

Windyhill, but they never summoned courage sufficient to make another visit to the lovely Anabella.

Such, reader! is a faithful sketch of the incidents which two young gentlemen of talent and promise encountered while on a benevolent excursion. It seems hard that fortune should deal so capriciously with the feelings and best interests of mortals here below, but no doubt it is to inspire them with fortitude to enable them to fulfil their high destiny.

PALEMON.

TO OUR READERS.—The Canadian Family Herald will in future be published by Mr. Charles Fletcher, Bookseller, No. 54, Yonge Street. It is kindly requested therefore that all communications intended for the Herald be addressed to the publisher, in order to prevent confusion, or delay in attending to them.

CANADIAN FAMILY HERALD.

TORONTO, SATURDAY, FEB. 21, 1852.

ART IN THE PROVINCE.

Under this head, in the sixth number of 'the Herald, we gave a slight description of a seal executed by Mr. Wheeler, of King Street, for the Western Insurance Company. Again we have the pleasure to announce another contribution from the burine of that gentleman. This seal is smaller than the last, being only about two inches and a quarter in diameter. This is however equally happy in design and successful in execution. It is intended for a new Canadian Insurance Company to be established in Hamilton, under the title of the "Ontario Marine and Fire Insurance Company." The shield is represented as leaning against a capstan, beside which stands on the dexter side a mariner in full go-ashore rig, leaning his left on the capstan, and standing as it were behind the shield. On the sinister side, and as if in front of the shield stands Justice with the scales in her left hand and a sword in her right. The charge in the chief of the shield is a house in flames, in the bottom—emblematic of the title of the Company, is a ship in a storm. On a fesse gules, is a beaver between two maple leaves. The crest is the winged lightning, and the motto,—BE PRUDENT AND SAFE. The figures are both very neatly executed, and the design of the whole is exceedingly appropriate. Some one large in the suggestive faculty has hinted to us that now would be a very proper time to say, that as we have no long line of ancestral grandeur to look back to, in connection with the affairs of the Province, there are still two gentlemen of sufficient mark whose names are so intimately interwoven with the early history of the country,—who are so identified with its civil and religious associations as to have their names handed down with its future history. It is conjectured that a medal having on one side an effigy of the Venerable Bishop of Toronto, and on the other an effigy of Chief Justice Robinson, would be a most befitting memorial of these two gentlemen, who have endeared themselves to a large circle of friends throughout the province, both by their public usefulness, and their

private worth. We have consulted Mr. Wheeler on the subject and find that if a hundred subscribers will come forward he could furnish such a Medal, of silver, about two inches and a quarter or so, for four dollars a-piece. We are satisfied that Mr. Wheeler could catch the likeness to a shade, and hope therefore that some of our public men will take the matter into their immediate favour. Several gentlemen have already signified that they would countenance such a movement, and as in the ordinary course of nature the two gentlemen must give place by and by to others, what may be done should be done apace.

Answers to Correspondents.

EMMA. A VALENTINE. It is evident your Valentine has taken a poet's license, with one of the letters of the alphabet. C is not in any instance we at present remember of pronounced like K when used as an initial letter and immediately followed by the vowel i, unless in such proper names as Cidber. The plain English of the phrase alluded to, when viewed thus is—I long to kiss you—which Emma may either take as a compliment or not, as best suits her fancy.

Toronto Mechanics' Institute.

