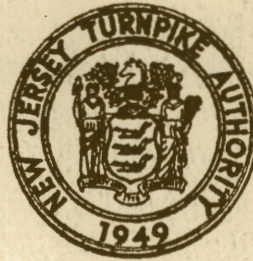


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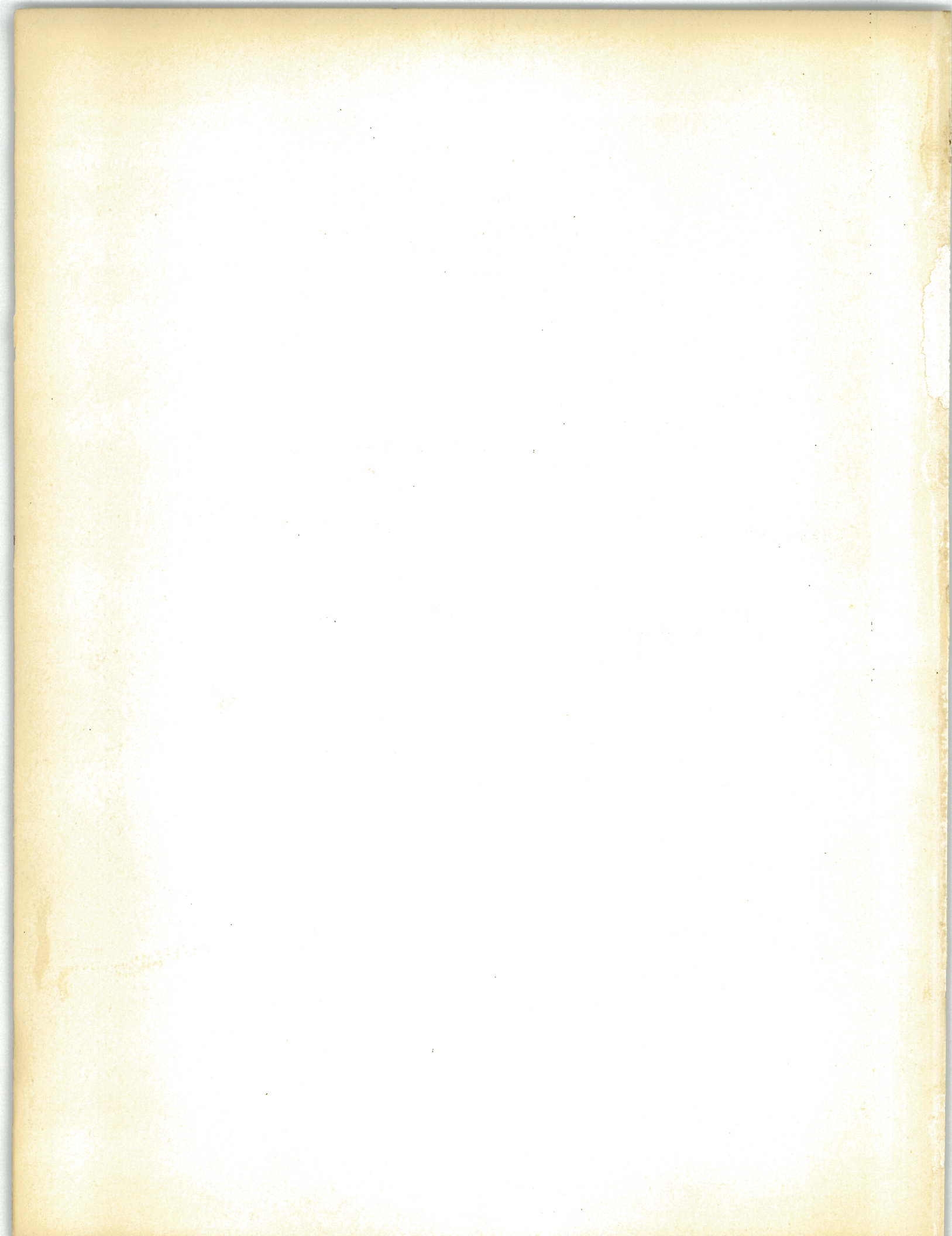
NEW JERSEY TURNPIKE AUTHORITY

PAUL L. TROAST
Chairman

GEORGE F. SMITH
Vice-Chairman

MAXWELL LESTER, JR.
Treasurer

First Annual Report
1949





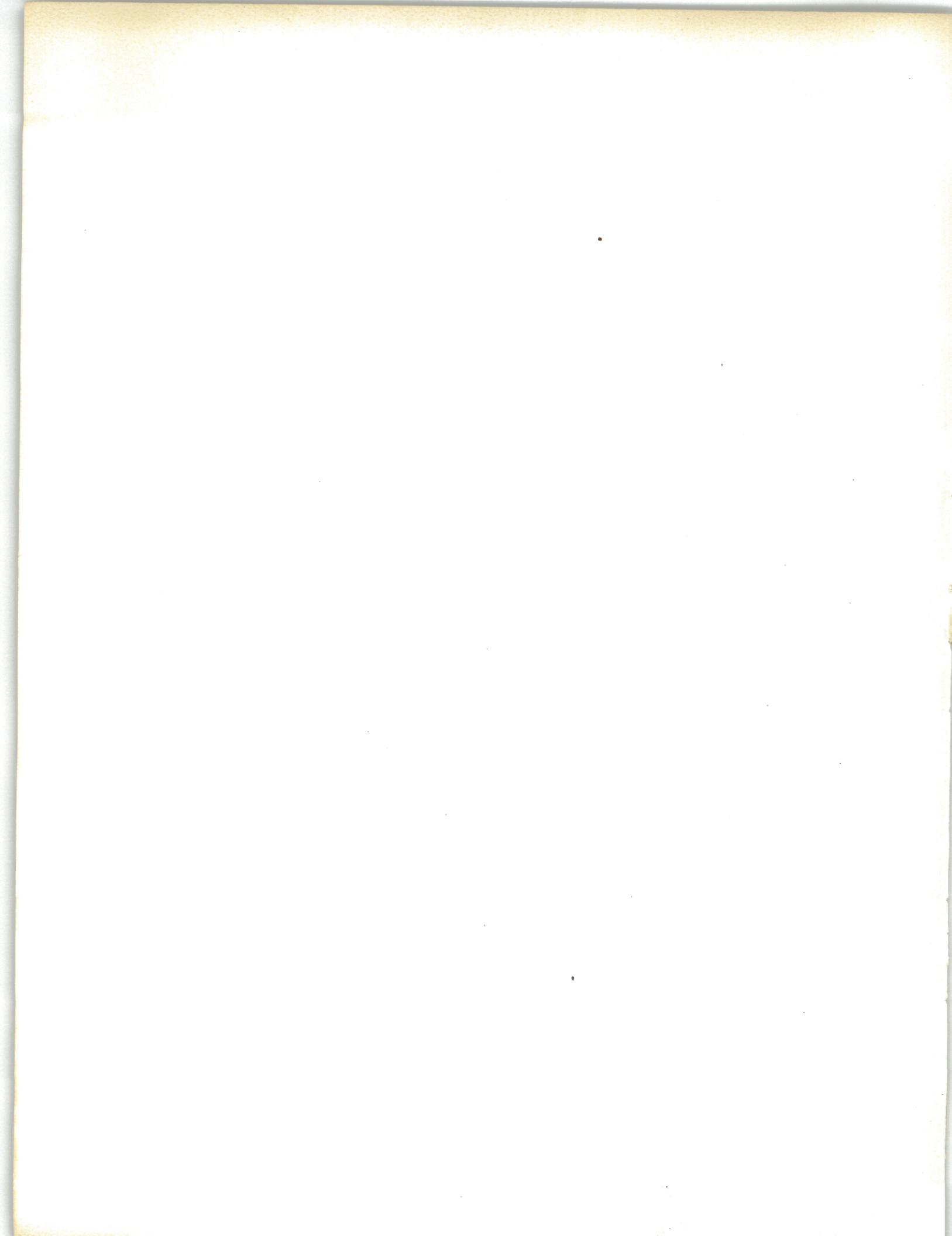
First Annual Report

NEW JERSEY TURNPIKE AUTHORITY

For the Period from March 31, to December 31, 1949

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PAUL L. TROAST, CHAIRMAN
GEORGE F. SMITH, VICE-CHAIRMAN
MAXWELL LESTER, JR., TREASURER

NEW JERSEY TURNPIKE AUTHORITY

TRENTON, N. J.

*The Honorable Alfred E. Driscoll, Governor, and the
Members of the Legislature of the State of New Jersey:*

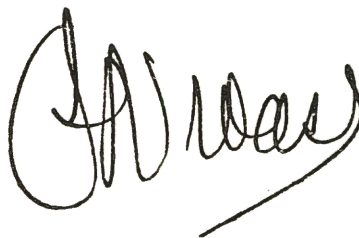
IN compliance with the provisions of "The New Jersey Turnpike Authority Act of 1948" (Chapter 454, Public Laws 1948), we submit herewith our annual report for 1949, in which are set forth briefly the operations, decisions, and progress of the Authority in that year. A financial statement and audit are also enclosed.

With the submission of this report, the Authority wishes to express its deep appreciation of the guidance given by the Governor, the co-operation and support of the Legislature, and the help of many officials and employees of the State, Counties, and Municipalities. They have contributed freely of their time, and assisted in countless ways in furthering the work of the Authority.

The Commissioners desire also to thank and commend the members of its Staff, the engineering firms, and the legal and financial advisors engaged by the Authority for their loyal assistance, their sacrifices, and their devotion to duty during a temporary period of alternating optimism and discouragement, and when, at one time, there seemed to be grave doubt whether the project could proceed.

Marked progress has been made in the month since the close of 1949, and the Authority is confident that the ground work which was accomplished in that year will assure the success of this vitally needed public improvement.

Respectfully submitted,

A handwritten signature in cursive script, appearing to read "Paul L. Troast".

PAUL L. TROAST, *Chairman.*

A handwritten signature in cursive script, appearing to read "George F. Smith".

GEORGE F. SMITH, *Vice-Chairman.*

A handwritten signature in cursive script, appearing to read "Maxwell Lester Jr".

MAXWELL LESTER, JR., *Treasurer.*

January 30, 1950.

Authorizing Legislation and Initial Steps

In his first inaugural address to the Legislature on January 21, 1947, the Governor of the State of New Jersey, the Honorable Alfred E. Driscoll, included these remarks:

“In our industrial age it is hardly necessary to emphasize the importance of a properly planned highway system for the entire State. . . . Without an even and speedy flow of commerce, New Jersey, the great industrial workshop with its important agricultural and recreational area, would wither and die. Our arteries of commerce and pleasure must be protected and improved. . . . Accordingly I recommend . . . a continuation of our State program for the construction of freeways and parkways as rapidly as is practically consistent with other equally important highway needs. In view of our manifold requirements, careful consideration should be given to the proper method of financing so-called luxury roads. . . .”

On October 27, 1948, the New Jersey Turnpike Authority Act (Chapter 454, Public Laws 1948) was approved

“to facilitate vehicular traffic in the State of New Jersey by providing for the construction, maintenance, repair and operation of turnpike projects; creating the New Jersey Turnpike Authority and defining its powers and duties; providing for financing such projects by the issuance of turnpike revenue bonds of the Authority, payable solely from tolls and other revenues; and providing for the collection of tolls and other revenues to pay the cost of construction, maintenance, repair and operation of such projects and to pay such bonds and the interest thereon.”

The three Commissioners who comprise the Authority were appointed by the Governor and confirmed by the Senate as follows:

February 14, 1949 Paul L. Troast appointed a member for the term ending February 14, 1952.

March 31, 1949 George F. Smith appointed a member for the term ending March 31, 1954.

Maxwell Lester, Jr., appointed a member for the term ending March 31, 1951.

The following designations and election to offices were made:

- March 31, 1949 The Governor designated Paul L. Troast as Chairman, and George F. Smith as Vice-Chairman.
- April 5, 1949 The Authority elected Maxwell Lester, Jr., to be Treasurer.
- December 28, 1949 The Authority elected Maxwell Lester, Jr., to be Secretary.

