

our sense of smell thus far surpasses that of the other senses. The minute particles of a substance which we perceive by smell would be quite imperceptible to our taste, and if they were in a solid form we should never be able to feel them, nor to see them, even if illuminated by the strongest sun-light. No chemical reaction can detect such minute particles of substances as those which we perceive by our sense of smell, and even spectrum analysis, which can recognize fifteen millionths of a grain, is far surpassed in delicacy by our organ of smell.

The development of the sense of smell is even more astonishing in animals than it is in man, and plays a very important part in their organization. Hounds will recognize by smell the trace of an animal perfectly imperceptible to sight. But the acuteness of their sense of smell is far surpassed by that of the animal itself, which is able, when the wind is favorable, to scent the huntsman a distance of many miles. The number, therefore, of those volatile substances which are perceived by animals at such great distances must be inconceivable. Their minuteness defies estimation.

PROF. BERNSTEIN.

COAL AND DIAMONDS.

IF the reader wishes to picture to himself the scenery of what is now central England, during the period when our coal was being laid down, he has only, I believe, to transport himself in fancy to any great alluvial delta, in a moist and warm climate, favorable to the growth of vegetation. He has only to conceive wooded marshes, at the mouth of great rivers, slowly sinking beneath the sea; the forests in them killed by the water, and then covered by layers of sand brought down from inland till that new layer became dry land to carry a new crop of vegetation. He has thus all that he needs to explain how coal-measures were formed. I myself saw once a scene of that kind, which I shall be sorry to forget, for there was, as I conceived, coal making or getting ready to be made before my eyes—a sheet of swamp sinking into the