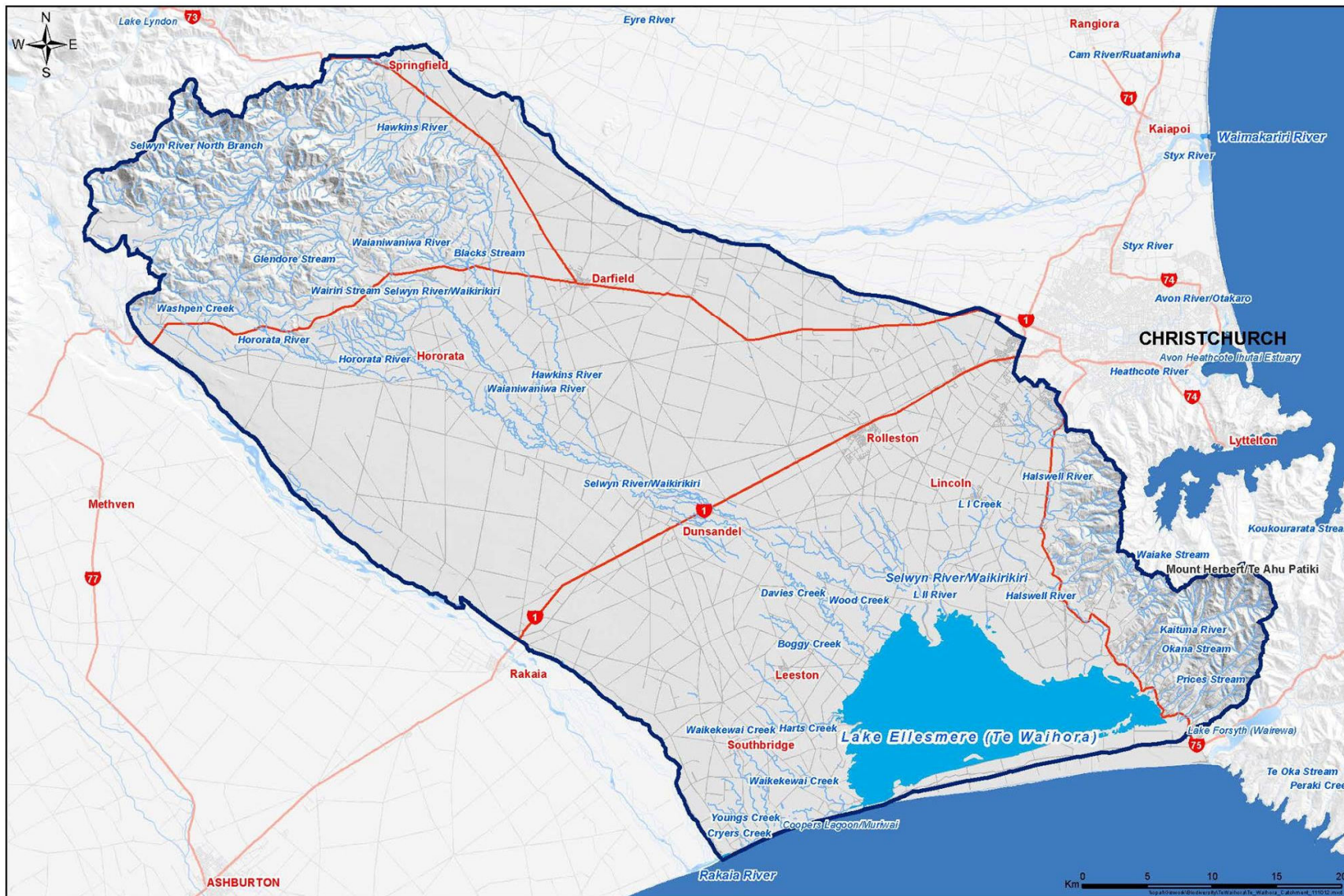


Wetland birds of Te Waihora / Lake Ellesmere



Denise Ford - Waihora Ellesmere Trust
National Wetland Restoration Symposium 2018





Te Waihora/Lake Ellesmere Catchment

Te Waihora / Lake Ellesmere

- Protected by a National Water Conservation Order since 1990, updated in 2011. Recognises the Lake as:
 - habitat for wildlife, indigenous wetland vegetation and fish; and
 - significance in accordance with tikanga Māori in respect of Ngāi Tahu history, mahinga kai and customary fisheries.
- Internationally recognized for its abundance and diversity of wetland birds



