

Corn and Oats Classification in New York.

The Committee on Grain of the Produce Exchange has decided to establish the following grades of corn under the new grading rules:

White corn shall be sound, dry, plump and well cleaned; an occasional colored grain shall not deprive it of this grade.

Yellow corn shall be sound, dry, plump and well cleaned; an occasional white or red grain shall not deprive it of this grade.

Mixed corn shall be sound, dry and reasonably clean. Low mixed corn shall be sound, dry, reasonably clean, but in color unsuitable to grade "mixed corn."

Steamer corn shall include corn of the above named grades in quality. In condition it may be slightly soft or damp, but must be cool.

No-grade corn—All soft, damp corn, warm, or inferior to the quality described as "steamer corn," which shall be called no grade.

The revised classification of oats will be as follows: White oats shall be bright, sound, clean, free from other grain, and shall not weigh less than 32 pounds to the measured bushel.

Light mixed shall be three-quarters white, and equal to No. 2 in all other respects.

No. 2 oats shall be sound, reasonably clean, and reasonably free from all other grain.

No. 3 oats shall be fit for warehousing, but otherwise unequal to No. 2.

No-grade shall include all oats damp, unsound, dirty, or from any other cause unfit for No. 3.

WOOD AND ELECTRICITY.—A piece of wood cut from a tree is a good conductor; let it be heated and dried, it becomes an insulator; let it be baked to charcoal, it becomes a good conductor again; burn it to ashes, and it becomes an insulator once more.

BATH BRICKS.—The celebrated Bath bricks known in almost every commercial market and house as "brick dust," are manufactured from the deposits of the river Parrett, Bridgewater, Somerset, England. As far as known, this peculiar kind of deposit has never been found elsewhere.

WHAT'S IN A SNOW FLAKE.—In a drop of water obtained from a single snowflake and magnified five hundred times, were found pieces of coal, fragments of cloth, grains of starch, sandy matter, and an immense variety of other substances, not a fragment of which exceeded in diameter the three-thousandth part of an inch.

WATER-PROOF DRESSING FOR LEATHER.—A dressing for rendering leather water-proof, made as follows, as proposed by Hager, has been found to answer the purpose: Dissolve 1 part of India rubber in 5 parts of illuminating petroleum, by digestion for a day, and add 20 parts of paraffine to the pasty mass, and digest again for half a day, with repeated stirring, and then mix it with five parts of oil and five of tallow, and finally add 10 of petroleum, or enough to give the mass the consistency of butter.

TO PREVENT GLUE FROM CRACKING.—Glue frequently cracks because of the dryness of the air in rooms warmed by stoves. An Austrian cotemporary recommends the addition of a little chloride of calcium to glue to prevent this disagreeable property of cracking. Chloride of calcium is such a deliquescent salt that it attracts enough moisture to prevent the glue from cracking. Glue thus prepared will adhere to glass, metal, &c., and can be used for putting on labels without danger of their dropping off.

PRESERVATION OF TIMBER.—A German chemist, Sigismund Beer, has found that by using borax as a solvent, the coagulation of sap was prevented, and that it could be effectually removed by boiling, without injury to the tissues. The wood is rendered thereby closer in grain, and is said to become impervious to decay. Wood so prepared is improved both in color and texture, and is free from the danger inherent to impregnation with creosote or other oils. By not washing out the borax the inflammability is said to be much decreased.

HYDROGEN A METAL.—Strange as it may seem to those who have not been posted with the more modern investigations of chemists and who only know hydrogen as a gas, the lightest of all known substances; yet scientists are gathering more and more proofs every day that hydrogen, or hydrogenium as it is proposed to call it, is a metal. Graham, who discovered its power of combination with iron, palladium and platinum, first considered it to be a metal, and now M. Tröost and Hautefeuille found that it combines with potassium, sodium, nickel, cobalt, manganese, lithium and thallium.

CHALK.—Most people looking at this substance would take it to be a sort of hardened white mud. Such is not the case, as the microscope shows that it is nothing but the agglomerations of creatures almost invisible. Bearing this in mind, one is astonished at the power of organic life, which can produce masses that form a rampart to the coast of England. Their minuteness is such that a single visiting card covered with a white layer of chalk contains about 100,000 shells. These are forms of carbonate of lime, and are so small that 10,000,000 are required to weigh a pound, and 150,000,000 to make a cubic foot of the same material.

