
	5	Sedan	3850	25.35	16.00
		Commonwealth.			
	2	Roadster	2600	19.6	11.00
	4	Chummy Roadster	2900	19.6	12.00
	5	Touring	3420	19.6	13.00
	5	Sport	3400	19.6	13.00
	5	Sedan	3830	19.6	14.00
	6	Touring	3500	22.5	14.00
		Crow-Elkhart 6 Cylinder.			
S	2	Roadster	2770	25.35	13.00
	4	Sport	3070	25.35	14.00
	5	Touring	3720	25.35	16.00
	7	Sedan	3750	25.35	16.00
		Crow-Elkhart 4 Cylinder.			
L	2	Roadster	2570	19.6	11.00
	4	Sport	2870	19.6	12.00
	5	Touring	3020	19.6	12.00
		Cunningham.			
	4	Touring	5000	45.00	24.00
	4	Limousine	5600	45.00	25.00
	6	Touring	5400	45.00	25.00
	7	Touring	5550	45.00	25.00
	4	Hearses and Am- bulances	5800	45.00	26.00
	6	Limousine	6100	45.00	27.00
	7	Limousine	6150	45.00	27.00
		Curtis.			
	5	Touring	3100	19.00	13.00
		Daniels.			
C-D	2	Speedster	4175	39.2	20.00
	3	Roadster	4550	39.2	21.00
	4	Coupe	4825	39.2	22.00
	4	Sedan	5010	39.2	22.00
	4	Touring	4785	39.2	22.00
	6	Touring	5250	39.2	23.00
	7	Touring	5250	39.2	23.00

Table XXVIII (Continued)
License Fees Required For Automobiles.

Year Model	Passenger Capacity	Daniels—Cont'd.	Gross Weight	Horse Power	Fee
A-B	7	Sedan	5550	39.2	24.00
	7	Limousine	5685	39.2	24.00
	2	Speedster	3900	33.8	18.00
	3	Roadster	4175	33.8	19.00
	4	Coupe	4550	33.8	20.00
	4	Touring	4200	33.8	19.00
	4	Sedan	4600	33.8	20.00
	7	Sedan	5250	33.8	22.00
	6	Touring	4800	33.8	20.00
	7	Touring	4950	33.8	21.00
7	Limousine	5150	33.8	21.00	
Davis.					
1919	2	Roadster	3200	25.35	14.00
	4	Sport	3500	25.35	15.00
	3	Coupe	3850	25.35	16.00
	5	Sedan	4150	25.35	17.00
	4	Sport	3750	29.4	17.00
	7	Sedan	4350	25.35	17.00
	7	Touring	4250	29.4	18.00
Detroit.					
1915-16-17	2	Roadster	2600	20.00	12.00
	5	Touring	3050	20.00	13.00
6-48	2	Roadster	4100	29.00	18.00
	5	Touring	4250	29.00	18.00
Dixie-Flyer.					
	2	Roadster or Speedster	2775	19.6	12.00
	5	Touring	3325	19.6	13.00
	2	Coupe	3129	19.6	13.00
	5	Sedan	3620	19.6	14.00
Dodge.					
	2	Roadster	2590	24.03	12.00
	3	Coupe	2970	24.03	13.00
	5	Touring	3240	24.03	14.00
	5	Sedan	3795	24.03	15.00
Dorris.					
	4	Tourist	4594	38.4	21.00
	4	Coupe	4793	38.4	22.00
	7	Sedan	5360	38.4	23.00
	7	Touring	5165	38.4	23.00

Table XXVIII (Continued)
License Fees Required For Automobiles.

Year Model	Passenger Capacity	Dort.	Gross Weight	Horse Power	Fee
	2	Roadster	2620	19.6	11.00
	3	Coupe	3005	19.6	12.00
	5	Touring	3170	19.6	13.00
	5	Sedan	3565	19.6	14.00
		Dupont.			
	2	Roadster	3300	24.8	14.00
	1	Touring	3800	24.8	16.00
	4	Sedan	4100	24.8	16.00
		Elcar 6 Cylinder.			
	3	Roadster	3260	25.35	14.00
	4	Sportster	3510	25.35	15.00
	3	Coupe	3595	25.35	15.00
	5	Touring	3610	25.35	15.00
	5	Sedan	3925	25.35	16.00
		Elcar 4 Cylinder.			
	3	Roadster	3150	19.6	13.00
	4	Sportster	3340	19.6	13.00
	5	Touring	3540	19.6	14.00
		Elgin.			
	5	Touring	3300	23.44	14.00
	4	Scout	3210	23.44	14.00
	4	Coupe	3440	23.44	14.00
	5	Sedan	3725	23.44	15.00
		Emerson.			
	5	Touring	3298	22.00	14.00
		Empire.			
51	2	Speedster	3070	24.6	14.00
52	5	Touring	3650	24.6	15.00
73	4	Roadster	3480	26.4	15.00
70A	5	Touring	3750	26.4	16.00
70A	7	Touring	4050	26.4	17.00
		Enger 12 Cylinder.			
	3	Roadster	3250	34.6	17.00
	3	Coupe	3250	34.6	17.00
	5	Touring	3550	34.6	18.00
	5	Sedan	3550	34.6	18.00
	7	Touring	3850	34.6	18.00
		Enger 6 Cylinder.			
	3	Roadster	3250	29.4	15.00
	3	Coupe	3250	29.4	15.00
	5	Touring	3550	29.4	16.00

Table XXVIII (Continued)
License Fees Required For Automobiles.

Year Model	Passenger Capacity		Gross Weight	Horse Power	Fee
		Enger 4 Cylinder.			
	2	Roadster	2800	28.9	14.00
	5	Touring	3250	28.9	15.00
		Essex.			
	2	Roadster	2845	18.2	12.00
	2	Cabriolet	2975	18.2	12.00
	5	Phaeton	3310	18.2	13.00
	5	Sedan	3650	18.2	14.00
		Ford.			
	2	Roadster	1765	20.00	10.00
	2	Coupe	1985	20.00	10.00
	5	Touring	2325	20.00	11.00
	5	Sedan	2625	20.00	12.00
		Franklin.			
	2	Runabout	2605	25.35	13.00
	4	Roadster	3035	25.35	14.00
	4	Brougham	3305	25.35	15.00
	5	Touring	3180	25.35	14.00
	5	Sedan	3505	25.35	15.00
		Gardner.			
	3	Roadster	2770	19.6	12.00
	3	Coupe	2975	19.6	12.00
	5	Touring	3120	19.6	13.00
	5	Sedan	3485	19.6	14.00
		Grant 6 Cylinder.			
	2	Roadster	2925	23.44	13.00
	4	Coupe	3500	23.44	15.00
	5	Touring	3475	23.44	15.00
	5	Sedan	3750	23.44	15.00
		Grant 4 Cylinder.			
1914	2	Roadster	1500	12.10	10.00
		Gray.			
	2	Roadster	1800	20.25	10.00
	2	Coupe	2150	20.25	10.00
	5	Touring	2350	20.25	11.00
	5	Sedan	2850	20.25	12.00
		Hackett.			
	2	Roadster	2360	22.5	12.00
	5	Touring	3110	22.5	13.00

Table XXVIII (Continued)
License Fees Required For Automobiles.

Year Model	Passenger Capacity	Halliday.	Gross Weight	Horse Power	Fee
	5	Touring	3550	24.00	15.00
		Hanson.			
	2	Roadster	3050	25.35	14.00
	4	Sport	3375	25.35	15.00
	5	Touring	3550	25.35	15.00
	5	Sedan	4250	25.35	17.00
		Harroun.			
	5	Touring	2900	25.35	14.00
		Haynes 12 Cylinder.			
	2	Speedster	4050	36.00	19.00
	7	Touring	4850	36.00	21.00
	4	Brougham	4750	36.00	21.00
	4	Tourister	4350	36.00	20.00
	7	Surburban	5400	36.00	23.00
		Haynes 6 Cylinder.			
	2	Speedster	3850	29.4	17.00
	4	Tourister	4150	29.4	18.00
	4	Brougham	4400	29.4	18.00
	7	Surburban	5150	29.4	20.00
		H. C. S.			
	2	Roadster	3470	21.03	14.00
	2	Coupe	3700	21.03	15.00
	4	Touring	3905	21.03	15.00
		Holmes.			
	4	Roadster	3475	29.4	16.00
	4	Coupe	3700	29.4	17.00
	7	Touring	3950	29.4	17.00
	7	Artcraft	4150	29.4	18.00
	6	Sedan	4150	29.4	18.00
		Howard.			
	7	Touring	5350	25.35	20.00
		Hudson.			
	4	Phaeton	4005	29.4	17.00
	3	Cabriolet	4000	29.4	17.00
	4	Coupe	4220	29.4	18.00
	5	Limousine			
		Touring	4590	29.4	19.00
	7	Phaeton	4625	29.4	19.00
	7	Sedan	4865	29.4	20.00
	7	Limousine	4910	29.4	20.00

Table XXVIII (Continued)
License Fees Required For Automobiles.

Year Model	Passenger Capacity	Huffman.	Gross Weight	Horse Power	Fee
KR	3	Roadster	3430	27.35	15.00
KT	5	Touring	3730	27.35	16.00
Hupmobile.					
N	2	Roadster	3135	22.5	13.00
	5	Touring	3625	22.5	15.00
	5	Sedan	3850	22.5	15.00
R	7	Touring	4300	22.5	16.00
	2	Roadster	2675	16.9	11.00
	5	Touring	3225	16.9	12.00
	4	Coupe	3350	16.9	13.00
K	5	Sedan	3750	16.9	14.00
	2	Roadster	3030	18.2	12.00
	5	Touring	3800	18.2	14.00
Interstate.					
	2	Roadster	2780	19.6	12.00
	4	Clummy Roadster	3150	19.6	13.00
	5	Touring	3400	19.6	13.00
	5	Sedan	3650	19.6	14.00
Jackson.					
	5	Touring	3750	25.35	16.00
	5	Semi-Sport	3950	25.35	16.00
	4	Sport	3900	25.35	16.00
	5	California Special	4070	25.35	17.00
	4	Coupe	4145	25.35	17.00
	5	Sedan	4275	25.35	17.00
Jeffrey.					
	2	Roadster	3220	25.35	14.00
	4	Coupe	3800	25.35	16.00
	5	Touring	3670	25.35	16.00
	7	Sedan	4350	25.35	17.00
	7	Touring	4120	25.35	17.00
Jordan.					
	2	Play Boy	3000	25.35	14.00
	5	Touring	3550	25.35	15.00
	5	Brougham	3825	25.35	16.00
	4	Sport	3800	29.40	17.00
	7	Touring	4200	29.4	18.00
	5	Sedan	4580	25.35	18.00
	7	Limousine	4500	29.4	19.00

Table XXVIII (Continued)
License Fees Required For Automobiles.

