CITY MUST RELIEVE ITSELF.

DECISION IN THE AMSTERDAM-AVE. RAILWAY CASE.

THE RAILROAD COMMISSIONERS REFUSE TO REOPEN THE MATTER, BUT SUGGEST A WAY OF COERCING THE COMPANIES.

Albany, Oct. 15.—The Board of Railroad Commissioners has denied the application of the Commissioner of Public Works of New-York City and citizens living in and near Amsterdam-ave. for a reopening and rehearing of the application of the Forty-second Street, Manhattanville and St. Nicholas Avenue Railway Company for approval of a change of motive power from horses to the underground system of electricity. On August 18 the Board granted the petition of this company to change its motive power, there being no objection made at the public hearings on the matter either by the municipality or by citizens. The Metropolitan Street Railway Company received similar permission on March 18 last. Each of the companies has for about twelve years operated its separate horsecar line, comprising four tracks, on this avenue and under distinct charters.

The Commissioner of Public Works says that the construction of the underground conduits for these two railway lines, parallel and close together, will offer great obstacles to the alteration or renewing of the six fifty-inch water mains which underlie the surface of the avenue; that he believes great danger to the city's water supply will result therefrom, and that the operation of four tracks by electricity, with rapidly moving cars, will imperil life and limb. The individual petitioners repeat all these allegations.

The Metropolitan Street Railway Company, under the permission of the Board and the authority of the Commissioner of Public Works, has advanced considerably in the work of its underground construction. The Commissioner of Public Works, however, has refused to grant a like permit to the Forty-second-st. company, which has a proceeding in court to compel him to give it that permission. The decision of the Board, after elaborately setting forth the above facts, says:

It will be seen that two questions are presented to the Board for decision: First, has it the power to reopen the hearing, with the consequent implication that it may withdraw its approval unless additional conditions are accepted by the companies? Second, if it has such power, should it be exercised? The Board answers the first in the negative; the second falls with the answer to the first; but in view of the peculiar situation presented the Board feels justified in discussing it.

After an inspection of the locality it appears to us that the maintenance of four tracks in Amsterdam-ave. is a burden on the thoroughfare, which, if it were an original proposition, should not be tolerated. The avenue is a broad one, but four tracks should never be laid upon it. There was nothing in the physical aspect which precluded both lines of horsecars using the same tracks; the Board believes that there is nothing in such situation which would preclude the use of but one double track by cars operated by underground electricity. It is to be regretted that the local authorities and the property-owners who consented to the building of the last set of tracks laid did not insist that if a franchise were granted for this portion of the street, the company applying for such franchise should use the existing tracks. It would be in the public interest, and commendable now, if the two companies involved in this matter should agree to use but one set of tracks. Indeed, common fairness, it seems to us, should lead individuals who, in the forms of corporate organizations, have received from their fellow-citizens valuable privileges which others do not possess, to conform, in matters of this kind, to the reasonable desire of such citizens. The wishes of the citizens living along and upon Amsterdam-ave. are certainly known, and when, as in this case, they can be complied with without undue hardship to either company it would seem the part of generosity, if not of prudence, to comply therewith.

The Board, however, cannot act in this matter, for Section 100 of the Railroad law limits us to the consideration of the kind of motive power to be used, and we have approved of the use of the underground current of electricity. The tracks of both companies, so far as the proof in this case shows and so far as the Board has been able to ascertain, are legally in Amsterdam-ave. If they are not the Corporation Counsel of the city of New-York, by action, can compel either or both to vacate. For the purpose of this proceeding they must be considered as legally there; it is not for this Board, but for the city of New-York, to attack their right to be there. If the Board can reopen an approval of this character it may well be asked, When does the power of the Board cease in that direction? If it can reopen now it can reopen at any time, even after the road is in operation under changed conditions. Indeed, were this application granted, the Board could, on some future day, review and reopen the later decision.

In the event of ultimate failure to obtain other relief, the municipal authorities have it in their power to absolutely regulate the operation of these two lines of railroad in a manner conducive to the public welfare. The speed of the cars can be absolutely controlled and kept down even to the horsecar rate of, say, four miles an hour, and all other features of the operation restrained within the bounds of safety.

To-day is the last day of registration. Register to-day and make sure of your vote!

A PHILOSOPHER FROM THE EAST.

HE IS HERE WITH A PURPOSE AND WITH A CURE FOR ALL ILLS.

Professor R. G. Norman, "F. T. S., president of the Royal Asiatic Academy of Oriental Philosophy, Burmah; superintendent of the Burmah Sanitarium, exponent of Oriental and scientific therapeutics" and several other things, who says he has journeyed all the way from India to cure Charles Broadway Rouss, the merchant, of blindness, delivered a short lecture last night at No. 316 East Fifteenth-st. Mr. Norman is a tall, slenderly built, fair-complexioned man, with a soft voice and an English accent. He talked last night to a gathering of about twenty men and women, a few of whom irreverently went to sleep before he got through. But this did not bother the professor. He first gave an idea of the Hindoo and Buddhist religions, comparing them with the religion of Christ. He said that the Buddhists and Hindoos worshipped only one God, and that the images which they bowed down to in their temples represented Him. He then referred to the miraculous cures practised by Jesus Christ, and declared that the professors and adepts of Oriental philosophy, of which he was one, had done the same things in India for thousands of years. He declared that he had gone to India when young, and with the belief that none but heathens lived there, but he had discovered that the scientists of the East were thousands of years ahead of their brother scientists in the Western world.