Nesting spoonbills – photo Steve Attwood

Lake Levels

- Historically lake levels were much higher – approx. 4 m (315 km²)
- Maori did manage lake levels - approx 2.7m (290 km²)
- Since the late 19th century it has been opened by Europeans
- Current area of 189 km², average depth of 1.4 m



Photo – Environment Canterbury



A community organisation dedicated to the improvement of the health and biodiversity of Te Waihora / Lake Ellesmere and its catchment

Educate – enhance understanding and awareness of the Lake

Facilitate – promote better management practices

Activate – provide opportunities and encourage people to get actively involved

Annual Bird Count

- An annual census of wetland birds has been held since 2013
- Volunteers along with key agencies survey the lake and record bird numbers
 - Birds New Zealand
 - Department of Conservation
 - Christchurch City Council
 - With support from Selwyn District Council, Environment Canterbury and Keystone Ecology
- Volunteers consist of interested members of the public and university students all with varying abilities in bird identification



Background

Biannual trend counts of waterfowl by Fish and Game

National Wader counts by Ornithology Society (Twice yearly)

Bittern monitoring by Environment Canterbury

Biannual trend counts by Christchurch City Council

Over the period 1990-2012 only three full wetland bird counts were undertaken

- 2006
- 2007
- 2008



Great Egret – Photo Grahame Bell

Aim

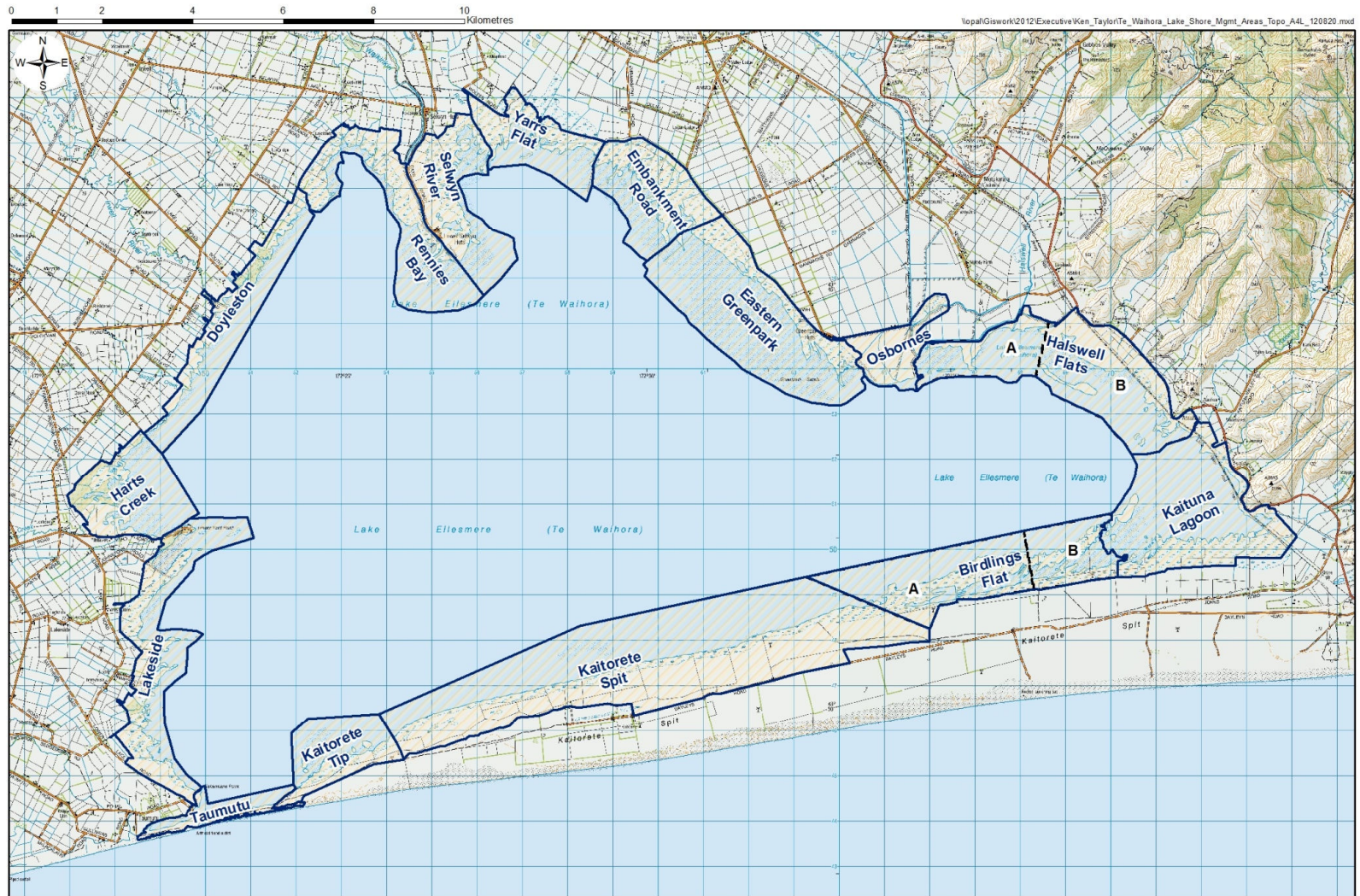
Develop and implement an integrated monitoring programme for the diverse range of birdlife and associated values of Te Waihora/Lake Ellesmere that provides timely, cost effective and relevant information for lake and birdlife managers, and other stakeholders.



