FinBook

DOLPHIN
WATCH

An identification catalogue for dolphins observed in the Swan Canning Riverpark and Fremantle Port

1st Edition - May 2011

Government of Western Australia

SWAN RIVER TRUST

River Guardians

Murdoch UNIVERSITY

Curtin University

FinBook 2011

Foreword

As Chief Scientist of Western Australia it has been my pleasure and privilege to follow the development of the Dolphin Watch Project. The dolphins in our South West estuaries are part of West Australia's environmental, social and cultural heritage. FinBook makes a key contribution to enhancing 'citizen science' as part of initiatives to support the health of our dolphin population.

I commend this book to you and I look forward to witnessing an even greater role for the community in protecting our precious environment.

Professor Lyn Beazley AO FTSE

Chief Scientist of Western Australia

FinBook 2011

What is FinBook?

FinBook is a catalogue of dolphins observed in the Swan Canning Riverpark and Fremantle Port Inner Harbour since 2008. This is the first edition – it will be updated over time.

Why is FinBook important?

Dolphins are an icon of the Swan Canning Riverpark. It is important that we are able to identify each of the dolphins that use the Riverpark so that we can monitor its welfare. FinBook gives everyone the ability to participate in this process. Using FinBook, community members can recognise individual dolphins and contribute information to help monitor these unique residents of Perth's rivers. FinBook is a resource designed for everyone, so that everyone can play their part in keeping dolphins part of the estuary ecosystem.

How does FinBook work?

Dolphins can be identified by the markings and nicks that are present on their dorsal fins. Many of these markings are permanent, allowing dolphins to be monitored over time. Some dolphins are difficult to identify because of a lack of markings and are known as 'clean fins'. FinBook is like a catalogue of 'fin-prints' for dolphins. The tables in FinBook show the right and left sides of each dolphin's dorsal fin. FinBook also describes other unique features that can be used to identify individuals.

DOLPHIN WATCH

FinBook 2011

Where to from here?

Dolphin Watch is a community monitoring program run by the Swan River Trust's River Guardians program in collaboration with researchers from Curtin and Murdoch universities.

Dolphin Watchers collect valuable information about when and where dolphins are in the Riverpark. With FinBook, we can now also look at 'who' is in the Riverpark. If you are a Dolphin Watch member, you can submit images of dolphin dorsal fins following the normal data submission procedures. If you are not a Dolphin Watch member, consider joining the River Guardians program and becoming one.

In either case, you are now ready to identify the dolphins in the river! Not all the dolphins in FinBook use the river frequently and some may only ever be seen in the Inner Harbour and coastal areas nearby.

Others will use the river on a daily or near-daily basis – look out for them and you may get to know them very well over time. Some of the dolphins in FinBook were first observed in the Swan River in 2001, when Murdoch University undertook the first scientific study of dolphins in the estuary.

Most importantly -- remember to keep your distance from dolphins. Dolphins experience many challenges and stresses so it's important that we leave them alone as much as possible. Under the *Wildlife Conservation Act 1950* it is an offence to disturb or harass dolphins. If they approach you, watch them quietly but do not attempt to approach or follow them.

DOLPHIN WATCH

FinBook 2011

How to use FinBook

FinBook is divided into two sections based on sighting locations:

1 **dolphins sighted in the Swan Canning Riverpark** (25 dolphins)

2 **dolphins sighted in Fremantle Port (Inner Harbour)**
but not sighted in the Swan Canning Riverpark (11 dolphins)

Dolphins that use the Swan River also use coastal areas outside the estuary. Thus, all the dolphins observed in the Swan Canning Riverpark will also be observed in the Port from time to time. However, many dolphins from coastal areas around Fremantle will range within the Port, but not travel into the estuary.

Each identified dolphin has a profile giving its **name** (or identifier) showing images of the **left** and **right side of the dorsal fin** (where available) and providing information such as its **age-class** (e.g. adult) and suspected or confirmed **sex**.

Eleven dolphins in FinBook were first seen 10 or more years ago, during research studies in Cockburn Sound from 1993 to 1997 and in Cockburn Sound and the Swan River from 2001 to 2003. The **year in which these dolphins were first observed** is provided.