Then he passed around for inspection a small phial of silver tubes. He declared that the mere possession of this little phial would cure all the physical ills of the fortunate possessor and also insure him against all troubles. One old gentleman in the gathering was so fast asleep when the magic phial was being circulated that he missed a whack at it. Should he meet with serious trouble in the future he must not blame the "professor."

Mr. Norman mentioned the primary object of his visit to this country, and talked of his being able to cure Mr. Rouss with an assurance that was truly refreshing. The reporter asked a fat man sitting next to him if he thought that the professor would accept the $1,000,000 offered by Mr. Rouss to anybody who succeeded in restoring to him his sight. The fat man retired into deep thought for a moment or two, and then solemnly said that he thought he would.

The professor closed his lecture by saying that while here he would establish a class in the study of Oriental science. He declared that he had not intended to stay in this country for any length of time, but that he could not withstand the supplications of the people who wanted him to form the class. He added that there were a number of other Oriental philosophers coming over on the next steamer. So, if he has to leave the country soon, the people of the United States will still have an opportunity to imbibe more of the wisdom of the Orient.

HORSES BURNED IN A STABLE FIRE.

A serious fire occurred early yesterday morning in the two-story brick building at No. 547 West Forty-third-st., occupied by John S. McNeeley, dealer in kindlink wood, and Rice & Jones, glass manufacturers. About $20,000 damage was done, and in a stable adjoining several horses were burned to death.

Apasser-by called Roundsman Kelly's attention at about 3 a. m. to smoke coming from the building. The roundsman turned in an alarm, and went to wake a watchman who he knew slept in a frame house adjoining. He was unable to wake the man, and when the engines arrived one of the firemen crawled through a window and found him overcome by the smoke. The man was let down through the window, and after a time recovered.

The fire spread so rapidly that it was impossible to get all the horses out before the flames reached the stable and several were burned.

It was not until the buildings were wrecked that the fire was got under control.

RETURN OF THE ST. MARY'S.

The schoolship St. Mary's, which has been on a cruise in foreign waters, arrived here yesterday with her ninety young tars all hale and hearty. She left New-London June 30, visiting such ports as Fayal, Lisbon, Tangier and Gibraltar, stopping in each one for a week or so. The boys enjoyed the sights to their hearts' content. The cruise was without incident, except that on the return trip, when off Hatteras, the ship ran into a storm and had to lay to for twelve hours. Thirty-seven of the returned youngsters have received graduate diplomas.

WORLD'S W. C. T. U. CONVENTION.

PROGRAMME OF THE COMING GREAT ASSEMBLY IN TORONTO.

Toropto, Oct. 15.—The World's Woman's Christian Temperance Union Convention is expected to be a notable affair. It is not often that a convention is either important or large enough to hold four such meetings as those that are to be conducted in Massey Hall. At these meetings the work of this society will be presented almost as a panorama.

On Saturday, October 23, five superintendents from among the forty or more departments will give reports—Mrs. Mary H. Hunt, Mrs. Wilbur Crafts, Mrs. Hannah J. Bailey, Miss Anna Gordon and Mrs. Frances J. Barnes. The lines drawn by these women will suggest the relation of the Woman's Christian Temperance Union to all social reforms.

The worldwide scope of the society will be indicated by the introduction of the presidents of the different National Woman's Christian Temperance Unions. The introduction of fraternal delegates from kindred societies and distinguished visitors will show the spirit of love and mutual helpfulness that pervades every endeavor of these women of the Christian Temperance Union.

On Saturday evening Miss Willard will preside at a popular platform meeting. Miss Krikorian, Armenia; Mrs. Lisle, England; Mrs. Hoffman, recording secretary United States Woman's Christian Temperance Union; Mrs. Kirk, Australia; Mrs. Thornley, president Ontario Woman's Christian Temperance Union, and others will speak.

On Monday evening the school children of Toronto will give a great demonstration to show the worldwide influence of the Woman's Christian Temperance Union. This will be under the patronage of the Toronto School Board. The singing of the Toronto school children has a wide reputation. Under Mr. Cringan they have attained an excellence that has brought their work to the notice of all those who are studying the problem of teaching music in the public schools. Mr. Cringan will be conductor of one thousand voices, which will give patriotic and temperance selections. Miss Willard has composed one song specially for the occasion, and it has been set to music by Mr. Cringan, who has also arranged music for the Woman's Christian Temperance Union welcome song. So many have been the requests for the repetition of the song, "Queen Victoria's Jubilee," that it has been added to the programme. Miss Eliza Wills, a prominent member of the Toronto Young Woman's Christian Temperance Union, wrote the words for this song.

