

Hooded parrot



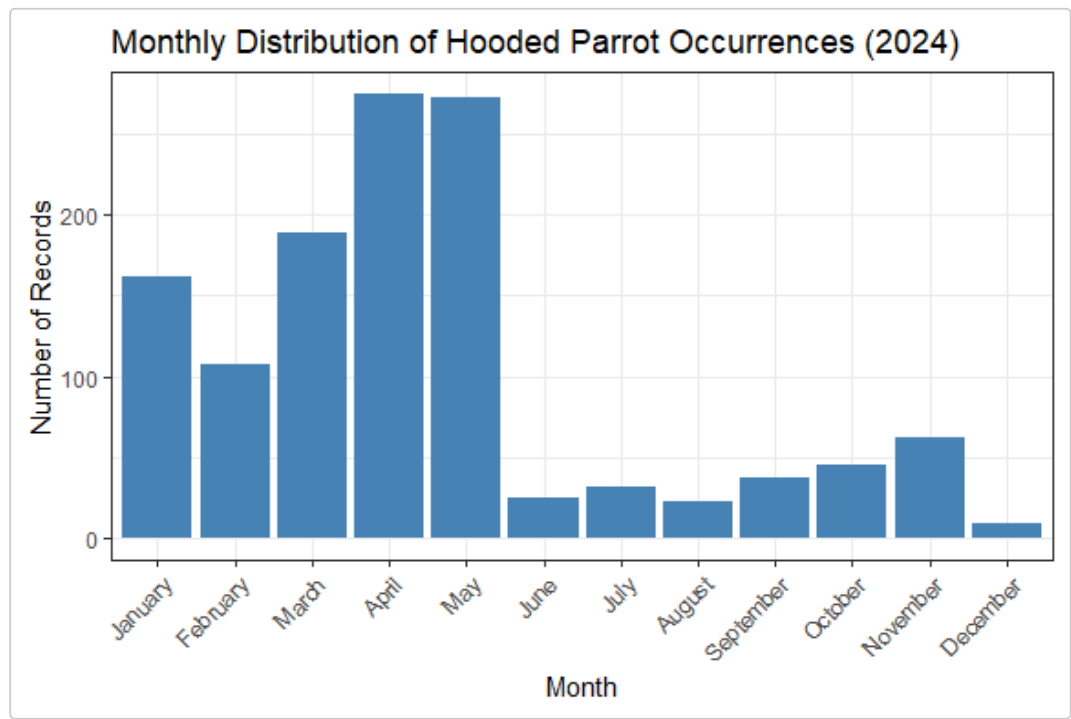
Hooded Parrot

We are investigating occurrence data of [Hooded parrot](#) in Australia from the **Atlas of Living Australia**, and make a map showing the spatial locations of sightings for 2024.

