just out of college and put him in a position of this kind and expect him to be prepared to handle properly all situations that may confront him is absurd. The inspector, before being put in this position, should have worked under an older and more experienced man where he has had ample opportunity to gain experience, confidence, and complete knowledge of the specifications under which the work is being done. No set of specifications can be made to cover all the details that may come up in the course of construction, and for this reason the inspector is sometimes called upon to make decisions without having the opportunity of consulting his superiors.

Usually the young inspector, out on his first job and anxious to make good, will be inclined to interpret the specifications too literally and in this way may work a hardship on the contractor without gaining any advantage for his employer. Most contractors welcome a competent inspector who has had previous experience and who possesses good sound judgment, for they know then what to expect and can proceed with the work with confidence. There are some contractors, however, who have little faith in the engineering profession, and who are inclined to ridicule certain clauses in the specifications which they consider as stumbling blocks. It is in handling such cases that a good practical inspector is necessary to procure a first class job. The inspector is called upon to use sound judgment backed by a thorough knowledge of the specifications and he must have the courage to make the contractor meet the requirements of the contract.

USES AND ABUSES OF THE THREE-MILE ROAD LAW
By O. M. Darling, Allen County Surveyor

The general public confuses the Three-Mile Road Law with the County Unit Road Law. I have found this to be true in a number of cases when talking to people who are considered to be well informed persons in my community. In Allen County we have used the County Unit Road Law quite extensively and I hear numerous people condemning the Three-Mile Road Law for causes and effects which are due to the former entirely. Let us, as county engineers, endeavor to explain to the people in our counties that the Three-Mile Road Law is a law used to build roads for which only the township or townships in which the roads are situated pay the costs. Recently I heard one supposedly well informed gentleman in our county say that the Three-Mile Road Law should be repealed. He did not see why the city of Fort Wayne should pay for building a road out at Monroeville. Repealing the Three-Mile Road Law would not repeal the law under which the road he had in mind was built. This road was built under the County Unit
Road Law. Taxpayers just don't seem to understand that these are two separate laws, enacted for two entirely different purposes.

We should inform our people that the general plan is for the State Highway Commission to construct the main, trunk-line roads through counties and state; that the County Unit Road Law is to be used for improving roads which have a lesser amount of traffic and accommodate the traveling public of a smaller area; and that the Three-Mile Road Law is to be used to improve shorter lengths of roads, in most cases of less expensive type than are required for either county unit roads or state highways. The road built under the Three-Mile Road Law, being a sort of feeder or connecting road to the improved county unit road, is built for the purpose of serving almost exclusively the people who reside in the township, and is paid for entirely by the township or townships in which it is built. The main purpose of the Three-Mile Road Law has been, and now is, to improve a road at a low cost in a way that will get the people out of the mud.

The Three-Mile Road Law as it now exists has been very beneficial to the state of Indiana and will continue to be so for years to come if a radical legislature does not repeal it. There is grave danger that this law will be repealed at the next session of the state legislature; and we, as county engineers, should give it serious consideration and try rightfully to enlighten the lawmakers from each of our respective counties as to its merits and demerits, as to its uses and abuses.

There is probably no law on the statute books that is not abused in some manner or other, and this one is no exception. In my discussion here it is my aim to set out abuses as well as uses, and thus help you in your effort to defend this valuable piece of legislation.

USES OF THE THREE-MILE ROAD LAW

Let us now consider the uses of this law. Its uses have been many, both direct and indirect, and far reaching. Just a few days ago I noticed this headline in a newspaper, "Indiana Leads All States in Improved Roads." Now, doesn't that instill a certain amount of pride in you? I am sure it does, especially if you have had a hand in making this wonderful achievement possible. It illustrates the progressiveness of the Hoosier State and is attributable largely to the effectiveness of the Three-Mile Road Law. We have about 73,000 miles of highways in the State of Indiana, and according to information given in the news item under that caption, 69 per cent are now improved, which amounts to approximately 50,000 miles of improved roads and 23,000 miles of unimproved roads. Of these improved roads, it is safe to say that more than 40,000 miles have been improved by the use of this Three-Mile Road
Law. That illustrates the use we have made of this law. The benefits derived from it are various and many.

As you ride along, during the winter season, on a paved or improved road, stop for a few moments at the intersection of such a highway with an unimproved, mud road; and, as you glance to the right or left along this dirt road, picture for yourself the dire need still existing for this law. Or drive out into a district where most of the roads are improved and depict in your mind the condition of this particular community fifteen or twenty years ago. Contrast this picture with the progressiveness of today and you will see the excellent results of the use of this law.

You will note the splendid centralized or consolidated schools with their adequately equipped laboratories which aid in the teaching of crafts and sciences, gymnasiums in which the physical education of the child is developed, school libraries, school kitchens, and a staff of well-trained teachers maintained at a nominal cost—all of which were impossible in the days of the one- and two-room school buildings, but were made possible by the improvement of the roads in the districts where they are now located.

