Xuelian Feng Expedition 2009

Tien Shan, Xinjiang, China, August 2009



Mount Everest Foundation Expedition

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Final Report

Author: Bruce Normand

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1 Aim

The goal of the expedition was to climb the satellite peaks of Xuelian Feng (6627m). Xuelian is the highest peak in the Chinese Tien Shan away from the ranges connected directly to the border peaks Pobeda, Military Topographers and Marble Wall. The Xuelian massif is a long, east-west chain with significant West, North, Northeast and East tops on its various ridges. While the central peak (henceforth "Xuelian Main") was climbed from the Southeast by a Japanese team, on their fourth attempt in 1990, none of these subsidiary peaks, which are all between 6200 and 6500m, has ever been touched. Unlike the main peak, all of these satellites appear to be more readily climbable from the north, a side of the massif apparently unvisited by climbers until 2008. The Xuelian massif is made of a marble similar to Khan Tengri, as a result of which its northern aspect offers a massive wall of snow, compact rock and occasional ice, a recipe for a considerable number of route options of varying difficulty. The 2009 expedition intended to convert into reality the possibilities revealed by the reconnaissance of 2008.

2 Summary

The expedition was led by Bruce Normand (Scotland), climbing with Jed Brown (USA). This pair shared logistics with the US pair of Kyle Dempster and Jared Vilhauer. However, once on the mountain the two teams operated independently for the majority of the expedition. The foursome spent one month, calendar August 2009, working from a base camp (BC) beside the Muzart Glacier. Brown and Normand began by climbing a peak of approximate height 4850m for acclimatisation, and then graduated directly to Xuelian North, which they climbed by its West Ridge. Moving on to Xuelian East, the pair was high on the East Ridge when they met Dempster and Vilhauer topping out from a different route; the four climbers summitted together in an approaching storm and spent an unscheduled night on the mountain in a cramped bivouac. Brown and Normand then made a bid on the West Ridge of Xuelian Northeast, but were turned back by the precarious and time-consuming nature of the climbing. The expedition finished by tackling its most important goal, the massive North Face of Xuelian West: Brown and Normand teamed up with Dempster in a five-day push which established a committing and technical route up the central prow of the face.

3 Introduction

3.1 Purpose

The goal of the expedition was to climb the satellite peaks of Xuelian Feng (6627m), in the Chinese Tien Shan. While connected by high ridges to the main peak, each of the four subsidiary peaks of Xuelian in fact offers an autonomous route to an unclimbed, mid-6000m peak from starting altitudes between 3700 and 4700m.

3.2 Geography

Xuelian Feng is located at the centre of the Tien Shan, a 2000km range extending from the Tajik Pamir at its western end to the grasslands of Mongolia at its furthest eastern extent. The highest peaks of the Tien Shan are at its centre, in a core of marble mountains best known for the formidable Pik Pobeda (now Jenggish Chokosu, 7439m) and shapely Khan Tengri (6995m). This core is shared equally between Kyrgyzstan/Kazakhstan, and the Chinese province of Xinjiang, which in fact contains three quarters of the entire range: the western half, including the Kokshal-Tau subrange and extending to Pik Pobeda, known as Tomur Feng to the Chinese, is shared between Kyrgyzstan and Xinjiang, while the eastern half, separating the great desert basins of the Tarim and the Junggar, is fully in China. Just to the east of Tomur and Khan Tengri, the Tien Shan can be regarded as a single chain of 6000m peaks, the marble core, flanked by successive ranges of 5000ers and 4000ers to both north and south. The main chain is split some 30km east of the political border by the impressive Muzart Gorge, carved by the fact that the Muzart Glacier rises on the north side of Xuelian but cuts south through the ranges. To the west of the Muzart Gorge is the still-untouched Chulebos chain, while to the east is the Xuelian chain. Maps showing Xinjiang, the central Tien Shan and the Xuelian massif can be found in Appendix B.



Central Tien Shan, Xinjiang side: at left, Xuelian Northeast/East, North/Main and West seen from the north, near the town of Zhaosu; at right, the Chulebos chain from P6450 to Chulebos itself, seen from the same point.

3.3 Access

The approach to the north side of the Xinjiang Tien Shan is physically very straightforward. Chinese infrastructure improvements are such that the 700km from Urumqi to Ili can be covered on a motorway. Paved roads lead a further 200km around the Ketmen Range (3000m limestone hills) from the rich agricultural basin of Ili to the equally verdant valley of Zhaosu. A further 70km to Xiate village, only 30km from the low pass marking the Kazakh border, is also paved, and only the last 24km up a narrow, wooded, alpine valley to Xiate Hot Springs is on a gravel road.

The Muzart Pass was the key to the historical Xiate Trail, a trade route plied by horses and soldiers connecting Aksu to Zhaosu and Ili, and thus the southern deserts and trade routes to the northern crop- and grasslands. This route fell out of use some 150 years ago due to glacier and river movements which rendered its southern half difficult and dangerous, but has recently become popular again in New China as an adventure trekking route undertaken in spring and autumn (when the rivers are low). Despite the difficulties of the southern half, which included taking the life of the leader of an early Chinese trekking team (in a river-crossing), the northern part has always been remarkably benign.



Left: Yanamax from Zhaosu. Right: Khan Tengri from the valley of Zhaosu.