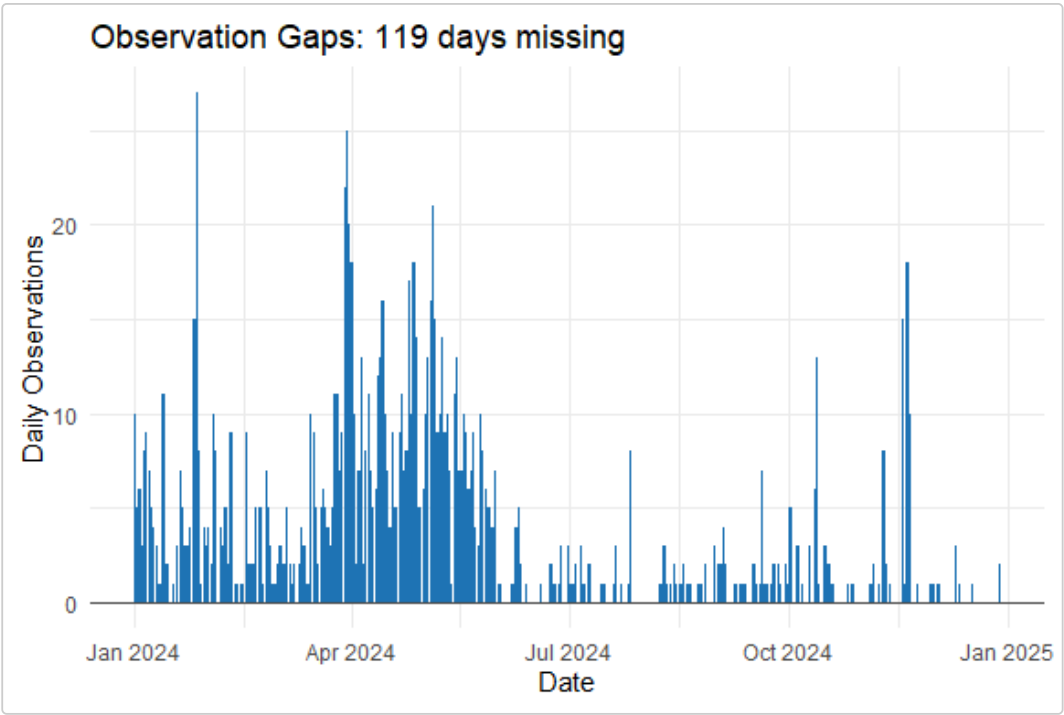
```
#> # A tibble: 6 × 5
#>   lat lon year eventDate      scientificName
#>   <dbl> <dbl> <dbl> <dtm>      <chr>
#> 1 -36.5  142.  2024 2024-03-16 12:31:00 Psephotellus varius
#> 2 -36.1  142.  2024 2024-05-25 15:46:00 Psephotellus varius
#> 3 -35.8  142.  2024 2024-05-16 10:49:00 Psephotellus varius
#> 4 -35.6  142.  2024 2024-01-26 16:15:00 Psephotellus varius
#> 5 -35.6  141.  2024 2024-03-16 11:43:00 Psephotellus varius
#> 6 -35.6  141.  2024 2024-03-16 11:43:00 Psephotellus varius
```

the length of the records is 1236

Monthly Distribution of organism (2024)