Year Model	Passenger Capacity	King.	Gross Weight	Horse Power	Fee
2		Roadster	3535	28.8	16.00
4		Some	4000	28.8	17.00
3		Coupe	3950	28.8	17.00
5		Touring	4140	28.8	18.00
7		Touring	4440	28.8	18.00
5		Limoudan	4650	28.8	19.00
5		Sedan	4650	28.8	19.00
Kissell.					
2		Speedster	3945	26.33	16.00
4		Tourster	4245	26.33	17.00
7		Touring	4470	26.33	18.00
4		Coupe	4410	26.33	18.00
4		Sedan	4610	26.33	18.00
5		Sedan	4675	26.33	18.00
6		Sedan	4910	26.33	19.00
Kline.					
5		Touring	3600	25.35	15.00
5		Sedan	3600	25.35	15.00
7		Touring	3900	25.35	16.00
7		Sedan	3900	25.35	16.00
Krit.					
2		Roadster	2600	22.4	12.00
5		Touring	3050	22.4	13.00
Lafayette.					
2		Roadster	4100	33.8	19.00
4		Torpedo	4505	33.8	20.00
4		Coupe	4810	33.8	20.00
7		Touring	5060	33.8	21.00
7		Sedan	5346	33.8	22.00
7		Limousine	5425	33.8	22.00
Lexington.					
5		Touring	3650	25.35	15.00
5		Sedan	3850	25.35	16.00
4		Coupe	3700	25.35	16.00
4		Sedanette	4050	25.35	16.00
7		Touring	4300	25.35	17.00
7		Sedan	4500	25.35	18.00
Liberty.					
2		Roadster	2900	23.44	13.00
5		Touring	3500	23.44	15.00
4		Coupe	3600	23.44	15.00
5		Sedan	3910	23.44	16.00

Table XXVIII (Continued)
License Fees Required For Automobiles.

Year Model	Passenger Capacity	Lincoln.	Gross Weight	Horse Power	Fee
	3	Roadster	4625	36.45	21.00
	4	Coupe	4850	36.45	21.00
	7	Touring	5350	36.45	22.00
	5	Phaeton	5000	36.45	22.00
	5	Sedan	5150	36.45	22.00
	5	Brougham	5175	36.45	22.00
	7	Limousine	5675	36.45	23.00
	7	Town Car	5625	36.45	23.00
		Locomobile.			
	4	Sportive	5575	48.6	26.00
	7	Touring	6380	48.6	28.00
	7	Landaulet	6735	48.6	29.00
	7	Limousine	6735	48.6	29.00
		Lorraine.			
	5	Touring	3200	19.6	13.00
		Lozier 6 Cylinder.			
	5	Touring	4550	36.00	20.00
	7	Touring	4850	36.00	21.00
		Lozier 4 Cylinder.			
	7	Touring	4850	29.00	19.00
		McFarlane.			
	2	Roadster	4900	48.6	24.00
	4	Sport	5300	48.6	25.00
	4	Coupe	5500	48.6	26.00
	7	Touring	5750	48.6	27.00
	7	Limousine	6150	48.6	28.00
	7	Sedan	6250	48.6	28.00
		Maibohm.			
	3	Roadster	2820	23.44	13.00
	4	Sport	3050	23.44	13.00
	4	Coupe	3200	23.44	14.00
	5	Phaeton	3230	23.44	14.00
	5	Sedan	3575	23.44	15.00
		Marmon.			
	2	Roadster	3900	33.75	18.00
	4	Touring	4250	33.75	19.00
	4	Coupe	4510	33.75	20.00
	7	Touring	4950	33.75	21.00
	7	Sedan	5170	33.75	21.00
	7	Limousine	5150	33.75	21.00

Table XXVIII (Continued)
License Fees Required For Automobiles.

Year Model	Passenger Capacity	Maxwell.	Gross Weight	Horse Power	Fee
	2	Roadster	2310	21.03	11.00
	5	Touring	2850	21.03	12.00
	3	Coupe	2675	21.03	12.00
	5	Sedan	3270	21.03	13.00
		Mercer.			
	2	Raccabout	3560	22.5	15.00
	4	Runabout	4200	22.5	16.00
	1	Sport	4350	22.5	17.00
	1	Coupe	4715	22.5	17.00
	6	Touring	4930	22.5	18.00
	6	Sedan	5215	22.5	19.00
		Metz.			
	2	Roadster	3285	24.00	14.00
	3	Coupe	3435	24.00	15.00
	5	Touring	3735	24.00	15.00
	5	Sedan	3900	24.00	16.00
		Michigan.			
R and S	2	Roadster	3400	28.9	16.00
	5	Touring	3850	28.9	17.00
	7	Touring	4150	28.9	18.00
L and O	2	Roadster	3150	26.4	14.00
	5	Touring	3600	26.4	16.00
	7	Touring	3900	26.4	16.00
		Mitchell.			
	3	Roadster	3300	25.35	15.00
	4	Special	3600	25.35	15.00
	5	Touring	3750	25.35	16.00
	7	Touring	4350	29.4	18.00
		Monroe.			
	2	Roadster	2675	16.9	11.00
	5	Touring	3125	16.9	12.00
		Moon 6 Cylinder.			
6-48	5	Sedan	3950	25.35	16.00
6-48	2	Roadster	3100	25.35	14.00
6-48	5	Touring	3675	25.35	16.00
6-68	3	Roadster	3450	29.4	16.00
6-68	7	Touring	4400	29.4	18.00
6-68	7	Sedan	4500	29.4	19.00
		Moon 4 Cylinder.			
	2	Roadster	3400	32.4	17.00
	5	Touring	3550	19.6	14.00

Table XXVIII (Continued)
License Fees Required For Automobiles.

Year Model	Passenger Capacity		Gross Weight	Horse Power	Fee
	2	Nash 6 Cylinder. Roadster	3220	25.35	14.00
	4	Coupe	3800	25.35	16.00
	5	Touring	3670	25.35	16.00
	7	Touring	4120	25.35	17.00
	7	Sedan	4350	25.35	17.00
		Nash 4 Cylinder.			
	2	Roadster	1695	18.25	10.00
	5	Touring	2145	18.25	10.00
	3	Coupe	2135	18.25	11.00
	5	Sedan	2935	18.25	12.00
		National.			
	3	Roadster	4072	29.4	18.00
	4	Phaeton	4369	29.4	18.00
	4	Coupe	4470	29.4	19.00
	7	Touring	4830	29.4	19.00
	7	Sedan	5010	29.4	20.00
		Oakland 8 Cylinder.			
	7	Touring	4115	39.22	21.00
		Oakland 6 Cylinder.			
	2	Roadster	2531	19.00	11.00
	3	Coupe	3150	19.00	13.00
	5	Touring	3171	19.00	13.00
	5	Sedan	3483	19.00	13.00
48	5	Touring	4300	29.45	18.00
49	7	Touring	4370	29.45	18.00
		Oakland 4 Cylinder.			
38-X	2	Roadster	2610	19.6	11.00
38	5	Touring	3175	19.6	13.00
42	3	Roadster	3720	27.20	16.00
43	5	Touring	4330	28.00	18.00
43	5	Sedan	4350	28.00	18.00
		Oldsmobile 4 and 6 Cylinder.			
	2	Roadster	3158	21.75	13.00
	3	Coupe	3483	21.75	14.00
	5	Sedan	3893	21.75	15.00
	5	Touring	3633	21.75	15.00
		Oldsmobile 8 Cylinder.			
	4	Chummy Roadster	3850	26.45	16.00
	5	Pacemaker	3850	26.45	16.00
	7	Touring	4200	26.45	17.00
	7	Sedan	4450	26.45	18.00

Table XXVIII (Continued)
License Fees Required For Automobiles.

Year-Model	Passenger Capacity		Gross Weight	Horse Power	Fees
Overland 6 Cylinder.					
	3	Roadster	3326	25.00	15.00
	5	Touring	3673	25.00	15.00
	3	Coupe	3560	25.00	15.00
	5	Sedan	3999	25.00	16.00
Overland Models 80, 81, 83, 85, 4 Cylinder.					
	3	Roadster	3201	27.00	15.00
	3	Coupe	3401	27.00	15.00
	5	Touring	3585	27.00	16.00
	5	Sedan	3868	27.00	16.00
Overland 90, 4 Cylinder.					
	2	Roadster	2435	18.23	11.00
	5	Touring	3110	18.23	12.00
	4	Club Roadster.....	2862	18.23	12.00
	5	Sedan	3395	18.23	13.00
Baby Overland 4 Cylinder.					
	2	Roadster	2100	18.23	10.00
	2	Coupe	2200	18.23	10.00
	5	Touring	2690	18.23	11.00
	5	Sedan	2800	18.23	12.00
Willys-Knight 8 Cylinder.					
	7	Touring	4630	36.00	21.00
	4	Coupe	4340	36.00	20.00
	7	Sedan	4950	36.00	21.00
	7	Limousine	4970	36.00	21.00
Willys-Knight 6 Cylinder.					
	4	Club Roadster.....	3782	29.00	17.00
	4	Coupe	4270	29.00	18.00
	7	Touring	4520	29.00	19.00
	7	Sedan	4820	29.00	19.00
	7	Limousine	4925	29.00	20.00
Willys-Knight 4 Cylinder Model 20.					
	3	Roadster	3390	21.03	14.00
	3	Coupe	3630	21.03	14.00
	5	Touring	3790	21.03	15.00
	5	Sedan	3950	21.03	15.00
Packard Twin 6.					
	4	Runabout	4845	43.2	23.00
	5	Phaeton	5050	43.2	23.00
	5	Coupe	5330	43.2	24.00
	7	Limousine	5645	43.2	25.00

Table XXVIII (Continued)
License Fees Required For Automobiles.

Year-Model	Passenger Capacity		Gross Weight	Horse Power	Fee
Packard Twin 6—Cont'd					
	7	Sedan	5720	43.2	25.00
	7	Touring	5520	43.2	25.00
Packard Single 6.					
	2	Runabout	3090	27.34	15.00
	4	Coupe	3590	27.34	16.00
	5	Touring	3670	27.34	16.00
	5	Sedan	3920	27.34	17.00
Paige 6 Cylinder, Model 66.					
	4	Sport	4075	33.75	19.00
	5	Coupe	4175	33.75	20.00
	7	Touring	4590	33.75	20.00
	7	Sedan	5035	33.75	21.00
Paige 6 Cylinder, Model 42.					
	2	Roadster	3210	25.35	14.00
	4	Sport	3630	25.35	15.00
	3	Coupe	3495	25.35	15.00
	5	Touring	3660	25.35	15.00
	5	Sedan	3985	25.35	16.00
Pan-American.					
	2	Roadster	3450	25.35	15.00
	5	Touring	3900	25.35	16.00
	5	Sedan	3900	25.35	16.00
	7	Touring	4200	25.35	17.00
Pathfinder.					
	2	Roadster	3800	29.00	17.00
	5	Touring	4950	29.00	20.00
	7	Touring	5250	29.00	20.00
Patterson.					
	5	Touring	3750	25.35	16.00
	5	Coupe	4050	25.35	16.00
	7	Touring	4050	25.35	16.00
	5	Sedan	4150	25.35	17.00
Peerless.					
	4	Roadster	4200	33.8	19.00
	4	Coupe	4450	33.8	20.00
	7	Touring	4750	33.8	20.00
	7	Sedan	5075	33.8	21.00
	7	Limousine	5200	33.8	21.00
Piedmont 6 Cylinder.					
6-40	5	Touring	3500	29.00	16.00

Table XXVIII (Continued)
License Fees Required For Automobiles.

