

THE UTILIZATION OF CONVICT LABOR IN MAKING ROAD MATERIAL.

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The question of good roads is at present one of the most vital with which the farming community of Indiana has to deal. Many of the better counties of the State long ago realized the importance of this question, and, where the road material was conveniently located, constructed gravel or macadam roads radiating in all directions from their county towns. In other counties possessing a plentiful supply of road material the importance of the question has not yet been realized, and for six months of the year the farmers are practically isolated from market, or, if they manage to reach it once a week, can only haul thereto a fraction of a load. Such counties are readily recognized as far below the average in wealth, prosperity and the public spirit of their citizens.

Prof. Latta, of Purdue University, a few years ago made a careful study of the good roads question in the State. He received reports from hundreds of farmers, some of whom live on good roads once bad and others on roads still bad. From these reports he computed statistics showing that the difference between good and bad roads amounts to 78 cents an acre annually on the farms. Apply this amount to the entire State—36,350 square miles, or 23,264,000 acres—and we have the sum of \$18,145,920. Of this amount fully two-thirds is wasted every year in the State in the loss of time and in the loss of opportunity in securing the best market for the produce of the farm.

This question of good and bad roads came up to me very forcibly in the past year while writing a paper on the petroleum industry of Indiana. In preparing a map for that paper I found that many farms in the very center of productive territory had not been drilled because they were on mud roads and distant from railway stations. The iron drive pipe, casing and tubing and the

derrick timbers necessary for drilling in and pumping a productive well are very heavy, and it is almost impossible to haul them over many of the roads in the oil field between the 1st of November and the 1st of April. The operator, therefore, develops first those leases on pike roads or close to railway stations, leaving those on mud roads to the very last. The farmers living in the oil belt who are receiving or might receive large sums in royalty for their oil should, therefore, see to it that their farms are accessible at all times. A successful oil operator is usually a busy man, who does not wish to lose 5-12 of his time on account of bad roads; hence, he leaves the territory with mud roads and operates that which he can reach 365 days in the year.

During the past decade our vehicles for rapid country travel have become more numerous and of an entirely different style from what they were twenty years ago. Almost every farmer now owns his own buggy and carriage. The bicycle by countless thousands has come to stay, and the automobile will soon be more common on the improved roads of the State than the two-horse surrey was a dozen years ago. The owners of all these forms of vehicles are demanding, and will continue to demand, better roads, and the legislator must soon learn that the question is one of the most important which he has to face.

Another phase of the good roads question came into existence with the twentieth century. Five years ago the rural mail carrier was an almost unknown factor in our State. Now he travels in every county, carrying his messages of joy or sorrow to the farmer's door each day. The daily paper, with its market reports and news of the world is, or can be, put regularly into the farmers' hands within a dozen hours of its issue, even though he lives a score of miles from a railway. Time is the most valuable possession given to man on earth, provided he has the ability and cares to use it to his advantage. The time saved in going to town for the mail or for some necessity which the mail carrier can bring is the most important advantage of the rural free delivery system. But this system will not, cannot and should not be made a permanent factor in the country unless the farmers see to it that the roads are kept in such a condition that the route can be covered in the time allotted. The United States Government, through its

Postoffice Department, demands that the farmers do this much, and the demand is just. Those farmers of the State who have had the foresight and good judgment to improve the roads in their vicinity are, for the most part, contented and prosperous. Their products are easily gotten to market when the price is at its best, and the wolf never rests on his haunches before their doors.

On the other hand, those living in the bad road districts endure, for more than a third of their time, an enforced idleness, which makes them ever poorer and causes them to cry out against their lot in life, rather than against their own short-sightedness on the road question. Indiana is rich in clay suitable for vitrified brick, rich in gravel, rich in stone for macadam roads. There is no reason, therefore, why every public road of any importance in the State should not be improved, so that it may be traveled with ease any day in the year.

Let us now take up a second phase of the question. In the penitentiary at Michigan City and in the Reformatory at Jeffersonville are 1,800 men, most of whom are able-bodied. Only a few years ago half of those in the Michigan City prison were being marched about to furnish them exercise, because the labor organizations of our State were opposed to their competition. The industry of the honest citizens of the State paid for maintaining these criminals in idleness. Even at the present time, under the contract system there in vogue, the prisoners at Michigan City are making shirts and socks in competition with sweat shops, and it may be said that prison industry has the general effect of degrading free industry in the same lines to the sweat-shop basis. The making of hollow ware, chairs, brooms, barrels, leather goods, etc., by the prisons of this and other States has had a killing effect on these industries. The convict contract system does conflict with free labor and free industry, and the agitation against it cannot and will not cease until it is thoroughly abolished.

