

Newsletter June 2003



FRIENDS OF MOUNT DOUGLAS PARK

A pat on the back

In this year we can congratulate ourselves on having 120 fully paid up members, some of whom have even subscribed for a year or two ahead. Of course, over the past few years our membership has kept not far outside this range. That our numbers have remained fairly constant at such a respectable level is, indeed, a striking demonstration of the abiding importance that the Park enjoys in the lives of neighbouring communities. This, however, should not encourage complacency among those whose membership dues are in arrears. Though we have continued to keep in touch with you, we always appreciate tangible proof that you still share our concerns and that we represent your interests.. The label on the front of your newsletter will show your membership status.

Annual General Meeting, 2003

The AGM was held on Wednesday, April 9 , at 7.30 , in MacMorran's Seaview Room.

- Reports on the transactions of the past year were presented by the office bearers.
 - Two representatives from the Habitat Acquisition Trust, Pauline Brest van Kempen and Jennifer Eliason, gave a brief account of the work they have been doing among home owners adjacent to the Park, in furtherance of the Good Neighbours Project for the protection of parks and green/blue spaces through private land stewardship.
 - Election of office-bearers followed. Sheilagh Ogilvie, Robert Bridgeman and Kenneth Rankin, whose terms as directors had expired, were re-elected to the executive.
 - Our guest speaker for the evening was the about-to-retire municipal Parks Manager, Dave DeShane. His address, entitled 'A Moment in Time' covered some of the remoter history of the Park as well as highlights in his own association with it during his term of office. After he had finished, the vice-president, Darrell Wick, presented him with a certificate appointing him as a lifetime member of the Friends, the first such membership the society has presented
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Ivy pull

In the afternoon of Good Friday, April 18 of this year, about 140 young Mormon volunteers, mainly from the Mormon Church on Wilkinson Road but some from up island, came to Mount Douglas to pull ivy.

This activity was confined to the considerable expanse of ivy both on the ground and up trees in from the right hand side of the Glendenning Fire Road as you enter the Park. As you can imagine with the youthful energy of these numbers, quite a considerable inroad was made into the spread of this invasive species in that area, but a vast amount has still to be tackled.

Ron Carter, the Saanich arborist, deserves particular mention for giving up a day off in order to distribute the necessary tools and give some preliminary instruction to the volunteers.

UVic campus development

You may have read in the Saanich News about the outcome of the three-sided negotiations between the University, Saanich Municipality, and a fairly loose association of other interested parties including students, over issues of building density and traffic control in the development plan that had been proposed for the campus.

Of particular interest to the Friends are the proposals for the control of traffic flow. In exchange for concessions made by Saanich Council over the amount of parking space serving multi-storied buildings the University, according to the Saanich News, is setting aside over half a million dollars to kick start measures to curb vehicular traffic to the campus. What the "kick start" effectively translates into has, however, still to be seen. Our ultimate interest, of course, is that the present flow of traffic through the Park should be reduced.

On a separate issue, the University has also undertaken to retain stormwater runoff entirely within the confines of the University's grounds. These, of course, fall outside the Douglas Creek watershed, but the general practice of stormwater retention is to be commended.

This is in contrast to the Municipality refusing to apply measures for complete stormwater retention, or the closest possible approximation, to the new Orchard Park development adjacent to the Park: it *does* lie within our Creek's watershed

Mountain bike photo

In its Capital Region Section on May 12, the Times Colonist featured a striking photograph of a mountain biker atop Mount Douglas getting ready to ride down a steep rocky face.

This seemed excellent evidence that the bylaw prohibiting mountain biking in the Park is being flouted. We contacted the municipal bylaw officer and also the staff sergeant in charge of the police bike patrol. As a result maybe the former also contacted the latter. In any case, the latter told us that the police could not lay charges against the biker unless there was someone to bear witness that he actually was where the caption said he was. That condition being unattainable, the staff sergeant undertook the speak very sternly to the young man.