Year Model	Passenger Capacity		Gross Weight	Horse Power	Fee
		Piedmont 4 Cylinder.			
4-30	5	Touring	3100	19.6	13.00
		Pierce-Arrow.			
	2	Roadster	5800	38.4	24.00
	4	Touring	6100	38.4	25.00
	7	Touring	6550	38.4	26.00
	4	Coupe	7100	38.4	27.00
	7	Sedan	7800	38.4	29.00
	7	Landaulet	7800	38.4	29.00
	7	Limousine	7800	38.4	29.00
		Pilot.			
	2	Roadster	3350	25.35	15.00
	5	Touring	3800	25.35	16.00
	4	Coupe	3900	25.35	16.00
	5	Sedan	4050	25.35	16.00
	7	Touring	4100	25.35	17.00
		Premier.			
	2	Open Car	4250	27.34	17.00
	4	Open Car	4670	27.34	19.00
	4	Coupe	4970	27.34	19.00
	7	Open Car	5170	27.34	20.00
	4	Closed	5070	27.34	20.00
	7	Closed	5520	27.34	21.00
		Pullman.			
1915-16-17	2	Roadster	2600	20.00	12.00
	5	Touring	3050	20.00	13.00
6-48	2	Roadster	4100	48.00	22.00
	5	Touring	4250	48.00	23.00
		Ranger 4 Cylinder.			
	2	Roadster	3000	18.2	12.00
	5	Touring	3600	18.2	14.00
		Ranger 6 Cylinder.			
	2	Roadster	3100	25.3	14.00
	5	Touring	3750	25.3	16.00
		Regal.			
	5	Touring	3298	22.5	14.00
		Roamer.			
	2	Roadster	3400	29.4	16.00
	4	Sport	3800	29.4	17.00

Table XXVIII (Continued)
License Fees Required For Automobiles.

Year-Model	Passenger Capacity		Gross Weight	Horse Power	Fee
Roamer-- Cont'd.					
7		Touring	4450	29.1	18.00
3		Coupe and Cabriolet	4150	29.4	18.00
7		Sedan, Limousine and Town Car	5050	29.4	20.00
Reo.					
3		Roadster	3250	24.3	14.00
5		Touring	3600	24.3	15.00
4		Coupe	3700	24.3	15.00
5		Sedan	3930	24.3	16.00
Root and Vandervoort.					
5		Touring	3950	29.4	17.00
4		Sport	4055	29.4	17.00
1		Coupe	4300	29.4	18.00
7		Touring	4667	29.4	19.00
7		Sedan	4950	29.4	20.00
Sainte Claire.					
(See Wills Sainte Claire.)					
Saxon 4 Cylinder.					
5		Touring	3150	18.23	12.00
1		Coupe	3400	18.23	13.00
5		Sedan	3550	18.23	13.00
Saxon 6 Cylinder.					
2		Roadster	3000	25.35	14.00
3		Coupe	3250	25.35	14.00
5		Touring	3550	25.35	15.00
5		Sedan	3825	25.35	16.00
Sayers and Scoville.					
2		Roadster	3350	25.35	15.00
5		Touring	3760	25.35	16.00
5		Sedan	4135	25.35	17.00
Scripps-Booth.					
3		Roadster	2850	18.98	12.00
4		Coupe	3200	18.98	13.00
5		Touring	3180	18.98	13.00
5		Sedan	3550	18.98	14.00

Table XXVIII (Continued)
License Fees Required For Automobiles.

Year Model	Passenger Capacity		Gross Weight	Horse Power	Fee
Seneca.					
1918	4	Touring	2780	19.6	12.00
1918	5	Touring	2930	19.6	12.00
1919-20-21	5	Touring	2930	19.6	12.00
O-2	2	Roadster	2500	19.6	11.00
L-2	5	Touring	3030	19.6	12.00
51	2	Roadster	2650	19.6	12.00
50	5	Touring	3250	19.6	13.00
Standard Steel Car Co.					
	4	Roadster	4250	33.8	19.00
	4	Coupe	4600	33.8	20.00
	4	Sedanette	4700	33.8	20.00
	7	Touring	4850	33.8	21.00
	7	Sedan	5400	33.8	22.00
Stephens.					
	2	Roadster	3540	25.35	15.00
	4	Touring	3835	25.35	16.00
	6	Touring	4245	25.35	17.00
	5	Sedan	4395	25.35	17.00
Stearns-Knight.					
	3	Roadster	3890	22.5	15.00
	4	Touring	4095	22.5	16.00
	5	Touring	4220	22.5	16.00
	4	Coupe	4360	22.5	17.00
	7	Touring	4600	22.5	17.00
	7	Sedan	4890	22.5	18.00
	7	Limousine	4900	22.5	18.00
Stevens-Duryea.					
	4	Sport	5200	47.25	25.00
	4	Sedan	5400	47.25	25.00
	7	Limousine	5850	47.25	26.00
	7	Touring	5650	47.25	26.00
Stoddard-Dayton.					
	2	Roadster	3650	29.4	16.00
	5	Touring	4000	29.4	17.00
	4	Coupe	3700	29.4	17.00
	7	Touring	4300	29.4	18.00
	7	Sedan	4500	29.4	19.00

Table XXVIII (Continued)
License Fees Required For Automobiles.

Year Model	Passenger Capacity	Gross Weight	Horse Power	Fee
Studebaker Big 6.				
2	Roadster	3030	36.04	17.00
3	Landau Roadster	3250	36.04	17.00
3	Coupe	3550	36.04	18.00
5	Sedan	3850	36.04	19.00
5	Limousine	4000	36.04	19.00
7	Touring	4225	36.04	20.00
Studebaker Special 6.				
2	Roadster	3225	29.4	15.00
4	Roadster	3540	29.4	16.00
4	Coupe	3700	29.4	17.00
5	Touring	3745	29.4	17.00
5	Sedan	4060	29.4	18.00
Studebaker Light 6.				
3	Roadster	3050	23.44	13.00
5	Touring	3250	23.44	14.00
5	Sedan	3657	23.44	15.00
Studebaker 4 Cylinder.				
2	Roadster	2840	24.22	13.00
3	Coupe	3290	24.22	14.00
5	Touring	3440	24.22	15.00
Stutz Model "K."				
2	Roadster	4080	30.63	18.00
4	Coupe	4670	30.63	19.00
4	Passenger	4550	30.63	19.00
6	Passenger	4910	30.63	20.00
Stutz Model "H."				
2	Roadster	3730	30.63	17.00
4	Passenger	4310	30.63	18.00
6	Passenger	4680	30.63	19.00
Templar.				
2	Roadster	3130	18.23	12.00
4	Sportette	3500	18.23	13.00
5	Touring	3626	18.23	14.00
5	Sedan	3887	18.23	14.00
Texan.				
2	Roadster	2850	19.6	12.00
5	Touring	3300	19.6	13.00

Table XXVIII (Continued)
License Fees Required For Automobiles.

Year Model	Passenger Capacity		Gross Weight	Horse Power	Fee
Tulsa.					
	2	Roadster	2700	19.6	12.00
	4	Oil Field Special	3000	19.6	12.00
	5	Touring	3100	19.6	13.00
Velie Model "48."					
	2	Roadster	3280	25.35	15.00
	4	Sportsler	3665	25.35	16.00
	1	Coupe	3795	25.35	16.00
	5	Touring	3730	25.35	16.00
	6	Sedan	4201	25.35	17.00
	7	Touring	4350	25.35	17.00
Velie Model "34."					
	2	Roadster	2715	23.44	13.00
	5	Touring	3294	23.44	14.00
	6	Sedan	3800	23.44	15.00
Wescott Model "C" 48.					
	7	Touring	4350	29.4	18.00
	7	Sedan	5050	29.4	20.00
	7	Limousine	5050	29.4	20.00
Wescott Model "C" 34.					
	2	Roadster	3100	25.35	14.00
	5	Touring	3550	25.35	15.00
	4	Coupe	3800	25.35	16.00
	5	Sedan	4050	25.35	16.00
White Gas.					
1915	2	Roadster	3445	22.5	14.00
	5	Touring	4025	22.5	16.00
1914	2	Roadster	4240	28.9	18.00
	4	Roadster or Coupe	5000	28.9	20.00
	5	Sedan	5250	28.9	20.00
	7	Touring	5725	28.9	22.00
	7	Limousine	6050	28.9	22.00
1913	2	Roadster	5000	43.5	23.00
Wills Sainte Claire.					
	4	Roadster	3635	33.00	17.00
	2	Coupe	3665	33.00	17.00
	4	Coupe	3965	33.00	18.00
	5	Touring	3865	33.00	18.00
	5	Sedan	4350	33.00	19.00
	5	Town Car	4300	33.00	19.00
	5	Limousine	4360	33.00	19.00

Table XXVIII (Continued)
License Fees Required For Automobiles.

Year Model	Passenger Capacity		Gross Weight	Horse Power	Fee
Willys-Knight.					
(See Overland.)					
Winton.					
2	Roadster	4215	33.75	19.00	
4	Touring	4755	33.75	20.00	
4	Sedan	4920	33.75	21.00	
4	Victoria	4920	33.75	21.00	
7	Touring	5096	33.75	21.00	
7	Sedan	5484	33.75	22.00	
7	Limousine	5484	33.75	22.00	
Yellow Cab—Passenger Cars.					
2	Roadster	4500	31.5	19.00	
4	Sport	5100	31.5	21.00	
7	Touring	5550	31.5	22.00	
7	Sedan	6150	31.5	23.00	
Yellow Cab Taxi.					
5	Yellow Cab	4100	22.5	17.00	
Cars Propelled by Electricity.					
Detroit.					
4	Brougham	4550	3	12.00	
5	Brougham	4750	3	13.00	
Milburn.					
	All Styles			10.00	
Rauch and Lang.					
4	Brougham	4500	3.5	12.00	
5	Brougham	4800	3.5	13.00	
Cars Propelled by Steam.					
Stanley Steamer.					
3	Roadster	3750	20.00	14.00	
4	Touring	4300	20.00	16.00	
7	Touring	4850	20.00	17.00	
5	Sedan	5200	20.00	18.00	
7	Sedan	5500	20.00	19.00	

Fees For Motor Trucks Equipped With Pneumatic Tires.