Three flag drills will be given, the first representing the British nation, the second the United States, the third the foreign nations. In this connection three temperance speeches will be made by children. The band of the Royal Grenadiers will accompany the children and render patriotic selections.

On Tuesday evening there will be a White Ribbon love feast, such as was a notable feature of the convention in London in 1895. It is expected that more than one hundred speeches will be given, for no one is to speak more than one minute.

The purpose of the biennial meeting of the "world's united womanhood" is, primarily, to gather the loose ends in the weaving of the new social fibre, and perhaps meet to plan for new methods and workers. It is in the day sessions that these details are dealt with. These meetings will be held in the pavilion, free to all. Miss Willard will preside.

On Saturday morning, the 23d, at 10 o'clock, Miss Willard will call the convention to order. After the roll-call of official members, the appointment of committees and the report of the Executive Committee, Miss Willard will deliver the address.

On Monday morning the work will be resumed, and reports will be given on medal contest work by Mrs. Jennings Demorest, on humane education by Mrs. Lovell, on schools of methods by Mrs. Pearsall Smith, and on Florence Crittenton missions by Mrs. Charlton Edholm. At 11 o'clock a memorial service will be conducted by Miss Willard. After this Miss Agnes Weston, whose name has been associated with work among sailors, will give a report of her work, as also will Mrs. J. R. Barney, Miss Elizabeth Greenwood and Mrs. J. J. Fowler Willing, evangelists of the World's Woman's Christian Temperance Union.

In the afternoon the question of food reform will be presented by Miss Yates, an anti-opium report by Miss Jessie Ackerman, one of the round-the-world missionaries; on franchise by Miss Eva McLaren. The superintendents of the flower mission, amusements, press and labor departments will also give reports.

On Tuesday morning the report of the Committee on Resolutions will be given. This is always interesting because it shows the aims of the society that presents it. The programme of that morning is crowded with reports that it would not do to miss. Miss Elizabeth Greenwood will give the experience of her recent trip to Honolulu; Mrs. Mary H. Hunt will report on the Non-Alcoholic Congress recently held at Brussels. Mrs. Stoddart will speak of the work in Mexico. Domestic science will be represented by Mrs. Marion McBride. Miss Eva Booth will speak for the Salvation Army.

The election of officers will take place in the afternoon. It is followed by a general discussion open to all the members of the convention on the subject: "How Can We Best Advance the White Ribbon Cause in All Nations?"

The Dominion Woman's Christian Temperance Union will be in convention previous to the world's gathering, from October 20 to 22. The day sessions will be held in the pavilion, Horticultural Gardens, Thursday evening, October 21. Miss Florence E. Willard will address the convention in Massey Music Hall under the auspices of the Dominion Union.

A notable feature of these conventions is the purity conferences which are to be conducted by Dr. Mary Wood-Allen—one on Wednesday, the 20th, when addresses will be delivered by Mrs. Ada Marion Hughes, of Toronto; Dr. Youmans, of Winnipeg; Miss Rose Wood Allen, of Ann Arbor; Mrs. Charlton Edholm, and the Rev. C. A. Eaton, of Toronto. The second conference will be held October 27, and will meet in Jarvis Street Baptist Church, for women only. In the evening there will be a public meeting.

TELEGRAPHIC NOTES.

Des Moines, Iowa, Oct. 15.—The Supreme Court decided to-day that certificates in fraternal insurance orders like the Ancient Order of United Workmen cannot be assigned.

Vancouver, B. C., Oct. 15.—A jury has awarded Mrs. Lang $20,000 damages against the city of Victoria for the death of her husband, Dr. Lang, in the Point Ellice bridge disaster in May, 1896.

San Francisco, Oct. 14.—The jury in the case of O. A. Welburn, ex-Collector of Internal Revenue, charged with embezzlement, returned a verdict of not guilty last night.

Santa Fe, N. M., Oct. 15.—Another remarkable shipment of turquoise has been sent East from this city by the Wells Fargo Express. It consisted of five cut stones, the weight of which respectively is seventy-three, fifty, thirty, twenty-three and twenty-two karats, the combined value of which is $8,200. These gems came from Southern New-Mexico, but the location of the mines is a carefully guarded secret.

San Francisco, Oct. 15.—There are 1,500 prospectors in the new Ruth Creek mining district in the northern part of the State of Washington, a few miles from the foot of Mount Baker. H. B. Cornwall, of this city, is in receipt of letters and samples of ore to bear out this statement. It is stated that gold-bearing quartz ledges of considerable extent have been found on Ruth Creek.

Nogales, Ariz., Oct. 15.—A sensation has been sprung in the adjacent State of Sonora, Mexico, by an ecclesiastical edict from Archbishop Lopez, the seat of whose archiepiscopal see is at the city of Hermosillo, the capital of the State, excommunicating all members of the Masonic fraternity. Nearly all of the highest officials in the State and many of the leading citizens are Masons.

