

with a devotion and tenacity unknown to the degenerate Yaghan or the loose-living tribes of the Patagonian mainland. So it has come about that the impress of that land is stamped deep and clear upon them. Surely they are worthy of some little heed before they vanish for ever from our view; a race whose past is the tale of a continent, and their future—silence.

TIBET.

I. THE ROADS TO TIBET.

By DOUGLAS W. FRESHFIELD.

THE following pages are an attempt to give, in a concise and convenient form, some of the information we possess with regard to the region and the roads likely to be traversed by British troops within the next few weeks. Most of this information has been gathered in the works of travellers and surveyors, from the narrative of Turner, and those of Bogle and Manning (as collected and annotated many years ago by our indefatigable President), down to the excellent *Routes in Sikkim* compiled mainly for military purposes by Captain (now Major) O'Connor, and published by the Indian Government for the information of travellers in 1900. I have been able to add, with regard to the Tista valley routes and the general character of the Tibetan uplands they lead to, some details from my own visit, four years ago, to the pastoral wilderness behind Kangchenjunga.

Tibet is a very large country, some 1100 miles in length from east to west, and some 900 miles in breadth from north to south. Its boundary is coterminous, in three different directions, with that of British India, counting the states of Kashmir and Sikkim as British India. The frontiers meet in the far east, where the Brahmaputra breaks out of the mountains through narrow valleys of which their wild inhabitants still preserve the mystery; they meet again in the far west, where bleak passes connecting lofty plains admit of passage along the chain of the Himalaya by a route followed from time to time by embassies from Kashmir bearing presents to the Dalai Lama.*

Between these points all but a narrow space in the centre is covered by the territories of Nepal and Bhutan, still inaccessible to European travellers and merchants. It is with this narrow central space alone, and the portions of Tibet adjacent to it, that we are at present concerned.

In the first place, I must ask the reader to dismiss from his mind and his memory many of the crude generalizations based on imperfect recollection of travellers' descriptions of other parts of Tibet that have

* The present Dalai Lama was born in 1874, and assumed temporal power over Tibet in 1893. He is not therefore, as is often assumed, a child.

been presented to the public eye in the last few weeks. The region beyond the Brahmaputra and the north-western deserts traversed by Littledale, Sven Hedin, Prjevalsky, and others have little in common with the country lying between the outer range of the Himalaya on the south and Shigatse and Lhasa on the north. In the district our troops have to traverse, the temperature is not always below zero during the winter months. Commerce is not exclusively carried on on sheep's backs, though sheep were occasionally employed, until an Abbot of Gyangtse discovered that to put them to such hard service was contrary to pure Buddhist tenets. So far from being enormous and extremely difficult, the journey from our frontier to Lhasa can be covered in eight days to a fortnight. The roads in the interior of Tibet between the chief towns are good mule-roads or tracks similar in character to an Indian by-road.

It would occupy too much space here, were it otherwise desirable, to enter into the chain of events by which the territory of Sikhim has been preserved from annexation by Nepal, and incorporated as a Protected State in the British Empire. I must, however, briefly define its boundaries.* From the point of view of the physical geographer, it is the district drained by the Tista and its tributaries, and the water-parting of that river forms its limits under the treaty with China and Tibet, ratified in 1890. Formerly Sikhim was, or was reputed to be, more extensive; in the map to Sir C. Markham's 'Tibet' (1876), it is made to extend far north beyond Kambajong. This cartographic extension was probably due to the fact that the Sikhim Raja had private property in this district, as he had also in the Chumbi valley to the east, but it is doubtful whether he has exercised any political power there since early times. On the other hand, before Great Britain intervened, Tibet was extending its influence over the villagers, Bhutanese by race, who dwell above the upper gorges of the Tista, and this influence extended as far as Chung-thang, at the junction of the two main sources of that river.† For present political purposes, Sikhim is the basin of the Tista. It stretches up beside Nepal very nearly, if not quite, to the Himalayan water-parting. On its east, between it and Bhutan, Tibet in turn possesses a long tongue of territory, the upper basin of the Ammo Chu, the next stream flowing towards India east of the Tista. Geographically the basin of the Ammo Chu belongs to Bhutan, but that country, politically, possesses only the lower part of its valley. The fertile upper basin has in times past been held alternately by Bhutan and Sikhim, and it is only comparatively recently that the Lhasa Government has succeeded in intruding itself there.‡ Neither

* For fuller details, see the *Gazetteer of Sikhim*, pp. 1, 2.

† See Waddell's 'Among the Himalayas,' p. 163.