Royal Spoonbills – photo Steve Attwood

Objectives

- identifies spatial variation by guild, and where necessary within-guild (e.g., for black swan and Canada geese);
- uses geographically consistent spatial boundaries;
- incorporates standard recording practice, i.e., a standard data sheet;
- undertaken at least annually for comparative purposes;
- provides data that can be readily compared to the 1980s baseline bird abundance data;
- incorporates the least possible resource and skill requirements;
- management relevant;
- has results which can be readily and speedily distributed to interested parties; and links to state of the lake reporting.

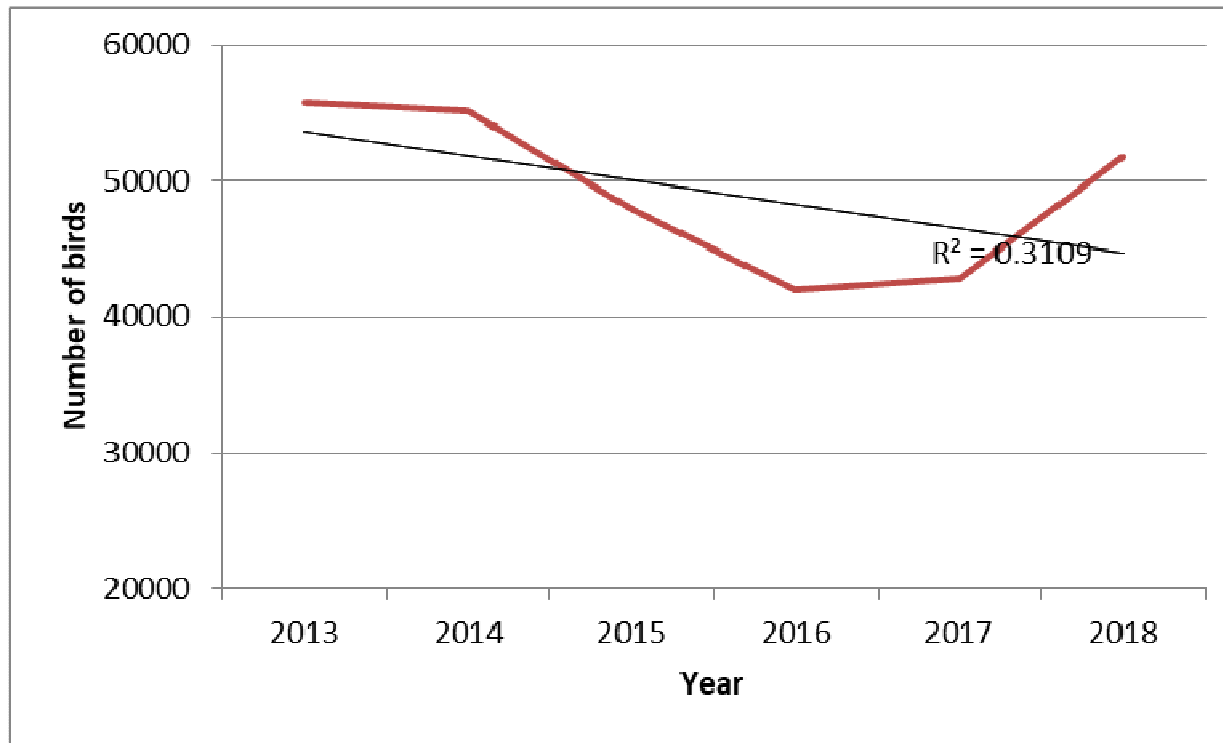


What is surveyed and when

- What - All wetland birds representing:
 - Shags
 - Herons
 - Waterfowl
 - NZ Waders
 - Artic Waders
 - Gulls and Terns
 - Others birds counted – Pukeko, Australasian Harrier and the New Zealand Kingfisher
- When – February



