



# Scotland

*West Coast &  
Inner Hebrides*

In September 2024 we, a group of Imperial College students and friends, embarked on an expedition to the West Coast and Inner Hebrides of Scotland. The aims of the adventure were twofold: to explore existing climbing and to scout, explore, and develop new climbing routes.

The mountains and sea cliffs of Scotland's west presented the perfect venue for both climbing and pioneering new routes. With a combination of research, exploration, and technical climbing skills, we sought to push the boundaries of our climbing experiences while contributing to the growing climbing scene in the region.

This report outlines the planning, logistics, and execution of the expedition. It documents the areas we explored, the ten climbing routes we established on Gometra and Erraid, and the fun we had along the way.

We are grateful to the funding bodies who made this possible, notably the Imperial Exploration Board, Old Centralians' Trust, Jeremy Willson Charitable Trust, the Royal College of Science Association, and The Lord Mayor's 800th Anniversary Awards Trust.

<b>Overview.....</b>	<b>5</b>
Objectives.....	5
Scottish Trad.....	5
First Ascents.....	5
Training towards a long-term goal.....	5
Itinerary.....	6
The Team.....	9
The Friends.....	10
<b>The Expedition.....</b>	<b>11</b>
Skye.....	11
Neist.....	20
Sron na Ciche.....	24
Elgol.....	33
Departing with high spirits.....	41
Huntly's Cave.....	43
Gometra.....	46
Background.....	46
Belay Stakes.....	47
Approach & Developing Routes.....	49
Fidden Beach & Erraid.....	70
Fidden Beach.....	70
Erraid.....	70
Glen Nevis.....	80
Polldubh.....	80
Departing.....	84
<b>Logistics.....</b>	<b>86</b>
Preparation.....	86
Climbing.....	86
Alpinism & Scrambling Course.....	87
Toprope Solo & Rigging Practice.....	89
Researching Scotland.....	90
Travel.....	91
Cost.....	92
Accommodation.....	92
Cost.....	92

Food.....	93
Cost.....	93
Medical Arrangements.....	94
Insurance.....	94
<b>Impact.....</b>	<b>95</b>
Travel Impact.....	95
Car.....	95
Ferry.....	96
Camping & Climbing Impacts.....	96
Bird Nesting and Access Restrictions.....	97
<b>Conclusions.....</b>	<b>98</b>
<b>Appendix.....</b>	<b>99</b>
Equipment List.....	99
Finances.....	100
Funding.....	100
Spending.....	100
Risk Assessment.....	101
Rock Climbing / Outdoor Activities Risks.....	101
First Ascents.....	103

# *Overview*

## **Objectives**

### **Scottish Trad**

The west coast of Scotland and the Hebrides boast a wealth of climbing crags. These crags range from mountains to sea-cliffs, offering multi-pitch and single-pitch across a variety of rock types including gabbro, gneiss, and granite.

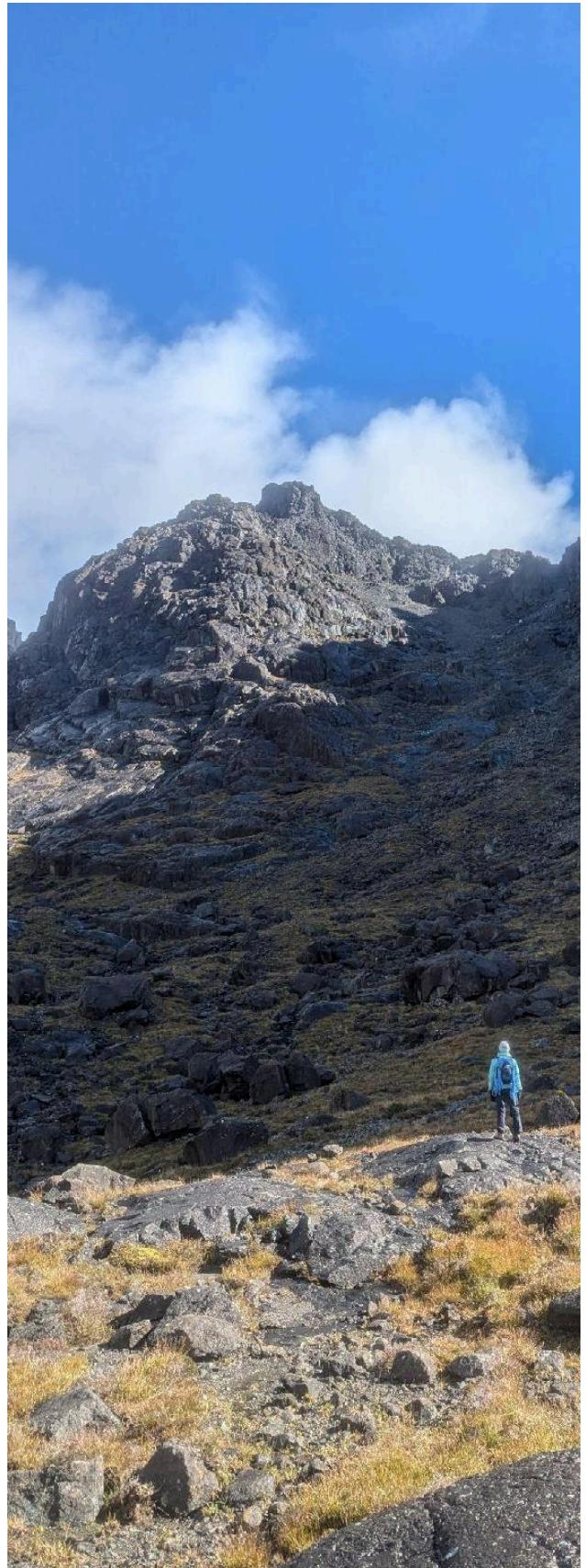
With an extended expedition planned, we had the opportunity to explore some of the fantastic areas. This provided the opportunity to improve our trad climbing skills across diverse rock types and situations.

### **First Ascents**

We wanted to learn about the work that goes into developing new routes. This involved: researching ongoing crag development, scouting new routes using the help of the wider climbing community, learning about rigging and rope access, cleaning the lines or making them suitable to climb, and then finally climbing them and sharing them with the wider climbing community.

### **Training towards a long-term goal**

A multidisciplinary expedition such as this one requires preparation, from training climbing to learning rope techniques. This required focus and collaboration.



## **Itinerary**

Here is a brief day-by-day account of our expedition, followed by a map which details the journey the expedition took, where we established camps, and areas we climbed.

### **Day 1 (8/9)**

Alex, Cosima, Luke, Miguel, and Rowen drive up to Kirk Loch Campsite from London

### **Day 2 (9/9)**

Alex, Cosima, Luke, Miguel, and Rowen drive up to the Glen Brittle Hut in Skye from Kirk Loch  
Amy, Sofia, and Tom drive across to Glenbrittle hut in Skye from Edinburgh

### **Day 3 (10/9)**

Everybody explores the area around the Glen Brittle Hut

Alex, Cosima, Luke, Miguel, and Rowen investigate crags in the north of Skye

Amy, Sofia and Tom investigate crags in Neist

### **Day 4 (11/9)**

Alex and Luke investigate buttresses on the Cuillins

Amy, Cosima, Miguel, Rowen, Sofia, and Tom climb in Neist

### **Day 5 (12/9)**

Alex, Amy, Luke, Sofia and Rowen attempt to climb on Sron na Ciche

Cosima and Miguel hike around the Cuillins

### **Day 6 (13/9)**

Everybody heads over to Elgol: Alex, Amy, Cosima, Miguel, Rowen, and Sofia climb

Amy, Cosima, Luke, Miguel, Sofia, and Tom drive over to Loch Ness Lochside Hostel

Alex and Rowen remain at Glen Brittle Hut

### **Day 7 (14/9)**

Amy, Cosima, Luke, Miguel, Sofia, and Tom visit Tomatin Distillery and Inverness

Amy, Sofia and Tom climb at Huntly's Cave

Alex and Rowen join at Loch Ness Lochside Hostel

**Day 8 (15/9)**

Alex, Cosima, Miguel and Luke collect supplies in Fort William, travel to Pennygown campsite, Mull and explore Tobermory  
Amy and Sofia climb at Huntly's Cave and then head home  
Rowen and Tom head home

**Day 9 (16/9)**

Alex, Cosima, Miguel and Luke hike to Teacher's bothy, Gometra, and scout potential new routes  
Ella and Elliot drive up to Glasgow from London

**Day 10 (17/9)**

Alex, Cosima, Miguel and Luke develop routes on Gometra  
Ella and Elliot attempt hike up Ben Nevis

**Day 11 (18/9)**

Alex, Cosima, Miguel and Luke hike back to Mull and drive to Fidden Farm Campsite  
Ella and Elliot drive to Fidden Farm Campsite

**Day 12 (19/9)**

Everybody climbs at Fidden Beach

**Day 13 (20/9)**

Alex, Cosima, Elliot, Miguel, and Luke hike to, climb on, and camp on Erraid  
Ella drives to Glen Nevis campsite

**Day 14 (21/9)**

Alex, Cosima, Elliott, Miguel, and Luke climb on Erraid, and then head to Glen Nevis campsite  
Ella hikes Ben Nevis

**Day 15 (22/9)**

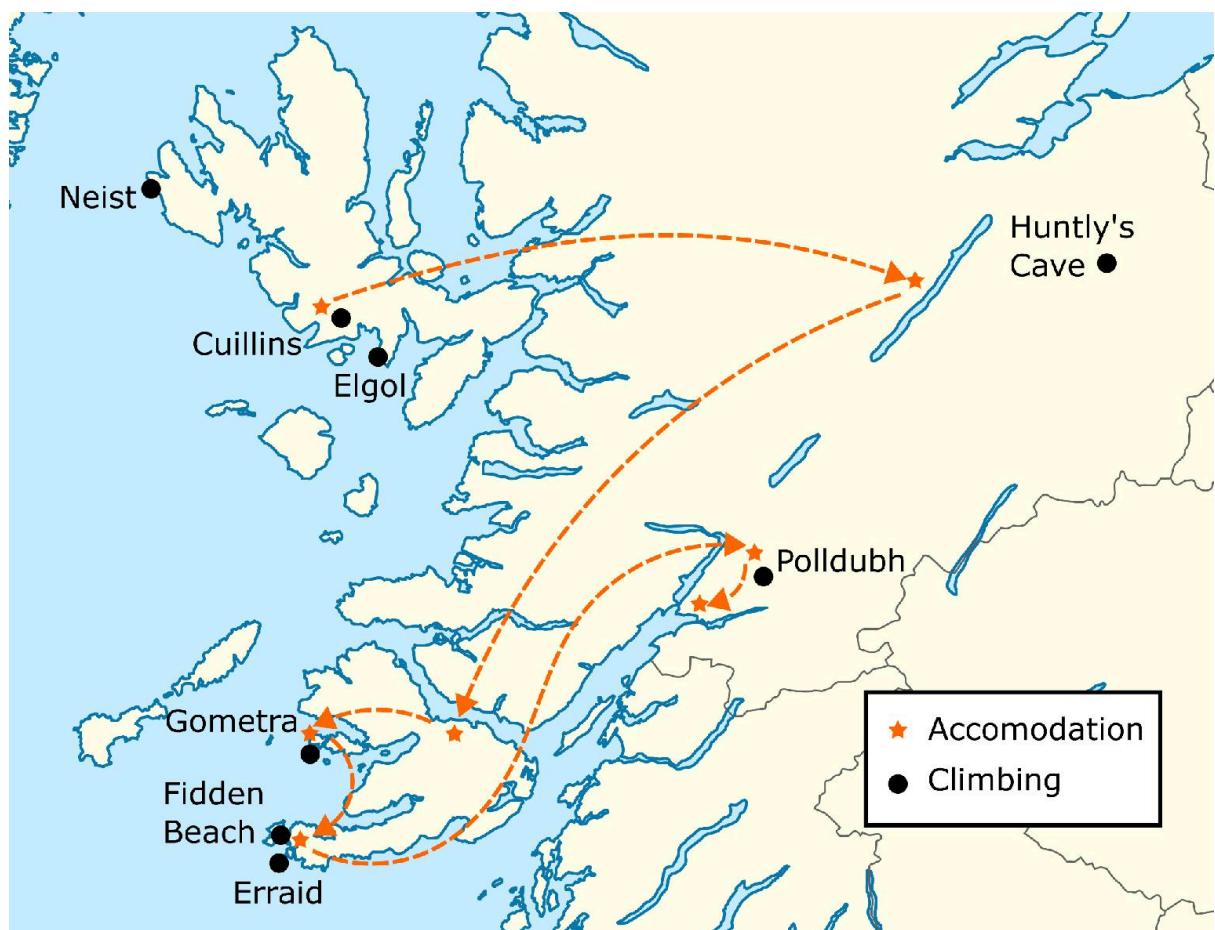
Alex, Cosima, Elliot, Miguel, and Luke climb at Polldubh  
Luke goes to A&E and then travels to Alex MacIntyre Memorial Hut

**Day 16 (23/9)**

Alex, Cosima, and Miguel climb in Polldubh and then travel to Alex MacIntyre memorial hut  
Ella and Elliot head home  
Luke recovers at the memorial hut

## Day 17 (24/9)

Alex, Cosima, Luke and Miguel leave



## *The Team*

On this expedition we were a collection of 7 Imperial Students and Alumni and 3 friends who joined for various parts of the expedition. Note that any awarded funding was only used by eligible members and friends paid for themselves.



*Elliot Badcock  
Expedition Leader*



*Cosima Graef*



*Miguel Boland*



*Amy McIntosh*



*Alex Campbell*



*Sofia Srdanovic*



*Luke Cheeseman*

*The Friends*



*Rowen Lee*



*Tom Clark*



*Ella Ross*

## *The Expedition*

Our time in Scotland can be roughly divided into the time we spent on Skye, Gometra, Mull & Erraid, and Glen Nevis. We will now recount what happened in each of those sections.