‡ See Hooker's 'Himalayan Journals,' vol. ii. p. 111.

geographically nor politically has it any sound claims to come south of the Himalaya. Owing to these political boundaries, the trade route from India through Chumbi to Tibet, in place of ascending the valley of the Ammo Chu, crosses the ridge that divides that river from the Tista. This ridge is traversed by several native horse-paths. Of these the Chola was formerly the most frequented, while the bridle-road over the Jelep La has been recently improved and made good by British engineers.

Through these two strips of territory, bridging as it were the zone neutralized in war and closed to commerce in peace by Nepal and Bhutan, run two of the main high-roads—high roads in all senses of the word—from India to the chief towns of Tibet: Shigatse, Gyangtse, and Lhasa. Through the Tibetan strip runs what may be conveniently called the Chumbi route; through the British strip, Sikhim, what we may term the Lachen-Kambajong route.

It was by the Chumbi road that the Tibetans invaded Sikhim in 1886–8. It meets the historical road to Lhasa and Tibet, coming from Bhutan, by which Bogle, Manning, and Turner travelled at Pari, and the fortified town of that name, standing some distance below the water-parting and 14,000 feet above the sea, was in their time, and has been since, the chief gateway of Tibetan trade with India.*

The following sketch of these two routes may be helpful in following the British advance.

Our railway base is Siliguri, and not Darjiling. For Darjiling is a city set on a hill 7000 feet high, and to take men and stores up there in order to bring them down again to 700 feet would be obviously futile. From Siliguri a cart-road leads across the plain and up the narrow vale of the Tista for 30 miles to the Tista bridge. Last spring a line on the gauge of the North Bengal railway was surveyed as far as the spot where the Tista leaves the foothills; and, beyond this, the cart-track, which had been destroyed by floods in 1892, has been repaired and doubled as far as the Tista bridge. At this point the first climb begins; in 10 miles Kalimpong, and in 12 more Pedong (4000 feet), is reached. There the wheel-road ends, and the track henceforth is a fair horse-road. After descents and ascents innumerable, it reaches in 42 miles, or four stages from Kalimpong, the post of Gna-thong, 12,000 feet, where our troops were quartered through the winter of 1888. So far "the road is metalled in places and bridged throughout, and is passable to infantry, baggage animals, and mounted artillery without any difficulty."† Thence it is a day's march to Yatung, the

* There are, of course, other roads from India to Tibet through Nepal and Bhutan. These have been traversed, and described by Pundits, but are at present closed to Europeans and commerce.

† Where the source of quotations is not indicated, they come, as a rule, from the official 'Routes in Sikhim,' 1900.

Tibetan frontier, over the Jelep La, "the easy, smooth pass," 14,400 feet, the most frequented of several practicable passes leading into the Chumbi valley.

