"The amount of wealth produced is nowhere commensurate with the desire for wealth; and desire mounts with every additional opportunity for gratification.

"This being the case, the effect of labor-saving improvements will be to increase the production of wealth. Now, for the production of wealth, two things are required, labor and land. Therefore, the effect of labor-saving improvements will be to extend the demand for land, and wherever the limit of the quality of land in use is reached, to bring into cultivation lands of less natural productiveness, or to extend cultivation on the same lands to a point of lower natural productiveness. And thus, while the primary effect of labor-saving improvements is to increase the power of labor, the secondary effect is to extend cultivation, and, where this lowers the margin of cultivation, to increase rent.

"Thus, where land is entirely appropriated, as in England, or where it is either appropriated or is capable of appropriation as rapidly as it is needed for use, as in the United States, the ultimate effect of labor-saving machinery or improvements is to increase rent, without increasing wages or interest.

"It is important that this be fully understood, for it shows that effects attributed by current theories to increase of population are really due to the progress of invention, and explains the otherwise perplexing fact that labor-saving machinery everywhere fails to benefit laborers."

And he concludes, after repeating and further illustrating this view of the effect of productive improvements and inventions, with the following italicized proposition: "Wealth, in all its forms, being the product of labor applied to land, or the products of land, any increase in the power of labor, the demand for wealth being unsatisfied, will be utilized in procuring more wealth, and thus increase the demand for land." And so, to use his own phrase, labor can not reap the benefits which advancing civilization brings, because they are "intercepted," that is, intercepted by rent.

That it may not be supposed that I am misrepresenting Mr. George, or omitting any qualification of his propositions, I quote another extended paragraph.

"Land being necessary to labor, and being reduced to private ownership, every increase in the productive power of labor but increases rent,-the price that labor must pay for the opportunity to utilize its powers; and thus all the advantages gained by the march of progress go to the owners of land and wages do not increase. Wages can not increase; for, the greater the earnings of labor, the greater the price that labor must pay out of its earnings for the opportunity to make any earnings at all. The mere laborer has thus no more interest in the general advance of productive power than the Cuban slave has in advance in the price of sugar. And just as an advance in the price of sugar may make the condition of the slave worse, by inducing the master to drive him harder, so may the condition of the free laborer be positively, as well as relatively, changed for the worse by the increase in the productive power of his labor. For, begotten of the continuous advance of rents, arises a speculative tendency which discounts the effect of future improvements by a still further advance of rent."

508. The Second Count of the Indictment.—The last sentence introduces Mr. George's second count in his arraignment of rent, as the great social criminal.

Please carefully to note the point. The necessary, immediate and direct effect of any addition, from whatever source, to the productive power of labor, is to increase rents by just that amount, so that nothing is left to go either into enhanced wages or enhanced profits, the landlord taking the entire increase, whatever that may be.

But now another force enters, actually to deplete the already starving laborer. This is the speculative advance in land, owing to the expectation of further increments of value at the expense of the community.

"We have," says Mr. George, "hitherto assumed, as is generally assumed in elucidations of the theory of rent, that the actual margin of cultivation always coincides with what may be termed the necessary margin of cultivation,—that is to say, we have assumed that cultivation extends to less productive points only as it becomes necessary from the fact that natural opportunities are at the more productive points fully

utilized. This, probably, is the case in stationary or very slowly progressing communities; but in rapidly progressing communities, where the swift and steady increase of rent gives confidence to calculations of further increase, it is not the case. In such communities, the confident expectation of increased prices produces, to a greater or less extent, the effects of a combination among land-holders, and tends to the with-holding of land from use, in expectation of higher prices, thus forcing the margin of cultivation farther than required by the necessities of production."

509. The Third Count.—But this is not the end of the mischief attending the private ownership of land. We have now the third and final count in this arraignment. The speculative holding of land, just described, becomes, in turn, the cause of incessant industrial disturbance, and of those great periodic convulsions of production and trade which involve the laboring classes, poor, inert, and unapt to travel or to change of occupation, in the deepest distress.

"Production," says Mr. George, in explanation of an assumed industrial crisis, "has somewhere been checked, and this reduction in the supply of some things has shown itself in cessation of demand for others, the check propagating itself through the whole framework of industry and exchange. Now, the industrial pyramid manifestly rests on the land.

"The primary and fundamental occupations, which create a demand for all others, are evidently those which extract wealth from nature, and hence, if we trace from one exchange point to another, and from one occupation to another, this check to production, which shows itself in decreased purchasing power, we must ultimately find it in some obstacle which checks labor in expending itself on land.