AMERICAN PEDIGREE OF THE CAMEL.—Though the evolutionary pedigree of the horse may be distinctly traced in the tertiary strata of our western Territories, nevertheless the horse as he at present exists, is not indigenous to this continent, but has been imported from Europe. The pedigree of the camel may also be constructed from materials supplied by American paleontology. Prof. Cope has recently unearthed a number of genera which must be regarded as the ancestors of the camel. And it is worthy of note that, although the more prominent genera of the series which resulted in the horse, for instance Anchitherium and Hippotherium, have been found in European formations, no well-determined form of the ancestral series of the camel has up to the present time been found in any formation of the Palearctic region. "Until such are discovered," says Prof. Cope, "there will much ground for supposing that the camels of the Old World were derived from American ancestors."

EFFECT OF LIGHT.—Dr. Moore, the metaphysician, thus speaks of the effect of light on the body and mind: "A tadpole confined in darkness would never become a frog; and an infant deprived of Heaven's free light will only grow into a shapeless idiot, instead of a beautiful and reasonable being. Hence, in the deep, dark gorges of the Swiss Valais, where the direct sunshine never reaches, the hideous prevalence of idiocy startles the traveller. It is a strange, melancholy idiosyncrasy. Many persons are incapable of articulate speech; some are deaf, some are blind, some labor under all these privations, and all are misshapen in almost every part of the body. I believe there is in all places a marked difference in the healthiness of houses according to their aspect in regard to the sun, and those are decidedly the healthiest, other things being equal, in which all the rooms are, during some part of the day, fully exposed to the direct light. Epidemics attack inhabitants on the shady side of the street, and totally exempt those on the other side; and even in epidemics such as ague the morbid influence is often thus partial in its labors."

GREENLAND DOGS.—Two of these dogs can drag as much as one man. Nothing can be more exhilarating than dog sledding in the Arctic regions on a fine day. The rattling pace of the dogs; their intelligence in choosing the road through the broken ice; the strict obedience paid by the team to one powerful dog whom they elect as leader; the arbitrary exercise of authority by the master dog; the constant use of the whip and the running conversation kept up by the driver to the different dogs who well know their names, afford constant enjoyment. However useful they may be, these Arctic dogs seem to be deficient in that affectionate disposition which endears their species so much to man. A traveller once said that he believed the Esquimaux dogs to be the most ungrateful creatures in creation. He had travelled several hundred miles by sledge; and for six weeks it was his duty regularly to feed the dogs, but after only a few weeks' absence, on the conclusion of the journey, they would not recognize him in the slightest degree. It is impossible to domesticate these creatures, as under tender treatment they sicken and die.

1874 Versus 1842.

"Penury all doth purge melancholy and doth comforte the stomacke and the spirites of man; Isope (Hyssop) cleanseth viscus flemic, and is good for the breste and for the lunges; Roosmary is good for palses and for the fallynge sykenes, and for the cowghe, and good aganst colde; Roses be a cordyall, and doth comforte the herte and the brayne."—Roore's Dietary of Health for 1542.

Fellows' Hypophosphites, by giving tone to the nerves, removes melancholy and restores the spirits, promotes expectoration by strengthening the muscles of the chest, and is consequently the remedy for congestion and inflammation of the lungs, cough and cold. From its great nerve strengthening properties it is found to prevent a return of epileptic fits, it gives power of endurance to the brain, and strengthens the action of the heart.

EPPS'S COCOA.—GRATEFUL AND COMFORTING.—"By a thorough knowledge of the natural laws which govern the operations of digestion and nutrition, and by a careful application of the fine properties of well-selected cocoa, Mr. Epps has provided our breakfast tables with a delicately flavored beverage which may save us many heavy doctor's bills. It is by the judicious use of such articles of diet that a constitution may be gradually built up until strong enough to resist every tendency to disease. Hundreds of subtle maladies are floating around us ready to attack, wherever there is a weak point. We may escape many a fatal shaft by keeping ourselves well fortified with pure blood and a properly nourished frame."—Civil Service Gazette. Made simply with boiling water or milk.—Each packet is labelled—"JAMES EPPS & CO., Homoeopathic Chemists, 45 Threadneedle Street, and 170 Piccadilly, Works, Euston Road and Camden Town, London."

MANUFACTURE OF COCOA.—We will now give an account of the process adopted by Messrs. James Epps & Co., Homoeopathic Chemists, and manufacturers of dietetic articles, at their works in the Euston Road, London.—See article in Cassell's Household Guide.

OIL-PAINT FOR FLOORS.—None but earth-colors should be used in painting floors, and the rapid wearing off of a coating of oil-paint on a floor is a sure indication that white lead has been mixed with the paint. This is generally the case, since it causes the paint to cover better and spread easier. Even the employment of a varnish that has been boiled with litharge should be avoided, and one boiled with borate of manganese, preferred. It is also very important that the first coating should be perfectly dry before a second is laid on.

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