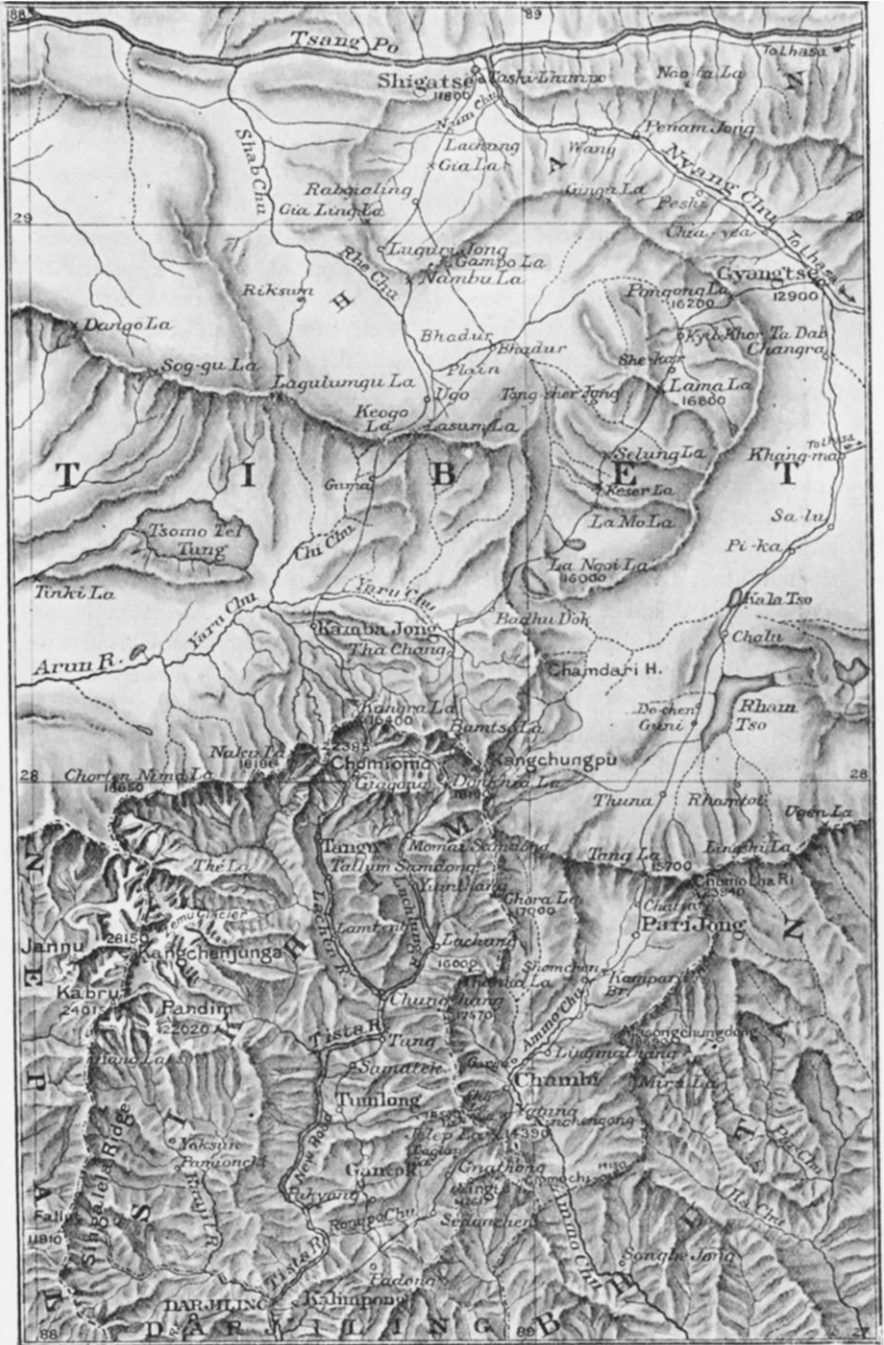
On the Jelep La may be seen the remains of the walls behind which the Tibetans hoped to stop our advance in 1888. The surrounding scenery is bare and rugged, resembling that of an ordinary Swiss mule-pass; the track such as those of the Furka and the Oberalp in the days before carriage roads. Seven miles of descent by a rough path, "regularly travelled by laden mules," leads to Yatung (11,000 feet), where is the house of the Chinese customs commissioner, a Tibetan guard-house, and "eighteen shops in four blocks, which were intended for traders, but are unoccupied except by the Chinese custom officials." This is the spot where the Tibetans are bound by treaty to keep open a trade mart.

Just beyond Yatung, which lies near the opening of a side valley, the Chinese frontier wall, a somewhat elaborate structure, but useless from a military point of view, is encountered. It is 15 feet high and 10 feet thick at the base, and supported by blockhouses. The valley now opens, and frequent villages occur; one of the largest is Rinchen-gong, with (according to the Route-book) fifteen well-constructed, two-storied houses, situated at the junction of the Yatung glen with the main valley. Mr. A. W. Paul thinks there are more. A mile or two further, 20 miles from Gnathong, is Chumbi, where stands the large three-storied building used as a summer palace by the Sikhim Raja before the British Government required him to reside within his own dominions. The mean elevation of this part of the valley is 10,000 feet, or 4000 feet below the Jelep La, which is the most formidable obstacle on the road to Gyantse or Lhasa. The late Mr. Louis has described Chumbi in his book, 'The Gates of Tibet,' as "the Engadine of the Himalaya." *

"The valley," he says, "is at an elevation of 9000 feet, but the climate is warm and dry, and the finest weather prevails there while Darjiling and Sikhim are flooded with rain and reeking with mist. The valley is about a mile in width, with the river and its numerous islets in the centre, eminently fertile everywhere, and highly cultivated with fields of corn and barley, while there are rich pasturages on the hill-slopes around it, dotted all over with clumps of fruit and other trees—a varied, rich vegetation quite different from that of Sikhim. There is good fishing to be had in the river, and the whole valley is, in fact, a lovely bit of smiling landscape, terminating on every side in snow-clad mountain-tops. Pervading it all is said to be an air of affluence and *bien être* to which the interior of Sikhim, rich as it is, can bear no comparison whatever." This picture may be somewhat overcoloured, but all authorities agree that Chumbi is by comparison a

* Mr. Louis, 'Gates of Tibet'; see also 'Round Kangchenjunga,' pp. 62, 63.

