# Alpine Garden Club of British Columbia



Agave filifolia in flower

photo Wilhelm 'Bill' Bischoff

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#### **UPCOMING EVENTS**

Mar 12 Rex Murfitt: Waterperry, a unique English estate with Saxifraga http://www.agc-bc.ca/events/Rex-Murfitt-Waterperry-A-Unique-English-Estate-with-Saxifrages

March 22-23 Vancouver Orchid Society Show & Sale, VanDusen Gardens 10-4 PM. For more info go to: www.vancouverorchidsociety.ca

April 5 12 PM- 4 PM Annual Spring Show and Plant Sale. One of the top events not only in the AGCBC calendar year but for all gardeners in BC. Don't miss it! Make sure to tell your friends. Go here for more info: http://www.agc-bc.ca/shows-sales

**April 9**, 2014 **Nicola Ripley**: Bringing the Mountains Home. Believe it or not, the Betty Ford Alpine Gardens executive director from Colorado is originally from the UK. She will talk about the development of this world-class, public rock garden. More info here: http://www.agc-bc.ca/events/Nicola-Ripley-Bringng-the-Mountains-Home

May 14, 2014 Richard Ramsden: Wildflowers of Washington and the Wild Places they Grow. Ramsden is a writer/photographer and nano-nurseryman that runs Fringe Nursery <a href="https://sites.google.com/site/fringenurseryandseed/home">https://sites.google.com/site/fringenurseryandseed/home</a> in Seattle. He also has a nice web that reflects much of his presentation material here: <a href="https://sites.google.com/site/alpinefloraofwashingtonstate/">https://sites.google.com/site/alpinefloraofwashingtonstate/</a>

June 11, 2014 Kenton Seth: Caucasus to Crevices-From Georgia to the Garden. This young plant freak from Colorado is hands-on guy & his show will reflect the gardener's position. More info here: http://www.agc-bc.ca/events/Kenton-Seth-Caucasus-and-Crevices-from-Georgia-to-the-Garden The picture of Kenton on our web shows the dangers of drinking too much Vodka when you're botanizing in the Caucasus.

#### **FAVOURITE LINKS**

If you're still wondering what to do with those seeds that have just arrived from the AGCBC seedex, have no fear. Check out this web: http://www.theseedsite.co.uk/

Monster botanical work of a scientific bent by **John and Hilary Birks**. Get swept away to Yunnan- simply click on the subject! Not a short read but what ya gonna do anyway on a cold, lifeless day in February? Other Power Points include S Africa, Patagonia, etc. WOW! http://www.eecrg.uib.no/projects/AGS\_BotanyExp/Introduction.htm

This web site <a href="http://www.wildplantgallery.co.uk/index.php">http://www.wildplantgallery.co.uk/index.php</a> is an homage to Gwen and Phil Phillips and their time spent alpine botanizing. A staple in many AGS Bulletins of the 1990's, the couple's trips have been captured and indexed wonderfully. Check out their trips to the American west!

Start planning your summer botanizing trips now using these links. Jump in your van or truck and just go! Who needs airports and body zapping? For Oregon- especially the Steen Mtns- try http://www.oregonflora.org/atlas.php

And for California, what else? Cal Flora <a href="http://www.calflora.org/">http://www.calflora.org/</a>
You might want to start by registering and then use the County filter on the upper right hand side to narrow things down. You can also filter/select; plants for serpentine soil; and, subalpine forest; and, above 2000 m; and, perennial. This would be your plant result- <a href="http://tinyurl.com/mg87hew">http://tinyurl.com/mg87hew</a>

For the super serious plant hunters and growers that favour the big California beat, here is the Jepson Online Interchange of California Floristics so that you can cross-check things. Know what you grow! http://ucjeps.berkeley.edu/interchange.html

The *Crocus* pages http://www.srgc.org.uk/genera/index.php?log=crocus is an excellent reference website. *Maggi Young* of International Rock Gardener fame works to compile and keep the species updated on those pages on the SRGC site. Their Crocus forum is The Best: <a href="http://www.srgc.net/forum/index.php?board=10.0">http://www.srgc.net/forum/index.php?board=10.0</a>

For those members who have a decidedly perennial bent, here are the *Great Plant Picks* 2013 Winners! http://www.greatplantpicks.org/plantlists/by\_year/2013

As a follow-on to the Fall Bulletin's (Vol 56-4) piece on *Gladioli* for the rock garden, I found this short piece by **Sarah Raven** in the Telegraph quite useful: <a href="http://www.telegraph.co.uk/gardening/howtogrow/3346751/Gladioli-How-to-grow.html">http://www.telegraph.co.uk/gardening/howtogrow/3346751/Gladioli-How-to-grow.html</a>

Sissinghurst Gardens has recently re-focused itself with more of an agricultural backbone. Here is the story by Adam Nicolson: http://tmagazine.blogs.nytimes.com/2013/10/04/in-nature-modernizing-an-english-garden/ Interesting backstory here.

For all things *Daphne* (*Seidelbast* in German), **Dirk Jocke**l's fine website has it covered whether they're species or hybrids: <a href="http://www.seidelbast.net/home.html">http://www.seidelbast.net/home.html</a>

Finally, variegation explained! Thanks to John Richards' Northumberland Diary/blog: http://www.alpinegardensociety.net/diaries/Northumberland/+January+/520/

# MEMBERSHIP RENEWALS ARE DUE FOR 2014

If you have not already renewed your membership for 2014, please send a cheque for \$30 to Membership Secretary, Jane Byra, with your name and contact info. Cheques should be made out to the Alpine Garden Club of BC. The address is: Jane Byra Membership Secretary 43212 Honeysuckle Drive Chilliwack, BC V2R 4A4

A quicker and easier way to renew is to do it on-line using your credit card through PayPal: Do it from this link http://www.agc-bc.ca/membership-renewal

## Rock On! Editor's Column- Grahame Ware

We have a big Winter issue for this Bulletin including features by Margaret Charlton, Panayoti Kelaidis, Linda Verbeek and David Sellars. We also have reports by Lisa O'Donnell and Diana Hume and some astonishing photos by Wilhelm Bischoff. I'm proud to tell you that we now have a Cumulative Index for all of 2013 (Vol 56) issues. This includes details of plants, authors, photos, etc. We have Valerie Melanson of Qualicum Beach to thank for this great research tool http://www.agc-bc.ca/bulletin

Finally, a little reflection on the year that was 2013. As we trudge through life, we are lightened by the weight of the Inevitable Conclusion by the joy of New Things. Here is my best plants of the year list.