Of the number of letters of protest that we are told were sent to the editor of the Times-Colonist, only one was published. Obviously the newspaper isn't aware that opposition to mountain-biking in the Park is considerable, not just an issue for a minor bunch of zealots.

What is particularly offensive about the photo and the caption beneath is that it glamorized mountain biking in the Park and completely ignored the environmental damage that it does.

We have written to Saanich Councillors requesting that the matter be brought before a meeting of the Committee Of The Whole so that more positive and effective steps can be taken to discourage the practice.

Membership renewals

Please check to see that your membership is up to date by looking at your mailing label. The number in the top left hand corner should be '03 or higher. If it is, we would like to thank you for your support of the Society and we hope the work ahead will continue to hold your interest. If the number is less than '03 you are in arrears and we hope you will take this opportunity to renew your membership by sending a \$5 per person per year to Graham Shorthill, 4623 Cordova Bay Road, V8X 3V6.

Many people use the option of paying in advance and send one cheque to cover two or three years membership. We take this as an indication that we are on the right track and we look forward to receiving more votes of this kind after you have read this newsletter.

Receipts for all recent renewals are attached to the inside of the newsletter. If you have not received yours or if there is any other discrepancy in the details of your membership please call and leave a message at 658-5873.

Over the last year, we have had an influx of new members—which is always gratifying—and a number of them have asked for a concise statement of the Society's goals and policies. To satisfy this need we have reprinted copies of the first real newsletter we produced back in 1991. On reading it again, you are struck by how relevant it is to the problems we face today, how little has changed concerning what has to be done to preserve a natural park in an urban context. In short, we got it just about right more than a decade ago and if you would like to refresh your memory please leave a message at 658-5873 and a copy will be in your mail box soon.

Equestrian access

Jo-Anne Nelson has drawn people's attention to the problems horse riders have when they try to enter the park from the Blenkinsop Road entrance of the Mercer trail. Riding has an essential and well-established presence within the Park and should be fostered. This looks like an ideal topic to start our discussions with the new parks manager and we would like to make it as comprehensive as possible. So, if there are any other horse-riding issues you want raise, this is the time to do it.

Cordova Bay Road sewer project

The title is not very glamorous but it is through this project that we will, at long last, get bicycle lanes and a safe footpath to the Park from the Blenkinsop/Royal Oak junction. The houses have been removed from the site for the pump station, the surveyors have been along the road making final adjustments to the site lines, and we have walked the route one last time with the engineers and parks staff.

The good news is that far fewer trees are now scheduled to fall than was originally thought, and some of those still on the list have a chance of surviving. The amount of rock blasting required and the changes to the contours of the road have also been reduced in the final plan. So, at the end of the day, we should have the new paths with a loss of less than ten trees and still have a curving, undulating and slightly narrower road. The crosswalks will be linked to the bus stops along the road, but this is one area where we

did not prevail entirely. We argued that the bus stop at the park entrance should be moved about fifty metres back so that it would be opposite the northbound stop and the two linked with a crosswalk. Unfortunately, the idea ran into opposition from Saanich staff and from the owner of the motel. So the crosswalk will be on the park boundary and disconnected from the north bound bus stop.

Now all that remains is for the physical work to begin: it is scheduled for this summer and will probably begin as soon as the work on Blenkinsop is finished.

The road stabilization project

After more than six months of silence, there was a burst of activity in April for the advisory committee set up by Saanich to look into the means available for securing Cordova Bay Road through the Park.

The first session was essentially a tour of the damage done to the various structures along the waterfront over the years and, in particular, the damage caused by the exceptionally high tides at the start of this year. This was followed by descriptions of the techniques used to combat such problems in different parts of the world. However, it was the second session, a day-long workshop, that has provided the meat for future discussions which, in turn, will lead to an Open House in the fall, when the public will have an opportunity to look at and comment on the options being considered. After public input has been incorporated into the scheme, the issue will go to Council.