Base camp (BC) for the north side of the Xuelian massif is made most conveniently in a green meadow whose sinified name is Hadamuzi. From Xiate Hot Springs it is a gentle, 22km trek with horses, from 2400m at the roadhead up to 3580m on the surprisingly low pass marking the watershed, and down only 60m to a point overlooking the Muzart Glacier. This remarkable geography connects the alpine terrain of the northern foothills, where Kazakh herders can be found producing cheese in meadows within 6km of BC, directly to glaciers and mountains of Karakoram dimensions. The pleasant greenery and flowers of Hadamuzi are, however, the direct consequence of the fact that afternoon showers blow through the Muzart Pass almost every day; by contrast, the mountains visible in all directions from BC have the same arid appearance as the Karakoram, with only the highest peaks well covered in snow and hanging seracs.

Despite this ease of access, the north side of the Tien Shan has for a long time been off-limits to foreign travellers. Ili was the scene of major ethnic riots in 1997, and the events of 2009 raise the spectre of the current freedom of movement being only short-lived. Climbing expeditions to the Xinjiang Tien Shan could until this year still be counted on the fingers of one hand, and those to the north side of the range are only the two led by the author. The other expeditions were i) a siege-style, official ascent of Tomur Feng from the Xinjiang side in 1977, ii) a series of four Japanese attempts required to make the first ascent, in 1990, of Xuelian Main, iii) a Japanese climb of Koxkar (6345m), located directly south of Tomur, early in this decade, and iv) the 2006 Russian climb of the SE side of Military Topographers' Peak. All of these expedition teams approached from the

south, with those heading towards the Xuelian side of the range tackling the dangers of the lower Muzart River.

4 Team

The expedition members were Bruce Normand (Scotland) and Jed Brown (USA). They were accompanied by Kyle Dempster and Jared Vilhauer (both USA), operating autonomously for climbing purposes but together for logistical ones. These logistics were arranged entirely by the climbers themselves, with the invaluable assistance of friend, ersatz agent, BC manager and cook "David" Ye. The team was accompanied by CXMA-imposed liaison officer (LO) Mr. Xu.









Bruce Normand, Jed Brown, Kyle Dempster and Jared Vilhauer.

5 Preparation

5.1 Conception

Unlike the Kyrgyz and Kazakh parts of the range, where state-sponsored Soviet climbing led to considerable focus on the highest peaks of the area, the official approach in Xinjiang has always been indifference and access difficulties (above). Normand had noticed this apparent blank on the climbing map, together with occasional reports of Xiate Trail trekkers, and as a result led an exploratory visit to the Muzart Glacier in 2008 with Paul Knott and Guy McKinnon. The results of this mini-expedition were a complete working knowledge of the logistics of a trip to the region, a distinct suspicion of the weather and snow conditions, ascents of Yanamax and of two 5400m peaks (which the climbers named Khanjaylak 1 and 2 after the local pasture) and a large set of pictures revealing possible lines on the Xuelian satellites.

5.2 Objective

Xuelian Feng is a massive mountain, with three major and several minor summits along a 20km east-west ridge stretching from the Muzart Gorge to the 4640m pass with Yanamax. The central summit is the highest, at 6627m, and was climbed once, by a Japanese expedition which approached from the south, climbing a flank of the southeast summit and traversing 1km of low-angle ridge to the main summit. The mountain had not been visited since, and the first climbers to reenter the region were the 2008 team. The

aim of the 2009 expedition was to climb the four major satellites of Xuelian, namely North (6472m), West (6422m), East (c. 6380m) and Northeast (6194m).





Left: Khanjaylak 2, 3 and 4 and Xuelian North, seen from Xiate Hot Springs. Right: 4000m peak and glacier above the meadow of Khanjaylak (not visible).

Xuelian is a part of the marble core of the Tien Shan, the better durability of this rock compared to its neighbours explaining the heights of the main peaks. While aesthetic, this marble is in places extremely compact, leading to impressive but slabby walls on the north sides of Xuelian E, N and W. All of the 6000m peaks receive considerably more snow than the smaller peaks around them, as a result of which large seracs are the rule rather than the exception across the entire north side of the massif. However, the Muzart Glacier is largely rubble-covered or bare ice for much of its extent, offering easy access as far as all of the basins between the satellite peaks; crevasse and serac problems begin only above 4000m.

5.3 Permission

An application for permission to climb Xuelian must be addressed through an agent to the China Xinjiang Mountaineering Association (CXMA). This application can be made by anyone in China, and dealings with the CXMA were handled by Ye, working directly with a Mr. Pan, the head of the organisation. Following the rule-changes made in June 2008, the price of a previously climbed peak of 6000m-7000m in Xinjiang is 10000CNY for a team of up to 11 members. Additional charges include an "environmental fee" of 300CNY per member, a filming fee and an additional 10% of the peak fee for every different nationality in the team. The official fee for the mandatory LO is 353CNY per day, excluding food, with extra charges for equipment and insurance.