- 1) Sisyrinchium idahoense var macounii. I got this at the Hardy Plant Symposium in June from Free Spirit Nursery. Unlike many lanky and formless blue-eyed grasses, this one has short (2") leaves and bright white flowers on stalks that are 3"-4". I got no seed from my plant but it was spectacular in the bed with Colchicum and Penstemon. The best dwarf Sisyrinchium I've grown.
- 2) Rosa 'Rambling Rector'. This climbing rose was obtained from the now defunct Old Rose nursery on Hornby Island (they specialized in climbers). It got happy last year and shot up 8' and through the eye sockets of a small moose antler/cow skull combo that I'd fixed on a cedar tree about 8' off the ground. The clusters of fragrant white flowers were arranged perfectly all along the stem rising up to the skull and going through the eye sockets. This year it should be extraordinary.
- 3) Arenaria tetraquetra var aretioides. The terrifically dense habit of this Turkish alpine, lends itself to quite a statement when it flowers. As with most sandworts, they are difficult to get size on and get going but when you do, everyone is impressed. There are many unsung Arenaria besides this one. Rick Lupp source.
- 4) Lewisia nevadensis var bernardina This early flowering type is likely a form of nevadensis from its southern range. The nevadensis group is far flung and I've seen some that I didn't particularly care for. This one is white flowered and most alluring. Got it from Joe Keller after a sale. I grow it outside in my "All Washed Up" bed which is mostly "manufactured sand" mixed with some coarse sand, Perlite and a bit of native soil. The bed slopes southward.

- 5) Gentiana acaulis 'Krebs'. This German selection that I obtained from Rick Lupp really does have the most arrestingly deep, dark blue. It is a killer colour to say the least. Some think it has the best blue in a bevvy of cultivars that dot the trade. Check this AGS link to an online pot show. http://www.alpinegardensociety.net/ competitions/online-show/2010/Gentianaceae/800/ where it won best in class.
- 6) Lewisia cotyledon var purdyi. Obtained this from Jason Nearing at the Hardy Plant Symposium. Dainty with deep golden almost brassy yellow flowers. Smoothened brick from the seashore carefully tucked around the crown made for a great echo. Some authorities have this cotyledon subspecies as a natural hybrid with L. leeana and refer to it as L. x whiteae Purdy. Flowered for a very long period of time over the great summer that we had in '13.
- 7) Tulipa 'Garant' Okay I'm a sucker for tulips and have been growing them for decades. Every year I try new ones so its hard to impress me. Garant impressed me on many fronts besides its elegance and long-flowering quality. The leaves are substantial and beautifully shaped with a clean and thin creamy glow along the edge of the leaves. The flowers are a good yellow that is neither overstated nor tepid. A small black basal blotch rounds things out. The best thing though was how well it did at the edge of a woodland bed with just morning light. In the shade it had such élan due to its colour and its variegation and the whole group leaning eastward. I could list more Tulipa but then again that's the tulipamaniac talking.
- 8) Narcissus 'White Marvel'. I saw this in a friend's garden and the first thing I said was, "It looks like 'Thalia' on steroids!" Curiously, it turns out that it is a Thalia double. It is a double however, that has great delicacy. It is a superb triandus sport for the rock garden or the sunny woodland bed at the front of the border.
- 10) Ornithogalum nanum. Simply one of the best bulbs for the rock garden in Spring. I obtained my bulbs from Roger Barlow. (See cover pic Spring Bulletin). I have other clones but this the nanum of the nanum. And the most floriferous too (a combo that we all die for in alpine circles!). \*

# Seed Exchange 2013 Report

by Diana Hume

The seed exchange is over for the year. The local orders were taken in to the January meeting and any leftovers not picked up as well as all of the others were mailed out on January 10th. A big thank you to all the donors once again. We had a good list of offerings and quality this year with a number of interesting species. Here are some of the more popular seeds. From North America- Erythronium hendersonii, Lewisia tweedyi, Trillium rivale especially the selection 'Purple Heart'; from South America-Tecophilaea cyanocrocus; and, from elsewhere- Campanula zoysii, Cyclamen purpurescens - deepest colours, the interesting Hepatica, Shortia soldanelloides and Viola delphinantha. Many others were favoured as well but the aforementioned were just very much sought-after. Wild collected seeds are always in vogue. And a big thank you also to all the workers who helped with packaging, mailing, etc. Ruth Anderson, Wendie Kottmeier, Lynn Batt, Geri Barnes, Margot Ketchum, Dawn Bergen, and Angela Miller on the North Shore; Pam Frost, Marilyn Plant, Ann Dies, Ian Plenderleith, Jo Bridge, Jo Turner, Louise Hutchings, Patricia North, Gill Collins, Karen Thirkle, and Judy Echols in Vancouver; and, Bill Terry, Verity Goodier, Karin Tigges, Ali Thompson, and Nancy Webber, Sue Evanetz, and Beverley Merrifield on the Sunshine Coast!

If anyone would like to join us next year, please email me at: seedrequest@agc-bc.ca

Speaker Review- The Plight of the Bumblebee

by Lisa O'Donnell



Bombus mixtus, the orange-tailed bumble bee

Bee-Friendly website

There's a buzz around but unfortunately, it isn't from bees.

At the January 2014 meeting, we were treated to a very frightening talk by Ric Erikson of the Native Bees Conservation Society, Bee Friendly- www.Beefriendly.ca, about the dire situation for bees in our area and world. This North Vancouver based, non-profit society is beating the drum to ensure that we are aware of a serious problem in our environment. Through man's interactions with our planet and other factors, bees are struggling to survive. The affect on mankind will be significant if nothing is done. Did you know that one in three bites of food are produced through bee activity? There has been such a severe decline in bee populations in North America such that colonies of bees are shipped around in order to pollinate crops! This is expensive and risky, as many of the bees die while in transit.

As gardeners, we must all try to participate in turning around this horrific situation. There are ways that we can encourage bees into our gardens to improve the likelihood of their survival. In most cases, doing nothing as far as "changing" our environment is the best thing that a gardener or property owner can do. Bees will seek out spots that provide them with the necessities of life and reproduction- water, food, shelter and mates. The most important bees are the *Bombus* species or bumble bees. Here is a link to their excellent local guide to bumblebees- <a href="http://">http://</a>



Bombus flavifrons, the bright yellowbumble bee

Matt Goff Sitka Nature.Org

From the **Bee Friendly** website, here is an important link (below) with 10 ways you can help local gardens (those of you reading this overseas will find many of these applicable to you, too) become (or remain) bee friendly. http://beefriendly.ca/how-can-i-help/

As you can see, in order to help out native bees it helps to be less of a neat freak in your gardens and property. Doing less really is doing more. Start a slash pile in a corner and just leave it alone! Make sure that you also see the section on native bees <a href="http://beefriendly.ca/native-bees/">http://beefriendly.ca/native-bees/</a>)