On Friday evening, T. Henning, Esq. lectured on Astronomy, in the Mechanics' Institute, and explained Foucault's pendulum experiment by which the rotation of the earth is demonstrated. In the opening of the lecture he gave a brief sketch of the Solar System, making pointed allusion to the new planets which have been recently discovered performing their revolutions between Mars and Jupiter. These discoveries were made by M. Gasparis of Naples, and Mr. Hind, of London; the latest so recent as the 29th July last. The lecturer here referred to a principle lately discovered by Kirkwood of Pottsville, Pennsylvania, for ascertaining the size of the planet which has been broken up, and now forming these fifteen asteroids. Between every two adjacent planets there is a point where their attractions are equal. If we call the distance of this point from the sun, the radius of a planet's sphere of attraction, then Mr. Kirkwood's law is, that in every planet the square of the length of its year, reckoned in days, varies at the cube of the radius of its sphere of attraction. According to this law, the planet between Mars and Jupiter must have been a little larger than Mars, or about 5000 miles in diameter, and the length of its day about 57½ hours. The discovery by Mr. Lassell, of Liverpool, of the Satellite Saturn was noticed. It appears that the latter was observed on nearly the same day by Mr. Bond, of the Cambridge Observatory, Mass. The Messrs. Bond have also discovered a dusky ring, interior to the well known rings of Saturn, which was subsequently seen by Messrs. Dawes and Lassell, of England. Hitherto Saturn's rings, have been considered to be solid bodies, like the planet itself. But the Messrs. Bond regard the rings as fluid, and constantly dividing, re-uniting, and dividing again. Prof. Pierce, of Harvard University and some others think the theory a correct one and add that no solid ring can encircle a planet. The lecturer referred to the theory of Professor Olmsted, of Yale College, in regard to the Aurora Borealis, and stated that the Professor dissatisfied with the attempts which have been made to account for the origin, or to explain the phenomena of the Aurora from either Electricity or Magnetism, or from any other cause of a terrestrial nature, arrived at the conclusion that the origin is *cosmical*. He infers that the auroral

body, is a nebulous body of light, semi-transparent, inflammable and magnetic matter, revolving around the Sun. He thinks that there are many such collections of nebulous matter diffused through the planetary spaces. The lecturer then proceeded to explain Foucault's pendulum experiment, and stated that it was only a new proof of an old discovery. The occurrence from which M. Foucault was led to his discovery, is thus related by himself: "Having fixed on the arbor of a lathe and in the direction of the axis, a round and flexible steel rod, it was put in vibration, by detaching it from its position of equilibrium and leaving it to itself. A plane of oscillation is thus determined, which from the persistence of the visual impressions, is clearly delineated in space. Now it was remarked in turning round with the hand, the arbor which formed the support of this vibrating rod, the plane of oscillation was not carried with it, but always retained the same direction in space." From this came the conclusion, that a pendulum set in motion, will continue in the same plane of vibration, however the point of suspension be rotated, a fact which the lecturer demonstrated by a simple trial with a weight at the end of a cord. The rotation of the point of suspension, may make the pendulum revolve on its axis; but the plain of vibration remains the same. Indeed this is necessarily so from the forces at work. Different methods of suspending the pendulum have been adopted. Foucault used a fine steel wire inserted into a hole, just large enough to receive it, made in a steel plate fastened to the ceiling. The greatest length of the pendulum wire hitherto employed, was that of 220 feet at the Pantheon in Paris. The pendulum at Bunker Hill Monument, was 210 feet, and so on down to 5 or 6 feet. The weight of the Ball has also been various, ranging from 2 to 80 or 90 pounds. The wire used on the present occasion, was 14 feet in length, and the ball 5 lbs. in weight; and with those the experiments made, were successful. Mr. H. then said that if a pendulum is put in vibration, it is seen gradually to change its position in reference to the points of the compass, moving from left to right. The rate of this angular motion, is different in different places, being proportioned to the sine of the latitude in which the experiments is made. At the poles, the problem is very simple—the plane of vibration remaining constant, and the earth turning under it at the rate of fifteen degrees an hour, its angular velocity of rotation. At the equator, the pendulum plane being always parallel to the meridian, no relative angular motion can be shown. Between the equator and the poles the time required for the pendulum to make 360 degrees varies according to the latitude, being greater, the farther from the poles. We understand that Mr. Henning has been requested to give another lecture on the pendulum and has so far consented. He was listened to with great attention, although the technicalities of the science were perhaps too freely used.

Literary Notices.

APPLETON'S MECHANICS' MAGAZINE. January and February, New York, D. Appleton & Co.; Toronto, A. H. Armour & Co.

This very useful and instructive journal has, with the present numbers, made its appearance in an enlarged style. In the quarto form, there is much more scope for the display of diagrams, and subjects introduced can thus be more amply illustrated. In the January number there is a very neatly engraved section, on a large scale of the steamers *Panzer* and *City of Pittsburg*, two screw steamers intended for the Philadelphia and Liverpool trade. The engravings were furnished by Mr. Ruaph, the designer of the work, and may therefore be relied on.

The *City of Pittsburg* is a three deck ship. On the upper deck, above which is a spacious promenade deck, is the grand saloon, with windows