The CXMA regards Xuelian as a single mountain. This means that neither the vertical drop nor the horizontal distance between the main peak and its satellites is sufficient for the latter to qualify as "real mountains," rather as ridges and buttresses of Xuelian. However, these criteria are subjective and it is obviously in the best interests of foreign (and Chinese) climbers that this situation remain unchanged. Chinese provinces continue to levy prohibitive fees for first ascents, unclimbed mountains attracting additional

charges of 70000 to 110000CNY in the 6000m-7000m height range (and double this above 7000m). Prospective climbers are therefore urged to exercise circumspection in what they say and do both in dealings with the CXMA and with Chinese staff on the mountain. Further, the official regulations state that the starting peak fee is doubled if the team wishes to climb a new route (although in 2009 nobody seemed to have noticed this), so additional discretion is advised in this regard.

5.4 Logistics

The expedition arranged all of the logistics itself, meaning either directly or through Ye. Ye arranged a suitable vehicle (a small bus) from Urumqi to Xiate Hot Springs. The members bought expedition food in Urumqi, in a local market for staples and in a Carrefour supermarket for mountain food. Kitchen equipment was bought at a hardware market. Ye arranged for the rental of a kitchen tent and three large cylinders of cooking gas. Climbing provisions are readily available in Urumqi, where a plethora of high-end supermarkets offer foreign and "luxury" food and many outdoor shops sell good-quality Korean gas for 15CNY per cylinder. Almost no food was brought from abroad.

Climbing equipment consisted of standard half ropes (60m x 8mm for Brown and Normand), rock (nuts, cams, pitons) and ice (screws of all lengths) racks, snow pickets (which proved useful only as tent stakes) and a V-threader for each team. No fixed rope was carried. Each pair had a small two-man bivouac tent and an MSR Reactor stove. Dempster had an Iridium satellite telephone which was never used.

5.5 Insurance

Normand had full expedition insurance through the BMC, and Brown full accident insurance through his employer in Switzerland.

5.6 Medical

No vaccinations are required for travel in Xinjiang. Normand brought a comprehensive first-aid kit provided by sometime expedition partner Don Bowie, but this was never needed. Neither member used any altitude medication.

5.7 Travel

Brown flew from Frankfurt to Urumqi with Astana Airlines. Normand arrived from an expedition in Pakistan, for which he flew from Frankfurt to Lahore with Kuwait Airlines, continued to Islamabad by bus (5 hours) and flew on to Skardu. From Skardu to Urumqi he spent some 60 hours in public buses.

5.8 Finances

Full financial details are presented in tabular form. Numbers are quoted for convenience in UK pounds (GBP), and at the approximate average exchange rate prevailing between June and August 2009, when different parts of the total fee were paid, 1.00GBP = 10.00CNY. In fact the CNY, which is de facto fixed to the USD, slipped over this period from 9.6 to 10.4GBP. Numbers are quoted only for the two-man team of Brown and Normand, with shared (four-man team) costs indicated by "/2".

Expenditures

Item	GBP
Airfares	1420
Insurance, climbers	630
Equipment, climbers	450
Medical supplies	300
Peak fee	1100/2 = 550
Environmental levy	60
CXMA service charge	300/2 = 150
Insurance, staff	200/2 = 100
Equipment, staff	300/2 = 150
Staff salary	1200/2 = 600
LO salary	700/2 = 350
Food and fuel	380
BC equipment	220/2 = 110
Transport	580/2 = 290
Horses	860/2 = 430
Accommodation	80
	6050

<u>Income</u>

The expedition was the grateful recipient of a number of significant grants.

Donor	GBP	
Mount Everest Foundation British Mountaineering Council Shipton-Tilman Award	£1050 £750 US\$3000/2 = £930	
	2730	

Personal contributions from the two climbers were then £1660 per person.

The expedition would like to thank all of its sponsors for their generous support.

6 Expedition Log

25th July

Brown touched down in Urumqi on the twice-weekly Air Astana flight. On this morning, Normand was arriving by international bus in Kashgar at 5am and continuing from the domestic bus station at 9am. Dempster and Vilhauer arrived from Beijing at 3pm.

26th July

This was the pre-arranged meeting day. Normand arrived in Urumqi at 11am, made preliminary arrangements with Ye, and the members began scouting the local luxury supermarkets for climbing food.

27th July

The members changed money in the town centre, bought gas canisters and made a major shopping raid on the Carrefour supermarket, later rounding out their expedition food supplies with final delicacies. Ye collected the outstanding permit fees, LO salary, tent and transport advances and his own salary, concluding the bulk of the financial transactions.

28th July

The expedition preparations were concluded with a visit to a local market for rice, flour, vegetables and kitchen equipment. The bus driver wanted to leave at night, so the afternoon was spent on final packing. At the appointed hour of the evening, the appointed bus appeared, but was woefully inadequate for the amount of baggage involved. Ye and Xu took only two hours to find a very much larger bus at an additional cost of 100CNY, and shortly before midnight the team drove off into the night on the highway to Ili.

29th July

This bus driver was significantly more competent than Knott, McKinnon and Normand had had the previous year, arriving in Ili for an early breakfast. Ye and Xu took the team's passports to the PSB (Public Security Bureau), which among other functions tracks the movements of all foreigners in China. With approval in hand, the team bus continued to Zhaosu by mid-afternoon, where the only foreigner-approved accommodation is mid-range hotel rooms at £10 for a double. Heavy rain fell in the evening and overnight.

