



HRMWS distribution in S.A.

Brad Mackintosh
Health Protection Programs



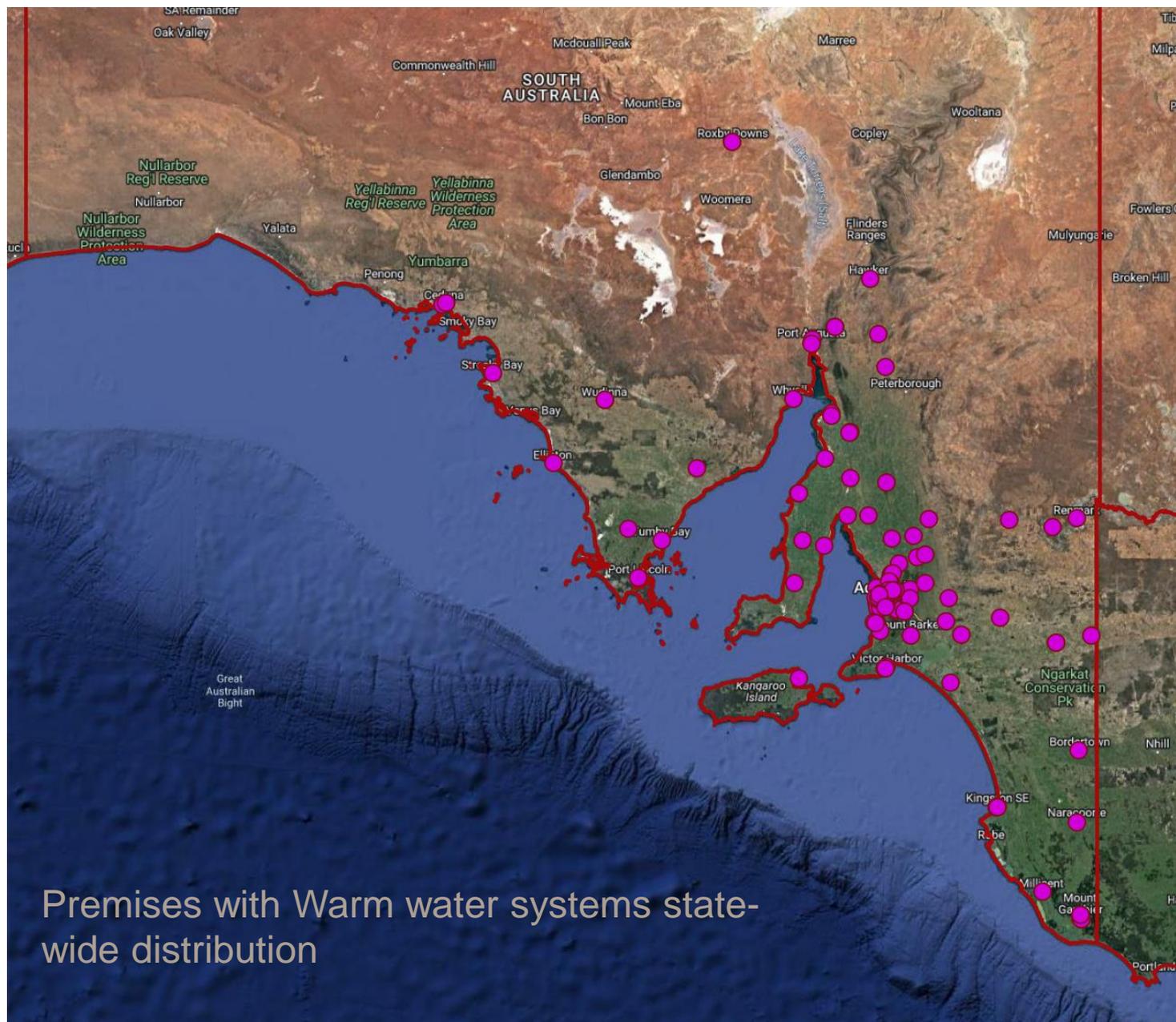
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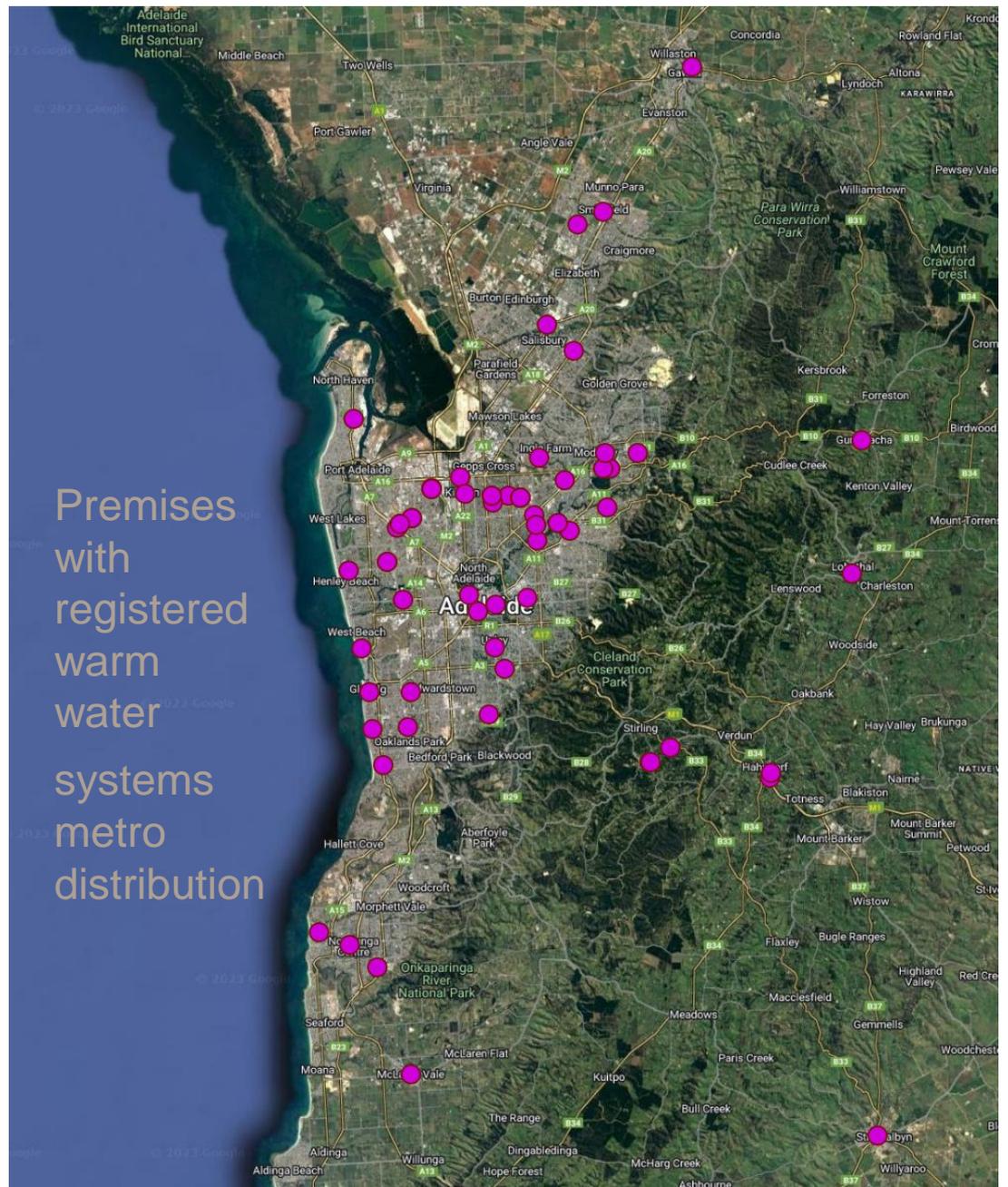
Registered Systems in SA

