

## Miscellaneous.

## Foreign Correspondence.

LONDON, April 25th, 1851.

"The work goes bravely on" in the departments of the Great Exhibition Building. On the day I penned my last letter, the veteran Duke of Wellington, "the Iron Captain," visited the Exhibition, and after walking through it for some time, he at last arrived at the French department, where he paused to observe one of the exhibitors removing from an oak case various costly articles of gold and silver, and just at that very moment he uncovered a pair of equestrian statuettes of the Duke himself, and his once redoubtable opponent on the field of Waterloo, Napoleon Bonaparte. The old General smiled at the incident, while the sharp-eyed Frenchman looked at the statuettes and then at the Duke with an enquiring look, when the veteran nodded his assent to the resemblance. In a few moments the General was surprised and surrounded by Frenchmen. They politely raised their caps, and with true military salute he passed on to the next department.

The opening of the Exhibition is to take place on the first, as mentioned in my last. It will be a grand affair. The throne is now erecting for the Island Queen near to the centre of the large transept. A platform is to be erected, and the Archbishop of Canterbury, all the officers of State, and foreign ambassadors will attend in full dress. There will be splendid music, and after a number of ceremonies, the Queen, Prince Albert, the officers of State, and all the Commissioners will form a procession through the "wide expanse" of the building, after which the exhibition will be declared open for the public.

Owing to a profound degree of dissatisfaction on the part of the exhibitors of articles of sculpture and statuary with the proposed arrangement of Sir R. Westmacott, who had been charged with the superintendance of the sculpture room, the greater proportion have been withdrawn by the exhibitors, and places have been obtained for them in the transept and nave of the building. It appears that the plan proposed by Sir Richard Westmacott was to place the whole of the articles of sculpture, without regard to the nature of the subject, upon counters of a uniform height, which was absurd on the face of it. The artists, on the other hand wished to place their productions on pedestals adapted to the size and character of the subjects, which was only just and reasonable. This proposal was not acceded to; and many, if not most, of the articles were accordingly removed. Among the groups and figures which have emerged from what the artists have just termed "the condemned cell," to the liberty of the transept and nave, are—MacDowall's "Satan tempting Eve," and "Michael and Satan," "Dr. Jenner," "Jacob and Rachel," and various others. There is now a somewhat numerous collection of articles of sculpture in the transept. A group in marble, by Engel, executed for Prince Albert, attracts considerable notice. The group represents an Amazon rescuing her sister-in-arms from an Argonaut who had carried her captive.

As the art of ship-building is one for which our countrymen are distinguished, and as alleged improvements always attract their attention, especially in New York, where so much is at stake in ships, I see it mentioned in some of the Liverpool papers, that an improvement has been made there by a Mr. McKimm, which is thus described:—

"The object of the projector appears to have been to form an uninterrupted, unbroken, and continual line of binding, to extend from one end of the vessel to the other, and to connect every frame of timber together, in its passage along the side of the ship, in such a way as to render the framework inextensible and incompressible, and to give the greatest amount of stability to the frame-work, independent of any support from the plank-work, and to complete the object without wounding the frame with bolts, &c. With this object in view he has succeeded in accomplishing the desired ef-

fect by the introduction of two arched lines, constructed of iron plate-work, the one arch extending upwards, the other extending downwards as far as the bilge of the vessel; the arches being reversed, one chord line of iron plate-work answers both arched lines, and materially assists in the longitudinal tie, which extends in a vertical longitudinal position from stem to stern-post, forming within themselves the contour of the beam of a steam-engine within the frame of the vessel; one beam being so formed in each side of the vessel and continued round from stem to stern-post, where they terminate, and are bolted together through the stem and stern-post; the very formation of which tends to counteract the different forces exerted on the body, and opposing every tendency to hogging or sagging, which is more or less common to all vessels, particularly colonial built vessels. The scheme appears well worthy of notice amongst those who are interested in the construction, safety, and durability of such vessels."

EXCELSIOR.

FORKLAND, Greene Co., Ala., April 21.

