

SCIENCE.

THE VELOCITY OF THE MOON.—We can faintly picture, perhaps, how it would seem, from a station near the lunar orbit, to see the moon—a moving world—rush by with a velocity greater than that of the cannon-ball in its swiftest flight; but with equal speed its shadow actually travels along the earth; and now, if we return from our imaginary station to a real one here below, we are better prepared to see why this flying shadow is such a unique spectacle; for, small as it may be when seen in relation to the whole globe, it is immense to the observer whose entire horizon is full with it and who sees the actual velocity of one of the heavenly bodies, as it were, brought down to him.

The reader who has ever ascended to the Superga at Turin, will recall the magnificent view, and be able to understand the good fortune of an observer (Forbes) who once had the opportunity to witness thence this phenomenon, and under nearly a cloudless sky. "I perceived," he says, "in the southwest, a black shadow like that of a storm about to break, which obscured the Alps. It was the lunar shadow coming toward us." And he speaks of the "stupor" it is his word—caused by the spectacle. "I confess," he continues, "it was the most terrifying sight I ever saw. As always happens in the case of sudden, silent, unexpected movements, the spectator confounds real and relative motion. I felt almost giddy for a moment, as though the massive building under me bowed on the side of the coming eclipse." Another witness, who had been looking at some bright clouds just before, says: "The bright cloud I saw distinctly put out like a candle. The rapidity of the shadow, and the intensity, produced a feeling that something material was sweeping over the earth at a speed perfectly frightful. I involuntarily listened for the rushing noise of a mighty wind."—Century.

THE WEALTH FROM INVENTIONS.—Senator Platt, in his vigorous speech in Congress last winter in support of the patent laws, claimed that two-thirds of the aggregate wealth of the United States is due to patented inventions. That two-thirds of the \$43,000,000,000 which represents the aggregate wealth of the United States rests solely upon the inventions, past and present, of this country.

Mulhall, in his "Progress of the World," writes that in effect the invention of machinery has given mankind an accession of power beyond calculation. The United States, for example, make a million sewing machines yearly, which can do as much work as formerly required 12,000,000 women working by hand. A single shoe factory in Massachusetts turns out as many pairs of boots as 30,000 bootmakers in Paris.—See American.

FLOWING WELL NEAR LOCKPORT, N. Y.—Adam Ruhman & Son have a pond on the Wakeman farm from which they supply ice to Lockport and other places. This fall they decided to increase its capacity, and drilled an artesian well to flood it. The drill passed through 114 feet of solid limestone rock, when it struck a water seam from which the water spouted high above the top of the well, and has been flowing at the rate of 25,000 barrels of ice cold water a day. It is one of the greatest artesian wells in existence.

FARM AND GARDEN.

The report of the Bureau of Industries for November deals chiefly with the grain and root crops of Ontario. The harvest of grain crops has been even more bountiful than they appeared by the August estimates. The quality of the grain is generally excellent, being plump, hard and heavy, excepting barley, which is badly discolored by rain, and the bulk of it does not rank higher than second grade. Wheat is remarkably free from defects of any kind. The average yield of the spring and fall varieties is 22 bushels per acre, or nine more than last year. Oats show a large yield. The yield of peas is 3,000,000 bushels more than last year. Beans and corn show an average of 23 and 74 bush, an acre respectively. The root

crop is generally excellent. Fruit trees are in a healthy condition, but with the exception of apples the crop of the season has been less than the average. The area of fall wheat sown this year is somewhat less than last year.

MAPLE SAPLINGS.—After the fall rains small maple seedlings may be found in any maple grove, and they may be pulled up by the fingers. Hundreds can be collected in an hour where they are abundant. These little seedlings may be transplanted to a rich place in the garden, two feet apart each way. In three or four years these trees will be fit for transplanting, and they will overtake maple saplings which are transplanted from the woods when ten feet high.

TO PREPARE VEGETABLE MOULD QUICKLY.—As early as the leaves of trees can be collected, let them be brought in a considerable quantity, into a close place, and dressed up there in the form of a hot-bed. Let this be well saturated with the drainings from the dung-heap, with suds from the wash-house, with water from the stable and cowhouse liquid where this latter article can be procured. Let this bed or heap be covered and lined with fresh stable manure to make it heat.