System location	Metro	Regional and unincorporated	Total
Cooling Water Systems	759	287	1046
Warm Water Systems	70	179	249
Total	829	466	1295

Numbers are approximate: Data from submitted Annual EH Reports (2021/22 FY) and SA HEALTH 2021 HRMWS GIS Register.

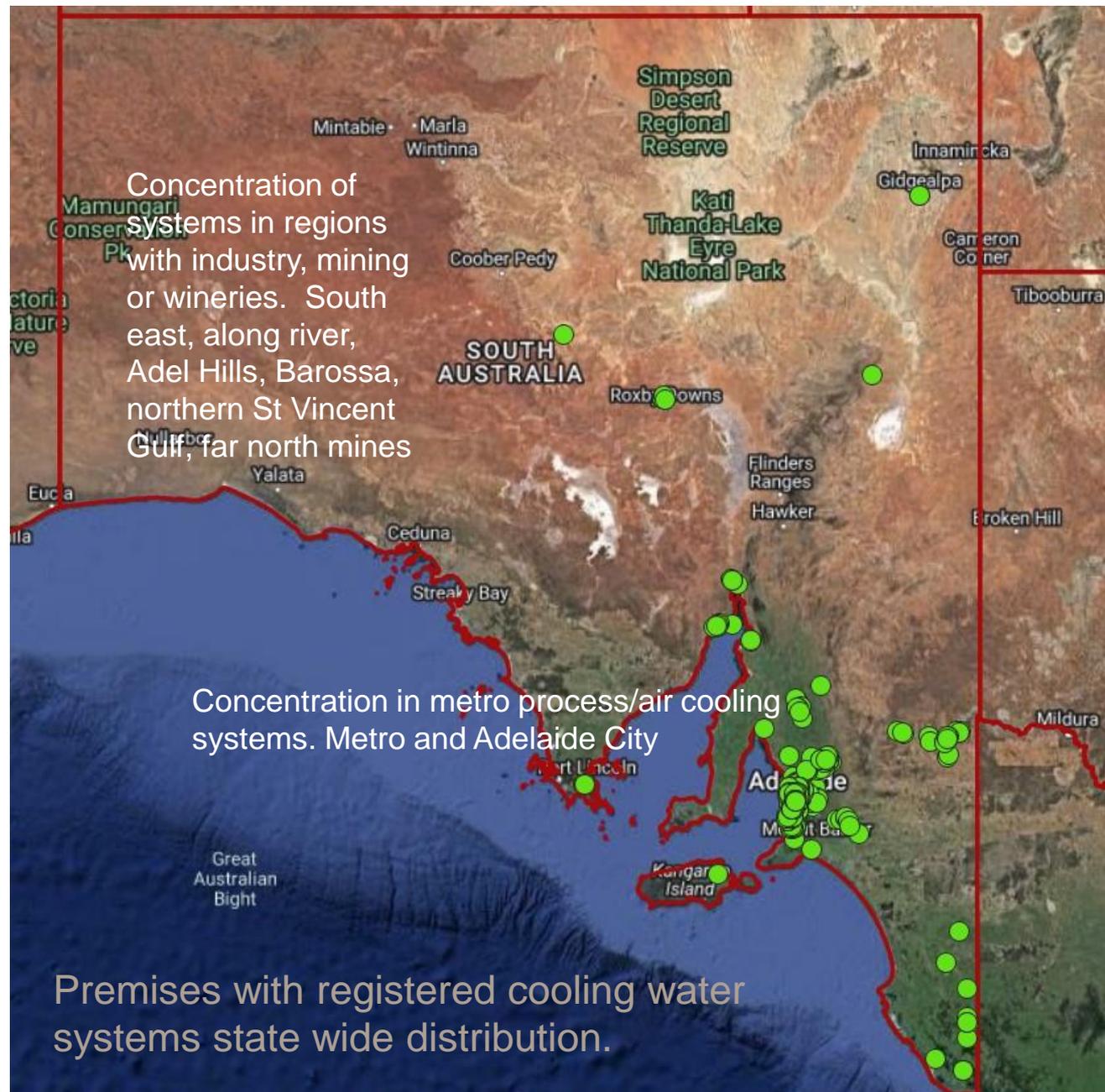


Premises with Warm Water Systems

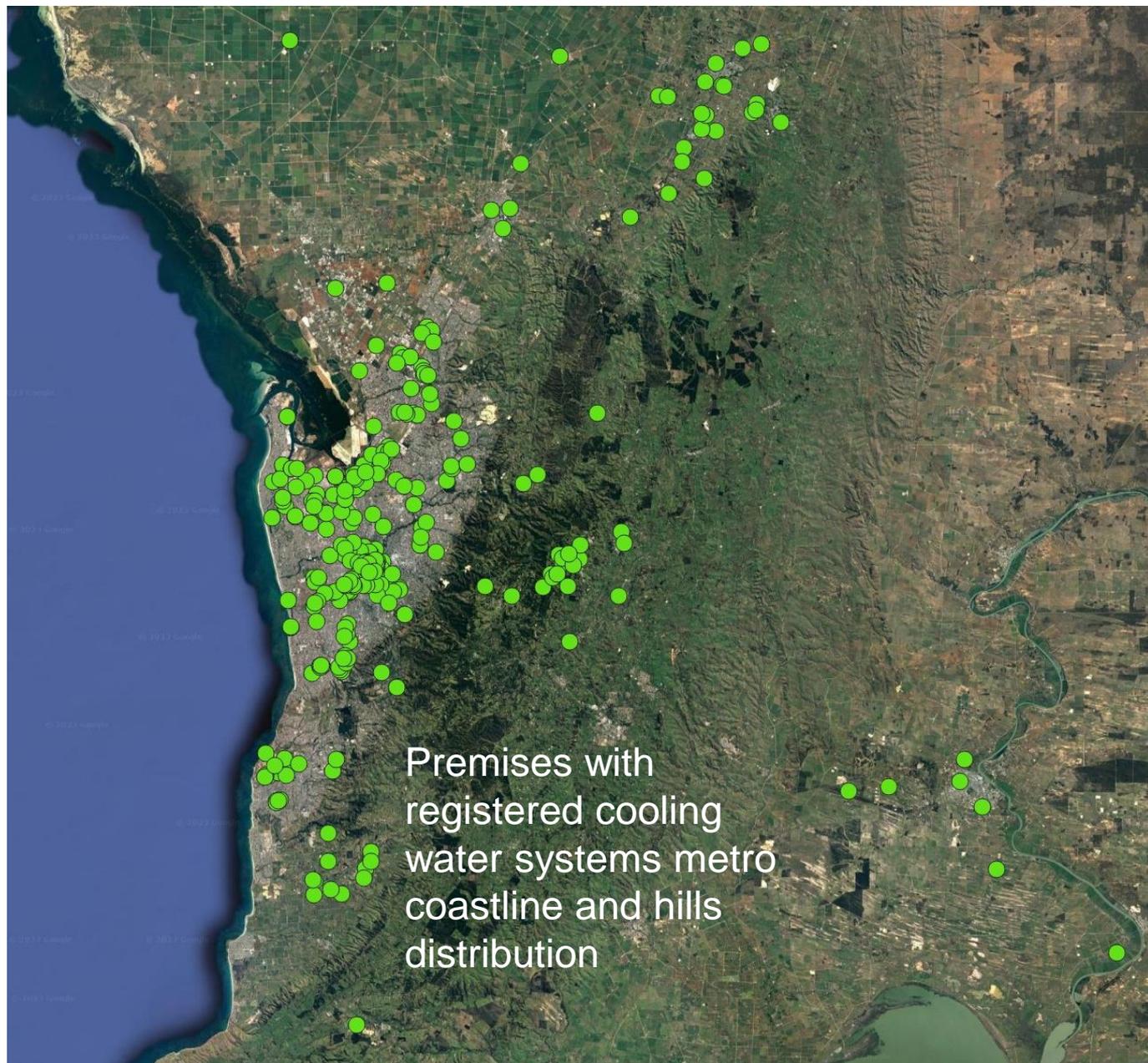


Premises with registered warm water systems metro distribution

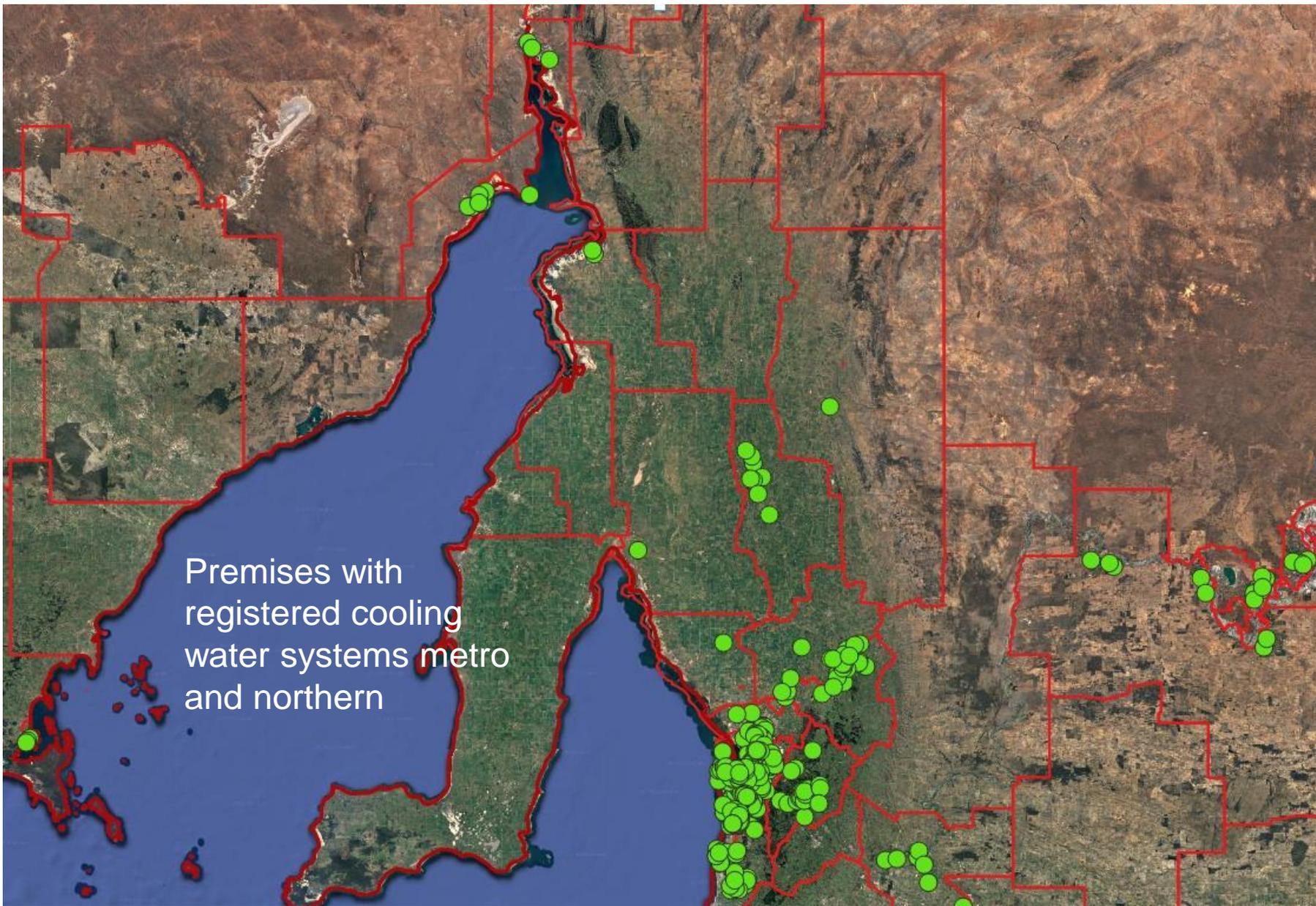