The first meeting was held on March 31 with Commissioner Spencer Miller, Jr., and Chief Engineer Charles M. Noble, of the State Highway Department, to discuss the aims and objectives of the Authority. At that meeting Commissioner Miller assured the Authority of the full and cordial co-operation of his department. That pledge has been abundantly fulfilled.

Two supplements to the basic legislation were enacted on April 14, 1949 (Chapters 40 and 41, Public Laws 1949). One of these related to "feeder roads." It defined them as roads which, in the opinion of the Authority, would be needed to create or facilitate access to, and would increase the use of, the Turnpike; and authorized the Authority to take over certain roads, or to construct new feeder roads, subject to the provision that "no toll shall be charged for transit between points on any feeder or 'new feeder road.'" The other act specifically authorized a Turnpike project to begin "at the New York State line northerly of Alpine, New Jersey, and thence in a general southerly direction through the Counties of Bergen, Hudson or Passaic or both, Essex and Union to Middlesex County, and thence in a generally southerly and westerly direction through the Counties of Middlesex, Monmouth or Mercer or both, Burlington, Camden, Gloucester and into the County of Salem to connection with a proposed new bridge across the Delaware River at or near Deepwater, Lower Penns Neck Township, Salem County."

The discussions which were held subsequently with State Highway Department officials, were confined to the Department's projected Routes 100 and 300, or an approximation thereof, extending from the Delaware Memorial Bridge at Deepwater to Woodbridge Township and thence north, connecting with the Lincoln and Holland Tunnels, and the George Washington Bridge, since these routes would fulfill the mandate of the Legislature. It was agreed that provisions should be made to connect with future tunnels or bridges which might be contemplated by the Port of New York Authority.

In May, 1949, the Commissioners made an observation flight by airplane of the entire length of the proposed Turnpike. Later in the year they supplemented

their inspection of the proposed New Jersey Turnpike by a two-day reconnaissance, utilizing secondary roads to points of access to the contemplated alignment. They also inspected the Pennsylvania, Maine, and New Hampshire Turnpikes, and conferred with Governor Duff, members of the Pennsylvania Turnpike Commission, and the Maine Turnpike Commission.

Preliminary Engineering and Traffic and Revenue Studies

Steps were taken in April, 1949, to communicate with nationally recognized firms in the field of highway engineering to determine the desirability and practicability of suggested Routes 100 and 300 as the State's backbone highway—the New Jersey Turnpike. The Commissioners arranged, with the concurrence of the Governor and the State Highway Commissioner of New Jersey, for the services of Mr. Charles M. Noble, Chief Engineer of the State Highway Department, on a temporary or "loan" basis. They decided to divide the basic studies and investigation into three parts, (1) Engineering report on Northern Section, (2) Engineering report on Southern Section, and (3) Traffic and Revenue Report on the entire project. After thorough investigation of a number of firms as to their qualifications, availability, and current capacity, including conferences with the State Highway Commissioner, the Pennsylvania Turnpike Commission, and the Port of New York Authority, the New Jersey Turnpike Authority selected the following to prepare the preliminary engineering surveys:

Northern Section (Bonhamtown to northern terminus)

| | |
|--|--------------|
| Ammann & Whitney, Edwards & Kelcey, Frederick R. Harris, Inc., O. J. Porter & Co. | } Associated |
|--|--------------|

Southern Section (Deepwater to Bonhamtown)

DeLeuw, Cather & Co.

All of these firms are of high standing in the engineering profession, and had established themselves as experts in the field of highway design and construction or, as in the case of Ammann & Whitney, as specialists in bridge engineering.

The nationally known engineering firm of Howard, Needles, Tammen & Bergendoff, who are also experts in highway and bridge engineering, was engaged as General Engineering Consultant to the Authority in the preparation and review of all preliminary studies and reports. This firm, under the guidance of the Chief Engineer of the Authority, prescribed the general design criteria and geometric standards.

Design standards were tentatively determined upon which would serve to make the proposed Turnpike by far the best and most modern highway. The standards envisioned were prescribed with a view to capacity, safety, and attractiveness, with wide rights-of-way, and other provisions to facilitate future expansion by the construction of additional traffic lanes, in order to assure adequacy for a generation or more to come, and yet avoid any extravagance. The benefits of the design and experiences afforded by the Pennsylvania and Maine Turnpikes and many parkways and freeways were fully utilized.

Concurrently with the employment of designing engineers for the purpose of surveying prospective routes and determining costs of construction, operation, and maintenance, the Authority engaged the firm of Coverdale and Colpitts to investigate and report upon the estimated traffic which the proposed Turnpike would carry and the revenue which it could be counted upon to earn over a period of years. This firm is nationally known in its field of activity, and has established itself in financial circles as sound, reputable, and conservative.

Coverdale & Colpitts proceeded to investigate the prospective traffic by establishing traffic survey stations at strategic points on existing highways, bridges, and tunnels so as to measure both the long-distance and the local traffic which would be attracted to the Turnpike. Several hundred men were engaged on the traffic counts. All available traffic data of the State Highway Department and of the Port of New York Authority were also reviewed. These basic data were utilized to predict the traffic potentials of the Turnpike.

The final step was a study of the contribution which the Turnpike would make to economy, convenience, and safety of driving, and a preliminary recommendation as to tolls for passenger cars and the various types of trucks. The tolls which Coverdale & Colpitts proposed are as follows:

For passenger cars, \$1.75 for the full trip, with the sum of intermediate rates adding to \$2.00.

For 2-axle trucks, \$3.10 for the full trip, with the sum of intermediate rates the same.

For 3-axle single unit trucks, \$4.00 for the full trip, with the sum of intermediate rates the same.

For semi-trailer trucks, \$4.50 for the full trip, with the sum of intermediate rates adding to \$5.10.

These tolls would be the equivalent of 1.5 cents per mile for passenger cars and 3.85 cents per mile for the semi-trailer trucks. The per mile rate proposed would not be uniform. For the 90 miles south of Route 4 Parkway, the passenger car rate would be \$1.00, or 1.1 cents per mile. This is approximately the same per mile as

present tolls on the Pennsylvania Turnpike. On the northern and extremely expensive 28 miles of construction, the passenger car toll would also be \$1.00, or at the rate of approximately 3.5 cents per mile. Here, however, the passenger is given maximum advantages over competing routes. The full trip toll of \$1.75 is at the same rate per mile (1.5 cents) as is charged on the Maine Turnpike.

The proposed full-trip rate for semi-trailer trucks of \$4.50 (3.85 cents per mile) is also at the same rate per mile as is charged on the Maine Turnpike. This is less than the approximately 4.68 cents per mile rate on the Pennsylvania Turnpike. The overall rate of \$4.50 appears reasonable when it is considered that these trucks pay \$1.50 to use either the George Washington Bridge, or the Lincoln or Holland Tunnel, and in general \$1.80 on the Pennsville Ferry.

The studies show estimated total revenues in the first year of operation of \$7,686,000. Of this, \$7,150,000 is vehicle revenue from 7,600,000 vehicles. The remainder of \$536,000 is non-toll or concession revenue, obtained as a percentage of the gasoline, oil, restaurant, and miscellaneous merchandise sales. In 1975 the estimated total revenues are \$22,360,000, of which \$20,800,000 is vehicle revenue from 21,500,000 vehicles, and \$1,560,000 is non-toll or concession revenue.

Feasibility of the Project

The estimates of cost of the Turnpike submitted by the Engineers of the Authority, and concurred in by the Consulting Engineers, were:

| | |
|--|-------------------|
| Construction | \$149,030,000 |
| Reimbursement to State Highway Department for real estate, engineering, and construction completed or under-way on Route 100 | 11,150,000 |
| Real Estate | 10,145,000 |
| Engineering, Studies, Borings, Design, Supervision and Inspection | 13,600,000 |
| Administration and Legal | 1,000,000 |
| Contingencies | 22,075,000 |
| Interest During Construction | 23,000,000 |
| Total | \$230,000,000 |

These estimates, when compared with the traffic and revenue studies, indicated that an assumed bond issue of \$230,000,000 could be amortized within a period of 24 years after the Turnpike was opened to traffic, assuming all net earnings were available for interest and amortization and the bonds retired at par. If the estimated tolls were continued for a period of 35 years after the date of issuance of bonds, the debt service under these assumptions would be earned 1.62 times. The

studies showed that during the period of construction and through the first two years of operation, it would be necessary to pay interest out of principal. Amortization of bonds would start in the fifth year of operation, and there would be ample revenues thereafter.

The Commissioners had directed that all preliminary engineering reports were to be completed in the unprecedented time of four months and submitted by September 15, 1949. They were completed on schedule. Upon their receipt, and following a thorough study by the Authority, it was concluded that the project was feasible, and that it should be financed and carried to a construction stage at full speed. Copies of the reports were filed with the Governor, members of the Legislature, and principal State officials immediately thereafter.

Design and Construction

Following the above decision, and with a view to expediting the design and initiation of actual construction, the Commissioners appointed eight nationally recognized highway and bridge engineering firms to recommend the exact alignment and prepare construction plans and specifications, with an option to provide supervision and inspection services during construction.

For construction purposes, the Turnpike was divided into seven sections. Those sections, and the engineers assigned to them for design and construction are:

J. E. Greiner & Co., Section 1, from Deepwater to Woodbury, highway and structures;

Gannett, Fleming, Corddry & Carpenter, Inc., Section 2, from Woodbury to State Route 38, highway and structures;

Parsons, Brinckerhoff, Hall & Macdonald, Section 3, from Route 38 to south of Hightstown, highway and structures;

DeLeuw, Cather & Co., Section 4, from Hightstown to the south bank of the Raritan River, highway and structures;

Fay, Spofford & Thorndike, Section 5, from south abutment of Raritan River Bridge to south abutment of Morse's Creek Bridge, highway and structures;

Ammann & Whitney, Section 6, from south abutment of Morse's Creek Bridge to Belleville Turnpike; structures;

Edwards & Kelcey, Frederic R. Harris, Inc., O. J. Porter & Co., Associated, Sections 6 and 7, from south abutment of Morse's Creek Bridge to northern terminus of Turnpike at Route 6, highway;

Howard, Needles, Tammen & Bergendoff, structures from south abutment of Belleville Turnpike to northern terminus of Turnpike at Route 6, and also General Consultant to the Authority on design, supervision and inspection.

The basic design criteria which have been established to date are briefly as follows:

Traffic Lanes

Deepwater to North Camden Interchange: Initial 4 lane, ultimate 4 lane,

North Camden to Route 35 Interchange: Initial 4 lane, ultimate 6 lane,

Route 35 Interchange to Route 3 Interchange: Initial 6 lane, ultimate 8 lane,

Route 3 Interchange to Route 6 Interchange: Initial 4 lane, ultimate 6 lane.

Lane Widths—12 feet, the lanes in each direction to be flanked by a 10-foot finished shoulder on the outside, and by a 5-foot finished shoulder on the inside. (In comparison, the Pennsylvania Turnpike lanes are 12 feet wide, with a 10-foot wide outside shoulder, no inside shoulder, and a median strip 10 feet wide.)

Median Strip—a center raised mall generally 16 feet wide between the two inside shoulders, thus separating traffic moving in opposing directions by at least 26 feet.

Design Speed

Generally 70 miles per hour.

Design Load

For axle loads of more than 35,000 pounds.

Horizontal Curves

Generally flattest possible with minimum of 3,000 foot radius.

Pavement

Not yet determined upon, but to be extra heavy-duty type fully adequate to carry the anticipated load and traffic volume.

Interchanges

Total of at least 15 as shown on Exhibit attached hereto. An additional one at Carteret was under study. Maximum distances between interchanges are about 15 miles, the minimum about $2\frac{1}{2}$ miles, and the average is less than $8\frac{1}{2}$ miles.

Number of Structures

Approximately 240, consisting of bridges, overpasses and underpasses. The principal bridges, across Hackensack, Passaic, and Raritan Rivers, and Rancocas Creek, will be deck structures, without overhead steel work to interfere with vision.