"And that obstacle, it is clear, is the speculative advance in rent, or the value of land, which produces the same effects as (in fact, it is) a lock-out of labor and capital by landowners. This check to production, beginning at the basis of interlaced industry, propagates itself from exchange point to exchange point, cessation of supply becoming failure of demand, until, so to speak, the whole machine is thrown out of gear, and the

spectacle is everwhere presented of labor going to waste while laborers suffer from want."

510. This concludes Mr George's arraignment of private property in land.* If these successive counts can be sustained, he is fully borne out in his conclusion that "the necessary result of material progress-land being private property -is, no matter what the increase in population, to force laborers to wages which give but a bare living;" or, as he elsewhere expresses it, that "material progress does not merely fail to relieve poverty, it actually produces it;" or, again, that, "whatever be the increase of productive power, rent steadily tends to swallow up the gain and more than the gain;" or, again, that "the ownership of the land on which and from which a man must live, is virtually the ownership of the man himself, and in acknowledging the right of some individuals to the exclusive use and enjoyment of the earth, we condemn other individuals to slavery, as fully and as completely as though we had formally made them chattels."

To a man who believed but a small fraction of this, the conclusion which Mr. George announces at the close of the following paragraph would appear irresistible:—

"As long as this institution exists, no increase in productive power can permanently benefit the masses, but, on the contrary, must tend to still further depress their condition. . . . Poverty deepens as wealth increases, and wages are forced down while productive power grows, because land, which is the source of all wealth and the field of all labor, is monopolized. To extirpate poverty, to make wages what justice commands they should be, the full earnings of the laborer, we must therefore substitute for the individual ownership of land a common ownership."

511. Examination of Mr. George's Propositions.—I believe I have presented, in the foregoing extracts, every essential feature of Mr. George's economic system, without suppression or perversion. Let us now take up, in inverse order,

^{*}The paragraphs following are condensed from my work, Land and Its Rent.

Mr. George's three capital propositions. And, first, how much is there in the view that commercial disturbance and industrial depression are chiefly due to the speculative holding of land?

That land, in its own degree, shares with other species of property in the speculative impulses of exchange, is a matter of course. Every body knows it; no one ever thought of denying it. Mr. George makes no point against private property in land, however, unless he can show that it is, of all species of property, peculiarly the subject of speculative impulses. Now, this is so far from being either self-evident or established by adequate induction, that the contrary is the general opinion of economic writers. Of all species of property, land, especially agricultural land, starts latest and stops earliest in any upward movement of prices, as induced, for instance, by a paper-money inflation, which perhaps affords the best opportunity for the study of purely speculative impulses.

512. We now come to Mr. George's second count. The allegation that the enhancement of the value of land, above what should be regarded as the capitalized value of its present productive or income-yielding power, withdraws large bodies of land from cultivation, thus driving labor and capital to poorer and more distant soils, in order to secure the needed subsistence of the community, can only be characterized, so far as all the agricultural* uses of land are concerned, as a baseless assumption, for which not a particle of proper statistical proof can be adduced, and which is directly contrary to the reason of the case.

Because, forsooth, a man is holding a tract of land in the hope of a rise in its value, years hence, does that constitute any reason why he should refuse to rent it, this year or next, and get from it what he can, were it no more than enough to pay his taxes and a part of the interest on the money borrowed to "carry" the property? How unreasonable to assume that

men owning good productive land will refuse to allow it to be cultivated now, simply because they can not get for it a rent which corresponds to what they look forward ultimately to realize as its capital price!

Undoubtedly the speculative treatment of building lots does cause a certain amount of city real estate to be held out of use. Nobody needed Mr. George to tell him this; but that the amount of land so reserved is such as seriously to retard the development of population, trade, or manufactures, except in a craze like that which seized the people of San Francisco in 1868,* seems highly improbable.

513. Progress and Poverty?-Let us now proceed to deal with Mr. George's main proposition, the proposition to which the others are subsidiary. If this be established, it really does not matter much whether the others are true or not, since the condition of humanity under the grinding pressure of this main force will be about as bad as it could be; while, if this be disproved, Mr. George's whole system must break down ridiculously, leaving it to matter little whether the minor evils attributed to the private ownership of land be found to have any real existence or not. This it is which constitutes the original feature of Mr. George's book, the proposition, namely, that, "irrespective of the increase in population, the effect of improvements in methods of production and exchange is to increase rent;" this effect being carried so far that "all the advantages gained by the march of progress go to the owners of land, and wages do not increase," the laboring man having "no more interest in the general advance of productive power than the Cuban slave has in advance in the price of sugar," capital also, in its turn, suffering, and to an equal extent, since, as Mr. George states, the effect of labor-saving machinery or improvements is to increase rent without increasing either wages or interest.