Taking up the third phase of the question, we find that there is at present, in a number of the counties of Western and Southern Indiana, vast undeveloped deposits of shale and fire clay which, by numerous tests, have been proven suitable in every respect for the making of the best grade of paving brick and sewer pipe. Beneath most of these shale beds and overlying the fire

clay are thick beds of coal, far more than sufficient to burn the brick and pipe. The presence of this fuel is a point of great advantage, as it reduces the cost of the manufacture of the clay products to the lowest possible figure. In many counties, especially in the northern part of the State, there is an absence of gravel, stone or other material suitable for the improvement of the roads.

Knowing the presence of these raw road materials in inexhaustible quantities, and having a knowledge also of the crying necessity on the part of the public for better roads, as well as the demand from all labor organizations for the abolishment of the contract labor system among our convicts, I proposed, a few years ago, the following plan for utilizing convict labor for the public good in the lasting improvement of our roadways.

Let the General Assembly authorize the purchase of an extensive bed of shale in Western Indiana, and the erection on it of a modern paving brick factory. Equip this factory with convict labor and put several hundred additional convicts to breaking stone for foundation and cutting it for curbing. This brick and stone can then be furnished at the plant at less than one-sixth present prices to those counties devoid of other road material, or may be given them if they are not willing to buy it. The cost of a paving brick plant, completed for work, which has a capacity of 40,000 output per day, is about \$55,000. One with double the capacity costs about \$70,000. The greater amount of this expense is for buildings and kilns, which could, by convict labor, be constructed of brick made on the spot, so that the cost to the State would be less than half this sum. After the plant is once in operation, with fuel and raw material both at hand, the only outlay is for labor. Where the daily output is 80,000 brick, and the fuel is mined in connection with the shale, the number of hands necessary is about 100. These, at \$1.50 each per day, would make the cost of the brick about \$2.25 per thousand. With convict labor, the actual cost of the brick would only be the sum paid out for the maintenance of the prisoners. It costs 40 cents a day to maintain a convict. To this add 50 per cent. for wear and tear on tools, etc., and the cost would not exceed 60 cents a day. A year's output would be sufficient to pave 125 miles of roadway.

There are 42 brick to a square yard of roadway, and 503,000 to a mile of roadway 20 feet wide. The cost of this brick by convict labor would thus be \$300. The crushed stone necessary for macadam could be prepared by convict labor within the prison and furnished for not more than 30 cents per cubic yard, and the curbing at a correspondingly low price. In California the cost of macadam made by convicts is 25 cents a cubic yard. Prisoners in Massachusetts are making it at 28 cents. One mile of roadway 20 feet wide will require 1,304 yards of macadam to make a foundation four inches thick, or a total cost of \$365, at 28 cents a yard. Adding this to the cost of the brick makes the cost of the *material* for one mile of road \$665.

Next comes the cost of transportation from the prison to the point where needed. The railroads of Indiana would doubtless co-operate in any plan of systematic road building, as they have done in Illinois, California and other States. In California, where there is but one railroad company, and that credited with being hostile to the interests of the people, the material is transported from a State convict plant at the bare cost of haulage, the rate being 25 cents a ton for a haul of 100 miles. Good roads are important tributaries to railroads, and this accounts for their readiness to assist in making them. At 25 cents a ton it would cost \$625 to transport the brick and \$326 to transport the macadam for one mile of road 20 feet wide. Adding this to the cost of materials gives \$1,612.12 as the cost of materials on board cars at the point of use.

The cost of grading, curbing and laying need not exceed \$600 a mile. The cost of teaming varies. For an average distance of two and a half miles it is 30 cents per yard for macadam. The cost of hauling the brick and macadam, based on these figures, would be \$900. Therefore the cost of the brick road, aside from the cost of the materials, would be about \$1,500, or about one-half the total cost of the road, materials and all. It is the general statement of engineers that the cost of materials is about one-half the cost of a road.

A road of vitrified brick, which, if properly constructed, will last a half century or longer, with little expense for maintenance, can then be built at a cost of not over \$3,300 a mile, the most of

which would be for teaming, grading and the laying of the brick. For, understand, the plan proposed does not consider that the convicts be employed except in the preparation of the material, the latter to be furnished free to the counties. All grading, teaming, bricklaying, etc., should be done by free labor, as it is at present. The day of the chain-gang at work on the roadside, subjected to the gaze and jeers of the passerby, is, rightfully, a thing of the past.