Premises with Warm Water Systems



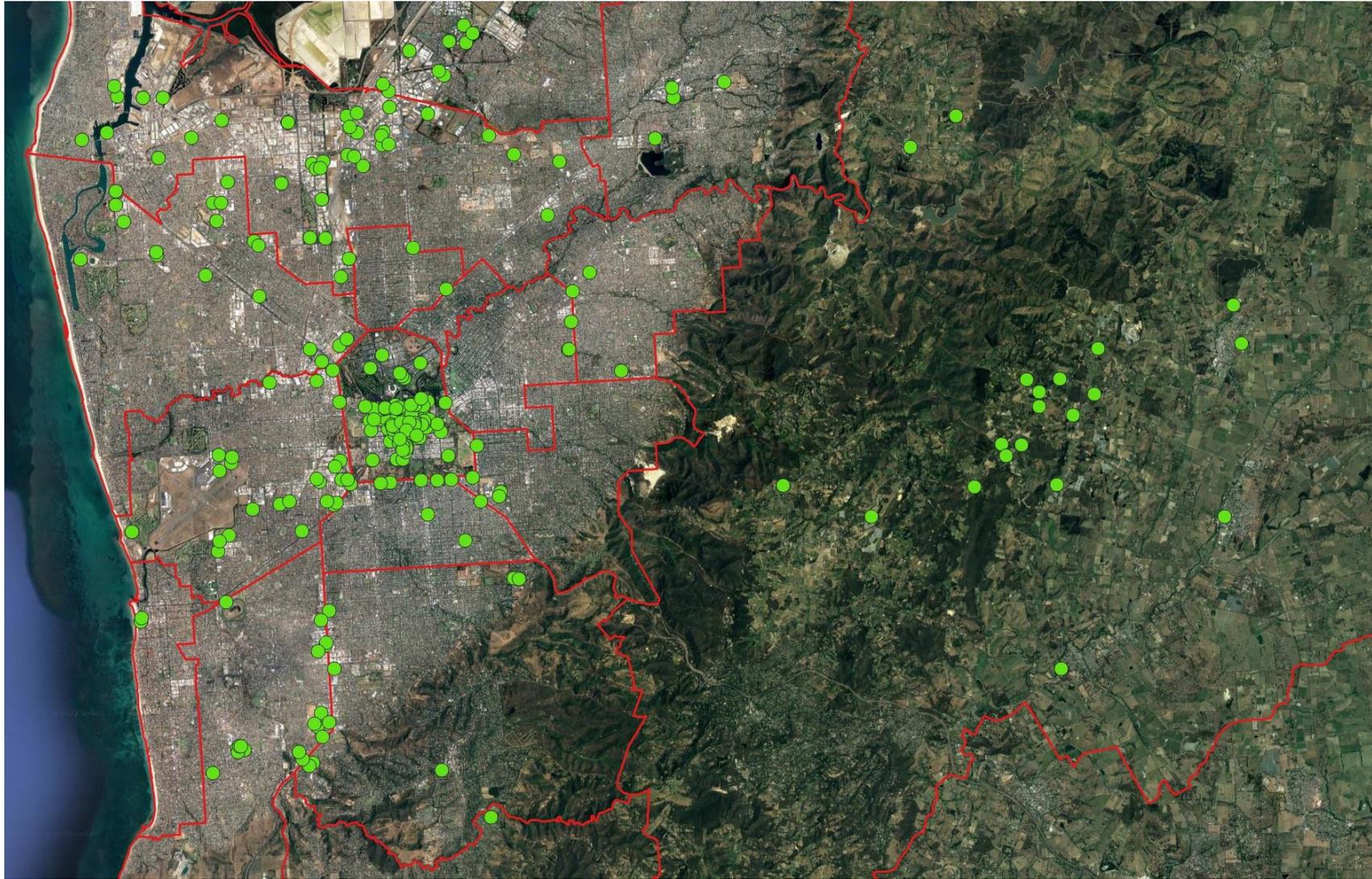
Premises with Cooling Water Systems



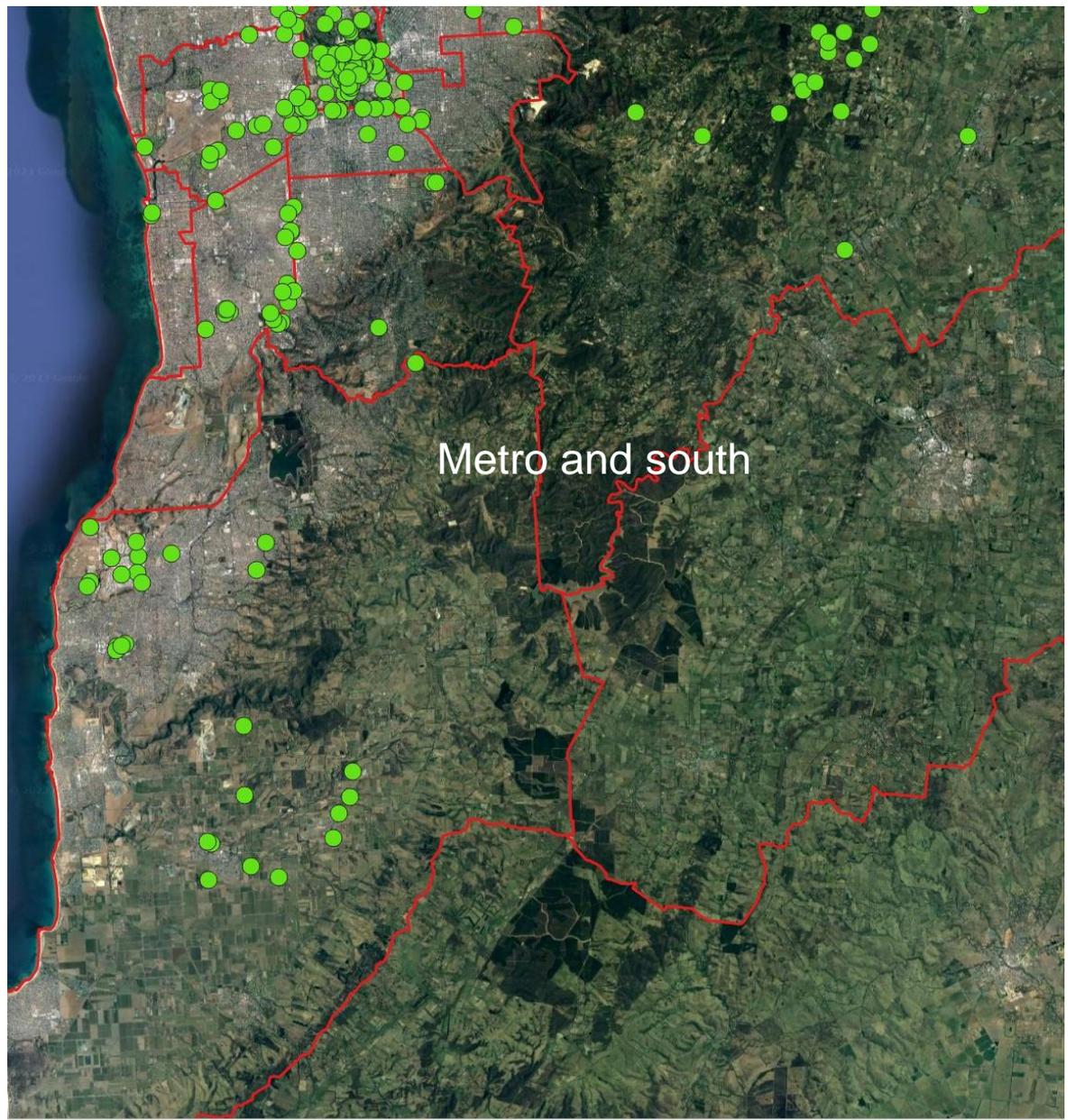
Premises with Cooling Water Systems