Some of the profiles also contain notes on **notable marks**, which are unique scars or other markings that are useful for identification.

With each section dolphins are grouped by the type of markings they have, e.g. dolphins with a ‘high ding’ are grouped together.

Some notes on **individual dolphins** and a **glossary** are provided at the end.

DOLPHIN WATCH

Dolphins seen in the Swan Canning Riverpark

2008-11

Entire fin is distinctive

Unk 25

Sex: Unknown

Age: Adult/sub-adult

Real Notch

Sex: Suspected male

Age: Adult

First seen: 2001

Unk 40

Sex: Unknown

Age: Unknown

Notable marks: shark scar

Unk 41

Sex: Unknown

Age: Adult

Dolphins seen in the Swan Canning Riverpark

2008-11

Lead ding

Daniele

Sex: Unknown

Age: Sub-adult

Notable marks: Groove **at base of leadi**ng edge of dorsal fin

Peduncle notch

Blackwall

Sex: Suspected male

Age: Adult

First seen: 2001

Notable marks: Hunk out of peduncle

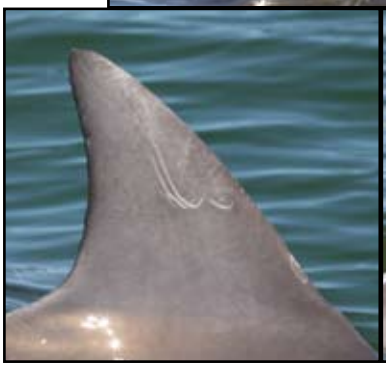
Fingertip

Hii

Sex: Suspected male

Age: Adult

First seen: 2001



Kwillena (formally known as Topscoop)

Sex: Suspected male

Age: Adult

Notable marks: Large white spot

First seen: 2001

Dolphins seen in the Swan Canning Riverpark

2008-11

Ding high

		**Highnitch** **Sex:** Female **Age:** Adult **First seen:** 2001
		**Unk 19** **Sex:** Unknown **Age:** Sub-adult
		**Unk 22** **Sex:** Unknown **Age:** Sub-adult
		**Unk 23** **Sex:** Unknown **Age:** Adult

Dolphins seen in the Swan Canning Riverpark

2008-11

Up ding

Unk 32

Sex: Unknown

Age: Adult/sub-adult

Unk 17

Location: Melville waters

Sex: Unknown

Age: Adult

Dolphins seen in the Swan Canning Riverpark

2008-11

Mid ding

Unk 16

Sex: Unknown

Age: Adult

Unk 18

Sex: Female

Age: Adult

Unk 31

Sex: Unknown

Age: Sub-adult

Dolphins seen in the Swan Canning Riverpark

2008-11

Low ding

		**Bottomslice** **Sex:** Female? **Age:** Adult **First seen:** 2001
		**Moon** **Sex:** Female? **Age:** Adult/sub-adult **First seen:** 2001
		**Tworakes** **Sex:** Female **Age:** Adult **First seen:** 2001
		**Unk 21** **Sex:** Unknown **Age:** Adult

Dolphins seen in the Swan Canning Riverpark

2008-11

Low ding

Unk 47

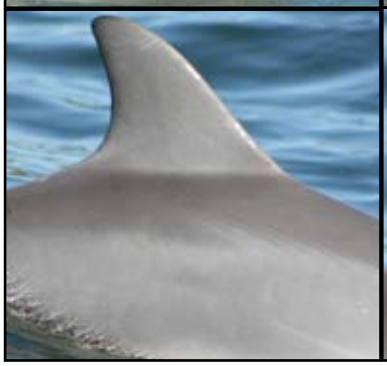
Sex: Unknown

Age: Adult

Dolphins seen in the Swan Canning Riverpark

2008-11

Clean fins

		**Tupac** **Sex:** Female **Age:** Adult **First seen:** 2001
		**Unk 33** **Sex:** Unknown **Age:** Adult
		**Unk 46** **Sex:** Unknown **Age:** Sub-adult