### **Skye**



One word summarises our week on Skye - Rain. Before we set off we knew we were in for poor weather. For most of the week that we planned to be on Skye, the weather was forecast to be consistently showery and low pressure. We drove up from London in near constant downpour, and found that the last road to the hut must have been struck by a meteor shower given all of its potholes.



*Camping at Kirch Loch on the way to Skye*



*The first of many mountain ranges on the trip*



*Beware, the road to the Glen Brittle Hut is full of tyre-popping potholes*



*A team photo at the Kirk Loch Campsite*

On Skye, the rain would come down in 10 minute deluges every 30 minutes, interspersed with beautiful sun that made you doubt if there had ever been rain. To add to our issues, our leader Elliot had fallen ill and would not be able to join us until later in the expedition. Nonetheless, we endeavoured to explore, climb, and enjoy Skye - and the enterprising climber was able to find gabbro, dolerite and sandstone that were either sticky in the wet, or so windswept that the rain had little impact.

We stayed in the Glen Brittle Memorial hut - a well-equipped, spacious sanctuary nestled at the foot of the Cuillins. Here we would spend the afternoons and evenings planning, cooking, hanging out (with the other interesting hut inhabitants), sampling local beers and cider (thistly cross cask edition cider was the group favourite), hangboarding and building fires. The only drawback with this hut was that there was no wifi and no signal, a notable problem when making plans in changeable weather.



*Preparing for the day in the Glen Brittle Hut*



*The first day team photo*



*Miguel and Cosima going for a run*



*The team exploring the area around the hut*



*Visiting the Old Man of Storr (not Stoer!)*



*Experiencing the first of many rainy days on Skye*



*Getting some photos on the beach*



*Admiring the climbing and waterfalls at Kilt Rock*



*Preparing dinner whilst admiring the Cuillins*



*Sampling a selection of local beers and ciders*



*Debating which beverage was the best*



*Declaring Thistly Cross Cask Edition as the winner*



*Tom wading into the chilly sea*



*Tom and Sofia standing in as the angels of the north*



A team photo before escaping the rains of Skye

## Neist

Neist provides a huge quantity of climbing on two tiers of dolerite sea-cliff, at the most westerly point of Skye.<sup>1</sup> The crag has some classic multi-pitch climbs such as *Supercharger* (E1 5c). The crag also has a lot more quality single-pitch climbs to suit all grades: *Midas Touch* (VS 4c), *Insider Dealing* (HVS 5a), and *Security Risk* (E1 5b) are a few 3-star routes that can be found in the guidebooks. Most importantly the guide book claims that there are a variety of aspects, and it offers the adventurer some climbing in any weather.

Like many places in Scotland, whilst relatively close on a map to where we were (the Glen Brittle hut), the journey to Neist would still take over an hour each way. Amy, Cosima, Miguel, Rowen, Sofia and Tom visited Neist on some chilly gusting days (belay jackets remained on at all times). These were the first climbs of the trip and the weather was fickle; to play it safe and get used to the Skye climbing grading, the team opted to avoid the abseil in crags, and climbed in the Sonamara area. Everyone got in a few good climbs on *Don't Leave Your Dad in The Rain* (S) and *Sonamara* (VS 4c) - showers of rain were a common blight but, thanks to the quick-drying rock, were of little consequence.

---

<sup>1</sup> <https://www.ukclimbing.com/logbook/crags/neist-686/>



*Sofia enjoying Neist*



*Tom (thematically) withstanding the cold water*



*Rowen leading Sonamara*



*Sofia and Amy enjoying a sunny moment*



*Cosima climbing Sonamara*



*Miguel pausing for a brief photo*



*Amy enjoying the slab*



*Sofia following up the slab*



*Walking out of Neist after a good day's climb*

## Sron na Ciche

Sron na Ciche is a section of the Cuillins visible from the window of the Glen Brittle hut, and the venue for a number of impressive climbs. This is the most popular mountain crag on Skye.<sup>2</sup>

There are stunning climbs on the gabbro across the grades: *Shangri-La* (VS 4c), *Vulcan Wall* (HVS) on the eastern buttress; *Collie's Route* (M) and *Cioch West* (S) that make their way up to the iconic *Cioch*; *Integrity* (VS) and *Trophy Crack* (E1 5b) on the upper *Cioch* buttress; *Crack of Doom* (HS), *Crack of Double Doom* (VS 4b), and *Doom Wall* (E2 5b) on *Doom Wall*, and many more 3-star routes E1-E4 on *Vulcan Wall*.

Two teams had their eyes on the 5-pitch *Cioch West* (S) and then linking it with the 2-pitch *Integrity* (VS) - a great plan. It had been raining a lot over the past week so we were a little unsure, but the other groups in the mountain hut had assured us the gabbro is still very sticky even in the sopping wet.

On the day of the attempt Alex, Luke and Rowen woke up at 6:00am, and quickly made their way out the door and started the 2-hour hike up to the base of the routes. Amy, Sofia and Tom would later start the same journey (we didn't want any queues on this adventure). The weather stayed clear and cool, no rain clouds or wind. The path was fairly easy to follow, and the gabbro was sticky to scramble and walk on. Conditions seemed promising, but, just as the climbers got to the bottom of *Cioch West* ... it started to snow. Bizarrely, at the bottom of *Cioch West* there is a stone shelter built into the side of the buttress, so the three took shelter in there until the snow and wind passed. Upon closer inspection, the route wasn't just damp, it was slick and wet with water streaming down the rock; the team made the decision to abandon the climb and message the team coming up behind about the conditions. The first team went to check out *Corrie's Route* in hopes that they could scramble up to the *Cioch* via the easier climb, but the introductory slab was also slick and wet. Instead, they scrambled up Eastern Gulley to the ridge line of the Cuillins and overlooked Loch Coire Grundha.

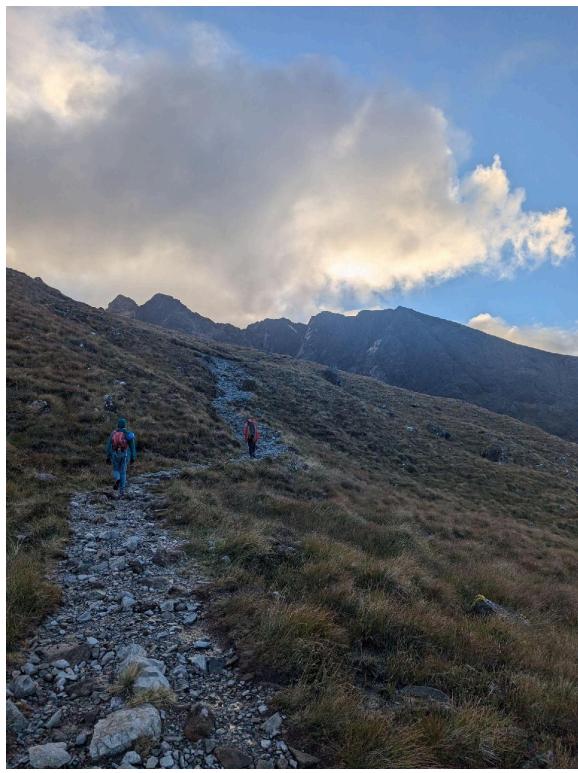
In this time Amy, Sofia and Tom had also made their way up to *Cioch West*, and decided to shelter in the stone shelter and see if conditions on the route would improve. Sadly, the rock was seeping from above and whilst the surface rain would dry off quickly in the wind (and be replaced shortly after by another squall), most of the route remained incredibly wet. On their descent from the ridgeline, Alex, Luke and Rowen chanced upon Amy, Sofia and Tom and the teams headed down to recover with coffee and pastries at the Glen Brittle campsite cafe. Miguel and Cosima had also planned to scramble up Window Buttress, but had been warned that the rock would be too wet by another mountaineer in the hut. Instead, they went for a hill walk around the base of the Cuillins.

---

<sup>2</sup> [https://www.ukclimbing.com/logbook/crags/sron\\_na\\_ciche-780/](https://www.ukclimbing.com/logbook/crags/sron_na_ciche-780/)



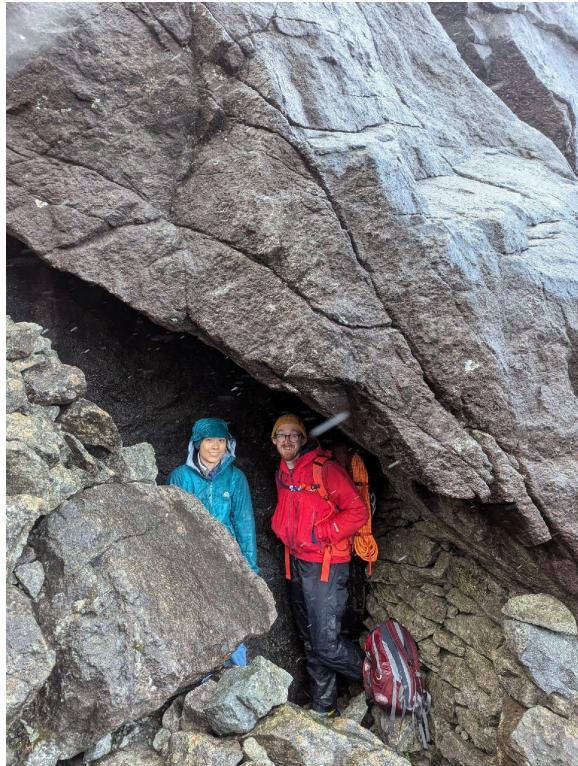
*Alex, Luke and Rowen setting off early*



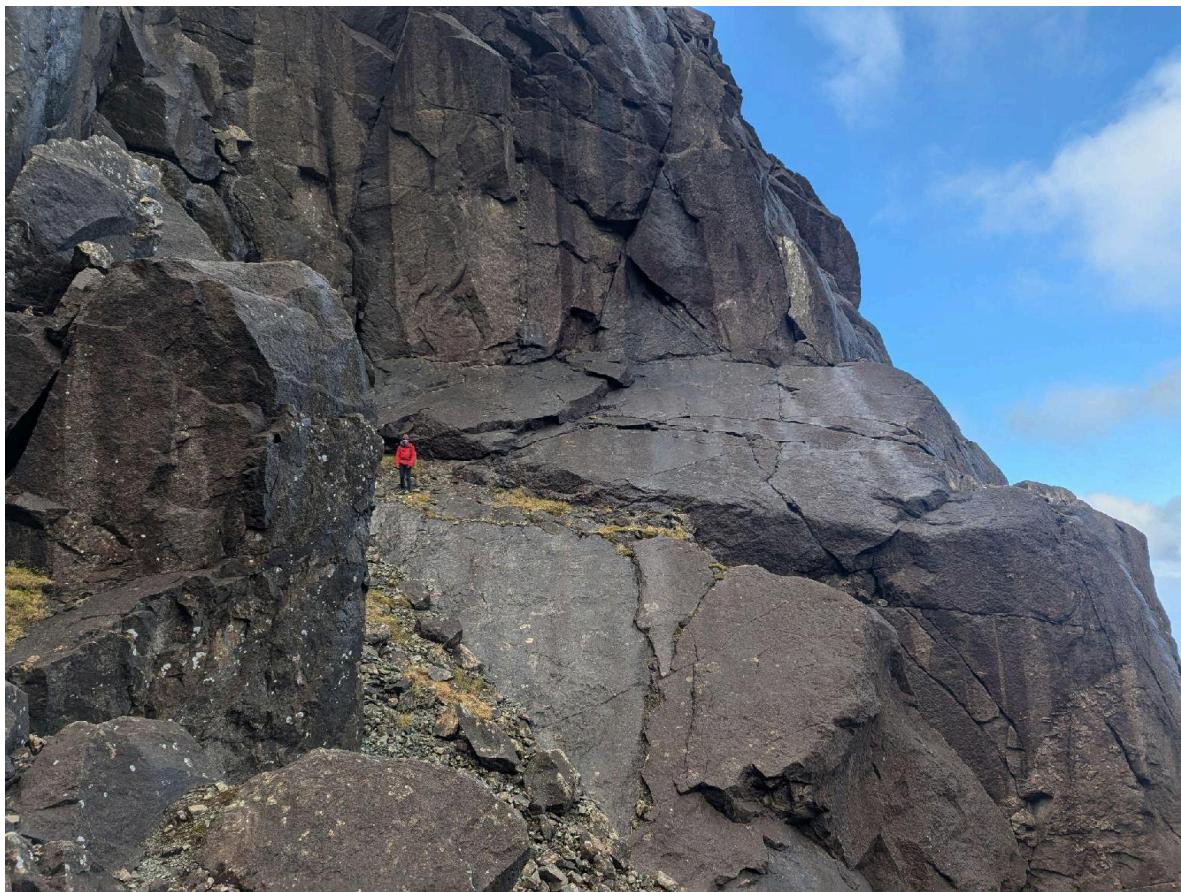
*Approaching the route in good weather*



*Rowen enduring the first squall*



*Luke and Rowen sheltering from the snow!*



*Alex assessing the slabs of Collies Route*



*Looking down on Eastern Gully*



*Alex looking over Loch Coire a Grundha*



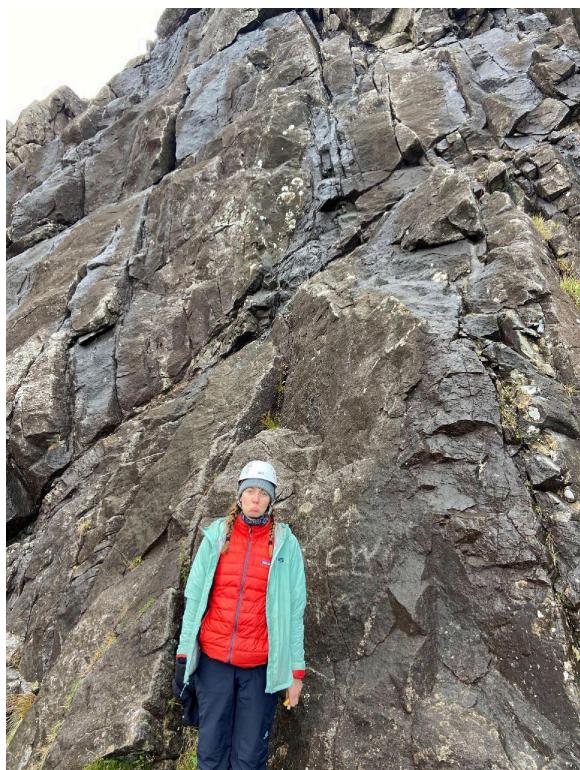
*Rowen enjoying the view after a long hike and scramble*