30th July

Ye and Xu obtained approval from the Xiate police while the members bought the last fragile items (eggs and tomatoes). On a sunny morning, the drive to Xiate village, and the final police post, revealed spectacular views of Yanamax, Xuelian, the Chulebos peaks and Khan Tengri. At the entrance to the Xiate valley, the team was informed that the "tourist facility" was in the hands of a private company which ran its own vehicles (the

plethora of private cars passing by notwithstanding). However, for a fee it would be possible to proceed in a private bus ... At Xiate Hot Springs, the bus was unloaded at a camp site in trees just beyond the current huts and yurts – the high-end tourist hotel is still under construction – and Ye and Xu began the arduous task of discussing with the locals about horses and prices. After much frustration and intransigence, the team agreed a fee of 6000CNY for 15 horses.



Left: horse train on the approach trek. Right: Khanjaylak meadow; the peaks behind have the unofficial names Khanjaylak 3 and 4.

31st July

A classic Kazakh day: at the agreed departure time of 8am, nobody was in sight. By 10am, only the "agent" from the previous day had appeared to inform the group that the horses were "just coming". By 11am, the threatened cut-off, the horses were "at the bridge just out of town." At noon, as the team was preparing alternative action, 15 horses suddenly appeared. The horsemen began, with agonising sloth, the process of tying pairs of bags to the horses, with frequent breaks to look for more rope. After 1.5 hours, when 13 horses were loaded with 40-50kg each, the horsemen stopped. Much deliberation later came the message "you need two more horses." Ye suggested to the horsemen that they add one bag to each horse to reach the regulation 60kg, a process which would have accommodated all the baggage. Instead, the horsemen untied everything and walked away. The leader went on record as saying "I am flabberghasted." That the horsemen, who the previous year had been found to be lazy, intransigent and completely free of any morals connected to the act of striking a deal, should try to leverage more money was no surprise, but that they would do so after 2 hours of work certainly was. Ye and Xu were as frustrated as the climbers, and not a little embarrassed regarding this treatment of their "guests": Han Chinese share a concept similar to Westerners when it comes to agreeing a deal and working hard when significant money is on offer. The team then played its other card, sending Brown and Vilhauer on a trail-run up to the higher pastures to make an offer to the horsemen there. This pair was successful in finding competent and motivated horsemen, who had jumped at the offer of 6000CNY and rode down in the dark and in the rain the same evening.

1st August

The new horsemen were on the job at 9am and had their 15 horses packed and ready to go at 11am. The average speed of a horse is somewhat higher than a trekker, but the horse train generally has to stop more often to adjust loads and bridles. The day was clear after the previous night's rain, but clouded up slowly to deliver an evening shower when the group was already some 16km up the trail, past the broad meadow of Khanjaylak and camped in the pasture at the upper end of the east-west valley section below the Muzart Pass.

2nd August

The horsemen had been home in their pasture for the night, and were back at 9am to finish the job. Normand had had a rough night with food poisoning. The weather was fine, affording good views of Xuelian West as the train proceeded through the Muzart Pass. Unlike the previous year, the "Hadamuzi Lake" which forms after very warm or very wet weather was absent, with only a mud-flat in its place, and the horses were able to walk directly into BC. The team had all its tents pitched and the kitchen set-up established well before the typical Hadamuzi afternoon shower arrived from the north around 6pm. Although the 2008 team had left the meadow completely clean at the end of its expedition, picking up cans and burning paper, the members now found it littered with very considerable amounts of rubbish. One afternoon activity was a repeat clean-up, which netted some 30 gas canisters, 30 plastic water bottles, 30kg of paper and plastic and quite a few items of underwear – a disturbing haul for only one autumn and one spring trekking season.



Base camp. Centre panel: kitchen tent with Xuelian West behind. Upper left: flora. Upper right: inscription from 9th Sept 1907, when both China and Russia were still empires. Lower left: dumplings for lunch. Lower right: sorting trash accumulated in BC since 30th August 2008.

3rd August

Brown and Normand began their campaign by carrying a load across the main Muzart Glacier and up the side-glacier leading to the base of the North Face of Xuelian West, a distance of some 5km over glacial moraines and bare ice. An advanced base camp (ABC) here would be the starting point for an acclimatisation climb on the 4900m peaks directly north of Xuelian North, of Xuelian North by its West Ridge and of the direct route on Xuelian West. The pair arrived back in camp just on time for the evening shower. Dempster and Vilhauer had left directly for three nights out on the upper Muzart Glacier, and in fact the two pairs would not meet again for over a week.

4th August

The pair rested in BC. Normand felt increasingly weak during the day and succumbed to a relapse of his food-poisoning episode in the evening. The weather delivered the usual clearing morning clouds, fine day and rainy, windy evening, a pattern which now seemed well established, but not severe enough to curtail climbing plans.

5th August

Brown and Normand returned to their ABC across the Muzart Glacier, setting up a tent on morainal material over ice. The usual afternoon rain fell as a trace of snow, which was not very intense away from the Muzart Pass.