Data Regularity & Temporal Gaps



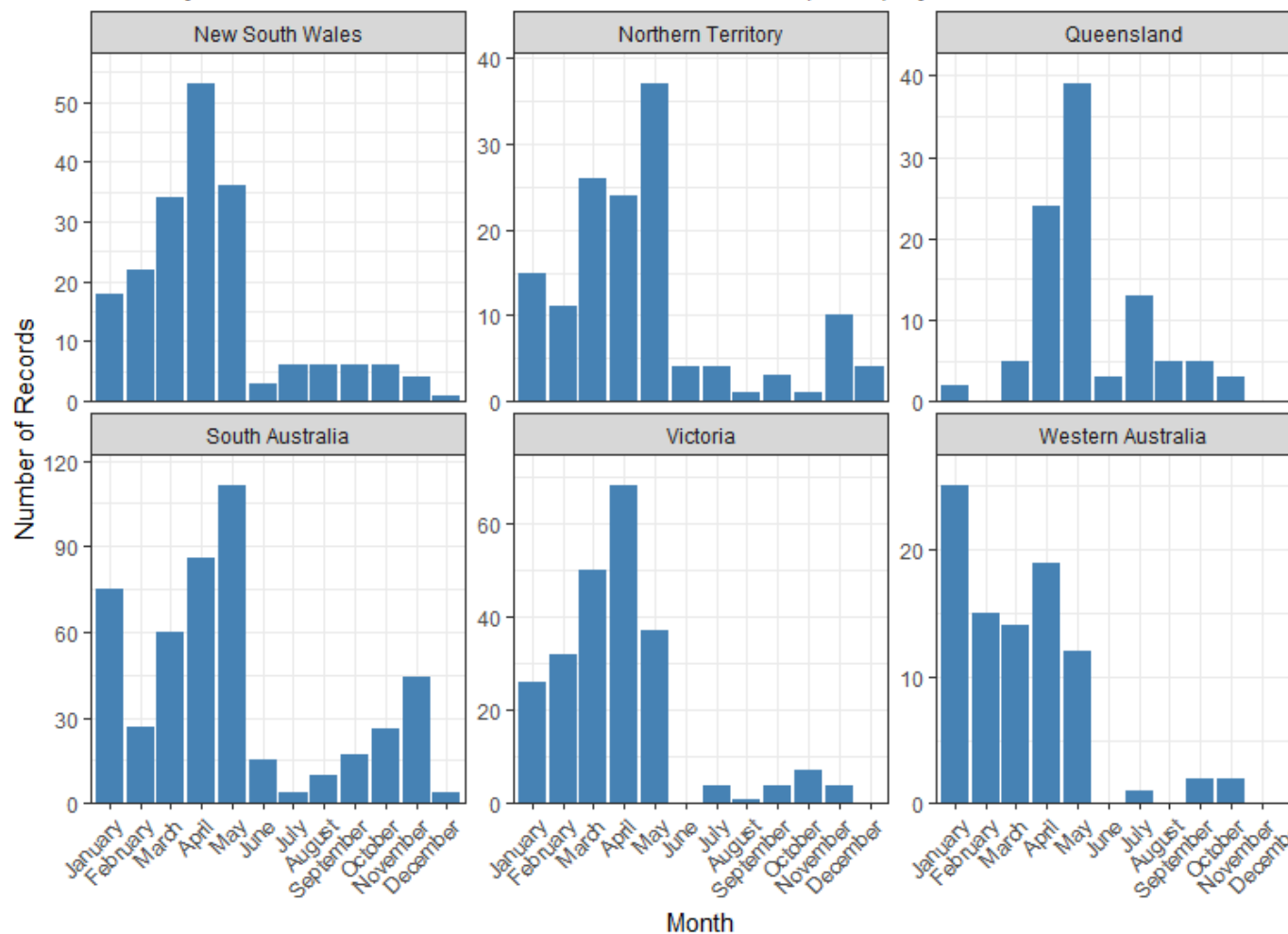
Nearest Weather Station Mapping

```
#> # A tibble: 3 × 12
#>   lat.x lon.x year eventDate      scientificName weather_station_id stname
#>   <dbl> <dbl> <dbl> <dtm>      <chr>          <chr>          <chr>
#> 1 -36.5  142.  2024 2024-03-16 12:31:00 Psephotellus ... 948270-99999 NHILL...
#> 2 -36.1  142.  2024 2024-05-25 15:46:00 Psephotellus ... 948270-99999 NHILL...
#> 3 -35.8  142.  2024 2024-05-16 10:49:00 Psephotellus ... 948380-99999 HOPET...
#> # i 5 more variables: lat.y <dbl>, lon.y <dbl>, address <chr>, city <chr>,
#> #   state <chr>
```