Mokelumne, Cal., Oct. 15.—Charles Harris, a pioneer gold miner, has been arrested, charged with having fired the twenty-stamp mill and hoisting of the Moser and Roanoke Mine, which were burned Sunday afternoon, destroying $25,000 worth of machinery. Harris is a brother of the general superintendent of this and the Foote and Thompson Mine. He was employed as watchman on the premises.

Little Rock, Ark., Oct. 15.—As the result of the racial trouble which began in Cleveland County on August 23, when a riot occurred at a negro picnic near Kendall, in which several white men were killed, "Tom" Parker was lynched last night near Kendall. This makes the third negro to meet a violent death as the result of the picnic riot.

Guthrie, Okla., Oct. 15.—Thirteen-year-old John Matthews was arrested to-day, charged with murdering the five-year-old son of Captain L. L. Bridges, a well-known attorney, formerly of Sedalia, Mo. The boys quarrelled yesterday, and this morning the Bridges boy was found dead in front of his father's house, with a bullet wound in his head. The bullet came from across the street, apparently from the Matthews house, where a recently fired rifle was found.

PREHISTORIC RELICS IN MICHIGAN.

From The Grand Rapids Herald.

A party of persons, mostly from Edmore and Wyman, Mich., recently opened a large mound, three miles northwest of Wyman. There were two large mounds built up in pyramid shape. The south mound was opened in July and August. It contained three human skeletons, all about seven feet in length, but they were beyond preservation. Just over the middle skeleton was found, by J. O. Scotford and J. H. Murr, of Wyman, one small urn, an ancient lamp and a vase. Just at the right of the north skeleton was a pipe and a drinking-cup and a queer stone implement. At the feet of the south skeleton was a large battle-axe. The battle-axe was about thirteen inches long, with an inch face or blade, and weighed seven and three-quarter pounds. There were some other relics, a large battle-spear, seven inches long and four inches wide. All are as perfect as when first made. The stone implements are some kind of flinty slate, and have a steel sound. Two pipes were in the same mound, and both showed long usage.

The north mound was opened by J. O. Scotford on Sunday, September 5. There were fifty-three persons present to witness the find. The mound was crowned by four large pine stumps. After digging in the south portion about two hours, J. O. Scotford discovered a layer of black soil and charcoal, mixed with fragments of broken pottery. He said there were relics of some kind close by. As he neared the stump he seemed to be more anxious. He soon found under the roots of the stump a small box, or casket, which was bedded in the soil so firmly that he was obliged to use his pocketknife to loosen it. It had a very fine lid, beautifully ornamented with stamp work. On opening the casket he found a small cup with a lid, the cup containing five pieces of copper coin of some origin, three small ones and two large ones. The hieroglyphics on the coins were quite plain. The characters were not badly eaten out with the corroding on one side, but were nearly gone on the other side. Around the cup in the casket were pieces of stone tools and tyne, which fitted the letters in the casket and tablets exactly.

The relics alone are proof that a population of a partially civilized nation inhabited this country centuries before its discovery by Columbus, and a people differing entirely from the present Indians. The caskets, tablets, pipes and husbandry are all made of clay and burned very hard.

AUTONOMY NOT ENOUGH.

NOTHING SHORT OF INDEPENDENCE, SAYS A LEADING CUBAN.

London, Oct. 15.—Colonel Jose Zayas, who says he is accredited by the Palma Cuban Junta, of New-York, as Minister Plenipotentiary to Great Britain from the Cuban Republic, in an interview is quoted as expressing the belief that the war in Cuba will not last another year. Spain, he adds, cannot finance the campaign, and should have accepted the insurgents' offer of $150,000,000 under the guarantee of the United States.

Colonel Zayas does not anticipate assistance from the United States, asserting that all the Cubans desire is fair play and the recognition of belligerent rights, so that they can secure the necessary supplies for their troops. In conclusion, the Cuban Minister is quoted as saying:

"There is no truth whatever in the opinion expressed in England that the Cubans desire annexation to the United States. We are fighting for independence and do not hanker after annexation, which will not be the outcome of the struggle. There is not the least likelihood of the Cubans accepting autonomy. 'Independence or death' is our motto."

Madrid, Oct. 15.—Señor Gimerga, a prominent leader of the Cuban Autonomists, has arrived here incognito, and has had a conference with the Minister for the Colonies, Señor Moret, at which the former recommended candidates for posts under the proposed Cuban reform administration. Among the names suggested by Señor Gimerga for an appointment was that of Señor Bruson, a distinguished lawyer of Havana.

THE STORMING OF LAS TUNAS.

DESCRIPTION OF THE GALLANT ATTACK AND BRAVE DEFENCE OF THE CUBAN TOWN.