6th August

The pair made a slow start in cloudy weather, climbing an unstable moraine edge to the northeast of their camp in order to access a south-facing bowl between two of the three 4900m peaks in the group. From here a long snow-slope up to 50 degrees led directly to the summit ridge of the central peak. While the face was in good condition, some of the ridge was not, and the two climbers wallowed onto the top shortly before noon. They were rewarded by the usual morning clearing of the weather, affording excellent views of the north sides of Xuelian West and Xuelian North, as well as of Xuelian Northeast. A straightforward but warm descent put them back at ABC by 4pm. On this evening, no precipitation came through.

7th August

The two climbers set off shortly before first light and under a cloudless sky to tackle the West Ridge of Xuelian North. This began by crossing some convoluted ice to leave the flat glacier of ABC, climbing scree to access a steeper ice slope and following this up the north side of the West Ridge to a point at 4600m where a 600m snow couloir led up to the crest of the West Ridge. The couloir turned out to be mainly snow to 50 degrees, with occasional ice contact, for which no rope protection was required. Only on exiting the couloir on dinner-plating ice did the pair rope up for a final two pitches onto a flat spot at 5300m beyond the top of a large serac. The team pitched a tent here to wait out a warm and largely cloud-free afternoon and evening.



Xuelian North (6472m). Upper left: 6150m subpeak seen from the northwest; the route of ascent followed the snow couloir in the centre of the picture and then the skyline ridge. Visible at top right is the North Ridge of Xuelian Main. Upper right: Brown close to the summit of the 6150m subpeak. Visible behind are the North Face of Xuelian West (left) and the Chulebos chain (centre left). Lower left: East Face and North Ridge of Xuelian Main. Lower right: summit view of Xuelian NE, Yanamax and Xuelian E.

8th August

On another perfect day, the pair left at 5am (sunrise in Xinjiang in August is at 8am Beijing Time, sunset at 9:30pm) to work their way up largely rotten snow on all aspects of the West Ridge of the 6150m subpeak of Xuelian North. The top of this subpeak was decorated with very significant seracs. With Brown not yet fully acclimatised to 6000m, Normand did most of the leading up the rather more benign section from the 6000m col between the tops to the 6472m summit. Despite clouds moving in from the southwest, the climbers were treated to excellent views as far west as Pik Pobeda and directly onto the E and NE satellites, as well as to Yanamax. Of prime interest was the ridge section from the col with Xuelian N to the summit of Main, which probably offers the easiest and most aesthetic option for a second ascent of Main: this involves some 300m of technical rock climbing on an exposed ridge with considerable cornice formation on its east side. The climbers left the summit at 2:45pm and returned to their camp at 6:30pm, arriving at the same time as a weather breakdown, which deposited 20cm of new snow.

9th August

The morning was again clear, and the climbers spent the day descending the couloir (with two initial abseils over the exit ice), the snow and scree slopes and the lower glacier to return to BC.

10th August

Rest day in BC.

11th August

The next climbing plan was a bid on Xuelian East by its East Ridge, an angle photographed by Normand from Yanamax the previous year. A fine morning was spent packing and the afternoon was used to proceed up the main Muzart Glacier to a camp beneath the North Face of Xuelian NE. The evening featured only one snow shower.

12th August

On a rather less stable-looking day, the climbers continued up the Muzart Glacier, finding deep and inhomogeneous, sugary underlying snow from 4100m onwards. The ascent to the base of a north-side ramp offering the easiest access to the far eastern end of the East Ridge was therefore arduous and time-consuming. With no visibility and snow beginning to fall, the climbers elected to stop at the base of this ramp, at 4700m, rather than try to proceed onto the ridge. The choice was made to start very early and try to climb the peak in a single push (4km of ridge, total altitude gain 1700m).

13th August

The pre-dawn was clear but the night had deposited some new snow, which made the initial going difficult. The snow on the ramp then became firm, and led to an ice pitch, led by Brown, which turned out to be very thin. There followed some hundreds of delicate metres of climbing snow over rock with no protection. Somewhat after sunrise, which revealed threatening clouds in all directions, the climbers were established on the East Ridge, where the broad snow plateau in its central section was found to be deep and slow going. The team was somewhat surprised to see a climber emerge on the ridge above them, having failed to detect any evidence of the whereabouts of Dempster and Vilhauer on the glacier below. The two pairs of climbers arrived at a logical convergence point on the East Ridge at exactly the same moment, and proceeded as a team of four. Brown and Normand, both less tired and better acclimatised, took the lead, and as the day became wearing, Normand completed much of the last section in front. The clouds had gradually become faster and hazier, but had remained above the surrounding summits, and it was only when the four climbers stood on the summit at 5pm that the brewing storm hit with full force. The descent was made with little to no visibility and in a strong cross-wind which had erased the climbers' ascent tracks. With nightfall already threatening by the time the team had returned to Dempster and Vilhauer's depot, and a

full-scale white-out still raging, it was clearly most prudent for all four climbers to shelter in their only tent (a Rab Summit Extreme Lite).

14th August

After a long and uncomfortable night, the climbers emerged when the wind dropped, well after sunrise, to find a sunny day with continuing strong wind gusts and 30-40cm of new snow. Brown and Normand led the way down their ascent route, crossing the thin ice section in one abseil. The climbers were back at their 4700m camp at 2pm, and chose to finish the day there, although Brown and Dempster spent some of the afternoon, which featured returning snowfall in considerable quantity, retrieving Dempster and Vilhauer's gear-dump and snowshoes from higher up the glacier.



