Instead of the under-building of 1902 and 1903, New York City has during 1906 and 1906 been over-building. Its operators have to some extent been tempted to believe that the increase in the volume of transactions and improvements in the whole central core of the borough of Manhattan, during the past few years important transit improvement after another will
THE MORTGAGE MARKET.

The totals respecting the lending of money on real estate compiled in the usual manner from the records are not for the past two years very illuminating. During 1905 these totals were swollen by the enormous number of mortgages recorded prior to the mortgage tax law, which took effect on July 1, 1906, and after that date they were from the same cause unnaturally diminished. This diminution continued until July 1, 1906, when the mortgage recording tax was substituted, and since the first of July the amount of money loaned on real estate all over the city has been much larger than during the corresponding period last year, in spite of the fact that money has been exceptionally hard to borrow. Thus during the month of December, 1906, alone, about $50,000,000 was loaned on real estate in Manhattan against less than $24,000,000 during the corresponding month of 1905. On the whole, the amount of money loaned on real estate situated in Manhattan and the Bronx was about $450,000,000 in 1906, compared to about $265,000,000 in 1905; and the diminution was not very large, considering the abnormal condition of the mortgage and money market. It looks as if the stringency in the money market would continue during the current year, for the demands upon the resources of the country for fresh supplies of floating capital will be enormous. Prospective borrowers on real estate for some time to come will have to pay dear for the money they need; but the experience of the year clearly shows that in the long run the new mortgage recording tax will constitute a great boon to borrowers upon real estate security. When the money market returns to its normal condition it is probable that mortgages will be in better demand than they ever have previously been during the history of the city, and that the average rate of interest will be correspondingly lower. It is necessary, as Mr. James J. Hill asserts, for the railroads of the country to spend $1,000,000,000 a year for the next five years on new tracks and terminals, the day for expensive building are no longer the order of the day. The builders of New York will be fortunate in case they do as well in 1907. The diminished activity in building in the boroughs of Manhattan and the Bronx can all be traced to two sources—viz., the decreased number of tenements and hotels which were previously projected. The decline in the construction of apartment hotels is one of the most remarkable somersaults ever observed in the building market of this city. Four years ago about $20,000,000 was being spent each year in hotels either for residents or transients. Even last year 13 new buildings of this class were projected to cost over $5,000,000. But in 1906 only one small hotel appears in the building records of Manhattan. The apartment house, which was at one time by way of being eclipsed by the apartment hotel, has again come into its own, and completely dominates the situation. It may be expected that in time the building of apartment hotels will be resumed, but for the present New York has more of them than it needs. A decisive decrease also took place in the number of tenements of all classes projected, owing to causes already outlined in our real estate review. Thus in 1905 the number of tenements projected to cost over $100,000,000 was larger than during any previous year in the history of the city, larger, probably, than in 1906. In the latter case it amounts to only about 7%, whereas in the former it is not less than 10%. The aggregate estimated cost of new buildings projected in 1906 was over $100,000,000 in 1905, and over $130,000,000 in 1906. In Brooklyn the decrease was proportionately less, the total being over $60,000,000 in the first year and over $25,000,000 in the second. Queens and Richmond, on the other hand, have been more prosperous in 1906 than they were in 1905. The estimated cost of the buildings projected in the former borough increased from $12,000,000 in the first year to $18,000,000 in the second, and this increase shows that the average rate of interest probably will be lower than during the past year. Thus in 1905 the new tenements projected to cost a total of about $225,000,000 and the projected alterations must have cost $20,000,000 more. The builders of New York will be fortunate in case they do as well in 1907.

CONSOLIDATED STOCK AND PETROLEUM EXCHANGE BUILDING—BROAD AND BEAVER STREET VIEW.


Building in 1906.

As usual, the amount of new building projected in 1906 has been dependent chiefly on conditions in the real estate market. During the first half of the year the estimated cost of the projected buildings was greater than it was during the corresponding period of 1905, but when the diminution began during the summer time, it gained headway more rapidly than did the decrease in the conveyances of real estate. During the past few months the plans for new buildings filed with the department have been unusually scarce, and the total result is that the decrease in the number of new buildings projected is proportionately greater than the decrease in transfers. In the latter case it amounts to only about 7%, whereas in the former it is not less than 10%. The aggregate estimated cost of new buildings projected in 1906 was over $100,000,000 in 1905, and over $130,000,000 in 1906. In Brooklyn the decrease was proportionately less, the total being over $60,000,000 in the first year and over $25,000,000 in the second. Queens and Richmond, on the other hand, have been more prosperous in 1906 than they were in 1905. The estimated cost of the buildings projected in the former borough increased from $12,000,000 in the first year to $18,000,000 in the second, and this increase shows that the average rate of interest will be lower than during the past year. Thus in 1905 the new tenements projected to cost a total of about $225,000,000 and the projected alterations must have cost $20,000,000 more. The builders of New York will be fortunate in case they do as well in 1907.

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Real Estate Investments

Views of the President of the Mutual Life Insurance Company

CHARLES A. PEABODY, Esq., as president of one of the largest and oldest life insurance companies in the United States, when asked to give his views concerning the standing of mortgage loans, was asked to say what from his point of view is the comparative safety and attractiveness of real estate investment as compared to the purchase of building loans in Greater New York. Mr. Peabody answered:

"The question as to what may be thought of the safety and attractiveness of mortgages on the real estate in the City of New York is a very important one, and the investment, covers a broad field. There can be, however, but one opinion as to its safety if due judgment is used in making the investment. I do not think that there is any real estate in the world today, where the value in land, that is to say, that is practical and certain of advance under normal conditions as the real estate of New York City. Of course, you are aware that the insurance company does not invest in the purchase of real estate. So far as real estate is concerned, we are limited to mortgages, and what I have said as to real estate, answers, of course, the question as to mortgages.

"From the point of view of the insurance company, the first consideration must be security. That means that the companies must be conservative in appraising real estate. They must not follow the男主 movements which seize upon local peculiarities under the stimulus of special causes, because these so-called booms invariably flatten out when the special causes are removed. Several of these movements have been seen during the last twenty-five years. The third condition includes a long series of such movements, but to one who studies such history and uses intelligent judgment in considering the government and the business world, it is plain that New York is likely to grow in the evolution of the years to come, investment in first mortgages within the limits allowed by law ought to be, in the long run, as good as any investment that an insurance company could make."

"Ought New York City real estate to receive preferential consideration from insurance companies, and, if so, why?"

"I find this question rather hard to answer," said Mr. Peabody. "It is true that the New York mortgage market is the largest in the world, and under normal conditions, as compared with other cities having the same prospects for the future and the same reasons for firm maintenance of values, all should be treated alike, and conditions which make them attractive to the insurance company will always mean that the insurance company could make a profit. We can all agree that there are few cities in which the market for real estate is so steady and so strong as in the City of New York; and, of course, steadiness and strength in the market are what make safety and stability in the investment."

"What rate of interest might be deemed fair and equitable on loans that the insurance companies may pass upon as safe and attractive?" Mr. Peabody was further asked.

"As I have stated already," replied Mr. Peabody, "the first consideration from the company's standpoint must be security. The next consideration must be the duty of the company to obtain for its policy holders the highest rate of return for a given degree of risk; and, of course, due regard to security. Of course, the rate that might be deemed fair, varies. It involves questions of the value of money at a given time, condition of the country and the country's business, or, indeed, the general condition of the world and the world's business than upon local and passing causes. I should say, in a general way, that it is the duty of every company to obtain in all its investments the highest possible return to the policy holders, always having a due regard to their security. In New York City, within my memory, the rate has been as low as 3½ per cent. for the highest grade mortgages, and it has within my memory been as high as 7 per cent. It is safe to say it will never reach such a figure again, and to be in a running between 4½ and 5 per cent.

"What reasonable reason exists, if any, for preferring other investments than mortgage loans?"

"A good reason for preferring other investments than mortgage loans may exist if the company can obtain for its policy holders a higher rate of return on its capital without depriving them of safety. If by the purchase of other securities which are allowed by law the company can obtain more in interest than it has in mortgages, let it do so. But there are times when such investments pay better at their market prices than real estate mortgages; there are other times when they do not pay as well. There are times when there is no use in seeking them. Insurance companies are in the business of insurance. To follow both forms of investment, being guided by the prevailing rates of interest as to the preponderance of one class of investment than mortgage loans?"

"Since January 1, 1906, this company has accepted loans on real estate mortgages aggregating more than $25,000,000. During that time loans have been paid off to the amount of $11,000,000 or more, and the total amount of bonds and mortgages now held by this company exceeds that held a year ago by about $13,000,000."
The present situation in real estate is not unlike that which seems to confront the stock market. A long period of prosperity, with steadily enhancing values, has on the one hand predisposed the public toward a chronically optimistic view of the future. Indeed of real estate, which, unlike stocks, cannot be "sold short," it may be said that there cannot be found any widely expressed bearish sentiment. Nevertheless, certain unfavorable elements in the present situation have caused the judicious to proceed carefully in regard to future commitments, and have led to a waiting policy on the part of many conservative operators, with the view of ascertaining what will be the developments of the next few months. While there is no connection between real estate values and the temporary movements of the Stock Exchange, any widespread change in the prosperity of the country cannot be without its effect upon real estate prices. General business conditions throughout the country to-day are unquestionably on an unexampled plane of prosperity. Money conditions, however, not only throughout the United States, but in almost the entire civilized world, exhibit symptoms of strain which it would be folly to ignore.

To speak with more particular reference to the New York City real estate market, it may perhaps be said that the most acute factor in the existing situation, the overbuilding of tenements, is largely a local condition. While new building operations have for some years past been extremely active throughout the whole country, it may be doubted whether such excesses can be found in any other large city as those which in New York during 1905 and 1906 led to the production of more than double the new housing accommodations required by the increase of population. Nevertheless, even this threatening crisis now seems likely to be safely passed. Mortgagee, building loan operators and creditors of builders generally have exhibited a tolerance and forbearance toward their debtors unexampled in the older days of speculative building. Foreclosures have been comparatively few, and while the strain is still severe, it now seems more than possible that anything in the nature of an acute panic in tenement holdings will be averted. If so, the underlying virtues of New York City real estate and the phenomenal growth of our population may yet bring profits in instances where they are not now expected.

Despite the stringency of the money market, the beneficial effects of the mortgage recording tax law are making themselves felt. Institutional lending still remains disappointing, but an ever-increasing amount of money seems to be coming towards real estate prices.

The one supreme problem which confronts the future of New York real estate to-day is that of transportation; and in that problem is bound up not merely questions of market values but in a large sense the betterment of our standard of living and social conditions generally. The outlook in this respect is not replete with encouragement. Between the impracticability of the Legislature and the ineptitude of the Rapid Transit Commission the situation now approaches an impasse. Nor has the press shown that grasp of essential facts which must precede any intelligent moulding of public opinion. The more or less extreme views of impractical doctrinaires are not likely to be considered before the close of another year.

EDGAR J. LEVEY.
CONSTITUTION'S ADVANTAGES IN NEW YORK.

The Constitution of New York is practically silent as to taxation. In Ohio the Constitution provides that all property real and personal shall be taxed uniformly at its true value in money and many other States are similarly restrained or have identical provisions copied from the Ohio Constitution.

I have recently visited the States of Ohio, Kentucky and Missouri, making some special study of their tax conditions. If those who grumble about the New York Tax Laws could be forced to live a year in St. Louis, Louisville or Cincinnati, they would return chastened in spirit and ready to give thanks for all that is good in our native State. In Kentucky every man is under obligations, which can be enforced, to make out a list of his property under more than fifty separate headings, to the accuracy of which he must make oath. Ohio and Missouri have similar laws and in St. Louis a man is not allowed to deduct from the aggregate of his possessions any indebtedness contracted for their purchase. More than this, if he owns stock in a corporation incorporated under the laws of another State, he must pay taxes on the value of that stock although the property which it represents is actually taxed elsewhere.

The State of Minnesota is rejoice because after a five years struggle they have succeeded in freeing themselves from the identical restraints of the Ohio Constitution which they copied fifty years ago. This clears the way for progress and improvement in Minnesota. In all these States I have mentioned the local tax system so far as it affects personal property is hopelessly ineffective. They have attempted the impossible and, according to the habits Nature has, natural laws suspend the operation of the foolishly-devised, man-made laws.

PROGRESS IN NEW YORK.

We have not wholly escaped from the vices of ineffective taxation, but we have advanced a long distance beyond those typical States of the middle west. There are economic objections to the taxation of many of the subjects taxable there and here but ineffectiveness is a sufficient objection always to condemn any provision of a tax system. When a law is ineffective it bears unequally on persons similarly situated and in this practice confers favors on some and confiscates the property of others. Prior to 1901 this was the situation in New York with reference to the taxation of Banks and Trust Companies and is now the case in most of the middle western States. In 1901 an effective law was passed for the taxation of Banks and Trust Companies under which there is no excuse for any discrimination and under which there practically is no discrimination. Every bank and trust company pays one per cent. on the book value of its assets. Before 1901 banks paid on the market value of stocks at the local tax rate. Sometimes the assessment exceeded the book value and sometimes it was not half so great, while the tax rate varied from 1% to 3%.
The revenue from trust companies is improperly diverted, but that presents a different issue from the effectiveness of the tax, to which no objection can be made.

In regard to the taxation of mortgages, the States I have mentioned are in even a worse position than the State of New York was before the law of 1905. The tax keeps up the rate of interest and falls with distressing inequality upon those least able to bear it. The inability in Missouri to deduct debts from credits renders the situation so impossible that good citizens of St. Louis say that lying in regard to this matter is no longer considered an evidence of dishonesty.

The mortgage tax law of 1905 was really a blessing in disguise for people’s eyes were opened to the real effect of mortgage taxation and for the first time were ready to believe that the borrowers are the principal sufferers. It was possible then for the first time to obtain comparative statistics showing the effect of mortgage taxation on the rate of interest under the general property tax and the effect of a one-half per cent. per annum tax, as compared with Massachusetts, where mortgages have been exempt since 1881. This experiment was probably worth all it cost for us alone but beside that it has furnished an object lesson for all the States of the country. Without the law of 1905, we might not have succeeded in obtaining the law of 1906, which puts New York in the best position of any State in the Union in which mortgages are subject to any taxation at all. Total exemption is best, but this tax falls equally on all who are similarly situated, and is in the highest degree effective.

Effective taxation in the State of New York is now only a matter of keeping on. What we have left of the old general property tax on personal property amounts to little in revenue and can more easily be ended than mended. Beside the injustice it creates and the check to our commercial advancement that it imposes, it is seriously disturbing the financial administration of the municipalities of the State.

The New Hoffman House.

Madison Square is being presented with another notable building—to be erected in connection with the Hoffman House, at the northwest corner of Broadway and 24th St by Francis S. Kinney, of No. 135 Broadway, president of the Hotel de Luxe Co., and owner of the Hoffman House in Madison Square. The scheme first is to erect an L-shape building fronting 49.3 ft. on Broadway, with a wing in 24th St, having a frontage of 47.25 ft. in that street. Later on the present corner building (as soon as possession can be secured), having a year’s lease yet to run, will be demolished and the entire plot will be replaced with this handsome edifice. The exterior will be of granite and limestone, with limestone coping, stone cornices, terra cotta flat arch floors, copper skylights, etc. It will...
have twelve stories and the most modern and elaborate equipment known to metropolitan hotels. The Broadway ground floor has been planned for store purposes. Altogether, the project is estimated to cost nearly $2,000,000. The Thompson-Stearns Building is designed by Howells & Stokes, architects, and J. L. Dana, 130 Fulton st, is architect. Two other great works are also in progress on the square, namely the Brunswick Building and the Metropolitan Tower, a $1,750,000, 23-story building, the architectural magnificence of the most beautiful public place in the world.

The Mortgage Market in 1906

By RICHARD M. HURD
President Lawyers Mortgage Company

The mortgage market opened in 1906 with rates 14% higher than in 1905 owing to the Mortgage Tax Law of 1905 imposing an annual tax of 1 1/4%. As a countering advantage all such mortgages were tax exempt and hence attracted to the investor large amounts of safe trust funds which were hitherto invested in Government or New York City bonds to avoid taxation. Thus while money was in demand and working steadily tighter, borrowers were able to obtain funds by paying 1 1/4% higher rates than in previous years. About this time a study of the figures of new buildings in New York led the most conservative lenders to the opinion that at the existing rate of progress there was decided danger of over building in New York, and the Lawyers’ Title Insurance and Trust Company and some others stopped making building loans. The volume of mortgage business, as shown by the weekly mortgage records of the Record and Guide, while large, continued to fall further behind the record-breaking figures of 1905.

During this time, interest rates on loans on securities mounted to abnormal figures, such as for call money in New York, 9% in January and 39% in April. At Albany a hard and successful fight was being waged by the Allied Real Estate Interests, under the able leadership of Mr. B. Aymar Sands, against the annual 1 1/4% mortgage tax and in favor of a recording tax of 3/4% paid by the borrower, under which a mortgage would be then-forth tax exempt. The first effects of the passage of this law are to cause lenders to delay the closing of loans till after July 1, when the new law went into effect. On that date interest rates dropped automatically 1 1/4%, although borrowers had to pay the 1 1/4% recording tax. The constant pressure of demand for money due in the United States to the extraordinary business activity and the obstinate holding up of prices for stocks on the New York Stock Exchange by large speculators, in defiance of all the steady accumulating factors adverse to a bull position, and due in Europe to the after effects of the Russo-Japanese and Turkish wars, began to have some influence on mortgage rates. This showed itself chiefly at the two extremes of the security scale, both on the highest grade of mortgage loans by raising interest rates from a minimum of 4% to a maximum of 4 3/4% and on loans in the newer outlying districts or on those exceeding 70% of the value of the property, by raising rates from 7% to 8 1/2%.

It is beyond dispute, however, that the change in the Mortgage Tax Law from the annual 1 1/4% charge of 1905 to the single recording 1 1/4% charge of 1906 worked an annual benefit of nearly 14% to borrowers. While the total mortgage loans made in New York dropped from $875,073,073 in 1905 to $868,544,283 in 1906, or a decrease of 18%, some companies dealing only in the higher grade mortgages, such as the Lawyers Mortgage Company, did a larger business in 1906 than in 1905. It may throw some light on the gradual change in interest rates to note that of this company’s mortgage rates in 1905, 21% netted 4% and 79% netted 4 3/4%, while in 1906 23% netted 4%, 53% netted 4 1/2% and 24% netted 5%, the average interest rate netted by investors rising from 4 3/8% in 1905 to 4 6/16% in 1906.

In general it is true that mortgage interest rates, while they do not fluctuate as violently as rates in other financial markets, are necessarily affected by them, as capital flows from one market to another. Interest rates all over the world are now on an almost unprecedented high level, but as far as the United States is concerned, I cannot see any signs of lower rates until liquidation and lower prices rule in the stock market, until the floating debt of Wall Street to London, estimated at $800,000,000, is paid off, and until a halt in business activity occurs. Further, it is difficult to see why there should be any great drop in interest rates until after the next great industrial and commercial panic. When this will come is impossible to say, but the foundations for it are already being laid by the widespread extravagance and luxurious living, and by the colossal expenditures converting floating into fixed capital.

It is said that in the event of the erecting of the new court house on Union sq, many buildings in that vicinity will be altered for office purposes. It is understood that the Parker Bros., southeast corner of 4th av and 19th st, will probably be altered for office purposes. The Thompson-Stearns Building, 130 Fulton st, is architect. Two other great works are also in progress on the square, namely the Brunswick Building and the Metropolitan Tower, a $1,750,000, 23-story building, the architectural magnificence of the most beautiful public place in the world.

ROYAL INSURANCE COMPANY'S BUILDING.

By HOWELLS & STOKES, Architects.
MANHATTAN VALUES HIGH

President Morton, of the Equitable, Thinks
There Are Good Reasons to Believe
That There Is Some Inflation.

To the Editor of the Record and Guide:

I have yours of the 28th, making the following inquiries:

1. What, from the point of view of the big insurance companies, is the comparative safety and attraction of real estate investments, mortgages and building loans in Greater New York at the present time?

2. Ought New York City real estate to receive preferential consideration from insurance companies? If yes, why? If no, why?

3. What interest might be deemed fair and equitable, on loans that the insurance companies may pass upon as safe, and attractive?

4. What apparent reasons exist, if any, for preferring other investments than mortgage loans?

In answer to inquiry No. 1, I have to say that from our point of view there is nothing safer or more attractive in the way of mortgage loans than good business property, well located on fair valuations, in Greater New York at the present time.

In answer to your second question, I think New York City real estate should receive preferential consideration from insurance companies only on account of its quality, but I see no reason why New York City real estate should receive preference for any other reason. I think the fair way for the big insurance companies to place their money on real estate mortgages, so far as it is possible to do so conservatively, is in those sections of the country which produce the insurance premiums. I can conceive of no good reason why New York should have any especial preference.

3. The question of interest depends entirely upon the market. The relation of supply to demand is the sole regulator of values, and applies to interest rates as well to everything else.

4. I do not know of any good reasons why we should prefer other investments to mortgage loans. The first thing that insurance companies must require in their investments is security, and, second, is income. Good railroad bonds are now being sold at prices that yield a good income, and in addition there is a chance at present for an advance in the prices of these securities, which does not obtain in real estate mortgages.

Personally, I am of the opinion that values on Manhattan Island at the present time are high. Many people say there is no boom, but I think there are good reasons to believe that there is some inflation. It will be unfortunate to have values increase too rapidly.

Very truly yours,

PAUL MORTON.

A Healthy Reaction From Abnormal Conditions.

(By the President of the Title Guarantee and Trust Co.)

The real estate market has been for six months in a healthy reaction from the abnormal activity that had prevailed for the preceding year. The speculation arising from the new law and that investors are ready to take a tax exempt mortgage at a rate at least one-half of 1% lower than one that is not exempt. It further sees a marked tendency on the part of trustees and other taxable individuals to seek exempt mortgages as the best paying investments open to them. Such investors have been selling their railroad bonds to enter the mortgage market and were very numerous during the last few weeks preceding the second Monday in January in order to be in shape on tax day. There are many who are not yet alive to their opportunities, but no one can doubt their action when they are. The result is going to be that when money conditions become normal there will be a great influx of money into the mortgage market, and 4% tax free will be a rate satisfactory to the lender, and ultimately 3½%. That rate has prevailed in Boston for years under similar conditions and certainly New York borrowers will fare as well in due time.

CLARENCE H. KELSEY.
Tenement Houses as an Investment.