When the heating is sufficiently subsided, let the leaves be uncovered and turned over, to mix the dry and wet well together, and if moisture be required, let them have it of the same description, repeating the process till all be reduced to fine mould. This will be ready for use in two months from the time of collecting the leaves, and to prevent any waste of the liquid recommended, a layer of maiden earth, of two feet thick should be made the substratum, which would receive any of the valuable liquid that would otherwise run to waste. Leaves of slow decomposition should be avoided, as those of the Oak, etc., which, however are the best for retaining heat in hot-beds and pits. The leaves of Fir should also be avoided, but those of the Sycamore, Elm, Alder, Maple, and all the soft kinds are better suited for the purpose. This compost should be kept dry, in an airy place, and ridged up, so that the rain cannot wash out the salts with which it abounds.—Gardener's Record.

BITTER CREAM.—At this season the herbage is less nutritious after having been frozen. The cows give less milk and the cream rises so slowly that mould forms before taking it off, which causes a bitter taste. This may be remedied by heating the milk after straining, which will cause the cream to rise more quickly and when churned to make more and better butter.

HOUSEHOLD.

POTATOES IN THEIR JACKETS.—"Should potatoes be peeled before cooking or should they be boiled in their jackets?" I say most decidedly in jackets," writes Professor Mattien Williams, "and will state my reasons. From fifty-three to fifty-six per cent of the saline constituents of the potato is potash, and potash is an important constituent of the blood—so important that in Norway, where scurvy once prevailed very seriously, it has been banished since the introduction of the potato, and, according to Lang and other authorities, it is owing to the use of this vegetable by a people who formerly were insufficiently supplied with saline vegetable food. Potash salts are freely soluble in water, and I find that the water in which potatoes have been boiled contains potash, as may be proved by boiling it down to concentrate, filtering, and adding the usual potash test, platinum chloride. It is evident that the skin of the potato must resist this passage of the potash into the water, though it may not fully prevent it. The bursting of the skin occurs only at quite the latter stage of the cooking. The greatest practical authorities on the potato—Irishmen—appear to be unanimous; I do not remember to have seen a pre-peeled potato in Ireland. I find I can at once detect by the difference of flavor whether a potato has been boiled with or without its jacket, and this difference is evidently saline."

As a rule, man's a fool. When it's hot he wants it cool; When it's cool he wants it hot; Always wanting what it's not; Never liking what he's got, I maintain, as a rule, Man's a fool. —Every Other Saturday.

is effected by the oxygen of the atmosphere getting up a fermentation. If a little cider is drawn every day and turned again into the barrel, it will carry more or less oxygen with it. A little old vinegar turned into the cider barrel will hasten this change even more than cider will.

STEAK-PIE OR PUDDING.—In making, sprinkle about half a teaspoonful of moist sugar over the steak along with pepper and salt; it not only improves the flavor, but makes the meat very tender.

HEALTH HINTS.

TIRE EYES.—People speak about their eyes being fatigued, meaning that the retina, or seeing portion of the brain, is fatigued, but such is not the case, as the retina hardly ever gets tired. The fatigue is in the inner and outer muscles attached to the eyeball and the muscle of accommodation, which surrounds the lens of the eye. When a near object is to be looked at, this muscle relaxes and allows the lens to thicken, increasing its refractive power. The inner and outer muscle to which I referred are used in covering the eye on the object to be looked at, the inner one being especially used when a near object is to be looked at. It is in the three muscles mentioned that the fatigue is felt, and relief is secured temporarily by closing the eyes or gazing at far distant objects. The usual indication of strain is a redness of the rim of the eyelids, betokening a congested state of the inner surface, accompanied with some pain. Rest is not the proper remedy for a fatigued eye, but the use of glasses of sufficient power to render unnecessary so much effort to accommodate the eye to vision.

Diphtheria and typhoid fever, which are pests of country districts often to a greater extent than of towns, could be prevented in a majority of instances by proper attention to drainage around the farm house. The expenses of drainage need not be great. Where cement tiles for drains are not procurable they may be made by using sheet iron moulds—inner and outer—and then tamping the grout in a little at a time by a long, slender iron tamp. After being set aside a short time the cement becomes set. The moulds are made so as to be parted on hinges. When only one mould is used, cement tile making would be too slow a process, and where many are used it is well for farmers to combine to buy them or have them made; or better still it will pay to get some tile-maker to make some cement tiles. To prevent gas escaping from the drains into the house or cellar, a siphon inverted should be used. The water settling in the bottom of the siphon will prevent, under ordinary circumstances, all escape of gas into the building, while it will freely allow drainings to escape down the pipe. The outlet into a field drain, ditch or hollow should, if possible, be sufficiently high to prevent back water in storms driving gas up through the siphon. Where an outlet such as described cannot be found, a pipe running from the drain to a little above the ground will allow of the escape of gas outside the farm house. The drainage of farm houses is the most crying sanitary reform in country districts.

