Birds in horticulture and the National bird pest survey

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Introduction

- National bird pest survey
- Previous research
  - vineyards of the Orange region
- Future research options

Natural Heritage Trust
Helping Communities Helping Australia
An Australian Government Initiative

Australian Government
Bureau of Rural Sciences

NSW Agriculture

National Bird Pest Survey

Important for:

- prioritising research and control effort
- direct future funding
- survey form

Previous study: Estimating Damage

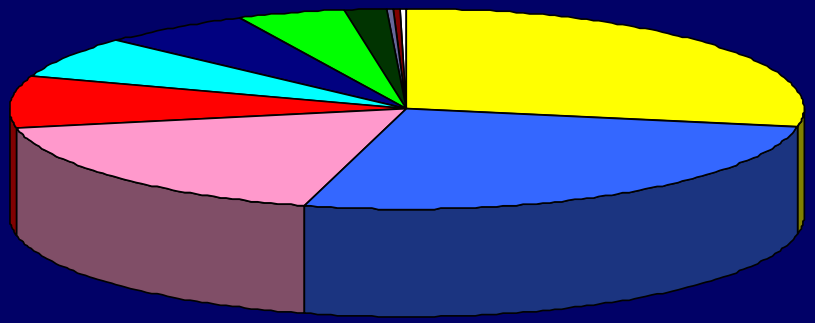
- Sampling technique
- 146 blocks

  13 varieties

  3 seasons
- 15% damage - $26,000

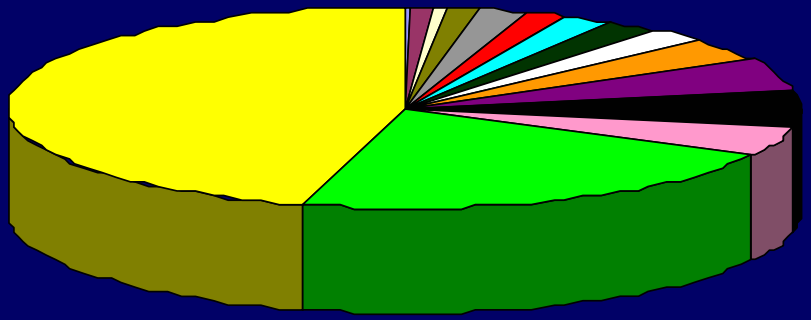
Bird species

2000



- Starlings
- Silvereyes
- Yellow-faced Honeyeaters
- Pied Currawongs
- Eastern Rosellas

