



## April 2008 Newsletter

### Contents:

COUNCIL RETHINK ON  
HARBOUR  
PHYSICAL & NUMERICAL  
MODELLING  
OLIVERS HILL JETTY  
WEEDS ON THE FORESHORE  
ENVIROFUND GRANTS  
VOLUNTEERS  
MEMBERSHIP OF THE FBA

### FBA Committee:

President - Frank Hart  
Vice President - Graeme Lyell  
Secretary - Kath Hassell  
Treasurer - David Mumford  
Committee - Olwen Bawden  
Pat Bentley  
Bob Graham  
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For enquiries about voluntary work on the foreshore or in the nursery, please contact the Secretary via the details above.

FBA web site:  
[www.vicnet.net.au/~fbainc](http://www.vicnet.net.au/~fbainc)

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### Council Rethink on Harbour

Some 5 years after the Minister for Planning gave his conditional approval to the proposal to build a marina at Olivers Hill (also referred to as a Safe Boat Harbour), Council has put up a virtually new proposal.

The conditional approval in 2003 (strengthened in 2004) was subject to some 40 recommendations, most of which have not been implemented. The most important was the need for physical modelling, which is dealt with further in this newsletter. You have to ask yourself why the necessary data collection for this (which will take several years) has not yet commenced.

Council's new proposal is very much under wraps, but we now know that they want to:

- remove any constraints on the size of boats.
- place a 200 metre dry boat storage shed (for 400 boats) out on land that is created by further infill of the Bay.
- create additional land for further restaurants, boat repair yards, retail outlets, and accommodation for overnight stays etc.

Just to put this all in context, this would become the largest marina in Victoria, 30% bigger than Sandringham.

And the hardest thing to understand is why Council now wants the State Government to approve this proposal without putting it out for public comment. Their one concession was to become involved in a recent State Government Priority Development Panel hearing on 6 and 7 March 2008, held at Council, with submissions permitted to be made by a selected few - it was by invitation only. Members of community groups, such as the Frankston Beach Association were permitted to speak for 10 minutes, although individuals invited were given 30 minutes to put their views.

What Council is asking the State Government to do is to change the planning legislation to permit this larger version of the marina, with what amounts to virtually no public input. In the past the FBA has always felt we were participating in due process - this now looks like 'no process'.

Olivers Hill and the surrounding beaches are Crown land, and part of our community's heritage. Any extension of the marina plans, conditionally approved in 2003, will further destroy the beaches in Frankston and Daveys Bay, and will destroy the natural beauty of this iconic area. We have recently seen a Council document which likens their new marina proposal to the Sydney Opera House and the New York Statue of Liberty! But no details are provided. The mind boggles!

Personally our members prefer Frankston's natural beaches and the beauty of the views of and from Olivers Hill. Haven't we got sufficient hotels, motels, restaurants, retail outlets and factories in Frankston without having them on our foreshore?

## Physical & Numerical Modelling

An article in the November 2006 Frankston Beach Association Newsletter, gave

six reasons prescribed by the 2003 Panel and the Minister for Planning, for undertaking the numerical and physical modelling studies of the littoral drift at Olivers Hill.

To help explain the reasons for this work, we quote below extracts from a paper presented to a Symposium in Southampton, England, on 'Marinas and Small Craft Harbours', by Mr. I. W. Strickland, Head of the Hydraulics Group of the British Hovercraft Corporation.

The paper is titled, '*Site Investigation and Hydraulic Model Studies*':

*'One of the most important factors in the process of planning a yacht harbour is that of obtaining as detailed a knowledge as possible of the physical characteristics of the proposed site. The information is required so that the relative merits of a particular site or sites can be evaluated, the best layout for a marina and its long term effects on the existing coastal regime can be determined together with the most effective and economic design for the various marine structures and other facilities.*

*Factors such as wave action, wind velocities and directions, tidal range, tidal currents, littoral drift, siltation and sand movement, the nature of the sea bed and sub-surface strata for foundation problems must all be surveyed and documented. Some of this information will be required at a very early stage, such as during the feasibility studies, which normally precede the selection of a particular site..... data must if it is to be of value, be recorded over as long a period as possible and certainly in excess of one year.*

*In the event that hydraulic model studies are likely to play a part in the design of the marina, then this too must be taken into account when considering the scope of site investigations.*

*The data required for model studies falls into two categories, firstly to provide sufficient information to design, construct and operate the model, and secondly to interpret the results and if possible to forecast the frequency of occurrence of certain phenomena or long term effects on the existing regime. To undertake any form of statistical forecasting with any degree of assurance requires as much data as possible over as long a period as possible. This fact must be recognized and allowed for when preparing a schedule of work for site investigations and therefore it must be considered at the earliest possible point in the design process'.*