No one can or will care to deny that the year ending July 1, 1906, witnessed the most remarkable and continued speculation in tenements and flats and the largest production of new buildings of this character that New York or any other city has ever experienced. The rise in their value was as unparalleled as it was phenomenal. That in such a runaway market men's speculative temperament will get the better of their sober judgment and that a speculative fevermongering on intoxication should result from a too free and full indulgence in such unchecked and reckless speculation is not at all surprising. It may well be a sobering tonic like the present continued and severe stringency in the money market to call a halt and to exert a steadying influence.

And now, with the end of 1906 in sight and the approach of the new year, the gasp-uppermost in real estate men's minds is: "What will the year 1907 bring forth? Is the present quiet condition of the market—and more especially the market for tenements and flats and lots suitable for tenement and flats—but the halt before the storm, or is it only a breathing spell before another spurt in rising values?"

Those who were most intoxicated by their success in wild speculation are naturally in a condition bordering on delirium tremens superinduced by the heavy load of debts they still have to carry. That "in the cold gray dawn of the morning after" these operators should take a dark view of the future is to be expected. I have always found that those who are most doling and loudly optimistic in times of prosperity, who ridicule all danger signals and notes of warning, become the most disheartened and pessimistic the very moment the first cloud appears above the horizon. Personally I could never share their fantastic dreams, nor can I now share their deep gloom.

The present lull in the real estate market is due to perfectly natural causes and should and probably will disappear with their disappearance. The first and direct cause is the long-continued and severe stringency in the money market, which makes it difficult to obtain first mortgages on finished buildings except at higher rates of interest and in smaller amounts, and which at the same time makes it well-nigh impossible to secure building loans for new ventures in tenements and flats except at a prohibitive cost. The remote but more serious cause is the general and severe overproduction of tenements and flats in the Bronx, on Washington Heights, in the outlying boroughs and in the upper end of Manhattan. By a very natural but fortunate circumstance these two causes, though operating together, produce a corrective of each other. The stringency in the money market turns out to be a blessing in disguise for the investor in tenements and flats and those who are more daring and who still have a desire to combine more of speculation with their investment will be tempted to purchase less favorably located tenements in the extreme end of Manhattan and in the outlying boroughs. If they buy them cheap enough, if they have a substantial equity upon securing desirable, steady tenants in newly-settled districts, they will have the satisfaction of knowing that they own a piece of property at a price below its cost of production, and the future ought, and I think will, realize for them their hopes for better rental returns and increased fee values.

Of course prophecy is both a safe and a dangerous thing—safe because no one can at the moment authoritatively contradict it—dangerous, because events may quickly prove its fallacy. None the less I feel safe in prophesying that, if business conditions in general fulfill their promise of continued prosperity, we may look forward to a gradual, steady, healthful return to normal activity in this as well as in every other branch of the real estate business.

J. L. BUTTENWIExER.

EVENING POST BUILDING.

J. L. BUTTENWIE8ER.
In response to the request of the Record and Guide that I write an article on the successful management of the modern office building, I feel that in no better way can I comply with such invitation than by giving the results of my own firm’s experience with down-town office buildings during the past ten years.

I have such modern office building to care for and to fill with the best class of tenants who will pay top prices for their offices, we now arrive at the serious consideration of its management. The management of a modern office building has become of necessity a science, since the high values of land and the great cost of constructing a skyscraper to meet the competition of the present renting market require the most careful attention to all details, both small and large.

The first thing to be secured is a responsible and efficient agent, having suitable offices, convenient for tenants, and a sufficient and capable office force to handle the business. Such offices are divided into departments, whose representatives look after their special branches, as follows:

(a) The agent or manager, who has the general supervision and looks after the preparation of renting plans, schedules, character of tenants, drawing leases and other necessary papers, prepared circulars, letters, etc., and passes upon all important questions that may come up. Purchasing supplies and the general care of the building are among the duties of the agent, and require honesty, ability and much time to be devoted to them.

(b) Cashier’s Department should contain an exact method of keeping records of leases, renting plans, references of tenants, payment of rent, etc., etc.

(c) Collectors, who must keep after tenants for prompt payment of rent.

(d) Renting clerks, who canvass for new tenants personally and by letter. Should be persistent in their effort to effect a lease, and in following up inquiries, their motto being “Vigilance is the price of success.” Arranging for changes in layout of offices, looking up tenants’ references as to responsibility and desirability.

The making of sub-leases, where tenants fail, leave town, need more space, or for other causes, is often a source of trouble (in case of dispossession proceedings), and should be avoided as much as possible.

All complaints of tenants should come to the office and be referred to the proper department. Great care is needed in handling these complaints in order to avoid friction between landlord and tenant, as polite but firm conduct on the part of the management will often save the landlord considerable money and at the same time put the tenant in good humor.

Next to the office management comes the superintendent, whom we will consider for the present as the chief engineer, whose duties are to look after the electrical and mechanical plant, and also to inspect all work done in care of the building. Cleanliness is a matter of first consideration, not only on account of health, but as adding to the general appearance of the building.

The engine room of a modern office building is located far below the street level, and resembles that of a large ocean vessel in its size and number and variety of pumps, boilers, engines, dynamos, etc. A pneumatic cleaning plant, water filter and cooling system, carpenter shop and storeroom for supplies and extra partitions, etc., are all part of a complete plant. The question of coal supply is a most important one in winter weather, as few buildings have sufficient space to store more than enough for one week’s consumption. Light, heat and power are generally supplied from the building’s own plant, though some take theirs from outside lines of steam and electric companies.

The great amount of space necessary to accommodate this department takes away from what was formerly known as the “basements” of stores, and to this extent is driving out of office buildings the retail stores. It is probable that in the near future this class of trade will be found located exclusively on the side streets.

The engine room force consists of assistant engineers (night and day), firemen (night and day), oiler, plumber and electrician; the number depending upon the size and character of the plant. Chief engineers often have their apartments in the building, generally a deck-house on the roof, so as to be always on hand in case of necessity. They also look after the fire hose and connections, and some instruct the porters in “fire drill.”

The care and up-keep of the elevator system requires constant attention, as no other branch of the “service” of a building comes in for so much complaint and criticism as this one. Elevator runners are a source of worry and annoyance, as they must be polite and efficient and have good memories for names of tenants and come in contact with many varieties of passengers in their cars. Their hours on duty vary, but are on the average about ten hours per day. When one is sick or away for any cause a porter or extra elevator man is put on the car to take his place. “Breaking in” of a porter as elevator man is one of the disagreeable features, as he requires a “regular” man to instruct him, and often leaves the building as soon as he knows a little of the duties of the position to engage somewhere else as an “experienced elevator man.”

Hallmen, or starters, are also watchmen, and patrol the building day and night. Porters and scrub women are under
CITY INVESTING BUILDING (in course of construction), Broadway, Cortlandt and Church streets.
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The Upper West Side

Present Era Finds Builders With No Lots Upon Which to Increase the Supply of Dwellings.

EDWARD CLARK, "pioneer" of the West Side, before a meeting of the West Side Association on December 20, 1879, read a paper entitled "The City of the Future." In this paper Mr. Clark illustrated the lack of foresight by the original founders of the City of New York, the inadequacy of conditions for both commercial and residential purposes, and the importance of planning a city which would be appropriate 100 years hence. He referred particularly to the necessity of making either in winter or summer; fourth, an owner who is willing to invest his money in so new a section, it is questionable whether the high character of the improvements could ever have been maintained.

While the old streets were being improved with dwellings, Columbus and Amsterdam avenues were being improved with 5-stay corner and inside apartments with stores, the character of which was so vastly superior to any offered to the tenant in other sections of the city, that the block fronts at the 72d street corner were soon fully occupied. This class of property was quickly taken up by investors and its production thereby augmented. Thus followed a period of great activity in the building of dwellings and offices; apart from the immediate advantage to the investor, which was realized to outrace its transit facilities—about 1901—new surface lines were constructed and the motive power of existing surface lines changed. The great advantage in crossing congested areas of running and running, and the West-Sider found himself in touch with every possible business or social center of the city by means of four surface trolley lines with their many connections together with the elevated and Ninth Avenue elecrtic systems.

BROADWAY REVIVAL

Although there was active building in progress all over the section, Broadway, as late as 1888, had been severely left alone. The erection of handsome residences along this avenue as first contemplated, was found impracticable. About this time there appeared in one of our leading newspapers an article which maintained that the 5-stay apartment must go, and that the West Side was stupidly built up. "The city," said Mr. Griffith, as flat, as did the skyscraper the old office building in commercial districts. This article aroused considerable interest and had a powerful effect upon determining the future of Broadway. Builders and operators now turned their attention to that section, Broadway, as late as 1898, had been severely left alone. The block intersecting Sherman square, that is, 72d street, between Broadway and Columbus avenue, has been leased by the Import Cigar Co. for twenty-years at a rent of $110,000. The business expansion on the West Side originated at the Grand Circle, then proceeded to Empire square, has now reached Sherman square, and will probably reach the location of the German square, that is, 72d street, between Broadway and Columbus avenue, bids fair to participate in this commercial development. Stuyvesant Square, for example, has been improved, the junction of the two surface lines on the west, an elevated station and surface lines on the east, and being on a driveway which is the connecting link between Fifth avenue and Riverside Drive, it has become the meeting place of elevated and streetcars. This puts them in touch with every possible business or social center of the city by means of four surface trolley lines with their many connections together with the elevated and Ninth Avenue electric systems.

GEORGE L. SLAYTON.

J. &. DE SELDING.

W. T. SARGEANT.

January 26, 1907

RECORD AND GUIDE
EDWARD CORNING

COMPANY

BUILDERS

100 WILLIAM ST., NEW YORK

RHINELANDER BUILDING
William and Duane Streets
CLINTON & RUSSELL, ARCHITECTS

WINTON GARAGE, Broadway and 70th Street
CHARLES A. RICH, ARCHITECT
Demand for Lofts South of 14th Street.

The demand for lofts south of 14th street has this year been better and greater than at any time in the past. This is especially true of the newer buildings, which have good, natural light and all the modern Improvements. During the present season, I have received more orders for lots of this description than it was possible to fill. The whole trend of our day is toward the concentration of business. The modern up-to-date merchant finds it necessary to apply this principle to his business, especially to the location of space, condensing his business to as few floors as possible, thus rendering personal supervision easier, and reducing the force needed for business of a given magnitude. If the entire business can be conducted on one floor, so much the better.

Fifth Avenue Transformation.

The year 1906 will go down in Real Estate annals as being one of marked activity and advancing prices on Fifth avenue and the adjoining cross streets. This activity has extended the entire length of the new business section, from 27th to 48th street, although south of 34th street, and north of 42nd street have perhaps disclosed the more important developments. The erection of the Brunswick Building on the old site of the Brunwick Hotel at 28th street has acted as a stimulant to that section and is, undoubtedly, indirectly responsible for the sale and final improvement of old Addicks corner at 26th street; also the Lyons Building now under construction at No. 296-8 Fifth avenue. Two other prominent buildings in this section. The now being built, one at the southeast corner of 23rd street, the other a 3-story building opposite the Waldorf.

It is also understood that plans are to be shortly filed for a Mercantile building at 296-8-90 Fifth avenue. Preliminary plans for ground in this locality show marked advances over the year 1905, lots readily bringing from $12,000 to $14,000 a front foot.

(Continued on Page 162.)
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Carnegie Library, Allegheny, Pa.; Smithmeyer & Pels, Arch.
Federal Bldg., Cleveland, Ohio; Arnold W. Brunner, Arch.
January 26, 1907

RECORD AND GUIDE

THE WEST STREET BUILDING.
John Peirce Co., Builder.
Cass Gilbert, Architect.

We look for higher prices in this section on account of the unusual transit facilities offered, a condition not enjoyed by that part of the avenue further north.

Between 34th and 42d streets the activity has not been so great, but this is explained by the fact that this property is now, I might say, out of the market. We have seen the opening of the new Altman store at 34th street, the new McCormick store in 34th street just off Fifth avenue and also the acquiring of sites by three of the prominent Trust Companies of the city; the New Netherlands Trust Company at the Northeast corner of 35th street, the Union Trust Company at the Northeast corner of 36th street, and the Farmers’ Loan & Trust Company between 40th and 41st streets.

The advent of these prominent financial institutions only emphasizes the strength and stability of this new business area. 34th street between Fifth avenue and Broadway has perhaps shown more marked development than any one block in the city. Prices have nearly doubled and the demand by the merchant for space brings out the fact that there is practically nothing left to offer.

It is impossible to predict the future of values or conditions in this block, but it will undoubtedly enjoy a higher standard than even 14th street or 23d street enjoyed in their palmiest days.

North of 42d street there have been some very prominent sales and building operations, some of them being the erection and opening of the new Day & Night Bank Building at the corner of 44th street, the buildings now under course of construction at the northwest corner of 45th street, the southwest corner of 46th street and the southwest corner of 47th street.

To illustrate the marked advance of prices in this section, we might cite the case of one building which has sold four times in the last three years, the first sale being made at $470,000, the next at $485,000, the next at $525,000 and the last sale in the neighborhood of $700,000. I might also mention the sale of the Lotus Club at $15,000 a front foot, as being a record price for this locality.

The question is now being asked on all sides, “When are prices on Fifth avenue going to reach their top?” It was predicted two years ago that we had seen the limit of value and that the merchant could not afford to pay the rents then demanded. Since then, rentals have steadily advanced, until as high as $15,000 a year has been paid for a single inside store, and it is no longer a question of what the landlord is asking for his space, but for the desired location, the merchant is willing to pay nearly any price.

Comparing, if such a comparison can be made, prices of store rentals on Fifth avenue to-day with Old Bond street and Piccadilly in London and Avenue de l’Opéra and Place de l’Opéra in Paris, the same relative streets in those cities, we find that Fifth avenue rentals, figuring on a square foot basis, are about

(Continued on Page 163.)
GEO. R. READ & CO.

Real Estate

Head Office: 60 LIBERTY STREET, near Broadway
Branch Office: 3 EAST 35th STREET, near 5th Ave.
20% higher, although the buildings in Paris and London are very old, the stores very much smaller, and the area much more limited than on Fifth avenue.

Fifth avenue property has been taken out of the hands of the weak holder and speculator and has been acquired by the estates, the large investors, and the merchants. The prices that can be bought at the present time are not at all out of proportion to the value that is being created between, and it is not now a question of what property is in the market, but more a question of who can be induced to part with his or her building, except at figures far above the present range of prices. This condition will undoubtedly be the cause of fewer transactions being recorded as time goes on. We may see a general period of trade depression and falling off of prices throughout the country, and if so, the building men of the Great West will exhibit a condition now that very strong pressure is being brought to bear on the Trustees of Columbia University to release the fees on the blocks from 49th to 51st street, but there are so many owners in these blocks, of our millionaire order, that they are not likely to oppose any encroachment of business, that it is doubtful if in the near future, we will see this section very greatly disturbed.

The movement on foot to compel the removal of all stoppers and encroachments on Fifth avenue and widen the roadway 14 feet will undoubtedly be brought to a close, and I find that the general opinion of the property owner, and merchant is very much in favor of this change. I might mention the case of two owners whose property is altered for business, but who still retain their lots and areas. These men do not believe that their property is depreciated in value by the change, but believe that they mean an expense of thousands of dollars to make the necessary alterations to comply with the law, are heartily in favor of the change, and think their idea of the value of their property would be much enhanced and they would get back many times over the money expended in the alteration.

The high rents and high ground values on Fifth avenue at Broadway have for some years been business streets. Rentals are good and prices have advanced, unimproved land selling readily at from $4,500 to $5,000 a front foot. Between 25th and 45th streets and Fifth and Sixth avenues, we have seen in the past year the first movement to the upper part of the Heights.

Factory rents. I have in mind one builder who put up three apartments in the upper part of the Heights in a street some ten or twelve minutes from the nearest elevated station. The demand for property has been for the best. Every builder who has put up a good building, well constructed and laid out, and little or nothing left for the builder to do, he has had little difficulty in filling all the apartments, all of which have been rented easily. There are practically no vacancies in old-law houses on Washington Heights, and if any were they would be quickly snapped up by keen speculators.

The year of 1906 has been in many respects one of the most remarkable in the history of real estate on Washington Heights, and a careful and dispassionate review of its progress, its changes, and the conditions that have been developed in the early part of the fall the situation on Washington Heights was such that no man could have had his finger on the pulse of events of the great times that were and are in the upper part of the Heights. The market grew tighter active trading was curtailed here as in other parts of the city. The fact remains, however, that there is a demand for property that is not the slightest degree. Now that money has become easier and more liberal, the proportion of foreclosures has been less. There have been many more of a like nature could be quoted. Where there have been a very much more active aspect to the market. The demand for property has been for the best. Every builder who has put up a good building, well constructed and laid out, and little or nothing left for the builder to do, he has had little difficulty in filling all the apartments, all of which have been rented easily. There are practically no vacancies in old-law houses on Washington Heights, and if any were they would be quickly snapped up by keen speculators.

The summer of 1906 saw the beginning of the greatest building activity ever known in New York, and in this Washington Heights had its proportionate part. The prices of materials went higher and higher, and the building men of the Great West found plans going singly on. In the beginning of 1906 many of these buildings, which were apartments of all descriptions, were completed, and it is estimated that during the month of January, February and March, and there was grave apprehension that something must be done to stop the building boom or the great development in the Heights would stand unoccupied for a long period. To the surprise of all, however, the contrary proved to be the result, and renting during the past few months has been so brisk as to be, in my mind, nothing short of phenomenal.

And not only was the demand for new flats active, but what was far more encouraging was the fact that there was a great activity in sales of houses also. The demand was so keen that many building men who are practically out of business and have no building plans are said to be on the lookout for some duplicates of their old plans. The question that was foremost in the minds of all of those who are interested in real estate on Washington Heights was, whether this great increase in prices was also as great an increase in actual values. And now that the buildings are drawn to our close we are in a position to say and to prove conclusively how well-based and how void of inflation the rise in values on Washington Heights was.
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We are furnishing the Steel Work for the Metropolitan Tower, which is illustrated on another page
CORTLANDT STREET VIEW—CITY INVESTING CO'S BUILDING.

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Builders

No. 1 Madison Avenue, - - NEW YORK

Among the buildings we are now erecting are the following:

Tower of the Metropolitan Life Insurance Building
Messrs. N. LE BRUN & SONS, Architects

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Mr. FRANCIS H. KIMBALL, Architect

American Bank Note Building
Messrs. KIRBY, PETIT & GREEN, Architects

West 42d Street Terminal, Pier Sheds, etc., of the New York Central R.R.

Metropolitan Garage
Mr. A. NAMUR, Architect

Metropolitan Life Insurance Archives Building
Messrs. N. LE BRUN & SONS, Architects

Connecticut Savings Bank, New Haven, Conn.
Messrs. GORDON, TRACY & SWARTWOUT, Architects
January 26, 1907

RECORD AND GUIDE

Manhattan's Highest Skyscraper.

METROPOLITAN INSURANCE COMPANY'S TOWER WILL OVERTOP THE SINGER BUILDING—PLANS COMPLETED BY MR. LE BRUN.

Working plans have been completed by Napoleon Le Brun & Sons, architects, of No. 1 Madison av, for the highest tower building in Manhattan, to be erected on the southeast corner of Madison av and 24th st, across the street from the uptown office of the Record and Guide, which will complete the Metropolitan Life Insurance Co.'s home office building, on the block bounded by Madison and 4th avs, 23rd and 24th sts. This plot measures 55x156 ft., the site being that of the old Madison Square (Parkhurst) Presbyterian Church. The Hidden Construction Co., of Madison av, is the general contractor; the American Bridge Co., of 42 Broadway, will furnish the steel, and Messrs. Post & McCord, of No. 21 East 23rd st, have taken the contract for the erection of the structural steel. Steel columns weighing between 600 and 900 tons will be required in the corners of the tower, and at the thirty-first story eighteen steel columns will be placed.

Second highest of New York buildings will be the tower of the Singer Building, at Broadway and Liberty st, which will rise 503 ft. The Washington Monument is 555 ft.; the Philadelphia City Hall, 517; the Cologne Cathedral, 515; the Pyramid of Cheops, 480; the Antwerp Cathedral, 476; the Strasburg Cathedral, 474. The third highest building in New York is the West Street Building, 404 ft. The Park Row Building is 382.

The entire steel frame will be a regular bridge job, bolt-punched and reamed.

The building operations of the company on the block commenced in May, 1890—when the five old brownstone mansions at the corner of Madison av and 29th st were demolished and excavations were started. By the spring of 1893, the building was sufficiently advanced for the company to move in, and by the summer of 1894 this first section of the building, with a frontage of 125 ft. on Madison av and 145 ft. on 24th st, was completed. The increasing business of the company required in 1895 an addition in 24th st, 115x100 ft. in area, and in 1898, a 2-story extension with a frontage of 180 ft. occupying the centre of the 23d st half of the block.

The next operation, started in 1901, was an important one, and extended the building for its full height to and around the corner of 4th av and 23rd st, and included the sites of the old Academy of Design and of the Lyceum Theatre, as also some 2-sty brick structures on 24th st, adjoining the first extension of the Metropolitan on that street. The building on this plot, 99x100, at the corner of 4th av and 21st st, was finished last May, leaving only the Parkhurst Church site unoccupied by the company. Up to this point the crownings cornices and all the horizontal lines and features of the building have been carried around the block at the same levels, and with a monumental sweep and nice balance of parts that the size of the block, 425x50 ft., and the height of the building, 165 ft. above sidewalk level, rendered possible.

The company occupies over 90 per cent. of the present building, including the annex for its home office purposes; and for the convenient transaction of its business required more space on the different floors, which the Madison av corner will provide. This corner furnished an opportunity to supply future needs of the company's office force by increasing the height of the building, and meanwhile, until the occupancy for this purpose becomes necessary, to increase the rental returns. It has been decided, therefore, to complete and crown the work with a tower. It will be probably the highest and most massive structure of the kind in New York City, and indeed, up to the present time, in the entire world. It may be noted how ideally fitting is its location, opposite the open square overlooking the junction and beginning of the two busiest and most important streets of Greater New York.

The pure, early Italian renaissance style of the main structure will, of course, be preserved throughout, the tower in its general design and outline belonging to the type of the Italian Campanile of the period. It will rise from a rich base, continuing in line and detail the general features of the four lower stories of the main building.