The second session was so rewarding because we had high level representatives from the relevant departments of the federal, provincial and municipal governments, together with private sector engineering and environmental consultants and community groups all around the table at the same time. As a result, all the major issues were raised and the limitations defined in one session. This led to a surprising conclusion; namely, that the problem can be subdivided, with the beach being treated independently of the cliffs and the road.

This has brought us full circle, because it was an argument used by Cliff Warren when he was Chief Engineer of Saanich: in the early 90s he advocated a road stabilization project between the motel and Westbank Road using pilings and anchors immediately under the road to prevent slippage and subsidence. Based on the evidence of the last ten years he was right; you can achieve road stabilization for decades without interfering with the natural beach processes.

Points of agreement

- The eel grass is 75 m away from the cliff and must be protected as aquatic habitat.
- The cliffs supply sand to the sediment system in Cordova Bay and Haro Strait.
- Large solid structures at the water's edge cause the tide to mine the sediment into the sea.
- The ends of large solid structures sensitize the adjacent soil to rapid erosion.
- The slippage in the cliff is directly related to the rain fall.
- For the road to be stable, the cliffs must be dry.

Contentious issues

- What are the initial project costs for each type of structure?
- What are the maintenance costs for each type of structure?
- What is the projected life time of each structure?
- What proportion of the total suspended sediment in Cordova Bay does the cliff provide?
- What is the role of the rock 100m off shore by the entrance to the Creek?

Options for the beach

- Do nothing: Concentrate all the effort on direct road stabilization
- Soft engineering: Beach nourishment enhances the extent of the beach (height and width available for recreation. both increase)
- Hard engineering: High armoured wall lasts more than 30 years.
Depletes the sand and diminishes the beach
Endangers/destroys the existing biodiversity.



Options for the banks

Plant the cliff face with water-withdrawing, deep-rooted plants.

Drain the water from the cliff either by vertical drilling inland or horizontal drilling from the beach

Options for the road

Do nothing: Rely on the work below to keep the cliffs dry and therefore strong.

Road construction Build a support system directly under the road similar to the one by the motel.

We favour the options that do the least damage to the beach, not only in terms of maintaining the biodiversity that does exist along the shoreline but also maintaining the public's unfettered access to the area for recreation. From the views expressed at the workshop these goals are realistic, but it is going to require a great deal of effort to bring them to fruition.

The consultant for the project, Mr. John Readshaw, left the meeting with the intention of looking at soft engineering options similar to the ones used at Jericho Beach in Vancouver, and in the closing moments of the workshop the idea of a small pilot project (250 metres vs 700 metres) was floated for future consideration.

So there is lots of scope and opportunity to get this right and it will be very interesting to what the consultant brings back at the end of the summer.

What flutters by really does count...

In December, the Victoria Natural History Society holds its Christmas bird count. What is maybe less well-known is that for over 10 years the VNHS has also organized a butterfly count every summer. These counts show clearly that the inventories of breeding birds and butterflies fluctuate from year to year in reaction to an ever-changing environment. Do the numbers go up or down over time? What do the changes in numbers imply? Generally, for butterflies, the most important factor for their abundance is the availability of specific food plants for the larvae—so, for example, we might look at the connection between land development, native flora and butterflies.

To help us better understand how the butterfly population is doing locally, one or two volunteers are needed to record and count the different species in the lower reaches of Mount Douglas Park and its neighbourhood. The count, covering April to September, is done once a month, on or around the 3rd weekend, between noon and 3 p.m.. This is an excellent opportunity to extend your knowledge of butterflies way beyond the cabbage white. For identifying, a good reference is the Audubon Guide to Butterflies; another, the brochure, Garden Butterflies of the Georgia Basin, carried at Swan Lake.

If you would like to contribute to the ongoing VNHS butterfly inventory, the next count will be on or around June 21 and 22. Please contact Jeff Gaskin beforehand at 381-7248. He'll be glad to guide you through the initial steps on keeping a record. Successful butterfly-watching!