*Happy climbers after a few setbacks*



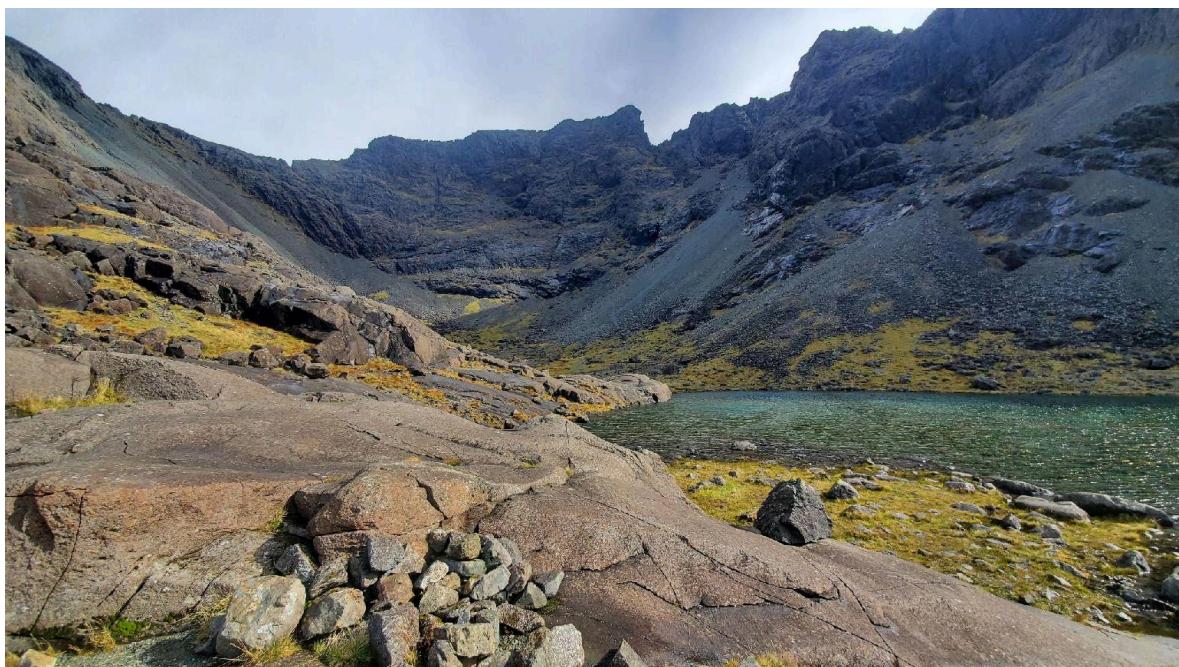
*Optimistic climbers looking forward to the day*



*Realistic climbers abandoning the wet climb*



*Miguel prepared for any season (which changes every 10 minutes)*



*Inspecting the buttresses of the Cuillins*

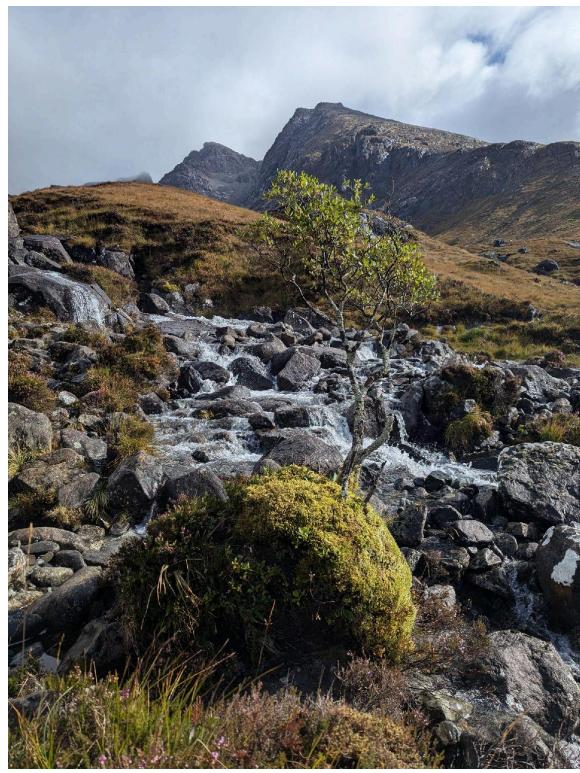


*Miguel and Cosima hiking around the Cuillins*

A funny tale in hindsight: Alex, Luke and Tom had previously gone to scout out Sron na Ciche the day before, but Luke hadn't checked where the crag was. The group went on a 2-3 hour hike (carrying climbing gear just in case) through bogs, swollen rivers, and heavy squalls to end up below, what we now know to be, Loch Coire a Ghrunnda (which Alex, Luke on Rowen would scramble to from the other side on the next day by Eastern Gulley). They passed a guide and their clients who had called off their day, and warned them that the rivers may become impassable. Eventually, the three turned back, went to the cafe, and realised later (when better checking the approach notes, description and maps) that they had gone entirely the wrong way. Always check the guide book carefully.



*Luke navigating the overwhelmed river crossing*



*Looking up toward Coire a Grundha*



*Alex and Tom hiking after a passing squall*



*Luke demonstrating the direction of the wind*



*Stopping just below Coire a Grundha*

Below is a map of the two paths taken: in green (correct), the path to Sron na Ciche; in red (incorrect), the path to Loch Coire a Ghrunnda.



A map of the two hikes taken to find Sron na Ciche

## Elgol

Suidhe Biorach is a sandstone sea-cliff crag in Elgol, in the southeast of Skye. There are a whole gamut of highly rated climbs across the grades here.<sup>3</sup> On our journey out of Skye, we made the long drive around the Cuillins to climb at Suidhe Biorach.

The day began rainy, but we were near the Cuillins which just attracts the rain, whilst Elgol is meant to be drier. We drove over to Elgol, stopping on the way in Portree to buy some local produce (tablet) and knick-knacks, and the odd photoshoot.

We set up an abseil and, one-by-one, the team lowered down to the belay ledge at the bottom of the cliff. The climbs looked to be lichen covered messes from above, but from below they looked like great climbs. Miguel and Cosima climbed *Hairy Mary* (VS 4b) with good climbing, gear, and lots of exposure as you climb the rock that juts out towards the sea; Alex and Rowen climbed *Jamie Jampot* (VS 4c), a bridging delight with a bold middle section; Amy and Sofia climbed *Fertility Right* (S), a lovely juggy route with plenty of exposure.

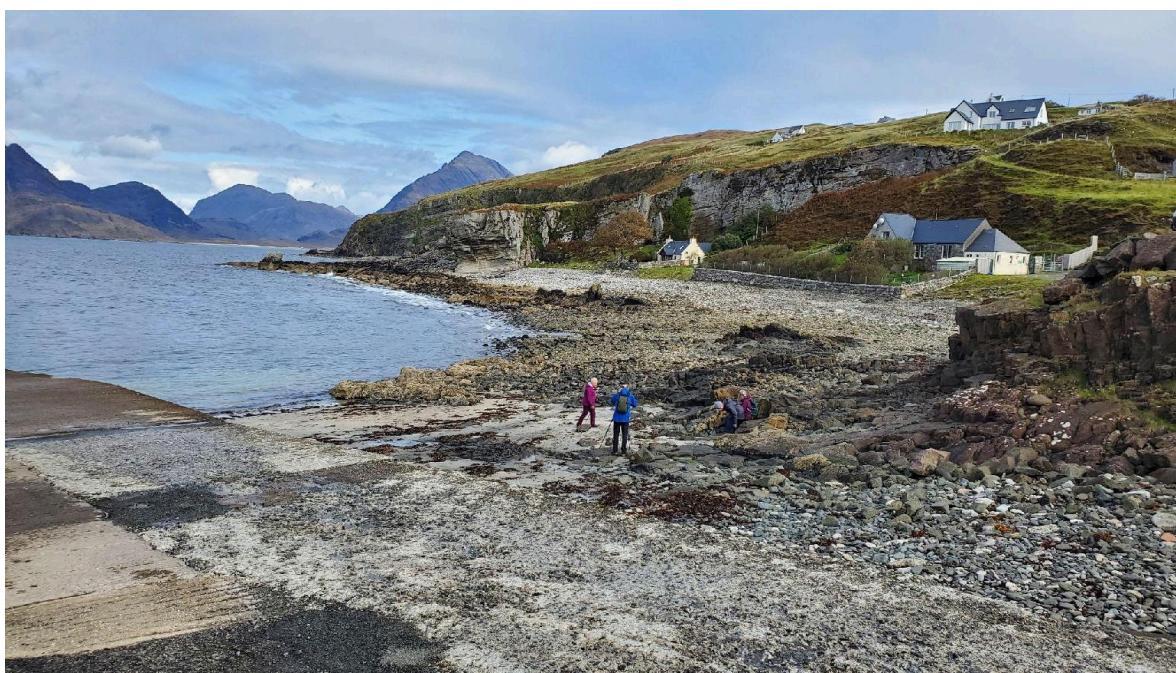
Luke and Tom stayed around the top of the crag, taking photos, providing jackets, sorting out ropes, laughing into the wind, and fearing the rainclouds that could be seen moving quickly towards them. The weather looked like it was about to turn, and as the teams were finished with their climbs (and we needed to head to the next hostel in Loch Ness), we packed up and headed

<sup>3</sup> [https://www.ukclimbing.com/logbook/crags/suidhe\\_biorach-3202/](https://www.ukclimbing.com/logbook/crags/suidhe_biorach-3202/)

towards the cars. The rain clouds changed their mind and course and set off for the Cuillins in the end, we escaped the rain but not the wind which had started strongly gusting.



*Admiring the Cuillins from the east*



*Arriving at the quiet village of Elgol*



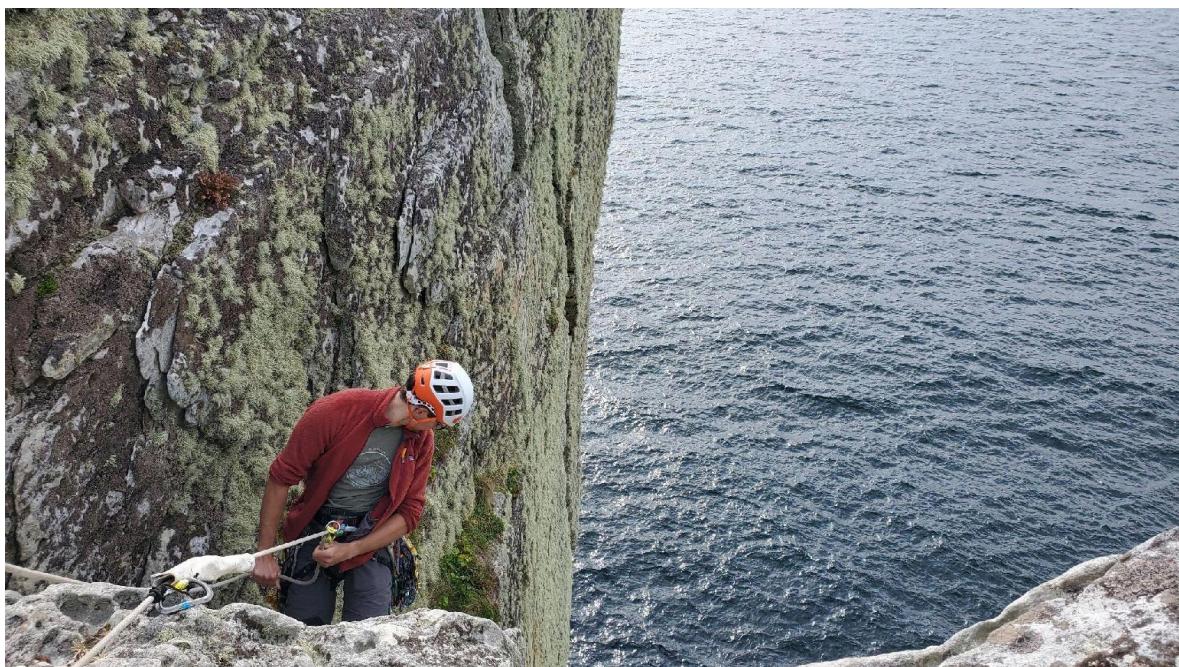
*Friendly cows greeting the team on the approach*



*Miguel preparing the abseil line*



*The team in high spirits*



*Miguel abseiling down to the belay ledge*



*Alex following Miguel soon after*



*Tom conserving his energy*



*Miguel and Cosima climbing Hairy Mary*



*Demonstrating two approaches to coiling a rope*



*Rowen climbing Jamie Jampot*



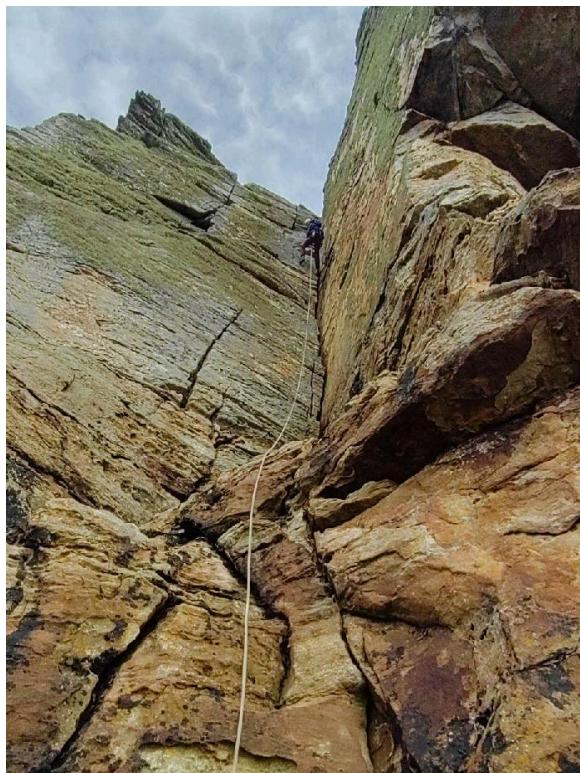
*Alex and Rowen sharing a happy moment*



*Sofia waiting on the belay ledge*



*Miguel leading Hairy Mary*



*Cosima abseiling down Jamie Jampot*



*The team making a getaway before the rain*



*The Cuillins (and the team) being photogenic*

For future trips to the Cuillins, one can catch a ferry from Elgol to Coruisk (where the Coruisk Memorial Hut is located), to start the Cuillin ridge, scramble the Dubh slabs, or climb in local crags.