MESSRS. EDITORS—I intrusted some business in the hands of the "Inventors' National Institute," at Baltimore, Md., in 1849 and 1850. I inclosed to Mr. Jas. Coppuck, Corresponding Secretary, Inventors' National Institute, Baltimore, Md., a description and rough sketched drawings of an improvement on Water Wheels. I also inclosed \$15 or \$20 as fees, &c., for examining into the novelty of my alleged improvements, the receipt of which was acknowledged; and they informed me that it was their decided opinion that I was entitled to a patent, but it would require some time to examine fully into the matter, to give me all the information I requested, which they would do in a few weeks. More than a year has now passed, and I have heard nothing further from them; I have written several times since, and have not received any answer from them. I am therefore at a loss to know whether the fault is in them or in the mail.

I have come to the conclusion that it is likely the Institute has fallen through, and it is nobody's business to answer my communications directed to the Institute. I will therefore take the liberty of inquiring of you, if you can inform me whether the Inventors' National Institute, at Baltimore, still continues to transact business as Patent Agents. Respectfully yours,  
J. H\*\*\*\*.

[The above letter we publish for the purpose of making a few remarks in regard to the matter. The letter tells its own story, and there is no doubt our correspondent has been genteelly swindled under the garb of a high-sounding title. We do not know that the Corresponding Secretary is at all chargeable for the evident misappropriation of the funds; the presumption is that he was a salaried officer, but we advise our correspondent to address him a letter of inquiry at Mount Holly, N. J., where, we feel sure, he formerly resided, and we presume Mr. Coppuck will afford him some information to whom he can apply for satisfaction.—[Ed.]

## Doings at Washington.

MR. EW BANK, &c.—The correspondent of the Tribune says:—

As to Mr. Ewbank, the charges against him are finally set at rest. They have been examined carefully by his chief, Mr. Secretary Stuart, and Mr. Attorney-General Crittenden, who pronounce them in detail as either unfounded or frivolous.

The absolute facts with reference to the appointment of Mr. Ewbank have never been known. They are simply these as I have them, not from Mr. Ewbank, but from the highest possible authority. Mr. Secretary Ewing saw his work upon Hydraulics, and considering it a scientific performance, sent to the author to inquire if he would accept the place of Commissioner of Patents. Upon understanding that he would, the matter came up in Cabinet, and the appointment was made. I do not think that at the time it was known that he was born in England. When opposition was made on that account, he found defenders, some of whom it was erroneously supposed aided in procuring his appointment.

I see it stated in some papers that Mr. Ewbank had been ordered to pay the amount he expended in publishing his official report to the Secretary of the Interior with reference to the extension of certain patents. This is not the case. Mr. Ewbank's accounts for the quarter are now before the accounting officers, and have not yet been acted upon. There is, therefore, as yet, no decision with reference to the validity of the items complained of.

[The official report mentioned here, we have made some enquiries about, and find it to be very different from the idea conveyed in the above. It relates to the publishing of the report in a number of papers in different parts of the country, for which they were ordered to send their bills to the Patent Office. Charges were preferred against him for this, we believe, but we always thought that he did not intend to charge the Patent Fund with it, as it related to his own business. We therefore concluded that the charges were preferred in a mistake. However, we are not acquainted with private doings in the matter, and do not pretend to "be wise beyond what is written."

## Incrustations on Steam Boilers.

The incrustations which form in the interior of steam boilers have given rise to much discussion, and many substances have been recommended for the purpose of obviating a result attended with so much difficulty to the engineer.

Several attempts have been made to deprive water of the saline matter which it holds in solution before it is introduced into the boilers, but these have been without effect, and the main object seems now to be to prevent the incrustations adhering so firmly to the boiler that their removal will not be attended with much trouble.

Coal tar was recommended a year or two ago in the Scientific American, I believe, as being most effective in preventing these incrustations; but little notice seems to have been taken of it, and potatoes, sugar, &c., were recommended and tried, but did not entirely succeed.

In the city of Louisville, where the water is more highly charged with lime than it is in many other places, this inconvenience is severely felt; there, after a trial of various substances, they find the coal tar to succeed better than any other article.

The following is the manner of using it: after the boiler has been cleaned, about one pint of the tar is introduced into it, after which it is poured into the heater, and thus reaches the boiler. In Louisville, one pint a week, introduced into the heater, is sufficient for a double flued boiler twenty-eight feet long.

During the use of this substance the lime is found in the boilers in large flakes, or if not absolutely loose, is removed by the application of the slightest force.