Let's make this the "buzz word" of the gardening world by spreading the word to all our gardening friends.\*

## SOME WOODY CHILEAN PLANTS IN OUR GARDEN

## by Margaret Charlton

Chilean shrubs, along with their relatives in ancient Gondwana- New Zealand, Australia, and South Africa- are quite distinctive from the flora of other parts of the earth. Nearly all are evergreen and for the most part have shiny foliage of substance. Many do well for us here in our North Vancouver rain forest garden. Our garden receives between 2.4 to 3 metres (yes!...metres!) of annual rainfall that falls primarily in late Fall to Winter. In addition, we are partially protected from wind by high cliffs to our side and the coastal mountains at our back as well as being warmed by the seas of Indian Arm of Burrard inlet below us. Snow is seldom a problem although cold can nail us every few years with temperatures of -12 to -15 C. The established plants are not killed, but some will die back to old growth. Our steep mountainside garden is essentially rock and gravel with added amendments. Even so, when planting, we add more grit- especially poultry grit or that smallest of grade of pea gravel- 'birds eye', a 1/4" mineral-rich, granitic aggregate. Of course, this general regimen depends on the plant and the soil in its particular location. Sometimes we'll see that the area has to remain peaty and acidic for that particular species or cultivar and so refrain from altering that drainage and pH regime. We believe that our general drainage strategy gives these Chilean plants a chance to breathe to counteract our winter wet. Sharp drainage is essential here on this part of the wet coast. However, the other side of this cultural approach, is that we must water during the Summer as these woody plants from Chile are in our experience generally not particularly drought-tolerant.

#### The Stars in Our Garden

Our *Crinodendron hookerianum*, the Chilean Lantern tree in the Elaeocarpaceae family, is now thirty-six years old. It has grown to 15' with narrow foliage and is topped by gorgeous Chinese-red flowers in the late Spring. This shrub must be planted with morning shade to prevent leaf scorch on cold days. Our plant was frozen to the ground several times in its early years but always quickly rebounded, getting tougher as time goes by. Authorities such as Rix say it is hardy to -10C. Contrary to some authorities, it definitely appreciates our acid soil and winter mulching.

We also grow another species, *C. patagua*. It has bell-shaped white flowers but blooms in the early Fall. Our twelve-year plant took some time to get established but it is now 8' tall. Unlike *C. hookerianum*- that blooms quickly on rooted cuttings- this one seems to take some time to flower. Anticipation is what keeps us going, I suppose.

The final *Crinodendron* that we have, just a rooted cutting at this point, is a delicate, pink-flowered cultivar, 'Ada Hoffman', that I first saw growing in Cornwall. After seeing it, I am quite excited about having this one in our garden.



Crinodendron 'Ada Hoffman'

photo by Steve Law courtesy of Creative Commons

Another long-time resident in our garden is *Eucryphia glutinosa* (*Eucryphiaceae*). It blooms with white flowers with yellow stamens in mid-summer. It needs full sun to do well. This delightfully tall shrub takes a few years to bloom in our climate. Unlike other *Eucryphia* in our collection, this one is deciduous- always a positive harbinger of hardiness. The leaves turn a lovely bronze in Fall.

Eucryphia x nymansensis 'Mount Usher', an Irish hybrid between two superb Chilean species, E. cordifolia and E. glutinosa. It grows well in our garden. It is not quite as hardy as E. glutinosa but grows taller and has clusters of very showy white flowers in mid-summer. The leaves are glossy above and pale beneath. To look its' best, it too needs sun to flower well and winter wind protection so that the leaves don't scorch. See a series of good pics here: <a href="http://www.habitas.org.uk/gardenflora/eucryphia\_nymansay.htm">http://www.habitas.org.uk/gardenflora/eucryphia\_nymansay.htm</a>

Another member of this family in our garden is *E. x intermedia*, a cross *of E. glutinosa* and the Tasmanian species, *E. lucida*. This plant has been a disappointment for us, not having flowered profusely. No doubt this is because of its shady location.

More a tree than a shrub, *Rhaphithamnus spinosus* is in the family Verbenaceae. This evergreen tree has dense small leathery leaves and large spines on woody branches. In spring it covers itself with small tubular violet-blue flowers followed by deep violet-blue berries. It thrives against the house in sun - an excellent position to admire it close up. Hummingbirds love the flowers. This shrubby small tree thrives with summer moisture. See pic here: <a href="http://www.duchyofcornwallnursery.co.uk/plants-and-flowers/shrubs/shrubs/rhaphithamnus-spinosus/c-psh-rhasp/">http://www.duchyofcornwallnursery.co.uk/plants-and-flowers/shrubs/shrubs/rhaphithamnus-spinosus/c-psh-rhasp/</a>

Azara (Flacourtiaceae) are native to Chile and Argentina. All need sun and good drainage. The one grown most commonly is Azara microphylla. The attractive leaves are shiny and very small. Barely visible minute flowers are green or yellow and are strongly scented with a vanilla-like fragrance in February. This small tree has grown too tall and leggy as it stretched for the sun. We have been cutting out the tall stems over the past few seasons and the tree has re-sprouted nicely. It now has lots of bushy new growth. We also grow A. microphylla 'Variegata'. Its leaves are edged with creamy white making it glow in the winter sun. A. serrata with evergreen shining foliage and yellow puffs of flowers in May and June grows wide and tall in time. It needs a protected space. Ours grows happily with a canopy of Douglas Fir above it. A. integrifolia however, is making a slow departure from our garden. We suspect our summer conditions are too dry.

Desfontainia spinosa (Potaliaceae) is native to much of the Andes growing as far south as the Magellan Straits. For us it is so far a low-growing, holly-looking shrub. It starts to bloom in late July and continues well into Fall. The flowers are tubular shaped and orange-red with a yellow lip. This is a very old plant in the garden but it hasn't always been happy. It was originally grown in shade, as directed by the literature which insisted it should be. On its third rescue attempt I moved it into a sharply drained site where our mountains give us sun in summer from 8am to 6pm. Here with more sun and in full sun, it finally flowered. Philip MacDougall reintroduced this shrub by wild-collected seed and many members won small plants at our AGCBC meeting raffles. This is a very worthwhile plant to grow. Link to pics here: <a href="http://www.habitas.org.uk/gardenflora/desfontainia.htm">http://www.habitas.org.uk/gardenflora/desfontainia.htm</a>

Mitraria coccinea (Gesneriaceae) also has deep red tubular flowers. This low shrub sprawls to 3m. and will also climb. It's needs are part shade in a moist atmosphere. We have had it in our garden since 1997 and first grew it draping down a cliff crevice. It looked beautiful here but conditions were too harsh and, after several years, one Winter it expired. Fortunately cuttings had been started. We now grow it on a more protected sloping terrace beside a large boulder in dappled light. (Ed: Link to cultivation tips: <a href="http://www.strangewonderfulthings.com/tips115.htm">http://www.strangewonderfulthings.com/tips115.htm</a>)
Asteranthera ovata (Gesneriaceae) is a climber that clings to an old, partially rotted stump. See pix here: <a href="http://www.farreachesfarm.com/Asteranthera-ovata-p/p3539.htm">http://www.farreachesfarm.com/Asteranthera-ovata-p/p3539.htm</a> It is evergreen, resembling Ficus pumila. It requires a humid, damp location, and while taking some shade, flowers heavier with more sun. The difficulty with finding this 'sweet spot' requirement is that more sun does not usually equate with damp, humid conditions. However, it is worth growing for the flared long tubular red flowers.