Dolphins seen in Fremantle Port

2008-11 (not observed in Riverpark)

Up ding

Unk 24

Sex: Unknown

Age: Sub-adult

Unk 28

Sex: Suspected male

Age: Adult

Mid ding

Unk 20/134

Sex: Unknown

Age: Adult

Unk 26

Sex: Suspected male

Age: Adult

Dolphins seen in Fremantle Port

2008-11 (not observed in Riverpark)

Low ding


Unk 5/133

Sex: Unknown

Age: Adult

Top nick


Unk 29

Sex: Unknown

Age: Sub-adult

Entire fin is distinctive


Unk 154

Sex: Unknown

Age: Adult


Unk 27

Sex: Suspected male

Age: Adult

Dolphins seen in Fremantle Port

2008-11 (not observed in Riverpark)

Entire fin is distinctive

 	**Backpack** **Sex:** Suspected male **Age:** Adult **First seen:** 1990s
 	**Fingers** **Sex:** Suspected male **Age:** Adult **First seen:** 1990s
 	**Unk 147** **Sex:** Unknown **Age**: Adult

FinBook 2011

Notes on individual dolphins

The Swan River dolphins were studied intensively from October 2001 to June 2003. During that time Murdoch University researchers identified 55 dolphins in the Swan Canning Riverpark and Fremantle Port (Inner Harbour).

Twelve of these dolphins were calves dependent on their mothers, meaning that 43 adult or juvenile dolphins used the estuary and port during this time. Of these, only 18 were consistently seen in the estuary and were considered to comprise the resident dolphin community.

FinBook includes eight of those resident dolphins: **Blackwall, Bottomslice, Highnitch, Hii, Realnotch, Topscoop** (now Kwillena), **Tupac** and **Tworakes**. We know or suspect six to be dead and we are uncertain of the status of the remaining four.

Moon, a dependent calf from 2001 to 2003, has been sighted on several occasions and is also included in FinBook. Moon is thought to be a female and, if so, would be near or at the age where she would have her first calf.

Other known females in FinBook include **Highnitch, Tupac** and **Tworakes**. These three were often sighted together from 2001 to 2003 and all had calves for part or all of that time. A calf of Highnitch was one of the three dolphins that died in June 2009.

From 2001 to 2003, **Blackwall, Hii** and **Kwillena** were frequently sighted with each other (along with three other dolphins). These three may often also be observed together today. They are likely to be males, based on their behaviour.

DOLPHIN WATCH

Notes on individual dolphins

The suspected male **Real Notch** was almost always seen with another male called Middy. Middy died in 2006. Real Notch has survived and appears to have established associations with some of the other Swan River dolphins.

Unk 40 (a newly-identified dolphin) was observed with shark attack wounds in April 2009. Many of the Swan River dolphins have old 'shark scars'. Blackwall, for example, has a hunk missing out of his peduncle that was most likely caused by a shark.

Kwillena has a large white spot on its dorsal (back) surface in front of the dorsal fin. This marking was not present from 2001 to 2003. The scar likely relates to a sunburn or some other kind of injury.

Dolphins listed in FinBook also range in areas outside the estuary and Fremantle Port. Some Swan River dolphins will travel as far south as the northern end of Cockburn Sound when they are outside the estuary.

It is also not uncommon to see dolphins considered Cockburn Sound residents ranging within the Port. These are often males, of which **Backpack** and **Fingers** are examples. These two dolphins were actually first sighted in the early 1990s during a study in Cockburn Sound from 1993 to 1997. As they were considered adults in that study, they are now likely to be more than 30 years old, which is old for a male bottlenose dolphin.

DOLPHIN WATCH

FinBook 2011

Glossary

Calf – a dolphin still dependent on its mother, usually less than 5 years old

Dorsal fin – the fin on a dolphin's back (its 'dorsal' surface)

Juvenile – a young dolphin, usually between about four and 10 years old

Leading edge (of dorsal fin) – the front edge of the fin (vs 'trailing edge')

Peduncle – an anatomical term for the tail stock of a dolphin

Sub-adult – a dolphin that is not quite adult-size but larger than a juvenile

DOLPHIN WATCH