Science and Invention

Latest Headache Cure.

No matter whether a man was out all night the night before, has strained his eyes, or eaten something which does not agree with him, the resulting headache incapacitates him for duty of any sort which requires him to use his brain to any great extent. Every one has his favorite remedy, from a headache powder to a day off, and after the affliction has been cured or outworn it is soon forgotten, and the man will "repeat the dose" when the next opportunity offers. Of course, the best kind of a cure is the prevention of the cause, but since the preaching of this doctrine is not often carried out in practice, we give our readers the benefit of the latest ingenious idea in the line of headache cures, introducing the use of chemical refrigerating liquids just as though the head were a cold storage warehouse, around which refrigerants must be pumped in order to keep the temperature of the contents down below the normal level. The main difficulty seems to be that a man cannot fold the apparatus up and put it in his pocket as he can a headache powder or other medicine, and consequently he must go where the refrigerating plant is located if he desires this form of treatment. It is in reality just what has been suggested above, a miniature refrigerating plant, with the proper chemicals placed in the flexible bulbs in contact with the temples and a quantity of the liquid

which completes the chemical reaction contained in the compression bulbs held in the hands. The apparatus can be adjusted by means of the turnbuckle to increase or decrease the pressure of the cooling bulbs on the forehead, and as soon as the patient begins squeezing the bulbs to force the liquid from one receiver through the pipe and temple bulbs to the opposite receiver the cooling agent will commence to act on the head, reducing the temperature and driving the blood back to the other portions of the body, instead of allowing it to enter the head in an abnormal degree.

The inventor is James R. Porter of Richmond, Ind.

Dynamo and Motor Defects.

Judged from some of the things told in the latest annual report of Michael Longridge, chief engineer of the Engine and Boiler Insurance company, of Manchester, the insurance of electric motors would seem to be a highly speculative business. Taking a general average, one dynamo in twelve has an accident during the year, while one motor in eight may be expected to break down. These are average figures, but in certain industries the "mortality," if one may use the term, is much higher, since, on the average of motors employed in collieries, one in three break down annually; while of those used in actual coal cutting, the casualty rate is as high as 50 per cent. Further, this class of machine suffers from general deterioration to a marked degree. In the case of motors, fully one-fourth the failures arise from old age. The insulation in many instances is found affected to such an extent that, if disturbed, it falls to pieces, and damage to a single conductor, therefore, involves the complete rewinding of the armature. Overloading, as a cause of failure, is apparently less common, but is still responsible for one-seventh of the total motor breakdowns.—Cassier's Magazine.

Aim to Prevent Accident.

The frequency of accidents to passengers at railway stations and at the stopping places on elevated electric lines has led inventors to devise some means of lessening the sacrifice of life and limb. A recently perfected safety gate for use on railroad trains and trolley cars, particularly for elevated systems, provides a step guard. Upon closing the gate, which is made of hinged three-quarter inch pipe, the step guard is swung into place flush with the platform and its extreme edge, thereby giving a continuous flat surface from gate to gate. The usual folding gate has to be located at some distance inside the platform, or else, especially where several steps are needed to reach the platform, an open space is left, which experience has shown to be a fruitful source of accident.

New Incandescent Lamp.

A new type of incandescent lamp filament has recently been perfected by Dr. Just of Vienna, the essential feature of which is the use of bornitrate as material for the filament. The lamp gives a light similar to that of the ordinary filament, and tests have shown an average life of between 300 and 400 hours. It is stated that the cost of manufacture is not greater than that of the ordinary lamp. Up to the present only lamps of fifty and 100 volts and thirty-five candle power have been produced. The most important feature of the lamp is its high efficiency.

Manufacture of Argon.

Argon, though so recently unknown, has ceased to be a rarity, as it can be prepared at the rate of a quart a day by the new process of Moissan and Rigaut, the French chemists. Air is passed over copper turnings in a red-hot tube, the oxygen being thus abstracted, and the gas passing away is nitrogen mixed with argon. Most of the nitrogen is removed by a mixture of magnesium and lime, the remainder by red-hot calcium.

A Rousing Sale of Walking and Dress

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The entire manufactured stock of BELL-GRAHAM Co., exclusive Skirt manufacturers, 11-17 Woodbridge street, bought by us at a big discount from regular cost and offered to you at great bargain prices—there are hundred of skirts—both in Walking and Dress Skirts—made up in the very newest materials—latest styles and up to date in every way—anyone looking for an elegant Skirt at a saving price, here's your chance.