## Departing with high spirits

We'd had the Scottish experience, a week of consistent rain, and we were hoping for a change in weather. However, a heavier storm was on the horizon for Skye, and with the Glen Brittle hut booked out, we sought out non-camping accommodation away from Skye.

We booked a hostel at Loch Ness to escape the storm and plan our next week. A quirky and friendly hostel, which provided freezing swims in the loch. As climbing seemed out of the question due to the storm, now seemed like the ideal time to visit a whisky distillery. One morning, at 10:00am, we toured the Tomatin distillery and learnt about the production of whisky, and sampled a few.

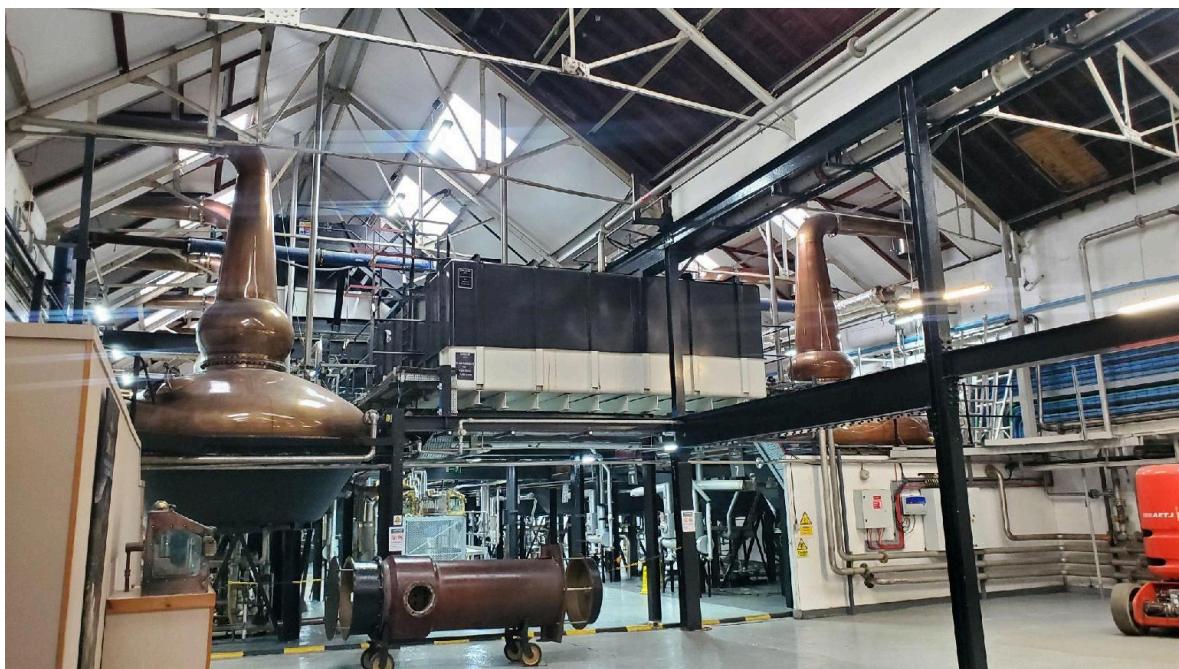
At the hostel, we planned the next leg of our expedition (Gometra). Alex, Cosima, Luke and Miguel continued the expedition, whilst Amy, Sofia and Rowen began their journeys back to London.



*The team freezing in Loch Ness*



*Amy enduring the midges*



*Learning about whisky production*



*Learning about whisky consumption*



*A team photo at the distillery*

## Huntly's Cave

Huntly's cave is a Schist crag near Inverness which claims to often be dry when everything is wet, in part due to the steepness of the routes. The crag has a few notable routes: *Slot Direct* (S), *Cave Route* (HS), *Diagonal* (VS 4c), and *Double Overhang* (HVS 5a).

We were in Inverness trying to escape the rain, and Amy, Sofia and Tom sought out this drier crag a short drive away. The trio climbed *Right-Hand Groove* (VD), *Slot Direct* (S), and *The Curver* (S). Tom climbed these routes in a borrowed harness, helmet and pair of shoes (which were not the right size). Considering this, he did a brilliant job on his first outdoor climbs!

Their first impressions of Huntly's Cave were that it was stunning; it was tucked away in a valley, peaceful, and only a 5 minute walk from the road. The climbs proved quite high in their grade and were not trivial (in part due to the damp rock). Regardless, the trio enjoyed the challenge and finally achieved a full day of climbing.

Whilst often drier than anywhere, this does not make the crag immune to the Scottish weather. Whilst the trio were visiting the crag on their drive back home, they were caught in a torrent of rain and hail. The soaked group hastily hauled their gear to the car and had to find a

hostel to dry out for the night. They had planned to camp, which would have worked out poorly as those remaining on the expedition had accidentally stolen their tent pegs.



*Walking into the crag*



*Tom climbing his first route outdoors*



*Tom navigating the tree*



*A group photo before leaving the crag*



*Sofia and Amy enjoying their last sunset of Scotland*

## Gometra



The weather forecast for our second week in Skye looked fantastic, all sun and temperatures of 15-20 C. This seemed like a great opportunity to head out to more remote islands. So, we set out for Gometra with the goal of climbing previously unclimbed routes.

### Background

Cosima had contacted a climber (Will Jones) who had sailed around the West Coast of Scotland, and investigated climbing on the remote Island of Gometra. Gometra is a small island off the west coast of Ulva, a small island off the west coast of Mull, a small island off the west coast of Scotland. Needless to say, it is very much off the beaten track, and it is inhabited by only a handful of people (some of whom write a blog about their Island life<sup>4</sup>).<sup>56</sup> There are two bothies on the island at which travellers can stay - Teacher's (where we stayed) and Jane Ann's.

Very little climbing had been recorded on Gometra: we know of only *Rock Lobster* (climbed by Yvette Primrose but location unspecified<sup>7</sup>), *Spew on Deck* (climbed by Will Jones and Robbie Hearn<sup>8</sup>) and *Celtic Storm* (climbed by Ian Davidson, Pete Stewart and P. Heneghan in 1988 but location unspecified). Ulva has had more route development, as can be found in the SMC new route database (a database for recording route development across Scotland).<sup>9</sup> These satellite islands of Mull have been home to and visited by prolific climbers. Gometra was previously owned by Hugh Ruttledge, leader of the fourth British Everest expedition. Ulva has had significant route development by Pete Whillance, an accomplished climber who has

<sup>4</sup> <https://expeditionfromthebackdoor.wordpress.com/gometra/>

<sup>5</sup> <https://scotislands.com/gometra/>

<sup>6</sup> <https://www.themountainguide.co.uk/scotland/gometra.htm>

<sup>7</sup>

<https://expeditionfromthebackdoor.wordpress.com/2017/10/06/far-and-few-far-and-few-are-the-lands-where-the-jumblies-live/>

<sup>8</sup> <https://smc.org.uk/climbs/newroutes/route/42540>

<sup>9</sup> <https://smc.org.uk/climbs/newroutes>

established lines such as *Incantations* (E6 6b). In more recent times, Yvette and Andy (island dwellers) have been climbing on Gometra. All of this is to say, the rocks on Gometra may likely have been climbed in the past, but there was no record of where or when if so. Nonetheless, we would add to this curiously rich climbing history.

We had been warned that the rock was predominantly crumbly basalt, but there were stable outcroppings. Also, we had been told the tops of the routes offered little for anchors.

## Belay Stakes

The island dwellers suggested we bring some belay stakes to use as anchors when climbing. Watching videos of first ascents in Ulva demonstrated the use of an ATV as an anchor.<sup>10</sup> Whilst, resourceful, this was neither feasible for our crag nor in the budget.

On our journey from Loch Ness to Mull, we stopped in at Fort William and scoured the town for belay stakes, or anything that we could reasonably use to build an anchor. But, it was Sunday and the heavy industrial stores, our best hopes, were closed. After a couple hours of searching and rereading articles on belay stakes, we chanced upon a metal worker modifying his friend's mobility scooter in his workshop. We discussed what we were after and walked away with 4 new aluminium belay stakes.

In our efforts to find anything that would work we considered a whole host of options, screw-in ground anchors, snow pickets, manhole cover keys, crowbars, steel rods, and angled-brackets. The idea was to hammer these into the ground or bury them, but we did not trust them as they were too short, too smooth, too thin, too weak or because burying the anchor would be too much work.

---

<sup>10</sup> <https://www.youtube.com/watch?v=rQAKoRDO87g>



Considering every option



Assessing a manhole cover key as a stake



Discussing the number of stakes required



Luke presenting the new mallet



*Discussing how deep the stakes need to go*

## Approach & Developing Routes

Gometra is a remote island, and so accessing its westerly coast, where Teacher's bothy is located, takes a bit of effort. Once on Mull, one needs to drive to the Ulva Ferry Terminal (park in the Main ferry car park) and take the foot-passenger ferry to Ulva (a 1 minute ferry that runs most of the day). Then, one has to hike across Ulva along a boggy trail well eroded by ATVs (following the signs to Gometra House and greeting the highland cows), cross the bridge linking Ulva and Gometra (which can apparently fall down in strong winds). Finally, one hikes across Gometra (passing the honesty gift shop) to eventually arrive at the Teacher's Bothy. This hike takes roughly 2-4 hours when carrying 15-20kg of supplies for route developing, climbing, eating and drinking. The map that follows plots the route from the Fishnish ferry terminal in Mull, to the Teacher's Bothy on Gometra (it also shows Torr Mor, the area in which we developed routes).



### *A map of the route across Mull to Gometra*

We scouted around the South and West of Gometra but could initially only find crumbly basalt rock too unstable and unpredictable to climb (reportedly also very slippery in the wet). We had noticed an outcropping on a higher terrace of Torr Morr on the walk in which yielded a bunch of potential routes that we would develop. We also spoke with the island dwellers, one of whom was a climber and told us about the island's climbing history, and where he had noticed some good climbing on Gometra. He pointed us to the outcropping we had found, and around the other side of Torr Mor which had even more potential.

We set to work inspecting and developing routes. Development consisted of: rigging a rope, ascending and descending the rope, inspecting a route to see if it was interesting and safe to climb, brushing away lichen from handholds and footholds, digging out the dirt and plants in cracks that could be used for protection (or were holding loose rock together), removing loose rocks and boulders, practising the moves and protection.

Whilst the rock was generally good quality, it was untravelled, and so we did have some substantially large rocks to knock down or break off unexpectedly. It quickly became important to make sure the area below a climber was clear of anyone and anything (including the end of the rope on which the climber was hanging), and to call out when you needed to pass below a climber. This meant that the belayers had to be quite attentive and stand away from the route just in case. Our practice with rope access and toprope solo was valuable here.

After a day's work we had developed a handful of routes (development of even short routes like these took us more work than we had expected). Alex began a scholastic theme for the crag's routes with *Teacher's Arete* (inspired by both our stay at Teacher's Bothy and a day spent learning rope access and route development). From left to right the routes we established and their first ascensionist(s) (FA) :

**Morning Registration 9m S** (FA Luke and Alex)

**Graduation (but from Kindergarten) 10m VS 4b** (FA Miguel and Cosima)

**Graduation (but from Primary School) 6m VS 4b** (FA Cosima and Miguel)

**Afternoon Play 16m VS 4a** (FA Luke - TRS only)

**Pier Pressure 6m HS** (FA Cosima and Miguel)

**S.T.E.M 16m VS 4b** (FA Miguel and Cosima)

**Teacher's Arete 16m VS 4c** (FA Alex and Luke)

We created the following topo (which can be found in the SMC new route database [SMC Gometra, Tòrr Mòr West Crag description page](#)).<sup>11</sup> Our new routes were featured in the SMC new routes blog September 2024 post.<sup>12</sup>

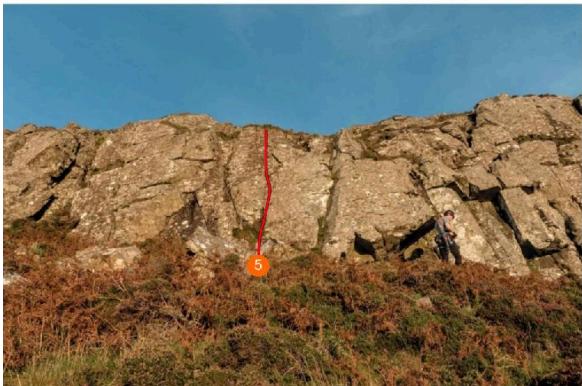
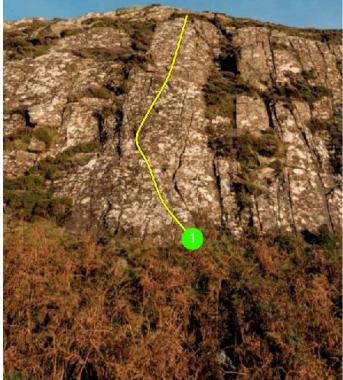
---

<sup>11</sup> <https://smc.org.uk/climbs/newroutes/crag/7782>

<sup>12</sup> <https://smc.org.uk/climbs/blog>

Gometra  
Tòrr Mòr West  
Luke Cheeseman

1 Morning Registration 9m Severe ★  
 2 Graduation (but from Kindergarten) 10m VS 4b ★  
 3 Graduation (but from Primary School) 6m VS 4b ★  
 4 Afternoon Play 16m VS 4a ★★  
 5 Pier Pressure 6m H. Severe ★  
 6 S.T.E.M. 16m VS 4b ★★  
 7 Teacher's Arête 16m VS 4c ★★



We spent only 3 days hiking in, developing, and hiking out of Gometra. We would have liked to have spent more time on this leg of the expedition, but the bothy had limited availability and the hike in and out was too demanding to repeat frequently (carry all of the climbing gear and food). Wild camping would have proven difficult due to the limited water on the island (the bothies are served by a spring), and the requirement to carry more equipment to camp. In the future, we would contact the island dwellers who could transport our equipment via ATV (they were unavailable when we visited this time).