THE ROADS FROM SIKHIM INTO TIBET.



Scale of Miles
 10 5 0 10 20 30

Nat. Scale 1:1 500 000 or 23.67 miles. inch

pleasant, dry, and wholesome place. One of the few Englishmen who knows it tells me "our troops may winter there in a delicious climate, and find plenty of substantial houses." "A flourishing valley, where cultivation and grass are particularly abundant," writes another authority. Again, "The people of the Chumbi valley are prosperous, and the arable land of the valley is sufficient to support three times the present population."

From Chumbi to Pari is a distance of 21 miles, and an ascent of 4000 feet by a "road used at all seasons of the year by mule caravans." Many villages, one of 140 houses, are passed, and the road is barred (according to the Route-book) by a series of Chinese walls, which can, however, easily be turned by a hill path.

Pari is a considerable town, lying at the foot of a Jong or fort five stories high. According to Hooker, it was fifty years ago, "next to Darjiling, the greatest Tibetan, Bhutan, Sikhim, and Indian entrepôt along the whole Himalaya east of Nepal." "It contains 300 mud-walled houses and many shops, where provisions and clothing of all kinds are obtainable. Tobacco, cloth, and fruit, which are brought in from Bhutan, are to be had in the bazaar, and fish are said to be plentiful. Vegetables are scarce, but cattle are very numerous. No grain crops ripen in the vicinity, but wheat is grown for fodder and sold in the bazaar at two rupees per maund." Manning found the place "abundantly bare, bleak, and uncomfortable." Here tolls and customs are collected by the Tibetan authorities.

Beyond Pari the detailed description in the Route-book is quoted below. Illustrative passages might easily be accumulated from the narratives of the eighteenth-century travellers. The Tang La, 15,700 feet, the pass over the water-parting, from which a stream descends to the upper Brahmaputra, is a very mild affair; "a gradual and hardly noticeable ascent," it has been called.* Nor does any part of the track to Gyantse appear to offer any serious difficulty. The reader must bear constantly in mind that the "tremendous passes" and "stupendous natural obstacles" we hear of exist only in the imagination of writers who, not having realized the character of the Tibetan tableland, naturally think any pass of the height of Mont Blanc must deserve the strongest adjectives at their command. Beyond Pari the character of the landscape has completely changed. The charms of Chumbi are all left behind, and the traveller finds himself in typical Tibetan scenery. Cultivation is confined to the shallow valleys of the streams, where frequent villages are found. These are separated by rolling uplands, bare and brown except for a few weeks in spring, over which roam the *dokpas* or shepherds with vast flocks of sheep. The sun is hot by day when it is not overmastered by bitter winds, and the nights are very

* There is an alternative pass east of the Tang La which is said to be still easier and to be preferred after a snowfall, which leads back into the Tang La track.

cold. It is an inhospitable region, but one which has never formed a barrier to frequent intercourse between the dwellers in the pleasant valleys of Shigatse and Gyangtse and their southern neighbours. In 1888, according to Captain Iggulden, the transport of the Tibetan force on the Jelep La was "in first-class working order. They had 1000 yaks and 500 mules working supplies up regularly from Gyangtse, a large town in the interior of Tibet, where provisions are said to be plentiful."

Bogle, who travelled early in November, gives the following description of scenes on the road: "Our route continued almost due north, through valleys little cultivated and crowded by bleak and barren hills, between whose openings we saw distant mountains covered with snow. Here and there we saw a few houses, with some spots of rushy ground or of brown pasture, but not a tree or plant was to be seen." Again, "The . . . hills, although in many places abundantly steep and high, are so bare and sterile that they are left in a state of nature. The valleys only are cultivated, and the roads lead through them, which cuts off any climbing of mountains. Goods are chiefly carried on bullocks and asses; the corn is trod out by cattle, and ground by water-mills." I quote last the approach to Gyangtse: "The first part of our ride next day, the 2nd of November, was through the same bleak country we had hitherto met with; but the valley in which Giansu (Gyangtse) stands is extensive and well cultivated, and full of whitened villages; . . . altogether it makes a fine prospect."

Chandra Das furnishes a more detailed account of the valley at Gyangtse, which extends 70 miles in the direction of Shigatse.