“The little old red school house” has been replaced by the modern consolidated school, as the slowly moving, twenty-year old, wobbly and disk-wheeled top buggy and the dilapidated farm wagon have been replaced by the swiftly moving automobiles and trucks—all made possible in this state primarily by the use of this particular law.

The operation and use of modern, motorized fire-fighting equipment in rural communities, villages, and towns has been made possible by the epoch of road improvement. Towns and villages join with the township trustees and buy modern fire-fighting equipment which has been the sole means of averting the loss of many thousands of dollars due to fires.

This law has been the medium of building many miles of gravel, macadamized, and paved roads in Indiana, which have brought cheerfulness and modern education to thousands of our people. Let the good work go on. Do not kill the golden egg-laying goose.

Its opponents say they want to relieve the overburdened taxpayer. May God bless them! I am for them, but there are other more logical and practical methods of relieving the burden of the taxpayer which we must and shall put into effect, and at once. Do not curtail needed and useful public improvements. No immediate tax relief would be given by the repeal of the Three-Mile Road Law. Most of the bonds will run for periods of ten years, and we are sure that this depression will have subsided before that time has come. What we need is immediate relief. Roads that have been built will have to be paid for. Repealing this law does not pay the obligation resulting from the present bonded indebtedness in-
curred in improving our public highways. Immediate relief could be accomplished by curtailing the wasted public money in innumerable ways in county, state, and national government. Heavy taxes have reduced to a certain extent the buying power of the public, and in this way have contributed to the present condition of chaos in our financial and industrial enterprises. Much public money is wasted by our continued maintenance of a multiplicity of petty offices along with a multiplicity of costs. Many of these offices could be done away with. Units of government are too small. Owing to the improvement of public roads, these units could economically be combined and save thousands of dollars for the tax-paying public. Other petty offices which have been created in our governments during the past times of easy money could be very conveniently eliminated. The overpaid county and state officials' salaries should be reduced to a point where their personal services compensate for the money which they receive. And when I say that, I do not refer to the salary of a single county engineer either.

ABUSES OF THE THREE-MILE ROAD LAW

Now let us consider some of the abuses of the Three-Mile Road Law. In some cases, this law has been used by real estate men to secure paved streets in newly platted subdivisions. On the face of it, this would seem a flagrant abuse of this good law; but if the streets paved are of public utility, that is, of use to the general public residing and paying taxes in the taxing district in which the improvement is made, then and then only is it just and legal to improve by this law. It must also be taken into consideration that the taxing district will thereafter be recompensed by the increased valuation for taxing purposes of this heretofore unplatted territory.

Paving of streets located entirely within the boundary lines of cities or towns has been mentioned as an abuse of this law. As this is the case of "Who pays the piper may call the tune," I do not see why a city or village street should not be improved in this manner, the improvement being paid for entirely by the local taxing unit. Of course, the matter of public utility enters here again and must be properly considered.

Attorneys are sometimes overpaid for the services which they perform in writing and filing petitions for improvements under this law. In some cases, as much as 2 per cent of the contract price has been paid, which is a ridiculous amount to pay for legal services of this character. This is not a fault of the law, but of the public officials who allow such claims. The law sets out that the fee of the attorney shall be fixed by the board of county commissioners. We are a nation of "wanters" and the most essential requisite of a public official should be his ability to say "no." Even county engineers are guilty of overcharging for their services. In one case, a county engi-
neer filed claims with the auditor, totaling $1,057, for engineers and helpers in making surveys, plans, specifications, and report for 0.51 of a mile of road which was located on a straight, relatively flat section of country. Again, we must not blame the law, but the persons who said "yes" when they should have said "no." This engineer was defeated at the election held shortly after this claim was made—so, beware!

In some instances, roads have been built under this law which were not of public utility to the taxing district, which in this case is the township or townships in which the road is situated. Bill Jones needs fifty or more freehold voters to sign the petition for his road and, in getting the signers, he contracts obligations to sign approximately fifty or more other petitions; so in this "you scratch my back and I'll scratch yours" sort of way, road petitions are signed that should not be signed at all. Of course, if a remonstrance is signed by a greater number of freehold voters than are on the petition, the petition is eliminated from further consideration.

Another misuse or abuse that has been made at times when this law has been used as a medium for the improvement of a road, is that the viewers are unduly influenced either by road material promoters or people living along the proposed improvement, with the result that these viewers select and determine that a higher and more expensive type of pavement be constructed than the traffic or location of the road warrants. The viewers, being from other townships and not taxpayers in this taxing district, seem to be influenced in this way, sometimes very easily. They usually are men not in the least acquainted with the matter of taking into consideration traffic conditions, present sub-grade conditions, or probable cost when determining the type of improvement to be made. Although it has been held by the higher courts that the engineer has nothing to say as to the kind of material that shall be used, he may and does influence the viewers to recommend proper paving materials.