Not only could brick and macadam be made for roadways in the prison which I have in mind, but all brick, both ordinary and pressed front, could be made for all public buildings, such as jails, courthouses, schoolhouses, insane asylums and county infirmaries. The shale and fire clay is in every way suitable for such material, and it could be furnished at cost, which would not be over \$1.50 per thousand for the finest of pressed brick. The public pay the taxes to erect such buildings, and also the taxes for maintaining the prisoners; why not, then, have those prisoners prepare the material for public buildings and so lessen the tax burden of the people.

A few years ago California was in the same situation as Indiana is today. Her convicts were idle in deference to the wishes of her labor organizations. Her legislators passed a law authorizing the employment of the convicts in the breaking of stone for road material. Today that State is supplying the prepared stone to the counties at 28 cents a cubic yard on board the cars; which is less than one-third the ordinary market price; yet sufficient to pay for the maintenance of the convicts. The railroads of the State are carrying the material at the bare cost of hauling, for they realize that the improved country roads will bring to them in the future a great increase in farm products for shipment.

Many objections to the plan will doubtless arise, for the questions to be solved are important ones, and for that reason no plan can or will be presented but what will have its weak points. The most serious of these objections is the cost of a new prison, which would necessarily have to be constructed at the plant. This, however, would be much less than is generally supposed, since the shale can be burned into ordinary and pressed front brick of the

finest quality. The brick could therefore be made and the prison constructed by the convicts themselves at a very reasonable cost.

It seems, therefore, that, given an ever-growing demand for better roads, an abundance of nature's products which can be made into the best of road material, and a large number of convicts able and willing to work, we have a combination which, under the proper management, would give us the improved roads, furnish employment for our convict labor, and yet give no offense to that army of honest workmen whose interests and welfare are ever to be upheld.

In accordance with the above plan, the following bill was drafted in this office, and, in February, 1903, was introduced into the Lower House of the Sixty-third General Assembly. Other bills, however, had the preference and support of the "powers that be," and the one herewith presented was not reported out of committee.

A BILL FOR AN ACT abolishing contract labor in the Indiana Reformatory; creating a new Industrial Prison in the western part of Indiana; giving employment to convicts from the Reformatory at Jeffersonville; regulating the hours of labor, and how said labor shall be employed; making an appropriation for the purchase of land, tools, machinery, and other appliances necessary for the State to employ such labor on the public account system in the manufacture of vitrified brick and other material for the building of public highways; providing payment for superintendent, guards, etc., and declaring an emergency.

Section 1. *Be it enacted by the General Assembly of the State of Indiana,* That the employment of convict labor in competition with free labor in the Indiana Reformatory at Jeffersonville is hereby abolished, and the convicts in said Reformatory shall not be hereafter employed upon any contracts other than those already made, which contracts shall not be renewed when they expire.

Sec. 2. That the Governor of Indiana shall, on or before the first day of April, 1903, appoint four competent and disinterested men, no more than two of whom shall be of the same political party; these men to constitute a Board of Control for a new Industrial Prison. Said members of the Board of Control shall meet within ten days after their appointment, and shall immediately, by lot, determine the term of years which each shall serve, as follows: One for one year, one for two years, one for three years and one for four years from the date of their appointment. Upon the expiration of the term of any member, the Governor shall appoint his successor for a term of four years. The Governor shall also fill any vacancy which may at any time occur on the Board by reason of death, resignation or other cause. The Board of Control, so constituted,

shall have the full management of the Industrial Prison, hereinafter to be provided for, up to the time when it shall be ready for the permanent occupancy by prisoners, when they shall appoint a General Superintendent or Warden, who shall have the same powers as does the present warden of the Indiana State Prison at Michigan City; and thereafter said Board of Control shall direct the management of said Industrial Prison in such a manner as will best aid the purposes for which it is created, or in such a manner as shall be hereafter provided by law. Each member of the Board of Control shall receive \$500 per annum in full for all salary and expenses.

Sec. 3. That the said Board of Control of the Industrial Prison is hereby authorized and empowered to purchase one thousand acres of land in western Indiana, at a sum not to exceed \$50 per acre; said land to be within reasonable switching distances of two or more different lines of railway; the greater portion of the surface of said land to be tillable, and to be underlain with shale or fire-clay suitable for making vitrified and ordinary brick; and at least two-thirds of said land to be underlain with one or more veins of workable coal, the minimum thickness of one vein of which shall be three feet.