Width of Right-of-Way

Normally 300 feet, and to be fenced throughout length of Turnpike. This will provide a grass strip about 100 feet wide on each side of roadway and between the paved roadway and the boundary fences. Throughout the section of the Turnpike northerly of Bonhamtown the right-of-way will be normally 250 feet wide.

Restaurants and Service Stations

As illustrated in Exhibits herewith. Buildings to be owned by Authority and operated by others on concession basis.

Communication System

Between Headquarters, interchanges, terminals, and operation and maintenance buildings.

Lighting

None along main roadway, except at interchanges, toll stations and concession locations.

Marking

Reflectorized roadway striping, and other delineations and directional signs of latest design.

With reference to pavement design, the Authority conferred during the year with representatives of the oil and asphalt interests, and of the Portland Cement Association, and heard their presentations as to the relative merits of different types of pavement. At the request of the Authority, engineering papers have been submitted by all of the interests concerned, and these will be studied and analyzed by our Engineers before final decision is reached by the Authority.

The two most expensive structures to be built along the Turnpike are the bridges to carry the Turnpike across the Passaic and Hackensack Rivers. The existing fixed bridges across the lower reaches of these rivers provide vertical clearances of 135 feet over the channels. It was the hope of the Authority that a lesser clearance would be acceptable to navigation in order to avoid excessive costs and complicated design problems. In November, 1949, Department of the Army approval was obtained of plans providing vertical clearances of 110 feet for both of these bridges.

At the end of the year the borings and soil samplings were practically completed throughout the length of the Turnpike. Right-of-way surveys and property maps had progressed to practical completion in the Southern Sections, and were about 40 per cent completed in the Northern Sections. The contract plans and specifications were completed for a short but very vital section through the properties of the Esso Standard Oil Company of New Jersey, in Linden, the work advertised, and bids received on December 20, 1949. Plans and specifications for grading and drainage contracts throughout the length of the route were nearing completion, and varied from 50 to 23 per cent completed. Plans and specifications for the major bridges across the Hackensack and Passaic Rivers were about 10 per cent completed.

A general program of advertising for contract bids on grading and drainage, bridges, and paving, had been prepared. The program indicates that there will be from 45 to 68 construction contracts for the highway proper, varying from a few hundred thousand to several million dollars in amount, depending upon the bid combinations submitted by the bidders. The classification and size of the proposed contracts will be such as to attract widespread competition and interest, and at the same time will afford local contractors in the State full opportunity to participate in construction. Prospective bidders will require pre-qualification.

Public Relations—County Meetings

By mid-November the Engineers of the Authority had progressed sufficiently in their surveys of alignment and in preliminary design to recommend an alignment of the Turnpike in each of the ten Counties through which it would pass. As an indication of the exhaustive investigation made, as many as twenty different locations were considered in the southern portion of the Turnpike route.

The Authority concluded to initiate a program of County meetings in order to present its plans to local officials for discussion before the adoption of the alignment. The meetings, ten in all, were begun late in November, and all but the one in Mercer County were conducted prior to the end of the calendar year. The latter was held on January 4, 1950. The meetings were held at the respective

County seats, and were presided over in two instances (in Salem and Gloucester Counties) by their respective State Senators, and in the other Counties by the Directors of the Boards of Chosen Freeholders, or by other officials. All were well attended. Assemblymen, members of the Boards of Chosen Freeholders, Township and other local officials, County engineers, Planning and Zoning Boards, the press, and residents of the respective Counties were in attendance. In all cases, at least one Commissioner, and other members of the staff of the Authority, were present.

The Engineers of the Authority presented maps indicating the proposed alignment and discussed in detail the plans with respect to intersecting roads, and all other features.

In general there was no marked opposition to alignment, except in Gloucester County, in the vicinity of Woodbury Heights, at East Brunswick in Middlesex County, and in the City of Elizabeth, Union County. Usually the concern expressed by local officials and property owners related to (1) closing of roads which would be intersected by the Turnpike, (2) severance of farms, (3) taking of dwellings and dispossession of occupants, (4) loss of ratables, (5) location of interchanges, and (6) desire for a greater number of interchanges and points of access to the Turnpike. A complete stenographic record of each meeting was made, and the engineers of the Authority were required to study and report upon all of the objections raised at the meetings.

Following a thorough discussion by the Engineers and the Commissioners of the objections voiced and the suggestions made, a number of modifications in plans were directed with a view to meeting local wishes to the maximum extent without unreasonable financial burden to the Authority. The County meetings were of major significance in resolving most of the important issues pertaining to alignment.

Public relations material, explaining the plans of the Authority, the benefits the Turnpike will confer, and its special features have been well received by all media of communication. Practically every newspaper in New Jersey has carried messages about the Turnpike and informational material has been published in newspapers in Pennsylvania, Delaware, New York, the New England States, in Washington, D. C., and at various times in other States. Several national business and financial publications, engineering and construction magazines, special economic, automotive, petroleum and travel publications also have carried articles. Radio stations have used material, and a number of addresses have been delivered before civic and business organizations.

Real Estate

The cost of lands, easements and rights-of-way, including all improvements and severance damages, was estimated in the preliminary report to be \$10,145,000.

In the 118 miles of right-of-way, generally 300 feet in width in the southerly part and 250 feet in width north of Bonhamtown, a total of about 335 dwellings and some 145 other buildings and improvements will be affected. By far the major portion of the dwellings to be taken are located in the City of Elizabeth, and after long and exhaustive study of all possible routes, the Authority has not been able to find a location for the Turnpike which would improve upon the one selected by the State Highway Department and agreed to by City of Elizabeth officials in 1946 after ten years' study and discussion of alternate routes.

Many of the homes to be affected can be salvaged and moved from the right-of-way. Where this is possible the owner will be afforded opportunity to repurchase the building or improvements at a salvage price which should encourage the owner to take advantage of this opportunity. Severance of farm lands and other properties will be held to a minimum. Great care was exercised in the location surveys to assure that the alignment avoid, so far as possible and without exceeding the design limitations of curvature and grade, any unnecessary taking of property or severance damages.

Full compensation will be paid promptly for all damages incurred and properties to be taken.

By the end of 1949 the property maps and tabulation of owners of record were nearing completion. The County meetings referred to in the preceding section disclosed that many property owners had become apprehensive of the location surveys, borings, and other activities which had been carried on by field engineering parties, and since no contacts with owners had been made except for permission to enter the lands for those purposes, numerous questions were asked concerning the schedule for the actual purchase of the lands.

Previously there had been brought to the attention of the Commissioners a few cases in which survey parties had, through oversight, inadvertance, or misunderstanding, trespassed upon the properties of certain landowners. Strict instructions were issued to prevent any recurrences and to appraise any damages caused in order that just compensation could be paid to the owners.

With respect to acquisition, it might be well to note in this report that shortly after adoption of the alignment, and upon completion of the property maps, arrangements will be made for the appraisals of lands and improvements, to be followed by negotiations for purchase. In the event crops are planted and subse-

quently destroyed by construction operations, a fair and reasonable payment will be made in addition to payment for the land itself.

In view of the lack of funds brought about by the decision of the Supreme Court, to be discussed in a later section of this report, the acquisition of rights-of-way was not initiated in 1949. Appraisals and negotiations are now scheduled to begin in February 1950.

Finances

Methods of financing the construction of the Turnpike have been under study almost from the date of the appointment of the Commissioners in the spring of 1949. The problem became realistic when the preliminary engineering and earnings reports were completed in September, and the project was shown to be economically sound. The sale of bonds to the public, to banks, to the Reconstruction Finance Corporation, to insurance companies, and in fact every known means of financing was explored by the Commissioners. The objective was not only to find some means to finance such a vast undertaking, but to select one which would provide the best possible terms.

Representative bond houses reviewed the preliminary engineering, traffic and revenue reports of the Engineers and, in subsequent discussions with the Commissioners, stated that in order to provide for the reserves and financing costs usual in public borrowings of this type, it would probably prove necessary to increase the issuance of the Authority's Revenue Bonds from the \$230,000,000 then contemplated to a total amount between \$242,000,000 and \$245,000,000, depending upon market conditions prevailing at such time as the bonds might be offered for sale.

The Commissioners were particularly concerned by several factors which developed from these discussions, namely:

It appeared virtually certain that competitive bids could not be obtained for the bonds.

The reserves referred to above would amount to approximately \$7,500,000.

Underwriting fees and other financing costs would amount to approximately \$6,000,000.

Interest during construction (3 years allowed) would range between \$21,000,000 and \$24,000,000.

The Authority then studied the possibilities of financing on a "forward commitment" basis which would enable it to obtain reliable commitments for its total

financing requirements; provide for the issuance of bonds and payment of interest thereon as construction progressed and the need for funds actually arose, and for the payment of a nominal stand-by fee on the balance of the Authority's total requirements.

The Authority pressed for this method of financing and met with prominent banking groups, the Reconstruction Finance Corporation and finally with some of the larger insurance companies.

The legal firm of Hawkins, Delafield & Wood has been acting as Bond Counsel and advisor to the Authority since May 10, 1949. On November 29, 1949, Smith, Barney & Co., one of the country's leading investment specialists, was retained at a relatively modest fee by the Authority as Financial Advisor. This firm has since carried forward the negotiations initiated by the Authority with prospective purchasers of its financing and has assisted the Authority in the development and completion of definitive arrangements for its financing.

A definite financing plan based on forward commitments was developed by the Authority and active negotiations were commenced with a broad list of institutional investors, with the result that before the close of the year the Authority had obtained satisfactory assurances, within the framework of that "forward commitment" plan, covering the total amount of its permanent financing requirements.

Under the plan as finally evolved, the bond issue will be reduced to a maximum of \$220,000,000 or at least \$22,000,000 less than it was estimated would be required were the financing to be effected through the normal channels of public distribution. The forward commitment features of the plan also obviate the necessity of financing some \$18,000,000 of reserves for contingencies until and only to the extent that such reserves may be needed to complete construction. If such contingencies should not materialize the total amount of the bond issue may be further reduced to less than \$202,000,000.

This plan involves commitments from a group of some fifty institutional investors for the full amount required of \$220,000,000 at a stand-by fee of $\frac{1}{2}$ of 1 per cent. As funds are needed for construction, the Authority will draw against these commitments, issuing its bonds therefor. The bonds will bear interest at the rate of $3\frac{1}{4}$ per cent annually and will be allocated on a pre-determined basis to the subscribing institutions.

The first call privilege on the bonds for the purpose of refunding or redemption as a whole is ten years after their date of issuance or some 7 to 8 years after the Turnpike is expected to begin operations. Such redemption would be effected

initially at a premium of 3 per cent and at reduced premiums thereafter until 1975 when the bonds would become callable for any purpose without premium. The bonds are redeemable from earnings at any time after their issuance without premium through operation of the Sinking Fund.

The Commissioners are confident that this plan provides the best financing terms available for a project of this type and magnitude and that it establishes a new means of achieving large scale construction for the public benefit through the use of private capital which may well set a pattern for comparable future undertakings in New Jersey and in other States.

The authorizing legislation provides that the Authority may, by resolution, issue bonds for its corporate purposes including the refunding of its bonds. The principal of, and the interest on, any issue are to be payable solely from and be secured only by a pledge of tolls and revenues. The legislation specifically provides that the faith and credit of the State are not pledged, and that the revenue bonds shall contain on the face thereof a statement to these effects.

There is thus no recourse by bondholders upon the State or its political subdivisions. The security of the bondholders' investment depends entirely upon the economical and speedy completion of the Turnpike and the adequacy of revenues to be derived therefrom.

