Researching Slovenian Meadows and Landscape during Bohinj Wildflower Festival

Henry Merrick

1 June - 7 June 2024

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Introduction

Participants were myself Henry Merrick. I chose to do this trip to Slovenia as I am interested in seeing the wildflower meadows in an alpine region and how they are established and integrated amongst a diverse landscape of lakes, forest and mountains. I chose to go at the beginning of June during the Bohinj Wildflower Festival. This meant I could participate in events like botanical walks so I could learn more about the flora and history of the land. I was also able to travel to remote spots that had an exciting display of wildflowers and landscape with groups of other enthusiasts.

Working for the Trials Team at RHS Wisley, we have been growing and maintaining meadow mixes in our trial beds. This has propelled an interest in wildflowers and the seasonal qualities and benefits to wildlife, especially as I am looking after a new trial of Centaurea.

To be as environmentally friendly as possible I got the train from London to Ljubljana there and back which took roughly 20 hours each way. Once I arrived I got a hire car from Ljubljana and based my self in a village in Bohinj. With the car I could travel to Botanical Alpine Garden Juliana in the Julian Alps where I met Spela Pungarsek who gave me a tour of the alpine garden. On my last day I did a presentation in the Natural History Museum in Ljubljana where Spela also worked and she brought along around 10 other guests where I described what we get up to at RHS Wisley and Trials.

Aims and Objectives

- Discover what different plants grow in the alpine meadows.
- Find wild Centaurea.
- Learn about the maintenance of the meadows and how they connect with farming present.
- Learn about the history of the land as well as other features and planting in the alpine landscape.
- Visit Botanical Alpine Juliana and learn about plant collecting and gardening in the Julian Alps.
- Deliver a Presentation to Spela and guests at National History Museum
 Ljubljana about RHS Wisley and Trials.
- Take botanical photographs with my Olympus om10 film camera.

Itinerary

(31/06/24) - Catch the train from London St Pancreas to Ljubljana I will arrive early in the morning on the 1st June.

(01/07/24) - Pick up hire car and drive to Bohinj where I will be staying for 5 nights. Mid morning I will go on a walking tour. Wandering among the flowers, guided botanical tour with Polona Strgar. The start of me joining in on the wildflower festival in Bohinj. In The afternoon I will get a chance to explore the local area.

(02/07/24) - I will join a Guided tour of Bregar's and Knofl's alpine lodges and identification of mountain flowers.

(03/07/24) - I will drive to the Alpine Botanical Garden Juliana in the Trenta Valley and meet Spela and her team. I will get a tour of the garden and explore the Trenta valley.

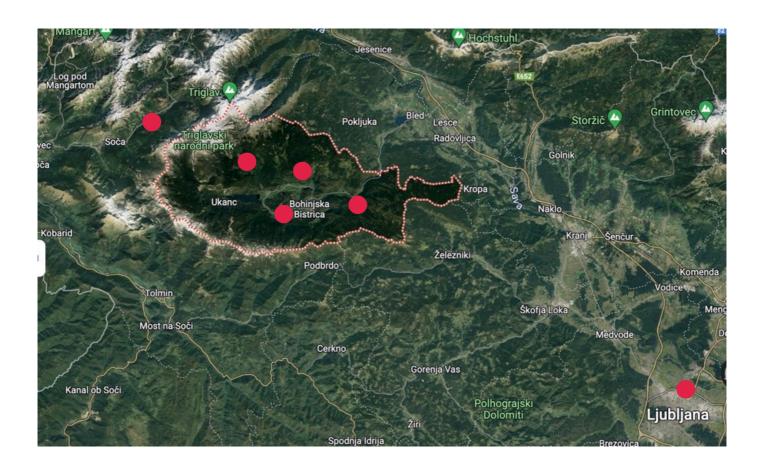
(04/07/24) - In the afternoon I will join, Harmony of water, forest and scree, botanical guided tour along the northern shore of Lake Bohinj with dr. Peter Skoberne.

