

reached; and there too, the branch-stream just mentioned falls into the main river, which by this has travelled some fifty miles from its source.»

Thus Graham Sandberg's hydrography clears up by degrees. His standpoint is very much like Nain Sing's and Montgomerie's. But he points out that Maryum-chu is only a branch-stream joining the mighty Tamchok-kamba. From the confluence to the source he gets the same distance as Montgomerie, or 50 miles, which is quite correct whether the source of Chema-yundung be placed at Tamlung-la, as Montgomerie has it, or at Chema-yundung-pu, where Sandberg, to judge from his description, has placed it. In the essential point, however, he is wrong. He regards the Chema-yundung, just as Nain Sing and Montgomerie, as the upper course of the Tamchok-kamba. And he does not know the existence of Kubi-tsangpo. He does not say where the Tamchok-kabab itself is situated, only that the 200 first miles from the source the river »still carries its ancient title Támchhok Khábab», which, however, in reality is Tamchok-kamba, for *kabab* means source.

Still more important and interesting than his chapter on the source of the river is Sandberg's map: *Sources of the Yeru Tsangpo or Tamchhok Khabab*, which was published in 1896 (Pl. XIX).¹ It seems to be compiled from all material existing, combined with the information quoted in this chapter. The sources of our three great rivers, the Indus, Satlej and Brahmaputra, are all entered on the map. Respecting the source of the Indus he is so far correct that he does not place it on the Kailas, but has removed it a considerable distance to the east and south. On his map it takes its rise on the northern slopes of the range Gang-ri Gur-gyab. The Satlej goes out from the Rakas-tal, Ts'o Lang-ngak, and there is a communication between both lakes. From a glacier on the northern slope of the Gurla a brook goes down to the Manasarovar, called Lang-ngak glacier, a name that I never heard of in this region, and which is obviously a mistake. The brook called Tak Glacier which enters the Manasarovar from S.E. is, of course, Tage-tsangpo. The Tamchhok Khabab, finally, is formed by some eight brooks, all of about the same size, and each coming from a glacier. A comparison with my map will show that this representation has no likeness with reality. The text is even better. The whole region where the brooks join he calls Tyema Yungdrung, and the range to the south is called Nyinmo Namgyal.

In 1906 Sir GEORGE GOLDIE says in his address *Twenty-five years' geographical progress*:² »The recent Tibet expedition practically settled the question of the sources of the Brahmaputra, and laid down its central and upper course.» So late as in 1910 Major R. L. KENNION in his entertaining book³ still regards »the

¹ The Calcutta Review October 1896, where Sandberg has printed an article: »The great river of Tibet: its course from Source to out-fall», p. 219 et seq. The chapter of his book quoted above is word for word the same as this article.

² Geographical Journal October 1906, Vol. XXVIII, p. 379.

³ Sport and Life in the Further Himalaya, Edinburgh and London 1910. There is no geography whatever in this book.