Kansas City, Mo., Oct. 15.—A letter has been received from "Fred" Funston, son of ex-Congressman Funston, of Kansas, a lieutenant-colonel in the Cuban Army, giving a graphic description of the capture of Las Tunas, in which he took a conspicuous part. Colonel Funston writes:

"We have just won the biggest victory of this revolution by capturing the city of Las Tunas, with its twenty-one forts, with its entire garrison and armament. The fight lasted three days and two nights and was a fearfully bloody affair. On the night of the 27th we threw up entrenchments on the north side of the town, the nearest fort being four hundred yards distant, and placed therein four breech-loading field guns and a Sim-Dudley pneumatic dynamite gun. The pneumatic dynamite gun did wonders, wrecking the cavalry headquarters in two shots and blowing the top off Fort Concepcion.

"At 10 a. m. on the 28th Lieutenant-Colonel Calixto Enamorodo, with a few men, carried the latter work by assault, losing one-third of his men by the fire of adjoining forts. At 12 o'clock took place the grand feature of the siege. Chief of Staff Menocal ordered the bugle to sound the charge. Hardly had the notes died away before Enamarodo, with two hundred men, left the shelter of the hill crest and started for the fort. Many men fell, but on they pushed, until checked by a tangle of barbed-wire fence, where, in the open, they held their position, firing at the Spanish in the trenches of the fort, until Lieutenant-Colonel Carlos Garcia, son of the General, led up a hundred and fifty men to his support. Then there was a wild rush for the fort. Men cut the barbed wire with their machetes, and Lieutenant-Colonel Garcia, with the Cuban flag in one hand and sword in the other, leaped the moat, the men following. It was like the battles of the story-books, and it was worth years of humdrum life to see it. All was over in a moment, and when the hated red and yellow flag gave way to the Cuban banner we were in intrenchments only four hundred yards away, cheering ourselves hoarse. All the rest of the fearfully hot day we pitched shells at the Spanish forts and dodged those sent at us.

"The morning of the 30th saw the end at hand. After an hour's bombardment the flag of truce was sent from the infantry citadel, and, the plucky commander having been killed, his men surrendered, and the fight was over, but at a fearful cost, one-third of the Cubans having fallen. The Spaniards had fought as heroes, losing 40 per cent of their garrison in the defence. We captured twenty-one forts, 1,000 rifles with 1,000,000 rounds of ammunition and two Krupp cannon."

COMPETITOR CASE TAKEN UP AGAIN.

ACTION BY THE SPANISH CABINET—STORY OF THE IMPRISONED FILIBUSTERS.

Madrid, Oct. 15.—The Spanish Cabinet to-day discussed the case of the American schooner Competitor, which was captured in Cuban waters on April 23, 1896, a case which, owing to the fear which Premier Canovas del Castillo had of stirring up action upon the part of the Congress of the United States, was postponed by the late Government. The Cabinet to-day ordered the Ministers of Foreign Affairs, the Navy and the Colonies to examine the documents in the case, with a view of its eventual settlement by the courts.

The American schooner Competitor, of fifty tons burden, was a fast boat belonging in Key West, where she was engaged in the sponge business. On April 20, 1896, the Competitor left Key West and is said to have shipped a filibustering expedition a day or two later. After some clever dodging she made Cape Sable, where she is reported to have taken on board General Monzon, of the Cuban Army, and the remaining members of his party. Captain Alfredo Laborde, who was in command of the Competitor, has always claimed that the Cubans took possession of his vessel by force, and so succeeded in shipping the arms, ammunition and filibusters on board his vessel. In any case the Competitor was captured by the Spanish gunboat Mensajera on April 26, and although the filibusters seemed to have succeeded in landing their expedition and its supplies, five men were made prisoners by the war vessel and were tried by court-martial at Havana on May 8, 1896. They were Captain Alfredo Laborde, said to be the leader of the expedition; Dr. Elias Bedia, William Gildea, said to be a British subject; John Melton, a native of Kansas, and Teodoro Mata.

Laborde and Bedia are said to be naturalized American citizens, but their claims have been disputed. Melton, however, is beyond doubt an American. The prisoners are said to have been badly treated in jail, and would have fared much worse had it not been for the efforts of the United States Consular authorities in Havana.

Repeated efforts have been made to have judgment pronounced by the courts in the case of the Competitor prisoners, but, although the matter has frequently been aired, no final judgment has been pronounced by the court-martial or by the courts.

TWO CUBAN WOMEN ARRESTED.

CHARGED WITH CONSPIRING AGAINST THE GOVERNMENT OF SPAIN.

Havana, Oct. 15.—The police of Guines, this province, have arrested and imprisoned Señorita Blanca Ortega, a young woman of distinguished family, and Señorita Virginia Castellanos. They are both charged with conspiring against the Government.

MR. RHODES NARROWLY ESCAPES DEATH.

LOST HIS WAY AND FELL INTO THE HANDS OF HOSTILE NATIVES.

London, Oct. 16.—"The Daily Graphic" says this morning that it hears that the recent reported illness of Cecil Rhodes, former Premier of Cape Colony, at Inyanga, was due to shock from injuries received at the hands of hostile natives beyond Salisbury. It appears that Mr. Rhodes lost his way and had a very narrow escape from death.