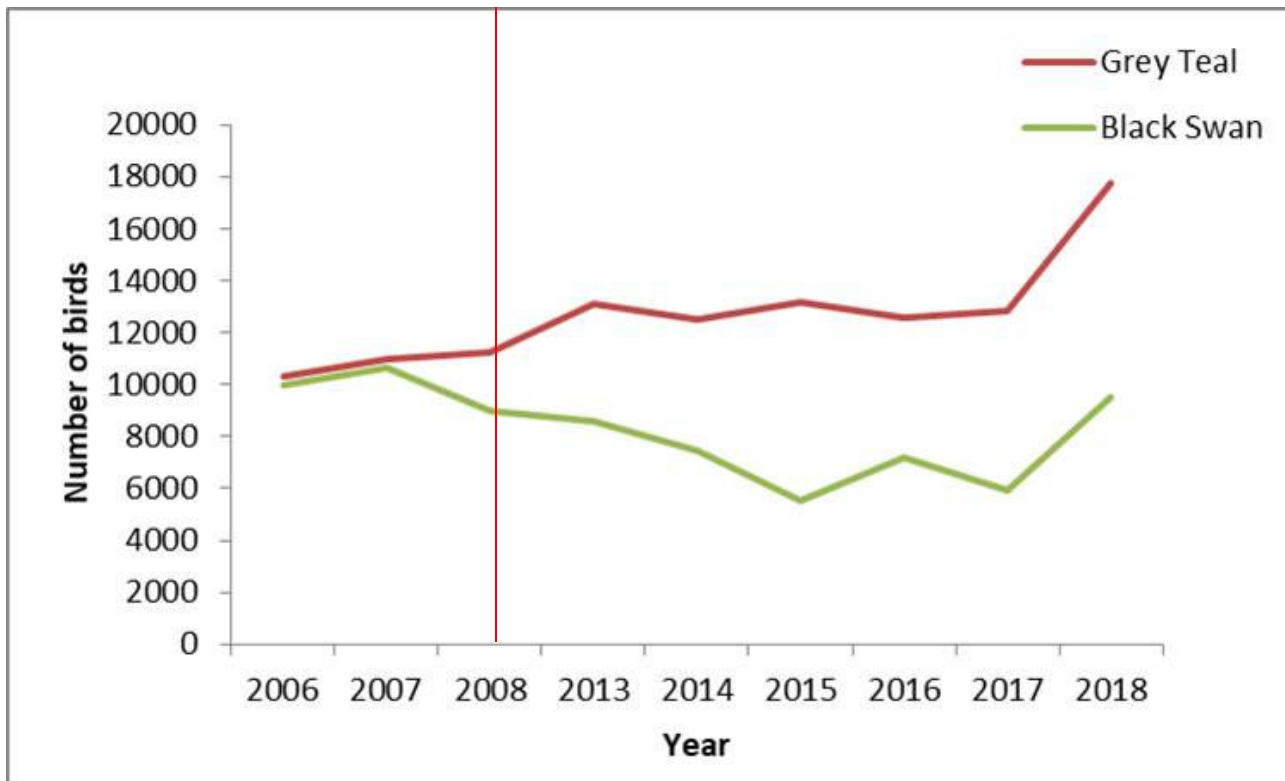
Birds Numbers over six years



Year	Count
2013	56755
2014	55164
2015	47858
2016	41590
2017	42852
2018	51807

Average of 45 species recorded

Waterfowl



Most numerous group :

Waterfowl made up 77% of all birds (2013-2018)

Most abundant bird:

Grey teal in 2018 17,773 birds counted

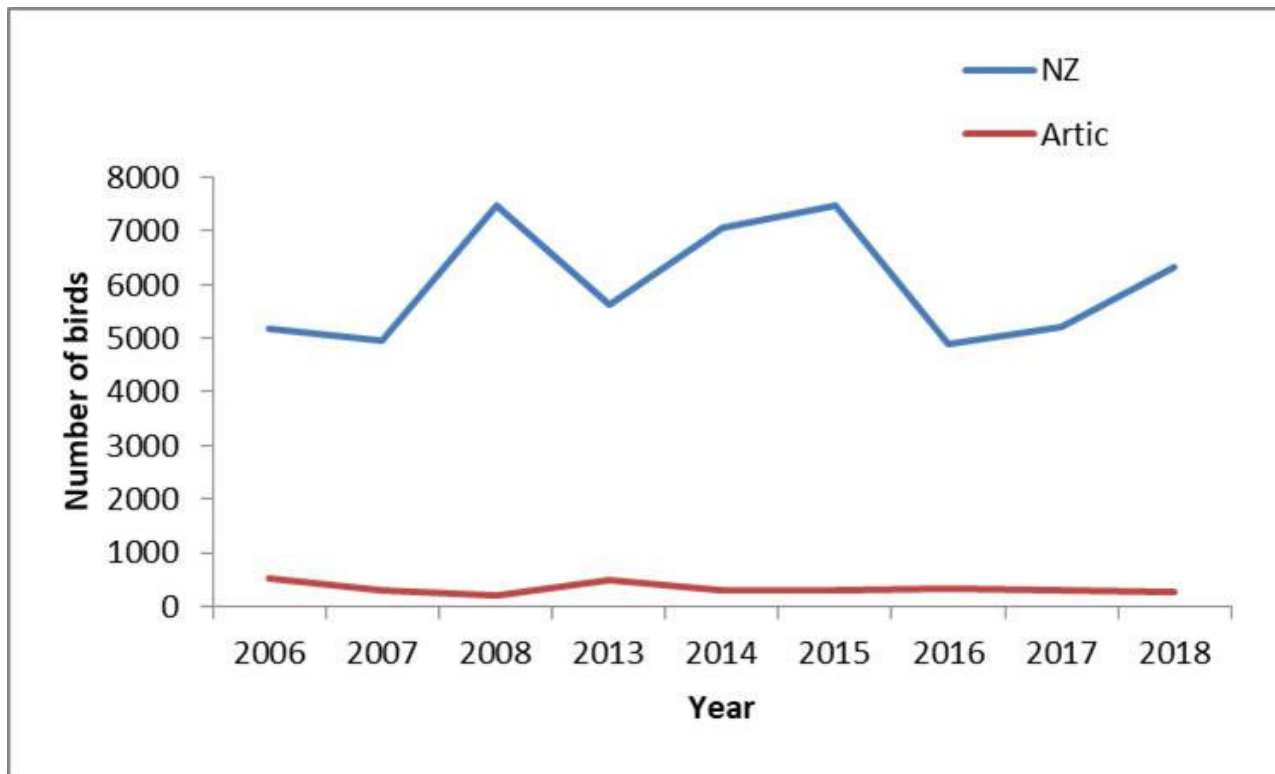
Second most abundant bird:

Black Swan in 2018 birds counted 9,531



Black Swan family – Photo Steve Attwood

Waders

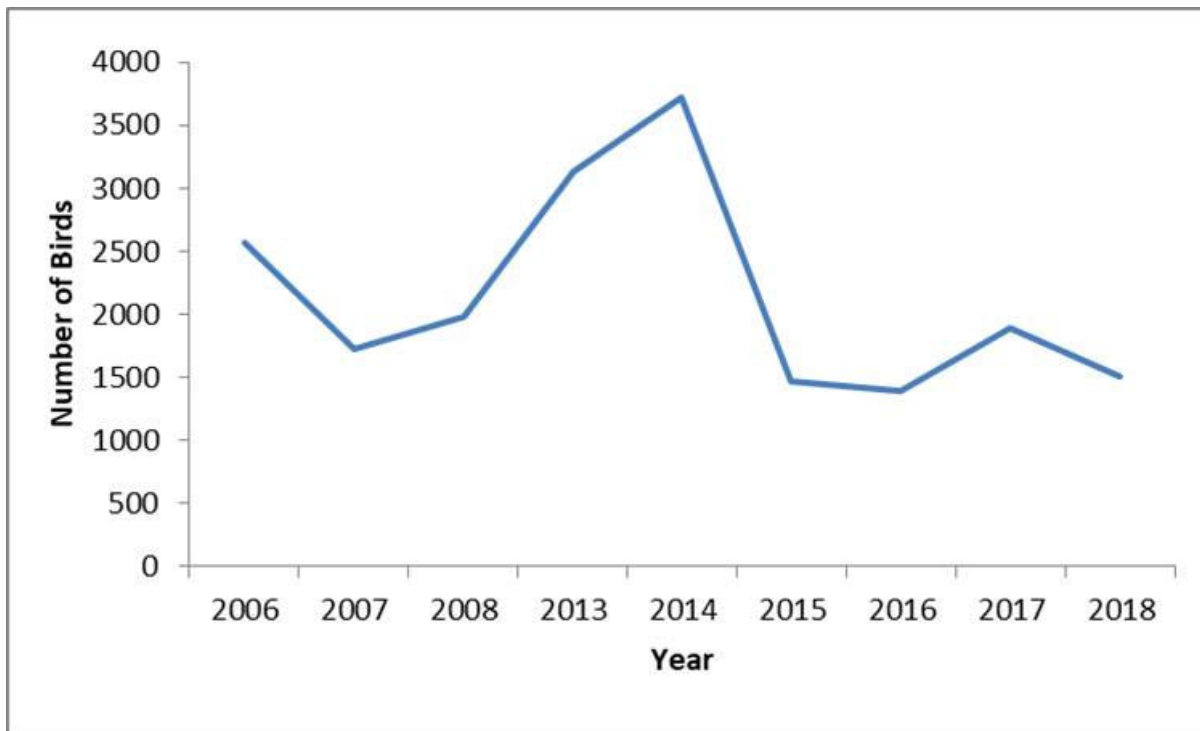


- Pied Stilt, Banded Dotterel and Wrybill key NZ waders
- Bar-tailed Godwit, Red Knot key arctic waders



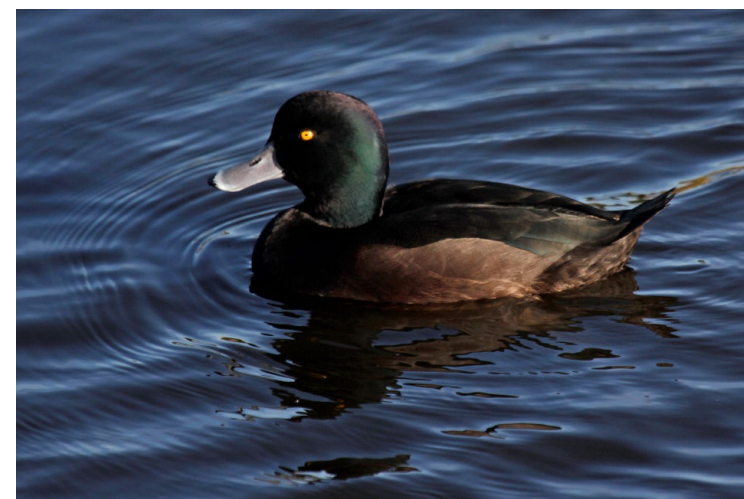
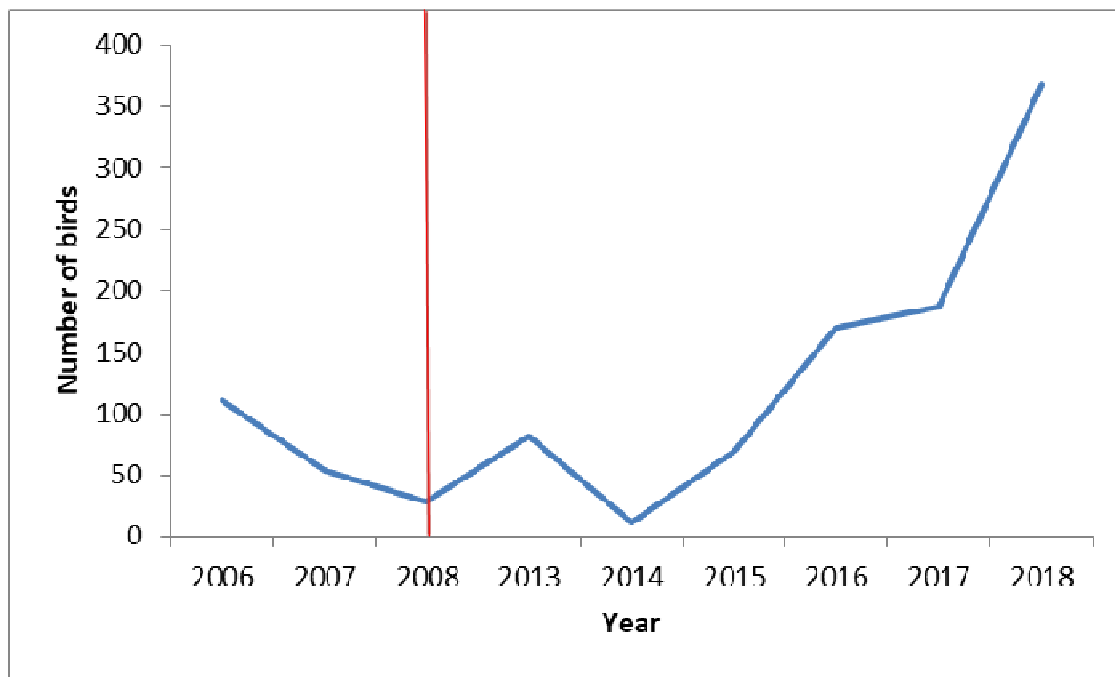
Wrybill – Photo Grahame Bell

