It is possible that the capsules, when such are found, can give better characters.

Collected on the shore of Baffin Land, west of Greenland. August 18th, 1904, by Commander A. P. Low. No. 329.

## 33. GRIMMIA GRANDIS.

Leaves smooth, carinate and ovate-lanceolate acuminate acute, wholly recurved at one side, neither crisped nor appressed when dry; the lower very small; cells not sinuous, nearly all short subquadrate, the alar short-rectangular, costa smooth; hairpoint faintly rough often longish. Tufts loose, in the upper part green, fuscescent below. Stem to 5 cm. high, much branching, naked below. Capsules and flowers not seen.

Differs from G. clatior in the leaves being smooth, etc.; in G. elata, Kindb., resembling in habit, lower leaf-cells are very long and linear.

On rocks at the head of Lake Louise, eastern slope of Rocky Mountains, Alta., altitude 6,000 feet, September 13th, 1904. No. 17.

## 34. GRIMMIA (PSEUDO-RACOMITRIUM) ELATA.

Leaves quite smooth (not papillose as in G. clatior), ovate lanceolate acuminate-acute, carinate, recurved below to the middle on both sides, neither appressed nor crisped when dry; upper cells quadrate not sinuous, middle suboblong faintly (or not) sinuous, basal long-rectangular, alar wider but generally short-rectangular and often hvaline in several rows; costa smooth; hair-point long and denticulate. Capsule (old) oblong, not or scarcely exserted. Diœcious. Plants robust, 3 cm. high loosely tufted (but cohering), brownish with green branch-tips. Habit of Grimmia elatior.

On rocks along Hunker Creek, Yukon, July 26th, 1902. No. 108.

## 35. GRIMMIA OVATÆFORMIS.

Agrees with G. ovata, Weber & Mohr. Tufts low and compact; capsule small and smooth with straight pedicel; leaves recurved, not large, nearly appressed when dry, the upper narrow with long hairpoint.

Differs in nearly all leaf-cells very sinuous, the alar long-

rectangular; calyptra cucullate; diœcious.

G. attenuata, C. M. & Kindb., resembles it in leaf-cells, but differs in having larger leaves and also looser and higher tufts.

On rocks at the head of Lake Louise, eastern slope of Rocky Mountains, Alta., altitude 6,000 feet, September 13th, 1904. No. 19.

(To be continued)