ENTERTAINED BY THE QUEEN.

London, Oct. 15.—Henry White, Secretary of the United States Embassy, and Mrs. White dined today with the Queen at Balmoral Castle.

RUSSIA'S GREAT PORT IN THE EAST.

Vladivostock, Oct. 15.—The foundation stone of what is intended to be the great commercial port of Russia in this part of the world was laid today with considerable ceremony.

CANADIAN LOAN OVERSUBSCRIBED.

London, Oct. 15.—The subscriptions to the loan of the Government of the Dominion of Canada, invited by the Bank of Montreal, amounting to £2,000,000 in 2½ per cent inscribed stock, at not less than 91, have been closed and aggregated £4,205,460, at an average of £91 10s 5d.

Some tenders for the Canadian loan were at £96, but 42 per cent of the loan was allotted at £91 2s.

CYCLONIC DISTURBANCE IN CUBA.

Havana, Oct. 15.—There was a cyclonic disturbance over the southern part of Cuba to-day. The barometer fell considerably, and the wind attained great velocity.

ARTIFICIAL DIAMONDS.

RECENT EXPERIMENTS IN PRODUCING WITH THE AID OF ELECTRICITY.

Hudson Maxim in The Pall Mall Gazette.

I began the investigation of the subject of artificial diamonds in connection with work on calcium carbide and acetylene in America in 1894. I devised several forms of apparatus and processes, for which I applied for patents in the United States. Moissan had shown that artificial diamonds could be produced, although microscopic in size, by saturating a molten metal, such as iron or silver, with carbon, and then cooling a globule of the same with great rapidity, whereby a cooled exterior portion of the metal was caused to shrink strongly upon a hot interior portion, thereby causing the interior portion to be cooled under considerable pressure. By dissolving away the metal, Moissan had found that a portion of the carbon held by the molten metal in solution or in combination at a high temperature would, upon cooling under great pressure, separate from the metal in the form of small carbon crystals or diamonds, instead of graphite, as in gray castiron.

Now, it is well known that the factor of time plays a very important part in crystalline formations, much larger crystals being produced when allowed to form slowly than when formed with rapidity. To secure this end I devised an apparatus or electric furnace, within which the metal, in the presence of carbon, could be fused and raised to an exceedingly high temperature by an electric current in order that the maximum of carbon might be absorbed or taken up by the metal, the device being provided with means for subjecting the molten metal to an exceedingly high pressure, either by hydraulics or other suitable means. By this method a pressure very many times as great as attained by Moissan could be applied to the molten metal, and any desired length of time permitted to elapse in order to secure the maximum size of crystals. By Moissan's method but a comparatively light pressure could be exerted at best, limited by the tensile strength of a thin layer of castiron, while by my method 50,000 to 100,000 pounds to the square inch could, if requisite, be applied. Another method devised by me was to pass a current of sufficient quantity through a small body, rod or filament of carbon in a confined space, to cause its fusion, and then subject the same to great pressure, and allow to cool slowly.

DIAMONDS OF ELECTRO-DEPOSITION.

The method for the production of artificial diamonds which I have always considered the most promising is by electrical deposition, for by this means I am of the opinion that diamonds of much larger size may be produced and at a lower expense than by any other method. I filed two applications for patents in the United States in 1895 for processes and apparatus for the production of diamonds by electro-deposition, but it was not until September a year ago that I had an opportunity to test my inventions for the production of diamonds in this manner and to verify my theories. Now, it is well known that if an electric current be passed through a carbon filament immersed in an atmosphere of hydro-carbon, a portion of the hydro-carbon is decomposed and electrically deposited upon the filament, the most rapid deposition taking place at the points offering greatest electrical resistance—in other words, in the hottest portions of the filament, this fact being taken advantage of to secure uniformity of electrical resistance in electric lamp filaments. Now, I have predicted that if a carbon rod, immersed in a hydro-carbon atmosphere, should be maintained at a very high incandescence by an electric current for a considerable time, the electro-deposition would assume crystalline form. While conducting some experiments at Faraday House, Charing Cross Road, London, extending over a period of three months, beginning early in August a year ago, I had an opportunity of conducting on a considerable scale a large number of experiments with 100 available electrical horse-power. The experiments related to the investigation of various methods for the production of calcium carbide and other carbides by the electric arc, by incandescence and by electrically superheated gases, and also to the effect of the electric current upon various gases.