Above the fourth story the design of the shaft of the tower will be severely simple, consisting of three groups of triple windows on each side, with heavily moulded and deeply recessed jambs; this treatment to extend through twenty-one stories without interruption other than a course of projecting marble balconies at the level of the main cornice of the main building, whose projection will extend through twenty-one stories without interruption other than a course of projecting marble balconies at the level of the main cornice of the main building, whose projection will

(Continued on Page 173.)
HUSTON & ASINARI

Real Estate

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Expert Management of Business Property

320 Broadway, New York
Comparatively few realize the magnitude of the problem involved in attempting to furnish transit facilities adequate for this great city, due to the constant growth of its population and the steady expansion of each borough. It is not generally known that over three-quarters of the population are compelled to travel by the various railroad systems, surface, elevated and subway lines, and this mainly in going to and from their places of business to Manhattan from all the boroughs, which large travel, represented by single fares, amounts to between three and one-half and four millions of passengers daily. Of this number the four elevated lines have on one special day carried 125,000 passengers and the subway, but two years in operation, carried on the same day nearly 565,000 passengers, or in the ratio of about four passengers to seven passengers during the same time.

Realizing the demand for increased facilities, the Board of Rapid Transit Railroad Commissioners took under consideration two years ago the question of new routes and extensions, and, as a comprehensive plan to meet all possible requirements, finally adopted in May, 1905, nineteen specific routes, covering about 165 miles, principally subways, and involving an expenditure estimated at about $300,000,000, to be constructed as traffic demands require. In conjunction with the Board of Estimate and Appointment, the Rapid Transit Board has now authorized the letting of contracts for what are considered at present routes most desired. Of this series of routes one is the Lexington avenue route, a line on the east side of Manhattan, extending from the Southern Boulevard, in the Borough of The Bronx, to the Battery. Another route extends from Woodlawn Avenue route, Jerome Avenue to Harlem River, thence through Eighth avenue and Seventh avenue on the west side of the city to the Battery. Direct connection by stations will be made by the Lexington avenue route with the New York Central Railroad and by the Seventh and Eighth avenue line with the Pennsylvania Railroad, these two railroads at present being engaged in making extensive improvements in Manhattan.

Almost ready to be put in contract form is also the so-called Tri-Borough route, which extends from Pelham Park, in the Borough of the Bronx, through Westchester Avenue to the Harlem River, thence via Third avenue to the Battery, with a connection with the new Manhattan Bridge to Brooklyn, thence via Fourth avenue to Fort Hamilton, with a branch to Cony Island. Another of these routes is a line extending from the end of the present subway at Bronx Park to the northern part of the city through White Plains road.

A route which has been laid out, but which unfortunately has not been able to be finally determined upon by the Board on account of delays in obtaining the consents of abutting property owners, is the connection with Brooklyn by a loop line. This connection is of great importance, and the Board, recognizing the necessity for the same, is doing everything in its power to get this route into contract form, as, in a great measure, it will relieve the present congestion at both the Brooklyn and the Williamsburg bridges.

New York City is doubling its population practically every thirty years, and the travel doubles itself every twelve years. For the last twenty-five years New York has not had the facilities for travel which it should have had, and at the present time the traveling public is very much inconvenienced in every direction. No matter whether one travels by the ferries, the bridges or any of the railroads in the rush hours, he is bound to meet congestion on almost every line extending through and out of the city.

Governor Hughes still insists that the proposed new Rapid Transit Commission should be appointed by himself rather than by the Mayor, but the only reason which he can give for a State Commission is the fact that in some instances, such as the Portchester R. R., the lines coming under the jurisdiction of the Commission have a part of their mileage outside of the city. But it might just as well be argued that it ought to be an inter-state Commission, because the New Jersey trolley companies propose to operate a tunnel into Manhattan and a subway under its streets. It would be perfectly simple to plan the constitution of the State Railway Commission and the local Transit Commission so that they could have, as it were, a co-operative jurisdiction over roads such as the one which the Portchester Company is building. Surely the reason which Mr. Hughes gives is a very trivial one compared to the startling character of the innovation he proposes. New York is not accustomed to being governed by Boards appointed by the Governor of the State, and it will not take kindly to the change. After many years of agitation the power of appointing the Rapid Transit Commissioners was finally conferred on the Mayor and there it should remain. The only possible result of persistence by Governor Hughes in his idea of a State Company is the failure of his plan for a Rapid Transit Commission with really sufficient powers to guard the interests of the people of New York in economical and efficient means of communication.

George A. Fuller Co., Builder.

Pennsylvania Railroad Station—7th Avenue View.

McKim, Mead & White, Architects.
The Suburban Auction Market

The results of the various auction sales of vacant lots in the boroughs of Brooklyn, Queens, The Bronx and Richmond during the year 1906 have been generally satisfactory, but so far as the total number of sales is concerned, several years in the aggregate have shown a more prosperous record. This statement may seem surprising, in view of the unprecedented speculative activity in the four outlying boroughs during the first half of the year. The reason, however, is apparent, as the owner of a large tract of vacant land could, in the majority of cases, sell his property in bulk for more than it would bring under the hammer in lots. Speculation in acreage at private sale has been rampant, and has included the good, the bad and the indifferent. Indeed, this speculation has been relatively greatest in the most inaccessible and sparsely settled locations, particularly in some sections of Richmond and Queens, the reason being that the apparent cheapness of properties so located has appealed to outside speculators, who reason that “any old thing,” as long as it was within the limits of the City of New York, could be made to sell.

Now, on the other hand, if a large tract of land is to be successfully disposed of at auction in lots, the property must be of relatively high character; it must be quickly and cheaply reached from the business centers of Manhattan; it must be in or contiguous to some local center of population and industry, and it must have water and gas mains, either throughout the property or where connections may be inexpensively made. The owner, moreover, must be conservative in his ideas of value. There are other improvements and advantages which the property should possess, but the above are the essentials.

The truth of this proposition is amply demonstrated by the auction sales during 1906. On the theory that any lots within the city limits could be sold at auction in such a bulk market, several sales were attempted in remote and inaccessible locations, and the result in every instance was a dismal and costly failure. Conversely, sales where the lots possessed the essentials we have enumerated were successful, and as a rule good prices were realized.

During the year the more prominent auctioneers received many visits from owners of large properties who wished to arrange auction sales, but who expected that their respective holdings would bring about as much as similar properties were retailing for at private sale; this, too, despite the fact that these latter properties were probably being sold at relatively enormous expenses for commissions to soliciting agents and for newspaper and other advertising. It certainly speaks well for the auctioneers as a whole that few, if any, sales of this character were attempted. If we will be pardoned for referring to our own business, we may say that we have probably refused since the 1st of last January at least fifty such auctions.

The people who attend a large lot sale have become, we are glad to say, very discriminating. The majority of the buyers are as a rule from the neighborhood and are acquainted with real values. Westerners and Southerners, who have in the aggregate thousands of dollars to invest, have discovered the advantages of the four outlying boroughs. It certainly appeals to them. The Borough President of Richmond, Mr. W. H. P.立体，has been divided among equally between the two boroughs, and the result is that the Borough President has been satisfied to sell.

A noteworthy feature of the year has been that for the first time in many years there has been an active auction demand for well-located lots in the Borough of Richmond. A number of successful sales have been held. We ourselves disposed of, in four sales, about 600 lots, all we had to offer; and although we would not consider this anything out of the ordinary in the boroughs of Brooklyn and Queens, these sales were the most successful held on Staten Island since 1860. About 70 per cent. of the buyers were residents of the Borough of Richmond, most of the remaining 30 per cent. being from Manhattan. The prices realized, although relatively low, considering the character of the property, were more than we had expected.

The improved ferry facilities, the establishment of several enormous manufacturing plants and the fact that the Borough President is acquainted with local conditions and is alive to local needs, point to a better and more lasting demand for well-located property than has been heretofore the case.

The great advantage in selling a large number of lots at auction is the economy. For instance, during the past year the average cost of advertising and conducting our own sales, exclusive of the physical development and of our commissions, was less than 1½ per cent. of the total amount realized. Of course, this percentage varies. In one case last spring, where we sold about 200 high-grade Brooklyn lots, the expense was within a few dollars of one-half of 1 per cent., and yet this particular sale was very extensively advertised. The disadvantage of an auction is the uncertainty of prices. In many instances the property brings more than the auctioneer can reasonably anticipate, judging from other sales in the neighborhood, but in some instances it brings less. As regards the auction branch of our own business during the year now ending, we are perfectly satisfied, both with the number of sales held and the prices realized; and we trust that the new year will show equally favorable results.

JERRE JOHNSON, JR., COMPANY,
Remsen Johnson, President.
Large Transactions of the Year and Their Effect.

Probably the year 1907 was the banner one for large transactions in real estate. Sales of a million dollars and over have been so common as almost to cease to attract special attention. It is not many years ago when a sale of two hundred thousand dollars was regarded as a very large transaction, while to-day one of four millions causes no extraordinary excitement.

The most important sales that have occurred were the Stewart Building, about $1,000,000; the Lord's Court Building, 27 William street, at nearly $3,000,000; the Broadway Tabernacle, about $2,000,000; the Altman store, at 6th avenue, 18th and 19th streets, about $2,500,000; the Coal and Iron Exchange, southeast corner Liberty and Church streets, about $1,500,000; Proctor's Fifth Avenue Theatre, about $1,000,000; 5th avenue and 15th street, about $1,500,000; 100-104 Broadway, about $1,000,000; 95-97 Broadway, about $1,000,000; the Union Dime Savings Bank, Broadway and 32d street, about $1,000,000.

Most of these properties have been sold for improvement. One hundred and sixty and 164 Broadway will be the site of the Lawyers' Title Insurance Company Building; the Coal and Iron Exchange site will have a 25-story building; the Consolidated Exchange, 58-62 Broadway, is in the hands of a trust company and was bought for investment and their own use; the Broadway Tabernacle plot is being improved with a 12-story building; the 5th avenue and 15th street corner was bought as a permanent investment; the Stewart Building site will, in all probability, eventually have to be improved with a large building. Lord's Court, a 19-story up-to-date office building, is the first office building sold to a private investor; the few other sales of office buildings have either been trades to corporations or speculators.

Possibly only two or three of the parcels named have been sold to speculators. This indicates the willingness of large capitalists to put their money into New York real estate and the withdrawal of many of these parcels permanently from the market narrows it for those who may wish to follow the example of this year's buyers. On the other hand, the owners who have disposed of these large holdings and made substantial profits are very likely to turn their money back into real estate in which they have been so successful, feeling that it is safer than other investments, some of which are under fire by the courts and the National Government. The history of these large transactions as well as that of the small ones tends to confirm the view that there is no safer or better investment in the long run than Manhattan real estate.

HERBERT A. SHERMAN.

Manhattan's Highest Skyscraper.

(Continued from page 109.)

have the effect of continuing the line of strong shadow of that cornice without interfering with the upward trend of the piers and heavily rusticated angles of the tower. At the 21st, 22d and 23d stories, or 334 ft. above the sidewalk, will be a great clock with dials on each front 25 ft. in diameter, hands 12 ft. and figures 4 ft. long—which should be visible and give Metropolitan time to New Yorkers for miles around.

The capping to this shaft will consist of, first, a line of boldly projecting, double-bracketed and paneled balconies, throwing a deep shadow and forming, as it were, a necking, and then deeply recessed Ionic loggias, with five arched openings on each side of the tower. Over the arched openings will come a deep frieze with windows and then a cornice and parapet balcony. Over the parapet the walls of the tower will be offset in receding 8 ft. on each face. This offset portion will continue up four stories and form a base for a pyramidal termination—pyramid being terminated in an octagonal colonnaded observatory, which will terminate 638 ft. above the sidewalk level.

**DIMENSIONS OF THE METROPOLITAN TOWER**

<table>
<thead>
<tr>
<th>Dimension</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Frontage on Madison av</td>
<td>75 feet</td>
</tr>
<tr>
<td>Frontage on 24th st</td>
<td>55 feet</td>
</tr>
<tr>
<td>Height above sidewalk</td>
<td>655 feet</td>
</tr>
<tr>
<td>Height from cellar floor to top</td>
<td>650 feet</td>
</tr>
<tr>
<td>Total height from foundation</td>
<td>650 ft</td>
</tr>
<tr>
<td>Height of clock face above sidewalk</td>
<td>346 feet</td>
</tr>
<tr>
<td>Floor of lookout (44th story)</td>
<td>603 feet</td>
</tr>
<tr>
<td>Centre of window over lookout (highest point for observation) above sidewalk</td>
<td>623 feet</td>
</tr>
<tr>
<td>Number of stories above sidewalk in tower</td>
<td>48</td>
</tr>
<tr>
<td>Number of stories below sidewalk in tower</td>
<td>2</td>
</tr>
<tr>
<td>Grand total of cubic feet in building</td>
<td>16,287,034</td>
</tr>
<tr>
<td>Grand total floor area Metropolitan Building</td>
<td>(about 25 acres), feet</td>
</tr>
</tbody>
</table>

**GENERAL WAITING ROOM—PENNSYLVANIA RAILROAD STATION.**

George A. Fuller Co., Builder.  
McKim, Mead & White, Architects.
THE ONLY CLASS OF APARTMENT HOUSES NOT WELL RENTED ARE THOSE NOT HAVING GOOD TRANSIT FACILITIES OR ARE POORLY CONSTRUCTED.

Looking over the record of the real estate market during the year one cannot but feel that with the exception of the tight money market we have a very satisfactory condition of affairs. In the Spring of 1906 there was a general cry of over-production of apartments and flats in the outlying districts, the Bronx and Washington Heights in particular, and also that the prevailing prices for business property were too high, and that reaction must set in. Pessimists are to be found in every walk of life, and it is hard to convince them at any time that a healthy condition of affairs exists. But to those weighing the matter calmly and without prejudice it will be evident that everything points to a very active market for 1907. The renting of apartments has been remarkably good, and any danger of over-production is now passed, as during the year so few new plans have been filed that it is safe to say that the necessary number to keep up with the ordinary demands caused by the growth of the city were not complied with, and that if it were not for the large number of buildings that were planned during 1905 and started during that year and the Spring of 1906 we would find that we were behind in building operations. The only class of apartment houses that is not well rented today are those that have no transit facilities within reach, or those that have been poorly constructed. No complaint is heard from the builders that have constructed honest buildings along the line of the Subway and Elevated railroads. This is particularly noticeable in the elevator houses and well constructed five story non-

Robert E. Simon.

Send for list of property for sale.

ESTABLISHED 1868

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BENJAMIN MORDECAI, Treasurer,
G. RICHARD DAVIS, Secretary

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135 Broadway

Buys and Sells Realty. Makes Building Loans and Buys Second Mortgages

January 25, 1907

R. E. SIMON.

(Vice-President, Henry Morgenthau Company.)
The Mortgage Situation and Its Effect on Real Estate Values.

Here can be no doubt that the loan market has a great deal to do with real estate values; especially is this so where the small buyers have been asked by the money-lending institutions, Executors and Trustees to pay off their mortgages prior to the mortgage tax law of 1906 and have matured. In many cases the loaners have been willing to make another mortgage under the present law, whereby compelling the borrower to assume the tax and relieve the loaners from the personal tax which exists on all mortgages made prior to the tax law. This is the effect of hasty legislation, requiring one class of mortgages to pay three times more than the others. It is this feature of legislation that is causing a clash between mortagors and mortgagees, affecting both wealthy and poor buyers; both are compelled to pay the expenses which include the mortgage tax of 1906.

SHELDON B. SHAW.

There has been a suggestion of amended legislation to remedy this trouble, but I have my doubts if it can be legally done; in other words, would the legislature have the right to eddy this trouble, but I have my doubts if it can be legally done. This is the effect of hasty legislation, requiring one class of mortgages to pay three times more than the others. It is this feature of legislation that is causing a clash between mortagors and mortgagees, affecting both wealthy and poor buyers; both are compelled to pay the expenses which include the mortgage tax of 1906.

There is, too, a call upon the Banks to take care of the crops in the last three months; this is another factor looking for high money. In this class of cases the money is sent West to pay the farmers for the grain and then the grain is sent abroad to the various points of destination and the money returned to the banks after from sixty to ninety days.

Also, the calling of all matured loans of any denomination, from $10,000 to $20,000,000, no matter what the rate of interest may be, especially those that do not come under the mortgage tax law of 1906, has become general owing to the prevailing high rates of interest for call loans, which has existed for a year past, greater in fact than has ever before been known.

The writer knows of a case where a loan of $50,000 has been in existence upwards of twenty years at 4½ per cent, and it has been made and refused, has been called for the reason no doubt that they can get six per cent or better for the money on call. I have no doubt there are many such cases to support this theory. One of the officers of one of the largest Trust Companies informed the writer some days ago that for several months all their funds had been loaned at not less than six per cent.

Therefore, I say, anything tending to raise the price of money affects the mortgage situation which in turn affects the value of real estate.

SHELDON B. SHAW.

(Office Richard Y. Hatnell & Co.)

The New Shopping Center

At the present time, lots in West 34th street do not rent as well as they should. Business men in the street believe that at least three years must pass before the market for retail and business buildings is completed, and the block is firmly settled by the big stores now locating in said vicinity. In this city, it seems safe to say, judging by the present demand for locations in this block, that the lots now to be had will be all rented. The speculators have come and gone; they have taken their profits with them. The investors have followed and with them have come as purchasers, the large business houses. Closely on their heels have followed the usual movement of building and altering for stores, lofts and offices. Now nearly every available store in this block has been leased for a long term. Therefore we feel that the smaller business concerns must, as a logical sequence, come into the field—the little furrier hastening into closest possible proximity to Revillon Freres, the little shirt manufacturer and jobber, the shirtwaist, the lace, the white-goods man hurrying to locate near Altman's, McCrery's, Saks' or Macy's, and for the same reason the stock broken and the banker will choose his office or his floor near the uptown financial centre,—the Waldorf, and near the North River, the Thirty-Fourth Street National, the Astor National Bank or the Kiddekerber Trust Company. It seems reasonable to us to believe that lots and floors in this block will not long be unoccupied.

Between Sixth and Seventh avenues, and extending westward from Seventeenth avenue there is an active movement among the big operators. They are to-day searching for the cheapest parcels to be found and buying quickly. The great limestone

BROADWAY AND LIBERTY STREET VIEW—SINGER TOWER.


Ernest Flagg, Architect.
The Year in the Bronx
By the HON. LOUIS F. HAFFEN

The year just closing has been for Bronx building and real estate interests a repetition of 1905, a period of unprecedented progress and prosperity. Population has greatly increased and the number of buildings erected is the largest in the history of the borough. The estimated cost of these buildings is slightly below the cost of buildings erected in 1905, but for second floors. The upper floors do not rent readily, mainly on account of the high prices asked, and similar lofts in neighboring streets can be had at much lower rentals. Tenants in the upper lofts can just as well conduct their business in some of the adjoining blocks. If, however, long leases can be obtained, even at the present prices there will be no difficulty in renting the lofts which are now vacant, but prospective tenants will not pay very high prices, if they can get the buildings on short term leases. We can safely say however that the present demand for loft locations in this vicinity is fully one-third better than one year ago.

The Year in the Bronx

Charles Ditson, Owner. Townsend, Stekle & Haskell, Architects.
The Year in Bronx Real Estate.

The year of 1905 was one of the most active years in Bronx real estate and in the latter part of that year hundreds of acres had passed from old estates into the hands of operators and hundreds of buildings, mostly apartment houses, had been begun, and the year 1906 opened under the most favorable auspices. The year was most marked, however, in the completion of the work of 1905, and that was the movement of the vacant land from the operators into the hands of the public, the completion, obtaining of permanent loans and the rental and sales of completed properties. The feature of the year, however, and what has made the year peculiar to itself is the marketing of enormous amounts of vacant land in this section from the hands of the operators into the hands of the public by means of auction sales, and this year will always be known as the great auction sale year.

From the middle of April there was hardly a week in which there were not one or two large auction sales, the majority of which were very successful, the only instance of failure being where the owners of the property held same above and beyond its actual value, and in this connection it is fair to say the public have proven themselves good judges of real estate and only in very few cases have they allowed themselves to be carried away by enthusiasm in paying more for the property than its actual value.

The sections affected by these auction sales were mostly in the East Bronx, along the line of Westchester avenue and the Throgs Neck section. The estates disposed of here were the Catholic Protectory property, the Sisters of Charity property, the St. Joseph’s Orphan Asylum property, the Ketcham property, the sub-division of Morris Park, the Waring property, the Harrington estate and a sale at Baychester.

In the White Plains road district the largest sales were part of the Schlefflin estate, the Katharine estate, the Adco estate, the Penfield property and numerous smaller sales. In the West Bronx district along the line of Jerome avenue the Dickinson estate was sold, and parts of the Bruner and Varian estates.

During the first part of the year money on bond and mortgage was plentiful, and the builders had no difficulty in obtaining their permanent loans, but about the first of May the money market commenced to tighten up and the money for permanent loans became more difficult to get hold of. This condition has continued until about in the last two or three weeks, when amounts of money to loan on bond and mortgage have appeared in the market, and it is hoped in the coming spring the mortgage market will be very much easier.

A BLESSING IN DISGUISE.

This tightening of the money market and the difficulty in obtaining permanent loans, to my mind, was a blessing in disguise to the realty market in The Bronx. While many builders who had their houses sold were unable to deliver them on account of being unable to get the permanent mortgages desired, it has checked building, particularly of flats and apartments, to such an extent as to do away entirely with the fear of overproduction, and will allow the houses already built up to fill up and become a paying investment. Indeed, it the tight money market continues very much longer the growth of population in this district will catch up and go beyond the necessary accommodation, thereby precipitating the same state of shortage in accommodations that existed two years ago.

The filling up of the houses completed during the last two years has made a large increase in the population of the district, which is beginning to show its effect in a greater demand for stores in the business section and the marked tendency to increase the rents and values in the business centres.

The inflation in Bronx values which was feared during the year 1905 has now passed away, and the values of the property in the district are more stable, more settled and on a more solid basis than ever before in its history, and while undoubt-
There will be an attempt in certain districts to boom prices beyond the actual values, but the public is too discriminating to allow themselves to be fooled.

The outlook for the coming year is therefore for a good, steady, substantial business. I do not think there will be great activity in any particular section; rather the activity will be confined to those sections which will be open by the new rapid transit roads extensions of the present line, which will, of course, open large sections to convenient access to business centers.

There will be probably a steady absorption of apartment houses by investors who have small means and can live in the houses and take care of them, but I think the builders who will erect one, two or three-family houses in good neighborhoods will find a fair better market for them, with better chances of profit.

Altogether the year 1907, to my mind, is a year to be looked forward to, with confidence that there will be a fair amount of work and a fair share of profits in the real estate market in The Bronx for all concerned.

