

material would seem to be derived from the morainic débris. The reason why the dunes have accumulated at the foot of the highest mountain-mass in the region is to some extent the obstacle which this mass raises in the path of the regular winds. All the same it is not impossible, that when the glacier streams are more than ordinarily swollen they carry both gravel and sand down to the lowland west of the great mountain-mass, and that this same material, after being duly sifted and sorted, returns towards the source from which it originated in the form of dunes.

The great glaciated mass sends out, as I have already said, several glacier arms, the largest of them towards the north. In this direction the arms are three; but the two eastern ones, which embrace between them a series of black rocky pinnacles, soon unite and form an ice-stream, the left (western) marginal moraine of which is of extraordinary size. There were numerous marginal fissures, but we did not see any transverse fissures. The *firn* basin has a favourable shape, in that it forms a couple of huge saucer-like depressions or receptacles for the snow, while on the south it is protected by a lofty craggy ridge. The glacier arms which run down westwards are considerably less; in fact only one of them really deserves this name, the others are rudimentary. But tongues of the ice-mantle or ice-sheet hang down between the glaciers, as they do on the Mus-tagh-ata. All the glacier water runs away west, where it no doubt eventually forms a pretty large stream. In the N. 44° E. we saw the middle one of three dome-topped snowy ranges, which appear to mark the eastward continuation of the range we last crossed over. But no summit within sight was able to compare in point of altitude with the great glaciated mass. This is the last remnant of an ice-sheet which once undoubtedly covered the entire country. It is however vain to seek for other traces of that ice-sheet: there are neither erratic blocks, old moraine ridges (*âsar*) or glacial striations, nor anything of that kind, to be discovered anywhere. Yet this does not disprove the former glaciation, for the great and rapid denudation and disintegration which take place here not only will, but ought to, account for the absence of all such relatively evanescent indications of a general condition which ceased once the climate became drier. The glacial mass that now survives rises therefore like an *insula relicta*, a fragment of an immense ice-sheet, that has now all but entirely disappeared. No doubt it formed for a long period a central node from which ice-streams flowed down towards the west; but of these all that now remains are the fragmentary tongues we saw. These are exceptionally steep, indeed in their lower parts precipitous, and they terminate a few hundred meters above the bottom of the valley, which itself lies at an absolute altitude of 4,880 m. The ice and perpetual snow, which still cover this great mountain-mass, protect it against disintegration, and will in this way preserve it, so that it will long continue to be the culminating summit of the entire region.

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