^{*} It will be observed that in the extracts quoted it is cultivation which is spoken of.

^{*}This episode, consequent on the fast approaching completion of the first trans-continental railway, appears to have profoundly affected Mr. George's mind, and have produced in him the belief that what there and then took place, under extraordinary circumstances, is a common incident of land ownership.

Now this is not only false, but ridiculously false, blunder being piled on blunder, to reach a conclusion so monstrous.

514. In the first place, the proposition is contradicted by plain facts of common observation and by unimpeachable testimony of industrial statistics. The laborer has gained in wages through the labor-saving inventions and improvements of modern times. Speaking of England, Sir James Caird says: "The laborer's earning power in procuring the staff of life cost him five days' work to pay for a bushel of wheat in 1770, four days' in 1840, and two and a half days' in 1870." So much for bread. "Thirty years ago," says Sir James, "probably not one-third of the people of this country consumed animal food more than once a week. Now, nearly all of them eat it in meat or cheese or butter, once a day." The same high authority adds: "The laborer is better lodged than he ever was before." We need no one to tell us that the laborer's power to purchase manufactured articles has increased, since 1770, much more rapidly than his power to purchase agricultural produce, whether animal or vegetable.

To the assertion of Mr. George that even the capitalist gains nothing by inventions and improvements in the agencies of trade or manufactures, because the landlord usurps and absorbs all possible increase of productive power, what better answer can we give than that of Professor Emile de Lavelèye, himself a qualified advocate of the state ownership of land?

"Who occupy the pretty houses and villas which are springing up in every direction in all prosperous towns? Certainly, more than two-thirds of these occupants are fresh capitalists. The value of capital engaged in industrial enterprise exceeds that of land itself, and its power of accumulation is far greater than that of ground rents. . . . We see, then, that the increase of profits and of interest takes a much larger proportion of the total value of labor, and is a more general and powerful cause of inequality, than the increase of rent."*

515. So much for industrial statistics and facts of common observation. Let us now turn to the reason of the case. And,

first, let us recite Mr. George's own argument. "The effect," he says, "of labor-saving improvements will be to increase the production of wealth. Now, for the production of wealth, two things are required—labor and land. Therefore the effect of labor-saving improvements will be to extend the demand for land."

A pretty piece of reasoning this! Two things are needed for the production of wealth, land and labor; therefore an increase of production will "extend" the demand for land, forsooth! But why not also for labor, since both are concerned in production?

But Mr. George is further in error, even, than would so far appear. He has got the thing exactly wrong. It is not only true that an increased production of wealth may involve an enhanced demand for labor as well as for land; but it is also incontestably true that the increased production of wealth rarely if ever causes an increased demand for land without a corresponding demand for labor, while, on the contrary, an increased production of wealth may cause an enormous increase in the demand for labor without enhancing the demand for the products of the soil in any degree whatsoever.

Here is a pound of raw cotton, the production of which makes a certain demand, or drain, upon the land. To that cotton may be applied the labor of one operative for half an hour, worth, say, five cents. Successive demands for the production of wealth may lead to the application of, first, a full hour's labor, then of two hours', then of three, four, or five; finer and finer fabrics being successively produced, until at last the pound of cotton has been wrought into the most exquisite articles. Mr. George says that the whole effect of any increase in the production of wealth is to enhance the demand for land. Here is a large increase of production, two-fold, threefold, tenfold, with no additional demand, or drain, upon the soil.

516. But I go further, and assert, without fear of contradiction, that not only is no increase in the demand for land necessarily involved in an increased production of wealth, but that the enhancement of the demand for land, in the progress

^{* &}quot;Contemporary Review," November, 1882.

of society, habitually falls short of the enhancement of the demand for labor, the increase of production taking two great forms,—one which involves no increase whatever in the materials derived from the soil; the other in which the increased demand for land falls short, generally far short, often almost infinitely short, of the increased demand for labor.

Let us look around. I have cited one instance, that of the use made in the mill of a pound of cotton, manufactured successively into fabrics worth, perhaps, twenty cents a pound, then thirty, then fifty, then one dollar. This is not an extreme case.