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All the $7.50, $8.50 and $10 Dress and Walking SKIRTS we offer at..... $5.00

All the $12 50 and $15 Dress and Walking SKIRTS we offer at..... $7.00

All the $16.50 and $17.50 Dress and Walking SKIRTS We offer at..... $7.50

All the $20 and $25 Dress and Walking SKIRTS we offer at..... $10.00

Tremendous Sacrifice of

WINTER COATS

AT TEN DOLLARS—

Choice of any Cloth or Velour Coat in our entire stock, no matter what it cost or originally sold at, for $10. We're bound to clean out all our Winter Coats at once and we've cut the prices with a vengeance. All the finest Coats in the house are included in this great sacrifice—The former prices of which were as high as $35—All go now at..... $10.00

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Our entire Stock of Winter Coats that formerly sold at from $15 to $20—we offer at..... $7.50

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Our Entire Stock of Winter Coats that formerly sold as high as $15—we offer at $5.00

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THEY GO REGARDLESS OF COST

WE MUST HAVE THE ROOM FOR NEW SPRING GOODS.

ONE TABLE, CHOICE 95c PAIR—Ladies' Shoes, regular Price $3.00 and $3.50, pointed toes. Ladies' Beaver Foxed Shoes, new goods, worth $1.50 and $1.75—at 95c per pair.

ONE TABLE, CHOICE 25c—Ladies' Rubbers, pointed, Childs' Knit Slippers and Men's warm Felt Boots—25c pair.

ONE LOT OF INFANTS Moccasions and Soft Sole Shoes, 9c per pair.

Youths' and Children's Leggings at half Price

During this sale we offer all our Men's heavy sole $3.00 Shoes a $2.65.

Men's calf-lined $3.50 Shoes at $2.75.

Ladies' $3.00 welt sole Shoes at $2.75.

Ladies' $3.50 welt sole Shoes at $2.95.

MERRITT'S SHOE STORE

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READ THE STORY OF

MICHIGAN IN PEARSON'S MAGAZINE FOR FEBRUARY

DAVID S. BARRY has told the history of Michigan concisely, accurately and dramatically. No State has a story more romantic.

DO YOU KNOW that PEARSON'S entertains more than 1,250,000 people every month?

Features like the following explain its popularity:

Modern Methods of Finance" by Henry George, Jr.

President Roosevelt, at Concord, N. H., August 28th, 1902, said: "About all we have a right to expect from Government is that it will see that the cards are not stacked." He was referring to the great industrial combines.

With a view to showing the methods pursued in the organization and management of many of the gigantic industrial combinations "PEARSON'S will publish a series of articles by Henry George, Jr., the Anatomy, Evolution, and Manipulation of Log per being the theme of the first two articles. The Asphalt Atrocity is to be the third.

Indian Fights and Fighters, 18 3-1903, by Cyrus Townsend Brady. Illustrated by SCHREYVOGEL.

Presenting an authentic, brilliant and thrilling history of frontier tragedies, including Custer's successful attack upon Black Kettle, Custer's Fatal Defeat at the Little Big Horn, Forsyth's Famous Fight on the Arickaree, the story of Lowell's despera ate defence of Pinery Island, the Massacre of Fort Phil Kearney, Crook's Campaign, Wheaton's Campaign, in the Lava Beds of Oregon.

Tom Nast, Cartoonist.

Gen. U. S. Grant said he considered Thomas Nast the greatest single figure that had come out of the Civil War. Mr. A. Bart Higbee has been prepared for PEARSON'S a series of articles from scrap books and memoranda given to him by Tom Nast shortly before his death. This most important set of papers, which includes the Overthrow of the Tweed Ring, the Civil War Period, the Horrors of Slavery, the Franco-Prussian War Period, the Greeley-Lincoln Campaign and many other articles presenting vivid pictures of the times when history was warm in the making, will shortly appear.

Monsieur A. V. resumes "Revelations of An International Spy."

Following is the schedule thus far planned: The Ruse of the Emperor Empress, the Abduction of Francis Joseph; the Death of Queen Draca Kin Our Visit to Panama. The Author will narrate that his identity must remain a secret

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This most extraordinary record shows the efficiency of our method of buying under a rigid guarantee.

Saturday, someone asked if Furs would go still lower this season. No; the manufacturer would take them off our hands now if we wished, as furs are going to be higher next year, and with a little remodeling these would bring full value, but we prefer to sell them to our customers, for many women wait until the last in order to get the reduced prices.

Not a very plentiful assortment, but all good, and most everyone can find something suitable.

On the Single Scarfs and Boas the prices as they stand to-day, start at $1.00 and go up to $17.50. All are Furs that sold for double these prices and some sold for even more.

$12.50 For a $25 Near Seal Coat.

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Size 36. The finest quality of Near Seal, deep and rich, with best satin lining made.

Three Whole Seal Coats, sold at $30, $35 and $40 for $15, $17.50 and $20. Sizes are 40, 38 and 34.

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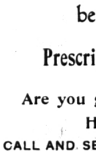

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