*Supreme Court Opinion on Constitutionality of Turnpike Authority Act—
Need for Amendatory Legislation*

The Turnpike Authority in the summer of 1949 filed a complaint in the Law Division of the Superior Court for a declaratory judgment to determine the constitutionality of the Turnpike Authority Act. An opinion was desired primarily with respect to those provisions relating to the issuance of revenue bonds with which to finance the project, and whether such a bond issue would be in violation of the provisions of Article VIII, Section II, paragraph 3 of the Constitution of 1947, the pertinent portion of which reads as follows:

“3. The Legislature shall not, in any manner, create in any fiscal year a debt or debts, liability or liabilities of the State, which together with any previous debts or liabilities shall exceed at any time one per centum of the total amount appropriated by the general appropriation law for that fiscal year, unless the same shall be authorized by a law for some single object or work distinctly specified therein. Regardless of any limitation relating to taxation in this Constitution, such law shall provide the ways and means, exclusive of loans, to pay the interest of such debt or liability as it falls due, and also to pay and discharge the principal there-

of within thirty-five years from the time it is contracted; and the law shall not be repealed until such debt or liability and the interest thereon are fully paid and discharged. No such law shall take effect until it shall have been submitted to the people at a general election and approved by a majority of the legally qualified voters of the State voting thereon”

The case was carried to the State Supreme Court which, in an opinion delivered on December 5, 1949, sustained the constitutionality of all of those provisions of the Act, and ruled that the Authority had the power to issue Turnpike revenue bonds. It held, however, that the Authority was without power to condemn *State* property, and that the State Highway Department could not advance funds to the Authority, or use them itself for studies and engineering investigation and services relating to the Turnpike project.

The decision was of great importance in sustaining the validity of the revenue bond provisions of the authorizing Act, but made it necessary that the Authority seek some means of financing pending the sale of its revenue bonds. This difficulty was overcome shortly after the close of the year, and funds became available to cover operating expenses until the principal issue is sold, and to repay the State Highway Department the \$1,000,000 advanced by it. (This sum was repaid on January 6, 1950.)

The negotiations with prospective buyers of the bonds emphasized the advantages to be gained by, and in fact the imperative need for, amendatory legislation. During the period of construction the Authority will have no revenue, and for the first year of operation an insufficient amount with which to pay the interest on bonds. On projects financed through the sale of revenue bonds it has been customary to utilize proceeds from the sale to pay interest during initial stages and until revenues are established. While this right has never been challenged the prospective buyers in the case of the New Jersey Turnpike, in view of the magnitude of the prospective issue, required clarifying legislation.

It was necessary also to strengthen the powers of the Authority so as to obtain possession of lands for construction at the commencement of proceedings in condemnation rather than after an award had been made and title obtained. The Authority desired no unusual powers but simply ones comparable to those granted the State Highway Department, the Port of New York Authority, and the State Housing Authority, where it had been recognized that inability to gain quick access to properties required for construction could delay completion of a project by months or even years. The powers requested were to be exercised only in the event negotiations with owners for the purchase of property failed, and where possession was required in order not to delay construction. In the event the procedure to take possession was exercised, the Authority would be required not only to de-

posit in Court the estimated compensation but to create a special trust fund in double the amount of the deposit to assure that funds for payment of just compensation as determined by the Court would be available.

It became evident also that the northern terminus of the project should be at State Highway Route 6 rather than at Alpine, New Jersey. This modification was also required by prospective investors to define the limit of use of the funds.

Turnpike Staff and Organization

Until mid-September, the paid staff of the Authority comprised only five employees; namely, the Chief Engineer, the Recording Secretary, the Director of Public Information (primarily because of the importance of "conditioning" the investment public to an understanding of the project), and two clerk-stenographers. Since completion of the preliminary engineering surveys, and with the approach of actual construction of the project, the staff has increased. As of the end of 1949 it consisted of the following:

Executive Director — W. W. Wanamaker

Appointed December 5, 1949

Chief Engineer — Charles M. Noble

On loan since May 23, 1949, from State Highway Department

Recording Secretary — Mrs. Lillian M. Schwartz

Temporary appointment April 6, 1949

Permanent appointment November 6, 1949

Director of Public Information — Henry E. Rose

Appointed June 13, 1949

Real Estate Consultant — Thomas R. Lowrie

Appointed November 2, 1949

Engineers and Administrative Personnel totalling 17 employees.

In addition to the above, Mr. Augustus C. Studer, Jr., was appointed on June 16, 1949, as Counsel in a consulting capacity.

The Executive Office of the Authority was established in the State House. This space served until November, 1949, as the meeting place for the Commissioners and as the office for the staff. In early November approximately 8,000 square feet of additional office space were rented at 65 Prospect Street, in Trenton. The Executive Director and the Administrative, Real Estate and Engineering staffs have their offices in that building and it will be adequate as a temporary office until the Administration Building for the Turnpike is constructed. The Executive Offices are maintained in the State House at Trenton.

A total of 41 meetings of the Commissioners was held in the nine months period from the date of their appointment to the end of the year. The Record of the Authority comprised 268 pages and 564 documents as of December 31, 1949.

It is intended that the directing staff be left small in number, and that engineering study and design, real estate acquisition, and construction, be performed to the fullest extent possible by private contracts.

Progress and Conditions at End of 1949

The Authority believes that the progress made in the nine months of the year 1949 since its organization, has been almost unprecedented in speed and scope. Through the employment of eight engineering firms, including one in the capacity of General Consultant, and the Chief Engineer of the Authority, the entire 118 miles of the proposed route were placed in the survey and design stage simultaneously.

More than 600 engineers, surveyors, draftsmen, computers and other craftsmen, practically all of whom were New Jersey residents in private employment, were engaged continuously for several months on this work. Of the approximately \$730,000 spent in the year, 95 per cent was for surveys, borings and engineering design, and the Authority operated with almost negligible overhead and administrative costs. The services of the Division of Budget and Accounting of the Department of the Treasury of the State were engaged on a reimbursement basis to audit and disburse funds for the Authority.

At the year's end the first construction contract, for the grading and drainage of eight-tenths of one mile of highway through the Esso Standard Oil Company of New Jersey in Linden, had been advertised and a favorable bid received. The bid was within a few per cent of the estimate of the Authority's engineers.

The funds available to the Authority in the year 1949 consisted of an advance of \$1,000,000 from the State Highway Department, which was repaid by the Authority on January 6, 1950. A total of \$728,011.98 was expended during the year, and a financial statement and audit are included in the Exhibits with this report.

Program for 1950 and 1951

The program for 1950 is a stupendous one. The alignment of the Turnpike was adopted on January 30, 1950. The financing of the project is scheduled for completion in early February.

Contracts for grading and drainage and minor structures throughout the ten counties will be advertised, and it is expected that contracts will be awarded in all sections by about March, 1950. Contracts also will be awarded in early 1950 for the substructures of the major bridges across the Hackensack, Passaic and Raritan Rivers. The engineering design will be continued at full speed throughout the year and construction will begin on the superstructures of bridges, paving, and completion of interchanges, by the fall of 1950, and on service stations, restaurants and operation and maintenance buildings either before the end of 1950, or early in 1951. In the year 1950 about \$75,000,000 should be expended, and nearly all of the actual cost of construction obligated in construction contracts. In addition the rights-of-way should be acquired except in condemnation cases where the titles may not have passed to the Authority and final judgment may not have been rendered by the Courts.

The program for 1951 includes the completion of all contracts for the construction of the roadway proper, including all bridges and the construction of all buildings and utilities for the operation and maintenance of the project. Notwithstanding the delays occasioned by the opinion of the Supreme Court, which prevented the continued use of State Highway funds pending the completion of permanent financing, and barring unusual weather conditions and unforeseen contingencies, it is hoped that the Turnpike will be completed on schedule in November, 1951.

ROBERT H. GULLIVER AND COMPANY
CERTIFIED PUBLIC ACCOUNTANTS
REGISTERED MUNICIPAL ACCOUNTANTS
BROAD STREET BANK BUILDING
TRENTON, NEW JERSEY

February 4, 1950.

*The New Jersey Turnpike Authority,
65 Prospect Street,
Trenton, New Jersey.*

GENTLEMEN:

We have audited the cash transactions of

THE NEW JERSEY TURNPIKE AUTHORITY

from June 6, 1949, when the first cash advance was received from the New Jersey State Highway Department to December 31, 1949.

We examined bank statements, cancelled checks and the payee endorsers, also the supporting voucher warrants as to correct amounts, names of vendors, propriety of affidavits, official approvals for payment, and propriety of account charged. We have verified balances at December 31, 1949, of cash balance in bank of \$271,988.02 and the \$1,000,000.00 balance of advances from New Jersey State Highway Department. All records were found to be meticulously correct and in order.

We hereby certify that the attached statements

BALANCE SHEET AT DECEMBER 31, 1949

CASH RECEIPTS AND DISBURSEMENTS, JUNE 6 TO DECEMBER 31, 1949

agree with the books and records and, in our opinion correctly present the cash position of the Authority at December 31, 1949, and the cash receipts and disbursements for the period ended that date.

Respectfully submitted,

ROBERT H. GULLIVER AND COMPANY,

By R. H. GULLIVER.

NEW JERSEY TURNPIKE AUTHORITY

BALANCE SHEET, DECEMBER 31, 1949

ASSETS

| | |
|---|----------------|
| Cash | \$271,988.02 |
| Preliminary Expenses chargeable to future tolls | 728,011.98 |
| | \$1,000,000.00 |

LIABILITIES

| | |
|---|------------------|
| Due New Jersey State Highway Department | \$1,000,000.00 * |
| | \$1,000,000.00 |

* This sum was repaid January 6, 1950.

NEW JERSEY TURNPIKE AUTHORITY

CASH RECEIPTS AND DISBURSEMENTS

JUNE 6, 1949 TO DECEMBER 31, 1949

Receipts

| | |
|--|----------------|
| Advance from New Jersey State Highway Department | \$1,000,000.00 |
| | \$1,000,000.00 |

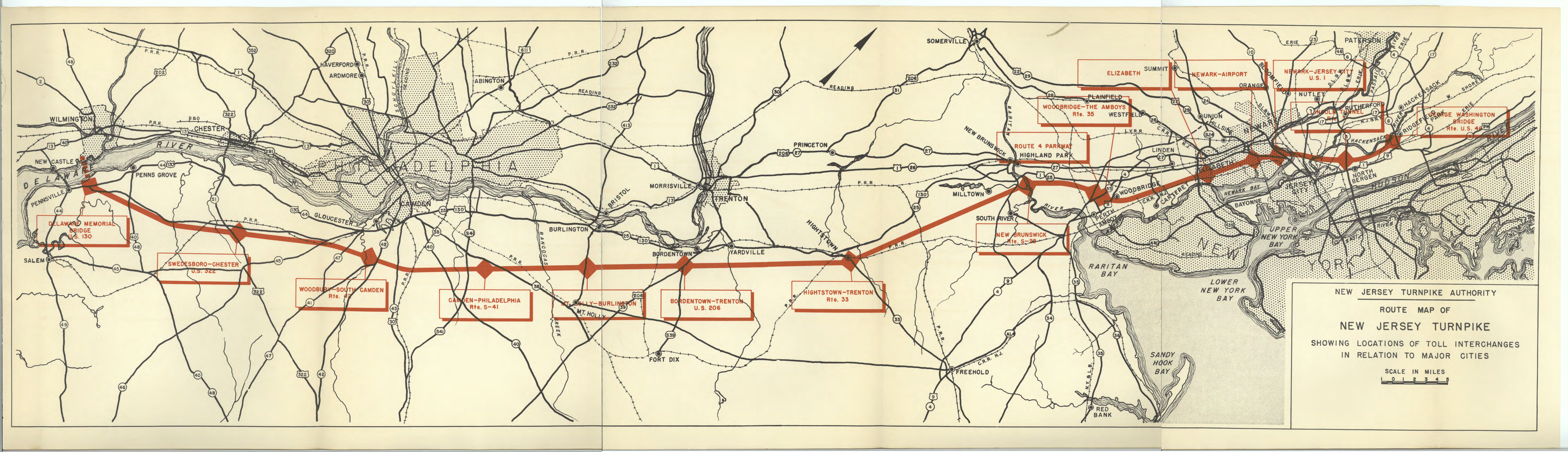
Disbursements—Preliminary Expenses

| | |
|--|----------------|
| Salaries | \$20,281.66 |
| Transcript of Statutory Proceedings | 2,886.00 |
| Engineering Fees | 688,416.60 |
| Public Relation Services | 1,508.03 |
| Stationery and Office Supplies | 3,157.81 |
| Travel Expense | 407.86 |
| Advertising | 22.50 |
| Subscription and Membership Dues | 48.20 |
| Administrative Expenses | 1,475.15 |
| Postage | 286.16 |
| Miscellaneous Expense | 449.84 |
| Authority Meetings | 720.82 |
| Office Furniture, Fixtures and Equipment | 8,351.35 |
| | \$728,011.98 |
| Total Disbursements | \$728,011.98 |
| Cash in Bank December 31, 1949 | 271,988.02 |
| | \$1,000,000.00 |

