

## BRAINY YOUNG MAN.

Marconi, the Inventor of Telegraphing Without Wires.

Will Visit the United States Very Soon  
—Success of a New Hot Air Treatment for Acute Rheumatism.

(Special Correspondence.)

Now that it is known that the young Italian electrician, Sig. Guglielmo Marconi, is to be a visitor in this country considerable interest is being shown in regard to his personal history. Although now so thoroughly identified with his work in connection with the development of wireless telegraphy, he received very little attention from the public, even after having proved the practicability of transmitting messages without wires, until about two years ago, when, becoming a resident of England, his mother's birthplace, he found himself associated with other workers along his lines in that country. He was born in Bologna about 26 years ago and has, since his extreme youth, been much interested in various experiments and inventions.

The unsatisfactory results attained by those attempting to signal without wires caused his earnest endeavors to turn in that direction, and having demonstrated the possibility of utilizing the Hertzian waves for that purpose, he left Italy and found financial and scientific backers in England. There he

hospital, of Chicago. About a year ago Warden Graham and Dr. Thoren, of that institution, were in New York, and there saw a hot-air machine invented by Mr. A. V. M. Sprague, of that city, whose wife was a sufferer from rheumatism. It had been found to work satisfactorily, and Mr. Sprague offered to present his visitors with a similar machine. By means of this apparatus a person may be exposed to a temperature of 400 degrees, or nearly twice as hot as boiling water, without serious inconvenience, because the hot air is rendered entirely free from moisture. Four hundred degrees of heat will melt several kinds of metals. If one drop of moisture were to gain entrance and be diffused over the body of an occupant, the whole skin would be scalded and the patient would die. Perspiration is burned up before it can spread over the body.

The Sprague machine is a double cylinder, the inside of copper, the outside of steel. An asbestos blanket is between the two. Through the inner lining, which is pierced with holes, the heat penetrates like a shower bath. Tiny jets strike the body simultaneously, but with far different results than from an unbroken blast. An arrangement between the two cylinders extracts moisture from the inner atmosphere and it passes off through two escape pipes at the top.

Several gas burners underneath the outside plate furnish heat. Strips of cork, an inch and a half thick, line the inside of the cylinders. Patients are placed inside the machine on a mattress of asbestos and magnesia, the head being left outside. While the temperature of this machine may be raised

## TRICKS OF HACKMEN.

Many of Washington's Cabbies Need Constant Watching.

When Arrested for Any Offense and Brought Before a Judge They Resort to Old Weller's Dodge and Prove an Aulb.

(Special Washington Letter.)

"The hackmen of the national capital are a hard lot, and many of them are criminals," says an old policeman. "The hackmen have recently formed an association, and have been granted a charter for a lodge by the Federation of Labor; but I don't see what they need a lodge for; surely they do not need protection. On the contrary, the general public needs protection from the hackmen."

"One good thing for the public is a recent court decision authorizing policemen to arrest hackmen for soliciting trade. Heretofore they have been permitted to drive onto people, and almost over them, in demanding patronage. The court has decided that such soliciting is unlawful, and the hackmen will therefore be restrained from such disturbances of the peace."

"They resort to all kinds of tricks, and, although there are some good men in the business, as a general proposition it may be said that the hackmen are dishonest and dishonorable. As soon as a policeman's back is turned they will do something which they know is not right. Moreover, they all stand together."

"When one of them is arrested and taken into court, he has an attorney to immediately arise and abuse the police force, for arresting 'the poor hackman, who is trying so hard to make a living for his suffering family.' That cry has become an old one, and has little effect in court now, but it is still raised every time a hackman is arrested and brought to trial."

"As an example of how they defend themselves I will tell you of the arrest of one of them who had been in the business for five years. He violated the regulation preventing hackmen from overcharging customers. When he came into court he swore that he had only been in the hack business for about two months, and that he did not know the regulations. He had five witnesses to swear that he was a new man at hacking, and a man of good reputation. His plea did him no good, however, because every policeman who had served in the uptown hotel section testified that he had been a hackman for not less than five years, and that each one of them had known him to be in the business that long. He was fined, of course, and now he says that he 'has it in' for the policeman who arrested him. That means that he and his gang will injure the policeman, if they can get at him in the dark at any time."

"I once saw a lady get ahead of a hackman in a very cute way. I saw



HACKMEN DO NOT HESITATE TO LIE.

him following her down H street, and talking to her. That sort of solicitation of business is exceedingly annoying to ladies, and is unlawful. When I came near I heard the lady say: 'I think you are the man that waited on me yesterday, are you not?' The hackman had never seen the lady, but hackmen do not hesitate to lie, so he said: 'Yes, I'm the same driver.' The lady replied: 'I thought so, and that's the reason I don't want you.'