For 1 ton or less capacity.....	\$15.00	per annum.
For 1½ ton capacity.....	20.00	per annum.
For 2 ton capacity.....	25.00	per annum.
For 2½ ton capacity.....	35.00	per annum.
For 3 ton capacity.....	50.00	per annum.
For 3½ ton capacity.....	65.00	per annum.
For 4 ton capacity.....	80.00	per annum.
For 4½ ton capacity.....	100.00	per annum.
For 5 ton capacity.....	125.00	per annum.
For 6 ton capacity.....	150.00	per annum.

On trucks of more than 3 tons capacity equipped with 2 or more solid tires the fee shall be one and one-half times the above schedule.

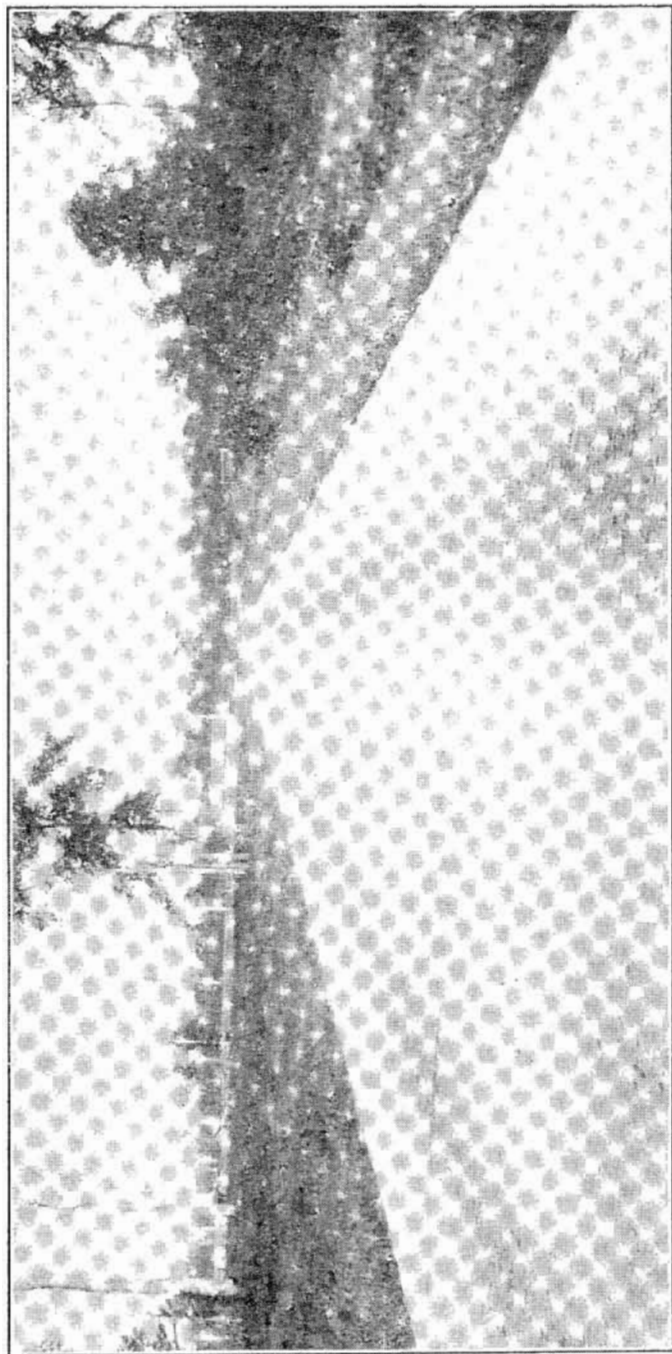
It shall be unlawful to operate any truck of more than six (6) tons capacity on any road, bridge or highway in this State.

Fee For Trailers and Semi-Trailers.

For 1 ton or less capacity.....	\$10.00	per annum.
For 2 tons or less capacity.....	15.00	per annum.
For 3 tons or less capacity.....	25.00	per annum.
For 4 tons or less capacity.....	40.00	per annum.
For 5 tons or less capacity.....	50.00	per annum.

The minimum FEE for all automobiles, trucks, trailers and semi-trailers shall be \$10.00.

The fee for Motorcycles is.....	\$5.00
The fee for Motorcycles with side car is.....	7.50



Federal Aid Project No. 95, Road Improvement District No. 9, Crittenden County, 18-foot concrete pavement connecting the Memphis Bridge with Marion, the county seat of Crittenden County, Arkansas.

Table XXIX.
State Motor Vehicle Registration Fees and Regulations Effective January 1, 1922.

State, Vehicle, Authority and Date of Act	LICENSE FEES		Weight and Dimension Limits	Special Provisions and Speed Limits (Miles per Hour)		
	Passenger Cars	Motor Trucks				
ALABAMA State Tax Commission Effective October 1, 1919	H. P. Under 25	Cap. Tons Under 1	Maximum gross wt. 10 tons	Maximum		
	25-29	1-2			\$15.00	30
	30-39	2-3			22.50	
	40 or over	3-4			37.50	
	Electric Steady	4 and over			56.25 75.00	(a)
ARIZONA Secretary of State Effective June 9, 1921	H. P. 25 and less	Cap. Tons Under 3	10.00 15.00 25.00	City Country (b) (c)		
	Over 40	3-5			10-15 30	
		Over 5				
		Over 6				
ARKANSAS Commissioner of State Lands, Highways and Improvements Passed March 20, 1921	Per H. P. Per 100 lb. gross wt. (Min. Fee \$10.00)	Cap. Tons Under 1 1 1/2 2 2 1/2 3 3 1/2 4 4 1/2 5 6	Solid Maximum capacity 6 tons	Price, \$15.00 20.00 25.00 35.00 50.00 65.00 80.00 100.00 125.00 150.00 225.00		
		1 1/2			20.00	
		2			25.00	
		2 1/2			35.00	
		3			50.00	
		3 1/2			65.00	
		4			80.00	
	4 1/2	100.00				
	5	125.00				
	6	150.00				

(a)—Registration fees are in lieu of all property taxes. (b)—All motor vehicles taxed as personal property. (c)—A tax of one cent per gallon on gasoline. (d)—A tax of two cents per gallon on gasoline.

Table XXIX (Continued)
State Motor Vehicle Registration Fees and Regulations Effective January 1, 1922.

State, Vehicle, Authority and Date of Act	LICENSE FEES		Weight and Dimension Limits	Special Provisions and Speed Limits (Miles per Hour)
	Motor Trucks	Passenger Cars		
CALIFORNIA Motor Vehicle Dept. Amended 1921	Per H. P.	0.40	Maximum gross weight 30,000 lbs (4 wheels) Maximum gross wt. 40,000 lbs. for 6 wheels and 3 axles not less than 96 inches apart Per inches width tire base 700 lbs. 1500 lbs. for metal tires)	City 15 Country 35 Trucks Gross wt. lbs. 35 9,000 15 9,001 to 12,000 15 12,001 to 21,000 10 Metal tires (b) 6
	Electric 5.00	5.00		
COLORADO Secretary of State Amended 1921	20 or less	2.50	Maximum gross wt. 8 tons	Country 35
	21-30	5.00		
	41 or more	10.00		
	Cap. Tons	10.00		
	1-2	17.50		
	3-4	25.00		
5	37.50			
For each additional ton over 5	50.00			
		25.00		(b) (c)

STATE HIGHWAY COMMISSION

Table XXIX (Continued)
 State Motor Vehicle Registration Fees and Regulations Effective January 1, 1922.

State, Vehicle, Authority and Date of Act	LICENSE FEES			Motor Trucks	Weight and Dimension Limits	Special Provisions and Speed Limits (Miles per Hour)	
	Passenger Cars	Cap. Tons	Trucks				
CONNECTICUT	Per cu. inches total piston displacement (Min. fee, \$15.00)	Cap. Tons 1 1/2 2 2 1/2 3 1/2 4 4 1/2 5 5 1/2 6	Specu. Solid \$22.50 \$30.00 30.00 40.00 37.50 50.00 60.00 90.00 70.00 90.00 90.00 137.50 102.50 162.50 187.50 187.50 218.75 218.75 250.00 250.00	Per inches width of tire 800 lbs. Not less than 20 per cent of gross load on one axle. Max. gross load 25,000 lbs.	City Country Solid tire truck	20 30 15	
Commissioner of Motor Vehicles Effective January 1, 1922	Electric per H. P. Steam, per H. P.	.75 .75			(b) (c)		
DELAWARE	Per 500 lbs. gross wt. (Passengers to be included at 125 lbs. each)	Same as for passenger cars	Same as for passenger cars	Maximum gross wt. 26,000; per inches width of tire 700 lbs. For trailers with metal tires, maximum gross wt. 6,000 lbs. Width, 96 inches. Height, 12 feet 2 inches (Width for traction engine 708 inches)	City Country Pneumatic Tires	15 30 15 15 15 12 12	
Secretary of State 1919					Solid Tires	15 15 12 12 12 12 15 15	
						26,000 6,000 8,000 12,000 16,000 20,000 26,000	25 25 18 16 15 22 20
						26,000 6,000 8,000 12,000 16,000 20,000 26,000	15 15 12 12 12 15 15

(a)

Table XXIX (Continued)
State Motor Vehicle Registration Fees and Regulations Effective January 1, 1922.

State, Vehicle, Authority and Date of Act	LICENSE FEES		Weight and Dimension Limits	Special Provisions and Speed Limits (Miles per Hour)
	Passenger Cars	Motor Trucks		
FLORIDA State Comptroller Effective January 1, 1922	50 cents per 100 lbs. of vehicle	With pneumatic tires 80.75¢ per 100 lbs. gross weight of unloaded vehicle; with solid tires \$1.12 per 100 lbs.	Light cars 30 Heavy trucks 12	(b) (c)
GEORGIA Secretary of State Amended 1919	23 H. P. or less \$11.25 Over 23 H. P., per H. P. 0.50	Cap. Tons 1 or less \$15.00 1-1½ 22.50 1½-2 30.00 2-2½ 37.50 2½-3 45.00 3-3½ 52.50 3½-4 60.00 4-5 75.00 5-6 150.00 6-7 375.00 Over 7 750.00 1125.00	Maximum	30
IDAHO Secretary of State Amended 1921	Wt. of vehicle lbs. 2,000 or less \$15.00 2,001-3,000 20.00 3,001-4,000 30.00 Over 4,000 40.00	Same as passenger cars	Per inches width tire, 500 lbs. For tires less than 2 inches wide max. load is 350 lbs. per inches width. No vehicle load to exceed 50 per cent heavier than manufacturers rating.	Maximum 30

* Gasoline tax declared void April 7 1922.

Table XXIX (Continued)
 State Motor Vehicle Registration Fees and Regulations Effective January 1, 1922.