There are two forms of this plant, one hardy and the other not. We throw sacking over our plant whenever a cold spell arrives.

*Philesia magellanica* (Philesiaceae) from southern Chile requires much the same conditions as *Asteranthera ovata*. We plan to plant this newcomer in a split-in-half, rotted log filled with a mix of grit, sand, ground bark and leaf mould. The foliage is needle-pointed and the flowers are a fleshy red that blooms in late summer. It spreads by suckers and stays low. It needs covering in cold weather.

**Berberidopsis corallina** (Flacourtiaceae) is a beautiful evergreen climber from southern Chile. It is now considered extinct in the wild. Here it reaches 4 to 5m against a shady, east-facing wall. The red flowers dangle in clusters at the ends of the branches in late summer. It is considered to be tender but so far has survived for us in this protected spot for eight or nine years.



Berberidopsis corallina in Curtis Botanical Mag 1862 Walter Fitch

Embothrium coccineum (Proteaceae) is a tree that has given us the most trouble of all our Chilean woody plants. We saw hillsides of plants growing to 10m near Esquel in Argentina. Later near Callifate while viewing a tremendous glacier, we saw a large group in full flower behind us. We were definitely inspired to try to get this beauty to live happily in our garden. It never seemed to be happy in any location. Eventually in 2003 we received a small, young high-elevation plant from Bill Herbst and planted it at the foot of a mammoth Douglas Fir with lots of sun and extremely good drainage. It is now flourishing and flowered for the first time this past summer. Flowers are scarlet in early summer. It is well worth trying in any protected garden.



Embothrium coccineum

Alisdair Rae photo courtesy Creative Commons

Lastly there is *Escallonia* 'Iveyi', a chance seedling that originated at Caerhays in Cornwall. It is an Award of Garden Merit (AGM) winner. It is a large shrub with rounded, shining foliage that covers itself with pristine, white flowers in mid-summer. It is hardy to -15C and needs good drainage but it does not want to dry out. Our plant is beside our deck providing us with a little shade and the pleasure of many bees enjoying the flowers.

Another *Escallonia*, *E*. 'Donard Radiance', also an AGM winner, has deep rose pink flowers. It is a low wide shrub that blooms in June. The size and colour of the flowers is particularly good. Apparently, it is quite similar to the cv. 'Apple Blossom'.

#### Conclusion

All these plants have a good chance of succeeding in Vancouver and other nearby places close to the ocean. Most of them do well from cuttings. They add a luxuriant, evergreen quality to the garden and blend nicely into woodland settings.\*

# Coming Soon To A Rock Garden Near You- Erodium

Text and photos by Panayoti Kelaidis



Erodium absinthoides

We Rock Gardeners like to pretend that we are more sophisticated than the rabble. After all, we're the ones who treasure the tiny alpines, aren't we? 'Small has it all', we think smugly. And why not? Truth be said, *Androsace*, *Gentian*, *Primula* and *Saxifrage* can be every bit as colorful as petunias and marigolds when in full bloom. At spring flower shows, pots of alpines can upstage even the showiest annuals with their flamboyance. In the garden too, flashy alpines can *hog the mike*, so to speak, upstaging the backup singers who often possess greater talent. For example, the genus *Geranium* is a mainstay in perennial gardens, occasionally showing up in larger rock gardens as well. Many people stage it in their gardens as a perennial 'voice'.

And while it does have its virtues, for my part, I have come to find its closely related cousin, *Erodium*, sings a much sweeter song. Quite simply, it is indispensable in my Denver garden. In other gardens that I visit, I find their absence baffling. Long after the last *Primula* and *Aubrietia* have faded, *Erodium* blooms and blooms. And, even in the short months when they are not blooming, their filagree foliage adds color and interest to the garden. Filagree! Ahhh...that may be the problem and explain why they are not in many gardens. The commonly named *filaree* (*Erodium cicutarium*) looks uncannily like its more worthy brethren, with bright pink flowers and trim, ferny rosettes that turn a brilliant red in winter. The only problem is that filaree is a horrendous, pestiferous and Weed of Universal Scorn. Its' much more restrained cousins have perhaps been tarred by the same weedy brush and paid the price of guilt by association. Be that as it may, there are some great *Erodium* worth consideration as you will see.

#### Petraeum section



Erodium cheilanthifolium

The flowers are often subtle, even bordering on pallid at times: the many species and hybrids of this most fillagreed section of the genus are the ultimate work horses as well. *Erodium cheilanthifolium* can be taller than closely allied forms, and has been lumped botanically with *E. petraeum* and even *E. crispum--*as well as a half dozen other ferny leafed, silvery *Erodium* that grow in the mountains surrounding the Mediterranean. Splitters have named many of these, but lumping botanists have

perhaps blurred the lines excessively, in my opinion. I grow several of these in my home gardens, and they are distinct enough to include an assortment in even a small rock garden collection. There have been many natural hybrids between these "species" which only adds to the confusion. I suspect that the nomenclatural madhouse these silvery, dense cushioned *Erodium* occupy largely explains why they are avoided by gardeners! But let's take a closer look and list a few positive points. The silvery foliage is decorative at all times, and the flowers can practically obscure the leaves for a few weeks in spring, continuing sporadically until fall. The pale flowers are often netted with darker lines that culminate in a mesmerizing spot on the upper petals that adds much character to the plant. The stems persist as the first flush of heavy bloom goes over: trim them off just above the foliage for a better look.

It is worth seeking out a number of these from this section because the flowers are fascinating up close with their colorful blotch and striations as well as from afar they make good visual impact. And, I daresay, there is not a day between April and October when there won't be a few flowers on these to look at! Is that a winning trait in a plant or what?