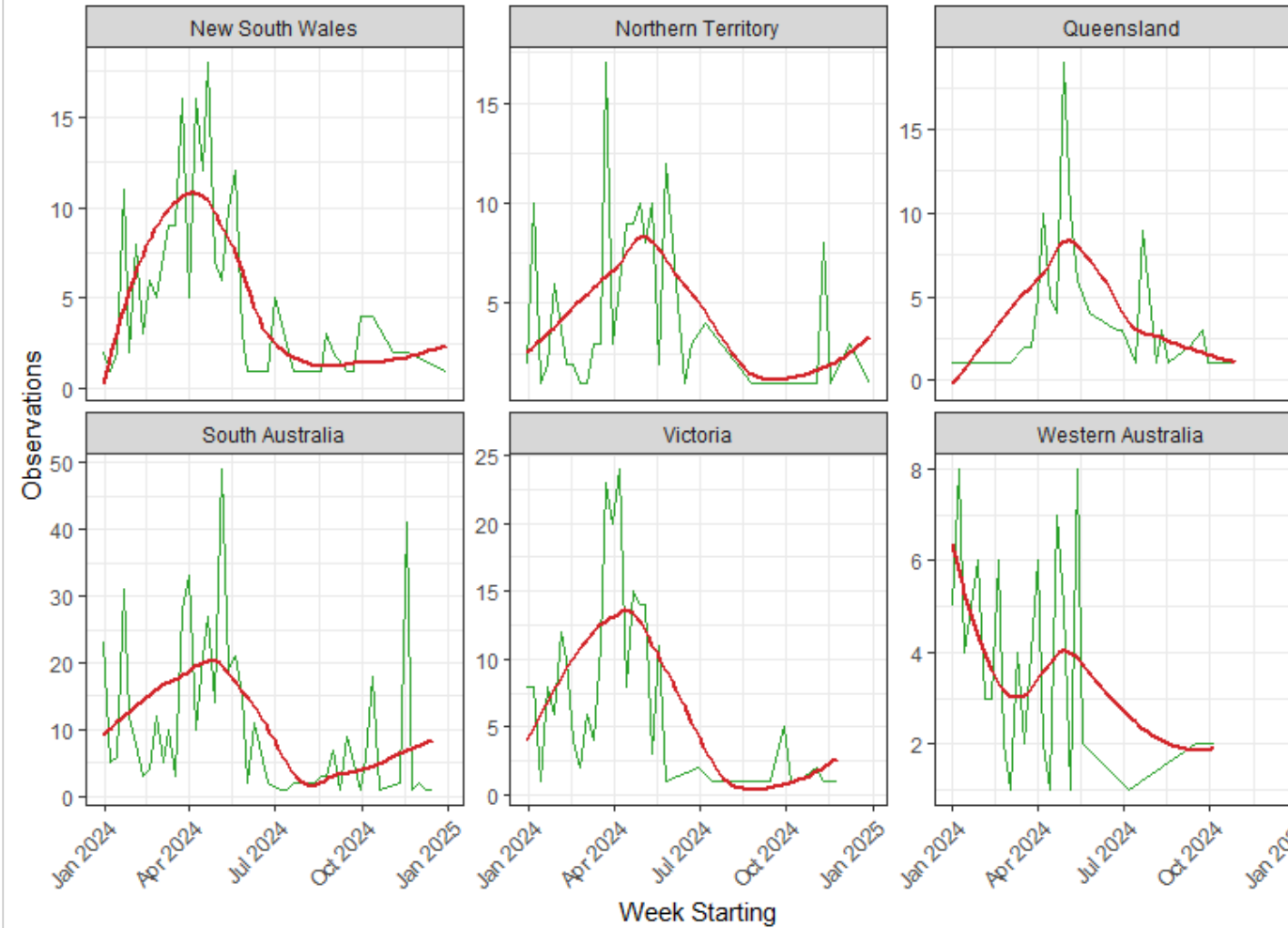
```
#>           State Frequency
#> 1   South Australia    479
#> 2      Victoria      233
#> 3 New South Wales     195
#> 4 Northern Territory   140
#> 5      Queensland      99
#> 6 Western Australia    90
```