VARIETIES.

A POOR OPINION OF HIMSELF. As a rule, man's a fool. When it's hot he wants it cool; When it's cool he wants it hot; Always wanting what it's not; Never liking what he's got, I maintain, as a rule, Man's a fool. —Every Other Saturday.

Rockford Watches

Are unequalled in EXACTING SERVICE. Used by the Chief Mechanician of the U. S. Coast Survey; by the Admiral commanding in the U. S. Naval Observatory; for Astronomical work; and by Locomotive Engineers, Conductors and Railway men. They are recognized as the most accurate and durable are required for all uses in which time and durability are requisites. Sold in principal cities and towns by the COMPANY'S exclusive Agents (diamond jewelers), who give a Full Warranty. Oct. 29, 1884.



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Will cure most all diseases of the Lungs, Liver and Kidneys, including the worst cases of Dropsy, and is certainly the best blood purifier known.

Invigorating Syrup Cures Dyspepsia, Coughs, Colds, Head-aches, Worms, acts as a gentle physic, and should be kept in every household for all emergencies.

Acadian Liniment Cures Diphtheria and Sore Throat, Rheumatism, Quinsy, Cuts and pains of all kinds, as well as for all other ailments for man and beast.

Nerve Ointment Is truly a household necessity, and is used externally and internally for the Lungs, Piles, Sores, Cuts, Burns, Scalds, Chapped Hands, Cutaneous Eruptions of the Skin, and a hundred ailments flesh is heir to.

Vegetable Plaster Cures Boils, Cuts, Cracked Hands and Lane Back, being put up in tin boxes, it is one-third cheaper to use than those ready spread, beside being so much better.

Certain Check Cures Cholera, Diarrhoea, and all like complaints in children and adults.

Eye Relief Cures all forms of Sore Eyes, Piles and Chills. Don't forget to try it this winter.

All the above preparations are manufactured by C. GATES SON & CO. Middleton, N. S. and may be relied on. Send for pamphlets of cures. Sold by all respectable Druggists and Dealers. Nov. 26.

SMITH & CHISHOLM

18 George Street, Have on hand a full line of West of England Broadcloths, DOESKINS, DIAGONALS, HAIRLINES SCOTCH AND ENGLISH Tweed Suitings, CORDUROYS in Seal-brown, Drab and Huntsman's Color, SPRING OVERCOATINGS, & C., Which they can make up at prices which will defy competition. A perfect fit and every satisfaction guaranteed. May 28.

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HAVE RECEIVED THEIR FALL AND WINTER STOCK OF HATS, CAPS AND FURS. SATIN AND FELT HATS THE LATEST STYLES FROM Lincoln, Bennett & Co., Townend & Co. and Christy, (of London). —ALSO— A Large and Personally selected Stock of FURS —IN— SEAL & ASTRACHAN JACKETS & DOLMANS, Cashmere Circulars and Dolmans Lined with Squirrel and other kinds of Fur. —ALSO— Fur Collars and Capes, Boa's Trimmings, Muffs, etc. A very cheap lot of SHOULDER CAPES from \$8 to \$4. Buffalo and other Robes, Trunks, Valises, etc., 143 GRANVILLE STREET, HALIFAX, N. S. Furs Repaired and Altered. Oct. 22.

McSHANE BELL FOUNDRY Manufacturers of those celebrated Church and House Bells for Churches, Fire Alarms, Town Clocks, etc. Price \$1.50 and circular sent free. Address HENRY McSHANE & CO., Baltimore, Md., U.S.A. 17.

IT IS TRUE!

KIND WORDS. WHAT OTHERS THINK OF BUDS AND BLOSSOMS.—The following is from The Christian at Work, a first-class religious weekly, published in New York: "In the City of Halifax, Nova Scotia, is published a monthly magazine called Buds and Blossoms and edited by J. F. Avery. Each number contains forty pages, plentifully and handsomely illustrated, and at 75 cents a year is certainly one of the cheapest publications extant. But better still, it is one of the best. Its pages are full of the gospel spirit, excellent temperance sketches, missionary intelligence, short stories, household hints and suggestions, all entertaining clean and wholesome literature, suitable for the home and family circle, and calculated to promote purity and knowledge among its readers. We do not know what the circulation of this excellent publication may be, but of this we are sure, it ought to be double whatever it is, for it is just the right kind of reading to be put into the hands of young folks; bright, cheery, hopeful and strong, without cant or sickly sentimentality. We hold it as an indisputable truism that when an opportunity offers to promote the circulation of such literature among the young it becomes a religious duty to do so. Send to the publisher for a specimen copy, and you'll find that we have not said one-half the good things we might concerning it."