#### The Green leafed section



Erodium castellanum 16

Lionel Bacon, past president of the Alpine Garden Society of England, was responsible for first collecting and disseminating two similar and very showy species from Spain. Let's begin with the slightly smaller of the two species (size seems to be their main distinction). *Erodium castellanum* generally stays under 8" tall, while *Erodium daucoides* can send flower stems above a foot in height. Both species have flowers in that bright lavender-magenta shade that seems to have been perfected by the genus. And the markings are never quite the same from plant to plant: definitely a keeper! Characteristically, these plants are fascinating up close but they too make a long season of bright color from afar. But the foliage is evergreen to boot and not many rock garden plants can boast that kind of versatility

Erodium macradeum looks superficially like the previous two species, but the tuft is generally looser, the foliage more coarsely cut and the flowers even brighter and larger. It never produces the lavish displays of its fellow lavender pinks, but the flowers make up for their sparesness by being an especially brilliant rose pink. All of these are quite long lived in the garden, and if you plant more than a few plants, you are apt to get seed and lots of welcome seedlings over time to perpetuate your colonies.

## So Many Names, Such Little Time

Few plants seem to have attracted more Latin names than *Erodium trifolium*. Synonyms include *E. malviflorum*, *E. pelargonifolium*, *E. hymenoides*, *E. montanum* and many more. I hasten to say that this can be a very rambunctious self-seeder in some gardens. However, I find it very manageable in Denver where our winters seem to keep it somewhat in check. The wonderfully hairy, pale gray, rounded leaves are quite distinct from other *Erodium*, and the wonderful, two-toned flowers are distinctive and showy and very floriferous. But it is perhaps the least long-lived *Erodium* that I grow. It is almost monocarpic in habit. It produces just enough progeny to keep a colony going. I seem to admire the wooly, coarse gray foliage more than the flashy, large flowers. This is one that I truly find indispensable. I am always mystified why such a showy plant should be so rare in cultivation.

Seed exchanges of alpine and rock garden societies are where most people obtain their first starts.

(Ed: Here's a link to some very lovely photos and insights by Ian Gillam on the UBC Botanical garden website: <a href="http://www.botanicalgarden.ubc.ca/potd/2011/11/">http://www.botanicalgarden.ubc.ca/potd/2011/11/</a> erodium-trifolium.php The macro shot of the Erodium trifolium seed is magnificent.

Thanks to lan for this.)



Erodium chrysanthum

If there is one species that can work in industrial landscapes, it would have to be *Erodium chrysanthum* (or whatever this turns out to be: there is good evidence the commonly cultivated clone may be a hybrid. Ed: see link in Endnotes). There are several individuals of this species growing in the Rock Alpine Garden at Denver Botanic Gardens that are well over 30 years old. One is now well over a meter across. It blooms as prodigally as any *Erodium*, but in this case the flowers are a wonderful, silvery moonlight yellow color over a dense cushion of silvery leaves. Simply enchanting!

The Plant Select (see Endnotes) introduction program included this as a recommendation in 2011 under the snappy title of Bulletproof Beauty. http://plantselect.org/2011/05/bullet-proof-beauty-erodium/ I have found this Methusalah to be the hardiest and most adaptable of the genus in my gardens.

There is a wonderful pale pink hybrid called 'Joy' that captures the elegance of the genus and combines it with some hybrid vigor. It has likewise proven tough and long lived.

#### The Gem of the Genus





Erodium absinthoides

E. absinthoides (green) distribution map

The gem of the genus has to be *Erodium absinthoides* (which enjoys 19 synonyms!). We obtained this as var *amanum*, suggesting that it comes from that fascinating mountain range on the border of Turkey and Syria. I have seen what ostensibly appears to be the same plant labelled "var. *armenum*" suggesting it comes from the Caucasus.

As you can see, this form (originally from **Robin Parer** [See **Endnotes** for more info], growing in Mike Kintgen's private garden) is an amazing blue violet color--and seems to have an even more protracted season of vivid bloom than others in the genus: it can bloom almost as heavily in fall as in spring. The flower color is riveting: unfortunately the single clone we possess does not produce seed, and it is impossible to divide, and cuttings are recalcitrant. Fortunately, it has proven easy in tissue culture: this may be the way to propagate this on a larger scale. I have seen some plants with this name in Central European botanic gardens with pink flowers as well, and some pale lavender forms that are not as attractive as the Parer clone. I am quite certain this will be distributed under a cultivar name.

Strangely enough, there are still dozens of *Erodium* I haven't mentioned (see Endnotes). Some, like the popular *E. reichardii* (*E.chamaedryoides*) and *E. corsicum*, are not truly hardy in our Zone 6 gardens. Others (*E. carvifolium*) are superficially much like those I've shown. But others like E. *sibthorpii*, *E. x lindavicum*, *E. manescavii*, *E. celtiibericum*, etc. have escaped my camera, or I would have included them. And let's not even TALK about the many outstanding hybrids.

To sum up, *Erodium* is: a) Gorgeous flowers with variable evergreen foliage; b) an extraordinarily long bloom period; c) easy and adaptable in the garden; and, d) looks terrific up close and from afar.

I can't think of another genus of plants that has all that and more. I can't think of another alpine genus that eclipses *Erodium* for its versatility and year round beauty.\*

#### **Endnotes**

The most current biogeographical and ecological work available is as follows: *Erodium*- The uneven phylogeny and biogeography of *Erodium* (Geraniaceae): radiations in the Mediterranean and recent recurrent intercontinental colonization <a href="http://aob.oxfordjournals.org/content/early/2010/09/20/aob.mcq184.full">http://aob.oxfordjournals.org/content/early/2010/09/20/aob.mcq184.full</a>

The accepted names and species list of *Erodium*: http://ww2.bgbm.org/ EuroPlusMed/PTaxonDetail.asp?NameCache=Erodium&PTRefFk=7400000

Complete synonymy for *E. absinthoides*: http://ww2.bgbm.org/EuroPlusMed/PTaxonDetail.asp?NameId=22520&PTRefFk=7400000

http://www.geraniaceae-group.org/erodium\_chrysanthum\_forms.html
This is an in-depth story by Alan Robinson on the mysteries of *E. chrysantha*.

http://www.geraniaceae-group.org/john\_antonsmith.html
A story on John Anton-Smith and his breeding efforts over the past 20 odd years.

http://www.geraniaceae-group.org/dr\_reichards\_legacy.html
A longish and well-researched piece on *Erodium reichardiae* with many fine back stories.

**Plant Select**® is a cooperative program administered by Denver Botanic Gardens and Colorado State University in concert with horticulturists and nurseries throughout the Rocky Mountain region and beyond. Kelaidis was involved in its creation: <a href="http://plantselect.org/about-us/">http://plantselect.org/about-us/</a>

The best nursery in N. America for sourcing *Erodium* species and hybrids is run by **Robin Parer**. See here: http://geraniaceae.com/cgi-bin/welcome.py Believe it or not, some shade lovers are listed.

