

making of artificial holds, boring holes etc) and the removal of trees, flowers and rocks.

2. No additional pitons may be inserted in any existing route.

3. The use of wooden wedges is not allowed. Screw pitons (Bohrhaken) may only be employed as a safety measure on a stance.

4. New routes must not be pitoned and/or reconnoitred beforehand (ie by means of a rope from above).

**General** Sandstone rock offers a variety of good climbing, principally crack and face routes requiring considerable technique, courage and great ability. New-comers should exercise considerable caution as the technique employed differs from that used on limestone. Friction climbing is the order of the day and existing holds, generally speaking, are not as firm as on limestone. It should be noted that in the spring or after long periods of rainy weather the rock is more friable and its frictional qualities are greatly reduced by moss and lichen especially on the N and W sides. On some less-frequented routes old pitons may be found. They are mostly in a bad state and should be replaced. There is a summit book at the top of every climb together with a cemented-in abseil ring.

**Climbs** There are over 1500 climbs of up to 60m in height, on firm but friable rock, spread over more than 140 rock-bastions and about 80 detached rock-towers. The best of these is the Asselstein near Annweiler, which is the largest and highest detached tower in the Südpfalz, with over 25 routes of standards ranging from III to VI.

Many climbers who apart from their 4-week Alpine holiday, spend the rest of their free time in the Klettergarten of the Central Alps and think they know everything, would do better to go to the Südpfalz where they will find a vast territory with innumerable fresh climbs.

A guidebook of the district was published in 1975 and is obtainable from Hans Laub, 38 Adam-Müller Strasse, Pirmasens 6780.

## One hundred years ago (with extracts from the *Alpine Journal*)

C. A. Russell

'Throughout the upper Alpine region the winter has been extra-ordinarily sunny and snowless. At Davos perpetual sunshine reigned, while the lowlands of N Switzerland were under a roof of frozen fog. At Zermatt, and also in Dauphiné, the cattle have been able to remain out on the meadows instead of being confined to their stables. Many club huts, which last season were scarcely accessible till June, have been this year visited by guides in mid-winter. The Simplon was open for wheel traffic on March 23!'

Alpine conditions during the early part of 1880 were notable for the very small quantity of snow on the high peaks. The favourable weather was particularly evident in the Engadine where on 4 February the Rev. Cecil E. B. Watson, with Christian Grass senior and Valentine Kessler, made the first winter ascent of Piz

Bernina. The expedition, involving other climbers who were forced to abandon the ascent due to sickness, was a long one lasting more than 24 hours. The summit, which was approached from the Boval hut by way of the Morteratsch ice-fall, was not reached until 3.20pm and after traversing much of the Bellavista Terrace with unreliable lanterns the party was obliged to make an unpleasant descent to the Boval during the night.

The weather in the Alps during the early part of the climbing season was considerably better than that experienced in the previous year. On 6 July A. F. Mummery, who had returned to continue his climbs in the Zermatt region made, with Alexander Burgener, the first traverse of the Col du Lion, at the foot of the Italian ridge of the Matterhorn. The traverse was effected from the Tiefmatten glacier and the difficulties of the long ascent of seemingly endless snow and ice-couloirs were increased when Burgener's axe broke without warning.

Elated by their success Mummery and Burgener proceeded to the Mont Blanc region where they were joined by Benedikt Venetz. After several days of bad weather the party made an attempt to reach the summit of the Aiguille des Grands Charmoz, the narrow and indented rock crest next to the Aiguille du Grépon. Approaching by way of the Nantillons glacier on 15 July they succeeded in forcing a route up the SW face and reaching one of the highest points of the lower section of the crest. The ascent of the face, including one couloir which was completely covered in ice, was a formidable proposition even for such a capable party.