*Boarding the ferry to Mull*



*Hoping the forecast for the next few days is accurate and good*



*Enjoying the sail to Mull*



*A team photo on the ferry*



*Luke and Alex preparing for Gometra*



*Cosima and Miguel preparing for Gometra*



Cosima and Luke hiking the long hike



Luke demonstrating how metal he is



Signalling for the ferry to come



*Ulva is separated by a small stretch of water*



*The excited team waiting for the ferry*



*Cosima hiking in with plenty of gear*



*Passing through woodlands and coast*



*Passing through the homes of many highland cows*



*Crossing the small bridge to reach Gometra*



*The team taking their first steps on Gometra*



*Alex trying to avoid the worst of the boggy route*



*Arriving at Teacher's Bothy*



*Pull testing the new stakes*



*Bounce testing the stakes*



*Luke practising his amateur photography*



*Exploring Gometra*



*Alex questioning the basalt rock quality*



*Preparing dinner in the bothy*



*Preparing for a day of route developing*



*Looking out at the upper tier of Tor Morr, the crag to develop*



*Luke rigging a static rope with few placements with which to work*



*Miguel demonstrating his rigging skills*



*Miguel inspecting the route on the way down*



*Cosima stemming S.T.E.M*



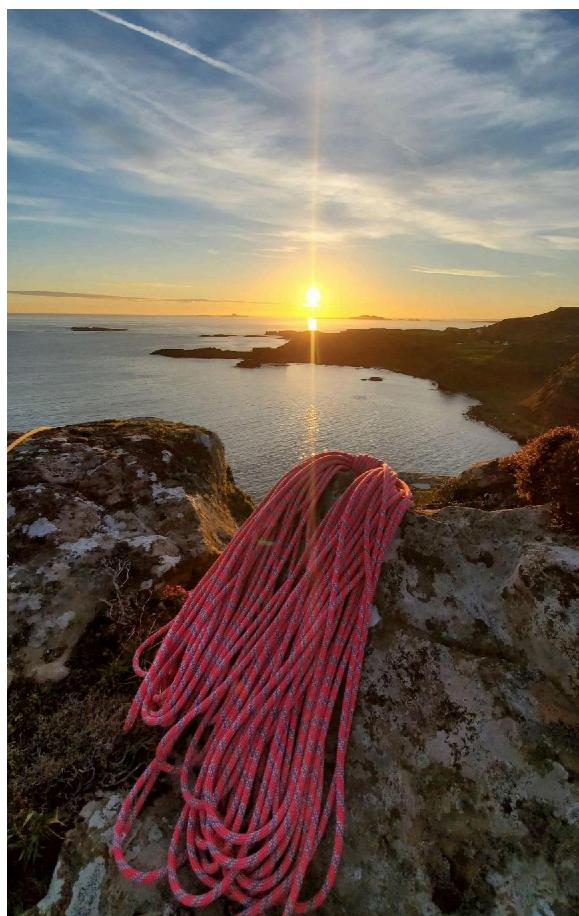
*Alex cleaning Teacher's Arete*



*The midges proving to be a nuisance*



*Alex abseiling in the sun after a long day's work*



*Enjoying a beautiful sunset*



*Luke belaying Miguel on Teacher's Arete*



*The team concluding their day of route development*



*Preparing to hike back to Mull*



*Investigating a crag for the next time*

## Fidden Beach & Erraid



We headed south to Fidden Beach and Erraid, where Elliot and Ella would join. The beautiful summer weather continued throughout the end of our time on Mull.

### Fidden Beach

We camped and recovered overlooking the beach at Fidden Farm campsite, catching each other up on what had happened over the past couple of weeks. Whilst at the campsite we climbed at Eilean a Ghearrain, a tidal rock a few hundred metres off the shore of the campsite.<sup>13</sup> This crag offered short crack climbs on sharp granite (another rock-type to add to the list). The crag offers a few noteworthy climbs *Seth* (VS 4c), *Fidden Crack* (VS 4b), *Gratification Crack* (VS 4c), *Fidden Face* (E1 5a), and a few good scrambles. There are also a collection of roadside crags on the road to the farm with noteworthy routes such as *Greetings*, *Earth Moron* (E1 5b)<sup>14</sup>. In earnest, this crag is a brilliant rest day crack but just an appetiser for the main granite climbing on Erraid (an island which is separated from Fidden Beach by a short strait of water).

### Erraid

Erraid is a tidal island on the south of Mull. The island offers quality, short, sharp, well protected granite routes.<sup>15</sup> *Blood Orange* (S), *Misunderstanding* (VS 4c), *Erica* (HVS 4c), *Smelly Mussels* (HVS 5a), *Rowan* (HVS 5a), *Never Mind the Quality, Feel the Width* (HVS 5c), and *Nite Lites* (E2 5b) are just a few of the routes that piqued our interest on Erraid. These routes covered a variety of styles on very grippy rock: offwidths, overhangs, traverses, smears and cracks were all encountered and enjoyed. The island is fairly small and the different crags can generally be

<sup>13</sup> [https://www.ukclimbing.com/logbook/crags/eilean\\_a\\_ghearrain-18007/](https://www.ukclimbing.com/logbook/crags/eilean_a_ghearrain-18007/)

<sup>14</sup>

[https://www.ukclimbing.com/logbook/crags/fidden\\_roadside\\_attraction-30925/greetings\\_earth\\_moron-692906](https://www.ukclimbing.com/logbook/crags/fidden_roadside_attraction-30925/greetings_earth_moron-692906)

<sup>15</sup> [https://www.ukclimbing.com/logbook/crags/erraid\\_crags-10387/](https://www.ukclimbing.com/logbook/crags/erraid_crags-10387/)

accessed fairly quickly from one another, however some crag accesses are tidal and some can be hard to find due to low foot traffic and bogs. The island also offers a number of deep water solo routes at high tide.

Given that Erraid is a fairly remote island, we posited that there would likely be some potential for finding new routes. Some of the routes we were keen to climb, and seem to climb obvious lines, had only been put up in the last few years (and more could be found in the SMC new route database). After a few non-starters, and misidentifications, we found a couple of short routes that hadn't been climbed before. Climbing new routes here posed different problems than on Gometra; the rock was far more stable as it was solid granite, but the lack of any erosion meant that the rock was incredibly sharp, and we walked away with many scrapes and cuts.

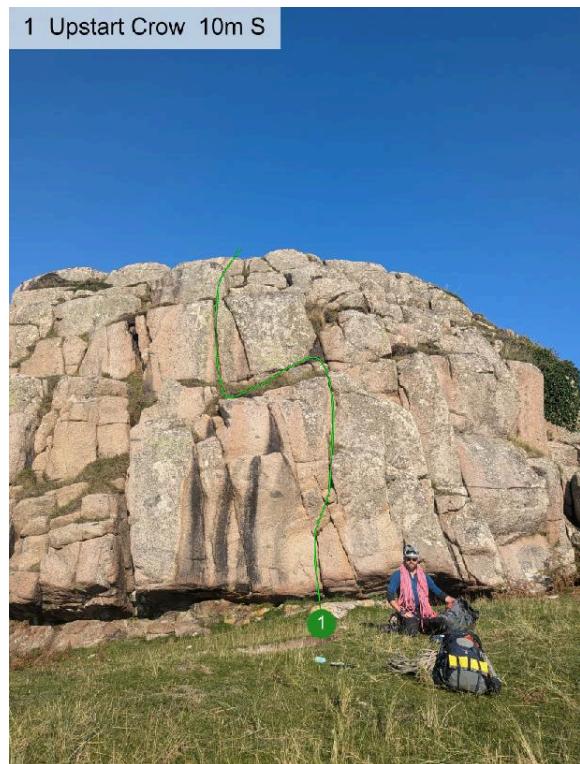
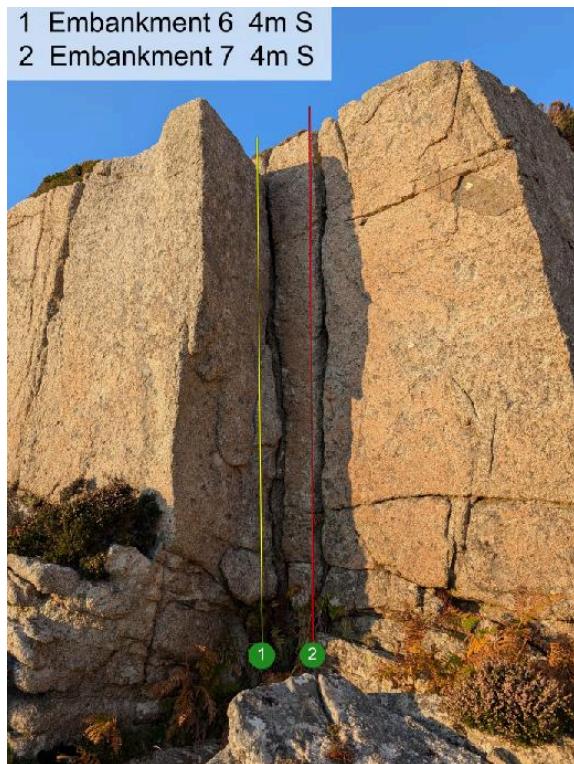
The three routes we climbed were:

**Embankment 6 4m S (FA Elliot and Luke)**

**Embankment 7 4m S (FA Luke and Elliot)**

**Upstart Crow 10m S (FA Elliot and Luke)**

These climbs have been submitted to the SMC and are awaiting response (at the time of writing).



Erraid is accessed by walking across a dried channel 1-2 hours either side of low tide; outside of these tides one may be wading through waist-deep water for longer than would be pleasant. However, the tide times for our visit were the complete opposite of what we wanted. Ideally for day trips, we would have a low tide in the morning (at about 7:00 am) and a corresponding low tide in the evening (at 7:30 pm). Below are the tide times for the days we had to visit Erraid.

THU 19 Sep	FRI 20 Sep	SAT 21 Sep	SUN 22 Sep
▼ 12:54 am 0.2m	▼ 1:27 am 0.17m	▼ 2:07 am 0.26m	▼ 2:51 am 0.45m
▲ 6:56 am 4.05m	▲ 7:30 am 4.06m	▲ 8:05 am 3.97m	▲ 8:41 am 3.8m
▼ 1:05 pm 0.04m	▼ 1:44 pm 0.06m	▼ 2:29 pm 0.22m	▼ 3:17 pm 0.5m
▲ 7:22 pm 4.42m	▲ 7:58 pm 4.3m	▲ 8:35 pm 4.07m	▲ 9:12 pm 3.74m

Not to be deterred, we decided to walk over to Erraid during an afternoon low-tide, wild-camp on Erraid overnight, and walk out again at the subsequent afternoon low-tide. This made for a special and isolated time on Erraid; we had an incredibly clear sky and bright moon throughout the night.

The days we spent on Erraid felt like we had accidentally left the UK, and made our way to a European summer crag (craggs that had been dreamt of during the rainy first week on Skye).