J. CLARENCE DAVIES.

The New Consolidated Exchange.

(See Illustration, page 140.)

The new building for the Consolidated Stock & Petroleum Exchange, situated on the southeast corner of Beaver and Broad sts, is to be built from plans by Clinton & Russell, the architects, and will occupy a plot fronting 100 ft. on Broad st and 112 ft. on Beaver st. The classic style of architecture has been employed to advantage, the Broad st front showing a series of massive Ionic columns. The material used in the exterior will be of limestone on a base of granite.

The board room will be four or five feet above the Broad st level, with steps leading up from the sidewalk all along that side of the building and affording access to the three large doors which will be the members' entrances. The trading floor itself will be about 95 by 82 ft. in size—a room of about 7,500 sq. ft. Special care has been taken to provide the floor with abundance of natural light, even on the darkest days. Not only will the whole of the Broad st front of the building, back of the row of Ionic columns, be practically one immense window, as in the case of the New York Stock Exchange, but a dome with a center skylight 30 ft. in diameter will let in a flood of light from above.

The facade in scheme will be that of an Italian villa, material for same will be of limestone, brick and terra cotta with wide projecting Spanish tile roof, supported by large ornamental bronze brackets. Brick work will be Roman-shape, laid up in Flemish bond. The Riverside Drive elevations will have two towers which rise above main roof and are connected by a pergola. As the house is situated at one of the most picturesque points of the drive, it will be the crowning feature of a series of terraces overlooking the driveway. The building is owned by "The Hendrik Hudson Co." Geo. F. Johnson, Sr., is President; Geo. F. Johnson, Jr., Vice-President, and Alexander Kahn, Treasurer.

Luxury in the New Hendrik Hudson.

(See Illustration, page 179.)

The Hendrik Hudson, one of the largest apartment houses planned during the last year, was designed to meet the large demands for luxurious apartments of seven, eight and nine rooms, which has been such a feature in the past renting season. The architects are Rouse & Sloan. The building covers a plot 208 ft. on Riverside Drive and 200 ft. on Cathedral Parkway and 135 ft. on 111th st and 91 ft. on Broadway. It is planned with a system of exterior courts so that all apartments face the drive or streets. There will be fourteen apartments on a floor, consisting of seven, eight and nine rooms with three baths. The living rooms will be grouped around the foyers with separate entrances in each apartment for service, giving a large degree of comfort and privacy. There will be direct connection between the building and the subway at 110th st. The elevators front on a central court, forming a feature on each floor. The corridors will be wide and well-lighted.

The facade in scheme will be that of an Italian villa, material for same will be of limestone, brick and terra cotta with wide projecting Spanish tile roof, supported by large ornamental bronze brackets. Brick work will be Roman-shape, laid up in Flemish bond. The Riverside Drive elevations will have two towers which rise above main roof and are connected by a pergola. As the house is situated at one of the most picturesque points of the drive, it will be the crowning feature of a series of terraces overlooking the driveway. The building is owned by "The Hendrik Hudson Co." Geo. F. Johnson, Sr., is President; Geo. F. Johnson, Jr., Vice-President, and Alexander Kahn, Treasurer.

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501 EAST 22nd STREET, NEW YORK CITY
Harlem in 1906.

WONDERFUL RISE OF PROPERTY VALUES IN 125TH STREET—SECTION BORDERING RIVERSIDE DRIVE BUILDING UP RAPIDLY.

The growth of the great City of New York is not to be denied, neither is that of Harlem, which has kept pace with the rest of the city, in fact, some districts have so improved as to astonish even the most sanguine. Harlem has felt the effect of rapid transit via subway, which stimulated the building of many apartment houses of different types, so that we could accommodate those who had to leave the Pennsylvania Depot district; and the consequence is that all the old-law houses are full and the new ones filling up almost as soon as finished. There has been a great demand the last six months for old-law houses; in fact, we cannot supply the demand, even at prices 30 per cent, higher than two years ago.

Business is also concentrating in Harlem, the residents finding they can do as well in the shops here as by spending their time and money going down-town, and as a consequence stores on the main thoroughfares command good rents. One Hundred and Sixteenth street is fast growing to be considered a business street; where three years ago were only flats, now the first floors have been transformed and every store is rented as fast as finished. The block between Seventh and Eighth avenues is considered the best in that section, rentals being nearly 20 per cent, higher than on the blocks further east; therefore the price of land has greatly increased within the last two years. The block between Fifth and Lenox avenues is a good second in that line, owing to the thickly populated section on and adjoining Fifth avenue and the subway station on Lenox avenue.

Seventh avenue holds its own, but owing to putting the water mains and the proposed improvements of making it a boulevard keeps it in an unsettled condition, rentals are not so good, but property is held at a high price, as, just as soon as improvements are complete, Seventh avenue will be one of the finest in the city.

Eighth avenue has steadily increased as a business thoroughfare and store rents keep going up, half stores renting for $65 and $75 per month. But the street which has surprised all is 125th street. Values have so increased it would seem like a fairy tale. Taking the blocks Eighth to Lenox avenues, stores which a few years ago rented for $5,000 and $4,000 a year now command from $8,000 to $12,000; in fact, all the property on the south side was leased within one year or so for long terms, and nothing can be had at any price. There is no use giving values, because nothing can be bought, but lots on the south side would easily bring $10,000, while those on the north side $15,000. The section adjoining the extension of Riverside Drive and Broadway is building up so rapidly and filling up with good tenants that business is extending west of Eighth avenue on 125th street and Manhattan street, and the indications are that with the Eighth avenue subway 125th street at this section will become one of the great centers of travel.

The block between Fifth and Lenox avenues has been greatly injured by the short-sightedness of either owners or agents in renting the stores to those "nickel-in-slot and moving pictures," which has spoiled the block for shoppers. The demand for private houses continues good and the supply limited, particularly in the renting line. With our population increasing rapidly, real estate on Manhattan Island shows the best and safest investment.

P. E. BARNES.

Development of South Brooklyn.

John Pullman, of the Brooklyn Board of Real Estate Brokers, says the prospects of Brooklyn are better than in any other borough in the city. "Manhattan," he says, "has 13,487 acres, Bronx was 25,270, while the Borough of Brooklyn has 49,050—more than these two combined. People have been driven from Manhattan by the thousands, and yet we have thousands of lots on which to build a home. What with our beautiful drives, including Shore Road Boulevard, our view of New York Bay, Prospect Park and other attractions too numerous to mention, we have things that will make Brooklyn the largest and greatest borough in Greater New York. The development in South Brooklyn has been extraordinary within the past few years. Kensington, Borough Park, Bay Ridge, Martense; in fact, all that land lying between Coney Island and New Utrecht ave, has undergone a great change. The building boom is still on. There is no danger of its waning."
The assessment rolls of the city of New York were opened for public inspection on Monday. They show a total increase throughout the entire city in the assessments of 1907 over those of 1906 of $179,965,220. This great increase it is believed will result in a decrease in the tax rate for the present year over that of last year. The tax rate in Queens last year was $1.55 on the $100. The total increase for the Borough of Queens was $52,207,000. This was the greatest relative increase in any of the boroughs. It is an increase of nearly 35 per cent.

Wards.  Assessment.  Increase.
First.  $56,259,615  $14,622,580
Second.  47,110,120  9,322,395
Third.  29,815,425  8,274,985
Fourth.  48,651,550  12,806,530
Fifth.  17,245,070  5,725,190

An interesting fact of assessment is the Lawrence Smith farm which was sold at foreclosure sale at the Town Hall on Monday. In 1906 this farm was assessed for $2,400. This year it is on the books for $4,800. On Monday it was sold for $51,100.

On lower Congress at the Halleran estate has improved.
The Building Situation.  

THE total amount of building permits in the boroughs of Manhattan, Brooklyn, and The Bronx for the months ending December 1906, was 1,073,541,389. Two hundred millions of dollars were spent in the third principal boroughs of New York City alone, and that doesn't count the extras! Chicago, according to Building Department records, spent $63,836,700 in the last twelve months, but the chronicler who made the annual real estate spiel for one of the leading newspapers there called attention to the fact that the actual cost always exceeds the estimated cost by over 10 per cent. He also made some disparaging comparisons, in true Chicago style, between the healthy boom in his town and the unnatural overgrown condition here. I guess the Chicago man was right about Chicago, though. His method of figuring would make Chicago's business last year over $70,000,000 and New York's—well, say $220,000,000. The two greatest American cities spent $220,000,000 in buildings. Truly, the building business is a big affair. It always has been big, too; that is, relatively to other businesses.

And this great industry is a very peculiar one. There are always two ends to every industry—the employer's and the employee's—the staff and the rank and file corresponding to the commanders of an army and the army itself. The great peculiarity about the building army is that the commanders do not seem to be on the same basis as the rest of the other industrial armies. They don't seem to command the same amount of respect from their fellow citizens as some of the other commanders do. Perhaps the world despises them because they are led by their army instead of leading it.

Whatever the reason is, it's a fact that the commanders of the building army have got the worst of it and the rank and file have got the best of it. I could almost further argue that the building business in a sense has no commissioned staff, but is led by the non-coms, sergeants and corporals, who have not the sinews nor desire to lead. The unions get as high wages in the building trades as are paid anywhere. I used to think that the reason for this was that they had no opposition when they struck for more, owing to what I call the procrastinated condition of their employers; but I don't think that is so. Supply-and-demand does the trick on the wage end, and then the nature of the building mechanics' work—out-of-door, open-air—makes them hardy and able to fight for their own.

No; the bosses are prostrated, but the unions didn't do it. They always try to help their bosses if they can. Wages are high; there's lots of work, a great and steady volume of business, but the employing class cannot gather itself together. Even if an employer has skill and capital, he cannot find scope. In the archaic condition which exists in a business where the finishing product is the work of a dozen—nay, thirty or forty—industries, each going upon its field after another is through, or perhaps while the others have withdrawn temporarily to return later—in this archaic condition there is nothing to attract business or capital. Even though the building bosses enjoy their benefitted condition, and though the schemes of the office-holding class among them to perpetuate that condition should prevail for a while longer, yet the end result of the long and arduous struggle is looking toward a pure and simple reason, because the industry has not kept pace with other industries.

The condition in the building business is like that of the colonies before the Constitution was adopted. It is generally admitted that the prosperity of these United States is due to obliteration of State lines and the growth of the national idea. Chaos is nothing compared to what this government was drift-\-ing to when the Civil War had to come to set it straight.

We won't have a civil war to modernize building. The rank and file of the building army are going to help to save that army everybody understands it. They will choose captains for themselves if no other way is found.

What is the use of a high union rate if there's no work in the trade? Chop shop could be told by every one of the building bosses that they have no head room to play at this argument and say there's lots of work, etc., etc., but I am trying to draw a comparison between the political world and the industrial world, and have to make theoretical conditions to illustrate.

What is the use of bricklayers getting 70 cents an hour and having to knock off a building for two days out of each week when there is no steel because the steel contractor isn't ready, or no floor joists because the carpenter contractor is behind?

It's just the same as some State down South having a bumper crop of cotton and no one to sell it to on account of some law that might have been on the books, but now, thank Providence, isn't.

The public is very much interested in this matter, too. Many a story could be told by every one of the building bosses about the excess cost on the one hand or of inferior work on the other, due to paying too much to get good work done or to being skinned because of trying to get it too cheap. No good comes from having a headless army or a headlong army. Some of the grafters may profit as they do in politics and some other institutions which need reforming, but in the end they will all be caught out.

So it will soon be with the building business. Some day the public can treat with a well captained, well disciplined army, and the benefit will be just as great in business as it is in the military service.

It might be interesting to inquire into the causes of the prostration of the building army, but that would be another story. The fact is the army has been prostrated, but it will be restored. A business of two hundred millions a year in one city, of probably more than a billion in the whole country, is worth a big effort.

The New York Building Laws.

By WILLIAM J. FRYER, Chairman of the Board of Examiners.

A year or two ago the municipal architects and the Board of Aldermen, both in the City and in the State, took up the great question of real estate and building and the best interests of architects and builders in New York. The Record and Guide has been in the habit of influencing the views of the Board of Aldermen, and the Record and Guide has been ever ready to recommend to the public the fullest facilities for advance information as to each important step proposed to be taken or actually decided on, and in turn kept its readers as well posted as it was possible without trenching on confidential information. When the building code of 1899 was adopted the Record and Guide gave generous and unstinted praise of the work. Not so other papers, for without exception these denounced the code on the ground that it was as far as could be that the general principle that nothing good could emanate from the Board of Aldermen. Some of the editors in the daily newspapers were bitter in tone and untrue in statements. One paper understood the con. The others did not. In due time the newspaper sentiment changed, and this change can be mainly ascribed to the fact that the daily newspaper writers on building subjects closely watch the views of the Record and Guide and are influenced by what appears in the columns of this recognized authority on building and real estate. The Record and Guide made public sentiment for the abolishment of the bureau of building inspectors. The Report of the Board of Aldermen on the abolition of the bureau of building inspectors was published in the Record and Guide as a Department of Buildings, and when this change did occur in 1922, it was received with general approval by the interests affected.

The Record and Guide has been a leader in the building movement for the past twenty years. The Record and Guide as a newspaper, and in its other publications, its monthly architectural magazine, its building law publications and its historical publication of real estate, building and architecture in New York, space was given without stint to making clear and plain the meaning, intent and operation of the
building laws and other laws relating to buildings. Altogether these publications have placed owners, architects, builders and lawyers under a lasting debt of gratitude. The proprietor and the editor of the Record and Guide are too modest to claim the merits to which they are entitled for benefits conferred on the building interests, but I may do so, for I am writing about matters of which I have personal knowledge. Coincident with the anniversary of the Record and Guide there are anniversaries of the building law that deserve at least passing mention. It is nearly half a century since the first separate building law was given to New York City by the State Legislature in 1860. It is a year more than a quarter of a century ago since the first comprehensive and adequate building law was introduced in the State Legislature in its session of 1881. It failed in that session, and it failed in three subsequent sessions, but it passed in the session of 1885—twenty-two years ago. This law of 1885 was the first modern building law not only in the United States but in the world. In 1892 a number of important amendments were made to the law, including the change of the Bureau of Buildings to a separate department. With the coming of Greater New York in 1898 came the power conferred on the Board of Aldermen to establish and from time to time to amend a code of ordinances to be known as the "Building Code." For the first time in more than fifty years New York was given home rule in respect to regulating its building affairs, although every city in the State, other than New York and Brooklyn, had continuously enjoyed this privilege. Prior to the Greater New York charter, the "building law" was part of the "Consolidation Act," the New York charter, and every change in the building law had to be obtained from the Legislature. Many are the interesting events in obtaining changes to the building law, and it is in some of these that I shall briefly call attention. It would require a volume by itself to set forth adequately the history of the making of a great building code.

Like unprofitable discussions of the question whether buildings or the people make a city, it is useless to discuss whether a building law encourages building operations or the reverse. The fact is that a building law does neither. The public safety must be conserved by building laws and regulations, but it is intended to do nothing beyond that. The very best construction is not demanded by law. The law does demand that buildings shall be safely and well constructed, and to this end enters necessarily into many details. The mandatory requirements are many, but each and every one voices the experience of the past. The humblest building as well as the largest is rightly a subject of public solicitude. The Chicago conflagration started in a frame shanty from the overturning of a lamp by the kick of a vicious cow. The Baltimore conflagration started in the cellar of an important mercantile structure. Shall men be permitted to build frame buildings where they like; shall they be permitted to build non-fireproof buildings to unlimited heights; shall they be permitted to build structures to a height above the ability of the Fire Department to cope with fire without every reasonable restriction being imposed by law or without requiring that the steel frame shall be so encased that in case of fire the building shall not topple over? If the answer be that the acts of the individual must be subject to control, then the law must go into detail, and it is better that such detail shall be clear and precise rather than vague and indefinite. In every city the building laws have followed this general rule of definite requirements. A few theorists have advocated a building law made up of a few broad principles as to the strength of materials and leave the architect to work out his own salvation. It is to laugh. Nothing feasible has been presented in this line, and nothing can be worked out on any different lines than the building code. Architects and builders build no better than the law requires; they never did and they never will.

In the Record and Guide's History of Real Estate, etc., I
have given the genesis of the New York building law, and have given due credit to the men and associations who have taken part in bringing the law up to its present high state of excellence. No one man, nor any twenty men, locked up in a room and left there for a year could produce the building code. It is because it embodies the best ideas of more than one hundred active, practical and competent architects, builders and engineers that the code is so complete and comprehensive. Many of the excellent ideas and suggestions were scattered through various reports in the several revision committees, but all were in due time gathered up and embodied in their proper place in the code. The orderly and sensible arrangement of the subject matter of the code has been highly appreciated by those who are daily making use of it. Both in substance and arrangement the New York code has been used as a model in the drafting of building laws for other cities.

The building laws of New York for the past thirty-five years have included a safety-valve in the interest of securing justice to an applicant for a building permit, and to overcome the arbitrary action of a Superintendent of Buildings—the Board of Examiners. To this board—its membership being made up of representatives from building and other associations—an appeal may be taken from any adverse decision of a superintendent who shall reject or refuse to approve the mode, manner of construction or materials proposed to be followed or used in the erection or alteration of any building, or when it is claimed that the rules and regulations of the department or the provisions of law or ordinances do not apply, or that an equally good and more desirable form of construction may be employed. The very existence of this board works for good in securing a better treatment of applicants than would otherwise probably have been the case.

In the years that have passed since 1879—28 years ago—by reason of my personal dissatisfaction with the building law as it then stood, I started in single handed and alone to revise and modernize it, it has fallen to my lot to hold the laboratory car in every subsequent revision up to the present time. From a financial standpoint it was a poor thing for me to take up the work of revising the building code, and I cannot pretend that from the very force of circumstances I have been untiring in my efforts to bring the code up to its present state of excellence. I have been at this work during all the revisions, and have given it my best attention. I have had to give up a great deal of time and labor in revising the code, and I have lost a great deal of money by not publishing the results of the work.

In the Legislature of 1885 I stood alone in defending the bill to give New York a new "building law." Two or three hearings on the bill had been given by the Senate Committee on Cities. Opposition had simmered down to the Fire Department, represented by its attorney, Mr. William L. Findley. This was to be the last hearing. At the opening Mr. Findley announced that he had a number of amendments to the bill, but that he could not get me to accept them, and so we had agreed to sit down and abide by the decision of the committee. The chairman conferred with one or two of the members and then announced that the hearing on the building bill would be adjourned until the following Tuesday afternoon, and the meeting was duly held. Mr. Purroy had a list of some twenty changes to the bill, and the first one was to put in the bill the section providing for the power of arrest, as it was in the then existing law. I said no, that I would agree to increasing the fines, making the fines cumulative, increasing the causes for stopping work by injunction, but no power of arrest would I consent to. After some discussion Mr. Purroy consented to waive this demand.

Then came the next: To limit the extreme height for buildings to 100 feet. I said no, that if there was not enough in the bill in the way of auxiliary fire protection for a high building or if anything else was desired to be put in the bill to make the building safer in itself I would gladly put it in, but in the face of what was already being done in Chicago and what was about to be done here I would consent to no limitation for height of buildings. Finally Mr. Purroy consented to waive this demand.

Having won on the two most important proposed amendments, I gave way fairly to all the others. Most of them were not very important any way, and some were offered under a mistaken apprehension of the wording in the bill. On the following Tuesday Mr. Findley and I presented ourselves to the Senate Committee on Cities. Our amendments were adopted, the bill was reported and duly became law. In 1885, when the law was passed, there were only a few
buildings in New York which exceed 100 feet in height. Besides the U. S. Post Office, there were the Western Union building, the Tribune building, the Produce Exchange, the Mills building and a few others. The owners of real estate didn't know just then that New York was about to erect buildings a height that would make one deal the lot of work. The effect of my having said "No" to any limitation of height for buildings has been to double and treble the value of lots, making the erection of skyscrapers for the erection of skyscrapers. The facts are simple, and the story itself is almost incredible.

At a later revision of the building law a request was made by the Fire Commissioners that a requirement be put in the law that all buildings thereafter erected more than three stories be too drastic at the time, and the request was not acceded to.

One of the most pressing needs for effective aid in accomplishing the work intended by the Tenement House Act is the enactment of a law making it necessary to have some individual, thoroughly equipped by practical experience to supervise the construction of houses intended for occupation as multiple dwellings. To do this a license should be required to be furnished to either an architect or a recognized ability, who would be in constant touch with the building during its construction, so as to detect variations from the requirements of the law, and obviate the necessity for filing of violations and subsequent alteration of work done.

EDMUND J. BUTLER.

Bureau of Buildings, Borough of Manhattan.

The Bureau is taxed to its utmost in making daily inspections to all buildings which are now in course of erection and alteration to detect any defect in construction or any infringement of the provisions of the Building Code. Also, buildings are continually becoming unsafe through age, particularly in the older portions of the borough, and the utmost vigilance is required to prevent loss of life.

The new methods of construction and the increased building operations have imposed duties upon the Bureau which have demanded a higher annual compensation, and consequently there has been a considerable advance during the year.

After assuming the superintendency of the Bureau I found that copies of the Building Code could not be obtained at the office. Therefore I caused the same to be compiled and revised, with amendments, and date January 26, 1907.

EDWARD S. MURPHY.
Recent Developments in Building Construction.

BY THE FORMER CHIEF ENGINEER OF THE MANHATTAN BUREAU OF BUILDINGS.

It would be surprising, if, in the unprecedented building operations of recent years, there had been no new development in methods or materials of construction. And yet, when these apparently new developments are mentioned some critic will usually point out that they were known, well, ever so long ago. But until these things have found such general acceptance that they do not call forth special mention in our trade and technical journals, they may still be said to be new.

The most striking of innovations in building construction is undoubtedly reinforced concrete. The mention of buildings of this type is quite frequent now in the pages of the Record & Guide, though it was not so long ago that there was only occasionally an opportunity to speak of them. Reinforced concrete has been quite extensively used throughout the country, especially in the West, but conservative New York is only now finding a place for it. At the present time there are more than a dozen buildings under construction in Manhattan in which the structural parts are of stone concrete reinforced by steel of various shapes (most generally rods) to provide the tensional strength which the concrete lacks. Fully twice that number are already completed, in which part, if not all, of the construction is in reinforced concrete.

There is hardly a type of construction in steel or masonry that cannot be reproduced in reinforced concrete, the preference for any one of these constructions being generally a question of appearance or economy. It is too bad that the advocates of the concrete construction sometimes resort to bad practice in design or construction for the sake of securing that economy. This is sure ultimately to redound to their disadvantage. For the failures of this construction that we read of occasionally, are generally attributable to that cause. These failures naturally create in the mind of the layman (who must be depended upon to furnish the capital for building operations) a prejudice against a legitimate and, for certain purposes, excellent construction.