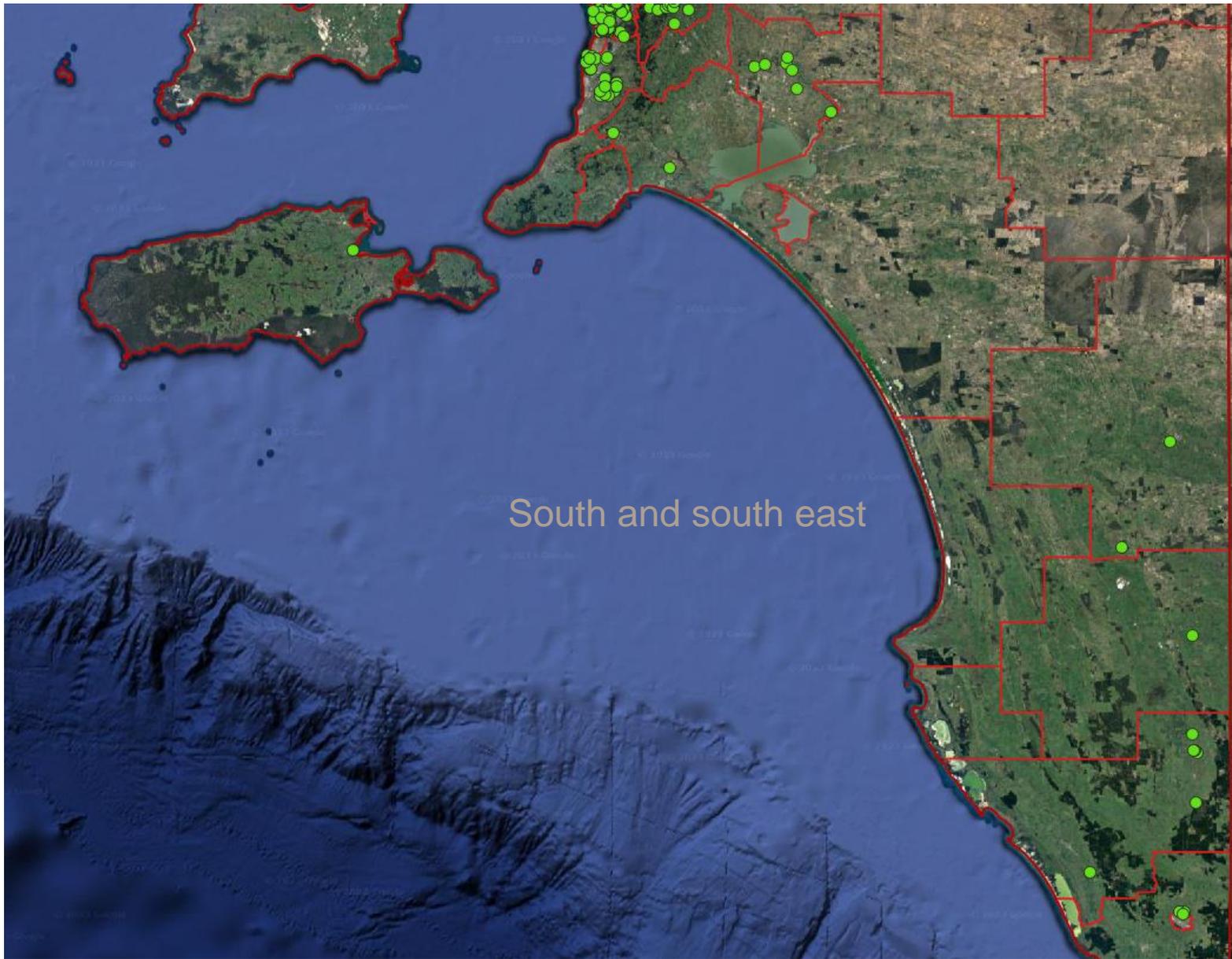
Premises with Cooling Water Systems



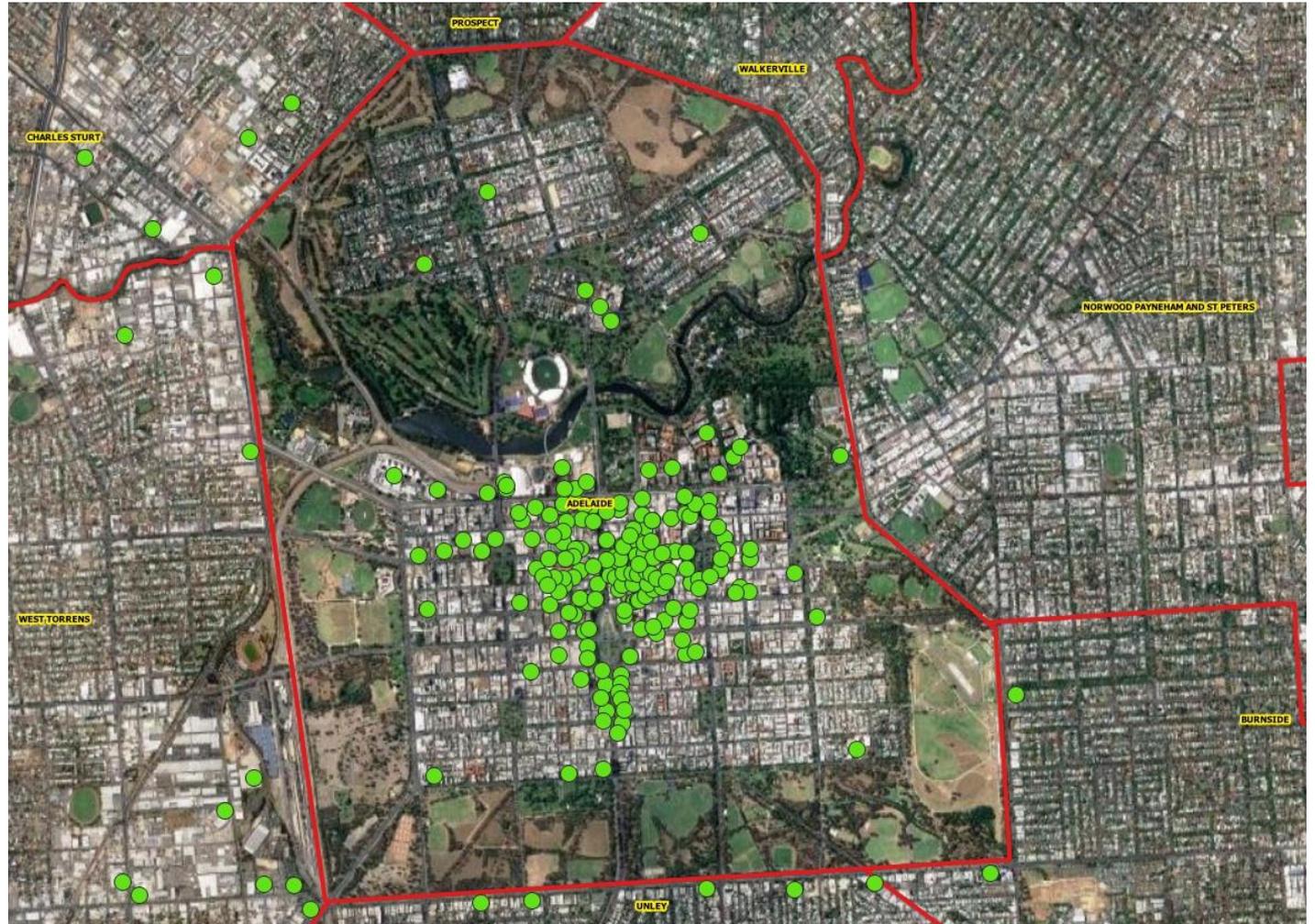
Premises with Cooling Water Systems



Cooling Water Systems



Premises with Cooling Water Systems



Cooling Water Systems

Useless semi-related fact

Largest cooling tower in the world.....

Pingshan 2 Coal powerplant cooling tower in Huaibei City China.

210 m High

174m Base diameter

98m Exhaust Diameter

35000m³ of fill.



That's a lot of fill.