A few days later, on 19 July, the same party attempted the ascent of the SE, or Furggen, ridge of the Matterhorn. After overcoming a difficult section a short distance above the Breuiljoch the party succeeded in climbing a rock-couloir. As Mummery later recorded<sup>1</sup>—the couloir 'proved to be ice-glazed, and not free from difficulty; moreover, we could only ascend exactly in the line of fire. It was, therefore, with feelings of great delight that we perceived a flaw in the cliff on our left, and were able to find a way through to the easy slopes of the face'.

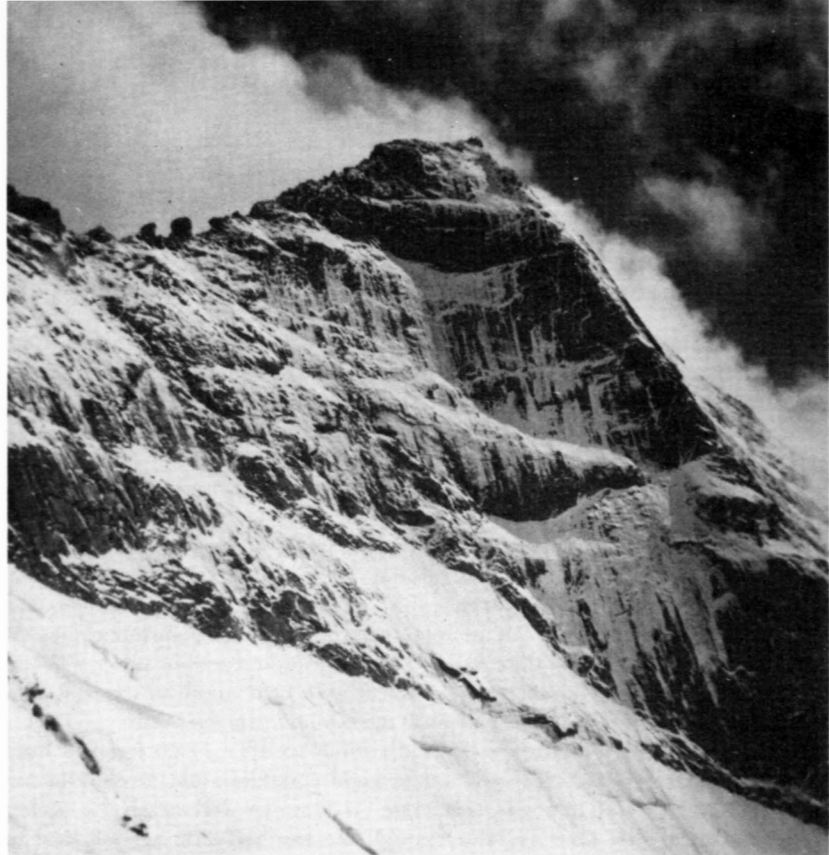
By this time clouds were forming around the summit and the wind was rising. After a short rest, however, the party continued the ascent 'without difficulty of any sort, till at 9am we reached the great tower, seen from Zermatt on the left sky-line just beneath the final peak. Standing in the gap between the tower and the mass of the mountain, we looked down a couloir of most appalling steepness.

'Far above, the great ridges, armed with fantastic icicles, at one moment would stand out hard and sharp against a blue-black sky, and the next be lost in a blurred cloud of driving snow, the roar of each furious gust being followed by the ominous clatter of broken icicles, and the crash of great stones torn from the summit rocks.

'The final peak looked very formidable, and, in such weather, could not have been assailed with any reasonable approach to safety'. In view of this situation the party resolved to traverse to the shoulder on the NE ridge by means of the ledges across the E face. After more than one narrow escape they reached the comparative safety of a projecting crag and looking ahead saw 'immediately in front, the long, pitiless slabs, ceaselessly swept by whizzing, shrieking fragments of all sorts and sizes'. After a short break the traverse continued and they were soon 'springing across the slabs like a herd of frightened chamois' to the safety of the Hörnli route.