New York City was—in this country, at least—the first municipality to lay down guiding principles for reinforced concrete construction, in the regulations of the Bureau of Buildings that have been from time to time published in the Record & Guide. These regulations for the Borough of Manhattan represent the best practice, and have served as a basis for the regulations adopted by other cities in this country. They do not go into unnecessary detail, and for that reason are not onerous. If conscientiously and intelligently applied the result will be safe construction. The present practice of many of our architects and owners, however, of leaving the design for reinforced concrete to the contractor is to be condemned. The construction should be designed or, at least, checked by an engineer, independent of any contractor.

Competent superintendence during construction is a most important element in successful reinforced concrete work. The permissible working stresses in use are based on the assumption that only good materials, properly mixed and prepared are used. The prescribed proportions of cement, sand and stone, must be constantly maintained, and for good work must be mixed mechanically. Care must be exercised to see that the reinforcement is provided where called for, and to make sure that it is in the position fixed by the design. A slight shifting of the tension rods may very materially weaken a beam or seriously affect its fire resisting quality. The so-called “Unit” systems, in which the steel work is previously wired together, overcome this danger by maintaining at all times the proper position of the reinforcement.

It is strange that the most important structural element of a building, the column, should not have received more study than it has. Here again New York (Manhattan) practice, though the most conservative, is the best. Higher unit stresses are allowed on the concrete in columns when they are wrapped than in the plain column. But it is to be feared that much of the so-called wrapping or banding of columns is such in name only. The best column thus far developed, and the one capable of greatest loading within proper working stresses, is that used in the ten-story McGraw Building in West 39th street.

George A. Fuller Co., Builder.

PLAZA HOTEL.

H. J. Hardenbergh, Architect.
Here the steel reinforcement is in itself sufficient to carry the dead load of the structure. The additional strength required for live load and other forces is provided by the concrete.

Of the structures thus far completed or under construction in Manhattan about one-fifth are residence buildings, the rest being business buildings, chiefly lofts and garages. For factory purposes this form of construction is undoubtedly the most suitable, for in it we have mass to take up vibration. One visit to a concrete structure where heavy machinery is in operation, would be all that is necessary to convince any unbiased mind. Here, then, is the field in which this construction should be developed.

A movement which has received a great impetus in the West, but has found little support thus far in New York, practically none in Manhattan, is the use of concrete building blocks for the walls of buildings. In the outlying districts of Greater New York examples of their use may be found in numerous private dwellings. Economy in construction is one of the advantages claimed for them; ease and rapidity of production are others. The blocks are generally made in moulding machines that can be operated by one or two men. There is still much difference of opinion as to their architectural value. Structurally, they are satisfactory in low buildings where loads are light. Being of necessity made of a dry mixture they are not apt to develop the full strength of a good concrete, and on account of the hollow spaces the effective carrying capacity is not more than half of that of ordinary brickwork of same wall thickness.

The natural outcome of the great development of the cement industry in this country is the development of new cement products. Thus, in addition to reinforced concrete and concrete blocks and somewhat in the nature of the latter, is the cement brick coming into the market. These bricks have shown a very high resistance to crushing. According to the reports of the Building Bureau some test pieces have reached as much as 7,000 pounds per square inch ultimate load.

There is another form in which cement is being used that is worthy of mention, though little has been done with it in this neighborhood. I refer to what is called cast stone. Very artistic and beautiful effects have been secured in imitation of cut stone, particularly limestone. The word imitation will, no doubt, be objected to by the inventors, as they will not even admit the name artificial stone. The process of manufacture consists in mixing up Portland cement, sand and some very fine broken stone (depending on the color to be produced), with water, to about the consistency of molasses. This is then run into sand moulds very much as cast iron is poured, and allowed to set sufficiently for removal from the mould, when it is stored in a damp place and allowed to cure and harden. It is particularly adapted for the ornamental stone work of exterior walls. Closely allied to these cement products is the so-called sand-lime brick, of which about twenty million have thus far been used in this city. These bricks have had their greatest use in sections of the country where clay bricks are difficult to get. When well made they are equal to the ordinary clay brick in
Foundations of High Buildings.

By M. Deutsch, C. E.

It was not until after the Civil War that five-story buildings made their appearance to any extent. During the period 1836 to 1852 several high churches were built in New York City, of which the Trinity and Grace churches are the only ones remaining. Trinity Church, built in 1836, for many years was considered the highest structure in America, and from its steeples visitors used to "See New York." Up to about 1859, the first high points noted by a vessel as it came up the Bay were the spires of old Trinity and St. Paul's, but now they are completely hidden from view by such structures as the Trinity, Whitehall, American Surety and Empire buildings which have no counterpart in any country in the world.

The Equitable Life Assurance Society was the first to undertake the construction of a great office building (1886). This building was constructed very slowly and in sections at a time. When the whole structure was finished to its present height it was considered the finest office building in the world, and its arcades with numerous bazaars was long an attraction to visitors to the city. The first elevators were here tried successfully. This same year the Aldridge Court Building was also constructed, on wood-pile foundations.

It was the Equitable Building with its successful elevators which gave a decided impetus to the construction of high buildings, and in 1880, with the introduction of steel-cage design or skeleton construction, many buildings of twelve or fifteen stories began to appear. The demand for high buildings soon became a popular one; but with this increased demand for high buildings, serious engineering difficulties arose which had to be overcome in order to secure the safest kind of foundation for such heavy structures. The enormous weight of these skyscrapers, the treacherous character of the soil encountered in lower Manhattan, and the absolute necessity for deep and waterproof cellars to accommodate machinery and steam plant, and the necessity of safely taking care of adjoining property built on shallow foundations, brought engineers face to face with engineering problems which required immediate solution.
Among the first to solve these engineering problems were the engineers of the Foundation Company. The Manhattan Life Building on Broadway (1892) was the first building where the pneumatic caissons were used for constructing foundations, and it was soon followed by the American Surety, Empire, Washington Life Building, Standard Oil, Commercial Cable Annex and others. When we consider that in lower Manhattan there is a layer of 45 to 72 ft. of quicksand and other water-bearing strata overlying the rock and that a great many of the old buildings in this vicinity have very shallow foundations resting directly on the upper soil, it can be seen that the foundations for such very high buildings must go down to rock in order to safely support their enormous weights, and that to reach bedrock a method must be adopted which will not disturb the fine material upon which the adjoining buildings may be resting.

The engineers, therefore, decided to use pneumatic caissons similar to those that are often used for sinking bridge piers. The caissons are simple, air-tight, bottomless boxes, square or cylindrical in cross-section, having interior spaces for air which are often used for sinking bridge piers to great depths. The caissons are simple, air-tight, bottomless boxes, square or cylindrical in cross-section, having interior spaces for air which are readily supported. To permit the passing in and out of a bucket or of the men from the outside air of the caisson, or vice versa, without excessive loss of compressed air, an air-lock or air-chamber invented by Mr. Daniel A. Moran, vice-president of the Foundation Company, is used. This air-lock surrounds the top of the shaft leading to the working chamber, and it is more possible to sink caissons through quicksand and water holes by means of air-chambers than by adopting buildings without causing loss of material from under the latter, which if allowed to occur, would settle those buildings and crack them. This is the invention which has made possible the construction of the skyscrapers in lower Manhattan.

The foundations for the Singer Building, which will be the highest masonry structure in the world, with the exception of the addition to the Metropolitan Building about to be commenced, are being laid by this method. It will be about three times as high as the spire of the old Trinity Church, and is more than twice the height of the "Flat Iron." The area of its combined floor space will be about 415,820 square feet, or about nine and a half acres. On this, considering it all on one level, 100,000 men could find standing room. The total area will be 28 city blocks, or equal to all the available space in a territory bounded by Exchange Place on the south, Dey Street on the north, Trinity Place on the west and Pearl Street on the east. Within this enormous structure are to be accommodations for an office force of perhaps 7,000 persons, or about seven regiments.

It is the enormous value of building sites in New York City which will always continue to encourage the construction of multiple story buildings in order to increase the number of tenants for a given area, but of recent years the construction of so many high buildings, especially on comparatively narrow streets, has put those of a lesser height to such a disadvantage as to light and air that a new impetus has been given to skyscraper erection.

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**Why It Pays to Build.**

Brooklyn brokers contend that conditions in the borough are perfectly natural, and that the difficulties in the way of a more widespread business are gradually dissolving. "As a rule it is cheaper to own property than to rent," said a broker, "and even though rents have advanced 20 per cent, there must be a still greater advance before reaching the point of extensive private production. There remain desirable houses in every quarter that are obtainable at values far less than it would now cost to build them, and it is the professional opinion that these will all be taken when capital is again permitted to circulate freely through real estate channels."

"Robert G. Ingersoll once said: 'The home is the unit of the nation. The more homes the broader the foundation of the nation and the more secure."

"'Nothing is more important to America than that the babies of America should be born around firesides of homes.'

"I believe that Ingersoll was right upon this subject—and I am in favor of the home owner, first, last and all the time, and I am therefore opposed to extensive landlordism. I am in favor of building houses just as fast as such houses can be sold to bona fide purchasers to be occupied as homes—but I am unqualifiedly opposed to the encouragement of combinations of capital to erect dwelling houses for the purpose of rent. I would not join such a combination if I had millions to invest—therefore I cannot conscientiously recommend it to others."

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**WILLIAM J. TAYLOR**

**General Contractor and Builder**

5 and 7 East 42d Street : : : NEW YORK CITY
Co-operative Building.

EW people, I think, properly measure the importance of the co-operative savings and home building association as a factor in the development of real estate values in and about New York City. Indeed, the growth of co-operative financing in the country at large has been a fact of prodigious importance that has seemingly escaped the notice of students of political economy. And from the general public these institutions have not attracted attention at all commensurate with their importance as factors in social growth and prosperity.

A movement that can show in 1906 an attachment of 1,442,127 active members and total assets of $629,324,257, and that is steadily growing in membership and financial importance, can hardly be ignored in the life of the republic. It is to be remembered that this vast membership is composed of men and women of small means, associated to save money and build homes. Relying little or not at all upon governmental favor or special privilege, and depending mainly upon Benjamin Franklin's philosophy of Self-Help, the movement may be said to have the most far-reaching effect upon the development of individual as well as national character.

How many people realize that in the States of New York and New Jersey combined there are nearly 600 of these co-operative banks or building associations, with a membership exceeding 225,000 people and assets approaching $100,000,000? These assets consist almost exclusively of monthly payment mortgages upon small homes. Many thousands of such homes have been created in the suburbs of the metropolis. That the promoters and benefactors of these institutions are mainly people of small or moderate means is indicated by the fact that the average amount of individual mortgages in building and loan associations throughout New York and New Jersey is less than $2,000. The average monthly installment of principal and interest required to be paid by the home-buying mortgagee is seldom more than 1 per cent, of the amount of the mortgage indebtedness.

Despite the fact that the widely advertised failure of a few fraudulent concerns claiming to do business on the building and loan plan has tended to discredit these institutions in some directions, the genuine local building and loan associations carry on their business with a degree of equity and fair dealing and with a freedom from losses that is surprising, considering the magnitude of their operations and the fact that their management is usually in the hands of men of modest abilities and of no special training as financiers.

While many of the local building and loan associations continue to preserve old-fashioned methods in their dealings with their membership, maintaining as incidents of the business, fees, fines and premiums for late payments, the larger and more progressive institutions have adopted the simpler Ohio methods, under which one class of members is encouraged to accumulate savings in either regular or irregular installments to be loaned to another class at simple interest for the building or buying of homes.

This method, as exemplified by the largest society of this class in New York City, has produced and is producing most interesting results. The society in question has built or bought for its membership over 800 homes in the metropolitan district. It charges no entrance fees or premiums and imposes no fines upon borrowers. Any person with good security can join the society without formalities and get a loan to build or buy a home within twenty-five miles of the City Hall. Its borrowing members pay 6 per cent, and its investing members receive 5.

Loans are repaid in monthly installments that do not exceed $1 per month upon each $100 of loan, but may be more at the option of the borrower or less at the option of the society. Interest is deducted from the monthly payments, but calculated only upon the sum remaining due upon first day of each month. Thus, while the mortgage payments remain level and unchanged, unless the borrower wants to increase it, an increasing proportion of it every month goes to liquidate the principal of the indebtedness. The borrower paying $1 per month per $100 upon this system wipes out his indebtedness in a little more than eleven years and six months. He is at liberty at any time upon thirty days' notice to cancel the mortgage by paying the net balances of the debt as ascertained at the next previous monthly adjustment. This system, which originated with the society in question, has now been adopted by others of the co-operative home building associations of New York, and by means of it hundreds of homes are being created in the suburbs of the city.

There is apparently a great future for rightly-managed co-operative savings and home building associations, and the reports and statistics of the Department of Banks, which supervises these institutions in New York State, indicates conclu-

Hudson River Terminal Building—Church Street View

Geo. A. Fuller Co., Builder.

Charles O'Connor Hennessy, Architect.

Russell, Architects.
that all but a very few of them are fully worthy of public confidence. In this regard high credit should be given to the Banking Department for its persistent labors in recent years toward eliminating the bad and encouraging the good, toward closing up fraudulent and speculative institutions, and toward the enactment of stringent legislation to govern the administration and supervision of all co-operative associations that deal with savings and home building. For this unappreciated public service, performed in the face of opposition, misunderstanding and sometimes slanderous criticism, honor is due to the retiring Superintendent of Banks, Mr. Kilburn, and not less to his predecessors and accomplished Deputy, Mr. George I. Skinner, whose nearly ten years of devoted service to the needs of the co-operative building and loan associations of New York State. CHARLES O'CONNOR HENNESSY.

Number and Estimated Cost of Buildings Proposed To Be Erected and Altered from 1888 to 1905.

COMPILLED BY WILLIAM H. CLASE, CHIEF CLERK OF THE MANHATTAN DEPARTMENT OF BUILDINGS.

Boroughs of Manhattan and the Bronx.

Queer allegations about the real estate transactions of the Pennsylvania crew are coming out, and they tend to strengthen the impression that the Pennsylvania company is either an enormous speckling in real estate not needed for any purpose except as a common carrier, or that the "dummy" corporations and individuals supposedly acting for the railroad system are in fact a common carrier, or that the "dummy" corporations and individuals are for the sake of the company from those which may be for officers and employees acting as individuals but permitting the impression to go out either that they are acting for the main company, or that they have inside knowledge that the lands they purchase will increase in value, for reasons connected with the secret plans of the railroad. A remarkable amount of unnecessary secrecy is maintained by the Pennsyl-

vania over its operations in this city, which seems strange to American ideas, even if it be not inconsistent with a straightforward policy. Allowing it is necessary in planning routes and terminals to exercise a certain amount of business acumen, it is at the same time clear that too much mystery gives play to boundless suppositions, of which advantage can be taken by the persons thought to be in possession of official secrets. Thus, during the Queens boom frequent rumors have been printed of purchases by Pennsylvania officers on their private account, with the public left in darkness as to how much of each story is true, and what part can be attributed to the imagination of the rank outsiders. —
Year's Building Material Market

Remarkable Increase
Since 1900, but a Falling Off From 1905

BY THE PRESIDENT OF THE MANUFACTURERS' ASSOCIATION

THE quantity of building bricks supplied to New York City from 1894 to 1902, being constantly in excess of demand, brought prices so low that proceeds of yearly sales were not adequate to cost of maintaining the plants. As capital was exhausted various plants were abandoned, and others to a greater or less extent curtailed their operations, refitted and restored to use those which had been abandoned. During 1905 all these were in process of completion, and their output not ready for delivery until the latter part of this season, and in fact has not, yet, been fully marketed. This production is coming here, and, and supply is again superior to demand, which has fallen off from the great demand of 1905 so that at this writing it has required 100,000,000 less than in 1905.

In the very near past, putting up a bold demand for adoption, and history ever repeats herself, so as to assume that supply will be in excess of demand, therefore prices cannot reach a point high enough to cause owners of real estate or builders to take thought for a substitute for brick, as the low-priced building material, and as has for centuries been proved, as it is fair to assume that in the early part of the last century, proves, if proof be needed, that bricks never lose their basic qualities, as these bricks were used the last few years, were made, many of them, in the early part of the last season, in proportion to the demand, and history has been asked to yield the first place of eternal service. Yet we now see would-be rivals for favor, with great promise for future economy, and no record of success, yet many failures of the last century, proves. If proof be needed, that bricks never lose their basic qualities, as these bricks were used the last few years, were made, many of them, in the early part of the last season, in proportion to the demand.

WILLIAM K. HAMMOND.

President Association Brick Manufacturers and Agents.
New York City, Dec, 27, 1906.

Brick During 1907.
The course of wholesale quotations for good brick during the year is included in the following list, the minimum quotation being given in each case:

| Month | North River | Palco | Total
<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Jan 6</td>
<td>8.00@6.25</td>
<td>8.00@6.25</td>
<td>8.00@6.25</td>
</tr>
<tr>
<td>May 5</td>
<td>8.00@6.25</td>
<td>8.00@6.25</td>
<td>8.00@6.25</td>
</tr>
<tr>
<td>Sept 1</td>
<td>8.00@6.25</td>
<td>8.00@6.25</td>
<td>8.00@6.25</td>
</tr>
<tr>
<td>Oct 6</td>
<td>8.00@6.25</td>
<td>8.00@6.25</td>
<td>8.00@6.25</td>
</tr>
<tr>
<td>Nov 3</td>
<td>8.00@6.25</td>
<td>8.00@6.25</td>
<td>8.00@6.25</td>
</tr>
<tr>
<td>Apr 7</td>
<td>8.00@6.25</td>
<td>8.00@6.25</td>
<td>8.00@6.25</td>
</tr>
</tbody>
</table>

Comparative Brick Prices on January 1.

<table>
<thead>
<tr>
<th>North River</th>
<th>Palco</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>1885</td>
<td>$6.00@4.25</td>
<td>$6.25@4.25</td>
</tr>
<tr>
<td>1895</td>
<td>$6.25@4.50</td>
<td>$6.50@4.50</td>
</tr>
<tr>
<td>1905</td>
<td>$6.50@4.75</td>
<td>$6.75@4.75</td>
</tr>
<tr>
<td>1906</td>
<td>$6.75@4.90</td>
<td>$6.95@4.90</td>
</tr>
<tr>
<td>1907</td>
<td>$6.95@5.00</td>
<td>$7.00@5.00</td>
</tr>
</tbody>
</table>

Production of Common Brick in the Hudson River District.

<table>
<thead>
<tr>
<th>County</th>
<th>Number of firms reporting</th>
<th>Quantity</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Albany</td>
<td>8</td>
<td>61,977</td>
<td>$628,500</td>
</tr>
<tr>
<td>Columbia</td>
<td>10</td>
<td>50,943</td>
<td>$460,000</td>
</tr>
<tr>
<td>Dutchess</td>
<td>10</td>
<td>45,667</td>
<td>$400,900</td>
</tr>
<tr>
<td>Greene</td>
<td>2</td>
<td>37,051</td>
<td>$341,444</td>
</tr>
<tr>
<td>Ulster</td>
<td>26</td>
<td>42,645</td>
<td>$362,666</td>
</tr>
<tr>
<td>Westchester</td>
<td>7</td>
<td>29,252</td>
<td>$260,525</td>
</tr>
</tbody>
</table>

Total for N. Y. 1907 | 120 | $3,427,228 | $3,071,144 |

Total | 129 | 987,644 | $8,514,114 |

Average price per thousand. | | | $8.88 |

<table>
<thead>
<tr>
<th>County</th>
<th>Number of firms reporting</th>
<th>Quantity</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Albany</td>
<td>10</td>
<td>71,743</td>
<td>$460,029</td>
</tr>
<tr>
<td>Columbia</td>
<td>6</td>
<td>82,301</td>
<td>$506,989</td>
</tr>
<tr>
<td>Dutchess</td>
<td>4</td>
<td>69,328</td>
<td>$414,730</td>
</tr>
<tr>
<td>Greene</td>
<td>8</td>
<td>87,897</td>
<td>$562,996</td>
</tr>
<tr>
<td>Ulster</td>
<td>26</td>
<td>216,397</td>
<td>$1,105,026</td>
</tr>
<tr>
<td>Westchester</td>
<td>7</td>
<td>220,452</td>
<td>$1,190,502</td>
</tr>
</tbody>
</table>

Total for N. Y. 1907 | 137 | 1,229,003 | $8,013,118 |

Bergen Co. N. J. | 12 | 67,725 | $456,653 |

Total | 120 | 1,267,320 | $8,063,753 |

Average price per thousand. | | | $8.59 |
Manufacturer of the following Standard brands of brick:

These bricks are manufactured from the finest body of clay and sand to be found on the Hudson River. The best skill obtainable is engaged in their manufacture and selection, and consequently a first-class brick is produced whose quality and size will recommend it to every builder. These bricks are guaranteed to be 8 inches long by 3 1-2 inches wide by 2 3-8 inches thick, full measure.

Below is a list of the Largest Jobbers in New York, Brooklyn and immediate vicinity who handle these brands:

Architects, builders and owners outside of New York and Brooklyn desiring bricks of this quality may address direct, W. K. HAMMOND,

628 West Fifty-Second Street: NEW YORK CITY

PHONE, No. 2760 COLUMBUS
Front and Ornamental Brick.

The special interest in front and ornamental brick by those who are engaged in building construction is derived from the fact that no other commodity has contributed more to our own observation is less striking than to us who observe them in their gradual changes than to us who observe them in their gradual development. In consequence, our observation is less sensitive and we fail to fully appreciate the extent of the metamorphosis that has occurred within twenty or thirty years.

It is well within the easy recollection of even comparatively young men that the general appearance of our buildings, whether those of a commercial or residential character, was monotonous at least, in too many instances really dull and unattractive or beautiful. Block after block could be searched for an inviting facade of design and color only to find, with rare exceptions, nothing upon which the eye could rest with the iron-bound and uninteresting conveniences of that period.

The monotony of color scheme then so noticeable was due very largely to the limited variety of material and colors possible. We employ and which, therefore, require a great deal of original treatment solely to design and detail, with little opportunity for the exercise of originality in color effects.

But now all is changed and instead, we have available such a variety of shades in facing bricks that almost any desired color is possible to employ and which, therefore, confined an attempt at making the many changes for the better more strikingly apparent, than to us who observe them in their gradual though rapid development. In consequence, our observation is less sensitive and we fail to fully appreciate the extent of the metamorphosis that has occurred within twenty or thirty years.