"One day last week a lady reported to me that she had given a hackman a five-dollar bill instead of a one-dollar bill, by mistake. She had a one and a five-dollar bill in her purse, and gave the five, thinking that she was handing him the one. By her description I soon located the hackman, and demanded the four dollars which he had robbed the lady of, but he denied having taken a cent more than one dollar. He admitted that he had taken her to an entertainment, but he declared that she had given him only one dollar. He called five hackmen, who at once said they were ready to swear that the culprit had come back to the stand and shown them a one-dollar bill, saying that it was more than he had expected to get. The fellow could not be convicted, and so I did not arrest him. The lady said she would rather lose the money than appear in court."

"That is one of the reasons that hackmen thrive on dishonesty. Their pecuniations are small, and they know that respectable people dread going to police court as witnesses; and so the hackmen take chances on robbing them whenever they can."

"Only a few days ago I noticed a discussion between a hackman and a stranger near the Shoreham hotel, and I snatched over to see what was going on. I heard the stranger say: 'When I was here last spring I only paid 75 cents an hour, and how is it that you now want to charge me a dollar?' The hackman at once replied: 'Seventy-five cents is the regular rate; but you asked me to let down the back of the victoria, and in such cases we charge a dollar.'

"That was a point-blank falsehood, and I so informed the stranger. I advised him to hire some other hackman, and he did so."

"That hackman driving by in a surrey is an ex-convict. He served a term in Sing Sing penitentiary for burglary. He is now under suspicion of associating with a gang of thieves and is being watched. He has committed several small pecuniations recently, but we can do nothing with him. That surrey is not his own. It belongs to another man, who hires him as a driver. Wouldn't he be a nice sort of a fel-



RUNNING THE BLOCKADE.

low for you to trust your wife or daughter to, for a drive about the suburbs? The police know him, and we know that he ought not to be allowed to drive a public rig, but we can't help it. If it was his own we could prevent him from getting a license. He is only one of many criminals who hold similar positions. Innocent strangers are liable any day to employ him, or some other fellow with criminal instincts, and suffer some deprecation. Under these circumstances it would be well for people visiting Washington to be careful whom they employ. It is generally best for strangers to secure carriages from the hotel clerks, because they are careful to those care they commit their guests."

"One of these fellows was called by a lady on Pennsylvania avenue last March, and he carried her to visit a friend on Connecticut avenue. She still wore her winter furs; but, as the day was growing warm, she left her furs in the carriage, while she entered the home of her friend. No sooner had the door closed, than the hackman drove hastily down the avenue until he met one of his kind, and gave the furs to him. Then he drove back, and awaited the return of the lady. She re-entered the carriage, and drove to her hotel, without thinking of her furs until she alighted at the hotel entrance. She looked for them, asked for them, and implored the driver to find them for her, saying that she valued them not only because they were costly, but because they were given to her as a Christmas present by a very dear friend. The driver insisted that he knew nothing of them, had not seen them, had not turned around once in his seat, and suggested that they might have fallen out of the carriage. He promised to drive immediately back over the route to look for them. This he did, and returned to inform the lady that they could not be found."

"The hotel proprietor reported the case to police headquarters, and I had no difficulty in locating the driver, because I know all of them. He acknowledged having waited on the lady, and he brought nine hackmen who swore that they had seen him driving rapidly back, looking for the furs, as he informed them at the time. Two of the hackmen testified that they accompanied him in his diligent search for the lost furs. Long after the lady had left Washington, I learned how the trick had been performed, but could never locate the furs, and hence there has been no prosecution."

So much for the hackmen. These instances of their criminal practices should be sufficient to warn all readers against employing hackmen here, without knowing something of them."

Now as to the policemen. The force in the national capital is in better condition than it has been for years. Maj. Sylvester, the chief, has been a newspaper man all his life, but has been also employed at police headquarters for a number of years. He was appointed to his present position less than two years ago, by President McKinley, who has personally known him for a long time. He has taken hold of his work with vigor, vigilance and integrity. He has paid especial attention to the inspection of his force, and has constant information concerning the character and work of every man. The policeman who neglects his duties now cannot remain on the force, for his derelictions will be discovered.

SMITH D. FRY.  
Rising young men are more appreciated in street cars than anywhere else.

## RUGS AND RAG CARPETS.

Dyes Are Now Used Instead of the Old Style of Cutting Strips in Colors.

Probably all women who make rugs are familiar with those that are knitted on large wooden needles, and also with those that are braided, but perhaps all do not know of the shirred rugs which are woven like rag carpeting. The rags for these are cut in bias strips and then shirred lengthwise through the middle upon a needle threaded with a long thread. The rags are not sewed together, but are pushed up close upon this thread until it is filled. These filled lengths are afterward woven into a rag of the size desired just as carpet rags are woven into strips.