In 2004 the Port of Melbourne Corporation as part of their Channel Deepening Project engaged Lawson and Treloar Pty Ltd to undertake a study of existing coastal erosion and deposition and sediment transport within Port Phillip Bay. Lawson and Treloar concluded that:

*"More than 20 beaches around the Bay have been artificially renourished in the last 25 years. On the*

*eastern side of the Bay there is a net movement of sand from south to north. There are a number of places where the sand is being trapped and is effectively being taken out of the system. The 3 main sand traps are Sandringham, Brighton and St. Kilda Harbours which has lead to the denudation of sand and periodic erosion at nearly all the beaches further north".*

This is the same set of circumstances that will arise if a solid structure is built at Olivers Hill projecting from the shore line out into deeper water.



*Could this beautiful beach be lost?*

In January 1996, Coastal Engineering Solutions Pty. Ltd. issued a Report based on the Gutheridge, Haskins and Davey (GHD) Report of 1990, that specifically assessed the effects that construction of a small breakwater and groin and three boat ramps would have on the littoral drift at Olivers Hill and on the Frankston beach to the north and Daveys Bay to the south of the northern toe of the Hill. The Report stated that:

*'There are indications of 15,000 cubic metre of sand moving in a southerly direction and 25,000 cu. m. of sand in a northerly direction in the Frankston Area and that the effects of the proposed small development at Olivers Hill on the littoral drift would result in serious problems which require site investigations at Olivers Hill and at Kananook Creek. Since the Kananook Creek and Olivers Hill sites are contained within a single coastal cell and influenced by the same coastal processes, the data collected for these investigations could be used to investigate both concerns'.*

Eight Victorian coastal engineers and scientists have provided advice that a marina at Olivers Hill will adversely affect the Frankston beaches and Daveys Bay.

It is clearly time that before any marina type development, small boat harbour or other structure projecting from or close to the shore line, is approved in the Frankston/Olivers Hill area, rigorous scientific, numerical and physical modelling studies, as detailed above, must be undertaken and for such structure and the effect such structure will have on the coastal environment must be determined. This work should be commenced immediately.

## Olivers Hill Jetty

Frankston Council have finally moved to repair the jetty adjoining the boat ramps at the foot of Olivers Hill. This jetty has been in various states of disrepair for many years now, so it is very pleasing to see State and Council funding being directed at upgrading this important boating facility.

## Weeds on the Foreshore

A weed is a plant that does not belong to the Ecological Vegetation Class (E.V.C.), of the area. A weed can be a threat to the indigenous vegetation by spreading rapidly, replacing or smothering indigenous plants and inhibiting the germination or growth of natural plants.

The viability of an ecological vegetation class can be compromised, sometimes devastated.

### Examples:

One of the worst weeds on the foreshore is **Bridal Creeper**, (*Myrsiphyllum asparagoides*). It is a creeper that spreads via seed eating birds and animals, and also via many underground corms. Roots grow from wherever the vine touches the ground. If left to grow freely it can completely smother the indigenous vegetation. Fortunately biological controls have been found to succeed in controlling the plant with the use of a rust fungus and a mite, which together have suppressed the spread of this extremely invasive climber. Originating in South Africa, it was a popular hanging basket plant sold by many nurseries in the past!

Another South African plant, which grows to a 5 meter shrub, is **Boxthorn** (*Lycium ferocissum*). Aptly named, it has 15cm long spines on its branches making it impossible to remove by human hand. The council has resorted to using big machinery to extract them, trying not to leave the large thorns in the dunes. Again it is spread by birds and animals eating the bright red fruit. It replaces the natural shrubs of the foreshore such as coastal ti tree, coastal beardheath and boobialla, the major shrubs of the Coastal Dune Scrub.

The New Zealand **Mirror Bush** (*Coprosma repens*), displaces indigenous shrubs too. This exotic weed grows rapidly on the coast, spreading in exactly the same manner with its red berries. Removal is easier (no thorns) by sawing and applying herbicide to the stumps. Disturbance and clearing of vegetation creates the ideal situation for the introduction of more weeds, such as veldt grasses or deadly nightshade, so it is paramount to manage an area properly and clear at a time when replacement is going to be successful, by planting or direct seeding, timing and season being considered.