State, Vehicle, Authority and Date of Act	LICENSE FEES			Weight and Dimension Limits	Special Provisions and Speed Limits (Miles per Hour)
	Passenger Cars	Motor Trucks			
ILLINOIS Secretary of State Effective January 1, 1920	H. P.	Gross wt. lbs.		Per inches with tire, 800 pounds. Per axle, 16,000 lbs. (with limits increased 50 per cent) Width 8 feet Length, Tractor combination, 65 feet. Max. gross load 24,000 lbs.	Passenger Cars City 10-20 Country 30
	25 and less	5,000 or less	\$12.00		
	26-35	5,001-12,000	22.50		
	36-50	12,001-15,000	25.00		
	Over 50	Over 15,000	65.00		
	Electric	Tractors	25.00		Trucks Gross wt., lbs. Tires 5,000 Solid 25 5,001-12,000 Pneum. 20 12,001-15,000 Solid 15 15,001-15,000 Pneum. 15 12,001-15,000 Solid 12 Over 15,000 Solid 12
					(b)
INDIANA Secretary of State Amended March, 1921	H. P.	Cap. Tons less than 1	80.00	Maximum capacity 7½ tons	City 10-35 Country 25
	Less than 25	85.00	15.00		
	25-39	8.00	25.00		
	40-49	20.00	20.00		
	50 or more	30.00	75.00		
	Electric	3.00			

Table XXIX (Continued)
State Motor Vehicle Registration Fees and Regulations Effective January 1, 1922.

State, Vehicle, Authority and Date of Act	LICENSE FEES		Motor Trucks	Weight and Dimension Limits	Special Provisions and Speed Limits (Miles per Hour)
	Passenger Cars	Cap. Tons			
IOWA Secretary of State Amended 1921	Per 100 lbs. wt. of vehicle.	30.40	Per ton or less	Per inches width tire	Gross wt. tons
	Plus 1 per cent of value of vehicle.	1.25	1 1/2	800	Less than 2
	Minimum fee	10.00	2	Maximum gross weight	2
			2 1/2	tons, Maximum load, one wheel, 1 tons.	3
			3	Width, 8 feet.	4
			3 1/2	Max. Gross load	5
			4	28000 lbs.	6
			4 1/2		7
			5		8
			6		9
			Per ton over 6 ton capacity Trucks over 2 ton capacity in city limits pay two-thirds above fees. Per steel tires: 1-ton capacity.....40.00 1 1/2-ton capacity.....50.00		
KANSAS Secretary of State through County Clerk 1921			Cap. Tons		
	\$8 minimum fee for car weighing 2000 lbs. plus 50 cts. for each over one ton.		1 to 1 1/2		
	Electricies.....\$10.00		1 1/2 to 3 ton.		
			3 to 4		
			4 to 5		
			Over 5 ton \$25 additional for each ton or fraction over 5 ton		
					City.....12
					Country.....10

Table XXIX (Continued)
State Motor Vehicle Registration Fees and Regulations Effective January 1, 1922.

State, Vehicle, Authority and Date of Act	LICENSE FEES		Weight and Dimension Limits	Special Provisions and Speed Limits (Miles per Hour)
	Passenger Cars	Motor Trucks		
KENTUCKY State Tax Commission Enacted March, 1920	Per H. P.	\$0.60	Per inches width tires Rubber, 800 lbs. Steel, 500 lbs.	Passenger Cars City 15-20 Country 30
	Cap. lbs.	\$22.00		Trucks—Rubber tires; Cap. Tons City Co.
	1,000 or less.....	30.00		1-2½..... 10-15..... 25
	2,001-3,000.....	40.00		2½..... 7-11..... 20
	3,001-4,000.....	50.00		3..... 7-11..... 15
	4,001-5,000.....	60.00		4..... 6-8..... 10
	5,001-6,000.....	70.00		(b)
	6,001-7,000.....	80.00		(c)
	7,001-8,000.....	110.00		
	8,001-9,000.....	130.00		
9,001-10,000.....	150.00			
Over 10,000.....	150.00			
Plus \$50 for each additional ton.				
LOUISIANA Secretary of State 1921	Per H. P.	\$0.68	Practically 5 ton capacity 84 inches width, Per inch width tire, 600 pounds.	Passenger Cars City 15 Country 35
	Minimum fee.....	15.00		Trucks 1-2 tons 15 Over 2 12
	Cap. lbs.	Per 1,000 lbs. H.P.		
	4,001-5,000.....	\$10.00		0.08
	5,001-6,000.....	12.50		0.68
6,001-8,000.....	15.00	0.68		
8,001-10,000.....	20.00	0.68		
	25.00	0.68		
	* (Minimum fee \$25.00)			

* \$1.50 per 1000 lbs. in excess of 10,000 lbs.

Table XXIX (Continued)
 State Motor Vehicle Registration Fees and Regulations Effective January 1, 1922.

State, Vehicle, Authority and Date of Act	LICENSE FEES		Weight and Dimension Limits	Special Provisions and Speed Limits (Miles per Hour)
	Passenger Cars	Motor Trucks		
MAINE Secretary of State Revisited to July 9, 1921	25 cents per 100 lbs. of vehicle plus 25 cents per H. P.	Cap. tons Pneumatic tires 1/2 or less \$10.00 1 to 2 15.00 2 to 3 20.00 3 to 4 55.00 Over 4 80.00 Traction engines and log haulers \$18.00 each Solid rubber tires 33 1/2 per cent above rates.	Per inches width tire, 700 pounds Maximum gross weight 9 tons on 4 wheels and 13 1/2 on 6 wheels. Width 96 inches. Height 12 1/2 feet.	Passenger Cars City 15 Country 25 †Trucks Gross weight, tons 15 1-6 6 ‡ Solid tires. (b)
MARYLAND Commissioner of Motor Vehicles Amended 1920	Per H. P. (Pneu. Tires) \$0.60 (Minimum fee \$16.00)	Cap. Tons Solid Tires 1 or less \$20.00 2 or less 40.00 3 or less 60.00 4 or less 100.00 5 or less 150.00 6 or less 200.00 7 or less 300.00 Pneumatic tires—same as passenger cars. Per electric solid tire vehicles one-half of above fees. For tractors 25.00	Per inches width tire, 650 pounds. Maximum gross weight trucks, 10 tons. Width, 90 inches. Traction engines may be 160 inches wide. New trucks above 5 ton capacity not registered.	Solid Tires Gross weight, tons. 25 2 or less 15 2-6 12 Over 6 6 Metal tires Pneumatic Tires 15-20 Country 35 Maximum speed for any vehicle with commercial body and gross weight over 3 tons 25 (b)

Table XXIX (Continued)
State Motor Vehicle Registration Fees and Regulations Effective January 1, 1922.

State, Vehicle Authority and Date of Act	LICENSE FEES		Weight and Dimension Limits	Special Provisions and Speed Limits Miles per Hour
	Passenger Cars	Motor Trucks		
MASSACHUSETTS Registrar of Motor Vehicles, Dept. Public Works Acts of 1909 amended to August, 1922	H. P. Less than 30	500 Tons Loss	Per inches width tire, 800 pounds. Minimum gross weight 28,000 pounds. Width, 98 inches. Length, trailer combination 58 feet.	Passenger Cars City Country
	30 and over	Per each ton over 5 tons Electric trucks pay one-half above rates.	Trucks and Trailers Gross weight Tons Over 1 Rubber Metal (b)	15 20 15 4
MICHIGAN Secretary of State Revised, 1921	Gasoline & Steam Per H. P. Per 100 lbs. unladen weight	Same as passenger cars.	Trucks and Trailers Size of Maximum Wheel Tire, inches. Load, Lbs.	Passenger Cars City Country Trucks Single tire wheel load Speed
	Electric Per H. P. Per 100 lbs. weight		2 700 2 1/2 900 3 1200 4 1600 5 1900 6 2200 7 2500 8 2700 9 3000 10 3200 Above scale for 32 inches diameter wheel. Additional 1-10 for each 2 inches increase in wheel diameter. Maximum gross weight 15 tons Width, 96 inches. Height, 12 feet 6 inches. Trailer combination 60 feet.	15 20 20 20 20 20 18 11 12 Speed 15 18 18 16 14 13 12 16

Table XXIX (Continued)
State Motor Vehicle Registration Fees and Regulations Effective January 1, 1922.

State, Vehicle, Authority and Date of Act	LICENSE FEES		Weight and Dimension Limits	Special Provisions and Speed Limits (Miles per Hour)
	Passenger Cars	Motor Trucks		
MINNESOTA Amended 1921	Each vehicle 2 per cent of its value. Minimum fee for less than 2,000 lbs. weight \$12.00. Minimum fee for more than 2,000 lbs. wt. \$15.00.	Each vehicle 2 per cent of the value. Minimum fee for less than 2 ton capacity \$15.00. Minimum fee for 2 to 4 tons, \$30.00. Minimum fee over 4 tons, \$50.00.	Per inches width tire 800 pounds. Maximum gross weight 28,000 Width, 96 inches. Maximum weight, 1 axle 22,400 lb. Height, 12 feet, 6 inches. Length, 30 feet. Trailer combination 85 feet.	City 15 Country 35 (a)
MISSISSIPPI State Auditor of Public Accounts Effective April 2, 1920	Per H. P. Electric (Minimum fee \$5.00)	Per H. P. Electric (Minimum fee \$5.00)		City 15 Country 30 (b)

Table XXIX (Continued)
 State Motor Vehicle Registration Fees and Regulations Effective January 1, 1922.

State, Vehicle, Authority and Date of Act	LICENSE FEES		Weight and Dimension Limits	Special Provisions and Speed Limits (Miles per Hour)
	Passenger Cars	Motor Trucks		
MISSOURI Secretary of State. July 30, 1921.	H. P. Less than 12..... 12-24..... 24-36..... 36-48..... 48-66..... 60-72..... Over 72.....	Fee Width, 108 inches. Height, 15 feet. Length, 30 feet. Combination length, 85 ft. Gross weight, 14 ton plus trailer 21 ton, 800 lbs. per inch width tires. Ton Capacity Less than 2..... 2-5..... 5-6..... 6-7..... 7-8..... Over 8 tons \$10.00 addi- tional for each ton or fraction over 8.	Maximum	25
	H. P. 23 or less..... 23-37..... 37-50..... Over 50..... Electric.....	Capacity Tons 1 or less..... \$10.00 1-2..... 22.50 2-3..... 37.50 Over 3..... 60.00	City Country	(b)
MONTANA Secretary of State. Approved March 5, 1921.	H. P. 23 or less..... 23-37..... 37-50..... Over 50..... Electric.....	Capacity Tons 1 or less..... \$10.00 1-2..... 22.50 2-3..... 37.50 Over 3..... 60.00	City Country	15 25 (b) (c)
NEBRASKA Department of Public Works. Act of April 11, 1919.	Weight unladen, 1 ton \$10.00 For each additional 100 lb. weight of car .50 (Minimum fee \$10.00)	Gross weight 1 ton \$10.00 For each additional 100 lbs. gross weight 0.50	Per inch width tire, 600 pounds. On tire wheel, 7,000 lbs. D. P. W. traffic regula- tions. Width, 7½ feet. Height, 12 feet. D. P. W. traffic regulations.	Maximum (b)
NEVADA Secretary of State. 1921.	Per 100 lb. factory wt. plus wt of passenger at 125 lbs. each.....\$0.35	Per 100 lbs. gross wt \$0.35	Gross weight 10 ton. 500 lbs. per inch width of tire.	Maximum (b)

Table XXIX (Continued)
State Motor Vehicle Registration Fees and Regulations Effective January 1, 1922.