In connection with this work I conducted some experiments to determine the possibility and practicability of producing diamonds by electro-deposition. The results of these experiments I have, until now, kept secret, for the reason that publication prevents valid patents being taken in most countries, but since Dr. Borchers has published some experiments conducted by him, by which similar results were attained, I have determined to protect myself by patents in England and America only, and to publish an account of what I have accomplished and what I expect to accomplish in the production of artificial diamonds and the means employed and intended to be employed. The apparatus employed by me in my experiments for the production of diamonds by electro-deposition was constructed as follows: A large graphite crucible, about a foot in diameter, and twenty inches high, with a large hole cut through the bottom, to admit the passage of a four-inch carbon electrode, was inverted upon a heavy carbon bedplate. Inside of the large graphite crucible was placed a small gas carbon crucible, about four inches in diameter and six inches high, having its bottom cut away; the space intermediate of the small and large crucible was filled with finely broken charcoal. A carbon rod, about five-eighths of an inch in diameter, was interposed between the large vertical electrode and the carbon bedplate, in such wise as to pass through the centre of the small crucible without touching it, and make contact with the vertically disposed electrode and the bedplate. The large vertical electrode was carefully insulated from the graphite crucible, and the graphite crucible again insulated from the carbon bedplate. The graphite crucible was also carefully wrapped upon the outside with a covering of asbestos about half an inch thick. An alternating current of fifty volts, and varying in quantity from eight hundred to fifteen hundred amperes, was passed through the five-eighths inch carbon rod. Through a perforation made in the bottom of the carbon plate a strong blast of carbon vapor was emitted as soon as the furnace got heated up, and continued during the whole time the current remained on.

At the end of about two hours the current was turned off and the furnace allowed to cool down, when it was taken to pieces. The whole surface of the carbon rod was found to be covered with a brilliant crystalline formation, the crystals varying in size from a pin point to a large pin's head. The crystals were pyramidal in form, and upon examination under a microscope they were found to consist of a thin transparent casing with an interior and base portion of graphite. The crystals were found to cut glass with the greatest ease. Under the oxy-hydrogen blowpipe the crystals were wholly consumed, which seemed to show that they were not composed of any form of carbide or metallic salt. The charcoal in the furnace was nearly all volatilized, and at the top of the furnace was found a considerable quantity of a light, hairy substance, the fibres being quite strong and resembling asbestos, but capable of resisting a temperature far above the fusion point of asbestos. This was probably formed from impurities or ash volatilized from the charcoal. This may serve as a suggestion for the production of a fibrous material which will stand a much higher temperature than asbestos. The next experiment was conducted in the following manner: The same form of furnace was employed as that above described, except that no charcoal was used, the furnace being entirely empty. Simultaneously with the passage of the electric current through the furnace, a current of illuminating gas from the street main was passed through the graphite crucible into the furnace and out at the bottom. At the end of about two hours the electric current was turned off, the furnace allowed to cool, when it was taken apart as before. There was found upon the carbon rod the same crystalline formation as in the first instance, and which appeared under examination to be of the same character as that first formed. Unfortunately, I was unable to continue my investigations, owing to the fluctuations in the current occasioned by my work causing trouble with the electric-light supply in the neighborhood, so that the experiments had to be stopped. Owing to the heating of the leads, which were inadequate for the work, and to the violent boiling of the water in a hogshead employed as a resistance, it was impossible to keep the current on for more than two hours at a time. Had I been able to continue the current as long as I would have liked, it is possible that more results would have been attained.

I am expecting soon to take up the work again, and it is my intention not only to continue the experiments under atmospheric pressure, but to surround the carbon rod or filament during the passage of the electric current with an atmosphere of hydro-carbon and carbon vapor, under an exceedingly high pressure, say 40,000 to 50,000 pounds to the square inch. Of course, commercial diamonds may be produced without high pressure, but, reasoning from analogy, the fact that pressure has been shown to assist in the formation of crystalline carbon, it appears to me likely that high pressure will be of very material advantage. This pressure may be applied by the volatilization of hydro-carbon matter in the furnace, or by forcing into the furnace a hydro-carbon gas under suitable pressure. In regard to the form of furnace that would be employed for working under high pressure, a strong steel cylinder made from a section of an old gun would be suitable. A study of the breech mechanism of a cannon may offer some suggestion for closing a port to the furnace. The interior of the furnace must be lined with magnesite, or other refractory substance and non-conductor of heat. The high pressure electric furnace, in addition to its application to the production of diamonds, will probably be found to serve a useful purpose in the production of rare carbides, or carbides of metals which, under atmospheric pressure, become volatilized before reaching a temperature sufficiently high to react with carbon.

RUSHING WORK ON THE BRIDGE.

PRESIDENT ROSSITER OF THE BROOKLYN HEIGHTS ROAD SAYS CARS WILL CROSS THE SPAN BEFORE DECEMBER 1.

President Rossiter's surface railroad employes renewed their work of laying rails on the Brooklyn Bridge north roadway last night, after the heavy traffic of the day was over, and by midnight were well on to the end of the paved roadway and close to the Brooklyn shore span. They made a big advance on Thursday night, and a reduced force kept up work during yesterday. Much of the paving torn up at night has to be replaced in the morning, so that traffic may not be interfered with. At 9 o'clock yesterday forenoon the engineer's car, Ampere, No. 39, with President Rossiter, Bridge President Berri, Judge W. W. Goodrich, Treasurer D. W. McWilliams of the Manhattan Elevated Company, Director David Valentine, Secretary and Treasurer T. S. Williams, Superintendent Ira McCormack, all of the Brooklyn Heights Railroad; Superintendent C. C. Martin of the Bridge, President Sullivan of the Coney Island and Brooklyn Railroad, President Albert Johnson of the Nassau Electric Company, and President Heins of the Brooklyn City and Newtown Railroad Company, on board, ran slowly out on to the roadway for 400 or 500 feet. Mr. Brackenridge, the engineer in charge of the changes, received many compliments on the progress of the work.