2001

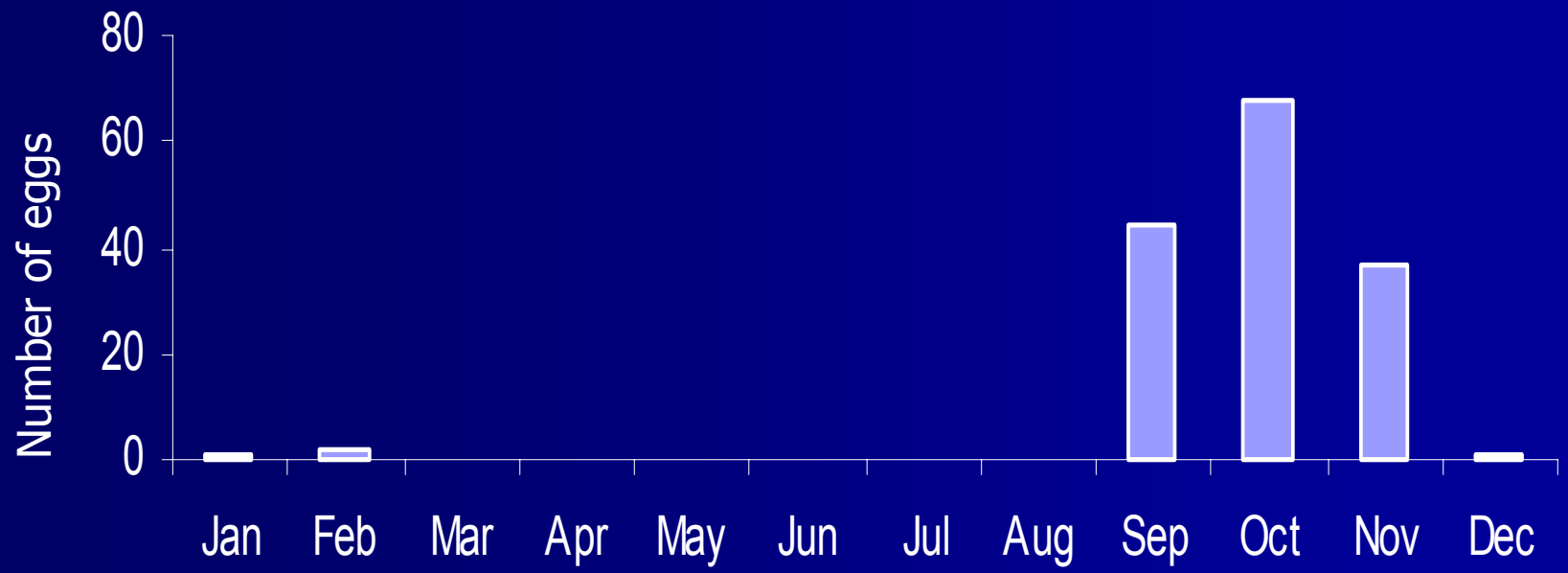


- Noisy Friarbirds
- Red wattlebirds
- Crimson Rosellas
- Black-faced cuckoo shrikes
- Corvids

Starlings

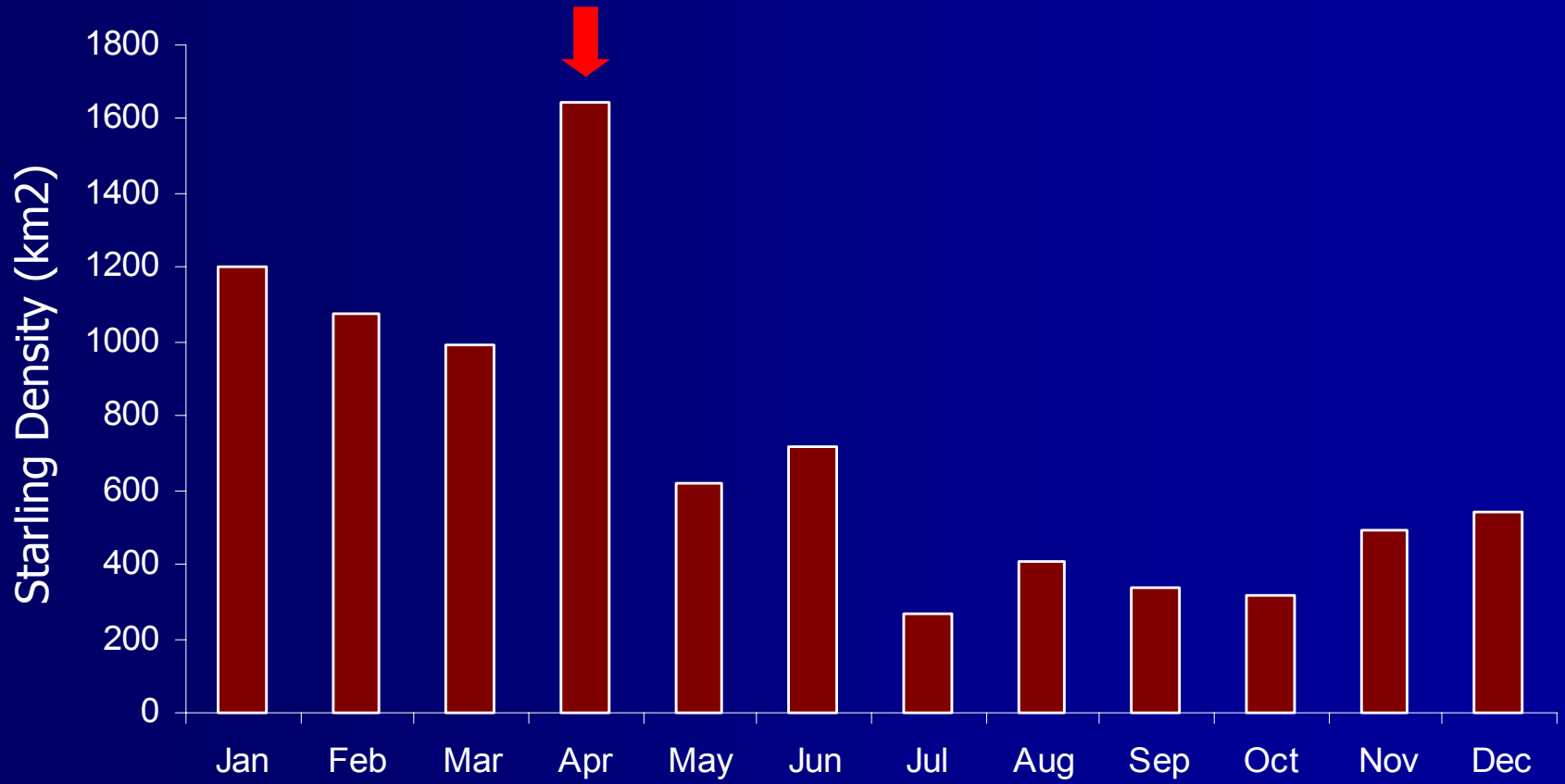
- Movements
  - radio tracking
  - observations
  - < 3 km
- Breeding
  - timing
  - nest sites (competition)
  - breeding potential (x4)
  - ~2 broods, 4 per clutch