State, Vehicle, Authority and Date of Act	LICENSE FEES		Weight and Dimension Limits	Special Provisions and Speed Limits (Miles per Hour)
	Passenger Cars	Motor Trucks		
NEW HAMPSHIRE Commissioner of Motor Vehicles. Approved April 13, 1921.	Per 100 lbs. gross wt. \$0.60 (Passenger figured at 150 lbs. each.) (Minimum fee \$15.00)	Per 100 lbs. gross wt., pneu. tires \$0.60 (Min. \$20.00) Solid tires 0.85 (Min. \$30.00) Iron or steel tires 1.00	Per inch width tire 750 pounds. Max. gross wt. 20,000 lbs. City 15,000 Country Width, 96 inches. Length, 30 feet. Trailer combination 85 ft.	(a) 15 25
NEW JERSEY Department of Motor Vehicles. Amended 1921.	Per H. P. 9-29 30 or more	Gross Weight lbs. 1,000 or less \$10.00 1,001-2,000 12.00 2,001-3,000 15.00 3,001-4,000 20.00 4,001-5,000 24.00 The scale from this point increases \$3.00 for each additional 1,000 lbs. 20,001-30,000 99.00	Per inch width tire, 800 pounds. Max. gross weight 30,000 pounds. Table compiled for wheel loads for various sizes of tire and wheel.) Width, 96 inches. Height, 28 feet. Trailer combination 85 ft.	Passenger Cars 12 City 30 Country Trucks Gross weight tons, 16 1-6 0-8 8-15 10 (b)
NEW MEXICO Secretary of State. January 1, 1922.	Per H. P. \$0.40 Electric 12.00	\$12.00 plus 40 cts. per 100 lbs. of rated capacity over 1½ tons. Solid tires 25 per cent greater.	Tire must be 3 inches for 2,000 lbs. Width, 96 inches.	City 15 Country 35 (b) (c)

Table XXIX (Continued)
State Motor Vehicle Registration Fees and Regulations Effective January 1, 1922.

State, Vehicle, Authority and Date of Act	LICENSE FEES		Weight and Dimension Limits	Special Provisions and Speed Limits (Miles per Hour)	
	Passenger Cars	Motor Trucks			
NEW YORK State Tax Commission. Amended 1921.	Per H. P.	\$0.25	Gross wt. tons.	Maximum 30	
	Additional Fee		2 or less		
	Years after	Per \$100.	2-3	Per inch width tire, 700 pounds.	(a)
	Date of Mfg.	of list Price	3-4	Maximum gross weight 28,000 pounds.	
	3	\$0.40	4-5	Width, 8 feet. Racks may be 12 feet at top.	
	4-5	0.20	5-6	Height, 12 feet, 6 inches.	
	Over 5	0.10	6-7		
	Min. fee (4-cyl).	3.00	7-8		
	Min. fee (6-cyl) or more	4.00	8-9		
		16.00	9-10		
			10-11		
			11-12		
			12-13		
			13-14		
		Over 14, \$70 plus \$10 for each ton over 14.			
NORTH CAROLINA Secretary of State. Effective July 1, 1921.	H. P.		Capacity Tons	(b) (c)	
	24 or less	\$12.50	Under 1/2		
	25-30	20.00	1/2 less than 1		
	31-34	30.00	1 less than 2	city	
	35 or more	40.00	2 less than 3	country	
		3 less than 4		18	
		4 and over		25	
			9,000 lbs. maximum gross weight. Applies to State Highway only.		

Table XXIX (Continued)
State Motor Vehicle Registration Fees and Regulations Effective January 1, 1922.

State, Vehicle, Authority and Date of Act	LICENSE FEES		Weight and Dimension Limits	Special Provisions and Speed Limits (Miles per Hour)
	Passenger Cars	Motor Trucks		
NORTH DAKOTA Motor Vehicle Registration Department. Amended 1920.	For first year per dollar list price..... \$0.005 Per 100 lb. wt..... 0.20 Per H. P..... 0.10 Electricity pay \$2 in lieu of H. P. fee. For second year, 10 per cent reduction from basic fee. For third year, 25 per cent reduction; and thereafter 40 per cent reduction. (Min. fee \$5.)	In addition to passenger car fees trucks pay following: Capacity: Per ton up to 3..... \$3.00 Per ton 3-4..... 5.00 Per ton 4 and over..... 10.00		(a) City..... 10 Country..... 30
OHIO Secretary of State. Amended 1921.	H. P. 25 or less..... \$8.00 26-35..... 12.00 Over 35..... 20.00 Electric..... 8.00	Gasoline Same as for passenger cars Plus 20 cents per 100 lbs gross weight. Electric, a fee of \$8 plus 20 cents per 100 lbs. gross weight.	Max. gross wt. 10 ton for trucks and 12 tons for traction engines. Per inch width of tire— Steel 3 inches, 500 lbs. Rubber 650 pounds. Per axle 14,000 lbs. Load on one wheel not more than 35 per cent total gross weight; one axle not more than 70 per cent gross weight. Width, 90 inches. Height, 12 feet 6 inches. Length, 30 feet. Trailer combination, 85 ft.	Passenger Cars City..... 15-20 Country..... 30 Trucks Gross weight Less than Solid tire. 5..... 20 6-8..... 15 8-10..... 12 12..... 13 (b)

Table XXIX (Continued)
 State Motor Vehicle Registration Fees and Regulations Effective January 1, 1922.

State, Vehicle, Authority and Date of Act	LICENSE FEES		Weight and Dimension Limits	Special Provisions and Speed Limits (Miles per Hour)	
	Passenger Cars	Motor Trucks			
PENNSYLVANIA State Highway Dept. Amended 1921.	Per H. P. \$0.40 Minimum fee \$10.	Wt. of chassis, pounds Pneu. Solid Less than 2,000.....\$15 2,000-2,999.....24 3,000-3,999.....30 4,000-4,999.....32 5,000-5,999.....40 6,000-6,999.....50 7,000-7,999.....70 8,000-8,999.....80 9,000-9,999.....100 10,000-10,999.....125 11,000-11,999.....140 12,000-12,999.....160 13,000-13,999.....180 14,000-14,999.....200	Per inch width tire 800 pounds. Maximum gross weight 26,700 pounds. Maximum weight 1 axle 19,500 pounds. Width, 66 inches. Length, 28 feet.	Maximum Passenger Cars Trucks (a) (b) Weight of chassis Pneu. Solid Pounds 2,000-2,999.....24 3,000-3,999.....24 4,000-4,999.....22 5,000-5,999.....19 6,000-7,999.....15 7,500-8,499.....16 8,500 and over.....14	30
		Electricity --- Fee same as trucks with pneumatic tires. Metal tires double fee.			
RHODE ISLAND State Board of Public Roads. Passed 1921.	Per H. P. 100 lbs H. P. \$0.25 Pneu. \$0.25 Solid 0.35 Steel 0.50	Same as passenger cars.		City Country (b)	
SOUTH CAROLINA State Highway Dept. Effective Jan. 1, 1921.	Weight of vehicle, pounds 2,000 or less.....\$0.60 Each additional 500 pounds.....2.00	Capacity tons 1 or less.....\$15.00 2.....30.00 3.....60.00 4.....100.00 5.....150.00 6.....200.00 7.....250.00 8-7 (in).....350.00 Reduction of 25 per cent for pneumatic tires.	Motor truck the limit, except in case of special permit Width, 7 1/2 feet.	(a)	

Table XXIX (Continued)
State Motor Vehicle Registration Fees and Regulations Effective January 1, 1922.

State, Vehicle, Authority and Date of Act	LICENSE FEES		Motor Trucks	Weight and Dimension Limits	Special Provisions and Speed Limits (Miles per Hour)	
	Passenger Cars	Motor Trucks				
SOUTH DAKOTA Secretary of State thru County Treasurer, Effective Jan. 1, 1922.	Gross weight, pounds	Capacity, tons		Maximum capacity 5 tons.	Maximum (a-c)	
	Less than 2,000.....	1 or less.....	\$15.00		25	
	2,000-3,000.....	1-1 1/2.....	20.00			
	3,000-4,000.....	1 1/2-2.....	25.00			
	Over 4,000.....	2-3.....	35.00			
		3 or more.....	75.00			
TENNESSEE State Highway Dept. Effective 1921.	Per H. P.	Per H. P.	\$0.50	Maximum gross weight 10 tons and 650 pounds per inch width of tire.	Trucks, under 2-ton..... 20 2-4 ton..... 13 5-10 ton..... 12	
	Electric (each)	plus \$5 per ton of carrying capacity. Electric \$25 plus \$5 per ton of carrying capacity.	25.00		(a)	
TEXAS State Highway Dept. Effective Jan. 1, 1922.	Per H. P.	Motor Trucks		Per inch width tire 500 lbs.	Gross weight in lbs.	
	(Min. fee \$7.50)	Capacity, lbs. Pneum. Solid	\$0.35	Width, 7 1/2 feet.	Trucks, purchased after Jan. 1, 1922, limited to 4 ton capacity. Maximum load one wheel 5,000 pounds.	Pneumatic 2,001-4,000..... 18 4,001-6,000..... 15 6,001-10,000..... 12 10,001-12,000..... 10
		2,001-3,000.....	830		Solid Rubber	1,500-2,000..... 16 2,001-3,000..... 12 3,001-5,000..... 12 5,001-10,000..... 10
		3,001-4,000.....	40			8,001-10,000..... 10
		4,001-5,000.....	50			
		5,001-6,000.....	65			
		6,001-7,000.....	80			
		7,001-8,000.....	100			
		8,001-9,000.....	120			
		9,001-10,000.....	144			
			150			

Table XXIX (Continued)
State Motor Vehicle Registration Fees and Regulations Effective January 1, 1922.

