A represents the apparatus before it has touched the bottom;

B the bullet falling through the shock of the apparatus against the ocean-bed, which causes the disengagement of the rope, owing to the change of position of the lever a.

Brooke's deep-sea sounding-apparatus has already furnished the investigator with some remarkable results; and enabled Captain Maury, formerly the director of the Washington Observatory, to construct his beautiful orographical chart of the basin of the Atlantic, which, in accuracy, is probably not inferior to the best executed maps of Africa or Australia.

In the direction of its length, the basin of the Atlantic is, it seems, a kind of trench, or immense furrow, separating the Old World from the New. From the summit of Chimborazo to the bottom of this great valley the vertical distance is between 42,000 and 44,000 feet. The lowest point is probably to be found between the Bermudas and the Great Bank of Newfoundland, but its exact depth is still to be determined.

If the waters retired, says Maury, from this deep gulf, the skeleton of terra firma would be to a certain extent laid bare, and among the tossed and twisted sinuosities of the ocean-bed we should perhaps discover the remains of innumerable wrecks. Then would be revealed that terrible mixture of human bones, débris of all kinds, heavy anchors and precious pearls, whose fantastic image has perturbed so many dreams.

[The reader will remember Shakspeare's appalling picture of the weird scene:—\*

"Methought I saw a thousand fearful wrecks;
Ten thousand men that fishes gnawed upon;
Wedges of gold, great anchors, heaps of pearl,
Inestimable stones, unvalued jewels,
All scattered in the bottom of the sea:
Some lay in dead men's skulls; and, in those holes
Where eyes did once inhabit, there were crept,
As 'twere in scorn of eyes, reflecting gems,
That wooed the slimy bottom of the deep,
And mocked the dead bones that lay scattered by."]

The question is sometimes asked, Of what use are these deep-sea soundings? We can only reply as Franklin did, in reference to the first aerostatic discoveries: Of what use is the infant when just born? Every physical fact is interesting in itself; it forms a link destined to unite sooner or later with other links, and conduct us to some useful truth. The importance of these soundings has already been justified by the indications they have furnished for the laying of submarine cables.

At the bottom of the Atlantic exists a remarkable plateau, or table-land, which extends from Cape Race, in Newfoundland, to Cape Clear, in Ireland, over a distance of 1800 miles and a breadth of 420 miles. Its depth, throughout its whole extent, is computed at 3200 to 4300 yards on an average. Upon this telegraphic table-land, as it has been called, rests the great Atlantic cable. Its surface has been frequently