(05/07/24) - In the morning I will explore more meadows around the lake and then in the afternoon I will join a 4 hour expedition 'The richness of hilly meadows, a guided botanical excursion to Vogar with Marjana Bajt'.

(06/07/24) - I will arrive at the Slovenian Museum of Natural History in Ljubljana and meet Spela of Alpine Botanical Garden Juliana. Here I will do a presentation to around 10 people of an overview of the RHS and what we do in the Trials team.

(07/07/24) - Arrive back at London St Pancreas station.

Map of Bohinj and surrounding areas



This zoomed in map of Slovenia highlights Bohinj and also displays key areas I visited as red dots.

Day 1

I Arrived into Ljubljana around 8 am by train on Saturday 1st June. I drove to Bohinj to jump straight into my first meadow tour at Ravne v Bohinju.

A group of about 10 of us met up with a Polona where we bundled into cars / minibuses for a short trip higher up in the alpine hillside. We wondered over to the edge of a grass meadow where the land is grazed by goats and sheep. There is a modest wire fence strung along with tape used as a physical barrier to contain the herds. The animals move up and down the mountain through the seasons. The meadows are normally cut once or twice a year depending on grazing and how wet or mild the Spring/Summer has been which will effect the timings and growth.



Salvia pratensis in a roadside meadow at the village I was staying in Bohinj.

It has been very wet and still cool when I arrived and so flowering times are a bit behind compared to other years. There is still thick snow at the top of the Julian Alps. I was made aware that the meadows are mostly all man made and crafted from land development like agriculture and grazing is moved around leaving areas of land to grow. Seeds are then collected and then used for more ornamental displays elsewhere. Salvia pratensis is very common and is seen everywhere from roadsides to alpine meadows.

I saw 4 types of orchid on this hillside overlooking the snowy-peaked mountains past Bohinjska. Platanthera bifolia was scattered here in high numbers with its graceful white flowers. Neottia ovata was a lot harder to spot as its flowers blended in with the grass. Near where the animals were grazing cotton grass - Eriophorum angustifolium and Carex flava were densely present and showing off their flower heads. As we walked deeper into the meadow fields there was a large variety of flowers which were exciting to come across. Campanula patula, Betonica officinalis, Trollius europaeus, Polygala vulgaris, Genista tinctoria, Lotus maritimus, Silene vulgaris, Luzula sylvatica, Phyteuma ovatum, Aruncus, dioicus, Astrantia major and Pollygenatum multiflorum. We walked up a steep path and got to the forests edge, here we spotted Geum rivale looking majestic with its nodding muted toned flowers appearing through grass and umbellifers. In the forest we found a birds nest orchid which is iconic with its brown colour and no foliage looks like it is dead. Valeriana officinalis also looked striking back out into the meadow landscape.



Valeriana officinalis - film photograph



Platanthera bifolia - Film photograph



Plantago media - film photograph



Geum rivale - film photograph

Day 2

After having a very traditional breakfast I got on a bus with some others for my next event on the wildflower festival. Alpine lodges and meadows in Pokljuska Bara about a 20-30 minute drive away.

Here we were shown the history and features of the lodges, how locals used to live and farm in the hillsides up to about 50 years ago. A very simple life but with the wealth of quality natural resources around them. I tried some fresh Slovenian cheese and tea. Flowers also surrounded us and are still used in medicine and food today.

Highlights of plants I found in the meadow surrounding the lodges were
Daucus carota, Rhinanthus minor, Arnica montana, Homogyne alpina and
Silene nutans. I saw a lovely Pine hawk moth and other insects. We were told
that vipers used to be found in the area but are less common now.

After this I got back to Bohinj and walked around some other local villages. Here I saw some farming techniques and how they cultivate land creating large rectangular beds to grow food with meadow planting all around the crops. Stacked firewood, hay and silage is a common sight in and around barns and fields. This shows how small communities stock up supplies and really are productive working with the land and resources it holds. Which is refreshing to see. Traditional techniques are still used with very old tools and machinery which definitely does not lack character.