State, Vehicle, Authority and Date of Act	LICENSE FEES		Motor Trucks	Weight and Dimension Limits	Special Provisions and Speed Limits (Miles per Hour)
	Passenger Cars	Motor Trucks			
UTAH Secretary of State. Amended 1921.	H. P. 25 or less.....	\$10.00	Cap. tons 1 or less.....	Max. load, 1 wheel, 3¾ tons.	Gross weight, tons Under 3 pneu.....30 Under 3 solid.....20
	30-40.....	15.00	1½.....	Max. gross weight 13 tons. Per inch width tire hard, 3-4 pneu.	3-4 pneu.....25 3-4 solid.....15
VERMONT Secretary of State. Amended 1921.	Over 50.....	25.00	2½.....	surfaced pavements 600 pounds.	Over 4 pneu.....16 Over 4 solid.....8
	Electric.....	15.00	3½.....	Earth and gravel 100 lbs. Width, 8 feet.	For metal tired vehicle.....5
VIRGINIA Secretary of Commonwealth. Code of 1919.	Steam vehicles of 15 H. P. or less.....	10.00	4½.....		(b)
	H. P. 16 or less of 16-25 H. P.	15.00	5.....		
			Over 5—to 850 per ton additional.		
			For metal tired motor trucks		
			Cap. 1 ton.....		
			Cap. 1½ ton.....		
			Cap. 2 ton.....		
				Per inch width tire 600 lbs Max. gross weight 6¾ tons (except where written permit is granted), Height, 12 feet, 2 inches.	Passenger Cars. City.....10 Country.....25 Bridges.....10 Truck 4-6 tons.....15 Over 6.....12 Over 6 (steel tires).....6
			Capacity, tons		(a)
			3-1.....		
			3-1.....		
			3-2.....		
			3-3.....		
			3-4.....		
			For each additional ton or fraction over 4.....		
				Max. gross weight 24,000 pounds per inch width tire 700 pounds.	City.....10 Country.....20
			Per H. P. First year.....		
			Second year.....		
			Third year.....		
			Subsequent years.....		
					(b)

Table XXIX (Continued)
State Motor Vehicle Registration Fees and Regulations Effective January 1, 1922.

State, Vehicle, Authority and Date of Act	LICENSE FEES			Weight and Dimension Limits	Special Provisions and Speed Limits (Miles per Hour)
	Passenger Cars	Motor Trucks	Passenger Cars		
WASHINGTON Secretary of State, Amended 1921.	Private cars, 1,500 lbs. or less, \$10.00; 1,500 to 1,750 lbs., \$15.00; Over 1,750 lbs., \$10.00 plus 40 cents per 100 lbs. over 1,500 pounds. Car for Hire, 1,500 lbs. or less \$20 plus \$3 per person carrying capacity. Over 1,500 lbs., \$20 plus 60 cents per 100 lbs. over 1,500 lbs. plus \$3 per per- son carrying capacity.	Weight, pounds 1,500 lbs. or less, \$10.00; 1,500-6,500 lbs., \$10.00 Plus 40 cents per 100 lbs. over 1,500 lbs. 40 cents per 100 lbs. of rated carrying capacity. Over 6,500 lbs., \$10.00 Plus 30 cents per 100 lbs. over 1,500 plus 50 cents per 100 lbs. rated carrying ca- pacity.	City 12-20 Country 30 Motor trucks (solid tires) 30 Gross wt. tons 25 2 and less 25 20 14-8 18 10-8 16 8-10 14 10-12 12 Motor trucks (pneu. tires) 25 Stages (10 passenger) 25 (b)	Per inch width tire, 8000 pounds. Max. gross weight 24,000 pounds. Max. gross weight 1 axle, 22,400 pounds.	7-passenger 6,000 35 15 Others (pneu. tires) 25 15 Solid tires 1,000 30 10 Solid tires over 4,000 35 10 Solid tires 2,000 5 5 Country City.
WEST VIRGINIA State Road Commission, Enacted 1921.	Pneumatic tires, Per ft. P. 80-200 Per 100 lbs. gr. wt. 0.30 Passenger weight at 125 lbs. pounds each.) 1-2 2-3 3-4 1-5 Pneu. tires same as passenger cars.	Solid tires Capacity, tons 1 or less \$25.00 Over 1 50.00 2-3 75.00 3-4 100.00 1-5 150.00	Vehicle Gr. wt. (1) (2) 7-passenger 6,000 35 15 Others (pneu. tires) 25 15 Solid tires 1,000 30 10 Solid tires over 4,000 35 10 Solid tires 2,000 5 5 Country City.	Per inch width tire 6000 pounds. Max. gross weight 22,000 pounds. Max. gross weight 1 axle, 17,000 pounds. Max. gross weight 1 wheel, 9,000 pounds. Width, 90 inches. Height, 12 feet. Length, 30 feet. Trailer combination 60 ft.	(b)
	Tractors drawing trailers 2 or less \$20.00 2 1/2 25.00 3 30.00 3 1/2 35.00 4 40.00 4 1/2 45.00 5 50.00 5 1/2 55.00 6 60.00 6 1/2 65.00 7 70.00	Gr. wt. tons 6 1/2 7 1/2 8 9 10 11 12			

Table XXIX (Continued)
 State Motor Vehicle Registration Fees and Regulations Effective January 1, 1922.

State, Vehicle Authority and Date of Act	LICENSE FEES			Weight and Dimension Limits	Special Provisions and Speed Limits (Miles per Hour)
	Passenger Cars	Motor Trucks			
WISCONSIN Secretary of State, Compiled July, 1921.	All cars \$10 each.	Capacity, pounds Under 2,100 \$15.00 2,100-5,099 20.00 5,100- or more 25.00		Per inch width tire 800 pounds. Max. gross weight 24,000 pounds. Max. per axle 18,000 lbs. Width, 96 inches. Length, 30 feet. Trailer combination 100 ft. in large cities.	City 15 Country 30 (b)
WYOMING Secretary of State, Effective Jan. 2, 1922.	Per H. P. 22 or less \$8.00 23-30 12.00 31-40 16.00 Over 40 20.00	Trucks weight 1 ton \$15.00 1-2 20.00 2-3 50.00 3-4 75.00 4-5 100.00 Over 5 150.00 For metal tires and solid tires above fee plus \$10.		Maximum gross weight without special permit, 25,000 pounds.	Reasonable and proper. (b)

LAND DIVISION

LAND DIVISION.

Every effort has been made by the Land Division to bring it up to the standard of efficiency that the people of Arkansas are entitled to.

It is estimated that ten thousand inquiries are answered annually from the Land Office, all inquiries being answered the same day they are received, if at all possible.

It was found that a good many of the records in the Land Office were in bad condition and during this administration the following improvements have been made:

26 Swamp Land Plats have been rebound.

7 Forfeited Land Plats have been rebound.

All official Government plats have been worked over and linen backs put on them where needed.

42 Records in the office have been rebound.

11 Records in the office have been recopied.

Islands.

The Legislature of 1917, by Act 282, provided for the sale of Islands formed within the original beds of the navigable streams of the State. Act 344 of the General Assembly of 1919 fixed the price of Swamp and Internal Improvement lands at \$2.50 per acre. Island land was included in this by an opinion of the Attorney General. In October, 1922, the Supreme Court held that the price of Island land was \$1.25 per acre.

I recommend that the method of sale of Islands be changed and would suggest that the same procedure be followed as in the sale of School lands.

Internal Improvement Land.

The Records of this office are very incomplete with reference to the Chancery Sales of Internal Improvement Lands. Suits were brought in the Pulaski Chancery Court and at least one-half of the proceedings are not to be found in this office. There is a partial record of the Chancery dispositions here, but I find it very incomplete.

I recommend that the Legislature make provisions to have this record completed and brought up to date.

Swamp Land.

The Legislature of 1921 appropriated the sum of Five Thousand Dollars (\$5,000.00) for having Swamp Land

WAR EQUIPMENT
DIVISION

WAR EQUIPMENT DIVISION.

Surplus War Materials.

Under Acts of Congress passed February 28th, 1919, March 5th, 1920, April 24th, 1920 and November 9th, 1921, \$1,917,941 worth of surplus war materials had been allotted to the State of Arkansas for road building purposes up to January 1st, 1921, all of which had been disposed of by the preceding administration. On account of the policy adopted in the disposition of these materials, allotments were discontinued to the State. Before any more allotments would be made, the Department of Agriculture at Washington directed that this Department make a strenuous effort to reclaim the property that had been unlawfully disposed of. These materials had been sold to individuals and corporations and donated to counties in conflict with Section 5 of the Act of Congress, approved March 15th, 1920, which reads as follows:

"Section 5. That the title to said vehicles and equipment shall be and remain vested in the State for use in the improvement of the public highways, and no such vehicles and equipment in serviceable condition shall be sold or the title to same transferred to any individual, company or corporation: Provided, That the State Highway Department to which is assigned motor propelled vehicles and other equipment and supplies, transferred herein to the Department of Agriculture, may in its discretion, arrange for the use of such vehicles and equipment, for the purpose of constructing and maintaining public highways, with any state agency or municipal corporation at a fair rental which shall not be less than the cost of maintenance and repair of said vehicles and equipment."

Acting under directions of the Department of Agriculture of the United States the Commission proceeded, with the assistance of that Department, to check up and reclaim the equipment which had been disposed of and after many months of persistent effort were able to reclaim the following materials as shown by the recapitulation given below.

Class of Equipment	Received Value	Accounted for Value	Per Cent
Motor equipment.....	\$1,081,504.00	\$815,486.00	75
Spare parts	263,600.00	134,138.00	53
Major equipment.....	217,729.00	106,420.00	43

Industrial railway equipment	232,184.00	27,711.00	12
Minor equipment.....	13,036.00	10,312.00	79
Construction materials	83,509.00	76,009.00	91
Tools	6,379.00	6,379.00	100
TOTAL	\$1,917,941.00	\$1,176,455.00	61

Note: The above values were estimated by the Department of Agriculture at the time of delivery.

It should not be understood that the materials thus reclaimed were actually delivered back to the Department in Little Rock or that they were in serviceable condition at the time they were reclaimed. In cases where those to whom the materials had been sold or donated were willing to turn them back, memorandum receipts were taken in the following form:

MEMORANDUM RECEIPT.

Received from the State Highway Department of Arkansas at Little Rock, Arkansas, the following described property for which I hold myself responsible and which I will return in as good condition as when received, ordinary wear and tear excepted, when called on by proper authority to do so.

Quantity	Items and Description	Condition
Date.....	Signed.....	Title.....

It was necessary to reclaim the materials in this way on account of the fact that this Department had no funds with which to pay the transportation charges back to Little Rock. Much of those materials had been permitted to waste and deteriorate in value, in many cases being exposed to the weather and subject to the depredations of thieves. Motor vehicles were robbed of many parts. It will thus be seen that the equipment when reclaimed had deteriorated far below its value at the time it was delivered to the State by the U. S. Department of Agriculture. Many of the motor vehicles scattered over the State are in such bad mechanical condition that it is impossible to drive them on their own power and to load them for reshipment back to this Department, even if sufficient funds were available with which to do so. However, quite a few motor vehicles and other materials have been brought in where it was possible to do so without incurring heavy transportation charges.

Suits have been filed by the Attorney General to recover the 39 per cent for which those holding same refusing to sign memorandum receipts. Up to this time only one of those suits out of a total number of 67 has been decided, that being the case of State vs. Geo. B. Cox, et al. In this case it was decided that the materials sued for were "not serviceable for road building purposes in Arkansas" and therefore the Highway Department had the right to sell same and consequently the State failed to recover. Many other suits are still pending in the courts and it remains to be seen what disposition will be made of them.