This attempt to climb the hardest of the ridges of the Matterhorn was far in advance of its time; over 30 years were to elapse before the upper step was turned and a route up the ridge completed to the summit.

The weather during the following month was unsettled and many climbers



94 *Fusstein* (Photo: C. A. Russell)

turned their attention to the lower peaks. In the Mont Blanc range on 18 August J. A. Hutchinson made the first ascent of the Aiguille des Petits Charmoz, while in the Bernese Oberland on 26 August W. A. B. Coolidge with Anton Walden reached the summit of the unclimbed Geisshorn.

By the end of August a considerable amount of fresh snow had fallen, particularly in the Dauphiné where on 3 September a slight improvement enabled Henri Duhamel, with Pierre Gaspard and his son, to make the first ascent of the S face of the Barre des Écrins. Duhamel later recorded that while the climb was in the main straightforward the party 'had been fortunate enough to hit on the least unfavourable day at the end of the Alpine season'.

Another fine achievement was the first ascent, on 5 September, of the Fusstein in the Zillertal Alps by Russell Starr, with Hans Lechner and Johann Ebel. The final peak was reached by way of a snow couloir on the E face which 'afforded good foothold at an acute angle (perhaps 70° or more) for the greater part of an hour, and from its head a steep rock scramble of a few yards led to the top'. This peak, which lies next to the Olperer and will be familiar to those who have visited the Geraer hut, had defied many previous attempts.

In Britain an important event took place on the Isle of Skye when, on 18 August, Charles and Lawrence Pilkington made the first ascent of the Old Man of Skye, the highest point of Sgurr Dearg and otherwise known as the Inaccessible Pinnacle. 'The morning being misty, the guide of Sligachan Hotel was taken. The mountain

was ascended from the head of Loch Coruisk, and the eastern base of the pinnacle reached—an upright slab of rock about 150 feet high, sheer on both sides and at one end. It was climbed from the eastern end, the only possible way up. Leaving the guide at the foot they reached the top after a short and difficult climb, the edge of the slab averaging only a foot wide, and being very steep and shattered. No traces of any previous ascent were found, and the quantity of loose rock which had to be removed on the ascent confirmed the statements of the guides, that hitherto all attempts to reach its summit had been unsuccessful.

'The Ordnance Surveyors built a cairn on the second summit of the mountain, some distance to the north-west of the pinnacle, and about 70 feet less in altitude, and gave the name of "Inaccessible Pinnacle" to the true summit'.

The first ascent of the Inaccessible Pinnacle, a fine piece of rock climbing, was an important contribution to the exploration of the Cuillin ridge.