Gulls and Terns



- Main species of gull is the black backed
- Four species of tern in 2018 including one Common Tern

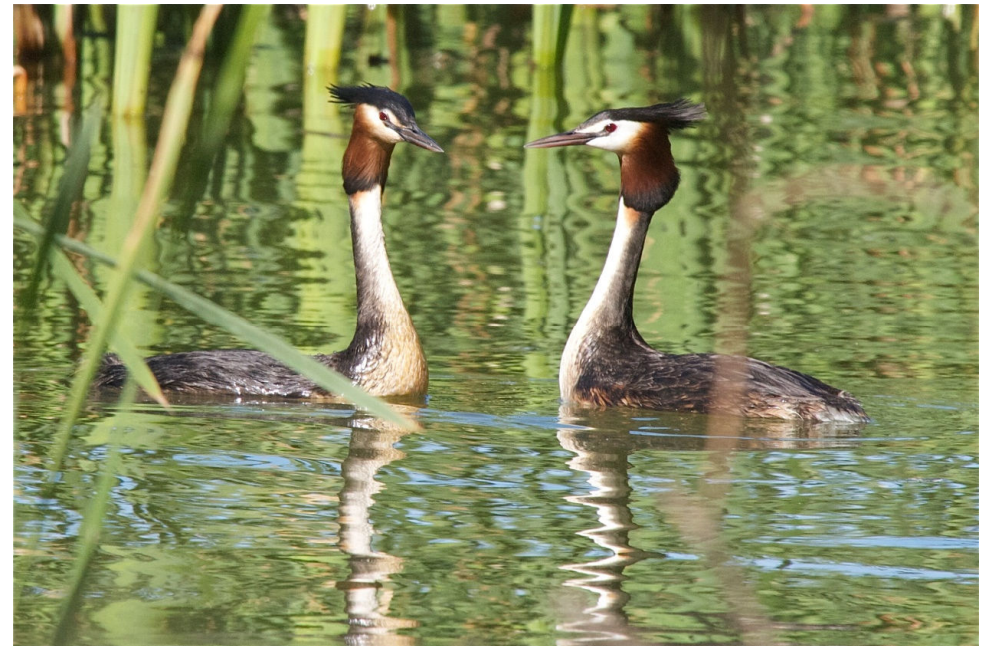




New Zealand Scaup – Photo Steve Attwood

Pressures on birdlife

- Predation (introduced mammals, and some native birds for example harrier hawks and black-backed gull)
- Habitat loss via – land use intensification, invasion of exotic species for example willow
- Lake opening regime
- Physical disturbance by human activities



Crested Grebe pair – photo Steve Attwood

A wetland of regional and international significance

Te Waihora / Lake Ellesmere has international significance as a habitat for wetland / coastal birds

- average census of 49,000 birds over the six years

Habitat for many nationally vulnerable, critical and nationally endangered species – at least 14 species including:

- Australasian Bittern
- Black Billed Gull
- Banded Dotterel
- Wrybill



Banded Dotterel – Photo Steve Attwood

Thank you



References

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