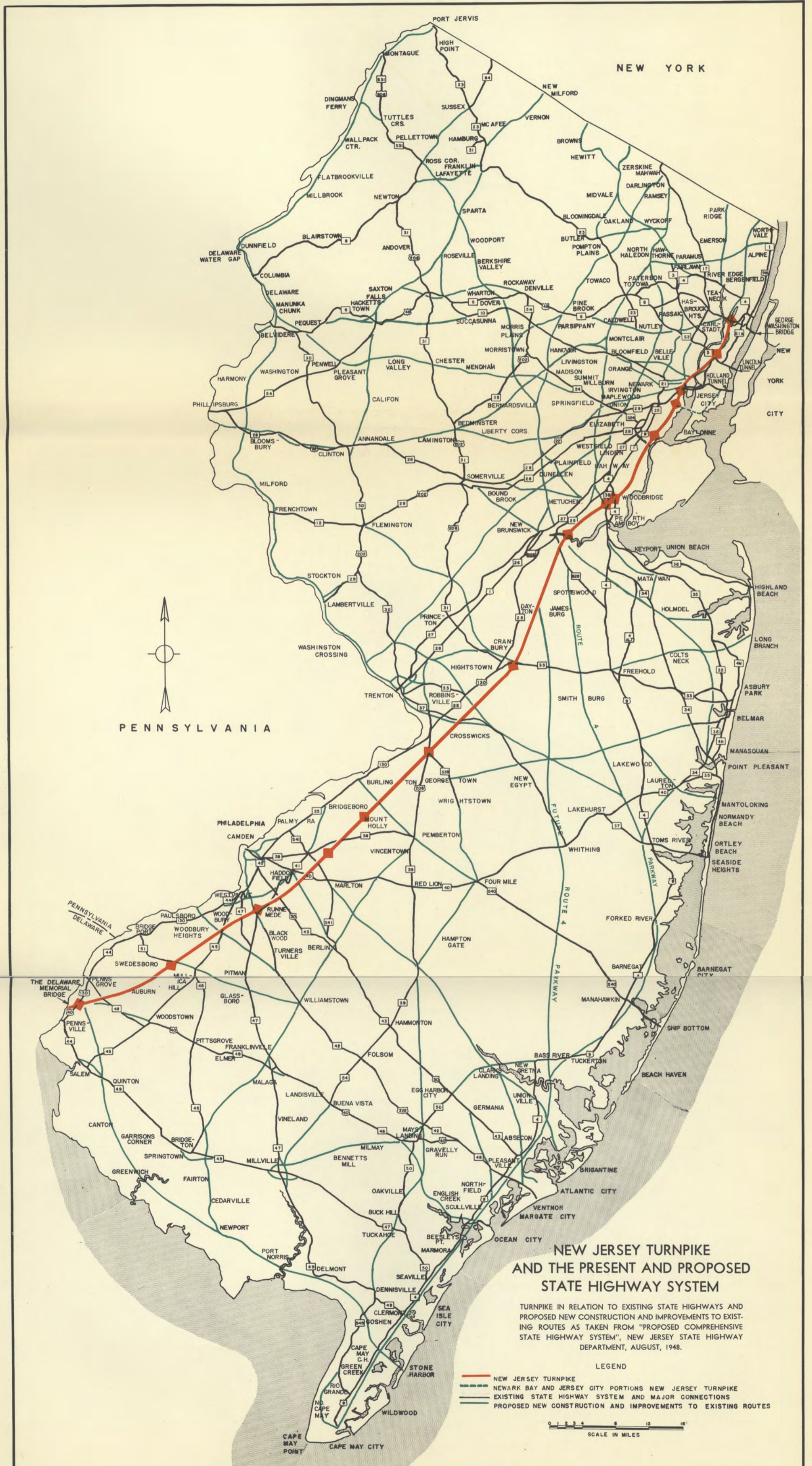
LIST OF EXHIBITS

*(These exhibits have been reproduced from the Engineers' Reports
in order to avoid unnecessary expense.)*

1. New Jersey Turnpike Alignment and Toll Interchanges.
2. New Jersey Turnpike and Present and Proposed State Highway System.
3. New Jersey Turnpike and other Expressways and Major Highways.
4. Estimated Completion Schedule of other Turnpikes and Major Highways.
5. Toll Collection Booth.
6. Aerial Perspective of Restaurant and Gas Station.
7. Perspective of Restaurant near Route 35.
8. Toll Interchange at Route 35.
9. Typical View of Turnpike north of Camden-Philadelphia Interchange showing cross-road bridge.
10. Traffic Congestion on New Jersey State Route 25.



NEW JERSEY TURNPIKE AUTHORITY
 ROUTE MAP OF
 NEW JERSEY TURNPIKE
 SHOWING LOCATIONS OF TOLL INTERCHANGES
 IN RELATION TO MAJOR CITIES
 SCALE IN MILES
 0 1 2 3 4 5



NEW YORK

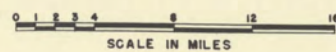
PENNSYLVANIA

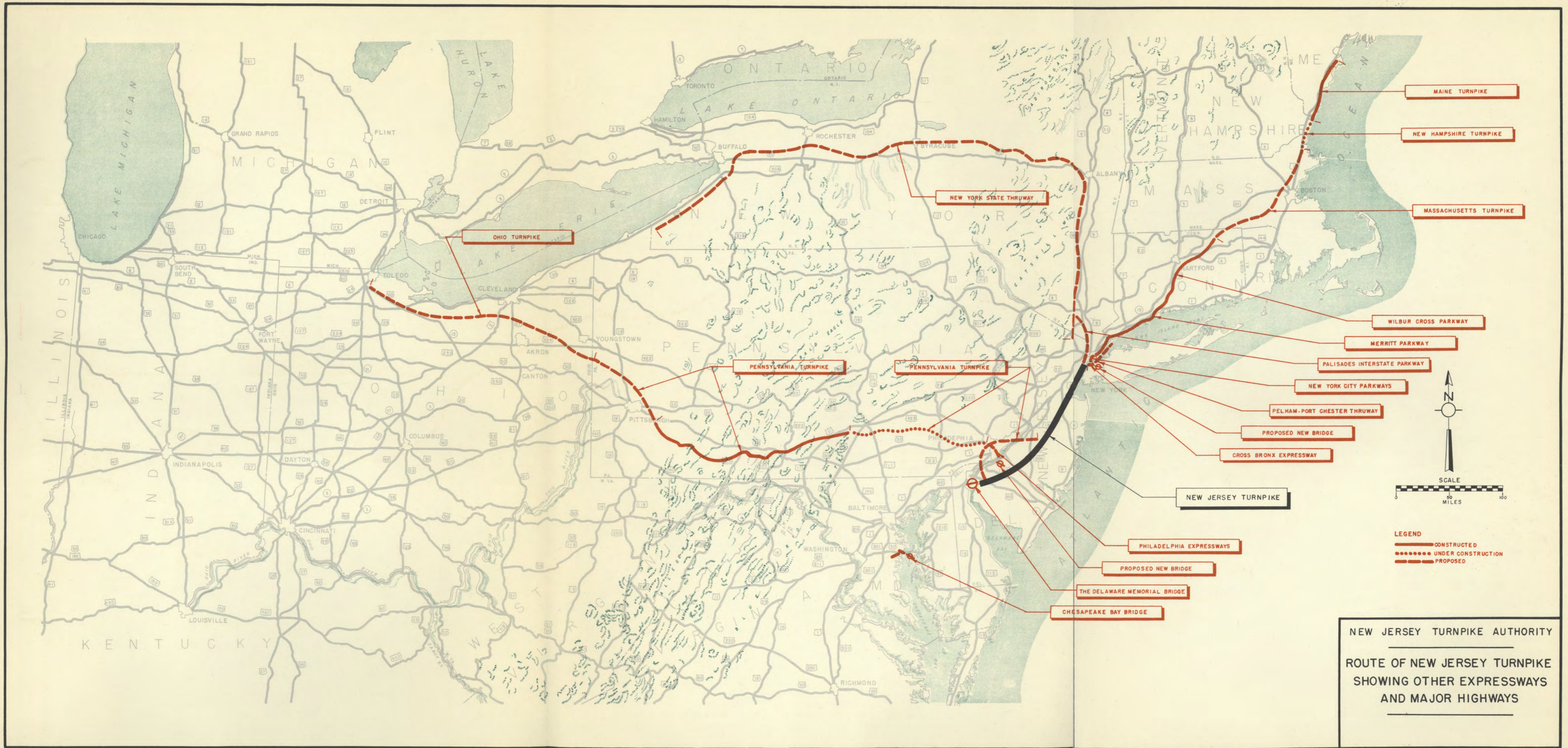
**NEW JERSEY TURNPIKE
AND THE PRESENT AND PROPOSED
STATE HIGHWAY SYSTEM**

TURNIPIKE IN RELATION TO EXISTING STATE HIGHWAYS AND PROPOSED NEW CONSTRUCTION AND IMPROVEMENTS TO EXISTING ROUTES AS TAKEN FROM "PROPOSED COMPREHENSIVE STATE HIGHWAY SYSTEM", NEW JERSEY STATE HIGHWAY DEPARTMENT, AUGUST, 1948.

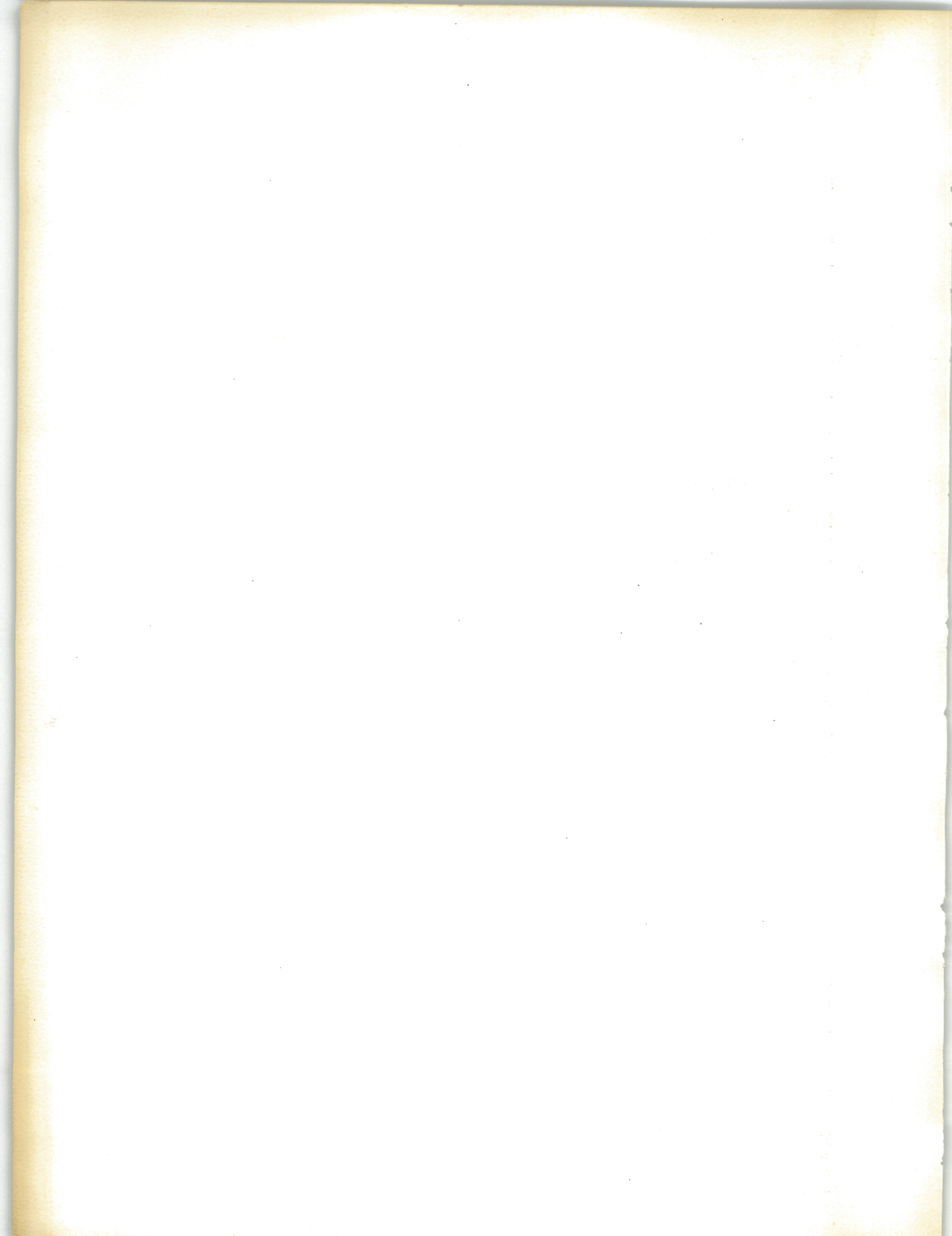
LEGEND

- NEW JERSEY TURNPIKE
- NEWARK BAY AND JERSEY CITY PORTIONS NEW JERSEY TURNPIKE
- EXISTING STATE HIGHWAY SYSTEM AND MAJOR CONNECTIONS
- PROPOSED NEW CONSTRUCTION AND IMPROVEMENTS TO EXISTING ROUTES