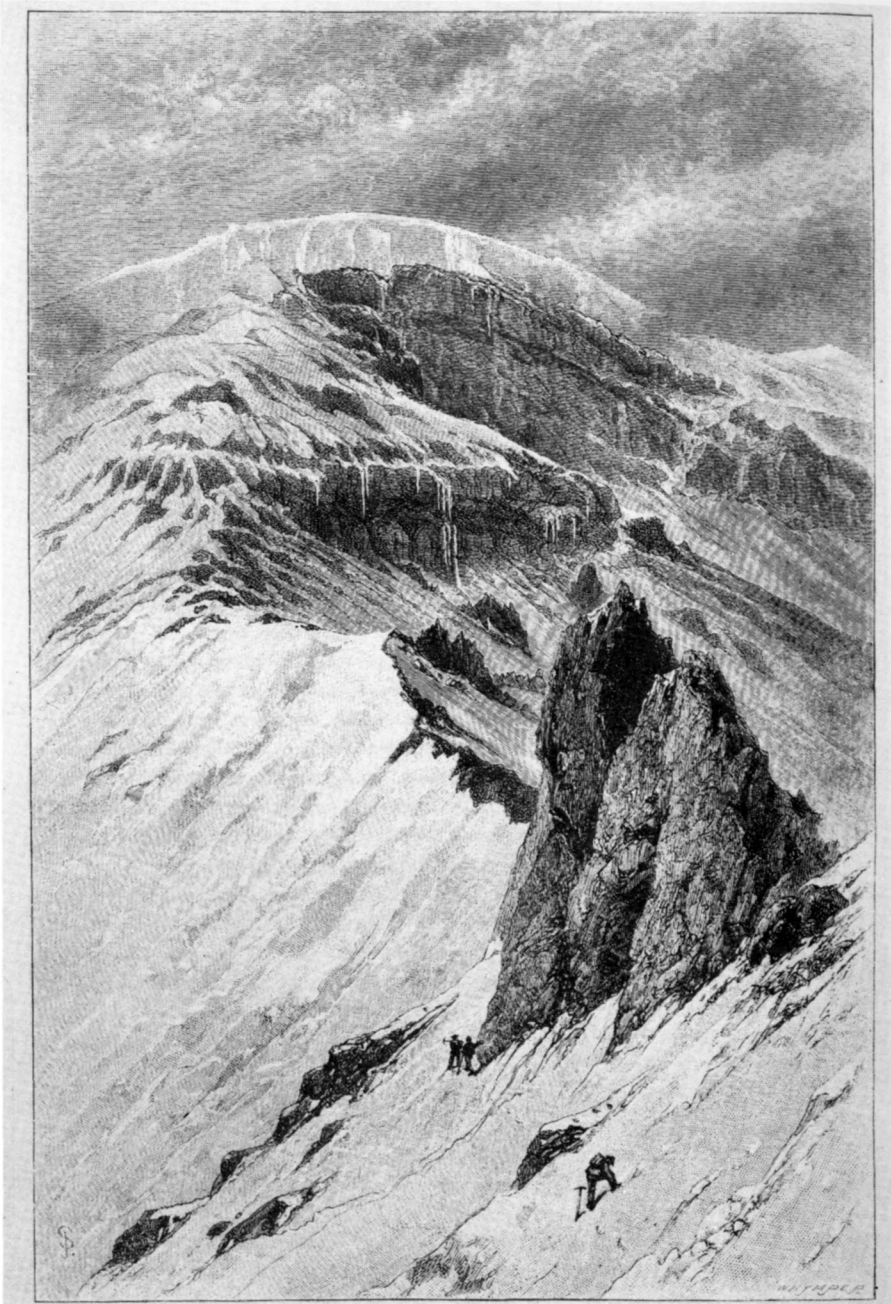
Outside the Alps the major achievement of the year was undoubtedly Edward Whymper's expedition to the Andes. Accompanied by J. A. and Louis Carrel he arrived at Guayaquil in Ecuador and by the beginning of the year had begun the ascent of Chimborazo (6270m), establishing a second camp at approximately 5060m. On 4 January, starting from a third camp at approximately 5300m, the party made the first ascent of the mountain after a long and exhausting climb. 'At first the line of ascent was on the southern side of the mountain, but after the height of 18500 feet had been attained, we commenced to bear round to the west, and mounted spirally, arriving on the plateau at the summit from the north.

'The ascent was mainly over snow and entirely so after 19000 feet had been passed. Up to nearly 20,000 feet it was in good condition, and we sank in but slightly, and progressed at a reasonable rate. At 11am we were nearly 20,000 feet high, and up to that time had experienced fine weather, with a good deal of sunshine.

'The sky now became clouded all over, the wind rose, and we entered upon a large tract of exceedingly soft snow, which could not be traversed in the ordinary way, and it was found necessary to flog every yard of it down and then to crawl over it on all fours. The ascent of the last 1000 feet occupied more than five hours, and it was 5pm before we reached the summit of the higher of the two domes of Chimborazo.