This choice of shades in front brick, which the market now so abundantly affords is due to the more intimate knowledge of clays and their characteristics which has been acquired within the past few years, which up to a few years ago, was not a highly developed art. It was not the discovery only of new clay and shale deposits, but it was the creation of a use, and therefore a value, for embellishing materials such as terra cotta and stone which they never before possessed.

The experience of recent years has also demonstrated the peculiar adaptability of front bricks to new styles of construction. These are the classes of work producing chiefly from a municipal, transit, railroad, lighting and other improvements and some of a less public character.

In much fine work such as the new subway stations, churches, courthouses and similar buildings, front bricks are being used for interior wall surfaces. Notable examples of this style of construction are the subway stations at City Hall, 111th Street and Broadway, the newBOOLEAN, and Fordham buildings for the purpose of finish and reflecting effect. These are the classes of work proceeding chiefly from our municipal, transit, railroad, lighting and other improvements and some of a less public character.

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DEPARTMENTS

MAINTENANCE---Regularly inspects, repairs and maintains all makes of Elevators, Pumps, Motors and Dynamos at a fixed sum per annum.

REPAIRS---All makes of Elevators, Pumps, Motors, Dynamos, etc.

INSPECTION---Electric installations inspected and tested for the purpose of detecting and removing fire hazards, leakage and other defects, causing increased current bills.

METER TESTING---Current supply meters tested, bills audited and rebates on fast registering meters secured.

CONSTRUCTION---Installations of Light and Power Wiring, Elevators, Motors, Dynamos, Pumps, etc.

*Elevator Repairs and Cabling a specialty*

MACHINERY PROTECTION

costs but a trifle and may be the means of saving you thousands of dollars' loss, aside from the hazard to life and limb.

Under our yearly contract YOU pay a small sum and WE assume complete responsibility for breakage and repairs.

1897 - 1907

TEN YEARS AGO we introduced the idea of machinery protection. We adopted the policy of stipulating a yearly sum for Examining and Keeping in Repair all kinds of Electric Motors, Dynamos, Pumps, Elevators, etc. The success of our business is the best possible example as to the merits of the policy set forth by us.

A POSTAL will bring our representative. He'll examine your machinery, meters, etc., explain our contract, and quote you our prices for protection.
Value of the Products of Clay in the United States in 1904 and 1905. With Increase or Decrease.

In the following table will be found a comparison of the several varieties of clay products marketed in 1904 and 1905, showing the actual gain or loss in each variety, together with the percentage of gain or loss:

<table>
<thead>
<tr>
<th>Product</th>
<th>Inc. in %</th>
<th>Dec. in %</th>
</tr>
</thead>
<tbody>
<tr>
<td>Common brick</td>
<td>16.59%</td>
<td>18.59%</td>
</tr>
<tr>
<td>Front brick</td>
<td>13.29%</td>
<td>27.84%</td>
</tr>
<tr>
<td>Fancy or ornamental brick</td>
<td>2.21%</td>
<td>10.64%</td>
</tr>
<tr>
<td>Brick fire</td>
<td>14.64%</td>
<td></td>
</tr>
<tr>
<td>Fireproofing, hollow building or terra-cotta</td>
<td>21.81%</td>
<td></td>
</tr>
<tr>
<td>Architectural terra-cotta</td>
<td></td>
<td>14.73%</td>
</tr>
<tr>
<td>Total brick and terra-cotta</td>
<td>14.25%</td>
<td>16.93%</td>
</tr>
<tr>
<td>Total pottery</td>
<td>10.97%</td>
<td></td>
</tr>
<tr>
<td>Grant total</td>
<td>14.25%</td>
<td>16.93%</td>
</tr>
</tbody>
</table>

"Decrease. "Steel lining included in miscellaneous."

This table shows in a most striking manner the lines of activity. It will be observed that only two varieties of wares showed a small decrease, namely, the vitrified paving brick products and the fancy or ornamental brick product, while every other brick and the product and pottery industry also showed increases, some of them quite large gains, the largest being in the products used as structural materials, and especially in those materials entering into the construction of fine buildings, such as front brick, architectural terra cotta, structural tile (including roofing, wall, and floor tile) and fireproofing.

The largest actual gain, as has been the case for many years, was in the common brick industry, which showed an increase of $9,625,825, as compared with a gain of $1,236,483 in 1904, a gain of 3,547,620 in 1903, and a gain of $1,547,961 in 1904. The front-brick product showed the largest proportional increase in 1905, being 27.84%, the value being $7,567,125 in 1904 as compared with $5,569,131 in 1904, a gain of $1,998,000. In 1904 front brick increased in value $157,240, or 2.93%. Not only does this product show the largest proportional increase, but in actual increase it is exceeded only by common brick and fire brick.

Receipts of Common Brick.

The following is the record of receipts of common brick in this market from all sources. During the first part of the year 1905 cargoes were received, while the high prices prevailed, from various clays, not regularly contributing to this market. The receipts for the calendar year were as follows:

<table>
<thead>
<tr>
<th>Year</th>
<th>Total Receipts</th>
</tr>
</thead>
<tbody>
<tr>
<td>1881</td>
<td>$500,000,000</td>
</tr>
<tr>
<td>1882</td>
<td>$600,000,000</td>
</tr>
<tr>
<td>1883</td>
<td>$900,000,000</td>
</tr>
<tr>
<td>1884</td>
<td>$1,000,000,000</td>
</tr>
<tr>
<td>1885</td>
<td>$1,100,000,000</td>
</tr>
<tr>
<td>1886</td>
<td>$1,200,000,000</td>
</tr>
<tr>
<td>1887</td>
<td>$1,300,000,000</td>
</tr>
<tr>
<td>1888</td>
<td>$1,400,000,000</td>
</tr>
<tr>
<td>1889</td>
<td>$1,500,000,000</td>
</tr>
<tr>
<td>1890</td>
<td>$1,600,000,000</td>
</tr>
<tr>
<td>1891</td>
<td>$1,700,000,000</td>
</tr>
<tr>
<td>1892</td>
<td>$1,800,000,000</td>
</tr>
<tr>
<td>1893</td>
<td>$1,900,000,000</td>
</tr>
<tr>
<td>1894</td>
<td>$2,000,000,000</td>
</tr>
<tr>
<td>1895</td>
<td>$2,100,000,000</td>
</tr>
<tr>
<td>1896</td>
<td>$2,200,000,000</td>
</tr>
<tr>
<td>1897</td>
<td>$2,300,000,000</td>
</tr>
<tr>
<td>1898</td>
<td>$2,400,000,000</td>
</tr>
<tr>
<td>1899</td>
<td>$2,500,000,000</td>
</tr>
<tr>
<td>1900</td>
<td>$2,600,000,000</td>
</tr>
<tr>
<td>1901</td>
<td>$2,700,000,000</td>
</tr>
<tr>
<td>1902</td>
<td>$2,800,000,000</td>
</tr>
<tr>
<td>1903</td>
<td>$2,900,000,000</td>
</tr>
<tr>
<td>1904</td>
<td>$3,000,000,000</td>
</tr>
<tr>
<td>1905</td>
<td>$3,100,000,000</td>
</tr>
<tr>
<td>1906</td>
<td>$3,200,000,000</td>
</tr>
<tr>
<td>1907</td>
<td>$3,300,000,000</td>
</tr>
</tbody>
</table>

"As a matter of course, I am guided in my statements by the doings of the corporation I am connected with, as others may have done more or less as their individual ideas guided them; but on the whole I think my first statement as to 1900 carrying off the greatest amount of business was the correct one."

"Mason Material Trade.

The sudden stoppage of speculative building has not an unmixed source of evil."

FRANCIS N. HOWLAND.

NORTHEAST CORNER
CITY INVESTING COMPANY OWNER
LORD & TAYLOR, LESSEE

EAST CORNER FIFTH AVENUE AND 19TH STREET.

City Investing Company Owner
Lord & Taylor, Lessee.
The history of the American Portland cement market for several years past has been a severe criticism against the manufacturers who by unfriendly methods persuade the consuming public to pay higher prices than they really warrant. Uniformity of price as quoted by the various individual manufacturers during the past year has been very satisfactory. The price fluctuation in Portland cement has been acondition which is the reverse of mutual interest and advantage, of which the small contractor who cannot always pick his time to buy, was a striking instance in 1905.

The Portland cement market during the season of 1906 was more satisfactory, brought about through a more perfect acquaintance, exchange of views and friendly spirit. The cement consumed in 1906 was manufactured by more than 350 plants, which were spread over the whole civilized world—1,000,000 barrels of cement per annum, an expenditure of at least $10,000,000 in money and time, and a steady employment for labor.

The Portland cement plant practically has to be re-constructed on an average of every five years. A small plant, manufacturing about 3,000 barrels per day, requires an investment of $100,000, which can be turned around in the course of a year, and provide a profit of 20 per cent. A large plant, manufacturing about 1,000,000 barrels per annum, has an investment of $1,000,000, which can be turned around in the course of a year, and provide a profit of 20 per cent.

The Portland cement market is always in a state of flux, with the exception of the period of winter, when the demand is lowest. Portland cement is sold in short lots, and the manufacturer cannot always regulate his sales so as not to oversell. Neither can he manufacture less without increasing the cost per barrel, for in closing down a plant for any reason, the overhead costs remain the same. The capacity of a mill cannot be increased or decreased in a short time, and the manufacturer must learn to live with what he has. Therefore, the cement work coming up a little later. The unfettered and unrestricted production of all the plants every day in the year and a steady employment for labor.

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discouraging speculation on the part of both the dealer and the manufacturer. Instead of “selling close in winter,” Portland cement will be sold as it is needed at market prices prevailing from time to time for immediate shipment. Thus the large and small dealers are sure of a reasonable margin of profit and the less reason there is for the risk of suffering a loss due to not being able to buy at the right time.

The prices at present prevailing, delivery alongside lighter, New York harbor, are approximately $1.63-$1.68 in wooden barrels, or $1.68-$1.75 in cotton sacks, including the package. These are reasonable figures, and do not discourage concrete contractors, which is probably the best method for a first-class and durable finishing coat. Lime made into a putty and applied to the walls is the cheapest and best method for a first-class and durable finishing coat. Lime is a product that requires careful attention, and we understand we are the only manufacturers that study the lime question thoroughly. In the first place, a barrel of lime sells for a barrel of our product. Another important feature is that most of the sand is applied without being washed. The water and hair also are not measured, and we think the results would be much better if the builder would use care, as above stated. Another important feature is that the analysis of the lime is very uneven, some brands being high with poor results.

The hydrated lime department of the lime business is practically closed, and it is claimed by some manufacturers that it is better than the barrel lime for the finishing coat. We do not agree with this, and we are of the opinion that finishing coat will not be obtained with this material. The analysis of the lime is very uneven, some brands being high with poor results. The hydrated lime department of the lime business is practically closed, and it is claimed by some manufacturers that it is better than the barrel lime for the finishing coat. We do not agree with this, and we are of the opinion that finishing coat will not be obtained with this material. The analysis of the lime is very uneven, some brands being high with poor results.

The mosaic trade has been disturbed during the past year by the fact that the mosaic workers’ union is not a strong enough organization to prevent strikes. The mosaic workers, however, have been successful in obtaining good imported marble, and the freedom from strikes.

The demand for colored marble has also been so great that many orders placed a year ago with the quarry agents are at the present time unfilled. The imports of foreign marble into the Port of New York during the last year amount to from three to three and a half millions of dollars. The labor market as it relates to the marble industry has been extremely good, and the men have been employed at a reasonable wage.

The mosaic industry has been remarkably for its freedom from strikes. The agreements made with the men have been absolutely lived up to on both sides, thereby avoiding strikes and contentions. The agreements signed terminated January 1, 1908. The men are satisfied with their wages and are endeavoring to give satisfaction to their employers.

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and a new agreement was made which expires January 1, 1906. The mosaic helpers were on strike for a short time to enforce their demands for a higher wage rate which was adjusted through the mosaic mechanics only after the helpers had returned to work. Their agreement signed through the mosaic mechanics expires January 1, 1900.

The marble and mosaic industry is apparently in the infancy. The great complaint of the manufacturer is the shortness of time given to complete large contracts, and his hope is that the day may come when he will obtain better prices for his product. Competition was never so keen as it is at the present time. The prices obtained to-day for marble work are only 10 per cent above what they were in 1896. The introduction of new labor-saving machinery has reduced the cost of production to such a degree that prices are kept low and the ability to furnish large contracts in little time has obtained. The only successful New York manufacturer is the one who "gets there" as to "time" and quality of material and workmanship.

JOHN H. SHIPWAY.

Granite Industries.

The year 1906 will ever be remembered throughout the United States as a whole as one of the good years. The quantity of business has been equal to anything we have ever had, and, with the exception of a few cases, more especially locally, the prices have been very fair. Nineteen hundred and five was a good year, but, from the writer's point of view, 1906 has been better. The local manufacturers have all been busy, and at times were bothered to get men enough to conduct their business in such a way that there would be no delay on building operations. This scarcity of men extended to the quarries in the Eastern States, and from all quarters came reports of more work than men.

Throughout it all good feeling has existed between the employer and the employee, and the year has been marked for the most part by the absence of the labor trouble which is so often the case in Europe. The introduction of the new labor-saving machinery has been instrumental in reducing the cost of production to such a degree that prices are kept low and the ability to furnish large contracts in little time has been obtained. The only successful New York manufacturer is the one who "gets there" as to "time" and quality of material and workmanship.

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Throughout it all good feeling has existed between the employer and the employee, and the year has been marked for the fact that it has been entirely free from labor trouble of any magnitude. A few isolated cases of trouble have occurred in the Eastern States, and from all quarters came reports of more work than men.

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JOHN H. SHIPWAY.

Granite Industries.

The year 1906 will ever be remembered throughout the United States as a whole as one of the good years. The quantity of business has been equal to anything we have ever had, and, with the exception of a few cases, more especially locally, the prices have been very fair. Nineteen hundred and five was a good year, but, from the writer's point of view, 1906 has been better. The local manufacturers have all been busy, and at times were bothered to get men enough to conduct their business in such a way that there would be no delay on building operations. This scarcity of men extended to the quarries in the Eastern States, and from all quarters came reports of more work than men.

Throughout it all good feeling has existed between the employer and the employee, and the year has been marked for the fact that it has been entirely free from labor trouble of any magnitude. A few isolated cases of trouble have occurred in the Eastern States, and from all quarters came reports of more work than men.

The marble and mosaic industry is apparently only in its infancy. The great complaint of the manufacturer is the shortness of time given to complete large contracts, and his hope is that the day may come when he will obtain better prices for his product. Competition was never so keen as it is at the present time. The prices obtained to-day for marble work are only 10 per cent above what they were in 1896. The introduction of new labor-saving machinery has reduced the cost of production to such a degree that prices are kept low and the ability to furnish large contracts in little time has obtained. The only successful New York manufacturer is the one who "gets there" as to "time" and quality of material and workmanship.

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A Prosperous Year in Lumber.

(The President of the York Lumber Trade Association.)

The year ending December 31, 1905, was perhaps the most remarkable year ever experienced by York lumber dealers, as the records show.

January 25, 1907

T

A subject affecting so closely the cost of home-building as the price of lumber must necessarily receive a great deal of public attention when the scale of values mounts so high.
Lighted by

LUXFER

Sidewalk Prisms
and Floor Lights

TIFFANY & COMPANY'S
New Fifth Ave. Store

The Famous New
Home of a Famous
Old House

LUXFER PRODUCTS

In all modern building operations, whether construction, remodelling or improvement, The LUXFER System of Prism Lighting plays an increasingly important part.

The day has passed when architects or builders looked upon LUXFER installations as experiments.

LUXFER has proven its worth and efficacy in solving daylighting problems, whether involving overhead or underground illumination.

Another development is equally marked. LUXFER no longer is confused with so-called “glass prisms,” but stands alone as a dependable medium for the transmission and scientific diversion of daylight to a given point to supply an evident deficiency.

LUXFER is a “prism” and LUXFER is “glass,” but no “glass prism” other than our own is “LUXFER.” The difference is the difference between results and dissatisfaction, between science and guess-work; which fact most architects and builders are fully aware of.

AMERICAN LUXFER

General Offices: HEYWORTH BUILDING,
BRANCHES: New York  Boston  Philadelphia  San Francisco  Kansas City
Lighted by LUXFER

Sidewalk Prisms

GORHAM Mfg. COMPANY’S New Fifth Ave. Store

A landmark in New York’s Architectural advance

ARE NECESSARY

LUXFER PRODUCTS consist principally of the following items, all of which are employed in all important building operations that come under the designation “modern.”

LUXFER Sheet Prisms are large sheets suitable for glazing full sash in factories, office buildings, etc., by which rooms on any floors or in any surroundings may be flooded with sunlight.

LUXFER Transom Prisms are the form used for securing adequate daylight, generally in stores or smaller buildings where light may be “annexed” only from front and rear or the side.

LUXFER Floor Prisms are used (as in the buildings illustrated) to secure full and complete illumination throughout.

LUXFER Sidewalk Prisms are used (as in the buildings illustrated) for the complete illumination of basements, subfloors and all underground spaces.

The two latter are used in connection with the best forms of reinforced concrete construction.

Full information and estimates furnished from any of our offices.

PRISM COMPANY

CHICAGO, Cor. Madison St. and Wabash Ave.

St. Paul Cleveland St. Louis Cincinnati Baltimore New Orleans Milwaukee
as to make the possibility of getting a house more difficult for the average man, and hence no occurrence of the year was deemed of more importance in the trade than the resolution of Congress ordering an investigation. Retailers, in common with the public at large, will be better satisfied when they shall be informed as to the real causes for the scarcity of lumber and its high cost. For the wholesale trade it is semi-officially said that the most important organization representing manufacturers and wholesalers is the National Wholesale Lumber Dealers' Association, and that this body has nothing whatever to do with the prices and never has had. It is admitted, however, that the members of the Georgia-Florida Saw Mill Association and the North Carolina Pine Association, Incorporated, do "get together occasionally and decide what, in the opinion of the majority, is a fair price for the products which they manufacture at the time of manufacture." On the other hand, it is asserted that the prices so made are merely a consensus of opinion, are not arbitrary in any sense, nor are they considered so by the members of the associations. If the demand for the current prices. "More necessary to house building is scarcity in yellow pine almost sufficient alone to be responsible for ties and new cars, it is conceivable how there can be a trade. With the enormous demand from railroad companies transportation service is the worst that ever confronted the been the increased wages of labor and the car shortage. The trade officials inform us, various local organizations such as inspection bureau, and to provide for uniformity of treatment. As to make the possibility of getting a house more difficult for the average man, and hence no occurrence of the year was deemed of more importance in the trade than the resolution of Congress ordering an investigation. Retailers, in common with the public at large, will be better satisfied when they shall be informed as to the real causes for the scarcity of lumber and its high cost. For the wholesale trade it is semi-officially said that the most important organization representing manufacturers and wholesalers is the National Wholesale Lumber Dealers' Association, and that this body has nothing whatever to do with the prices and never has had. It is admitted, however, that the members of the Georgia-Florida Saw Mill Association and the North Carolina Pine Association, Incorporated, do "get together occasionally and decide what, in the opinion of the majority, is a fair price for the products which they manufacture at the time of manufacture." On the other hand, it is asserted that the prices so made are merely a consensus of opinion, are not arbitrary in any sense, nor are they considered so by the members of the associations. If the demand for the stock which the members of these associations have for sale is sufficient to warrant them in charging the prices which they have agreed are reasonable, then those prices are charged, it is said, but when the demand does not warrant it such prices are not obtained, nor is any attempt made to obtain them, nor is there any punishment meted out to members for not obtaining them. In behalf of the National Hardwood Lumber Association, it is explained that its chief aim in life is to operate a uniform inspection bureau, and to provide for uniformity of treatment. Then besides these superior organizations there are, the lumber trade officials inform us, various local organizations such as are maintained among the Buffalo and Albany wholesalers, but in those sections no schedule of prices is ever adopted which are maintained among the Buffalo and Albany wholesalers, but in those sections no schedule of prices is ever adopted which are operative, except the prices which the demand makes possible to charge. Then there are operating in the East and Middle West numbers of retail associations. Some of them, like the New York Lumber Trade Association, are very strong and comprehend practically the entire trade in the territory in which they operate; but "none of these ever meddle with prices in any way, shape or manner whatever." is the word of testimony. Contributing to the continuance of lumber during the year has been the increased wages of labor and the car shortage. The transportation service is the worst that ever confronted the trade. With the enormous demand from railroad companies for ties and new cars, it is conceivable how there can be a scarcity in yellow pine almost sufficient alone to be responsible for the current prices. "More necessary to house building is hemlock," which is particularly in "strong hands," and the trade prediction is that prices will continue firm during 1907. Ten years ago hemlock was selling on a basis of $31 per M., while the base price that has prevailed for several months past is double. With the almost insatiable demand for wood pulp mills, the spruce timber supply will not be allowed to run much ahead of the demand. White pine is said to be in shorter supply this year, owing to low water in some regions during the rafting season, and taking the situation as a whole the outlook is for a continued large volume of business at about the same level of quotations. During the past year the U. S. Forest Service for the first time attempted to gather detailed statistics of the lumber cut of the United States. This task was undertaken in co-operation with the National Lumber Manufacturers' Association, whose members cut at least one-third of the lumber annually manufactured in the United States. The final tabulation shows that 11,966 establishments cut 30,502,961,000 feet of lumber in 1905. According to these figures both of the number of establishments and the total cut are lower than the Census showing for 1890 and for 1904. The Census figures do not cover custom mills, while a few such mills are included in the Forest Service reports. In Table 1 the statements for the three years are printed side by side. In the right-hand column of this table is given the ratio which the figures for 1905 bear to those of 1904.