Exquisite illustrations of *Erodium* were first published in **Flora Graeca**. They were done by **Ferdinand Bauer** who accompanied Sibthorpe on his expedition over 200 years ago. See the first illustration of *E. absinthoides* aka *Erodium petraeum* here: http://botanicalillustrations.org/illustration.php?id\_illustration=143235

# Dunking For Darlingtonia: My Germination Finally Makes a Splash

by Linda Verbeek



Darlingtonia californica

photo by Noah Elhardt

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For many years I have tried to start *Darlingtonia californica* from seed. I thought that it was a really attractive plant for those mucky parts of the garden. I must have ordered it almost every time it showed up in the seedlists but never had any luck. Even when I put the whole pot in a saucer of water (a method that often works for plants that like marshy conditions) there wasn't any germination. Eventually I hit on a solution because of another plant. One Fall we collected seed of *Oenothera* (now *Camissonia*) *tanacetifolia* in SE Oregon on the edge of the Thompson reservoir. Although I sowed my own fresh seed that same Fall, nothing came up the next Spring. I was highly puzzled because I was convinced it was good seed. Eventually I thought and visualized that in the Spring, when the reservoir was full, the place where it grew might well be underwater. So, I dunked the whole pot in a container with a couple of centimeters of water above the surface of the soil. And indeed, after some time I got seedlings, which obviously were *Camissonia*. I reasoned that if it worked for one species that it might work for another. So the next 21

one I tried was a *Downingia* sp. These are (mostly Californian) annuals that tend to live in vernal pools. I'd seen one in the wild once. It looked like a *Lobelia* in the water (they are closely related to *Lobelia*) with deep blue flowers and a white mark on the lower lip. I was charmed. But again, I could never get germination. However, this species also germinated after I flooded the soil. Unfortunately, the plant that I grew didn't match my memories at all, being very tiny and washed out. However, it was a good learning experience.

So this Spring I tried it with *Darlingtonia*, which, lo and behold, repeated the pattern after giving them a dunk. I now have 6 or 7 tiny plants (I have my fingers crossed hoping they survive the current cold spell) bravely trying to make pitchers, each of which is maybe 4 mm long. These carnivorous plants won't catch much in those pitchers I imagined. I learned years ago that you can feed pitcher plants by putting diluted fertilizer in the pitchers themselves but at the moment they are so tiny that this seems inconceivable. However, at least they germinated and anyone else who has had problems with *Darlingtonia* or other marsh plants might want to try this method of submerging the seeds and the soil.

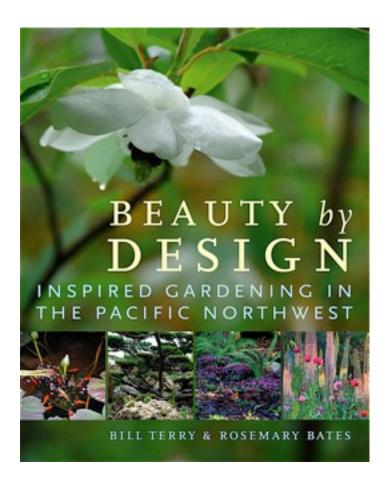
Ed: There are reports and a supporting picture of *D. californica* occuring in the entrancing Shoreline Bog Trail in Tofino, BC. <a href="http://i8.photobucket.com/albums/a46/thejacklord/11.jpg">http://i8.photobucket.com/albums/a46/thejacklord/11.jpg</a> from a member of the International Carnivorous Plant Society.

**Links:** Some great photos here of this carnivorous species: http://aldrovanda.com/eight-dollar-mountain-darlingtonia-californica-wetland-in-february

Wikipedia has a good entry: http://en.wikipedia.org/wiki/Darlingtonia\_californica



Seedlings of *Darlingtonia californica* courtesy A. Fischermans



Beauty By Design, Inspired Gardening in the Pacific Northwest by Bill Terry & Rosemary Bates (Touchwood Editions, Victoria, 2013) softcover.

Reviewed by Grahame Ware

There has, it seems, always been difficulties in legitimizing gardening as a real Art. In the publishing world, books on gardening are treated with the same kind of condescending contempt as cookbooks. Ah, but wasn't it James Barber that floated the Douglas & MacIntyre imprint on its way with "Ginger Tea Makes Friends"? To most people the gap between art and landscape seems just as great today as it was 200 years ago when the ideas of landscape architecture arose in the works and writing of that profoundly integrative horticulturist, J. C. Loudon.

In the era since WW2, the push/pull between architects and gardeners has been more acute. Reading the journal of the ASLA (American Society of Landscape Architects) one notices that they (LA) are still having hissy fits that rich clients think they are gardeners. How dare them!

But some few individuals such as A.E. Bye (*Art Into Landscape, Landscape Into Art*, PDA, Mesa, AZ 1983) understood not only that the sense of place and *genius loci* was the starting point in any landscape 'design' but that it needed more than that to rise to the level of art. His ideas have been a font for me in my designs and constructions 23

for decades. Recently, the ecological context as a catalyst for creating artistic *spaces* (apparently a more favourable term than *landscapes*) was well served in *The Artful Garden* (2011 Random House, NY) co-authored by the late James van Sweden. Many have grappled and wrestled with this basic question: 'How do we create Art *out of* and *in* the landscape?'

This is where the recently released book, *Beauty By Design*, comes in. In this series of 11 essays/interviews with Pacific Northwest gardeners and their thoughts on their gardens, the process and philosophy of just how that *art* might be accomplished is beautifully fleshed out by authors Bill Terry and Rosemary Bates. Not surprisingly, there isn't just one solution... and, that is the point. They do a good job of illustrating that education coupled with a real understanding of philosophy can indeed create (with the always necessary perspiration) not just Beauty but Art in their gardens.

Besides hard plant knowledge, the codes (and the Rosetta stone that this book provides) in the *artification* of a garden has as much to do with observation as it does with inspiration- the whisperings of the wind; the subtext of light and shadows; the mystical *patois* of plants and rocks; and, the growl of the earth. The book is wonderfully captivating stuff accompanied by a wealth of great images captured by Bill Terry as photographer.

But frankly, the design and production values of the book are not on an equal footing with the text and photos. Some of the images seem too small but that is a personal thing as I want all the images to be large and ponderable. There are so many fine pictures with space to depict themselves so this last point is a mere quibble. The writing, however, more than carries the day.

"The art...is not innate but learned: learned from careful observations of other gardens, from paying close attention to the experience of of expert plant people and books."