SPECIAL OFFER!!!

We will send back numbers till the end of 1884 for 50 cents, or for \$1.00 will take new names from date until end of 1885. So confident are we you will like it, we offer it for 25 cents remainder of the year. Send 6 cents for specimen and opinions of the press.

Buds & Blossoms. REV. J. F. AVERY, Editor, Mizpah Cottage, Kempt Road, Halifax, N. S. Aug. 6.



ALSO CURES Sciatica, Neuralgia, Headache, Earache, Toothache, Cramps, Bruises, Sprains, Coughs, Colds, Quinsy, Erysipelas, Colic, Croup or Rattles, Hoarseness, Burns, Bronchitis, Numbness of the Limbs, removing the draft and producing the growth of the Hair, and as a Hair Dressing is unequalled.

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offered for a better article, or the Proprietors of any remedy showing more Testimonials of genuine cures of the above diseases in the same length of time. There is nothing like it when taken internally for Cramps, Colic, Croup, Colds, Coughs, Pleurisy, Hoarseness and Sore Throat. It is perfectly harmless, and can be given according to directions without any injury whatever. Minard's Liniment is for sale by all Druggists and Dealers. Price 25 cents. Wholesale agents—Forsyth, Sutcliffe & Co., and Brown & Webb, Halifax, May 21.

SAVE THE NATION!

For it is sadly too true that thousands of children are STARVED TO DEATH every year by improper or insufficient food. Remember,

RIDGE'S FOOD

FOR INFANTS AND INVALIDS, Is all a great deal more than we have claimed for it. It is simply a HIGHLY NUTRITIOUS and easily assimilated FOOD, grateful to the most delicate and irritable stomach, and especially adapted for the INFANT and GROWING CHILD. Invalids, Nursing Mothers, and those suffering from Indigestion will find on trial that RIDGE'S FOOD FOR INFANTS AND INVALIDS, is all they can desire. It is carefully put up in four sizes. Constant users will find our No. 4 size (always the most economical size to buy) now much larger than formerly, thus materially lessening the expense. WOOLRICH, Dispensing and Family Chemist, Upper Water Street, Depot for Ridge's Food, Pick-me-up Bitters, &c., with a well-assorted stock of Pure Drugs. April 17.

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with name and a prize, for \$1.25 packs, 12 names, for \$1. A sample pack and agent's outfit with illustrated catalogue of Tricks, and Novelties, for 3c stamp and this slip. A. W. KINNEY, Yarmouth, N. S. Oct. 8.

UNFERMENTED WINE,

Prepared for Sacramental and Dietetic use By F. WRIGHT, Manufacturing Chemist Kensington High Street, London, W. "This WINE is guaranteed to be the purest of the finest grapes of the Cote d'Or, Andalusia, and the Medoc. It is perfectly free from Alcohol, and is guaranteed to be Pure Grape Juice. It has stood the test of 22 years' continuous sale in every climate, and is now used in upwards of 1600 Churches of all denominations. The mode of manufacture is a slight modification of a well-known ancient practice, and effectually preserves the grateful flavor and the rich nutritious qualities unimpaired. It is therefore admirably adapted in cases of debility and fever, in which the stomach is too weak to digest other food. Children suffering from feeble ailments drink it with avidity, even when all other food has been refused. JOHN M. HODGES, Esq., M. D., F. C. S., Public Analyst for Antrim County and Belfast Borough.

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STARR KIDNEY MANUFACTURED IN TORONTO. A Permanent, sure cure for Diseases, Disorders and Affections of the Kidneys, Bladder and Urinary Secretive System, or Attendant Complaints—causing Pain in Small of Back, Sides, etc., producing Urinary Disorders, such as too frequent, scanty, difficult, Painful or Copious; Bright's Disease, Diabetes, Dropsy, Piles, Nervous Debility, etc., etc. Pamphlets and Testimonials can be obtained from Druggists free. Prices—Child's Pad, \$1.50, (cures Bed-wetting); Regular Pad, \$2.00. Special Pad for Chronic Diseases, \$3.00. Sold by A. B. Cunningham, M. D., Annapolis; William A. Piggott, Granville; Geo. V. Rand, Wolfville; J. B. North, Hantsport; W. H. Stevens, Dartmouth; Chas. F. Cochrane, Kentville; C. E. Borden, Canning. May 31.