Xuelian East, c. 6380m. Upper left: upper East Ridge and North Face. Upper right: Brown, Vilhauer and Dempster high on the East Ridge. Lower left: Vilhauer and Dempster unfolding after the bivouac. Lower right: Xuelian Northeast.

15th August

Brown and Normand spent a largely cloudy and unstable day making the long walk back to BC. Dempster and Vilhauer would stay on the upper Muzart Glacier for a further week, during which they would climb a 1500m ice line on the impressive North Buttress of Yanamax, reaching the top of this formation (c. 6100m).

16th August

Overnight snow fell in sufficient quantity to collapse the kitchen tent. A rest day was spent repairing this. The snow had melted by evening.

17th August

Another scheduled rest day went by with the clear morning weather giving way to evening showers.

18th August

The climbers had planned to leave on this day to attempt Xuelian NE by its long West Ridge. However, another clear morning yielded this time to the arrival of very suspicious high clouds, and both agreed that the prognosis looked poor.

19th August

The high clouds had not delivered much action, but were thicker and more threatening than ever. Brown and Normand decided on another day of waiting. However, at this point Xu began to make noises about 30th August, a day chosen somewhat randomly as the trek out for the purposes of an official schedule, being the mandatory exit date.

20th August

The situation was unchanged, with persistent high clouds but only trace amounts of overnight snow. The climbers set off in the early afternoon, reaching a forward camp (3800m) at the edge of the main glacier below a snow ramp which would take them to the West Ridge of Xuelian NE above some 500m cliffs. The evening was cloudy with snowfall.

21st August

On a perfect morning, the two tackled deep snow, relieved by 1.5 pitches of ice at a bergschrund, to gain the West Ridge by 1pm. Snow conditions on the ridge were inhomogeneous, leading to delicate and sometimes bottomless going. Knife-edged and rocky sections were particularly time-consuming, although Brown led one long traverse around the right (S) side of the ridge to make better progress. By 6pm the climbers had reached the base of what was expected to be the hardest section of rock, and dug a tent site into snow and ice at an altitude of approximately 5000m.

22nd August

The climbing could not begin until first light. Brown led 5 long and occasionally delicate (snow over slabs) pitches, whose nature was so time-consuming that it was noon when Normand took over the lead up some open snow slopes. These lapsed again into ridgework on execrable snow interspersed with further rock steps. The altitude was still only 5400m, and it was obvious that the mission was hopeless without considerably more time and equipment. The climbers retreated cautiously on an almost equally time-consuming descent, during which some evening snowfall set in before they had returned to the tent.

23rd August

Snow and wind for the entire night had eliminated much of the trail prepared on the previous days, calling into question whether the effort could have been successful had the climbers carried their camp the previous day and continued for a third day on the route. In the event, the descent to the main glacier took almost the entire day, and night was falling on a rare, clear evening when Brown and Normand arrived back at BC.



Xuelian Northeast (6194m). Left: West Ridge (facing camera); the climbers' high point was just below the long snow shoulder. At left is Yanamax 2. Right: snow work on the descent.

24th August

Dempster and Vilhauer had been back in BC for 2 days. Vilhauer was suffering from frostnip on one toe and was unable to consider any further big routes. Dempster was keen to team up with Brown and Normand for the expedition highlight, a bid on the 2600m North Face of the Xuelian West. With the clock ticking, the three climbers spent the morning packing, authorised Ye to find horses on the 29th for a departure on the 30th, and walked over to the earlier ABC in the evening. Another excellent day meant that the light was perfect for identifying the optimal route up the prow separating the NNW and NNE sides of the face, and photographs were taken which would prove invaluable once on the route. At ABC, the climbers discovered that the tent had been shredded by wind, leaving a sodden mess of burst food bags from which various items had to be salvaged. Fortunately, the bivouac tent, stove and second rope were undamaged (if dirty), so the plan could go ahead after a rather short night's sleep.

25th August

The climbers packed and left before dawn, finding relatively reasonable going for the first 500m, gained in a right-angling traverse up the lower snow cone and led mostly by Brown. At this point the climbers had chosen to cut back left into a narrowing system of ice gullies, which they did in a five-pitch block led by Brown (the leader would carry only a small day-pack). While the first four pitches were sufficiently moderate that the climbers could move together, the fifth entered a narrow gully on very thin ice, the

limited protection mandating an extremely cautious lead. The lead passed over to Dempster at this point, his block involving a steep exit from the gully followed by four more pitches of easier going and occasional snow to gain a prominent snowfield. At this point it was 4pm, and the climbers chose to make a bivouac, a process which would involve 2 hours of ice-chopping, rather than proceed into terra incognita and the possibility of only iced-up slabs to sleep on. However, Dempster did climb a further pitch in order to fix an anchor and see where to go in the dark the following morning. Brown prepared a full-width bivouac site, with some help from the others, where the climbers remained roped in but enjoyed a good night's sleep.



Climbing the Great White Jade Heist I. Left: Brown on thin ice, day 1. Centre: Dempster on rare positive rock, day 1. Right: Brown on high-quality ice, day 2.