There are firms now in every city which have wide looms upon which rugs are woven entire, and carpets made from the ordinary carpet rags may also be woven upon such looms instead of being made up into strips. This does away with the necessity of sewing, and the carpet woven entire looks much nicer than one in breadths. It has the appearance of a rug. Indeed a very handsome rug may be made of carpet rags if they are well colored. Instead of having every shade and color imaginable in the carpet, divide your pieces into two, or perhaps three lots, according to shades, and dye them. Three good colors are a moss green, a rich red and a wood brown, or you may use only two colors, the red and brown. Of course the different shades in the rags will produce different shades in the dyed pieces, but if the lightest are taken for the green dye, the medium for the red, and the darkest for the brown, then the different shades will be harmonious, and will weave up together well. After the rags are colored and torn, sew them in hit-and-miss style, and if you choose reserve enough of the red or the brown to form a deep band across each end of the rug. But at least have the body hit-and-miss. Then have a rug woven in one breadth—the looms will carry nine or even 12 feet in breadth—and you will have a rug which is really artistic, and which will make a most acceptable cover for the floor of any modest home. It will scarcely look like rag carpeting, the color effect is so unusual.

The carpet of any room forms its background, and the colors in it should be in harmony with the furnishings of the room, or at least such as will throw the furnishings into pleasing relief. Too often carpets and rugs are so bright as to make them conspicuous objects of furnishing, a result which is always inartistic. By using dyes, the colors may be subdued and brought into a desirable harmony.—Home Magazine.

## THE NEWCOMER.

The Summer Girl Was Curious Until She Learned He Was a Barber.

It was 7:30 in the evening of a cloudless summer day, and at exactly 13 minutes after the whistle of the incoming train had been heard, the hotel stage, coming around a turn in the road, was observed to contain a solitary passenger. Immediately all was bustle and confusion. For two weeks now, in all that vast aggregation of female loveliness, no man had appeared to break the dead level of monotony which had hung over them like a pall. No nimble yacht had cast anchor in those eye-swept waters. No foreign prince, duke or lord had wandered into that Eve-crowned Eden of piazzas and board walks, and, indeed, not even the humblest American citizen had silhouetted the sand-duned horizon. But at last one had come. As the stage speeded along the highway in a swift walk, and the form of its solitary occupant became more clear, 200 hearts beat high, and as it drew up to the porch and the stranger got out, it was evident at last that here was that perfect specimen of manhood which the accumulated refinement of centuries had focussed under one head. Tall, broad-shouldered, with a sensitive mouth partly concealed by a drooping moustache, an intellectual yet a singularly intellectual face, dressed faultlessly in the latest fashion—here at a glance was one to suit the most fastidious.

Four minutes later one of the fair guests, with that careless assumption of indifference that goes with burning curiosity, approached the desk, where the newcomer had failed to register, and said to the clerk:

"Would you mind telling me who that young man is?"

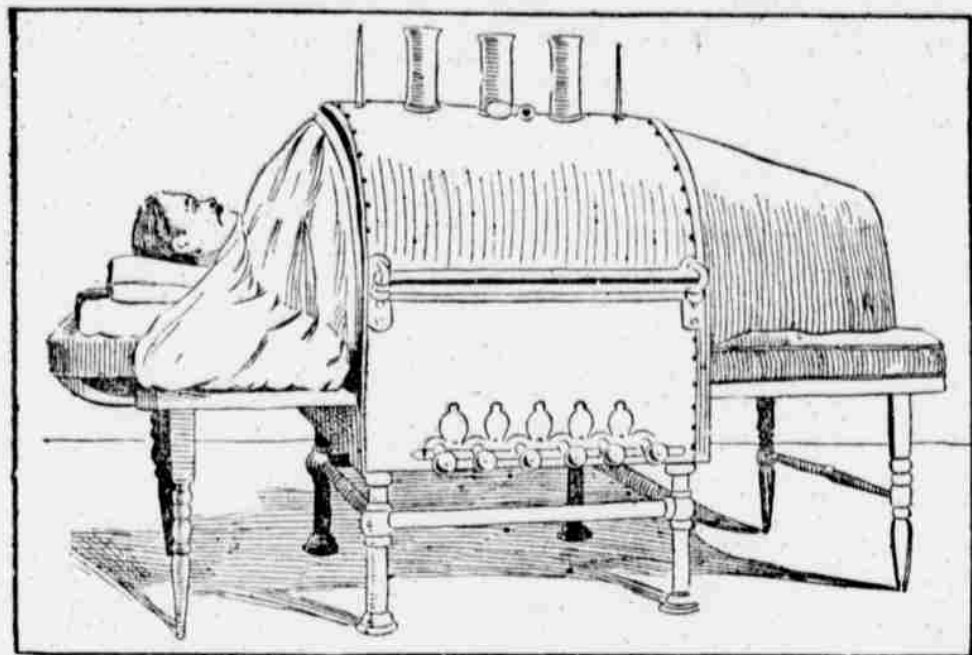
"Why, certainly not," said the clerk, with a slight smile; "that is the new barber."—Harper's Bazar.