### Table 1: Comparison of Census figures upon the lumber cut of the United States in 1890 and 1904 with those of the Forest Service for 1905

<table>
<thead>
<tr>
<th>Product</th>
<th>1890 Cut</th>
<th>1904 Cut</th>
<th>Forest Service 1905 Cut</th>
<th>Ratio of Census Cut to Forest Service Cut</th>
</tr>
</thead>
<tbody>
<tr>
<td>Yellow pine</td>
<td>30,267,140</td>
<td>12,812,307</td>
<td>9,760,508</td>
<td>76.0</td>
</tr>
<tr>
<td>White pine</td>
<td>7,349,108</td>
<td>5,268,846</td>
<td>3,868,733</td>
<td>73.7</td>
</tr>
<tr>
<td>Douglas fir</td>
<td>7,255,089</td>
<td>2,929,534</td>
<td>4,319,448</td>
<td>147.2</td>
</tr>
<tr>
<td>Hemlock</td>
<td>3,285,045</td>
<td>2,587,787</td>
<td>2,884,063</td>
<td>88.8</td>
</tr>
<tr>
<td>Oak</td>
<td>3,484,363</td>
<td>2,982,595</td>
<td>1,888,763</td>
<td>63.2</td>
</tr>
<tr>
<td>Spruce</td>
<td>1,409,353</td>
<td>1,506,880</td>
<td>1,165,949</td>
<td>89.7</td>
</tr>
<tr>
<td>Yellow poplar</td>
<td>1,942,599</td>
<td>823,554</td>
<td>992,748</td>
<td>98.3</td>
</tr>
<tr>
<td>Cypress</td>
<td>492,761</td>
<td>749,502</td>
<td>733,869</td>
<td>100.5</td>
</tr>
<tr>
<td>Maple</td>
<td>606,654</td>
<td>587,558</td>
<td>908,746</td>
<td>158.7</td>
</tr>
<tr>
<td>All others</td>
<td>3,475,098</td>
<td>2,473,220</td>
<td>2,407,030</td>
<td>84.8</td>
</tr>
<tr>
<td>Total</td>
<td>33,404,850</td>
<td>34,135,139</td>
<td>30,502,961</td>
<td>89.0</td>
</tr>
</tbody>
</table>

**The incompleteness of the returns for 1905 does not wholly WE manufactured, erected and finished the interior woodwork in the TRINITY BUILDING, and have recently imported 1,000,000 feet of mahogany for the interior woodwork in the TRINITY ANNEX, the UNITED STATES REALTY BUILDING and THE TRUST COMPANY OF AMERICA BUILDING:**

**The Batavia & New York Wood Working Co.**

1612 Flatiron Building  
103 East 125th Street  
NEW YORK CITY

**FACTORY: BATAVIA, N. Y.**
Elm 227,038
Cottonwood 230,000
Redwood 411,089
Maple 808,746
Cypress 753,369
Western yellow pine 988,542
Hemlock 2,804,083
Other kinds 294,512
Hickory 95,803
Western white pine 115,678
Beech 219,000
Chestnut 224,413
Red gum 316,588
White oak 1,210,216
Yellow pine 8,771,966

The Bluestone Trade.

SURPLUS BLUESTONE STOCK USED UP IN 1906.

The trade in North River bluestone is as sensitive, if not more so, to general trade conditions than any other kind of stone, as it is an old and tried material used in both building construction of all kinds, from the cheapest to the most expensive, and for all classes of street work.

The season of 1906 has been a busy one, mills and quarries have been kept going to full capacity. Although falling behind the two previous years it is still very good. The mills have increased so as to bring the total business up to about the same as last year in quantity.

The increased demand of 1903 and 1904 stimulated production so that the season of 1905 closed with quite a stock of some kinds on hand. There is a falling off of nearly 4,000 in the number of establishments during the period. During the same period the total cut increased, though not greatly. Had the number of establishments to report to the Service in 1905 borne the same relation to those reporting to the Census in 1901 as the latter bore to those reporting to the Census in 1905, the Service figures for total cut would have shown as much, perhaps, in increased quantity, if not greatly, as the Service figures for total cut proportionately.

A second fact to be born in mind is that the actual number of establishments is on the decline. This is borne out by the Census figures of 1900 and 1901, which show a falling off of nearly 4,000 in the number of establishments during the period.

While the falling away of the demand for stone used by speculative builders in New York City has been felt by retail concerns catering to this class of trade, it has not been felt by the wholesale trade quite so much on account of the activity in other parts of the country.

Collections have not been so good as last year, particularly during the latter part of the season. Observers have in receiving banking favors and had been sustaining and paying their bills promptly have found it difficult to pay when due, and in many cases have had to have paper extended, bankers who had sought their business in the past having taken advantage of the demand for money in Wall Street or of people who could pay more for it than the contractors.

The amount of speculative sales, etc., amount to more than last year, but have not been as heavy as might have been expected in view of the great amount of speculative building and development of property. These losses, however, may be much larger if money keeps scarce and things do not move again soon.

It is somewhat early to forecast this year's demands, but indications at the present moment are bright for the year of 1907.

C. C. BULL.

Fireproof Construction.

GOOD WORKMANSHIP AND MATERIALS DEMONSTRATED THE WISDOM OF EMPLOYING THEM.

UNTIL a few years ago there were doubts in the minds of many as to the possibility of making buildings fireproof. The partial and total failure of some of the earlier attempts at fireproof construction were responsible for these views. The behavior of some of the more recent examples of fireproof buildings that have passed through the supreme test is, however, highly satisfactory, and proves that buildings can now be designed and built that will actually be fireproof.

Every great conflagration, although it involves enormous property losses, teaches new lessons in fire-resisting construction. The Baltimore and San Francisco conflagrations have contributed greatly to our present knowledge of the fire-resisting qualities of different materials and methods.

Unfortunately, architects and contractors are very slow to recognize the importance of the lessons taught by the great conflagrations, and on every hand are to be seen the repetition of the same mistakes that were glaringly exposed both in Baltimore and San Francisco.

It is a matter for congratulation that good workmanship and materials, wherever they have been tested in conflagrations, have clearly demonstrated their superiority and the wisdom of employing them. In numerous instances the false economy of sacrificing the openings in the exterior walls and roofs of the building, have resulted in such serious damage to the structure when attacked by fire as to involve almost entire reconstruction.

In the light of our present knowledge of this subject, architects and contractors should consider it a moral duty to their clients to design and build structures that represent the best known methods and practice, and for the sake of their own future reputation shall all that is flimsy, unsatisfactory and inefficient.

Correct and reliable reports of recent conflagrations are now available to everyone. A few days' study of these reports will be sufficient to inform the average person thoroughly as to the developments and lessons of these conflagrations. Consequently the FAILURE IN THE FUTURE OF BUILDINGS THAT HAVE BEEN DESIGNED TO BE FIREPROOF WILL ONLY SERVE TO REVEAL THE INCOMPETENCY OF THE DESIGNER AND THE IGNORANCE AND NEGLECT OF THE BUILDERS.

The best modern practice in the design of the foundations, the exterior walls and the steel skeleton structure of fireproof buildings is, generally speaking, entirely satisfactory. A few details can be improved, but these features of the tall buildings fulfill the requirements.

The problem of making buildings fireproof has now been narrowed down to a single important detail, that of protecting the openings in the exterior walls and roofs.

Had these openings of the fireproof buildings of San Francisco been protected with metal or metal-covered frames, sash and doors, and wire glazing of only fair efficiency, there is no doubt but that the contents of most of them would have been wholly
The efficient protection of these openings so as not to mar the artistic beauty of the facades is at the present time the one important problem for architects and engineers to solve. Its successful solution will be the crowning event of fifteen years of intelligent effort to produce fireproof buildings.

A. L. A. HIMMELWRIGHT.

Production of Electrical Machinery and Supplies.

Electrical machinery has, in recent years, advanced several numbers in the list of manufactures contributory to building construction and equipment, and has now to be reckoned with as much as brick, stone, wood, iron, cement, plaster or glass. Electrical apparatus enter into the construction or equipment of office buildings, hotels, factories and apartment houses of the first class, as parts of the arrangement for light, power, ventilation and telephoning. The following sets forth statistics of the manufacture of electrical machinery, apparatus and supplies—products by kind, quantity and value in the United States for the year 1906, compared with 1900:

**STATISTICS OF ELECTRICAL MACHINERY.**

<table>
<thead>
<tr>
<th>Products, total value</th>
<th>$159,551,402</th>
<th>$105,831,865</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Dynamo:</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Number</td>
<td>15,860</td>
<td>10,527</td>
</tr>
<tr>
<td>Value</td>
<td>$11,084,234</td>
<td>$10,472,570</td>
</tr>
<tr>
<td>Horse-power</td>
<td>1,328,249</td>
<td>770,832</td>
</tr>
<tr>
<td>Transformers</td>
<td>$1,740,034</td>
<td>$379,747</td>
</tr>
<tr>
<td>Switchboards, etc.</td>
<td>$3,760,014</td>
<td>$1,846,624</td>
</tr>
<tr>
<td>Motors, all kinds</td>
<td>$22,670,126</td>
<td>$19,655,034</td>
</tr>
<tr>
<td><strong>Direct and alternating:</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Number</td>
<td>70,577</td>
<td>30,948</td>
</tr>
<tr>
<td>Value</td>
<td>$13,120,938</td>
<td>$7,551,100</td>
</tr>
<tr>
<td>Horse-power</td>
<td>678,599</td>
<td>310,705</td>
</tr>
<tr>
<td>For fans</td>
<td>192,535</td>
<td>97,963</td>
</tr>
<tr>
<td>Value</td>
<td>$1,168,154</td>
<td>$527,209</td>
</tr>
<tr>
<td>Horse-power</td>
<td>30,706</td>
<td>12,706</td>
</tr>
<tr>
<td>For electric elevators:</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Number</td>
<td>1,328</td>
<td></td>
</tr>
<tr>
<td>Value</td>
<td>$898,175</td>
<td>$2,921,901</td>
</tr>
<tr>
<td>Horse-power</td>
<td>13,308</td>
<td></td>
</tr>
</tbody>
</table>

Miscellaneous:

| Number                | 8,481       | 7,013       |
| Value                 | $2,940,471  | $613,838    |
| Horse-power           | 36,820      | 11,292      |
| Batteries, incl. parts and supplies... | $4,251,833  | $679,045    |
| Storage               | $2,645,749  | $2,550,061  |
| Primary               | $1,088,144  | $1,119,444  |
| Cables                | $2,710,925  | $1,751,248  |
| Lighting              | $1,050,001  | $2,283,732  |
| Furnace               | $172,454    | $19,974     |
| Miscellaneous         | $1,157,319  | $1,655,542  |

Arc Lamps

| Number                | 1,574,422   | $827,577     |

Open:

| Number                | 1,748       | 23,056      |
| Value                 | $29,080     | $270,480    |

Closed:

| Number                | 193,469     | 134,531     |
| Value                 | $1,014,125  | $1,501,290  |

Searchlights

| Number                | 1,024       | 8,283       |
| Value                 | $114,785    | $225,605    |

Incandescent lamps

| 16 candle-power:     | $68,620     | $5,15,118   |

| Number                | 8,533,285   | 21,191,131  |
| Value                 | $1,608,084  | $2,510,023  |

Below 16 candle-power:

| Number                | 10,739,824  | 2,906,817   |
| Value                 | $1,311,011  | $928,020    |

Above 16 candle-power:

| Number                | 9,069,439   | 1,252,250   |
| Value                 | $898,204    | $283,321    |

Decorative and miniature lamps:

| Number                | 1,081,495   | 33,413,132  |
| Value                 | $914,967    | $37,055     |

Electric light fixtures:

| Number                | 5,907,346   | $3,144,399  |
| Value                 | $10,985,103 | $2,152,126  |

Telephone apparatus:

| Number                | 1,311,395   | $1,322,596  |
| Value                 | $2,696,069  | $1,512,001  |

Insulated wires and cables:

| Number                | 3,410,021   | $2,696,069  |
| Value                 | $1,322,596  | $1,512,002  |

Electric conduits:

| Number                | 3,060,256   | $2,696,069  |
| Value                 | $1,322,596  | $1,512,002  |

Annulators:

| Number                | 2,789,321   | $2,696,069  |
| Value                 | $1,322,596  | $1,512,002  |

Electric clocks, etc.

| Number                | 1,401,064   | $2,696,069  |
| Value                 | $1,322,596  | $1,512,002  |

Fuses and lightning arresters:

| Number                | 1,435,293   | $2,696,069  |
| Value                 | $1,322,596  | $1,512,002  |

Phenolic and resistances:

| Number                | 1,325,725   | $2,696,069  |
| Value                 | $1,322,596  | $1,512,002  |

Circuit fittings:

| Number                | 3,525,446   | $2,696,069  |
| Value                 | $1,322,596  | $1,512,002  |

Am. rec. for cust. wk. and repairing:

| Number                | 2,789,022   | $2,696,069  |

W ithin the circle lies the Metropolitan area. In this area and points adjacent thereto, reached by the lines of the Metropolitan telephone system, there were in service and under contract December 31st, 1906, 389,000 telephones. The gain during the past year has exceeded any previous year.

**TELEPHONES IN SERVICE AND UNDER CONTRACT.**

<table>
<thead>
<tr>
<th>At End of Year</th>
<th>Yearly Gain</th>
</tr>
</thead>
<tbody>
<tr>
<td>1901:</td>
<td>125,378</td>
</tr>
<tr>
<td>1902:</td>
<td>167,792</td>
</tr>
<tr>
<td>1903:</td>
<td>210,821</td>
</tr>
<tr>
<td>1904:</td>
<td>255,093</td>
</tr>
<tr>
<td>1905:</td>
<td>321,808</td>
</tr>
<tr>
<td>1906:</td>
<td>389,000</td>
</tr>
</tbody>
</table>

We assure our patrons and the public of our intention to continue a policy of expansion by furnishing, at reasonable rates, the best service possible and making the telephone system of New York and vicinity invaluable to every member of the community.

NEW YORK TELEPHONE COMPANY
18 Dey Street, NEW YORK
40 So. Fifth Avenue, MT. VERNON, N.Y.

THE NEW YORK AND NEW JERSEY TELEPHONE COMPANY
81 Willoughby Street, BROOKLYN, N.Y.
160 Market Street, NEWARK, N.J.

Telephone Progress

**Within the circle lies the Metropolitan area.** In this area and points adjacent thereto, reached by the lines of the Metropolitan telephone system, there were in service and under contract December 31, 1906, 389,000 telephones. The gain during the past year has exceeded any previous year.

**TELEPHONES IN SERVICE AND UNDER CONTRACT.**

<table>
<thead>
<tr>
<th>At End of Year</th>
<th>Yearly Gain</th>
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<tbody>
<tr>
<td>1901:</td>
<td>125,378</td>
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<tr>
<td>1902:</td>
<td>167,792</td>
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<tr>
<td>1903:</td>
<td>210,821</td>
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<tr>
<td>1904:</td>
<td>255,093</td>
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<tr>
<td>1905:</td>
<td>321,808</td>
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<tr>
<td>1906:</td>
<td>389,000</td>
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</tbody>
</table>
Present Problem in Hardware Is to Secure Deliveries When Needed.

BUILDERS' HARDWARE, while one of the lesser divisions of the building trades, has fully shared in the unprecedented activity which has characterized the depression of manufacturers. The National Hardware and Heating and Ventilating companies now charge, the change of rate having gone into effect July 1, 1905, according to statute. The inspectors frequently find wiring and appliances installed within buildings, which have not been reported to the department as working properly, and is being done by builders who are having been installed by incompetent workmen, unfamiliar both with the rules governing the installation of such equipments as to the need of a certificate of inspection before introduction of current, although it is estimated that as much as three cents per kwhistle in losses occurs in this city are caused by electricity, in many instances serious results have followed such practice.

Interior Wiring.

FIVE THOUSAND jobs of electrical construction or alteration are under way at the present writing. Every year this comparatively new industry, which saw its birth as a trade scarcely twenty years ago, is growing enormously. Ten thousand jobs in 1904, 50,000 in 1905, and 100,000 in 1906, as compared with an increase of 2,001 in 1903, and 224 in 1900, are reported for inspection last year, it will be noted that a decrease of six units is shown, which may be partially attributed to the reduction in maximum kwhistles in the city, making 479,591 in all. The number of motors covered by certificates shows an increase of 5,629 during 1906, as compared with an increase of 2,001 in 1903, and 224 in 1900, as compared with 221 in 1905. For these statistics the Record and Guide is indebted to the Department of Water, Gas and Electricity, but the figures for the year 1906 are approximate and not complete.

Applications for inspections, certificates issued, complaint notices issued, complaint notices attended to, work covered by certificates, and work covered by certificates.

H. R. TOWNE.

(President Yale & Towne Mfr. Co.)
Hardwood Flooring

During the year 1906 over six million feet of our HARDWOOD FLOORING was used in building construction in Greater New York. If you want GOOD, RELIABLE HARDWOOD FLOORING, kiln dried and carefully manufactured, ask your lumber dealer for D. & D. brand.

DIXON & DEWEY

716 and 716A Flatiron Building, NEW YORK
Architectural Metal Work.

REVIEWED BY THE PRESIDENT OF THE HECI.A IRON WORKS.

At present the metal work for buildings is divided into two distinct branches—the structural steel work and the architectural metal work—and these two branches have in the last twenty-five years made immense strides, practically revolutionizing the mode of construction of first-class buildings.

The architectural metal work has done much to make the buildings more fireproof by substituting metal for wood, most particularly in stairways, elevator cages, elevator enclosures, windows, doors, etc.; but it has also done much to improve the appearance of both the interior and the exterior of buildings, and it is generally conceded that this country is far ahead of other countries in making both practical and artistic metal work for buildings. That has been brought about mainly by the good will of the architects in coming in close contact with the leading members of this particular branch of the business, and by both studying together how to produce the best results. The result is that while twenty-five years ago there were but one or two concerns that made a special effort in this direction, there are now, for the reason given above and because the work has become so popular, hundreds of concerns giving particular attention to this class of work, and all of them find plenty to do.

In awarding the contract for architectural metal work in our first-class buildings the owners and the architects should not be compelled to always give the work to the lowest bidder, but should choose among the different bidders according to their ability to execute the work. That is already being done to a great extent, but it is not done as often as it should be. In bidding for work where it is known that the lowest bidder is to get the contract, the better concerns cannot figure for first-class work, because they would never be the lowest bidder.

But to be perfectly fair all around, it should be known that the owners and the architects will use their own judgment and award the contract to the firm whose bid and whose ability to execute the work will be to their best advantage.

There is at present a greater demand for architectural metal work than there are skillful mechanics to supply it. It is a business that is very much on the increase, and I hope the good feeling that architects have shown in former years toward architectural metal work will continue, because by both parties coming in close contact the best results will be gained.

N. POULSON.
The Largest Single Paint Order
for Structural Steel

Quotations subject to change without notice.
All agreements contingent upon strikes, accidents, and other causes beyond our control.

John Jobson,  
President.

Charles R. Tainter,  
Secretary.

Howard M. Hooker,  
Treasurer.

The Jobson-Hooker Company
Erectors of Steel Structures

Pittsburgh Office
1512 Machesney Building
Pittsburgh, Pa.
Telephone 1095 Court.

New York Office
1170 Broadway
Telephone 4266 Madison Sq.


Messrs. Toch Brothers,
320 Fifth Ave., New York.

Gentlemen:

We to-day send you formal order to cover our requirements of Marine Tockolith, No. 49 R I W Damp Resisting Paint, and Toch Bros. Graphite Paints, to be used on our contract for erection of steel in connection with the Pennsylvania Terminal Station, New York City. Our approximate needs will run close to 25,000 gallons, as we see it at present.

Very truly yours,

The Jobson-Hooker Company,

Our Technical Paints have been used on the following structures:

New Penna. R. R. Terminal  Brooklyn Rapid Transit
New York Subway  Long Island Railroad
Philadelphia Subway  Pennsylvania Railroad

Boston Subway

And hundreds of buildings and apartment houses throughout Greater New York

Manufactured by

Toch Brothers
Established 1848

Works and Warehouses, Long Island City  320 Fifth Ave., New York

Specialists in Technical Paints
The Sheet Metal Trade.

E VERY important base of finished steel product except structural material was advanced in price during the last quarter of the year. Tin plate was set ahead ten cents a box on the job market in the second act of the sort within the period stated at Pittsburgh. Further illustrative of the unprecedented state of circumstances in the sheet and tin plate trade is the report from Pittsburgh that, while it is customary to observe the new year under no very gloomy portents, yet, in general statement, it can be said they are still being operated as fully as the short supply of steel will permit. The only Idle works are; Humbert at Cornerville, Pa., 6 miles; Norwood at Glen City, Ind., 7 miles; and Anderson at Anderson, Ind., 8 miles. These plants have not been on the operative list for eighteen months, and no effort is being made to put them in condition, as it is difficult to get the steel needed to supply the plants already running. The independent producers of tin plate and sheets are only prevented from operating to capacity on account of inability to get steel, but most of them are operating in fairly good order.

The leading interest and many independents are booked up on sheets to April 1 and into the second quarter. It has been the practice in former years to store tin on sheets to April 1 and into the second quarter. In tin plate sales have been heavy throughout the season and into the third quarter. It has been the practice in former years to store tin plate at this season for the usual brisk spring trade, but while steel prices have been high, the tin trade has been quite steady, and prices have advanced uniformly. It was only prevented from operating to capacity on account of inability to get steel, but most of them are operating in fairly good order.

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Established 1888

H. C. CLAUSEN
IRON WORKS

All Classes of Architectural Iron Work

508-510 East 74th Street
NEW YORK

Estimates Furnished

Pullman Automatic Ventilators

Admit Fresh Air and Extract Foul Air without draught.
Do not affect temperature of room.
Do not admit dust, dirt or extraneous matter.
Work day and night without cost of maintenance.
Can be fitted to any window.

"Shut That Window"
and write for Booklet No. 3

A Block of Real Homes.

A BLOCK of private houses recently completed for the Clark estate (Mr. Frederick Ambrose Clark), is situated in West 74th St., New York, numbers 18 to 52. In that the houses are to be leased instead of sold, the scheme marks a new departure in real estate investment which cannot but be of advantage to the community in general. In these houses it is the aim to provide a better abode than can be obtained for an equal rental in an apartment house; to provide also a home in fact, a place where there may be real family life as it used to exist before the city grew to proportions that forced real estate values up so high that now only the wealthy can live in houses.

The block presents the appearance of a composite whole well studied in its entirety for silhouette concentration and general composition.

The houses, though parts of a whole, preserve the individuality that the prospective tenant of such a house would expect. Mr. Percy Griffin has varied the individual facade treatments to give to each house a distinctive character, yet to preserve in its composition certain lines, which allow it to properly fit into the neighborhood. Each house occupies a plot of about 56x50 ft., and has a 3-sty rear extension, making a fairly roomy establishment of seventeen or nineteen rooms. By building these houses at one time it has been possible for the owners to obtain at a reasonable expenditure, many conveniences that to the one-house builder would be prohibitive in price.