26th August

Unlike the previous day, this one dawned with red skies. Brown was already on the second pitch of his block, finding rotten ice over slabs. However, this gave way to several further pitches of excellent ice, which brought the climbers to an open slope with a view across the entire left-hand side of the face. Here it would be necessary to cross the prow to avoid slabs and cliffs, and Dempster took the lead into slabby terrain with far less ice. One long snow gully led to three mixed pitches, each harder than the last. Clouds turned to snow for the afternoon, which resulted in considerable amounts of spindrift sluicing down the face, to the point where sometimes the climbers could no longer see each other. Back on the prow, Brown resumed the lead into lower-angled but nonetheless persistently delicate terrain, with rotten ice and sparse protection. The team had resolved to climb into or through the night if necessary to find a bivouac spot among the steep slabs. Darkness fell as Brown led up a snowfield and crossed onto a small slope where a bivouac could be made, although the width of a snow ledge was limited by underlying rock to about 60cms. Fortunately, Dempster noticed that some of the snow was firm enough from wind-pressing to be cut into blocks, and the width of the ledge could be doubled in this way. The threesome piled in with their backs to the wall and were able to prepare some

water with the oxygen-starved stove until its fumes became too strong. Just as they were leaning against each other for a none-too-miserable sitting bivouac, the first of an entire night's supply of spindrift avalanches swamped the tent. The only way the snow could be prevented from pushing the tent off the cliff was to fold in the poles and lean hard against the back wall.



Climbing the Great White Jade Heist II. Left: Dempster vanishing in spindrift on an M6 lead, day 2. Centre: Dempster on slabs, day 3. Right: Brown and Dempster starting up the exit gullies in spindrift, day 4.

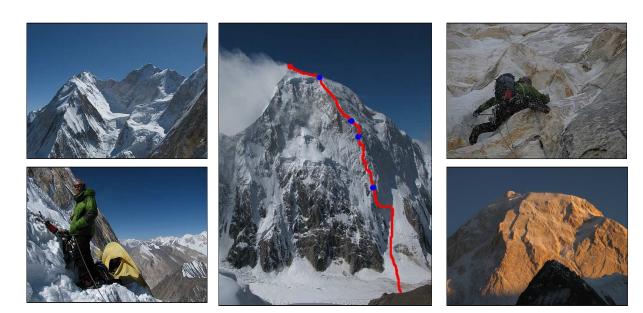
27th August

The morning was sunny but windy, and the spindrift avalanches did not die down until 11am. Dempster and Normand stood outside while Brown prepared breakfast and enough fluids to make up for the previous night. The team was aiming for a short day over the final slabs to the 5300m snowfield where the angle of the face dropped back and the route could be finished in a system of snow gullies. The afternoon was spent with Dempster leading six poorly-protected pitches to gain the snowfield, where the climbers continued to its top, seeking possible shelter from spindrift, and dug in to plentiful snow. This evening's entertainment turned out to be an electrical storm, almost the only one of the expedition, which passed within a few hundred metres of the tent. The accompanying snow took almost no time to form a steady spindrift river, which very rapidly drowned the tent, threatening both to rip it and to push it once more off the mountain. Normand, on door duty this night, was forced out into the storm to shovel for the better part of an hour. Fortunately, the storm passed quickly and the spindrift abated 30 minutes later, so that a repeat of the previous night was avoided.

28th August

The climbers set off at sunrise, soloing into the system of snow gullies but finding several delicate passages over slabby rock. After some time they were compelled to rope up again, both by the climbing and by the fact that the wind was rising once more, cleaning the previous night's snow off the mountain in now-familiar spindrift waterfalls. Brown's

long simul-climbing lead ended at approximately 5900m, beyond which Normand broke trail to and through the cornice of the West Ridge. By this time, clouds had returned and the summit was in a white-out. The climbers chose to camp on a rock platform a short way down the north side and to wait until morning to go to the top. The evening's snowfall abated at sundown.



The Great White Jade Heist (HVS, WI5, M6, R) on the North Face of Xuelian West. Upper left: view of Xuelian North and Main. Upper right: Dempster in the crux pitches. Lower left: breakfast on the morning of day 3. Lower right: the face at sunset; the route follows the sun-shadow line.

29th August

The morning dawned clear, but a strong wind was already blowing clouds over the summit as the climbers set off. Leaving their packs at the cornice edge, the three moved quickly up the final snow slopes, but were five minutes too late for a summit view. With little ado they headed down the West Ridge in winds strong enough to threaten frostbite. As visibility returned, they chose to descend the Southwest Ridge and abseil into the Southwest Face, a decision which may not have been more efficient than remaining on the West Ridge through its steepest section. After a long traverse, they returned to the West Ridge at 5200m, close to the point where the descent route drops down its north side. This required three more abseils to gain a steep and deep snowfield, where the team had to wait at times for the visibility required to navigate through crevasses. With low clouds dropping steady snow, they regained the flat lower glacier at nightfall and returned to ABC for a final, sodden night out.