I have also noticed how dramatic and changeable the weather can be, especially how lush and green the landscape is.



Pine hawk moth



Daucus carota's white umbels in the meadow - film photograph



A Slovenian alpine lodge and showing the practicality and resourcefulness of stacking firewood - film photograph





Locals cultivating the land using traditional methods on rectangular plots to grow food

Day 3

This morning the heavens opened and it did not stop raining until early afternoon.

I drove west through the mountains to meet Spela who is a manager at the National History Museum of Slovenia and also works at the Alpine Garden Juliana doing tours of the botanical plants held there on the Trenta valley next to Soca. She was very knowledgable and gave me a tour of the alpine garden which held many interesting plants, mostly local but also collected from around the world but notably Italy and from hiking around the Julian Alps.

Plants I found interesting were Alchemilla velebitica sprawling along with its attractive low forming dense foliage and throffy pale yellow flowers. Conifers in shrub and tree form anchored the mountainside adding great character and exciting habit. Like Pinus mugo and Picea abies. Other trees of interest were Carpinus betulas. Alpine flowers were Campanula, Achillea disdains, Hemerocallis, Gladiolus pallustris, Stipa eriscaulis, Satureja suspicata liburnica, Asphodelus albus, Veratrum nigrum, Spirea decumbans, lovely umbels of Meum athamanticum, Dianthus sternbergii, Sibiraea croatica in flower. Aruncus dioicus teasing in the scrub and Lily of the Valley. The water flowing through the mountain was so clear and turquoise and Spela was very knowledgable of all the plants and history of explorers walking and collecting and conserving plants.

The rain petered out and views of the lush forested landscape opened with evidence of snowy capped mountains. The roads were very steep and windy but it was worth the drive.



Mountains appearing through the rainclouds and Carpinus on the steep slope of the botanical garden



Spela showing me around the
Alpine botanical garden Juliana
and the river flowing through the
valley

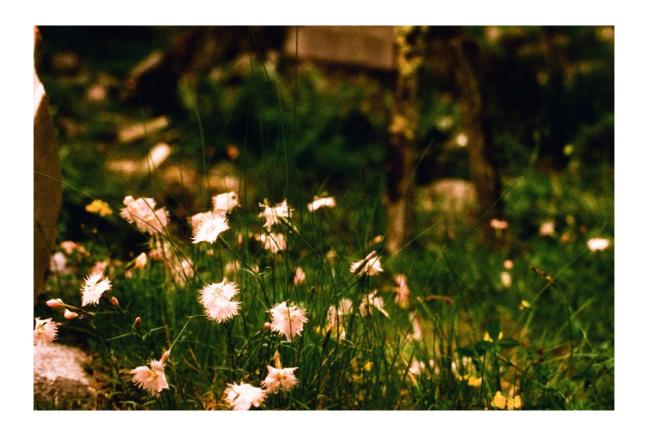




Asphodelus albus in flower - film photograph



Hemerocallis at the top of the garden - film photograph



Dianthus sternbergii - film photograph



A view up the alpine garden - film photograph



Aruncus dioicus - film photograph





The entrance lodge to the Alpine Botanical Garden

Juliana and a view showing the winding paths through
the collection of plants

Day 4

This morning I set off walking towards Monica Gorge and waterfall through meadows and woodland.

My first step was the Willomitzer botanical trail through the Gorge. I came across Phyteuma nigrum, this stunning black rampion on the edge of the tree line. Umbels drifted across the waters edge with wild liquorice Astragalus glycyphyllos. As the trail opened out onto a track going by meadow after meadow diversity of flowering plants intensified. Orobanche gracilis and Verbascum nigrum stood out amongst the grass with warm oranges and yellows. Campanula patula spread across the meadow with its lilac star shaped bell flower. Walking up a gentle gradient up towards the waterfall, the meadows became more expansive and impressive and rustic alpine lodges nestled in the landscape. Here there were Dianthus and Astrantia as well as the ever present Salvia pratensis. The character of the charming alpine lodges and buildings was delightful to see. Mature Malus and Betulas stood firm and added great interest in the meadow landscape.