"The Nyang Chu valley is one of the richest in Tibet; . . . every inch of it is cultivated. Its great natural fertility, and its being so very favourable for the growth of different kinds of millet and pulses, has given the whole district the name of Nyang, or the Land of Delicacies. Flocks of wild geese and ducks were swimming on the river, and long-billed crows were stalking about searching for food. From the bushes of furze and other plants with which the banks were overgrown hares leaped out and made off towards the mountain recesses, and beautiful little birds, probably a variety of kingfisher, were seen fishing in the river. In the village of Gyatski the people seemed very industrious, the woman engaged with their looms or spinning, the men tending sheep or collecting fuel from the fields."

This picture was drawn on January 4, in midwinter. To sum up, the distances on this road are as follows: Siliguri to Gnatong, 83 miles; Gnatong to Parijong, 41; Parijong to Gyangtse, 89 miles. Total 313 miles. Parijong to Lhasa, 203 miles, or 12 marches. Parties take, as a rule, a fortnight from Lhasa to the British frontier, but the distance can be covered in eight days by a quick traveller; from the British frontier to Gyangtse is a week to ten days' travel.

The alternative road through Sikhim to Tibet to that by Chumbi, the Tista valley, or Lachen-Kambajong route, does not admit of such simple and straightforward description. In past times it has abounded in variations, the chief reason for which was the extraordinarily precipitous character of the ravines to be traversed in the western or Lachen branch of the valley, and the absence of permanent bridges. Owing to this cause, the Lachen track, though it leads to the lowest and easiest access to the Tibetan upland, the Kangra La (or Kangra Lama La) (16,400 feet), was considered by the Tibetans a winter route, the torrents being at that season less impassable. In summer the yak caravans were forced to cross the higher Donkia La (18,100 feet), well known from Sir J. Hooker's visit fifty-five years ago, and come down the more open Lachung valley to the junction of the streams at Chungthang. Another side track leads over a series of high grass passes on the flanks of Kangchenjunga, and finally reaches Tibet by the Naku La (17,300 feet).

In 1899, when I was in this region, the Lachen gorge had been made passable, and the track, if very steep and narrow in places, and liable to bad earth-slides in others, was throughout passable for beasts of burden up to Giagong, where, some miles within our treaty frontier, the Tibetans had established themselves and built a wall. The object of this petty aggression was apparently to secure the control of the passes and the user of the wide pastures—a rolling country, “like Wiltshire downs,” writes Captain O'Connor—on which the springs of the Tista rise. More recently, however, my Sikhim friends inform me, this road above Chungthang has been very largely repaired, and provided with rest-houses and a telegraph line, over which, in September last, the officers of the Mission at Kambajong were able to send their greetings to Sir J. Hooker in a message which reached him on the same day. Readers of my recent volume will find a description and a criticism of the part of the road below Chungthang, as it was four years ago. The hope there expressed that a new road on a better line might be made has been fulfilled, and the old track practically abandoned. I owe to Mr. A. W. Paul, one of the first authorities on all matters relating to Sikhim, the following interesting facts as to the progress in roads up to last spring in the Tista valley.

A new road, lately constructed by Mr. White, the Political Officer in Sikhim, runs from Tista bridge along the left bank of the Tista to the Rungpochu, which it crosses on a fine bridge. Thence there is a branch—to be extended—to a point 4 miles below Gantok. The main road is to be carried on up the valley of the Tista, until it joins the old track somewhere beyond Ringem, probably between Samatek and Tung. A new branch bridle-road connects it with the Penlong La near Gantok.

A cart-road is also being pushed up to Laghyap below the Yakla. This is likely to be in the future the main Chumbi route, as the pass is easy and the descent on the further side being along a ridge and

not through a narrow glen, as in the case of the Jelep La, is preferable, and, owing to the absence of bridges, less liable to interruption.

Returning to Rungpo, there is a "level road" up the side stream to Rongli, on the Rhenok-Lingtu road.

The first pass to which the Lachen route leads, the Kangra La, traverses the water-parting between the Tista and the Arun, the great stream which, flowing to the plains of India, divides the block of Kangchenjunga from the "Mount Everest" or Chomokankar group. In its basin Kambajong lies. Chandra Das's description of this frontier fort and town may be quoted. It has been depicted in the *Sphere*, and it cannot surely be long before the public will be permitted to profit by the more recent accounts that must have been sent home by members of the Mission.

Kambajong lies 13,800 feet above sea-level, and is, according to the Route-book, "a circular fort 1500 paces round, built on the top of a small mound; the walls, 6 feet thick, are built of uncemented stones. . . . There are 50 soldiers and 15 or 20 inhabitants besides." Captain O'Connor passed within sight of it in 1896.