30th August

This was in fact the day when the horsemen would come and clear BC. The climbers got up as early as possible, packed and steered their heavy loads down and across the glacier.

climbing the moraine up to BC just on time to find the last loads being tied to the team of six horses. A quick repack was ordered, boots changed and the last rubbish burned more effectively than was under way, after which the weary trio accompanied Vilhauer and Ye, both quite relieved, over the Muzart Pass in mist. A pit-stop for tea, bread and sheep's cheese at the upper pasture owned by the head horseman was followed by a four-hour walk-out to Xiate Hot Springs, where the caravan arrived at dark. The comedy of life in the real world began immediately. Xu had walked out two days earlier and knew where to order a minivan, but for reasons unknown this took two hours to appear. Brown, Dempster and Normand used part of the time to try the hot springs, but could hardly get into the 40C water, so not much soaking was achieved. When the minivan did appear, the agreed price jumped because of the group's baggage. Then the minivan was not able to get this down the road, dying part-way of a failed differential. Another van was summoned, but to rescue the first one rather than to get the paying customers where they were going. It was 4am when the team checked into the Zhaosu Hotel.

31st August

The weather over the mountains was rotten, suggesting that nothing had been lost in the early exit. The members went to the bus station and paid 200CNY extra to have all their baggage accepted. After a night in a sleeper bus, the expedition finished in Urumqi at 8am the following morning, only 72 hours since the climbers had stood on the summit of Xuelian West.

7 Conclusion

The expedition was successful in its declared aims of climbing the north, east and west satellite summits of Xuelian. The easiest and objectively safest routes which were taken on both the north and east peaks involved minimal technical climbing (respectively snow/ice to 50 degrees and one pitch of thin ice to 60 degrees) and considerable amounts of soft snow. By contrast, the west peak was tackled by the most direct line, which involved serious ice and mixed terrain for much of its 2600m length. The Chinese Tien Shan still has a vast selection of both unclimbed peaks and unclimbed walls offering the intrepid climber snow, ice and mixed challenges at all levels. While the access situation from the north side is currently quick, affordable and bureaucratically feasible, there are no guarantees as to how long this situation will persist.

8 Acknowledgements

The expedition acknowledges with gratitude the generous assistance of the Mount Everest Foundation, the British Mountaineering Council and the Shipton-Tilman Award.

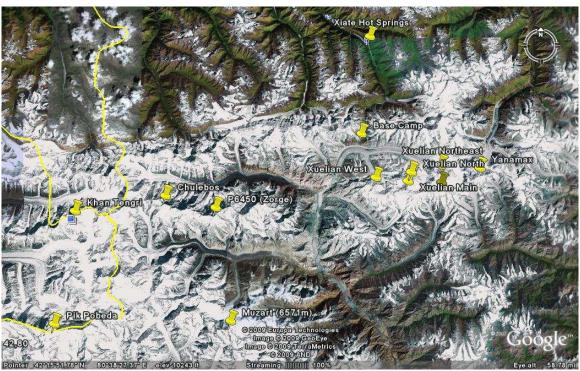
Appendix A: Bibliography

Paul Knott and Bruce Normand, American Alpine Journal 2009, p. 46. Alpine Club Himalayan Index: www.alpine-club.org.uk/hi/index.htm

Appendix B: Maps

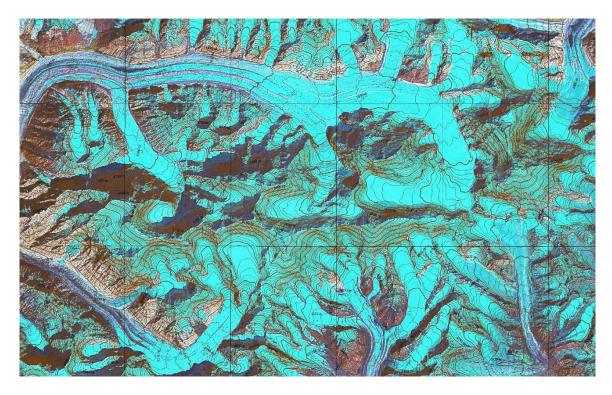


(a) Schematic map of Xinjiang province. The road distance from Urumqi to Ili ("Yining") is 700km. The historical Xiate Trail connected Ili to Aksu. The town of Zhaosu is located on the river above the "n" of the label "Hantengri" (Khan Tengri), and the Xuelian massif beneath the upper bar of the "F" in the label "Feng".



(b) Xuelian Range: map section locating the Xuelian massif with respect to the well-known Tien Shan peaks Pobeda and Khan Tengri. Country boundaries (yellow) are to Kazakhstan (upper left) and Kyrgyzstan (centre left). The horizontal width of the section

is approximately 100km. The northern approach to base camp is a trek of 22km from the roadhead at Xiate Hot Springs (courtesy of Google Earth).



(c) Map section showing Xuelian massif. BC (3520m) is at top left and Yanamax (6332m) at centre right. The spot heights of the Xuelian tops are W (6422m), M (6627m), N (6472m) and NE (6231m); no height is available for E, the most accurate estimate (6380m) being given by this map.

Appendix C: Contact Information

China Xinjiang Mountaineering Association

It is not advisable to try contacting the CXMA directly; this is better handled through an agent. The author has only untested suggestions for reliable agents who will not gouge foreign clients severely, and private contacts who may act as agents for a reasonable fee. Prospective climbers should be aware that climbing regulations in all of China are subject to rapid and unpredictable change, only part of which is due to the fact that many of the most interesting ranges are in or close to sensitive border areas.

Expedition members' contact information

Bruce Normand: bruce.normand@gmail.com

Jed Brown: five9a2@gmail.com