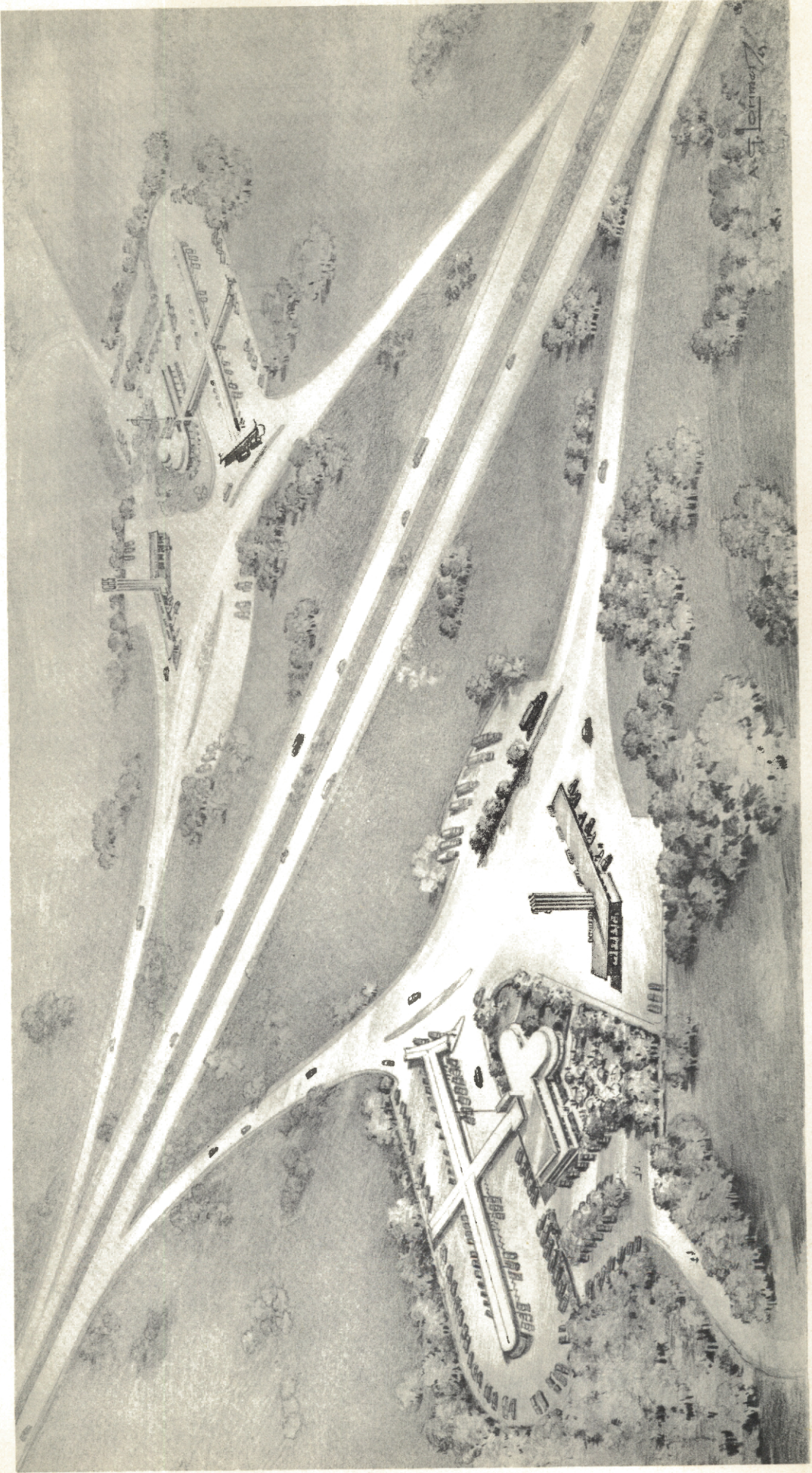
NEW JERSEY TURNPIKE AUTHORITY
 ROUTE OF NEW JERSEY TURNPIKE
 SHOWING OTHER EXPRESSWAYS
 AND MAJOR HIGHWAYS