The stream

The last newsletter left the Creek activities at the BC Rivers Day Trash Cleanup last October, so stream news in this newsletter is lengthy, but well worth reading.

Significant Tree Day

On November 3, 2002: the Society celebrated this special day in Saanich by planting trees in Mount Douglas Park with a great turnout of volunteers:

Even with so many volunteers, we couldn't get all the trees in that day—17 grand fir, 74 alder, 4 Douglas fir, 19 Western redcedar in pots, 90 Western redcedar in styrofoam blocks and 2 sword ferns. Because the ground was still dry and hard as cement even in November, it took longer to dig the holes and everything had to be watered in. We planted the rest, mostly alders, the following weekend and stuck some cottonwood stakes in areas along the Creek where soil and gravel bars were collecting.

In the past we have planted long-lived native species that were grown from seed that, while indigenous to the region, is not local to this area:

Volunteers

Gordon Head Elementary School Environment Club; Charlotte Holten, Danielle St-Jules, Stephanie Marsh, Sonnie Marsh, Dana Fraser, Rebecca Dewar, and Nick Ruedy

11th Victoria Brownies; Joan Barlow, Helen Raptis, Nancy Fischer, Corina Fischer, Tori Provan, Dennise Aspelund, Kayla Braden, Sara Chambers, Susan Moskey, Sasha, Corine Koster, Elora Koster, and Kessia Perks

And; Richard Dewey, Allison Cliff, Maria Weaver, Medea Quesnel, Becky Sigurdson, Mavis Brace, Shaellee Schwede, Alexa Jacek, Mandy Wilson, Monica Du, Louise Ditmars, Marilyn/William/Ross Archibald, and Laura/Robyn/Bob Bridgeman.

now we are planting only local species. We also want to plant shrubby vegetation with vigorous root systems that can stabilize eroding stream banks. There is, of course, the problem of browsing by deer, which can override all other considerations.

Carcass transplant

On November 24th we made restoration history in British Columbia—some say in Canada— by the transplant of salmon carcasses from one system (Goldstream River) to another (Douglas Creek). Volunteers at the Howard English Hatchery had loaded 100 chum carcasses (averaging 5kg each) into burlap sacks, two to a sack, and they were trucked in by our DFO Community Advisor to Mount Douglas Park where 18 volunteers, many of them connected to the Restoration of Natural Systems Program at the University of Victoria, were waiting. It takes special people to be willing to spend their free time transplanting dead fish! These volunteers distributed the sacks along 600 m of the upper reaches of Douglas Creek.

Volunteers

Jessica Kerr, Nancy Ann Rose, Robin Rombs, Louise Ditmars, Sara Stallard, Don Lowen, Sylvia Kenny, Bob Bridgeman, Tom Rutherford, Barry and Steven Whillans, Simon Grant, Laurie and Mike Vaninsberghe, Kelly McKeown, Douglas Casey, Jim Pearson, Bruce Howe, and Susan Low.

Since Douglas Creek is an energetic system we expected the carcasses to move downstream and thus used various strategies to try to hold the carcasses in place. Some were tied through the gills with natural fibre twine, some left in the sacks, some not; some of all of these were stuffed into woody debris accumulations or anchored in place with large cobble. We monitored the results by walking up the Creek after the transplant and counting carcasses and then, approximately once a week, again counting carcasses to find out if they were moving downstream and out of the upper reaches. By the beginning of February, the carcasses were all gone.

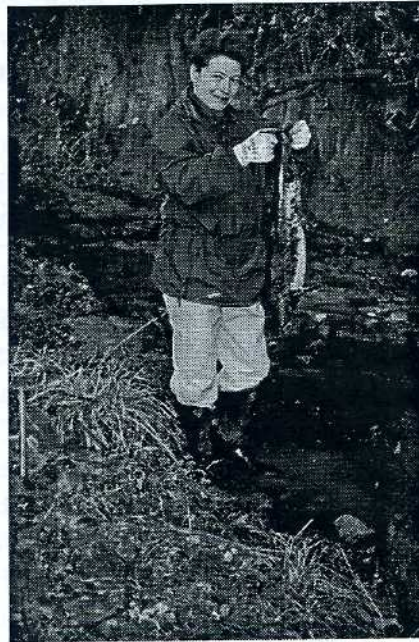
We expect the transplants to make a difference in the health of Douglas Creek. However, describing and quantifying the effects may be difficult. The water quality and hydrology problems in the Creek may mask or eliminate restoration of the basic nutrient regime.

