

MANGANESE. where it is found in joints, veins and blotches, varying from a quarter of an inch to five inches in thickness. A certain quantity of ore has been shipped from these workings.

Nova Scotia.

The same geological conditions are observed at Bear brook and at a deposit east of Noel river, where some preliminary work yielded small quantities of pyrolusite.

In Hants county other occurrences of crystalline manganese ores, more or less important have been noticed at Douglas, Rawdon, Goshen and other places. Bog manganese occurs near Goshen, south of Cheverie, at the head of Bass creek.

*Colchester County, East Onslow.* At this place is the most important deposit of manganese now known in Colchester county. The ore occurs in the joints and bedding planes of old Devonian quartzite. In some places the ore which consists mainly of pyrolusite, is a foot thick; some manganite and psilomelane are also encountered. Operations were begun on this deposit in 1886 or 1887 and have since been carried on intermittently. The principal workings consist of a shaft fifty five feet deep, and a large irregular cut.

*Valley, Manganese Mines.*—At Manganese Mines near Valley, a quantity of black oxide of manganese is found in irregular veins cutting a reddish, slaty rock, which underlies the Carboniferous limestone.

*Farholm's Mill brook.*—From the appearance of the occurrence of manganese at this place the deposit is a contact deposit between grey, rusty, concretionary, massive Carboniferous limestone and Devonian rocks. The ore occurs mostly in pockets in the limestone which also contains disseminated hematite, giving the rock a mottled weathering appearance.

Other occurrences of manganese ores have been noted on both shores of Minas basin in Colchester county. At Black Rock mine, near Clifton, at the mouth of the Shubenacadie river some work was done on a deposit in limestone. The ore which was of a ferruginous and magnesian nature was found in small quantities.

On the north shore of Minas basin at Lower Economy several barrels of fine crystalline pyrolusite were obtained in 1891. The occurrence is similar to those of East Onslow.

Besides the above occurrence, manganese is also found in large quantities associated with the important deposits of iron ores of Londonderry iron mines. The iron ore is found as veins of brown hematite