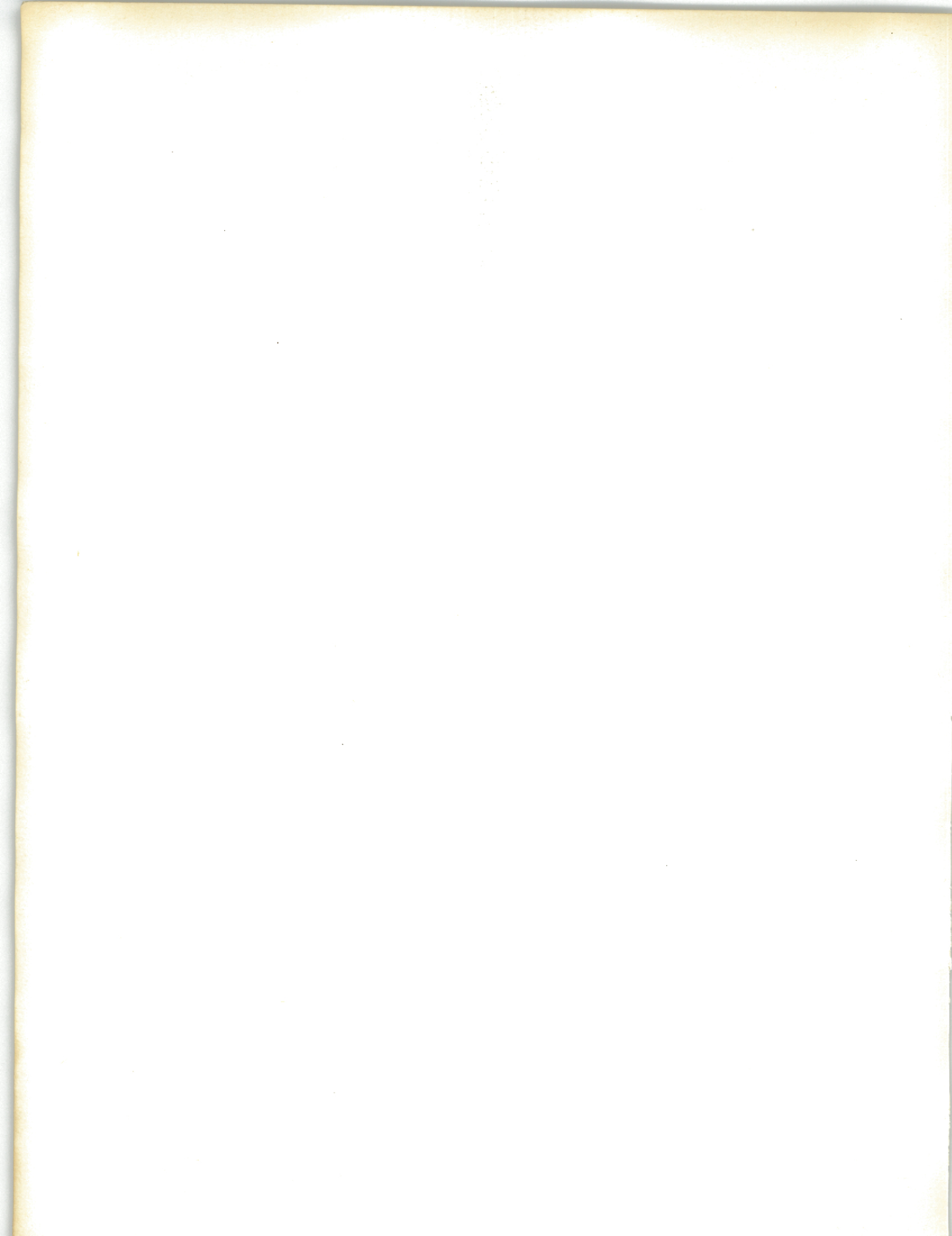


TOLL COLLECTION BOOTHS

Asplinger

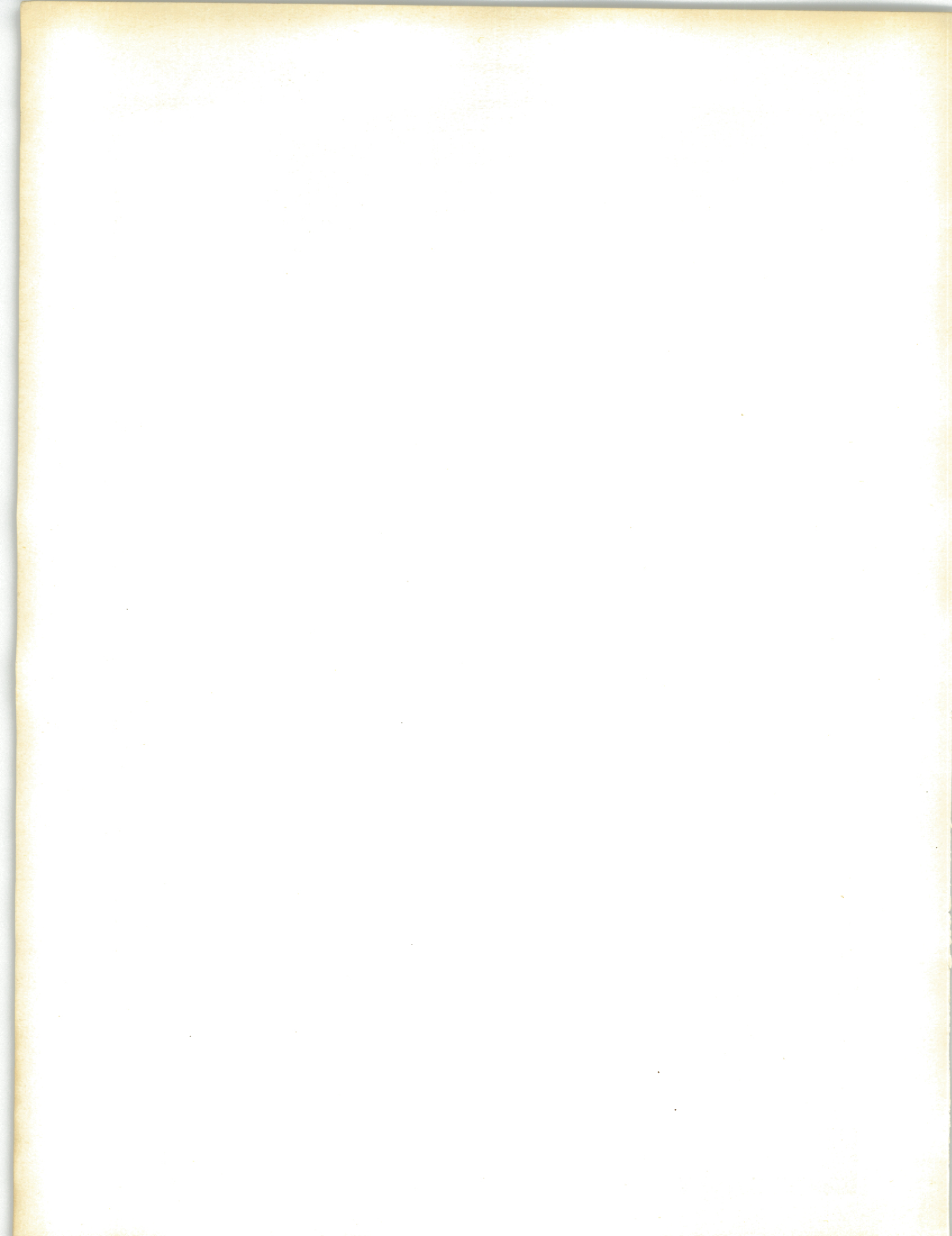


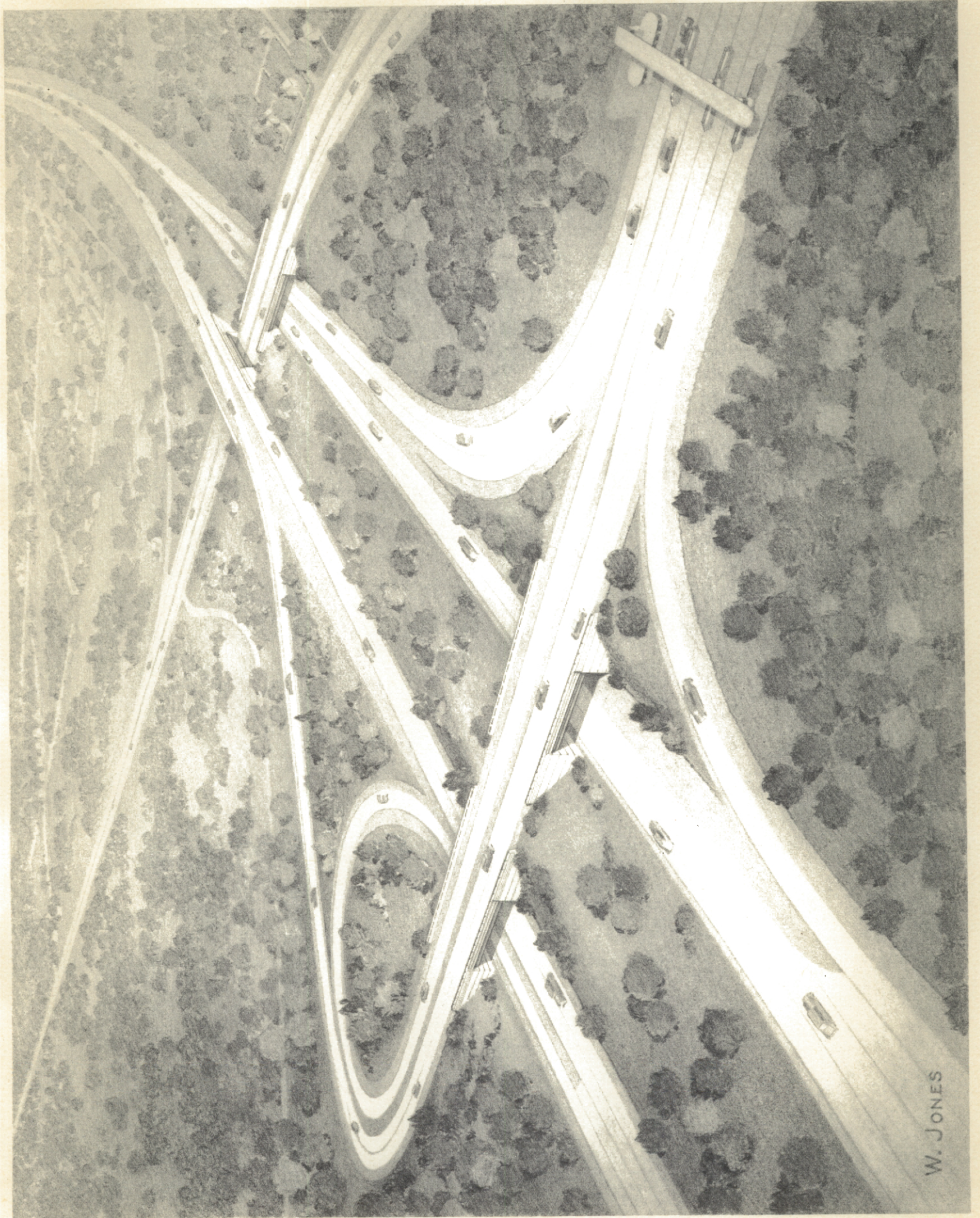
AERIAL PERSPECTIVE OF RESTAURANT AND GAS STATION