Pulse Breeding



Density over time

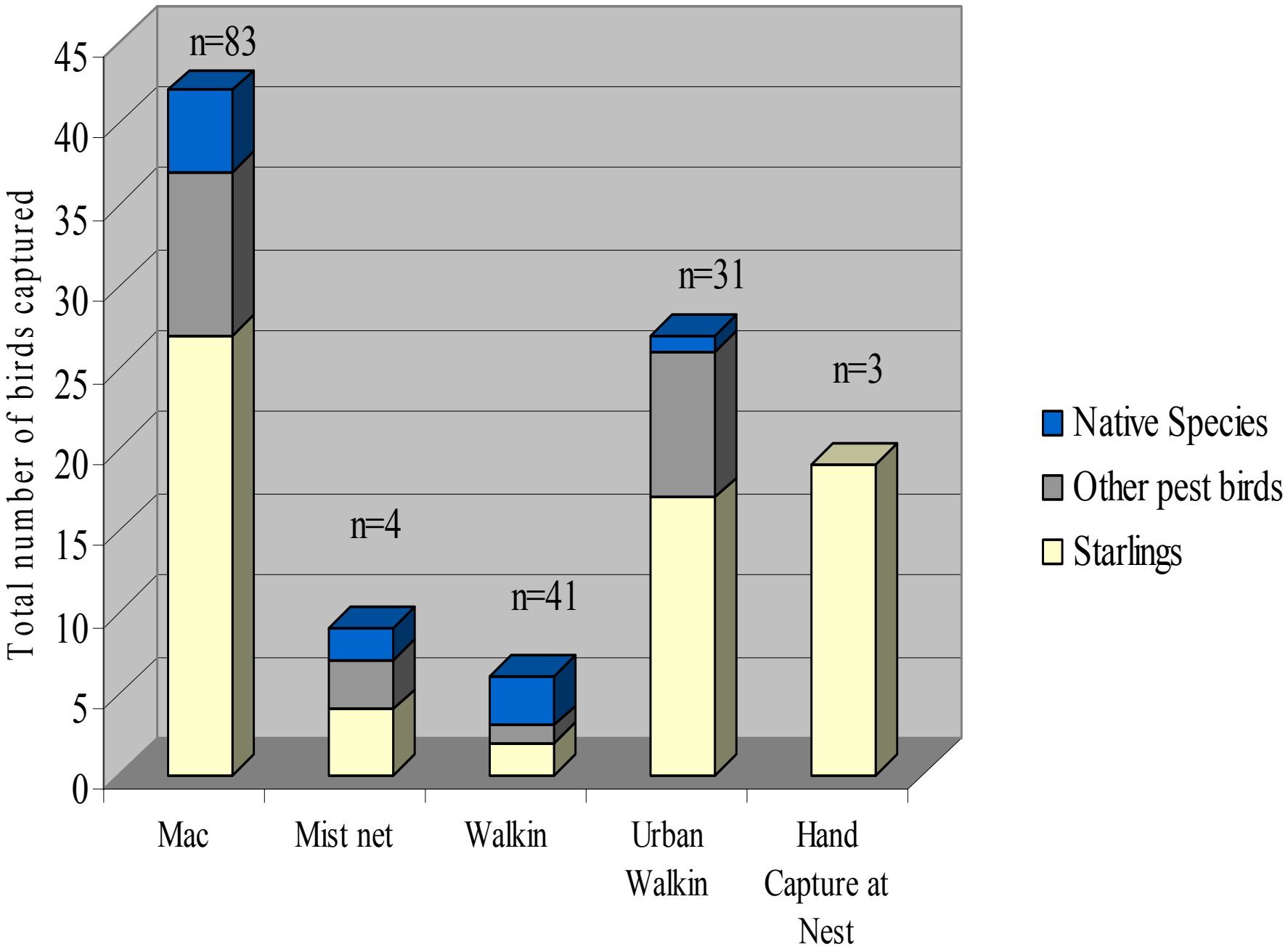
- Temporary immigration

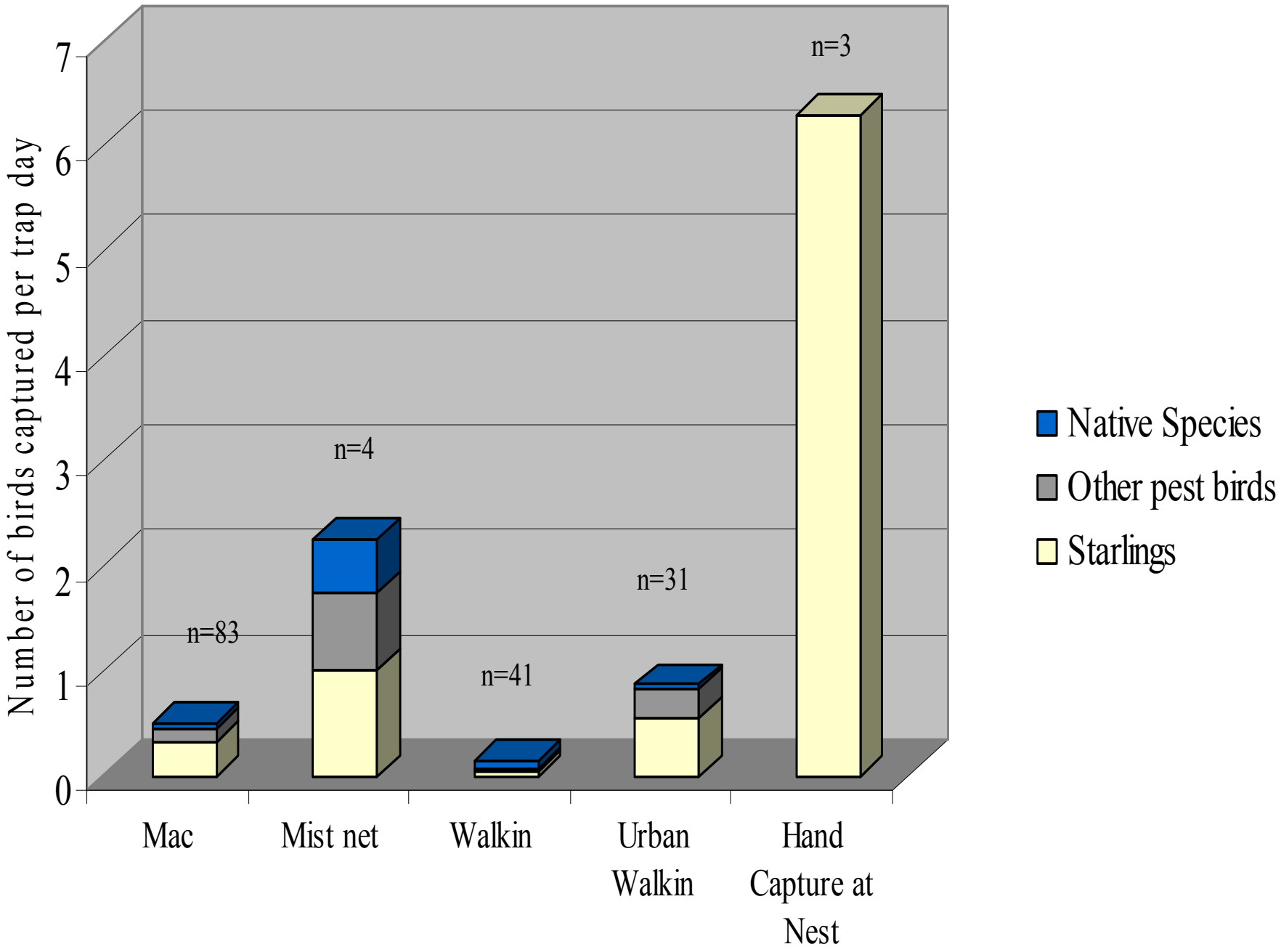


Other species

- Native species
- Honeyeaters
  - Explaining variability
  - Eucalypt flowering, drought, rainfall, alternative food


Trapping


Total number of birds captured
0
5
10
15
20
25
30
35
40
45
n=83
n=4
n=41
n=31
n=3
Mac
Mist net
Walkin
Urban Walkin
Hand Capture at Nest
Native Species
Other pest birds
Starlings


Number of birds captured per trap day
0
1
2
3
4
5
6
7
n=83
n=4
n=41
n=31
n=3
Mac
Mist net
Walkin
Urban Walkin
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Other techniques

- Netting economics
  - Cost effective @ 10% bird damage for viticulture
- Orange vignerons
  - Netting
  - Gas guns
  - Shooting
  - Other scare devices

Current project

- National approach to birds in horticulture
  - Broaden to other industries and regions
  - Meeting the needs of horticulturalists
  - Network of experts working on bird pests
  - Not duplicating research
  - Where should we be investing time and resources?

Future options

- Australasian Invasive Animal CRC
- Damage assessment techniques
  - other industries and regions
- Nest removal
- Trapping
  - timing, trap type, bait types
- Lethal poisons
  - Introduced species
- Netting
- Habitat preferences/ modification
  - honeyeater movements