One of the most natural looking grass weeds of the foredune is **Marram Grass** (*Ammophilla arenaria*), a European tussock introduced for dune stabilisation. It can take over the role of the indigenous hairy spinifex, but if examined closely the dune form is quite different. The tall tussock forms a clump creating steep sided dunes, whereas the horizontal runners of the Spinifex sericeus encourage wide gently sloping dunes less

prone to erosion. To remove the weed when it is the only plant binding the sand would be deleterious, but gradual replacement with the well adapted Spinifex would improve the quality and stability of the foredune. Where healthy areas of Spinifex exist any marram grass encroaching should be removed, by cutting and painting with herbicide.

Over the years, the bright yellow flowers of the **Gazania** species that has colonised the coastal areas of Frankston have slowly disappeared thankfully, as this south African plant exudes a chemical inhibitor around it, discouraging growth of the natural vegetation, ensuring its own survival and spread along the length of the foreshore. This is an escaped garden plant, like so many of our weeds. When residences are close to the foreshore reserve, the likelihood of this happening with other garden plants is high, particularly if garden rubbish is dumped on the dunes.

**Polygala myrtifolia**, a south African shrub, is one that is often planted for its bright purple pea flowers and spreads rapidly on coastal areas.

Other weeds found on Frankston Foreshore:

- Hare's Tail (*Lagurus ovatus*)
  - Cape Ivy (*Delairea odorata*)
  - European Sea Rocket
  - Dolechos (*Dipogon lignosis*)
  - Cape Broom (*Genista monspessulana*)
  - Angled Onion
  - Buffalo Grass
  - Tamarisk
  - Sweet Hakea (*Hakea suaveolens*)
  - Sea wheat grass (*Thinopyrum junceum*)
- and many more.

The most difficult two weeds to identify on the foreshore are **Sallow Wattle** (*Acacia longifolia*) and the South African species of **Carpobrotus**, as they are visually fairly close to their indigenous counterparts, Coastal wattle (*Acacia sophorae*) and Pigface (*Carpobrotus rossi*).

## Envirofund Grants 8 and 9

Grant 8 is now complete, covering 2 zones east and west of the current boardwalk. Total revegetation area is 0.165 ha. Planting of 7,100 indigenous plants has completed the project -

FBA's 'in kind' contribution	\$31,173
F.C.C.'s contribution	\$12,543
Envirofund contribution	\$13,140

Grant 9 – we have received funding of \$19,068 to remove woody weeds and succulents, and plant 5,600 indigenous plants. Planting will commence during May, but will depend on a good rainfall. This is the most ambitious project our association has attempted. It covers 0.75 ha on the Frankston Foreshore Reserve between Flocchi Ave and Annie St. Apart from our work group, many of the residents have volunteered to assist with planting and maintenance.

FBA's 'in kind' contribution	\$30,280
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F.C.C. contribution \$18,685  
Envirofund contribution \$19,068

Also our work group, together with Council officers, will work with residents of three properties on Gould Street to remove woody weeds and plant 2,000 indigenous species.

During the 2008 planting season, Council Officers, the FBA work group and volunteers from The Body Shop will plant 15,000+ indigenous species either side of the new boardwalk between Frankston Yacht Club and the Life Saving Club.

## Volunteers

Volunteers are urgently required on alternative Tuesdays from 9.30-11.30am. at either the Indigenous Nursery or planting on the foreshore. For further information, please contact Debbie Williams (9781 3182) or Kathleen Hassell (9783 1391).

## Membership of the FBA

Frankston Beach Association Inc is a non-profit volunteer organisation that is supported by the local community.

By becoming a member, you are helping to preserve and improve the natural features of the Frankston foreshore, having regard for appropriate and sustainable development and support for provision of recreational facilities, consistent with recognised coastal management principles that will benefit the local community and visitors alike and not undermine the health of the foreshore's natural features.

For \$10 (family) \$5 (seniors) per year, your support will help us to improve the natural beauty of the beach and foreshore by removing weeds and planting indigenous vegetation in areas not covered by Government Grants.



# Frankston Beach Association Inc.

*Preserving the beach for all to use*

## Membership Application

(July 1 2008 to June 30, 2009)

I/we wish to join, or renew my/our membership of, the FBA for an annual subscription of \$10 (family) \$5 (seniors).

Name: \_\_\_\_\_

Address: \_\_\_\_\_

Telephone AH: \_\_\_\_\_ BH: \_\_\_\_\_

Email: \_\_\_\_\_

Areas of Interest (eg. propagation, planting out, foreshore maintenance):

\_\_\_\_\_

Hours/days available: \_\_\_\_\_

I/we wish to assist the Association's activities, and enclose a donation of \$ \_\_\_\_\_

Please detach this application form and send with payment to the Secretary:

FBA Secretary  
44 Violet St.  
South Frankston, Vic 3199