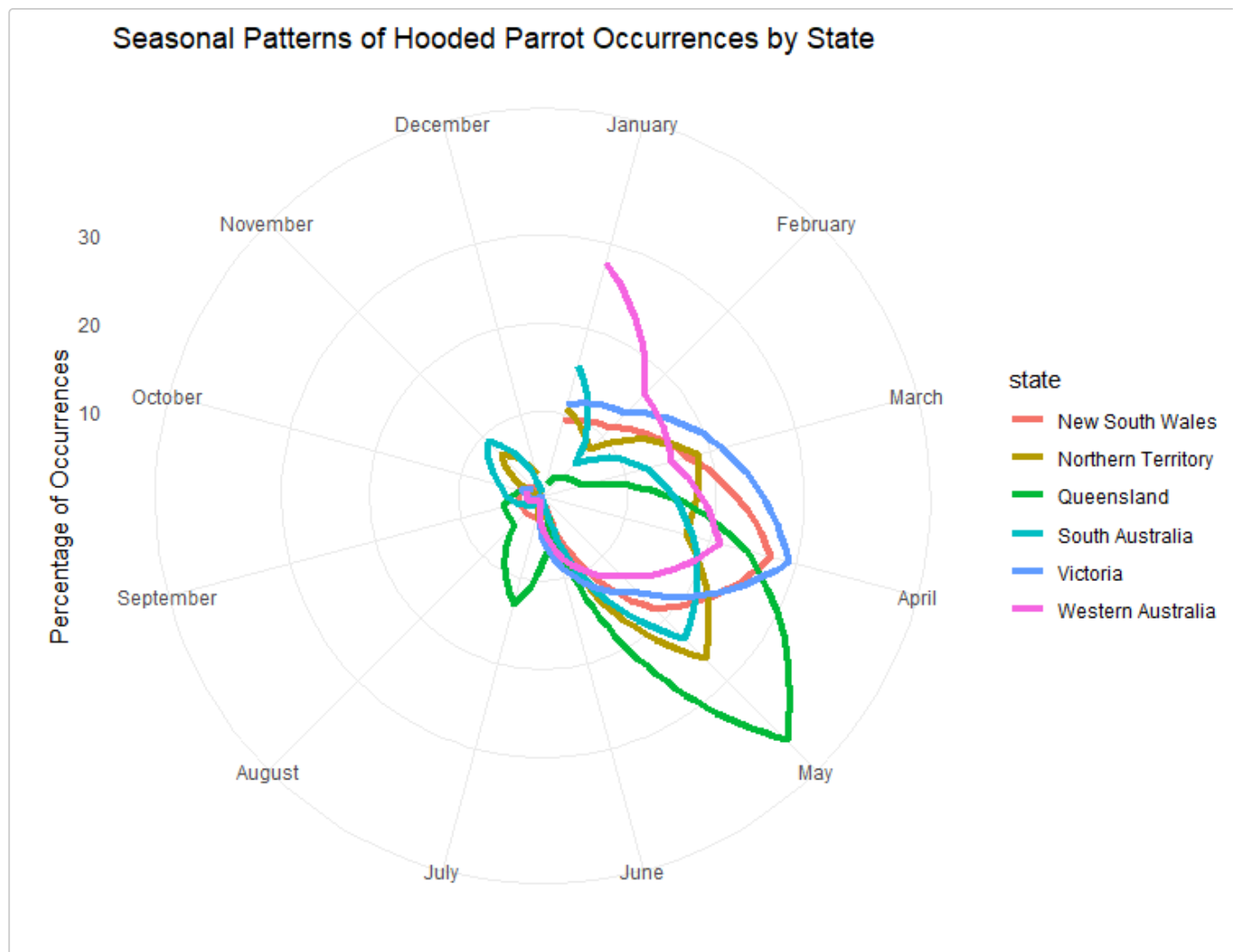
Pattern Analysis

Monthly Distribution of Hooded Parrot Occurrences (2024) by State



Weekly Occurrence Patterns of Hooded Parrot (2024) with Trend Lines





Datasets Overview

We have organized the Hooded parrot occurrence and weather station data into the following structured datasets, stored in the `data/` directory:

- `hooded_parrot_2024.rda`
Contains Hooded parrot occurrence records across all states in Australia.
- `hooded_parrot_2024_ws.rda`
An enhanced version of the occurrence data, merged with the nearest weather station information, including:

```
--Station ID (weather_station_id)
--Station name (sname)
--Geographic details (lat.y, lon.y, address, city, state)
```
- `hooded_parrot_top_weather.rda`
Focuses on weather data from the top 3 most frequently recorded stations associated with Hooded parrot occurrences.
- `weather_stations.rda`
A standalone dataset of all unique weather stations in Australia, providing reference metadata for cross-referencing.