In the reclamation of these materials it was necessary to employ inspectors and accountants to do the work and thus far a total expense of \$7,599.34 has been incurred in that work.

Allotments Resumed.

In the fall of 1921, service on the Missouri & North Arkansas Railroad was discontinued, leaving a vast area of the State without freight and passenger transportation facilities, except over the public highways. It became apparent that it would be necessary for the benefit of the people residing in the territory supplied by this railroad, to repair the highways therein in order to provide ways of transportation. The Department appealed to the Secretary of Agriculture at Washington for an allotment of ten ten-ton Holt tractors to be used in the counties traversed by this railroad. An allotment of twenty-one of these tractors was secured, this being the first allotment that the present administration was able to get. These tractors were distributed on a rental basis in the counties affected and proved to be of invaluable service to the people in those counties.

Not until June, 1922, were we able to get the Department of Agriculture to resume shipments of surplus war materials for road building purposes to the State, except for a few minor shipments, and not until we had made an exhaustive report assisted by a representative from the Department of Agriculture. Since June, 1922, large shipments of major and minor equipment, such as is practical for use in maintaining and constructing highways, have been received. These include:

Axes, anvils, tool boxes, crow bars, digging bars, belts, blocks, batteries, buckets, bits, blankets, feed bags, chains, cutters chisels, air compressors, cables, garbage cans, drills duck, planers, files, grease, grinders, pick handles, hatchets,

hammers (sledge, shop and claw), rope halters, hoists (steam, electric and rope), jacks, knives (drawing), lathes, lanterns, levels, motor cycles, motors (gas and electric), matlocks (pick), machines (milling), nails (all sizes), pumps, pliers, peavies, pulleys, planers, presses, picks (railroad), picks (clay), rails (25 lb. for industrial railway), punches, paint, rope (all sizes), reamers, springs (for trucks), spare parts (for P. A. trucks), shovels (long and short handled), spades, shelters, spikes (wire 8 and 10 in.), squares (steel), screwdrivers, saws (cross cut and hand), shop tools, sledges, coops (coal), tarpaulins, trucks (auto), trailers (truck), taps, torches (blow), tongs (chain), tents, tractors (5 and 10 ton Holts), tires (solid), vices (machine and blacksmith), washers, wrenches (all kinds), wire (barbed), wagons (log, escort and tool), wheelbarrows and numerous other small items.

Proper Classification.

In order to classify the different kinds of property handled by the State Highway Department, the following definitions have been established. Property is either non-expendable or expendable as indicated under the various classifications.

Class 1. Major Equipment: Non-expendable.

This comprises apparatus with a monetary value of seventy-five dollars or more, such as trucks, tractors, gas engines, lathes, derricks, wagons, pumps, hoisting machines, automobiles, industrial railway equipment, etc.

Class 2. Minor Equipment: Expendable.

This comprises equipment, materials and supplies that are expected to be consumed in the construction of highways or which has a value so small that it would be impracticable to dispose of them on a rental basis. This includes small tools, spare parts, repairs and accessories for major equipment, nails, saws, picks, shovels, etc.

How Acquired For Use.

Major equipment or non-expendable materials can be acquired for use by counties, road districts, municipal corporations and other road building agencies, on a lease or rental basis. Rentals are charged on major equipment only. Below is given a specimen copy of the lease contract required on major equipment:

Lease Contract.

THIS AGREEMENT entered into this.....day of
....., 192..... by and between the State Highway
Department of Arkansas, party of the first part and.....
.....party of the second part, WITNESSETH:

WHEREAS, the party of the second part hereby certi-
fied that the following described equipment is needed for
use in the construction of highways in the County of.....
....., State of Arkansas.

The State Highway Department hereby rents to the
party of the second part the following described equip-
ment, viz:

Item and Description	Value	Monthly Rental Rate
.....
.....
.....
.....
.....
.....
.....
.....
.....
.....

for a period of.....months from the.....day of....., 192.....
to the.....day of....., 192....., for the total rental price
of.....dollars, to be paid in.....installments.

Receipt is hereby acknowledged of.....dollars
as the first installment on the rental price of said equipment.
The party of the second part hereby agrees to pay the bal-
ance of the rental price in.....installments of.....
dollars each, such payments to be due and payable on the
first day of each and every period designated above. In
default of any payment as is required by this agreement the
State Highway Department reserves the right to take over
said equipment at any time after the expiration of ten days
from the date of such default.

The party of the second part hereby agrees to keep the
above described equipment in a proper state of repair and in
good working order, and at the expiration of this agreement
to return said equipment to the State Highway Department
in as good condition as when received, natural depreciation
excepted.

The party of the second part further agrees to allow
the State Highway Department or its authorized representa-
tives to have free access at all times to said equipment for
the purpose of inspection to insure that the provisions of
this agreement are being carried out.

The party of the second part further agrees that said
equipment will be used only on the construction of high-
ways in..... County or on the getting out of mate-

rial incidental thereto, and that when improved roads have been turned over to the County Judge for maintenance as provided by law and such improved roads are in need of maintenance, the equipment leased in accordance with this agreement will be used for this work.

The party of the second part further agrees not to loan, sublet or hire out said equipment or any part of same without the specific written approval of the State Highway Department.

The party of the second part further agrees that in the operation of said equipment only such operators whose qualifications meet the approval of the State Highway Department will be employed.

The party of the second part further agrees that when said equipment is not in use or operation it shall be kept in proper storage, such storage to be subject to the approval of the State Highway Department.

The party of the second part further agrees to pay all freight, demurrage, loading and unloading charges and other expenses incidental to the transfer of the equipment from the storage warehouse of the State Highway Department at Little Rock, Arkansas, and for its return thereto.

WITNESS OUR HANDS and seals this..... day of.....
....., 192.....

Department of State Lands, Highways & Improvements

By..... (Seal).

Commissioner.

..... (Seal).

By.....

Rentals Charged.

The Act of Congress approved March 15th, 1920, provides that equipment may be leased, for the purpose of constructing and maintaining public highways, to any State agency or municipal corporation at a fair rental which shall not be less than the cost of maintenance of such equipment. Pursuant to this provision a schedule of rentals has been fixed on major equipment which is in part as follows:

Item and description	Monthly rental charged
Tractor, 20 ton Holt.....	\$ 25.00
Motor Cycle, Harley-Davidson.....	5.00
Engines, gas, 35 H. P. Pittsburg.....	12.50
Engine, gas, 7½ H. P. Hercules.....	8.00
Milling machine, Becker.....	5.00
Lathe, Monarch.....	5.00
Tractor, 10 ton Holt.....	25.00

Derrick, 5 ton Stiff Log	12.50
Bucket, clam shell.....	12.50
Engine, hoisting.....	12.50
Trucks, all makes.....	10.00
Crane, Locomotive	100.00
Trailer, truck.....	5.00
Wagons, escort and log.....	5.00
Mixers, concrete	25.00
Tractor, 5 ton Holt.....	25.00

The lessee is required to pay in addition to the above rental, freight and loading charges accrued on the equipment leased.

Minor Equipment.

Minor or expendable equipment is sold outright. This is in accordance with the interpretation of the regulations as made by the representative of the Bureau of Public Roads at Washington. Prices have been fixed considerably lower than that charged by dealers and it is quite a saving to the counties, road districts and other road building agencies to purchase these items from this Department.

Among the major equipment allotted to this Department since Jan. 1st, 1921, are the following items:

Item and description	Number allotted
Engines, gas, 50 H. P. Pittsburg.....	5
Engines, gas, 35 H. P. Pittsburg.....	5
Engines, gas, 7½ H. P. Hercules.....	4
Tractors, 10 ton Holt.....	29
Tractors, 10 ton Holt (unserviceable).....	5
Tractors, 5 ton Holt.....	3
Trucks, Class B Liberty.....	4
Trucks, F. W. D.....	2
Trucks, G. M. C.....	2
Trucks, Dodge Light Delivery (Unserviceable).....	2
Trucks, White Reconnaissance.....	1
Trucks, White 1½ ton.....	3
Touring cars, Dodge (unserviceable).....	2
Motor cycles, Harley-Davidson.....	10
Fire truck, Howe-Ford.....	1
Grinders, various makes.....	5
Lathes, various makes.....	11
Mixers, concrete.....	2
Motors, electric.....	5
Machines, milling.....	1
Press, drill.....	1
Compressors, air.....	3

Plainer, Cincinnati	1
Wagons, log	11
Wagons, tool	10
Hoists, electric	2

Major Equipment Leased.

Item	Number leased	Monthly rental
Tractors	44	\$1027.00
Motor vehicles	31	670.00
Concrete mixers	3	54.00
Truck trailers	6	48.00
Cranes	1	100.00
Hoist, pump and engine, each.....	1	25.00
Escort wagons	3	7.50
Lathes	1	5.00
Wagons, log and spare parts.....	6	30.00
Engines, gas	4	28 50
Rails, steel .....	.....	6.00
Derricks, stiff log.....	1	62.50
Total		\$2063.50

Financial Statement.

The War Equipment Division is maintained from rents on major equipment and sales of minor equipment. Below is given the financial statement covering the period from January 1st, 1921, to September 20th, 1922.

Receipts.

From Rents—Lease Property Non-expendable....	\$18,919.60
From Sales—Lease Property Expendable.....	11,224.60
From Freight—Re-imbursed	10,862.16
From Other Sources.....	1,073.58
Total	\$42,079.94

Disbursements.

EXPENSE:

Legal	\$ 431.63
Office salaries	5,435.80
Store room and warehouse.....	1,365.58
Mechanics	6,530.05
Labor	748.30
Official cars	2,343.15
Stationery and printing	586.29
Gas and oil	322.81
Trucks and tractors	438.09

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Traveling	191.29
Insurance	28.75
Rent	1,855.00
Miscellaneous	4,243.10
Government loading charges	1,031.11
Freight paid	10,730.49
Accounts receivable	5,266.44
Balance on hand	493.06
Total	\$42,079.91

Shop.

In order to repair and keep equipment in serviceable condition, a repair shop is being maintained by this department. So much of the equipment is found to be un-serviceable and in bad repair and the funds so limited that it is not possible to accomplish all that should be done with the limited shop facilities that are available.

Engineers Cars.

As there is no appropriation for the purchase of cars for District Engineers, three new cars have been recently purchased for them out of the funds of the War Equipment Division, and by resolution passed by the Commission, more cars will be bought in the same way from time to time as needed.

On account of the equipment formerly allotted being scattered over the State in various parts of the seventy-five counties, it is going to be a difficult task to rehabilitate it. Freight rates almost prohibit the shipping of it back to Little Rock for repairs and salvage and in many cases the equipment is in such bad mechanical condition that there is no other way to get it back except by railroad transportation.