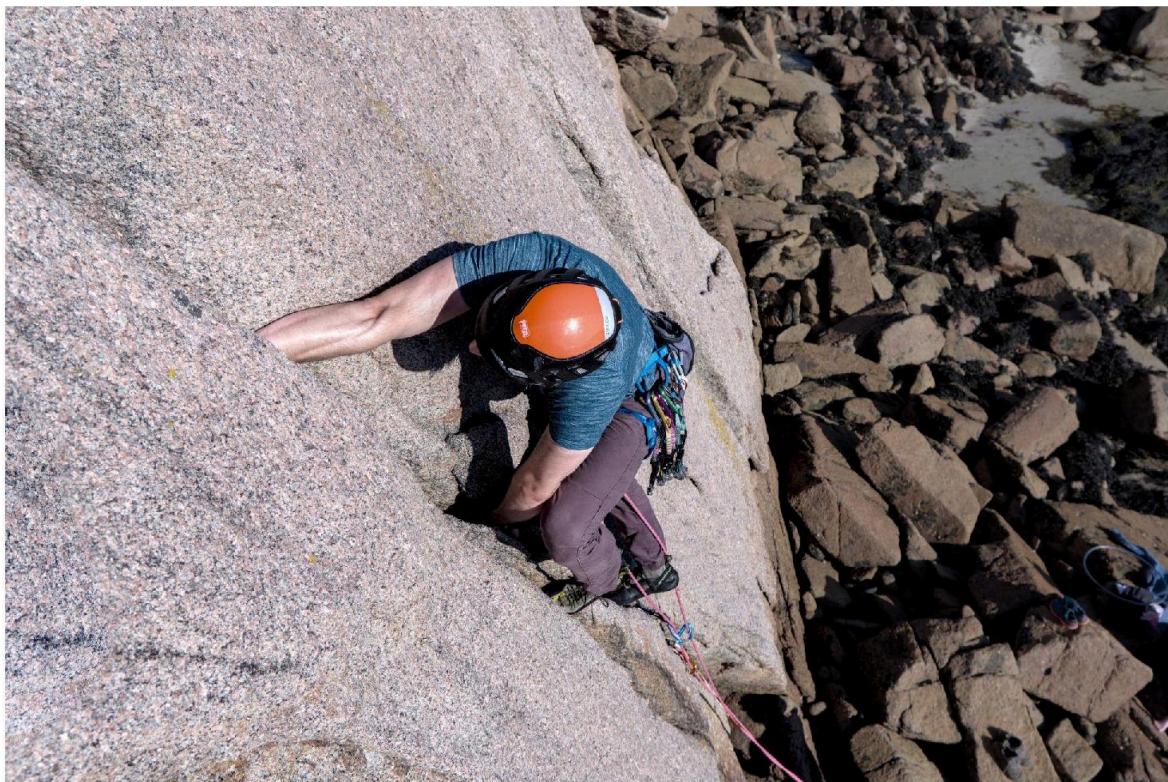
*Camping by the beach*



*Preparing food and planning*



*Washing clothes after some sweaty days hiking*



*Alex storming up the beachside cracks*



*Miguel joining in the crack climbing*



*Miguel enticed by a roadside route*



*The team making their way across the tidal path*



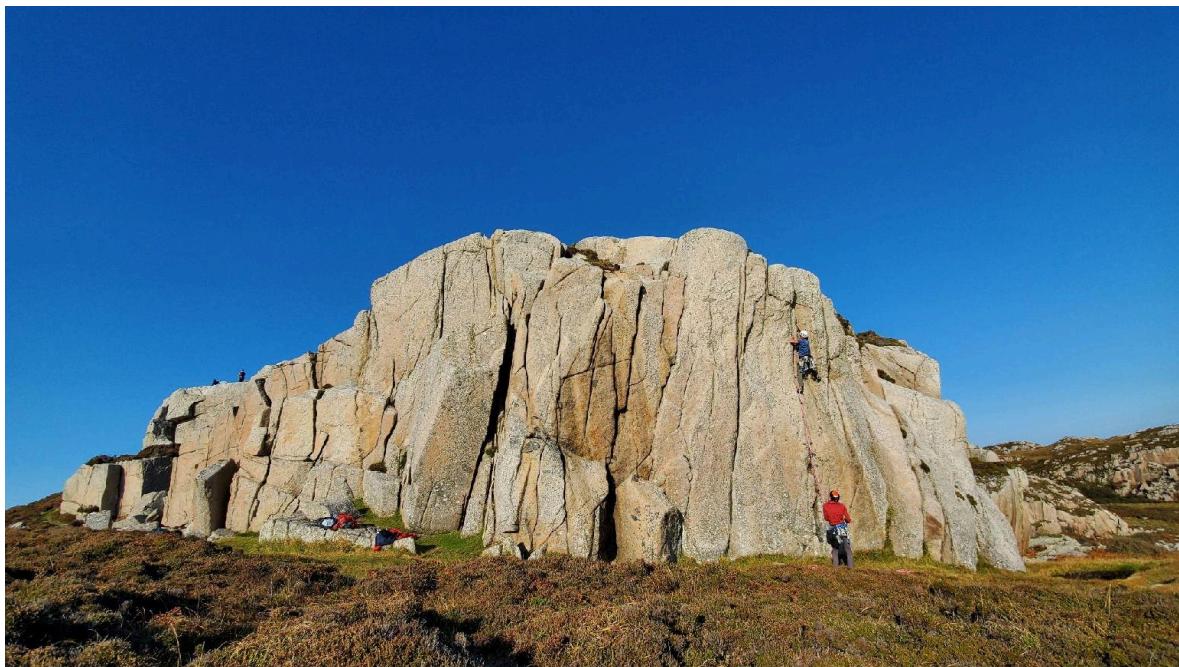
*Setting up camp on the beach on Erraid*



*Enjoying the serene beach*



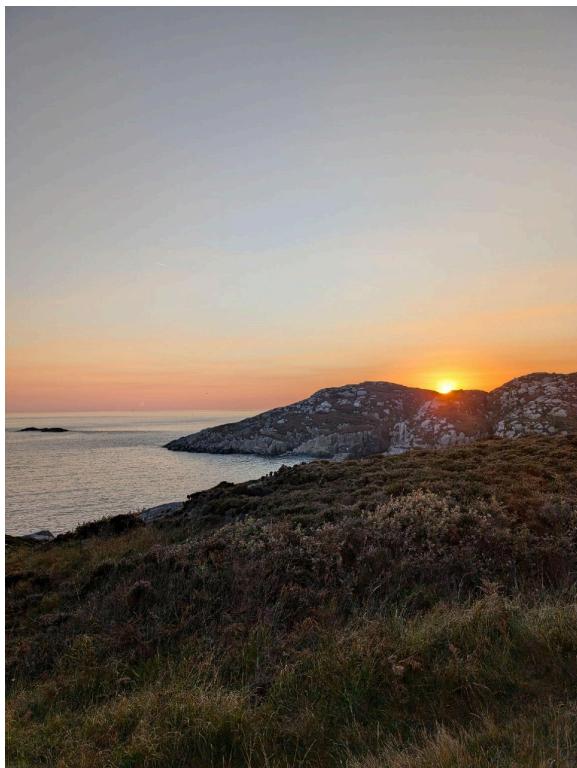
*Alex climbing the sharp granite*



*Miguel fights his way up Nite Lites*



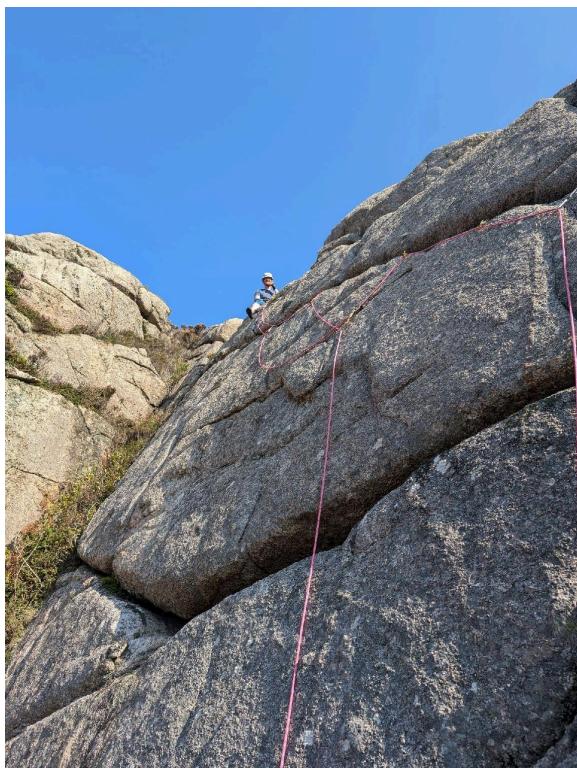
*Elliot posing for the photo on The Goupher Hole*



*Enjoying beautiful sunsets*



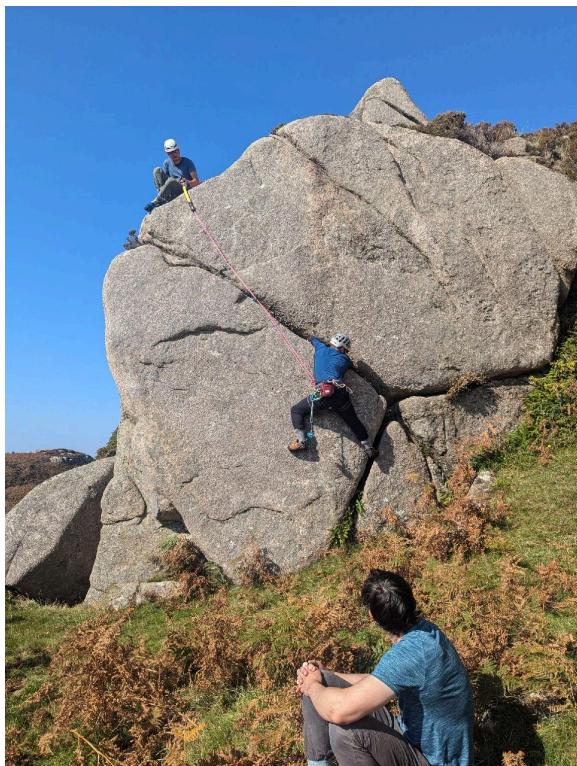
*Watching the stars in the night*



*Luke topping out Erica*



*Cosima climbing Rowan*



*Elliot wrestling with the offwidth*



*The team making their way back from Erraid*

## Glen Nevis



We had not intended to wind up in Glen Nevis, by all accounts we were planning to spend our last week in Arran. Arran has some stunning, long, slabby classics that drew us all in. However, the forecast around the whole of Scotland (and in fact everywhere in the UK) was looking quite bad for the end of the trip; the ferries from Mull to Oban were mostly booked out, and those that were available would have resulted in us taking multiple days to travel to Arran (or taking a much longer journey via Lochaline); and, we had chosen to spend a couple of days climbing on Erraid.

If we went to Arran, we anticipated that we would arrive with the rain-clouds, and we wanted to climb, not wait out the rain. Instead, we headed north to Fort William and Glen Nevis which was logically easier, had good weather for a few days, and had long quality climbs. We booked some nights in the Glen Nevis campsite and camped in the valley.

### Polldubh

Polldubh has highly-rated roadside slab multi-pitch routes. The crags around Glen Nevis (such as Ben Nevis) often have fantastic climbing but require extended approaches, so the short 10 minute approach, coupled with top-tier multi-pitches made this venue ideal. Miguel and Cosima climbed *Vampire* (80m VS 4c). Alex, Elliot and Luke arrived at the crag later and had planned to climb *Storm* (85m HVS 5a) but due to a queue on *Storm*, climbed *Vampire* also. The trio got two pitches up when Luke's knee failed and he could no longer climb (fortunately, Alex had led the pitch). Alex, Elliot and Luke rescued themselves from the route via a couple of tree abseils. Miguel and Cosima joined them at the base of the route, and together the team made their way back to the cars. Luke visited A&E and was informed he had likely pulled a ligament in his knee with some small tearing, and to stop climbing and hiking. On reflection, the rescue went fairly smoothly; all remained calm and did a great job. Fortunately, the conditions were incredibly favourable: the injury occurred whilst on toprope and just below the second anchor, there was

good weather, trees to abseil, no stuck ropes, people to help, and an incredibly short walk to the car.

*Vampire* was a lovely slabby 3 pitch climb that had some awkward protection in the first pitch (and care required to avoid the E1 variant), a few awkward moves followed by an extended runout on jugs in the second pitch, and an easy slab to finish.

The following day Alex, Cosima and Miguel climb *Storm* which was also a great route. The second pitch offered some unique and engaging climbing, and the third pitch offered a real challenge. The trio finished up in a light shower.