## Peaches Baked.

Rub cling-stone peaches free from down, fill a deep baking dish two-thirds full; add one cup water; the juice of one lemon; and a small cup of sugar sprinkled over. Cover and bake in a slow oven for one hour. Serve a portion of the sirup with each peach.—Home Magazine.

## Baked Squash.

Boil, mash and let get cold; then beat up light with one tablespoonful melted butter, two raw eggs, three tablespoonfuls milk, and pepper and salt to taste. Put in buttered bake dish, sift dry crumbs over the top, and bake in quick oven.—Cincinnati Enquirer.



HOT AIR TREATMENT FOR RHEUMATISM.

has been aided not only in every material way possible, but also by kindly encouragement and recognition, and, on the part of the head of the British postal service, Mr. Preece, a generosity unsurpassed. The latter gentleman, recognizing the superior points of Marconi's methods over any of his own, with which he had been experimenting for many years, helped him in every way possible to develop his new system. Its practicability was shown before the close of 1897 by experiments made in crowded city districts as well as in the open country. Between Bournemouth, on the mainland, and Alum Bay, on the Isle of Wight, a distance of 18 miles, regular service has been established.

During the convalescence of the prince of Wales last year communication was maintained without difficulty between Osborne house, the queen's residence on the Isle of Wight, and the yacht in which the prince was lying, at a distance varying from two to seven miles from the shore. One hundred and fifty messages were sent. Regular service between the East Goodwin Sands lightship and the South Foreland land station, seven miles distant, has been established for about nine months. Last March the first messages between England and France were flashed across the English channel, the distance covered being estimated at from 28 to 32 miles. The complete success of the system employed by Marconi requires the use of vertical wires at the transmitting and receiving stations, the height of the wires varying according to the distance to be covered, also depending to some extent on the induction coil of the telegraphic apparatus. For the channel service a wire 150 feet high is used, while with the others mentioned above 80 to 90 feet has been found to be a sufficient elevation.

It is not to be expected that we shall treat Marconi with the veneration which our democratic natures allow us to accord to the lords, dukes, etc., who are sometimes loaned to us for a season by our mother country that we may help them to recuperate their mental and moral stamina, as well as fill their pockets, but there are numbers of our countrymen prepared to recognize the worth of the young man's discoveries, and it is safe to say that he will not be neglected by the nation which is always ready to do homage to real merit.

During the last few years a great many kinds of hot-air treatments for rheumatism have been invented, tried and discarded, but at last one has been found which, while there seems to be a great chance of killing the patient, may, if he escapes alive, be expected to cure him. Numbers of successful experiments have been made, notably some of recent date in the Cook county

to 400 degrees, in a Turkish bath no one can stand more than 160 degrees, because of the moisture. Some 400 patients have thus far been treated by this method in the hospital named. Some were said to have been literally twisted into knots by rheumatism. One man was so doubled up that his arms and legs seemed to have changed places. He was finally straightened out, but not entirely cured, although, to his great joy, he is now able to dance a jig.

The theory is that the hot air draws the poison from the system. One case of chronic lumbago and sciatica of 16 years' standing, which had been treated by noted physicians in Italy, Germany, and at different springs in America, was kept in the machine for two hours. The patient was then told to get out. He thought it impossible for him to make the necessary movements. When he found that he could work himself out without much pain, and could then walk, his gratification was beyond description. After five or six treatments he was well. Several cases of locomotor ataxia have been much benefited.

If it can be made certain that the machines can be always depended upon to exhaust the moisture from the hot air and can always be in charge of skilled attendants, they bid fair to rank among the important discoveries of the century.

The destruction to crops from hailstones is such a cause of dread in farming districts, especially in those countries where the vineyards furnish the chief means of subsistence to the people, that for many years efforts have been made to discover some method of preventing their falling. Chief among these has been the use of the mortar. A special form is now used, set in a wooden base and having a sheet-iron cone 6½ feet high fixed to its mouth. The mortar is charged with powder, well tamped down, the cone placed and the piece fired. Owing to the vibrations of the cone, considerable disturbance is produced in the air. If this kind of mortar is fired near a forming hailstorm, the stones cannot form, and a heavy shower of rain falls. Many Italian provinces are adopting this method of protection. In Styria and Carniola, where these mortars were first used, the vineyards thus defended have remained uninjured for three years. One mortar protects a space of from 1,600 to 2,500 feet in diameter. Hence, they should be placed from two-thirds to one mile apart. These mortars in bronze cost about \$30. If made of cast iron, the price would be less.

EDWARD JULIAN.

## Champagne in New York.

New York's consumption of champagne during the year was the greatest ever known.