So starts chapter 1 of the book on page 5 with a quote from Kathy Leishman of Bowen Island. From here the Terry/Bates book peels back the layers of her garden and her philosophy of plants and design. Leishman has many things to say that you might not expect. Hers is not a demanding ego garden but one that she designed so that she could enjoy herself in it...such as a walk down to the Salish Sea shore on a warm September to watch the sunset with a glass of wine grasped guiltlessly and gracefully in her hands. Now that's designing...the perfect balance between pragmatism and a healthy hedonism.



Kathy Leishman's garden in late Winter

Bill Terry photo

But chapter 1 is just the beginning of the beauty-by-design journey and its practitioners. The collection of essays/interviews is an amazing panorama of styles, ideas and solutions to creating beauty and art in gardens in the Pacific Northwest. It also just plain fun to hear people open up about what matters most to them in creating a garden. They cite their influences and their inspirations and this is useful stuff and reason enough to buy the book.

I found it remarkable that throughout the book almost everyone had a sharp response to designers or gardening writers that are colour fascists. They get a good raking over the coals for their dislikes of yellow, orange and red. To a person, the emphasize that lively colours can be harnessed and utilized in west coast gardens especially when embracing a Mediterranean style.

Without spoiling it for anyone, here are the remaining chapters: Hinkley is going Mediterranean at his Windcliff garden and touts the film Enchanted April as one of his touchstones of inspiration; Eva Diener's Mediterranean/woodland/xeriscape land and gardens near Sechelt interpenetrates her and is "within me" she says; Robin Hopper's witty and whimsical Metchosin garden that is *Anglo-Japanadian* with some very cool stuff- the long chapter alone is worth the book; I fell on the floor laughing when I read Pam Frost's reaction to what colours she

I fell on the floor laughing when I read Pam Frost's reaction to what colours she doesn't want in the garden- "I'm not terribly keen on that very sad pink." I knew exactly what she meant! Frost's intuitive command of plant materials comes through loud and clear and is expressed by her in a refreshingly uncloying way;

The chapter on the garden of poets Patrick Lane and Lorna Crozier is like a coffee break in the book- amusing to a degree and certainly less intense but after all is said and done, it isn't terribly edifying;

And, in case you're wondering where all that money went that you spent on Robert Bateman's books or limited edition prints, you can see for yourself that his gorgeous Salt Spring Island garden with some top-notch garden structures- they cut no corners or expenses to create a very evocative and stylish west coast style;

Lewis & Little's very tropical space is aided by some very organic pottery/sculpture and imaginative use of fountains and small streams along with large urns of portable tropical shrubs;

Linda Cochran's Beth Chatto inspired boggy garden space is morphing into a dry, sunny courtyard with pots of *Agave*, *Echevaria* and *Cacti*.

Des Kennedy's Denman Island garden and its evolution over the past 25 years and what is important to him and his wife Sandy now.

Glenn Patterson's rooftop garden is well known to many AGCBC members. His story and his creation is very inspirational indeed.

Quite simply, this book is as good a compilation of the sources of inspiration and beauty that has ever been done on Pacific Northwest gardens.

The fact that there are many AGCBC members featured here only adds credibility to the quality of our membership. It also shows that education and a grounding in philosophy is critical for self-awareness when creating artistic gardens- gardens that are alive and evolving. A generation ago none of these gardens existed. Think about it: the evolution of thinking and the creativity of the 60 somethings is very real.

There are many younger artists that think they can make an artistic garden by adding a few cosmetic plant signifiers. So too there are many older gardeners that believe they can make their gardens artistic by draping a few hardscape signifiers and voilàthe artistic garden. However, the limitations and foibles of these notions are easily eroded over time. This book underlines the complex process that includes a large dose of hard work, humility and serendipity.

Mastering beauty in the garden is an art that demands a lifetime of commitment. In this book we see and hear from many people at their creative zenith having distilled ideas from a kaleidoscope of careers. In many cases, they have spent half their life (usually more) in the pursuit of beauty and art in their garden and not just for therapeutic reasons.

Beauty By Design is like a vast mirror reflecting the varied and cosmopolitan images and possibilities of artistic gardens of the Pacific Northwest. Gardening really is an art and this book shows some outstanding examples of this fact. I gasped though when I realized that Touchwood wants \$20 for the ebook as opposed to the \$25 for the real thing. I'm not sure what the advantage of the ebook is as I have not experienced it. This is a very valuable book however. Terry and Bates are to be congratulated for this terrific idea- a project that was designed and informed by beauty as well as being about the art that comes from beautiful design. On this last score, there can be little doubt that there is art in gardening nor that this book should be on your bookshelf. I had no idea how quickly the trip from Duke Point to Tsawassen could be when I bought this at the BC Ferries bookshop! I couldn't put it down.

# Wildflowers of the Coast:

Word Portraits of Selected Flowering Plants and Shrubs of the Pacific Northwest by John G. Fitch with Illustrations by Bonnie Moro Lucretius Press, July 2013



#### **Meditations and Narratives**

by Grahame Ware

This is a delightful book. It isn't often that poetry and botany are integrated in prose. But who better to do this than Classics Professor, John Fitch? A deep love of Nature pulses throughout this book as well as a sense of place heightened by an understanding of history both Greek, Roman and British Columbian. This is very refreshing compared to the freeze-dried descriptions found in field guides and botanical texts.

In a sense then this is John Fitch's ode to coastal Pacific Northwest wildflowers done with a dash of a call-to-arms for the use of narrative and less jargon in natural history, and specifically, botany. As he says in the Introduction,

"The possibility of conveying botanical information, in addition to aesthetic appreciation, through poetry demands a further comment. In the last century poetry unhappily became divorced from systematic and scientific knowledge of all kinds. This divorce was due in part to the notion that systematic knowledge, however precise, is not objective: it is created by human beings, from a certain point of view, often by imaginative leaps of thought, with passion and excitement. These are characteristics of human thinking that are not at all alien to poetry. Admittedly, the relationship between poetry and knowledge is constantly in need of renewal, as knowledge changes and advances with dizzying speed. But perhaps the current divorce is only temporary."

70 poems are presented covering plants such as *Erythronium oreganum*, *Philadelphus lewisii*, *Dodecatheon hendersonii and Brodiaea coronaria*. Just 20 illustrations accompany the text and I wish there was more of Bonnie Moro's fine work. But this is a nice production and it is well worth the money at \$8.95.

Here's a link to ordering from Amazon: <a href="http://tinyurl.com/ngtwum6">http://tinyurl.com/ngtwum6</a>

What I like is the way that Fitch uses his classical sensibilities combined with the use of a didactic narrative structure to inform easily and poetically in regards to a given plant. For example, let's look at the beginning of his entry on the Nootka Rose (Rosa nutkana).