Here is the rude furniture of a laborer's cottage, worth perhaps \$30. The same amount of wood may be made into furniture worth \$200 for the home of the clerk, or into furniture worth \$2,000 for the home of the banker. The steel that would be needed to make a cheap scythe worth eighty cents may be rendered into watch-springs, or surgical or philosophical instruments worth \$100 or \$200. A gentleman of means goes to Delmonico's, and pays two, three or five dollars for a dinner which makes no heavier drain upon the productive essences of the soil than a dinner of corned beef and cabbage for which a laborer pays twenty-five cents. A part of the difference between the prices of the two dinners, to be sure, represents the cost of an expensive business "stand" on Fifth Avenue; but by far the greater part represents service of one kind or another, at one stage or another, in making the dishes exquisite in appearance and flavor, in serving them neatly and elegantly with all the appliances of taste and fashion. Our gentleman, before dining, had perhaps been measured for a pair of boots for which he was to pay \$12 or \$15, yet containing no more leather, and so making no more draught upon the productive essences of the soil, in the way of nourishing the animal from which the leather was cut, than the laborer's \$3 pair of "stogies"; he had also ordered a suit of clothes for \$60 or \$75, at his tailor's, no thicker, no warmer, containing no more fiber, than the laborer's \$15 tweeds. In all these cases (and they fairly represent the facts of personal con

sumption in modern society) the main cause for the excess of value in products of higher price is not the use of a larger quantity of material, involving a greater demand or drain upon the productive essences of the soil, but the application of more labor to the same quantity of material.

517. How Far Mr. George is in Error.—In contradiction, then, of Mr. George's proposition that the entire effect of an increase of production is expended in raising rents, neither wages nor the interest of capital deriving any gain whatsoever therefrom, rent indeed absorbing the entire gain," and more than the gain," we have seen,—

1. That an increase of production may enhance the demand for labor equally with the demand for land.

2. That, in fact, in those forms of production which especially characterize modern society, the rate of enhancement of the demand for labor tends to far exceed the rate of enhancement of the demand for land.

3. That an increased demand for the production of wealth may, and in a vast body of instances does, enhance the demand for labor without enhancing the demand for land in any, the slightest, degree, the whole effect being expended in the elaboration of the same amount of material.

4. We have now only to show, in the fourth place, that, instead of all improvements and inventions increasing the demand for land, as Mr. George declares, the most numerous and most important classes of improvements and inventions actually operate powerfully, directly, and exclusively, in reducing the demand for land,—we have, I say, only to show this, to convict this writer of the grossest incompetence for economic reasoning. This it will be easy to do.

518. Influence, upon Rents, of Improvements in Transportation.—With few exceptions, all improvements and inventions fall naturally under one or another of three great classes,—first, those which affect manufacturing industry; second, those which affect transportation; third, those which affect the cultivation of the soil.

Of these three classes it has always been admitted by economists that the first tends to enhance the demand for land,

and thus to raise rents, although, as we have just now seen, not necessarily, or indeed usually, without also enhancing the demand for labor and capital, and thus raising wages and interest. The two remaining classes of improvements and inventions tend directly, and indeed operate exclusively,* to reduce the demand for land, leaving, thus, the whole advantage of such improvements and inventions to be acquired by either labor or capital, or, in one proportion or another, by both labor and capital.

And, first, of improvements in transportation. I need not waste time in calling to mind the mighty strides which invention has made, during the past fifty years, in this direction, substituting for the sailing vessel of 400 tons, which carried its petty cargo of wheat in forty or sixty days from New York to Liverpool, the steamship of 5,000 tons, which makes the passage in nine days or twelve; substituting for the tedious wagon carriage which in forty or fifty miles, perhaps in twenty or thirty only, ate up the whole value of the freight, carriage by steam cars, drawn on steel rails, which, allowing for transport from Dakota to New York, leaves enough of the value of the freight to pay for the ocean passage and for the support of the producer upon those distant plains. Add the telegraph and the fast mail, for transmitting orders and transacting sales, and one will hardly question the assertion that the greatest of all the classes of improvements and inventions effected within the last half-century, has been that which relates to transportation.

Is it the effect of improvements of this class to enhance rents? Absolutely and exclusively the reverse. Whatever quickens and cheapens transport, acts directly in the reduction of rents, and can not act in any other way, since it throws out of cultivation the poorer lands previously in use for the supply of the market, enabling the better soils at a distance to take their place, thus raising the lower limit, or, as it is called, the "margin" of cultivation, and thus reducing rents.

519. Influence, upon Rents, of Improvements in Agriculture.—But, secondly, take the case of agricultural improvements and inventions. Here the effect on rents is not so simple. Yet it is perfectly demonstrable that, of the two groups into which such inventions or improvements are divided, all of one kind diminish rent in a certain degree, while all of the other kind diminish it in a much higher degree.