*Waking up to a misty morning*



*Cosima setting off on pitch 2 of Vampire*



*Alex preparing for pitch 2 of Vampire*



*Luke enjoying the day after leading pitch 1*



*Elliot basking in the sun*



*Alex setting off*



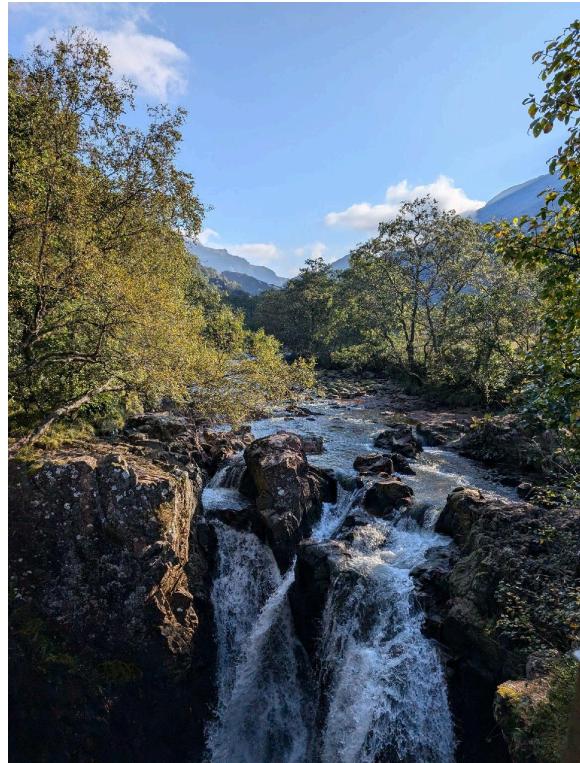
*Witnessing the pitch 2 runout*



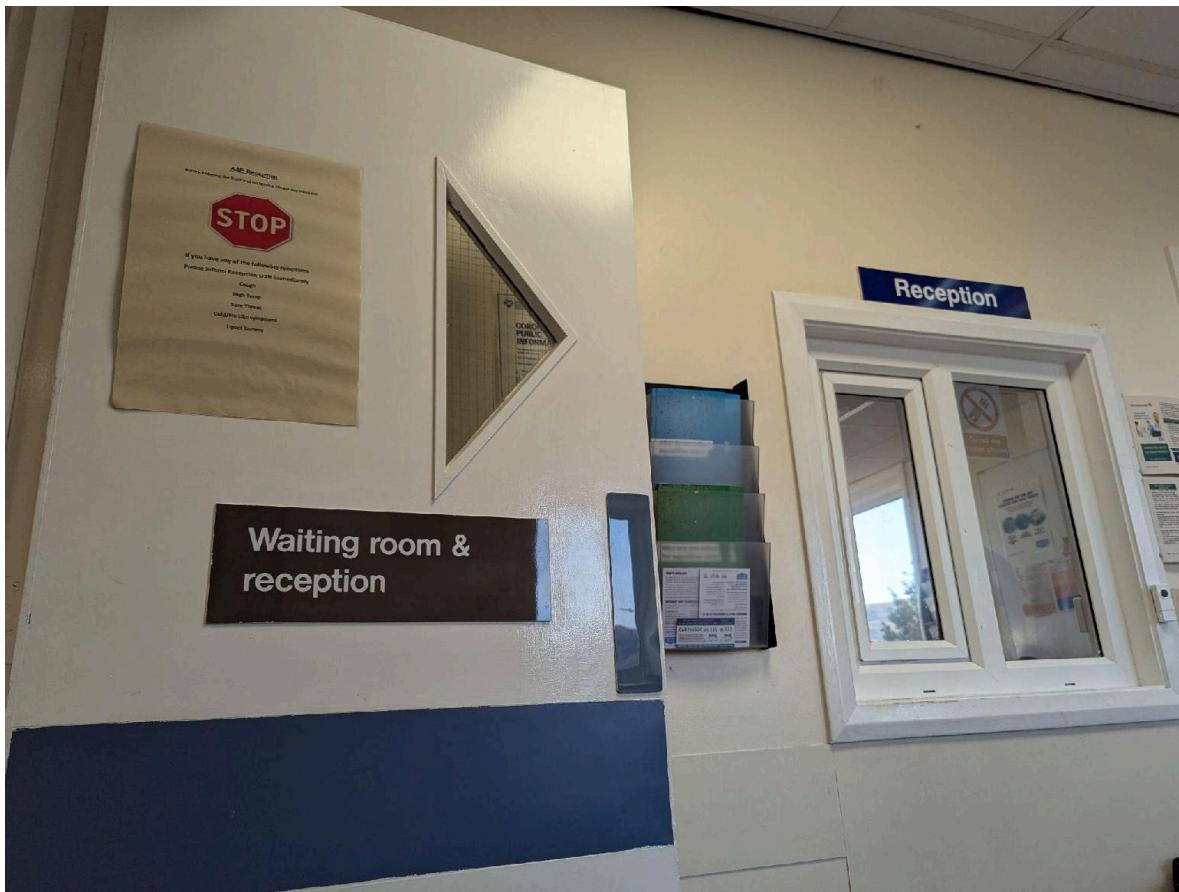
*Starting the self rescue abseils*



*Perfect conditions for having an injury*



*Enjoying the summer in Glen Nevis*



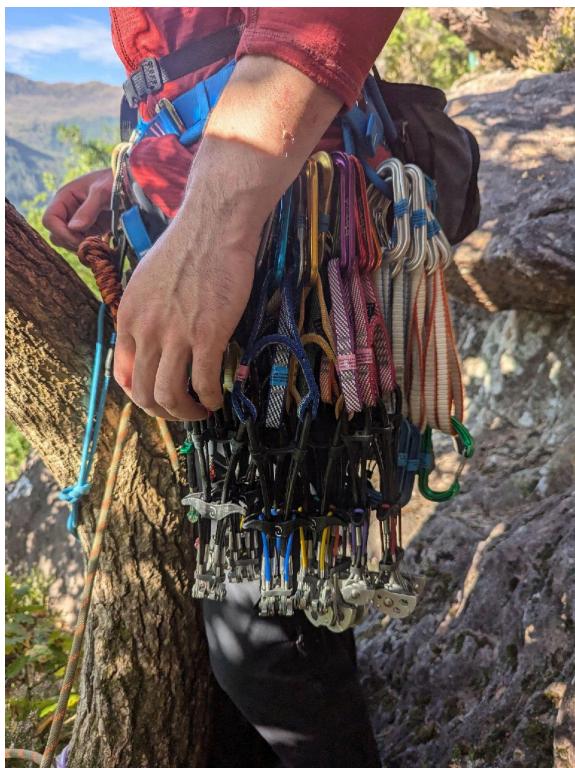
*Waiting in A&E*

## Departing

The weather was forecast to become poor again for the remaining time we had planned to spend in Scotland. Moreover, the weather did not seem to be looking great anywhere in the UK. The team morale had been diminished in the first week on Skye, trying to make the most of bad weather, and the team did not feel up to trying to climb during bad weather again (a familiar sentiment from a year of rainy climbing weekends). The team also did not want to pay for more accommodation to do this, and lock themselves to a certain area when the weather was so changeable. We had moved around a lot during our time in Scotland in an attempt to account for the weather, which meant we had climbed less than we had expected and wanted. This meant we did not feel overly keen to keep driving around Scotland. Finally, Luke could no longer climb or walk. For these reasons, we decided to end the expedition early. We spent the final night in the Alex MacIntyre Memorial Hut in Glen Nevis, shared some Jura Whisky, and headed back to London in the morning.



*Driving home through Glen Coe*



*Reflecting on just some of the gear we brought to Scotland*

# *Logistics*

## **Preparation**

### **Climbing**

We planned to climb outdoors as many weekends during 2024 as possible. The focus would be to improve our overall climbing ability, but also become familiar with sea-cliff climbing and scouting new routes. We also planned to train indoor climbing, to improve overall climbing.

Unfortunately, the first half of 2024 was an exceedingly wet year, and many of our planned climbing weekends were cancelled (if we were unable to reasonably alter our plans to climb somewhere drier).<sup>16</sup> Our availability was also limited by nearing important degree milestones and lifematters. Nonetheless we still managed a number of team climbing trips to Dartmoor, the Wye Valley, Dorset, the Peak District, North Wales and Portland. Most members of the team also went on personal climbing trips around the UK & Europe, in the months prior to the expedition.



*Climbing in Dartmoor*

---

<sup>16</sup> <https://www.bbc.co.uk/weather/articles/cz44911j2d4o>



*Climbing at Dancing Ledge, Dorset*

## Alpinism & Scrambling Course

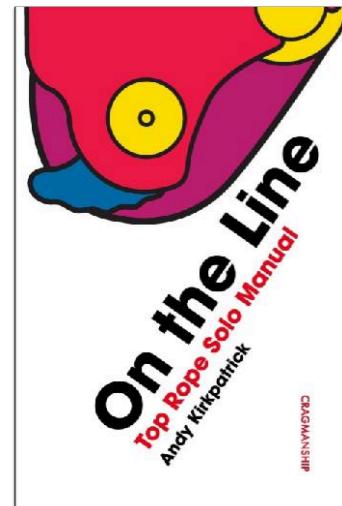
Our plan included spending time on Skye, home to the Cullins. Arguably this is the main mountaineering objective on the island, playing host to many graded scrambled and alpine routes. Moreover, Scotland has many venues where scrambling and alpine skills are valuable. To prepare, Amy, Luke, Kat (a friend), and Sofia headed up to North Wales for an Alpinism and Scrambling skills course. Many of the other members were familiar with Scrambling or Alpinism.



*Alpinism course in North Wales*

## Toprope Solo & Rigging Practice

Establishing new routes was one of our objectives. There are, broadly, two approaches to this: with or without prior inspection of the route. The first approach is known as ground up; a climber attempts a new route as they would any other route, belayed by a partner and placing gear as they climb. The second approach requires a toprope or abseil line to inspect the route before climbing; this approach allows a climber to better assess the difficulty and style of the climb, and to ensure the route is clean of debris and any potential hazards (such as loose rock) are removed. The decision about whether inspection is necessary depends on many factors including: a climber's skill level, a climber's familiarity with establishing routes, quality of the rock, how developed a climbing area is.



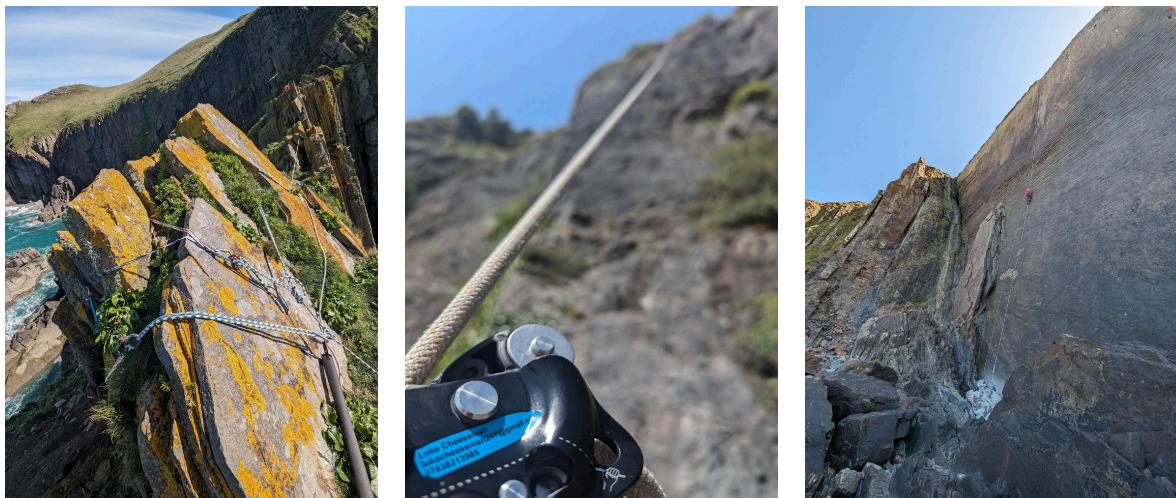
We decided early on to establish most routes with prior inspection. The risks involved, to both the climber and belayer, of climbing a route without prior inspection felt best avoided (e.g. falling rocks and unknown protection). Whilst we were confident in the ropework and anchor building skills required for climbing, we needed some guidance and practice in rigging static lines, building anchors to inspect new routes, and ascending and descending ropes. Furthermore, developing new routes is greatly benefitted by knowing toprope soloing techniques - a climber can independently develop and practise a climb without putting a belayer at risk or monopolising their time. In theory, with enough ropes and rocks, the whole team could be developing routes at the same time. This technique also gives a climber a safe way to practise routes that are harder or more dangerous than the climber feels skilled enough to climb without practice. Andy Kirkpatrick has written a collection of books which cover rigging, toprope solo and many other topics on climbing and ropework: Down and On the Line were of particular interest to us.<sup>17 18</sup> We practised the techniques detailed in these books, and perfected them in UK crags.

Many crags in Scotland are sea-cliffs which provide fantastic climbing but terrible anchors, and even those crags inland can be rocky outcroppings that are capped with grass and dirt. At developed crags, climbers have either hammered in belay stakes for future use (e.g. Swanage, Cornwall), or decided that local fence posts and trees are strong enough (e.g. Millstone, Shorn

<sup>17</sup> <https://www.andy-kirkpatrick.com/shop/view/down>

<sup>18</sup> <https://www.andy-kirkpatrick.com/shop/view/on-the-line>

Cliff). We needed to understand what made a good belay stake, and so researched a number of forums to figure this out.<sup>19</sup> <sup>20</sup>



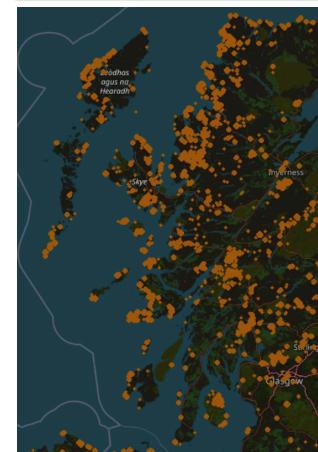
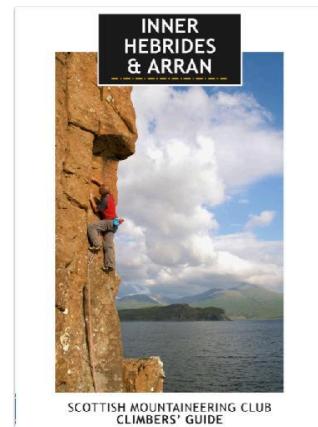
*Rigging and toprope soloing*

## Researching Scotland

To make the most of our expedition, we needed to research the West Coast and Islands to discern both where there was already good climbing, and where there was potential for route development. We wanted not only an initial plan, but also to be able to adapt to changing conditions - this would prove to be necessary and research continued during the expedition.

Researching climbing in Scotland is a bit overwhelming, the UKC crag map for the Scottish West Coast and Hebrides (right) demonstrates how many places there are to climb in Scotland. Consulting with UKC (UK Climbing), SMC (Scottish Mountaineering Club), various guidebooks, professional climbers (notably we got some advice from Robbie Phillips), friends, and local climbers during our expedition helped to focus on areas which had noteworthy climbing, and understand which areas were best visited in which weather.

As there is so much climbing on Scotland already, it's perhaps unsurprising that people are consistently developing new areas. Most of this information is recorded in the [SMC new route](#)



*Crag map of Scotland (UKC).*

<sup>19</sup> [https://www.ukclimbing.com/forums/gear/belay\\_stakes\\_made\\_of+how\\_long-509351](https://www.ukclimbing.com/forums/gear/belay_stakes_made_of+how_long-509351)

<sup>20</sup> <http://www.bolt-products.com/Glue-inBoltDesign.htm>

database.<sup>21</sup> We would use this database to find areas of potential new route development.

We mostly investigated climbing on and around Skye, Mull, Arran, and Glen Nevis. But, we also investigated other venues such as Lewis, Harris, Pabbay, the Cairngorms, and the Etive slabs.

## Travel

The option we initially proposed was to rent a minibus. However, in the end we used mostly personal vehicles (purchased after the initial expedition proposal) and a rented vehicle. This was in part due to a lack of communication by the student union that meant we were unable to book a minibus. In the end, separate private vehicles allowed us to be more flexible, and they were easier to navigate on Scotland's single track roads.

