

criticise; which worships material forces in every shape and form, which despises conventional conditions, yet is slavish to ignoble fashions, and which takes recklessly at second hand any old or new clothes philosophy that may be imported from Europe, yet, while wearing the raiment openly, mocks and ridicules the civilisation that wove the fabric."

It is a very trite observation that, of all the species of travel, that which has for its object the judgment of the morals, manners and institutions of a country is the most liable to error: Who has not read of M. Petion, who was sent over from France to acquire a knowledge of English criminal law, and who is said to have declared himself thoroughly informed upon the subject after remaining precisely two-and-thirty minutes in the old Bailey? Whether or not Mr. Robert Buchanan is an equally valuable authority upon the people and institutions of America, I am not prepared to say, speaking from personal knowledge; but one cannot fail to be impressed with the one-sidedness, if not something worse, of the foregoing quotation; and one cannot but hope, too, that Mr. Buchanan's genius is as great as a poet as it appears to be that of a peevish critic. Why, it may be once again asked, do opponents to Freethought always bracket it with everything that is objectionable and vicious? Where is the justification? In the points alluded to by Mr. Buchanan, where is the identity between the lack of a national literature and Freethought; between church-going and moral sanctions; between political corruption and the freest and fullest investigation upon all subjects; between seeking to improve our condition by scientific means and the so-called worship of material forces; and as to the old clothes philosophy—perhaps Mr. Buchanan would make a better "professor of things in general" than even poor foggy-headed Herr Feufals-droch! Who does not know that, in every period in the history of English literature, the pens of Freethinkers have adorned it most, and also the literatures of most nations? and that Freethinkers generally have been the most uncompromising foes to any abuse? Mr. Buchanan, poet and critic, when next you go to Christchurch, carefully scan the ladies' bonnets, and you may therein read a most powerful moral, which was used to advantage by even a greater poetical genius than yourself.

FREE LANCE.

## Science Notes.

M. Dicuafait, in a paper presented to the Paris Academy of Sciences, states that the Equisetaceae, and other typical plants of the carboniferous age, contain a much larger per centage of sulphur than those of the present time; a fact which he thinks affords an explanation of the presence of sulphur and sulphate of lime in coal, and indicates the plants from which it was formed.

Another electric launch has been tried with success on the Thames,—the object being to prove its suitability for police service,—the ordinary steam launch, or row boat giving too plain an evidence of their approach to make them valuable for detective work. The power can be utilised in the production of a brilliant light, which will search the waters for many yards ahead.

The recent earthquake calamities in Spain have drawn considerable attention to the question of strength and suitability of buildings in countries subject to earthquakes. Mr. Brunton, C.E., who has had large experience in building lighthouses on the coast of Japan, states that it is a mistake to erect buildings of lightness, and consequent loss of strength, and that in the great earthquake of Naples, 1857, the best built and heaviest masonry houses escaped uninjured. The Campanile of Atena, a square tower ninety feet in height, and twenty two feet square at the base, remained erect, without a single fissure, while the buildings around were levelled with the ground.

It seems to be a fact beyond dispute that the average amount of rain recorded in London is considerably above what it used to be. The average for London used to be put down at 24 inches; it is now just about 25. Whether this is due to greater accuracy of observation, or is really an increase, we cannot say. The rainfall for the whole kingdom is now reckoned to be over 36 inches.

The Russian Government has ordered from a Paris balloon factory two elongated silk balloons, in order to experiment on their direction by electricity. The Italian Government has also ordered two silk balloons, equipped with telephones, etc., for captive ascents.

The daily receipt and delivery of about 20,000,000 bushels of grain in one city alone, like Chicago, has called into operation a character of invention singularly adapted to the object in view, wherein the grain is treated pretty much as a fluid, and capable of being received and discharged in a similar manner. In this way the grain is pumped up and moved along in any direction, from the place of deposit or receipt to the point of delivery, through spouts, shoots, and orifices, by means of drag-belted and other appliances, and in troughs termed conveyors, the latter being sometimes used at distances varying from 200 to 300 feet from the main elevator building.

Emery is a mixture of corundum and oxide of iron; corundum itself is alumina, with a little silica. Sapphire and ruby are corundum in its purest form, slightly tinged with iron oxide. In a less pure state, corundum is found in many places, and is then valuable only for commercial purposes. The emery beds of most importance are those situated in Turkey and Asia Minor. The material takes its name from Cape Emery, a promontory in the Isle of Maxos, where there are considerable deposits.

## New Zealand Reminiscences.

RECOLLECTIONS OF KOWHAI NGUTU  
KAKA.

BY HIMSELF.

[ALL RIGHTS RESERVED.]

(Concluded.)

I think that the Roman Catholic wizards would all have been makutued (bewitched to death,) in spite of priests and tohungus, by the two other hapus (families) of this tribe of wizards had it not been for the intense hate born by the first two hapus against each other; he jealousy of these necromancers burnt so fiercely. Later on, these laws were added to. We were to repulse all pakeha settlers and settlement in our country. But we had not, as a race, become so infatuated as to listen to all they told us to do, as they appeared to wish to interfere with our tribal laws, which suited us, if they did not suit them. Besides, as I said before, some amongst these missionaries had thrown aside reserve, and had commenced buying land, and so the elements of discord were sown amongst us, and some of the older men quivered like a spear that is shaken by an angry man. I remember hearing that one season a native of our village who had been created a teacher of the new witchcraft, broke our law with a betrothed maiden, and then took shelter with his chief wizard missionary. The tribe settled to ask for him, fully expecting that as he had broken their own commandments about taking other people's goods, to say nothing about his having broke our laws too, that no difficulty would present itself. But this wizard missionary (and a very ignorant man he afterwards proved to be) would not give the transgressor up to be punished, and spoke to us of a woman who had sinned, and was going to be stoned to death. That settled the question, and they dragged the Maori who had committed the wrong to the clear place in the middle of the village, where he was speared through and through by the young chief to whom the young woman