The two kinds of agricultural improvements and inventions referred to are:

First, those which do not actually increase the amount of produce, but diminish the labor and expense by which that amount is obtained, such as the improved construction of tools, or the introduction of new instruments which spare manual labor.

Second, those which enable the land to yield a greater absolute produce, such as the disuse of fallows by means of the rotation of crops, the introduction of new vegetable species, the introduction of new and more powerful fertilizing agents or a better application of familiar manures, and mechanical inventions, like sub-soil plowing or tile-draining.

Now, improvements or inventions of the first class, as, by the supposition, they do not increase the produce of the land, so they do not, supposing them to be equally applicable to all grades of soil, diminish the share of that produce going to the landlords as rent. But while the actual number of pounds, bushels, etc., of agricultural products going to the owners of the soil remains the same, in the face of such improvements and inventions, those products are cheapened through the saving of labor in their production. Thus, while rents remain the same, in kind, their money value, or power to purchase the products of other branches of industry or the services of other classes of producers, is diminished in just so far as such improvements are effectual.

520. Next, it is clear that those agricultural improvements and inventions which enable a given area to yield a greater quantity of produce, act even more directly in diminution of

^{* &}quot;Irrespective of the increase of population," to use Mr. George's own voluntary qualification.

^{*}As justly characterized by Mr. J. S. Mill.

rent. Take, for illustration, the disuse of fallows by rotation of crops. Formerly it was thought necessary to let even the best land lie out of cultivation one year in three or four. On the contrary, it is now perfectly established that, if crops be duly varied, land may be continuously cultivated without exhaustion. It is evident that this discovery is equivalent to increasing the capacity of any tract by one-half or one-third: so that, for a given amount of agricultural produce required for the sustentation of the community and for the raw materials of manufacture, such an improvement would allow vast bodies of the poorer grades of soil to be thrown out of cultivation, thus diminishing (paragraph 257) the aggregate amount to be received, as rents, by landlords, in that community. A similar effect, in a greater or less degree, would be produced by the introduction of new and more powerful fertilizers, or by sub-soil plowing and under-drainage.

521. Summing up.-We thus see that all real agricultural inventions and improvements tend, as all improvements and inventions in transportation tend, directly and exclusively, to diminish rents. So that of the three grand classes into which industrial improvements and inventions are divided, two act in a direction exactly opposite to that in which Mr. George's theory would require them to act. Of the third grand class of improvements and inventions, viz., those relating to manufactures, we have admitted that some do, by calling for larger amounts of raw material, enhance the demand for land; but we have shown, that in these very cases, the increase in the demand for labor is almost always equal to the increase in the demand for land, is often greater, is sometimes vastly greater. We have, also, shown that there are other, still more numerous and more important, improvements and inventions in manufactures which do not enhance the land in any degree, while they call for greater and still greater applications of labor to the same amounts of material.

Can any thing more be required to show how groundless and preposterous is the view of the hitherto unsuspected importance of rent as a factor in the distribution of wealth, which Mr. George has presented as a marvelous discovery in econ-

omics, and upon which he has built his pretentious superstructure: the necessary relation of Progress to Ever Increasing Poverty? That such an argument should for a moment have imposed upon anybody, is enough to give one a new conception of the intellectual capabilities of mankind.

XI.

THE BANKING FUNCTIONS.

522. "The trade or profession of banking," says Lord Liverpool, "has been exercised in all countries and all ages. It existed in the republic of Greece and in ancient Rome. There were, in all these States, men who received money as a deposit, repaid it upon the drafts of those who had intrusted them with it, and derived their profits from having this money in their custody."

1st. Financiering.—In modern times, the first banks appear in Italy. Mr. Bagehot states that the earliest of these "were finance companies. The Bank of St. George, at Genoa, and other banks founded in imitation of it, were at first only companies to make loans to, and to float loans for, the governments of the cities in which they were founded."

"Financiering," then, may be regarded as the first banking function developed, in modern times. In the reign of William and Mary certain capitalists made a loan of £1,200,000 to the English government, receiving, in consideration therefor, a charter constituting them the Governor and Company of the Bank of England. Robert Morris's Bank of North America had a very similar origin. Under the present National Banking system of the United States, the bank begins by lending all, or nearly all, its capital to the government. The great war loans of the United States, 1861-5, were, in the main, "floated" by the banks.

523. 2d. Book Credits of the Bank of Amsterdam.—The next banking function historically developed was that of giving the people good money in place of a medley of worn and clipped coins, of a great diversity of coinages, belonging