'On the immediate summit the snow was not so extremely soft, and it was possible to stand up upon it. The wind, however, was furious, and the temperature fell to 21°F. We remained only long enough to read the barometers, and left at 5.20pm; by great exertions succeeding in crossing the most difficult rocks which had to be passed over just as the last gleam of daylight disappeared; but we were then benighted, and took more than two hours in descending the last 1000 feet—arriving at the camp about 9pm'.

After descending to the second camp it was found that Louis Carrel's feet were severely frost-bitten and as a result several weeks passed before Whymper was able to consider another serious ascent. By the end of the month Carrel was recovering and on 18 February the party made an ascent of Cotopaxi (5900m), the highest active volcano in the world. After reaching the summit at midday a camp was established just below the crater where they spent the night. 'At intervals of about half an hour the crater regularly blew off steam, though no stones were ejected, or at least none was observed. The steam appeared to be very pure. It rose in a jet with great violence from the bottom of the crater and boiled over the edge,



95 Chimborazo, E. Whymper (reproduced from AJ 10)

continually enveloping us. We sustained, however, scarcely any inconvenience from it, and this was the more remarkable since we had been well-nigh stifled with sulphurous fumes during the ascent when about 1500 feet below the edge of the crater.

'When night had fairly set in, we went up to view the interior of the crater, and saw the whole of its vast proportions for the first time. The lower part was illuminated by glowing fires, and one half of the upper cliff was brilliantly lighted by a nearly full moon. Little smoke was at this time rising, and it scarcely interfered with the view, whilst it heightened the effect'.

Very few accidents occurred during the expedition though at one stage the most fortunate member of the party was a mule which had slipped while crossing a high pass. After rolling head over heels down a slope for about 100 feet and falling over a cliff some 80 feet high it emerged breathless and tottering, but unhurt apart from the loss of the tip of one of its ears.

At times all members of the party suffered from snow-blindness and Whymper himself was forced on account of illness to remain at Quito for nearly 5 weeks. In addition the accommodation available often left much to be desired. Whymper later recalled<sup>2</sup> one establishment 'where, although in a certain sense solitary, I was never without company. The wonderful exuberance of life chased away drowsiness, and, when sleep came, one's very dreams were tropical. Doves of mice galloped about at night, and swarms of minute ants pervaded everything. The harsh gnawings of voracious rats were subdued by the softer music of the tender mosquito. These, all indigenous inhabitants, were supplemented by a large floating population; and, in all, I collected fifty species of vermin in a single room'.

The expedition continued until the middle of July, by which time the party had made a second ascent of Chimborazo and had reached the summits of several other peaks in the region, including Cayambe (5860m) and Antisana (5700m).

The ascent of Chimborazo was a remarkable achievement and Whymper's scientific research made a valuable contribution to the knowledge of the period, particularly with regard to the effects of lack of oxygen at great altitudes.

This account of the events of one hundred years ago is concluded with an extract from an address by C. E. Mathews, the retiring President of the Alpine Club, read before the Club on 15 December 1880. 'Men of wealth or of leisure, or in pursuit of some scientific object, will, as the years go on, investigate great mountain ranges, as yet unknown or unexplored. The Caucasus, the Andes, the Alps of New Zealand, and the Himalayas, will find plenty of occupation for the most ardent climbers. But of one thing you may be sure, the Alps will never lose their charm.

'Things which we know best we weary of the soonest. Things we cannot wholly know are ever unfolding new surprises; they never weary us; they always stimulate our interest and excite our curiosity. It is the same with the Alps. They never can be wholly known. They may be climbed over and over again; but they change from day to day and from year to year; the tracks of summer and autumn are obliterated by the snows of winter; and each new man, each new generation of men will find in them, as we have found, the same novelty and the same charm'.

The present writer, and perhaps many of his readers, would agree that the charm does indeed remain.

<sup>1</sup> In his book *My Climbs in the Alps and Caucasus*.

<sup>2</sup> In his book *Travels amongst the Great Andes of the Equator*.