In one establishment this agent has been used for a period of six months, and in another for more than a year.

Coal tar is a very economical substance for this purpose, especially in cities where gas is manufactured from coal.

CHARLES W. WRIGHT, M. D.  
Cincinnati, 1851.

## Good Parsnips.

Parsnips are an excellent vegetable, both for the table and for the feeding of farm stock. We believe our farmers do not pay so much attention to the raising of this root as they should do. We have lately received a sample of a few from Mr. Wm. Taylor, of Schenectady, N. Y., of the English kind, which are of a very superior flavor, and far better than those which are common among us.

## Improvement in Making Flour.

Whatever adds to or improves the quality of anything useful to man is of great importance, and is particularly worthy of attention, especially when the improvement relates to such an article as the "staff of life"—flour. An improvement relating to our improved system of milling has lately been somewhat prominently brought under our notice in a pamphlet published by the inventor and patentee, Mr. D. P. Bonnel, of Tecumseh, Michigan.

This improved process consists in separating the starch from the glutinous substances contained in the grain, and submitting the latter to a second active grinding or scouring process. This is effected by placing a set or run of auxiliary mill stones, (under a very rapid motion, from 300 to 500 revolutions per minute,) so as to intercept the whole body of the offal on its passage from the first or superfine bolts, to the return or duster bolts. The auxiliary mill may be adapted in size to the work to be done; a stone 36 inches in diameter being sufficient for a common 4 run mill. It should be driven with a spur wheel or gearing of some kind, as a belt is liable to slip and lose motion. The eye of the stone should be made very conical, and the irons put in so as to leave as much room in the eye as possible—the whole of which should be covered with smooth sheet iron or tin. The stones should be strongly banded, hung and balanced very nicely, dressed true and smooth, with a pretty large proportion of deep furrows about the eye or centre. The feeding is supplied and made very uniform and perfect, by substituting a large funnel for the common "hopper, shoe and damsel." Around the tube of the funnel is cut a screw which passes through a nut set immediately over the runner's eye. This tube reaches down in the eye of the runner until it comes nearly upon the top of the bale, which should be formed so as to fit, or nearly so, the opening of the tube; then, by turning the funnel, the screw widens or contracts the opening at the top of the bale, admitting more or less feed, as desired.

In using this improvement, the first grinding should be done with reference to the starch entirely, always being careful to reduce no part of it so fine as to destroy its granular qualities. This done, the bolting is free, and the starch is bolted out in passing through the first or superfine bolts. The remainder of the stuffs is sent directly to the auxiliary mill, where it is ground to any degree of fineness the miller may desire. It is then passed through the lower merchant or duster bolts, and such portion of it sent back to the same as may be necessary, until all the flour is brought out clear from "speckula," when it is continually sent to the cooler or first bolts, to be uniformly incorporated with the superfine flour.

This method of a second grinding is stated to make better fine flour out of fewer bushels of wheat than by the old processes. This we can believe, much of the real muscle producing food being lost in the bran; it is not the whitest flour that is the best by any means. In the United States we have 8,000,000 surplus barrels of flour annually, and this must find a market somewhere. In Europe, we have to compete with Russia and Germany, and it is only by improvements in milling that we can expect to compete with them. This is a subject worthy of the most earnest attention of our millers and farmers.

## The Great Bell at Notre Dame.

The large bell of the Cathedral of Notre Dame was rung on Good Friday, after a silence of three years, caused by repairs in the belfry. A large crowd assembled on the Parvis to hear it. The bell is called Emmanuel, was cast in 1682, and Louis XIV, named it in the christening ceremony. Formerly sixteen men were required to ring it, but owing to an improvement in the hanging, four now suffice. The relics of the Cathedral were, on Good Friday, carried round in solemn procession after a sermon of the Abbe de Ravignaa. The President of the Republic was present, and there was a vast congregation.

## Copper Boilers.

It is stated that copper boilers are henceforth to be used on board the steamers of the Royal Navy, as their greater durability has been found to render them cheaper in the end than iron boilers, of which the first cost is small.

M. Gaysa, a Hungarian traveller in Africa, has discovered the tomb, quadrant, &c., of Jaques Compagnon, a French traveller who was lost in the interior of Senegambia, in 1760.