As I pondered back through the meadows and down the mountain road in the forest, old hand crafted wooden rills emerged from the steep banks. Stylishly guiding water down the mountain. Lower down in the hills as I left the forest, grass and meadow landscape opened out again with mature conifers climbing up into the expansive sky. I made it back down to lake Bohinj ready for my next tour.

Dr Peter Skoberne took a group of us on a tour around the lake in the late afternoon. We looked at the planting and the history and planting of the landscape. He described how communities have been set up using the natural resources as a base to live and work on the land. Especially lower down in glacial shaped valleys.

The lake is unique as its rock base is limestone which goes up the mountainside and this will effect the planting with it being slightly alkaline. Water is very active and this time of year high levels are washing down the mountain into the lake. You can hear the water inside the mountain if you put your head close to the ground. We looked at the difference between sedge and grass and then spotted Dianthus, Circium and Allium about to go into flower. Heather and Hellebore were also present as well as Parsley and Potentilla. We got to the other side of the lake, looked at some gardens with Leucanthemum vulgare flowering and then got the boat back.



Verbascum nigrum and a purple edged copper butterfly.
Lycaena hippothoe

Below - wildflowers in the diverse meadow film photograph







Here you can see the density and vastness of the meadow landscape amongst the Alpine lodges - film photographs





Textures of planting in more of a forested landscape with conifers and umbellifers by rocky streams. It was a very enchanting environment with a diverse range of plants - film photographs





Dr Peter Skoberne describing to us the different grasses found by Lake Bohinj



Monica Gorge



A view through the landscape to Lake Bohini



A handcrafted wooden rill

Day 5

In the morning I went for a walk around lake Bled and then I joined 'Richness of Hilly Meadows' tour with Marjana Bajt. This was a minibus trip up to Bohinjska Jezero. Here we saw Phyteuma betonicifolium, Vicia sylvatica with its pea like flowers, Betonica officinalis, Anthyllis vulneraria and the incredible umbellifer Laserpitium latifolium. Lilys were also about to come into flower and meadows carved through the landscape with drystone walls acting as animal barriers. Thalictrum aquilegifolium was a nice surprise in shadier spots with edible sweet cicely, Myrrhis odorata. It was amazing to also see Cephalanthera longifolia another member of the orchid family where it is fairly common in the Julian Alps but in decline elsewhere in Europe. More Campanulas along the tree line and a beautiful coppice hazel woodland. Solomons seal also amongst longer grass.

As we walked through a beech forest there was another birds nest orchid. We then came to an opening on the edge of the mountain side. A meadow had been formed here on the steep slopes where paraglider's take off. This is where Marjanna spotted Centaurea triumfetti which was great to see. Here we looked over towards Vogel and you could see the pine forest and density of trees on the mountainside. Marjanna also mentioned that a few bare patches were because of disease but that opened up more opportunities for meadows to form.

Over 60% of Slovenia is forested of mainly beech and Spruce with some invasive species like Robina pseudoacia. Picea abies has turned into a monoculture in some areas and through storm and bark beetle damage trees have fallen or died through disease.

This has created potential for other species and meadows to prosper which is positive for the environment to add more diversity in a mainly forested landscape. (Research Gate, Barbara Zabota, 2021)

We wondered back through the trees to another viewpoint where we passed a beautiful flowering Lily, Lilium carniolicum. Near the viewpoint there was an amazing alpine lodge with fungi and ferns growing on and in front of it. A stunning view appeared and you could see Vogel and the beautiful light patterns on the trees and lake. Another green lizard posed on the rock next to our group.