President Rossiter said that trolley-cars would be running over the Bridge before December 1. He said the work on the New-York approaches would be begun by October 25, and he thought it would take about four weeks to complete the work.

THEIR CRIMES TOLD BY A WOMAN.

ARREST OF A GANG OF MAIL-BOX ROBBERS HERE AND IN BOSTON.

Boston, Oct. 15.—Chief Inspector Watts and Postoffice Inspectors White and O'Brien are investigating the careers of Mrs. Agnes Barnum, alias Mrs. Frank Atwood, and W. H. Matthews, who were arrested last night charged with postoffice box robberies. Mrs. Atwood's statements reveal the fact that an organized gang of postoffice robbers has been working in several of the principal cities of the country. It was learned to-day that Matthews was formerly an inmate of Sing Sing, he having spent seven years there for forgery. The United States Court this forenoon issued warrants charging Matthews with robbing mail boxes and Mrs. Atwood with receiving property known to have been stolen. It is expected two arrests will be made in New-York in connection with the robberies.

Mrs. Atwood says that her husband, herself and three children arrived here from New-York about three months ago and lived awhile at No. 83 Chandler-st., South End. While there Matthews and his wife arrived from New-York and lived with them. On September 23 Atwood was sentenced in the United States Court to five years in the State Prison for robbing mail boxes. Mrs. Atwood the same day went to the Metropolitan National Bank with a check for $222 30, payable to W. F. Kimball and signed "W. S. Gildden & Company," which she says Matthews gave her. She says she signed the name "Agnes Kimball" on the check, and represented herself as Mr. Kimball's sister. The identification was not complete, however, and she could not get the money.

Mrs. Atwood also stated that in Chelsea they found a man named Parsons, who has since gone to New-York, who gave them a check on the Winnissimet National Bank, payable to Ernest E. Parsons and signed by Symonds & Poor. The check had been raised from $14 to $400 by means of adds. The money was received and paid over to Matthews. This check and several others were stolen from a postoffice box at Eastern and Atlantic aves. Three checks were also stolen from letters in a box in Essex-st.

Two of the gang, supposed to be Matthews and Parsons, later visited Edward Poole, dealer in diamonds and jewelry at No. 53 State-st., with a letter of introduction from a friend of Mr. Poole. They asked him to cash three checks aggregating $712. Mr. Poole, after showing the checks to a banker, who said they were genuine, cashed them, less $75 paid for jewelry, which Matthews was wearing when arrested. A letter was found on Matthews telling of similar robberies in the West.

Robert Russell, thirty-seven years old, living at Thirty-eighth-st. and Third-ave., and John F. Ogle, thirty-eight years old, an alleged veterinary surgeon, living at No. 1,584 Broadway, were arrested by the police of the Central Office last night and locked up in Police Headquarters, in connection with the arrest in Boston on Thursday of two letter-box thieves. The prisoners in Boston are "Billy" Morgan, alias Hamilton, alias Matthews, and a woman known as Mrs. Atwood. In a letter found on the prisoner Morgan, in Boston, which had been written by Ogle, there was evidence which led the police there to believe that the writer and Russell, whose name was mentioned, were connected with the gang. Inspector O'Brien of the Boston police arrived here yesterday with the letter, and both Ogle and Russell were arrested. In Russell's possession was found a letter-box key.

This gang, the police say, has been working systematically for years at their business of robbing mail-boxes and passing checks which they found in rifled letters. The gang swindled the firm of Hackett, Carhart & Co. out of nearly $600 by means of one of these stolen checks, the certification of which they forged. The prisoners or other members of the gang have operated in every part of this country and in Europe. Ogle's father was a well-known veterinary surgeon in this city. One of his brothers, George, is in Sing Sing for life for the murder of a man named Brown, at a ball of the Linwood Club at the Grand Opera House in 1882, and another brother, William, is in a Memphis prison. The prisoners will be turned over to the United States authorities and taken to Boston for trial.

This is registration day in the Greater New-York. If you want a voice in the election of its first Mayor get your name on the books. This is the last chance.

THE PEDIGREE OF DOGS.

From Knowledge.

When suitably matched, there is no sort of difficulty in obtaining crosses between wolves and jackals and domesticated dogs, and it is a well-known fact that the Esquimaus are constantly in the habit of crossing their sledge dogs with wolves in order to impart strength and stamina to the breed. Indeed, Esquimau dogs are so closely related to wolves that there can be no question that they are descended from them. Mr. Bartlett remarking that they are undo