

chromium is also indicated by the frequent stains of green oxyd of chromium, either on the surfaces or impregnating many of the rocks of the magnesian series, especially some of the dolomitic or bitterspar bands.

#### NICKEL.

Nickel has been detected by analysis in several of the serpentine and dolomitic rocks of the island. Quite an extensive deposit, consisting of several varieties of the ore, viz.: Copper-nickel, cloanthite, millerite and gerorffite, were found in a vein of dolomite, or bitterspar, intersecting the chloritic lode rock of the Union Copper Mine at Tilt Cove. Between the years 1869 and 1876, both inclusive, 411 tons of nickel were shipped from Tilt Cove, valued at \$32,740. Since that date, no returns of any ore having been shipped are on record.

#### COBALT.

Cobalt occurs, sparingly associated with the nickel ore, at Tilt Cove. Cobalt bloom was observed at one or two places, as a stain or incrustation on the rocks.

#### ZINC.

Ores of zinc, including most of the more common varieties, viz.: blende, zincite, and calamine, occur in several localities, as at Tilt Cove, Placentia and Lawn. Nowhere, however, as yet, has it been found in any considerable quantity, such as to render it worth mining for itself alone. Red oxide of zinc, from the Lawn mine, yielded on analysis, traces of bismuth and cadmium.

#### CADMIUM.

Traces of, in zinc blende, from Little Lawn. [Analysis, No. 5].

#### LEAD.

The ores, of lead, chiefly galena, are disseminated throughout almost every rock formation in the island, generally in quartz and calcspar veins. Numerous small quartz veins containing this ore occur on the Peninsula of Avalon especially in the Huronian formation. Several attempts at working these ores were made many years ago but in most instances with but poor success. The most promising and best conducted mine yet opened is situated at a place named La Manche at the head of Placentia Bay, the property