Laserpitium latifolium - film photograph





A green lizard, Lilium carniolicum, Centaurea triumfetti, and Vicia sylvatica







Ferns in front of the traditional Slovenian cottage - film photograph



Astrantia maxima - film photograph



Circium opening in flower - film photograph

Day 6

I stayed my last night in Bohinj and in the morning I drove back to the capital Ljubljana.

After returning my hire car I found Spela in the National History Museum. This is where I will be doing a presentation later in the day. I had a little tour and tested my memory stick before going out to explore Ljubljana where I went to the castle and looked at the street planting and sights and sounds. There were lots of Poplus nigra and pleached Platanus x hispanica.

When I got back to the museum in the early evening I was ready to deliver my presentation in front of around 10 guests. I talked about the RHS at Wisley and how the garden works and is set up into different teams.

Especially trials where I'm based and the work we do through the seasons and how we are implementing more meadow mixes into beds showcasing seeds collected from around the garden or specific mixes from companies. These offer a spectacular display of flowering interest and we highlight the maintenance involved with it.

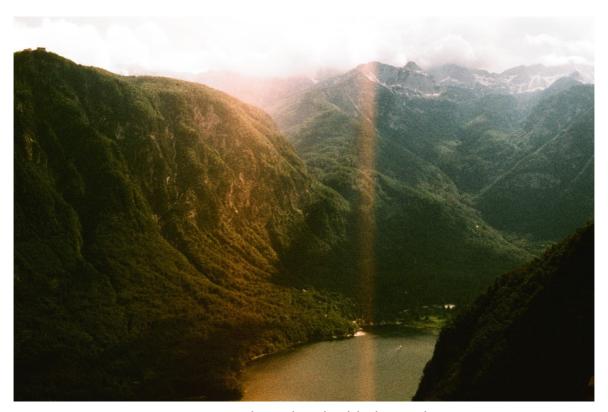
I showed them 50 slides and it took almost an hour with questions, we then had a discussion after that about horticulture and education. Comparing the UK to the rest of Europe and how opportunities in work are more available to younger people as a young Slovenian woman was interested in the educational programme at Wisley. It was a brilliant experience as I said my goodbyes before my train Journey back to London.





Trees along the river in Ljubljana

A leaflet describing information of my talk at the National History Museum Slovenia



A view over Lake Bohinj highlighting the density of trees - film photograph



The clear water of the river in the Trenta Valley - film photograph

Summary

My trip to Bohini Slovenia will be one I will cherish forever. It was an incredible week of discovery taking part in the wildflower festival and meeting some very interesting and lovely people along the way. I have learnt a lot about meadows, the maintenance and planting they hold as well as other valuable landscapes and the history of certain environments and settlements. It was a joy to find an example of Centaurea even though we were early in the season considering the cool damp Spring. Living in the region seems to be a simple life, working with nature and looking after the land and environment. Communities are vital to all of this. There is a nice balance of what you put in is what you get out and the cycle of the seasons is in sync with animals and people. The landscape is very wild but also maintained considerately as the land seems to invisibly connect through to different areas. Buildings and structures are carefully constructed and maintained with local materials echoing the character of the place. It has been exciting to see certain plants in the wild and hear more about them from other enthusiasts walking around the landscapes. Taking lots of photographs has helped me keep a log of all this as my eyes were constantly fixated on discovering more interesting plants. I also witnessed some fascinating insects and animals that live here. The wildlife was rife and it must come down to the diversity of the landscape and the wonderful mass of meadows that were flowering and really encouraging biodiversity. This was so refreshing to see and to take in the beauty of nature here. Conservation is key to this and I hope meadows are continuously celebrated and protected. Talking in the museum at the end of the trip was a rewarding way to share knowledge and ideas of horticulture and gardens. As well as connect with horticulturists from all over Slovenia.

Budget Breakdown

Train travel costs	£630
Travel Insurance	£7
Car hire expenses	£298
Accommodation	£255
Events at the Wildflower festival	£40
Food	£230
Total Costs	£1460

Henry Merrick

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