Four of the team, and a friend, drove up to Skye from London over two days in two personally owned cars to arrive on 9/9. Two of the team, and a friend, took a train from Edinburgh, where they were already visiting, to Inverness, rented a car and drove to Skye to also arrive on 9/9 (the car hire became necessary due to a last minute illness that left one member unable to join until later with their car). Travelling around Skye and to Loch Ness was entirely driving or walking.

Two members, and the two friends, departed on 15/9, they drove to Edinburgh and returned the rental car and took a train back to London. The remaining four members drove to Mull, taking a 10 minute ferry from Lochalsh to Fishnish (which does not require booking). Travelling around Mull was entirely driving.

Travel from Mull to Gometra required a small foot-passenger ferry from Mull to Ulva (which does not require booking), and a 2-4 hour hike to the west of Gometra on a well-established footpath.

One team member, and a friend, drove from London to Mull (spending a day in the Ben Nevis area) on 19/9. Travelling on Mull was entirely driving or walking. At this point we again had three cars.

We drove from Mull to Glen Nevis, taking the same ferry as before but in reverse. We later all drove back to London.

---

<sup>21</sup> <https://smc.org.uk/climbs/newroutes>

## Cost

Description	Cost
Fuel	£760.23
Car Rental	£287.39
Luke insurance to drive Alex's Car	£164.32
Ferries	£103.95
Trains	£230.13
<b>Total</b>	<b>£1546.02</b>

We initially estimated £2900-£3500 in travel costs for 8 people over the entire trip duration.

## Accommodation

We utilised a mix of campsites, wildcamping, bothies, huts, and hostels:

## Cost

Description	Cost
Kirk Loch Campsite, Lochmaben	£45.00
Glenbrittle Memorial Hut, Skye	£792.00
Loch Ness Lochside Hostel, Inverness	£264.00
Pennygown Campsite, Mull	£51.00
Teacher's Bothy, Gometra,	£116.94
Fidden Farm Campsite, Mull	£120.00
Erraid (wildcamping), Mull	£0.0
Glen Nevis Caravan Park & Campsite, Glen Nevis	£189.00
Alex MacIntyre Memorial Hut, Glen Nevis	£100
<b>Total</b>	<b>£1677.94</b>

We initially estimated £2400 for 8 people and the entire trip duration.

## Food

Most of our shopping was done when we passed through Fort William, to shop cheaply at Lidl. We did have to supplement this with local stores in Skye and Mull. For future expeditions, plan food well and ensure you know how well supplied the area you're visiting is, and you know how far the local supermarkets are (For example Mull has only one co-op in the North and a couple of local Spars).

*Note: for simplicity in accounting, here we record how much money was spent on food and how many people were fed. Friends paid for their own food and funding was only shared with team members.*

## Cost

### People Catered

Week 1: 7 days 8 people

Week 2: 4 days 4 people

Week 2-3: 3 days 5 people (Ella was not included)

Week 3: 1 day 4 people

(On average this means there were 6.07 people per day)

### Money Spent

Using ~£740, we catered for 91 days worth of food for one person, so we spent roughly £8.13 per day per person.

We had originally estimated at £10 per person per day, for 8 people for the entire trip duration.

This is not a comprehensive accounting of all money spent on food, there were the occasional cafe and pub visits that have not been recorded as expenses.

## Medical Arrangements

First aid supplies included:

Type	Contents
Equipment	Gloves, thermal protective aid, triangular bandages, supporting (crepe) bandages, tough cut shears, tweezers, tick tweezers, resuscitation pocket mask, tourniquet / israeli bandage, emergency blanket, thermometer, scissors
Medications	Sun cream, sea sickness tablets, paracetamol, ibuprofen, aspirin, antihistamine cream / tablets, indigestion tablets, Imodium (or alternative diarrhoea remedy), rehydration salts, EpiPen and medication relative to the crew needs e.g. asthma treatment, nut allergies
Wounds	Plasters, wound dressings, antiseptic wipes, cling film, eye dressing, surgical tape, finger tape

As we were often walking through ferns and around sheep, we routinely checked for ticks (and found many).

## Insurance

All members organised their own personal expedition insurance.

Many chose to use the BMC rock insurance with increased personal property cover.<sup>22</sup>

For example: single cover for 08/09/2024 - 29/09/2024 cost £87.55.

---

<sup>22</sup> <https://services.thebmc.co.uk/modules/insurance/>

# ***Impact***

Whilst we aimed to minimise the environmental impact our expedition had, our activities still had measurable consequences.

## **Travel Impact**

The largest environmental impacts on this trip were the miles driven in cars and ferries taken. A few train journeys were taken but their impact is negligible compared with the miles driven. In this section, we will detail the carbon cost of our expedition.

### **Car**

The following is a rough summary of the journeys taken and their carbon cost. Ideally, we would have taken mileage readings before and after our expedition but we did not.

We had 4 different vehicles during this trip, for the sake of simplicity we will assume they are similar to a Toyota Yaris, with an rough fuel economy of 4.35 litres per 100 km<sup>23</sup>

<b>Journey</b>	<b>Cars</b>	<b>Distance for 1 car (km)</b>
London - Glenbrittle	2	1012
Inverness - Glenbrittle	1	191
Lap of skye	2	150
Glenbrittle - Neist (Return)	1	120
Glenbrittle - Neist (Return)	2	120
Glenbrittle - Elgol	3	71
Elgol - Glenbrittle	1	71
Elgol - Loch Ness	2	124
Glenbrittle - Loch Ness	1	150
Loch Ness - Edinburgh	1	271
Loch Ness - Ulva Ferry	2	194

---

<sup>23</sup> <https://www.autoexpress.co.uk/toyota/yaris/mpg>

Ulva Ferry - Fidden Farm	2	71
London - Fidden Farm	1	993
Fidden Farm - Glen Nevis	3	139
Glen Nevis - London	3	830
<b>Total</b>	-	<b>8258</b>

Using this data, online calculators suggest we generated at least **1.5 tonnes of CO<sub>2</sub>**.<sup>24</sup>

For context, this is the equivalent of 0.357 petrol cars being driven for one year, or equivalently one car being driven for almost 3 years.<sup>25</sup> The UK averages 10 tonnes of CO<sub>2</sub> per person per year.<sup>26</sup>

## Ferry

We will assume the Ulva foot-passenger ferry to be negligible as it was very short.

We used one car ferry journey: Lochaline - Fishnish return, a 4.34 km journey each way so 8.68 km total. Six car passengers took this journey. We will assume 0.12952kg CO<sub>2</sub>e per pkm (passenger km).<sup>27</sup>

Our ferry journeys generated roughly **9 kg of CO<sub>2</sub>e**.

## Camping & Climbing Impacts

We employed the ethics of “leave no trace” as much as possible.

- Considerate of others
- Respected farm animals and wildlife
- Travelled and camped on durable ground
  - Used existing tracks in popular areas
  - Camped at least 30 m from lakes and streams
- Disposed of waste properly
  - Solid human waste at least 30 m from water, campsites and tracks and buried 15-20 cm deep
  - Toilet paper carried out or burnt

<sup>24</sup> [Calculate the carbon footprint of your car trip— using the myclimate CO<sub>2</sub> calculator | myclimate](https://www.myclimate.org/carbon-footprint/calculate-car-trip)

<sup>25</sup> <https://www.epa.gov/greenhouse-gas-equivalencies-calculator#results>

<sup>26</sup> <https://www.carbonindependent.org/23.html>

<sup>27</sup> <https://thrustcarbon.com/insights/how-to-calculate-emissions-from-a-ferry-journey>

- Washed dishes and ourselves 30 m away from streams and lakes and use only small amounts of biodegradable soap
- Food packaging minimised was carried out and disposed of properly

When establishing new routes, we chose to change and impact our environment by cleaning lichen, removing plant and dirt matter, and trundling rocks that were loose. We tried to keep these impacts to as little as possible, and to be wary of any fauna in the local area.

## **Bird Nesting and Access Restrictions**

We did not encounter any bird nesting restrictions. On Gometra we discussed access with the local farmer who assured us we were free to roam anywhere on the island, and cross fences.

## ***Conclusions***

In conclusion, our time in Scotland was a mix of highs and lows. The unpredictable September weather made planning difficult and impacted the group's overall experience. Scotland's fickle climate requires preparation for rain and the flexibility to adapt plans. Midges and ticks were also a persistent nuisance. Finding the right guidebooks is crucial, with SMC guides being the most comprehensive for a specific area, while others like Rockfax and Scottish Rock are limited. Despite these challenges, Scotland offers exceptional climbing and mountaineering opportunities worth returning for and exploring further, particularly in Skye, Gometra, the Hebrides, and the east. Future trips should also include Thistly Cross Cask Edition cider!



*Enjoying a sunset on Gometra*

# *Appendix*

## **Equipment List**

Note that the equipment changed as members of the expedition joined and departed. What follows is a rough summary of what we brought on the expedition.

Half Ropes 60m (pair)	Single Ropes	Semi-static Ropes 50m
Semi-static Ropes 60m	Climbing Racks (cams, nuts, slings, quickdraws,...)	Belay Devices
Ascenders	Harnesses	Helmets
Climbing Shoes	Abitat	Knife
Sleeping Bags	Pillows	Radios
Thermals	Waterproof Jackets	Waterproof Trousers
Belay Jackets	Towels	Toiletries
Dry bags	Gloves	2-Man tents
4-Man tents	Cooking Stoves	Lighters
Cooking Pots	Camping Utensils	Camping Plates/Bowl
Solar Panel Chargers	Battery Packs	Personal First Aid Kit
Emergency Shelters	Survival Blankets	

## Finances

### Funding

Below is the total funding we secured for the 7 team members on the expedition.

Source	Amount
Imperial College Exploration Board	£3500
Old Centralians Trust	£2250
The Jeremy Willson Charitable Trust	£250
Royal College of Science Association	£1200
Lord Mayor's 800th Anniversary Awards Trust	£350
<b>Total</b>	<b>£7550</b>

Gil Riberio was initially part of the expedition but was unable to join. He secured funding but this will be returned to the respective funders. Gil's funding was as follows.

Source	Amount
Imperial College Exploration Board	£500
Old Centralians Trust	£750
Lord Mayor's 800th Anniversary Awards Trust	£350
<b>Total</b>	<b>£1600</b>

### Spending

The expenditures below account for the majority of the costs which were directly associated with the time we spent in Scotland. These costs were, in part, shared with friends who paid for themselves. The full cost of the expedition is not reflected here, the table below excludes: courses, training trips around the UK, maintenance of vehicles, and gear and resources purchased to prepare for this expedition. Note that the Imperial College Exploration Board agreed to (either partly or fully) reimburse us for our insurance.

Expenditure	Amount
Food - Groceries	£437.44
Food - Other	£302.70
Transport - Car Rental	£287.39
Transport - Fuel	£760.23
Transport - Parking	£35.00
Transport - Ferries	£103.95
Transport - Insurance	£164.32
Transport - Trains	£230.13
Accommodation	£1677.94
Misc Supplies	£304.90
Distillery Tour	£90.00
Insurance (BMC insurance x 7)	£613.00
<b>Total</b>	<b>£5007.00</b>

## Risk Assessment

### Rock Climbing / Outdoor Activities Risks

Hazard	Effects	Controls / actions needed	Likelihood - Severity	Risk factor
Loss of direction	Unplanned exposure	Prepare adequate equipment Frequently check climbing map Ensure all members aware of the route and capable of navigation	3-4	12
Exhaustion / Fatigue / Dehydration /	Lower core body temperature	Frequent, adequate rests catering to weakest member of the group	2-5	10

Sickness / Hypothermia / Heatstroke	Sickness Death	Carry sufficient water, food, emergency shelter to account for unplanned exposure  Wear adequate clothing		
Bad weather	Difficulty in navigation  Unsuitable climbing / hiking conditions	Refer to map / evacuate plan as needed	3-4	12
Trips / falls	Sprains, twists, fractured limbs  Other injuries	Assess injury and provide first aid  Follow evacuation plan as needed	5-4	20
Group separation	Delays  Increased likelihood of injury	All members should be able to navigate route and carry equipment to survive  All members carry personal first aid kit	5-2	10
Hit by falling object	Shock  Serious injury  Death	Maintain awareness of surroundings and climbing conditions  Wear correct safety equipment, prepare to raise alarm if required  Ensure all members have adequate knowledge of self-rescue procedures.	3-7	21
Free fall from height	Shock  Serious injury  Death	Ensure team members stay attached to rope / anchor at all times  Inspect equipment for faults / defects prior to climbing  Ensure equipment correctly fitted and worn	1-7	7
Roped fall from height	Sprains, twists, fractures  Other injuries	Ensure all members trained to cope with roped falls when lead climbing and belaying.  Ensure equipment correctly fitted and worn	4-3	12
Trips / slips	Sprains, twists, fractures  Other injuries	Keep equipment and ropes tidy	6-3	18
Equipment	Un-rope falls from	Follow team inspection procedures before	1-8	8

failure	height	beginning a climb		
Hair catching in equipment	Scalp injuries	Tie back loose hair, cut if deemed necessary	1-8	8
Rope burn	Blistering of skin in hands, affect ability to climb	Use correct rope handling technique, gloves if necessary	2-4	8
Incorrect climbing / belaying technique	Increased probability of harmful fall	Ensure all team members trained and practise together prior to expedition	2-4	8
Poor rock condition	Rock fall Risks of slip	Only climb route in best possible condition Be aware of changing conditions and make safe judgements adequately	3-4	12

## First Ascents

Hazard	Effects	Controls / actions needed	Likelihood - Severity	Risk factor
Inability to ascend route	Exposure, benightment, harness suspension trauma	Extensive reconnaissance of potential routes, keep spare abseil line within grasping range by tying bottom of rope to base of route until a climber reaches the top of the pitch	3-5	15
Damage to abseil equipment	Fall from height, inability to escape route	Take additional care when rigging anchor and abseil rope, use rope protectors or redirections of rope as needed	3-5	15