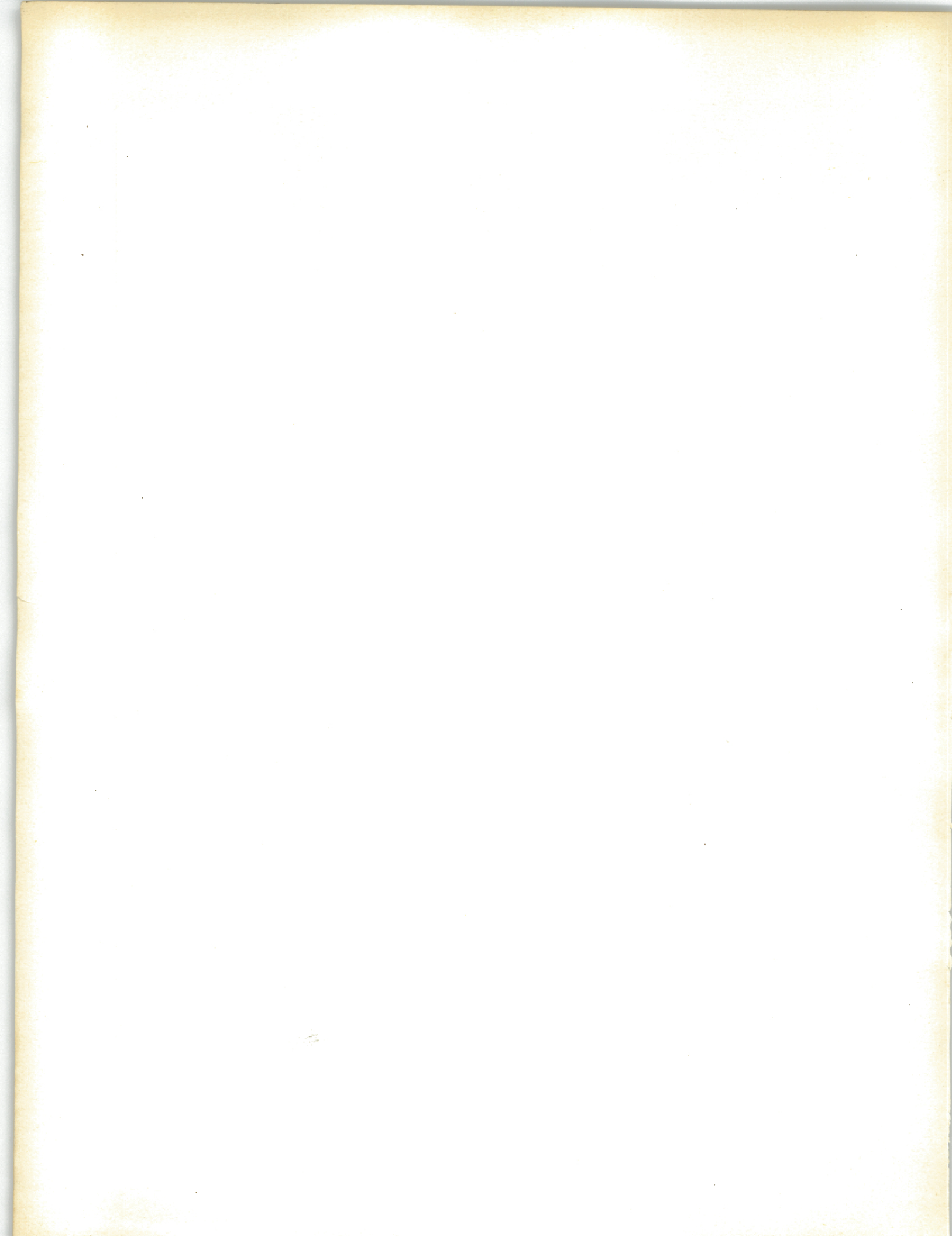
PERSPECTIVE OF RESTAURANT NEAR ROUTE 35

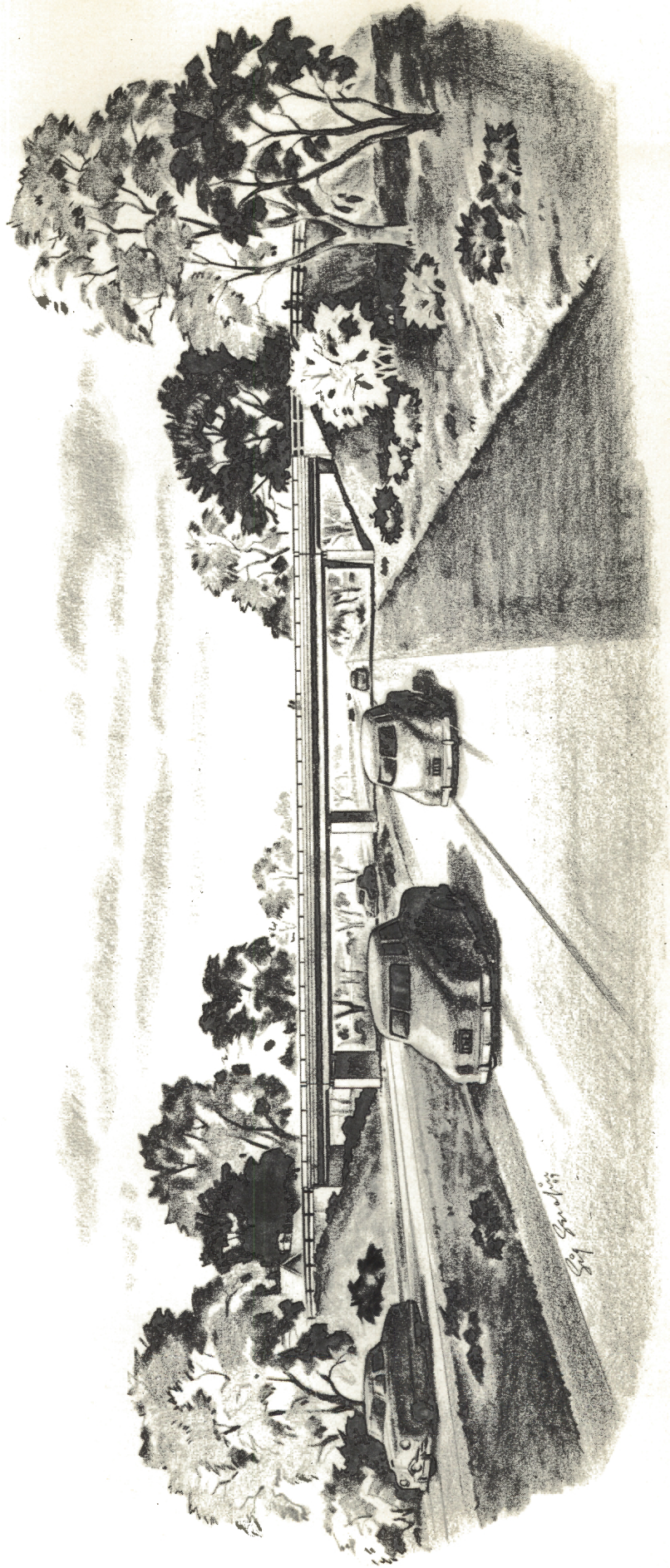




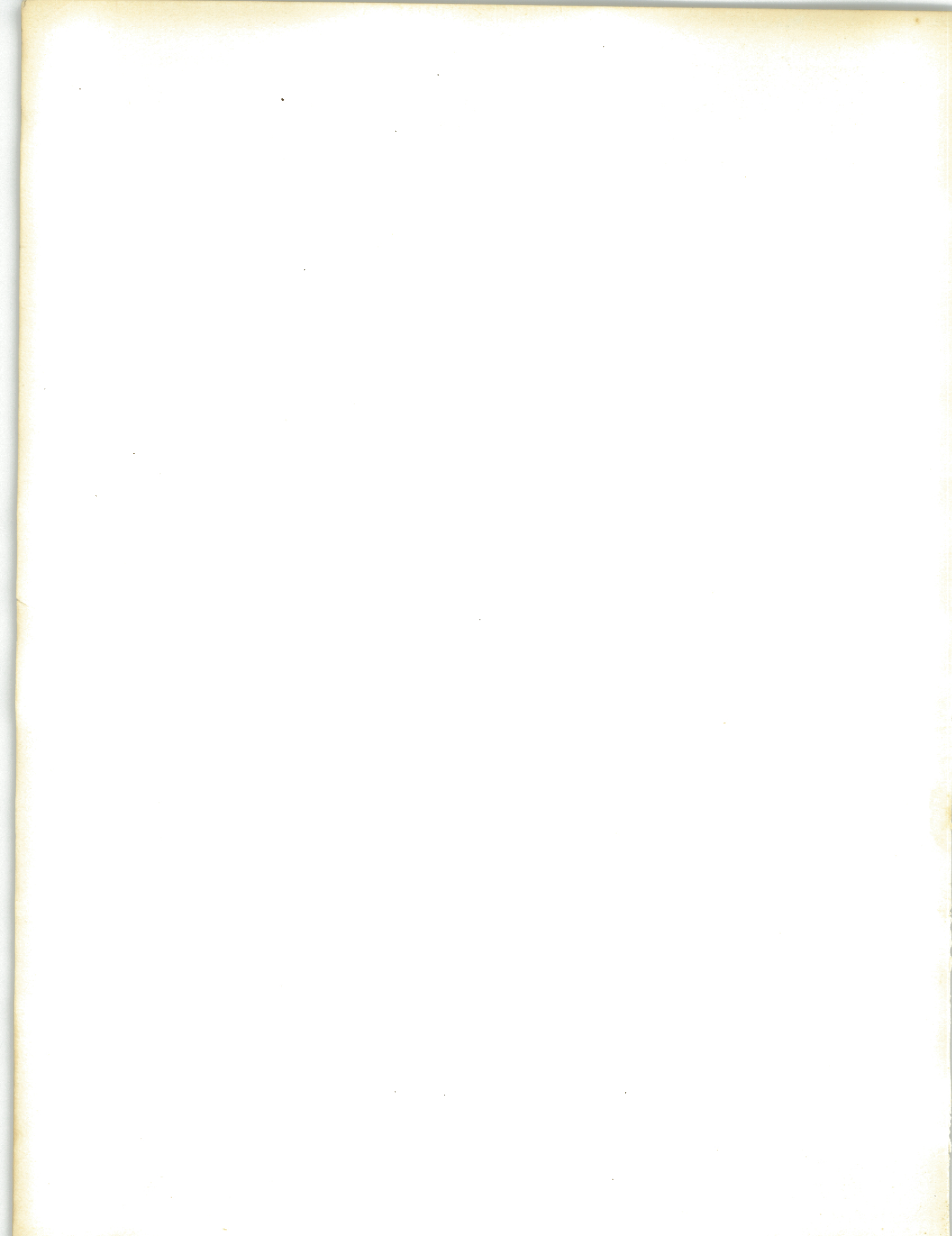
W. JONES

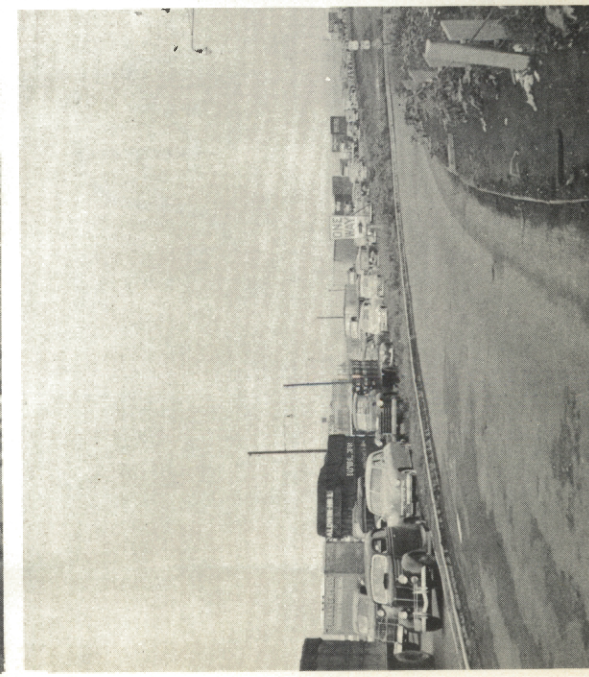
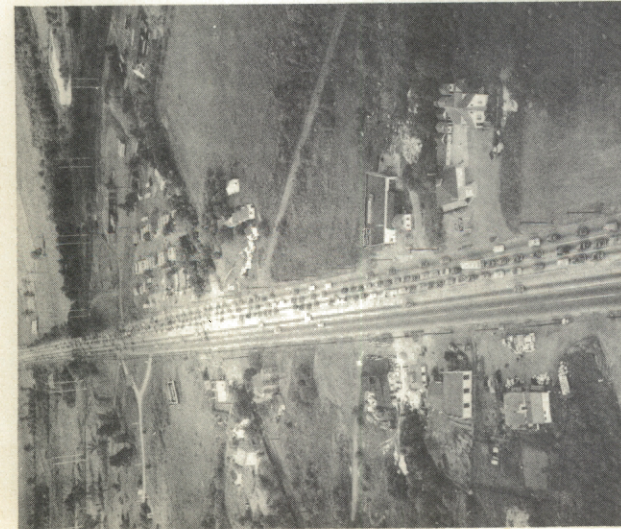
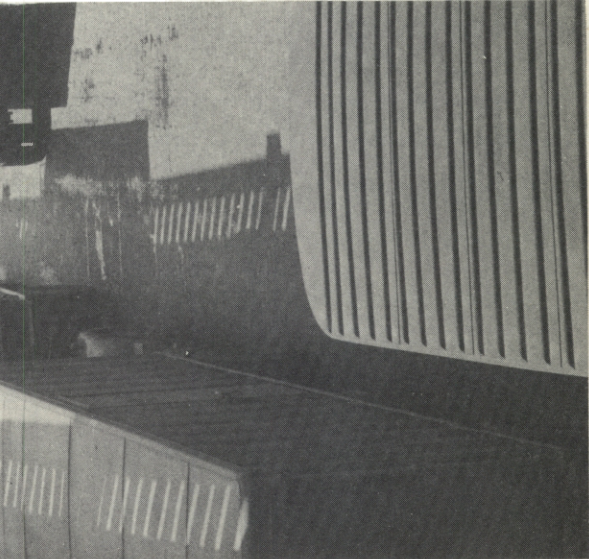
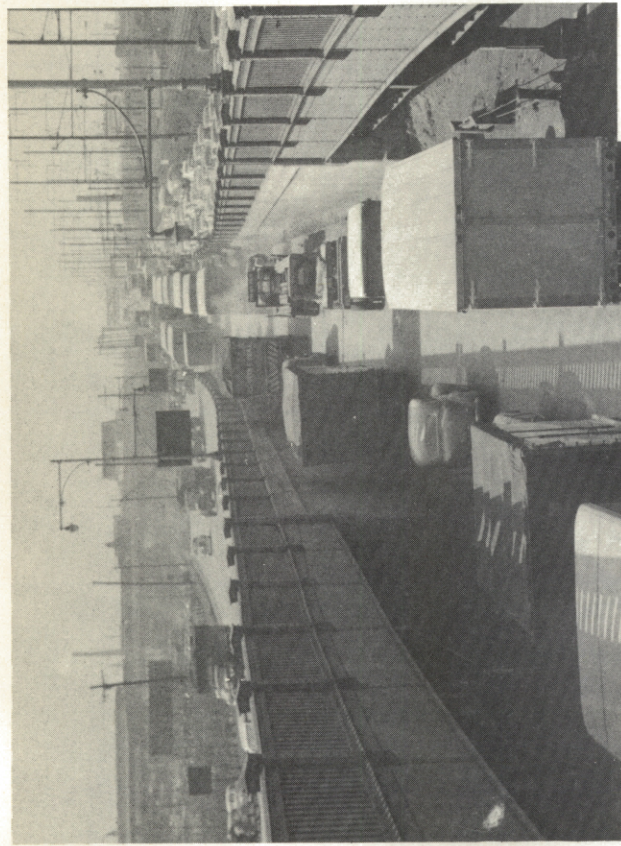
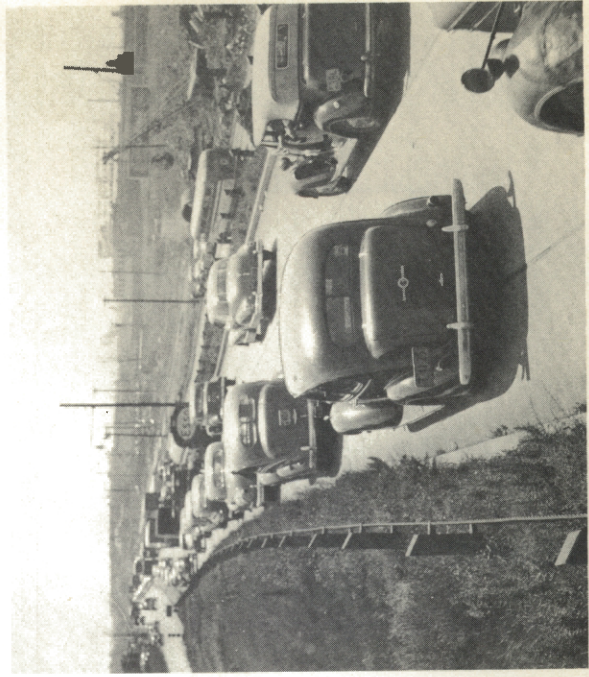
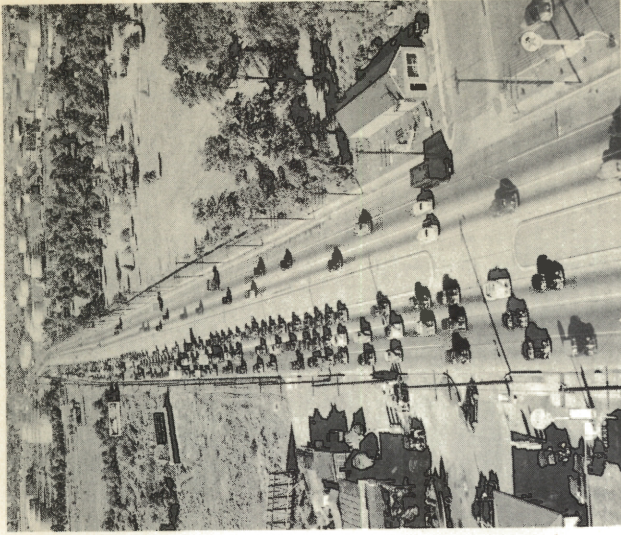
TOLL INTERCHANGE AT ROUTE 35





TYPICAL VIEW OF TURNPIKE NORTH OF NORTH CAMDEN INTERCHANGE SHOWING CROSSROAD BRIDGE





TRAFFIC CONGESTION ON NEW JERSEY ROUTE 25