Chandra Das, who visited the place in 1879, is more picturesque. He writes—

"The fort of Khambajong is situated on the top of an isolated cliff. The fortifications rise in several storeys from the north-west foot of the cliff till they reach the summit, which they entirely cover. This castle, second only to the Shigatse Jong, is one of the highest and grandest in Tibet, and a distant view of it from the south is most impressive. At the foot of the hill is the village of Khamba, famous for its mutton. Thousands of sheep are annually killed here in January, and the carcasses are dried and sold at from eight annas to one rupee each. Khamba is also famous for its carpets and blankets. . . . There are about 300 houses in the town with a prosperous population of nearly 1000 souls. Wheat and barley grow in the valley. The stream works a barley flour mill, an old one recently repaired. The castle is very ingeniously planned, and has accommodation for 1000 men. The river rising within the castle ensures a supply of water during a siege."

The above extract is taken from the report of Chandra Das's first Tibetan journey, which has not been reprinted in England. In his later report he tells us that "the fort is supplied with water brought there by clay pipes from the mountains to the north, a piece of work of which the people are not a little proud"—a somewhat important discrepancy!

Beyond the Kangra La the scenery and the roads are of the same character as beyond the Tang La on the Chumbi road. "The legs have been climbed and the top of the table reached"—to adapt the remark of the British private. The road to Shigatse appears to be an easy one, crossing low passes and frequently traversed at all seasons; the direct

track, however, to Gyangtse, crossing two steep, if short, 16,000-foot passes, seems less suitable for the advance of any considerable force. It is not improbable, therefore, that the main advance will be made by the road through Chumbi to Gyangtse.

The distances on the Lachen-Kambajong route are as follows: Siliguri to Gantok, 73 miles; Gantok to Kambajong, 89 miles; Kambajong to Gyangtse (direct road), 90 miles. Total, 252 miles. The *détour* by Shigatse adds 45 miles. With regard to the effects of wintering on an Indian force, we have the experience of 1888. Major Iggulden writes, "Our men have been wonderfully fit, and the cold and bracing climate of these lofty altitudes has agreed with them extremely well." Some of the native troops, however, suffered to a certain extent from bronchitis and pulmonary affections. There will, no doubt, be more hardships for troops on the move than for those who were huddled in quarters at Gnatong. We may expect to hear of some suffering on the passes, the Jelep La and Tang La. But if these are crossed in fair weather and before too heavy a snowfall, troops either at Chumbi or Gyangtse should be able to endure and even enjoy life in midwinter.

There is no space in this *Journal*, nor have I the material at hand, to enter at any length on the prospects of Tibetan trade. I may say, however, that they appear to be considerably underestimated by most writers. Amongst other wares there should be a large demand for broadcloths and tea, while the possibility of—with quicker communications—making Tibet a source of meat-supply for India seems to have been generally overlooked. There is no doubt that the Nepalese merchants, despite their longer and more arduous access to Tibet, have found their commercial intercourse highly profitable. The report of Bogle to Warren Hastings is still, having regard to the stationary condition of Tibet, not without a certain value, and may be consulted together with our President's remarks in his volume already referred to (p. lxviii.).

There is no doubt that if due use is made, as we have every hope under the present Viceroy will be the case, of the opportunities afforded by the present expedition, it may add considerably to our knowledge of the orography and geology of the inner Himalaya. No geographer, of course, would wish an armed expedition to be sent forth for merely geographical purposes, but when political considerations make such an expedition expedient, we are naturally desirous that the occasion should not be lost. That the expression of such a desire should be made an excuse for reproach is characteristic of what is, or rather is supposed by some of his literary providers to be, the attitude towards science of the average educated English reader. The public we have reason to believe, has learned more from recent events than some of its instructors, and takes such comments at their proper value.

I should like to add here that I have just learnt that the hope expressed in my recent volume, 'Round Kangchenjunga,' that our

British officials may be able to protect the primitive inhabitants of Sikkim, the Lepchas, and preserve them from being driven out of their home by the more energetic Nepalese, has been anticipated by the Viceroy, Lord Curzon, who has constituted a reserved district for Lepchas, from which extraneous settlers will be excluded. It may also be desirable, in view of recent statements to the contrary, to remind public writers that the eastern Himalayas have been successfully crossed by invaders from the north. In 1792 a Chinese army of 70,000 men invaded Nepal by two passes, and gained a decisive victory within a day's march of Katmandu, which established Chinese dominion for a time on both sides of the chain.