This transplant shows that we can put carcasses in the Creek. We intend to transplant in 03/04, using the same techniques but perhaps incorporating a riparian transplant as well. The effects of this year's transplant will be monitored by comparing a detailed survey of aquatic invertebrates in the Creek against a rather incomplete baseline of aquatic invertebrates pre-transplant. We will adjust the program according to results.

Can't help but include this picture. An urban, sophisticated lady and no, that isn't a shopping bag in her hand, that's a dead fish.

Delightful if this turns out to be the new urban paradigm.

Why are we transplanting carcasses? Research studies on fertilized streams confirm a strong growth response in fish populations (Bilby *et al.* 1996). Recent studies have shown the ecological importance of sources of marine derived carbon and nutrients for aquatic and terrestrial biodiversity and that spawning salmon are an ecologically significant source of organic matter and nutrients for the stream systems



Fish counts

Fish trapping in November and December wasn't turning up any coho fry. Trapping is hit and miss, as has been said before, and the only thing that you can know for sure is that you have fish in the creek when you have fish in the traps. However, we tried to cover all eventualities by transplanting a thousand year-2001, coho fry on January 18, 2003. Conditions were perfect. We had so many people take part that I couldn't keep up with the name list or even a head count. A very good time was had by all.

What was unusual was that I didn't see a single fry when I walked the Creek next day looking for them: usually I'd expect to see many of them after a transplant. Nevertheless it turned out that they *were* there.

The hydrometric station

On January 19 the hydrologist (Gordon Clark) and I recalibrated the hydrometric station. A woody debris pile had broken apart upstream and released a lot of gravel and cobble downstream that filled the pool the station is set up in. This makes the gauge height read higher than it should under our initial calibration. (We need to find a way to maintain this system, which means finding some money—say \$600.00 a year. Ideas anyone?)

Eleven days later we had 24 millimetres of rain in 24 hours. At the same time, (as a result of?) oil was spilling into the Creek. There was a very strong smell of oil at the weir as a slug went through—the Creek was roaring—next day placid and lovely.

Of course that volume of water shifted the hydrometric station again so that it needs to be recalibrated again. All is not lost though—if we recalibrate it often enough we will have gauge readings for every condition.

So were the coho fry flushed out or murdered by the oil?

On February 9 we set the minnow traps: on the 10th at 10:30 in the morning we picked them up. One trap had 7, one had 3, and two had none at all. That's not a bad count although I am a little surprised at two having none. I think that the profound ecological mysteries that we meet face to face when we are working on the Creek keep a lot of us going through times that are trying.

International Chum and Pink Salmon Conference

We made a formal presentation at the International Chum and Pink Salmon Conference at the Empress Hotel on February 27th, 2003. We described our stream restoration, with a focus on the carcass transplant. It was daunting to speak to 150 scientists who have written books on various aspects of salmonid interests. We were, however, well received.

Fry release

On April 5 we planned to release 30,000 chum fry into the Creek. We waited while it rained off and on. Both the Community Advisor and the volunteers from the Howard English Hatchery, who donated the fish, were surprised to see the Creek rise and fall as the rain waxed and waned. We had to postpone the release, as the chum would have been swept out to sea before they could imprint on the Creek.

We tried again on April 26. Because the first transplant had been postponed, we transplanted 30,000 chum and 2000 coho on the same day. A bit of extra confusion was thrown into the mix because we had to change days on short notice. I know some people didn't get the change of date: we apologize for that, but it was unavoidable. Be that as it may, we got the job done. Twenty-six adults and kids released the chum at the weir and then "seeded" the coho fry into habitat units over the length of the stream, upstream of Ash Road Bridge.