Speaking of the architectural scheme as a whole, an appreciation in the Architectural Record for November says it is a laudable one, and if one did not know how it came about, he would be agreeably surprised to see in New York a repetition, with certain local modifications, of the Parisian maisonette. Perhaps the idea will appeal in the future, not only to estates and the like, who, thanks to them, have done the good work in this direction, but to men of moderate means, who can afford to build themselves modest city houses. If people in this frame of mind can, by this successful experiment be interested sufficiently to co-operate before building, so that some uniformity of architectural treatment may result, then the experiment of the Clark estate will have accomplished a very important step in the direction of rational and good architecture in New York and other large American cities. But this is perhaps looking somewhat into the future, and this law will, no doubt, have to acknowledge the practical as well as the artistic necessity of such a step before any definite results can be expected.

Percy Griffin, Architect.
CAREER OF AN OLD TIN-PLATE HOUSE.

In these days of huge corporations and organized companies representing widespread interests in every branch of business, it is of distinct interest to record at least one case where an old-time house, established nearly a century ago, has steadfastly maintained its independence and individuality, still continuing in the same line of business as a private firm.

The record of the house of N. & G. Taylor Company has been one of continuous signal success in the tinplate industry. The business has been handed down from father to son—no less than four generations of Taylors having been connected with the firm. No reference to the roofing-tin industry of this country would be complete without mention of this house. Since the early days of the roofing-tin industry they have consistently advocated the use of good tin, and have shown greater activity than any other house in presenting the advantages of good roofing tin to roofers, contractors, architects and property owners themselves. As a natural result, they have built up a business that has made them the largest manufacturers of high-grade roofing tin in this country.

The house was founded in 1810 in Philadelphia, by William Taylor, grandfather of the present members of the firm, who with his brothers, George Taylor and Tracy Taylor, embarked in the venture of selling tinplate, tinware, metals and kindred articles of all kinds—a venture that was destined to meet with such marked success. In 1830 the firm sold the first terne plates for roofing purposes ever made. We quote from the United States Census Report for 1902:

“In that year (1830) small quantities of lead-coated sheets were made in an establishment located on Market st, Philadelphia, and used for covering roofs. The plates made in the Philadelphia establishment were 10x14 inches, the standard commercial size in those days. Imported English tinplates were used instead of blackplates. They were first put together and run through a bath of molten lead, the tin on the plates serving as a holder for the lead. The plates were sold for roofing purposes, and were of excellent quality. The quantity produced, however, was not very large.

“Regarding the sale of these plates, the N. & G. Taylor Company, of Philadelphia, says: ‘News of the sale of so novel an article soon found its way across the water, and terne plates commenced to be made there.’ The manufacture of terne plates did not become an important branch of the tinplate industry until America began to use this material for covering roofs.

In 1845 the father of the present members of the firm, Nathan Taylor, together with his cousin, George E. Taylor, a son of George Taylor, were admitted to the firm—the old people retiring a few years later. The present company has in its possession old catalogues published about this time, which are of remarkable value to those who are interested in the practice and customs of former days. It is evident from one of these catalogues, published in 1857, that the company already occupied an important position in the industry, as we note a record of premiums being awarded them at the following exhibitions: The American Institute, 1843, '47, '48, '49, '50, '51, '52 and '53; Hartford County Agricultural Society, September, 1843; October, 1847, and October, 1848; Maryland Institute, October, 1848, and 1851; Massachusetts Mechanics Fair, Boston, 1850; New York State Fair, 1850; the Exhibition of the Industry of All Nations at the Crystal Palace, London, England, 1853.

The tools and machines used by tinners in the early days were crude and rough in design, and improved forms were designed by the company about this time, many of which are still in use at the present day. The rights of manufacture having been transferred to the makers of tinners' tools and supplies. Many of the awards mentioned above were made for these improved tools. These tools were lighter, neater and of far more practical use than the heavy, clumsy tools of English make.

Nathan Taylor died in 1851, leaving his partner, George E. Taylor, who, with his brother, William Y. Taylor, continued the firm of N. & G. Taylor, adding the word 'Company' to the title, making the present title date from that time.

About this time, catalogues and circulars published by the firm mention the facilities offered by the new Atlantic Cable in importing supplies of tinplate promptly from the English works. As a matter of interest, the first code word adopted by the company was the word 'pleasure,' indicating that 'tinplates are advancing.' The charge for this single word at that time was five dollars.

A catalogue published in 1868 calls particular attention to the new size for roofing tin just introduced by this house, namely 28x20 inches. Frequent mention is made of this latest novelty, and its distinct advantage to the roofer, in N. & G. Taylor Co.'s advertising at that time. In this same catalogue is found a description of another novelty, namely—Bessemer steel tinplates.
for stamping purposes. The catalogue states that "these steel brands suitable for all kinds of work; IC thickness to D 5X.

"At the Franklin Institute Exposition of 1876, we exhibited the largest sheet of tinplate ever made, also samples of the first leaded plate ever made, taken from a roof in Philadelphia, which we have preserved and put on public exhibition ever since. This was the leaded tin made in Philadelphia in 1831, before it was ever made in Wales. Other curiosities exhibited were samples of No. 40 sheet iron, shown under glass in 1720, showing the method of making tinplates at even an earlier period."

These old catalogues constantly urge roofers and manufacturers to use their own brand of tinplate, and, in the case of those who deal in built ships used for the imports of tinplate, and when Philadelphia Russia iron was first made, Messrs. N. & G. Taylor Company were the first to sell it. They were the first houses therefore that used American tinfoil and sheet-iron, introducing it through Eastern Pennsylvania and New York City. One of our advertisements of this American Hammered Russia Iron contains the significant prophetic inquiry—"Why go to Russia for iron when we have mountains and mountains of it here?"

This catalogue of 1875 mentions some buildings in Philadelphia which were commenced and during the latter part of the last century, and the roofs have not been replaced since. One was covered in 1796 and the roof to-day is in as excellent condition as when put on. Throughout Canada it is a common thing for the roof to last for ages after the lapse of a century. George E. Taylor died in 1882, when the present members of the firm, together with George W. E. Taylor (deceased 1890) had control of the business for the present time. After the McKinley protective tariff went into effect they were among the first to commence the manufacture of roofing-tin in this country. This was in 1891. A year or two later an extensive tract of land was secured in the southern portion of the city, where they had been for forty years, and as perfect as when first leaded.

"They Target and Arrow Old Style" brand, formerly known as "Taylor Old Style," has maintained so widespread a reputation for satisfactory service on the roof, that as a matter of common business judgment the company is bound to maintain the same reputation at all times. They have done, and are doing, their best to keep the tin to meet price competition.

In the present movement for better conditions among the trades, the firm has taken a leading part. In 1876, N. Taylor of the company, having submitted two of the six prize essays recently selected in competition for advancing the interests of tin roofing.

Prospective Building.

The following is a continued list of building enterprises for Manhattan and Brooklyn, some of which may be expected within the year 1907. For some plans are now under way; for others, no architects have yet been selected; and in some cases the sites have not been seacured. In a few cases, the owner is the architect; in the second, the contractor; in the third, the date is the date of announcement in the Record and Guide.

OROFICE. STORE AND LOFT BUILDINGS.


Broad st, s. cor Beaver st, 4-sty stock exchange. Consolidated Stock & Petroleum Exchange, 49 Broadway, arts, Clinton & Russell, 32 Wall st, br, Geo A Fuller, br, no sub-contracts let. July 7, 1906.


Amsterdam av, s. w cor 102d st, 2-sty store and office building. F W Wonthorste, 100 5th av, art, C P H Gilbert, 1125 Broadway, Dec 8, 1906.

4th av, s. cor 16th st, 12-sty loft building. Hudson Realty Co, 135 Broadway, arts, Buchman & Fox, 11 E 50th st, no contracts let. Jan 12, 1907.

Williams st, No 316, 6-sty mercantile building. Albert and Joseph Flanagan, 150 Flatbush ave, N Y, art, Schayes & Franke, 236 5th av, no contracts let. Jan 12, 1907.


Franklin st, s. cor 100th st, 3-sty store and loft building. Ida May Powell, 320 W 73d st, art, Henry Houchaux, Broadway and 102d st. No contracts let. Jan 12, 1907.


6th av, s. cor 114th st, extensive alterations to 6-sty bank and loft building. Fourteenth Street Bank, on premises; art, br, Garfield Building Co, 141 5th av, Nov 24, 1906. Grand st, s. cor Wooster st, extensive alterations to 4 and 5-sty store and loft building. Samuel Eismore, 71 Grand st; art, T J Van der Bent, 103 5th av, Dec 19, 1906.
HIGH-GR ADE BUILDING PAPERS

"VENETIA SHEATHING"—Highest quality Red Rosin Sized Sheathing.

"OLD HICK" FIBROUS RED ROPE SHEATHING AND INSULATING—Strongest Building Paper made.

U. S. FIBRE PLASTER BOARD—A paper substitute for plaster; can be painted, varnished or kalsomined. 36-in. rolls, 500 square feet each.

RED HAWK RED ROPE WATERPROOF ROOFING PAPER.

BLACK HAWK WATERPROOF SHEATHING—One, two, three and four-ply.

"NO NOISE" FELT—Made from selected wool stock. The best material used between double floors for sound deadening and damp-proof purposes.

C. B. HEWITT & BROTHERS
Wholesale Dealers and Manufacturers of
PAPER, BOARDS AND GLUE
Headquarters for Woodworking Glues

48 Beekman Street — New York City

Agents Metropolitan territory for "Congo" Never Leak Roofing.
Write for Samples and Price List.

ALSEN

THE SIDEWALK CEMENT

EVERY barrel of Alsen’s guaranteed to exceed “Standard Specifications.”
A medium slow set cement has proven in practical tests, in all countries,
most durable and safe.
Forced strength, like forced growth, is dangerous to ultimate results.
We supply Quick Set, however, to special order for special work.
Alsen’s is the safest cement manufactured, as analyses prove.
Every barrel passes boiling test before shipped. Every barrel is matured.
The Panama Canal award by Isthmian Commission, the 70,000 bbl. City of Rochester contract, the Key West extension, expected to take a total of 300,000 bbls., and many works of nearly equal importance, without a single rejection under most exhaustive tests, substantiate every assertion made for this Portland “Cement Insurance.”
Location directly on Hudson River gives great advantages in freights and prompt deliveries.
Valuation of Manhattan Real Estate.  

ANNEXED are statistics from the assessment roles in the Department of Taxes and Assessments. As will be seen by the tabulation, there was a general falling off in new buildings last year, which is particularly marked in Sections 4 and 7. The only section of Manhattan which shows a gain in the number of new buildings erected is Section 5, which exhibits an increase of 32 new buildings for 1900. The middle part of the Borough, Section 4, leads in increase improvements, showing a gain of more than six million dollars. The statistics are for each of the 9 sections, and are based on the number of buildings into which the city is divided for assessment purposes.

Section 1 calls that part of the borough south of Watts and Grand Sts., which has an assessed value of $43,593,413. Section 2, which includes all of Manhattan up to 70th St., has an assessed value of $72,560,410. Section 3 (between 70th and 140th Sts.) has an assessed value of $78,287,414.

(RECORD AND GUIDE)
CANAVAN BROTHERS CO.
Excavators and House Shorers

Great engineering feats involving skill, indefatigable labor and unique machinery and appliances are being performed every day in New York in the excavation and building of foundations, which are unseen and unnoted except by those directly interested.

The work of the excavator demands special appliances—pneumatic and electric drills, derricks, and a hundred others. Rocks must be blasted, old foundations must be removed, and adjoining buildings shored and kept in their places, and all this without the least injury to these buildings. Gangs of rough excavators are necessary in this work and skillful management is by no means one of the least difficulties of the master excavator.

An interview with a representative firm of excavators and house shorers, Canavan Brothers Company, whose extensive plant lies at the foot of West 56th Street, on the Hudson River, soon convinced the writer that the man who excavates or prepares the way for the foundation building is a most important factor in the construction of a building. When this same firm does the shoring necessary in connection with these large contracts for excavating, the owner or general contractor not only economizes in the cost of the excavation, but he saves considerable time, which is all important to-day in the construction of modern buildings. This is accomplished by Canavan Brothers Company through the combination of their two important departments, excavating and house shoring, both under the same management.

Architects and Contractors are well aware of this from their experience; hence, their care in selecting the excavators who do their work. The rapidity with which the excavations are done in these advanced days means skill, proper tools, machinery and a sufficient number of men on the job who are steady, experienced and reliable.

This is the secret of Canavan Brothers Company's success. Their motto is "Never procrastinate—do the work to-day," and their record as we look over it is one brilliant chain of successes. They have just completed an arduous undertaking in the excavations for the "Apthorp" Apartment House, for the Astors, at 78th and 79th Streets, Broadway and West End Avenue. This contract was completed in five months—quicker than the contractors expected, as it was thought to be a year's work. They also did the excavations for the Brunswick Building, in Madison Square and 26th Street, one-fifth of which was solid rock, but the entire work was performed in ten weeks. So we might enumerate indefinitely the excavations and shoring work accomplished by these indefatigable brothers, David P., John F. and Maurice J. Canavan, who have been engaged in this work for the past twenty-five years.

518 West 56th Street : : : NEW YORK CITY
Phone, 4500 Columbus

CHARLES H. DARMSTADT
Plumbing Contractor
229 West 116th Street

The following are but a few of the large plumbing contracts recently placed with us:

SPENCER ARMS, 79th Street and Broadway Completed
THE LORINGTON, 70th Street and Central Park West
THE NEW SINGER ANNEX, 149 Broadway In
HENDRIK HUDSON CO. BLDG., Riverside Drive, 110th and 111th Streets Course
PHIPPS' No. 1 MODEL TENEMENT, 31st Street, near 2d Avenue of
Office Building, S. W. corner 47th Street and 5th Avenue Construction
Section 4 (between 40th and 69th st., west of 6th av and Central Park.)—Assessment roll, 1906, $219,969,000; new buildings, $11,652,950; decrease, $249,500; net increase, $30,291,600; annual record, Jan. 8, 1907, $257,457,400.

Section 5 (between 40th and 69th st., east of 6th av and Central Park.)—Assessment roll, 1906, $174,165,440; new buildings, 178; increase improvements, $14,721,800; decrease, $2,396,000; net increase, $32,265,360; annual record, Jan. 8, 1907, $174,165,440.

Section 6 (north of 90th st. and east of Lenox av to and Harlem av—Vanderbilt.)—Assessment roll, 1906, $232,579,000; new buildings, 331; increase improvements, $18,834,500; decrease, $255,700; net increase, $26,585,300; annual record, Jan. 8, 1907, $232,579,000.

Section 7 (between 90th and 135th st. and west of Lenox av to 125th St. and River.)—Assessment roll, 1906, $161,917,211; new buildings, 331; increase improvements, $1,011,600; net increase, $8,870,200; annual record, Jan. 8, 1907, $242,573,160.

Section 8 (all that part of the borough north of 135th st.)—Assessment roll, 1906, $69,386,219; new buildings, 190; increase improvements, $1,752,500; decrease, $399,000; net increase, $8,501,400; annual record, Jan. 8, 1907, $75,347,720.

Real estate total assessment roll, 1906, $382,324,381; new buildings, 1,728; increase improvements, $96,277,300; decrease, $8,199,230; net increase, $343,451,011.

In each of the foregoing items, by subtracting the figures for increase improvements from the total valuation, you have the total decrease from voluntary valuation, or the voluntary valuation unimproved and not valued on property unimproved. In each of these last assessment was made, and from that the average per cent, of increase can be figured for each district.

Real Estate Advertising

By CHARLES W. HALLER

The natural way to begin to talk about advertising real estate is to consider advertising simply as salesmanship. If you employ a salesman you want him to be clean, neat, becomingly dressed, easy of manner and convincing of speech; you require him to be a shrewd judge of the state of mind of the man to whom he is to address. In the same way a man preparing to advertise a house or a property should be thoroughly versed in design, detail, and the knowledge of the kind of property which he is to sell. A moment's thought will show you that in the winter time when the weather is cold and damp it is not a good season to sell property. When your advertisement is to fill the reader with the desire to buy, and this cannot be done by filling the advertisement with your desire to sell. Of course, the more attractively written it is the better it will be, but after all, the most important thing is this: that the advertisement should make the people believe that your offerings are right and to the best advantage. A safe rule is to only use an illustration when it will say more in explanation of its subject than could be said by filling the same space with type. A judicious use of white space also draws attention to an advertisement and frequently produces a better effect than an illustration. Woodcuts are also effective in displaying an advertisement.

Good topsetting may make or mar an advertisement. The effects of the written matter may be entirely destroyed by a bad selection and arrangement of type. A well-balanced advertisement is a work of art requiring genius as well as skill, and there are many men who have spent the better part of a life-time mastering the possibilities of this art.

The benefit a business may derive from good advertising can scarcely be overestimated. Unfortunately all advertising is not good, and the danger is that the one who knows nothing of advertising may be an injury rather than a benefit. This again emphasizes the necessity of great care and judgment in the preparation of copy, the selection of mediums and the typographical appearance. Naturally as an advertising agent I believe that any advertiser is safer under the guidance of the right kind of an advertising agent than he can be alone; however experienced he may be. The advertising agent does not write the advertisement; he has records of hundreds of other people's experience, including their successes and failures. He can tell you without your paying for the experience what the result has been in similar cases. He can tell you the mistakes other people have made and how he can avoid them; he has people working for him who do nothing but study the best points to make in an advertisement. He has all the statistics in regard to all the publications; he knows the number and kind of readers on each that you can be allowed to reach, and their advertising is a part of the advantage of dealing with an advertising agent lies in the fact that his work for you is paid for by the publication, so that his interest is in getting the most amount of effect for the money. Advertisers are also effective in displaying an advertisement.

Changes in Topographical Map.

Rapid progress is being made in the mapping out of Queens Borough, and Engineer Robert Crowell states that he expects to have the entire remaining portion of Newtown completed and ready for adoption by the Board of Estimate by the middle of February. Work is being pushed rapidly also on that portion of the town of Jamaica extending south from Liberty av. and South Jamaica. The Honorable Nelson Lewis, of the Board of Estimate, has approved a map ready for adoption before the end of next summer.

To assist the developers in laying out their property in safety, advance work has been given out, such as are likely to be adopted by the city.

The plans as prepared under the advice of Chief Engineer Nelson Lewis, of the Board of Estimate, in all the levels slightly undulating sections of Queens that have thus far been adopted has been that of rectangular blocks with avenues running the longest way through the various sections from 50 to 200 ft. in width, and the cross streets 60 ft. in width. The other level sections in the town of Jamaica and Flushing will undoubtedly be laid out on the same plan, taking into consideration also the grades required for an average grade of 10 per cent. It is also intended that about 8 acres of Queens will in the main be occupied by families of moderate means who cannot afford to buy lots in expensive park residence sections.
P. A. GEOGHEGAN

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Highest References Furnished on Application

C. H. WALLAS
Housewrecker

I wish to call your attention to my work in pulling down the old buildings on the site of the Consolidated Stock Exchange, corner of Broad and Beaver Streets. These six 6-story buildings occupied an area 120 x 100 feet. I demolished them and removed everything, including dirt and rubbish, leaving the cellars broom clean, ready for the contractors, in 15 1/2 clear working days. The leading experts in wrecking estimated from 23 to 33 days. There were no accidents, no damages and no trouble from any source. I took possession November 8th and turned it over to the George A. Fuller Co. November 30th. Among the large contracts for razing which I have completed in record time and at the lowest possible cost are the Old Trinity Building, 111 Broadway; Boreel Building, Broadway, Cedar Street, Thames Street and Trinity Place; old Lord & Taylor Department Store, on Grand Street.

I give personal attention to the small contracts as well as to the large, and am always ready to furnish estimates promptly and reasonably. Am equipped to execute any work at a moment's notice and guarantee satisfaction.

C. H. WALLAS
255 West 148th Street NEW YORK CITY
Phone, 5607 Morningside
Single Hanger, Showing Door Open

"Double Gear" Device for Moving Two Doors in Opposite Directions at the Same Time

"Double Speed" Device for Moving Two Doors in the Same Direction. One at Double the Speed of the Other

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No. 1 Madison Avenue
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"Our Dumb Waiters Standard of the World for Over 50 Years"

We are now building Electric Dumb Waiters, Mechanical or Electrical Control, for Direct and Alternating Current

A Few Recent Installations of this nature

Geo. Jay Gould Residence ..... Lakewood, New Jersey
"Altman" Building ..... 34th Street and 5th Avenue, New York City
"Huyler's" ..... No. 1145 Broadway, New York City
"Chemical Bank" ..... No. 270 Broadway, New York City
"Martinique" Hotel ..... No. 56 West 33d Street, New York City
"Trinity" Building ..... No. 111 Broadway, New York City

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JAMES MURTAUGH COMPANY
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"The Arrow Can" is a neat heavily reinforced galvanized Ash and Garbage Can, which cannot be collapsed, broken or pulled apart. It is scientifically designed and constructed to give the greatest amount of strength at points of greatest strain, and will stand any amount of rough handling.

The side reinforcement of flutes, made in the body of the can itself, cannot be bent sideways or torn off, as in the case of wooden slats or metal pieces riveted to the outside of the can with small rivets. When emptying the can, two of the reinforcing flutes always rest on the side of the cart, taking the whole strain.

The entire can is made of sheet steel in its natural state, and is heavily galvanized inside and out after it is all assembled, which adds two gauges to the thickness of the metal and greatly strengthens the can. This is a very important feature, as it prevents rust and corrosion from eating out the bottom and is greatly superior to any form of japanning or painting.

Only the best malleable iron drop handles are used, with heavy clips. These cans are protected by patents. No can genuine without our registered trade marks and red label. The Arrow is also stamped in the bottom and cast on the handles.

For full details of construction write
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Telephone, 257 Madison Square 157 West 29th Street, NEW YORK
THE RECORD AND GUIDE is completing arrangements for a Complete Real Estate Information Service, which will cover every item of real estate news required for real estate transactions of any kind. The requirements of Brokers, Auctioneers, Owners, and others have been very carefully investigated, and the leading members of the real estate profession are unanimous in their opinion as to the need that exists for a really complete, prompt and accurate service.

The RECORD AND GUIDE will be glad to receive suggestions as to requirements from any of its readers. The purpose of the contemplated service is entirely professional, and is aimed to assist the working of Brokers' offices, perfect existing methods and reduce operating expenses.

If the information required affects real estate, the RECORD AND GUIDE hereafter by its new service will supply it.

Further details of plan and scope will be announced shortly.
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Myers Building, 47 & 49 Maiden Lane, Erected in seven months. Robt. T. Lyons, Architect.

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