I am informed at the last moment that another suggestion on which I ventured has been anticipated. It is reported from India that Captain Wood of the Indian Survey has received permission to visit Katmandu in order to ascertain whether the highest mountain as yet measured, the 2900 2-feet peak, best known in this country as "Mount Everest," is visible from the heights in the neighbourhood of Katmandu, and forms part of the range known in Central Nepal as Gaurisankar. Mr. Bryan Hodgson, Emil Schlagintweit, and a recent German traveller, Dr. Boeck, have maintained this opinion, while the opposite view has been generally held by the Survey officers. It will probably be found that the great peak, if visible at all, is far from conspicuous, and only recognizable—like the Finsteraarhorn from Grindelwald—to those who know where to look for it. It need hardly be added that this inquiry will not settle, or indeed throw any light on, the question whether there are loftier peaks yet unmeasured in the region north of our "Mount Everest." That disputed point may possibly be elucidated by observations from the heights near Kambajong, whence Chandra Das enjoyed magnificent panoramas of the western snows.*

PARI JONG TO GYANGTSE.

EXTRACTS FROM 'ROUTES IN SIKKIM,' 1900, COMPILED BY CAPTAIN W. F. O'CONNOR.

Thuna.—Rise of 2 miles to village of Chu-Gya. Hence gentle ascent to summit of Tang La (very easy) at head of Mo Chu valley (6 miles). Then level to Thuna, 11 miles.

Chalu.—Level plain for 19 miles to Ram Tso (lake), lying on east of road; the road then crosses a rivulet which runs into a larger lake further north (named the Kala Tso) by a small bridge built on two stone piers. Chalu 3 miles further on. Water from stream.

Salu.—From Chalu the road runs along the bank of the stream for 5 miles to

* It is difficult to assign final heights to some of the passes, as the figures in Mr. White's recent map are largely in excess of previous measurements, and the Survey Department of Calcutta, which issues the map, disclaims responsibility for it by a printed notice on its face. I have, therefore, adopted the heights given in 'Routes in Sikkim.'

the village of Kalapanga on the shores of the Kala Tso. Hence 2 miles along the shore of the lake. After 4 miles the large village of Pika is reached; hence to Salu, 5 miles, the road lying over an extensive plain quite destitute of verdure and covered with small stones. About Kalapanga village there is extensive cultivation, irrigated by small hillstreams. Salu is a village of fifty houses with some cultivation round it. Water from stream.

From Salu the road runs level for 11 miles to Kangma, bordered by low, rounded, sterile hills. From Kangma the main trade route to Lhasa turns off. One and a half miles beyond Kangma a hot spring is passed; hence the road runs almost due north along the river, which further on has a considerable fall and is very rapid, and the roadway is cumbered with stones which fall from cliffs on either side. Where the valley is open there is a considerable amount of cultivation on both sides of the stream. Twelve miles from Kangma, Changra is reached, where a stream, the Niru Chu, joins the stream hitherto followed.

Gyangtse.—Some miles from Gyangtse the country opens out and appears more populous and better cultivated. Several villages are passed.

Gyangtse is a large and important town with a thriving trade. The monastery near by contains 600 monks. There are two bridges over the river, which in summer is navigated by hide boats. In the centre of the town is a fort which contains 50 Chinese and 200 Tibetan soldiers. Fine crops are raised here, and wheat, barley, radishes, peas, etc., can be procured in the market; also flour, oil, and ghi. Woollen cloth is manufactured in the city. Total, 89 miles.

FROM DONKHIA LA TO SHIGATSE, VIA GYANGTSE.

Tag-Mar-Khob.—Steep descent from summit of Donkhia La (18,100 feet) for more than a mile to a sloping plain called Tso-lyung-thang where travellers usually rest. Tag-mar-khob, 2 miles further on, is a cave. A short march would be necessary, as the stage would probably be from Monay Samdong on the Sikhim side, 12 miles from summit of pass. Camp near a stream which feeds the Cholamo lakes.

Tha-Tshang.—Road gradually improves after descent from pass, and runs over an elevated gravelly plateau to the Gompa of Tha-Tshang. A stream which runs past a monastery close by is the head-waters of the Arun river. From here to Kamba Jong is 22 miles.

*La-Ngoi (Dok)**.—Level road for 11 miles up the Arun, passing several "doks," or herdsmen's camps. Then ascend the La-Ngoi La (16,000 feet), a difficult pass on the north, but easy on the south. Two and a half miles down the pass, reach La-Ngoi Dok.

Camp.—Three easy passes to be crossed on this march, the Lamo La, Keser La, and Selung La. Between these passes are open level plains with a certain amount of marsh land and many "doks" belonging to Tong-sheer Jong, which is visible from Selung La. The day's march is continued through open gravelly plains, passing several "doks" and a few stone-built houses here and there. This route is much used by traders going to the market at Lar.