When we went down to monitor on April 27, the Creek looked like coffee. Turned out a 6-inch water main broke at 2:00 a.m. that morning, sending approximately 2 million liters of water down the Creek over the course of three hours. Several valves needed to be closed to shut down the supply so it took some time to get it under control. When they arrived on the scene, the Saanich public works crew used chemicals to neutralize the chlorimide. Some of the chlorine may have oxidized material in the particulate caused by the erosion around the broken pipe, and of course the potable water is diluted by the ground water in the Creek. At any rate the water was too turbid for us to see anything that day.

We walked up the Creek again on April 29, and I counted 2000 fry—an ultra-conservative count—and 50 dead chum, so who knows how many were flushed out. That means we have another unknown: how many were flushed out and did they imprint first? The chum are expected to return in 3 to 5 years, so we won't know until then.

There were still coho fry in the Creek—I saw a couple of real lunkers as I peered around and under woody debris. These were last years fry. When I set the minnow traps May 10th, I saw schools of 25 fry in pools and in riffles (these were coho that have been hatchery reared, hence the schooling). One trap had 26 coho fry averaging 50 mm nose to fork of tail while another had one coho fry. The other two were empty, but fry were seen outside the traps.

Custom grown planting

On the 30th of May 2003 we met with Ron Carter from the Municipality and Rob Hagel from the Pacific Forestry Centre. It looks like we will be able to custom grow native plants from propagules gathered in the park. If you would like to become involved in collecting and perhaps growing native shrubs and trees for restoration give me a call.

The old orchard

As some of you may know, the Old Orchard (Elnido and Cedar Hill) is being developed. We hoped to get a wetland into the development as a community amenity and to treat stormwater to improve water quality, but alas, the good creek/bad creek division in Schedule H has stymied us. When that division was brought in, I clearly foresaw the consequences and we argued against it, but without avail. I am informed that there will be stormwater management, or at least what passes for stormwater management for “bad” creeks. The treatment is not going to help sustain base flows but at least, or so I am told, there will be no net gain in stormwater going into the Creek at high flows.

We are doing more stream restoration than any other project that I know of in the CRD. We have involved literally many hundreds of adults and kids in restoration activities, from seeding the Creek with eggs, fry and carcasses, through tree planting and including assessment, fry trapping and water quality studies. We have worked with the University of Victoria, Royal Roads University, Camosun College, Arbutus Junior Secondary, Gordon Head Elementary, Scouts, Cubs and Brownies, plus staff members from the municipality, the Department of Fisheries and Oceans, the province and the CRD. I find it depressing (and truly astounding) that Saanich Engineering seems unable to fully embrace the modern world.

Research

This year we've had a couple of individual students and groups of students from the University of Victoria working on research for a revegetation plan, and we are incorporating their work into our own project.

As well, two groups of students from Royal Roads University are doing major projects in support of our community restoration. One group is researching available areas on the watershed that could be used to treat stormwater through a variety of appropriate techniques. An example we discussed was the greening of Gordon Head Recreation Centre. Stormwater from the large impervious areas could be infiltrate, and when the parking lot is slated for repair it could be re-laid as a pervious surface. This is only one example appropriate to the place and technology required: there are others. This is very important work and I wish it could reach a wider audience and be put into practice.

The second group, made up of dedicated and intelligent students of aquatic ecology, is working on refining a monitoring system for changes that are made on the watershed and in the stream channel—for example, stormwater management on the watershed and carcass transplants into the Creek. The province has bought into monitoring long-term water quality by examining numbers and species of aquatic bugs found in streams, and we are using and refining a similar system for Douglas Creek. This is a long-term project and will continue as long as there is an interest in tracking water quality in the Creek.

It is hard to overstate the importance of maintaining these sorts of relationships. We will give you further reports about them in future newsletters.