Sec. 4. The Board of Control, with the aid of the Warden of the Indiana Reformatory, shall, between April 1st and April 10th, 1904, select from the able-bodied convicts in said Reformatory, between the ages of twenty-one and thirty, a number not to exceed two hundred, and shall take such convicts under guard to a temporary camp of detention on the site of the future prison. Here, under the supervision of trained men, they shall sink a shaft to the vein of coal, and shall construct temporary kilns and make and burn ordinary brick in sufficient quantity to construct a cell house and other necessary buildings, and to build the walls about a tract of land of sufficient size to surround buildings to be used as factories for the future making and burning of vitrified and other brick. The cell-houses, walls, factories and all other necessary buildings shall be constructed, as far as possible, by convict labor. As soon as the necessary buildings for sheltering and confining the prisoners are completed, factories and kilns shall be erected and equipped with the necessary machinery for the making of vitrified and other brick. The Board of Control shall then bring from the reformatory at Jeffersonville to the new prison, additional convicts, not exceeding three hundred in number, to be selected in the same manner as the first removed. Said Board shall also at discretion, and by and with the consent and aid of the Board of Control of the Indiana State Prison, have power to remove from that Institution to the Industrial Prison, a number not to exceed three hundred of the least vicious, short-term, able-bodied convicts not engaged in contract labor. Judges of criminal courts in the different counties of the State may, at discretion, sentence parties between the ages of twenty-one and fifty, convicted of penal offenses, to the Industrial Prison; but no person shall be sent there whose term of imprisonment is greater than fourteen years; and at no time shall the convicts of said prison exceed eight hundred in number.

Sec. 5. The Board of Control shall make arrangement for buying and

shipping into the prison, rough stone suitable for the making of macadam and concrete material. A portion of the convicts shall be employed in preparing this stone for the foundation and curbing of vitrified brick roads; another portion in making and burning vitrified brick, and a third portion in tilling the soil of the land connected with the prison, the crops so raised to be used in supplying the needs of the institution, and any surplus to be sold to the other State penal institutions. The macadam and vitrified brick prepared and made in the prison shall be sold at actual cost of making, f. o. b. the cars, to the county commissioners of the different counties of the State for use only in the construction and improvement of the public highways of said counties. If at any time the supply of these road materials much exceeds the demand, the Board of Control may, at discretion, employ a portion of the convicts in the making of ordinary building brick, said brick to be sold at cost to the proper officials only for use in the construction of school houses, jails, court houses, poor asylums and other public buildings. The regular hours of a day's work in said institution shall not exceed eight hours, subject to temporary changes under necessity or to fit special cases, to be sanctioned by the Board of Control.

Sec. 6. All officers, guards and employes of said Industrial Prison shall be appointed and selected by the warden of said prison, and by and with the consent of the Board of Control. The Board of Control is hereby authorized to determine the compensation of all the above mentioned employes and warden required in the operating of said Industrial Prison.

Sec. 7. It shall be the duty of the warden to assign the convicts to such work as in his opinion they are particularly fitted for, and to recommend to the Board of Control from time to time such necessary materials, tools, apparatus or accommodations as are needful for the purpose of carrying on and conducting said brick making industry as may be authorized under this act. He shall make a quarterly detailed statement of all materials or other property procured and the cost thereof, and of the expenditures made during the last preceding quarter, together with a statement of all materials then on hand, the amount of all kinds of work in process, the earnings realized during said quarter, and file the same with the Auditor of State.

Sec. 8. The Board of Control of said Industrial Prison shall cause an accurate account to be kept of all receipts and expenditures of said prison and all business transactions thereof, and out of the moneys received from the sale of vitrified or other brick, the product of the labor of the convicts, and also from the sale of farm and garden products as aforesaid, the Board of Control shall have the authority to pay the salaries of the officers, guards and employes of said prison and to pay to each of said convicts in said prison the sum of ten cents (10c) daily. Said convicts' pay to be available monthly should he be a man of family.

Sec. 9. There is hereby appropriated out of moneys not otherwise appropriated the sum of one hundred and fifty thousand dollars (\$150,000), to be used in the purchase of land, tools, machinery, apparatus and accommodations, as may be by said Board of Control deemed necessary for the purpose of conducting said prison and brick plant, the labor of said con-

victs to be employed on the public account system and the sum hereby appropriated shall only be used to establish, provide for and furnish the necessary machinery and materials in the inauguration of such Industrial Prison.

Sec. 10. All laws and parts of laws in conflict with this act are hereby repealed.

Sec. 11. Whereas an emergency exists for the immediate taking effect of this act, the same shall be in force from and after its passage.