Pong-gong (Dok).—Cross the Lama La, a precipitous and rocky mountain pass, 16,800 feet. At the foot of it and the north side is the She-kar monastery. Ten miles further on there is a rock-cut cave at Kyil Khor Ta Dab (Kingatakdup). The road goes over open gravel-covered plains, with occasional fields of barley cultivation, past the village of Kab-shi, near to which the head of the Chi Chu river is crossed; hence to Pong-gong-dok at the western foot of the Pong-gong La.

* Dok = shepherd's hut; Dokpa = shepherd; Jong = fort; Chu = river; La = pass.

Gyangtse.—Cross the Pong-gong La (16,200 feet) after a steep and difficult ascent. From the summit a fine view can be had of Gyangtse and neighbourhood. Descend to town of Gyangtse over gravelly plains. To reach monastery cross the Nyang or Paina Chu by a stone bridge, 300 paces long (?), and then pass through half a mile of gardens. Gyangtse is 93 miles from Donkhia La or Kamba Jong.

Peshi.—Road lies down the river through a succession of villages surrounded by barley fields. Right and left are stupendous mountain chains.

Penam Jong.—Road as before until opposite to Penam Jong, where willow gardens and thick woods are found by the river. Jong, resting-place and village on right bank of river, which is here bridged.

Shigatse.—As Shigatse is approached villages and cultivation become more frequent, and the country consists of plains and widely extended fields, well-watered by the Nyang Chu. Frequent streams flowing into the river are crossed. The great monastery of Tashi Lhunpo is passed before arrival at Shigatse. Here there is a great daily market, which occupies the whole street between the monastery and the town. There are 3000 monks in the monastery. The Nyang Chu flows into the Brahmaputra, 3 miles north of Shigatse. Total, 145 miles.

FROM GYAGONG TO SHIGATSE, VIÀ KAMBA JONG.

Kamba Jong.—From Gyagong to Kongra La, about 7 miles. From the Kongra La gentle descent (7°) for 1½ miles. Hence 7 miles across plain to Kamba Jong. The fort is circular, about 1500 paces round, and is built on the top of a small mound; the walls, 6 feet thick, are built of uncemented stone.

Guma.—Lungdung village is reached at 5 miles. Hence road to Guma lies over an extensive plain. At 20 miles a road coming from the west from Singsohulung joins road under report. This place is 6 marches distant, and is much used by Nepalese trading with Shigatse.

Bhadur.—Fifteen miles from Guma the road ascends a moderate slope for half a mile to the summit of a pass called the Lasum La. From this pass 7 miles of slight descent leads to the Bhadur plain covered with villages and cultivation. Bhadur consists of fourteen groups of houses, three to the east of the road and eleven to the west; each group contains about thirty houses. Through the middle of the valley a small stream flows gently to the west; the fields are irrigated and manured; the crops are principally peas and barley.

Rabgialing.—Six miles beyond Bhadur is a monastery containing 500 lamas. Nine miles further on is a slight ascent to the pass called the Gampo La, where the road crosses a range of hills with peaks about 1000 feet above the level of the surrounding country; the descent on the other side is 1½ miles long, steep and stony. At the village of Rabgialing, 10 miles from the pass, there is a plantation of dwarf willow trees.

Shigatse.—From Rabgialing the road passes the large villages of Lugri and Lachung,* and meets the road from Ladalek at the south-east corner of the outer wall of the great Tashi-lhunpo monastery. Total, 101 miles.†

* Not to be confused with Lachung in Sikhim.

† The following works, in addition to the 'Routebook,' may be consulted with profit: 'Himalayan Journals,' by Sir J. Hooker (1854); 'Narratives of Bogle and Manning,' edited by Sir Clements Markham (1876); 'An Account of an Embassy to the Court of the Teshu Lama,' by Captain Turner (1800); 'Journey to Lhasa and Central Tibet,' by Sarat Chandra Das (1902); 'Among the Himalayas,' by Major Waddell (1899); 'The Gates of Tibet,' by J. H. H. Louis (1894); 'Sikhim Expedition of 1888,' by Captain Iggulden (1900); 'Lepcha Land,' by F. Donaldson (1900); 'Itinerary of Route from Sikhim to Lhasa,' by G. Sandberg (1901); 'Gazetteer of Sikhim,' by H. H. Risley and others (1894); 'Sikhim, with Hints on Mountain and Jungle Warfare,' by Colonel Gawler (1876).