Some viewers are very obstinate. Some recommend paving materials of which they know nothing, but are very, very determined that the road shall be paved thus and so.

MANY SAFEGUARDS

Some of these abuses seem to be, as the legislators say, "extremely vicious." By carefully considering the law, it will be found that the taxpayer is well protected and can very easily avoid these abuses. In fact, very few public improvement laws are as strongly fortified with "stop" or "travel at your own risk" signs as this one. It has many "stop" signs set up as follows:

Stop No. 1. If a remonstrance, signed by a greater number of freehold voters than appear upon the petition, is filed
within 20 days from the date fixed for hearing on the petition, proceeding ends.

Stop No. 2. If the viewers do not find the improving of this road to be of public utility, proceeding ends.

Stop No. 3. If one affected taxpayer files a remonstrance within 10 days after the viewers and engineer have filed their report, raising the question of public utility and convenience, he shall be heard and if the board of commissioners find for him, the proceeding ends.

Stop No. 4. If 10 or more freehold voters in the taxing district file a remonstrance within 29 days after notices have been published and posted setting out the determination to issue bonds, they shall be heard before the Indiana State Tax Board; and, after a hearing is held before this board, if they find for the remonstrators, the proceeding ends.

Stop No. 5. If the unpaid bonds issued heretofore for roads built under this law, together with the bonds proposed to be issued for the improvement of the road under consideration, exceed 2 per cent of the net taxables in the taxing district, the proceeding ends.

The taxpayer has ample protection under this law and, in most cases, during the quarter century since its enactment it has been properly used. When we consider the extent to which the Three-Mile Road Law has been used, its abuses appear to be comparatively few.

There are yet many miles of unimproved roads in the state of Indiana on which unfortunates live. During three or four months of the year these are almost impassable, which leads us to the conclusion that this law has not yet completely fulfilled its mission.

Statistics as of December 31, 1929, show that the bonded indebtedness in the state of Indiana for building gravel roads or, rather, for improving roads under the Three-Mile Road Law, was nearly $46,000,000. Now that seems like an exorbitant amount; but when you compare that figure with the population of this great state, nearly 3,250,000, and its net assessed valuation of $5,000,000,000, it doesn't seem so large, after all.

The limit of 2 per cent of the assessed valuation of the township is all the law permits to be expended at any time for use in improving roads under the Three-Mile Road Law. The amount paid by each taxpayer annually, if the township is bonded to the very limit and the bonds are sold at an interest bearing rate of 4 1/2 per cent per annum, is 29 cents per $100 of taxable property as appraised for taxation by the township assessor. Or the person whose assessed valuation is $5,000 pays $14.50 per year, $7.25 each tax-paying period, towards the construction of roads under the Three-Mile Road Law. Can we or any one, when we think of the many con-
veniences and savings in transportation costs afforded to us by improving our highways, fail to see the economic value of this law? The farmer saves in cost of transporting his produce to market as well as in being able to market his produce when prices are best. Unimproved roads are usually at their worst when marketing conditions are best. The manufacturers and merchants save on the transportation of their products. It can easily be determined that each owner of an automobile saves considerable in the operating cost of his car.

Some speak of taking a moratorium or a holiday on road building and this is just what we will do, without anyone worrying a bit about it or repealing the law under which we now improve roads. It will all come about in this very simple manner. This spring real estate will be appraised for taxation, and when the assessors arrive at the total you can figure 2 per cent of the assessed valuation, subtract the present bonded indebtedness, and the balance will be the amount you are allowed to use to improve roads under the Three-Mile Road Law. You, no doubt, will have a minus quantity for some time to come—so there is your holiday, right there.

Let us think about all the blessings this good law has given to Hoosiers, and thank our lucky stars that we rank first in all these United States of America in the percentage of our roads which are now improved. Let us resolve right here and now to acquaint the taxpayers and the legislators with the many beneficial and praiseworthy merits of this, the Three-Mile Road Law.

THE THREE-MILE ROAD LAW—ITS USES AND ABUSES
By H. A. Blunk, Morgan County Surveyor

The Three-Mile Road Law was enacted by the state legislature of 1905. Like most other laws, it was enacted in answer to a demand for something better, that is, more expedient and inexpensive in the way of preliminary procedure in road building.

Before its enactment we had in this state two laws under which those townships desiring to improve highways might proceed. One was known as the Assessment Law, which levied an assessment on the properties on either side of the proposed improvement for a certain distance, two miles, I believe. The other provided a means for building by a general tax levied on the whole township or townships in which the improvements were to be made. This latter provided that after preliminary viewing, surveys, plans, profiles, and specifications, and an estimate of the costs of construction had been made, the proposal should be submitted to the legal voters of