It thrives in open places, roadsides, abandoned fields, the edges of beaver ponds. Its stock, deep-rooted and sturdy, produces abundant flowers borne singly at the tips of the canes, which are armoured with serious thorns. The flowers are simple but showy, often two or three inches across, their wildness emphasized by the unkempt stamens at the centre;

delicate and short-lived, but rich in beauty and scent.

This passage reads like Chess Lyons if he'd gone to Reed College. Easy and wonderful stuff. The strength and information of the poetic descriptions have a lateral way of imparting knowledge about the coastal wildflowers of the Pacific Northwest. I really believe that this project by Fitch is not only an artistic achievement but a scientific one as well.

In this sense, he has succeeded on the level that he intended- namely, to demonstrate the ability of poetic narrative- with its sense of space and meditation- to inform on deeper levels than mere monosemic and digital discourse. This is especially true when dealing with the English language which relies more on simile and image than any other language that comes to mind.

Fitch is funny too as this entry for Thimbleberry (*Rubus parviflorus*) clearly demonstrates.

Some thimble! The berry is more like a shallow dome, a skull-cap. Even on the underside, where the berry was held on its white receptacle, the hollow is more of a cone than a thimble. The flesh is soft as a raspberry, needing only a nudge to fall ripely into your hand or your mouth.

The flower is fine and showy, like a Nootka Rose (but smaller, and white not pink), with five broad, overlapping petals, crinkled like tissue paper, and with shaggy stamens at the centre.

The writing is subtle yet evocative and quite precise. We can recommend this book without reservation for those quiet days in Winter where the soul longs for Spring and Summer and all we have are memories.

This is when we need Fitch's words to transport us and fortunately we have it in this fine little book.\*

## Mediterranean Flowers of Goose Rock

## Text and Photos by David Sellars



Castilleja hispida with Olympic Peninsula faintly outlined in the background

Alpine flower hiking in the British Columbia Coast Mountains and Cascades is limited to the summer months. The snow does not melt in the high meadows until July and even August at some locations. Good places for a day hike in the summer include Manning Park in BC and the Mt. Baker area in Washington State. However wildflowers can be seen in April in the southern Gulf Islands and adjacent areas with similar climate and habitat. The southeast fringe of Vancouver Island, parts of coastal Washington State and several of the southern Gulf Islands are called the Garry Oak Ecosystem reflecting the unique climate and geology. (Ed: See map of this area from the beginning of the core reference material here: <a href="http://www.geog.ubc.ca/biodiversity/GarryOakEcosystems.html">http://www.geog.ubc.ca/biodiversity/GarryOakEcosystems.html</a>

The region lies in the *rain shadow* of the mountains of Vancouver Island and the Olympics, which intercept moisture from Pacific weather systems. The dry winters limit tree and shrub growth in areas of shallow soils over bedrock.

The absence of forest canopy encourages the growth of alpine-type plants which flower in April similar to the timing of spring flowering in our local gardens.

From the Lower Mainland of British Columbia you have to catch a ferry to explore a Garry Oak Ecosystem in BC. Good places to visit include Mount Galiano on Galiano Island- <a href="http://www.galiander.ca/galianotrails/galianosouthtrails.html">http://www.galiander.ca/galianotrails/galianosouthtrails.html</a> or Horth Hill Regional Park near the Swartz Bay Ferry terminal. (Ed: See Alan Tracey's article in AGCBC Bulletin Vol 54-2, Spring 2011). If you would rather not catch a ferry but cross a border instead to visit a Garry Oak Ecosystem, then a fine place is Goose Rock in Deception Pass State Park on the north end of Whidbey Island in Washington. <a href="http://www.deceptionpassfoundation.org/around-the-park/goose-rock/">http://www.deceptionpassfoundation.org/around-the-park/goose-rock/</a> Goose Rock at 147 m above sea level is the highest point on Whidbey Island. The trail starts at the south end of the Deception Pass bridge and climbs through forest. Here is a detailed map: <a href="http://www.deceptionpassfoundation.org/wp-content/uploads/ParkMapWeb.pdf">http://www.deceptionpassfoundation.org/wp-content/uploads/ParkMapWeb.pdf</a>

The open, rocky summit ridge runs west to east and has a remarkable alpine-type flora. Pretty blue *Collinsia parviflora* contrasts with the orange red paintbrush *Castilleja hispida*. *Camassia quamash* makes a home in the wetter seepage areas together with death camas, *Zigadenus venenosus*.

Orchids such as *Goodyera obongifolia* and *Calypso bulbosa* can be spotted among the shrubs.



**Zigadenus venenosus** has very showy flowers with daffodil-like basal leaves 31



Fritillaria affinis, a striking maroon/yellow form



Calypso bulbosa close-up

On April 24, 2013 the views over the ocean were spectacular and we found the diminutive, heterotrophic annual, *Orobanche uniflora* in moss and grass (Ed: Here is a definition of what *heterotrophic* species is: <a href="http://www.fs.fed.us/wildflowers/interesting/mycotrophic/whatarethey.shtml">http://www.fs.fed.us/wildflowers/interesting/mycotrophic/whatarethey.shtml</a>) as well as *Sedum spathulifolium* clinging to the rocks.



Orobanche uniflora

At the east end of the ridge was a field of some very nice-coloured forms of *Fritillaria* affinis and along a trail down the southeast side of the hill. Near sea level, *Rhododendron macrophyllum* was common in the forest but was not in flower in April.

To complete about a 3 km round trip hike back to the Deception Pass bridge, we followed a trail along the coastline passing stands of *Arbutus menziesii* leaning out over the sea.



Collinsia parviflora

The Garry Oak ecosystem has been characterized as having a Mediterranean-type climate. In places such as Greece and Crete, April is normally considered the best time to see wildflowers. In April, you don't have to go that far to see our own "Mediterranean" flowers- where the Garry Oaks and Arbutus meet the sea.

Bibliography: Matt Fairbarns, *Garry Oak Ecosystems*, in Klinkenberg, Brian (Editor) 2013. Biodiversity of British Columbia, Lab for Advanced Spatial Analysis, Department of Geography, UBC, Vancouver, BC. (Ed: See above on page 30 for this detailed ecological/botanical paper.)\*

# Agave filifolia flowers in Bischoff's Garden

If ever there was a testament to the Great Summer of 2013 it happened in Surrey at the gardens of Wilhelm and Karla Bischoff. After 25 years of just looking nice and sedate in its pot, the seductive Summer of 2013 influenced and persuaded this species that the conditions were right and bloomed. Could we rename it the Quarter Century plant? Great pix Wilhelm. Nectar was formed in the base of the flowers and Wilhelm claims that there was substantial insect activity. This might result in some seed.



A spire of flowers on the Bischoff's *Agave filifolia*. Karla brushing back the *Sequoia* 36