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Stats Summary

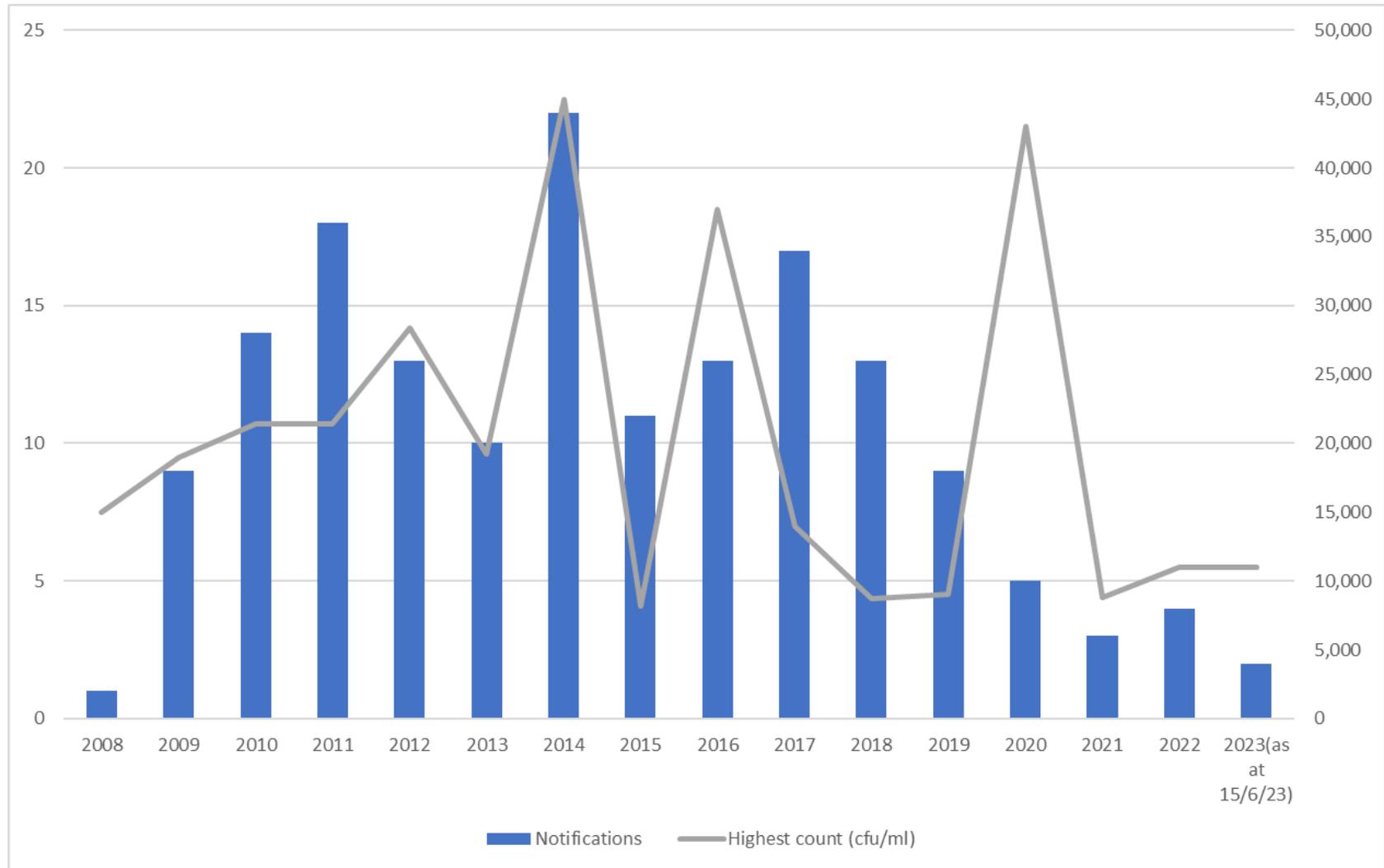
Notification of Legionella detections



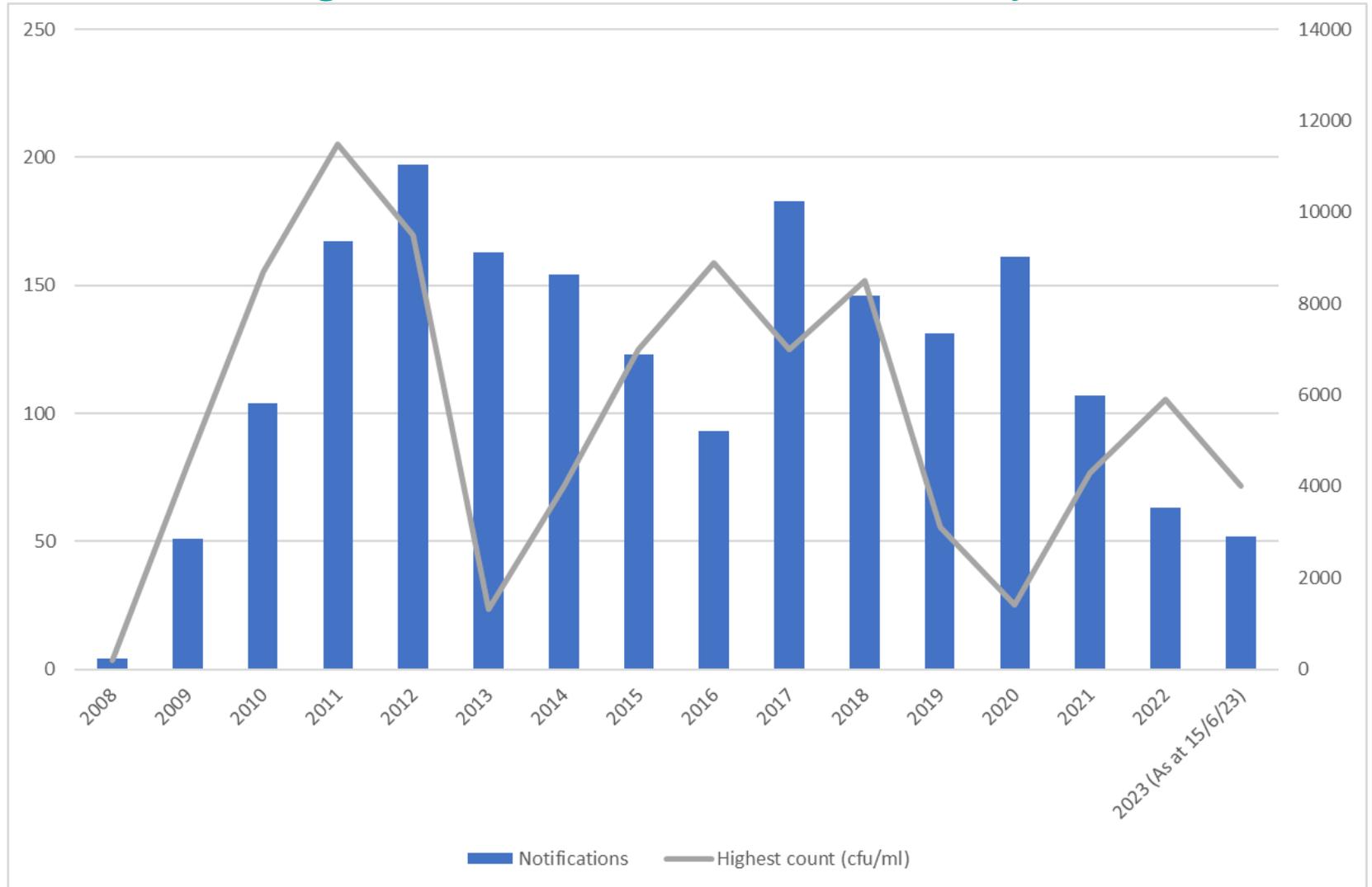
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Notification for the detection of Legionella in Cooling Water Systems



Notification for the detection of Legionella in Warm Water Systems





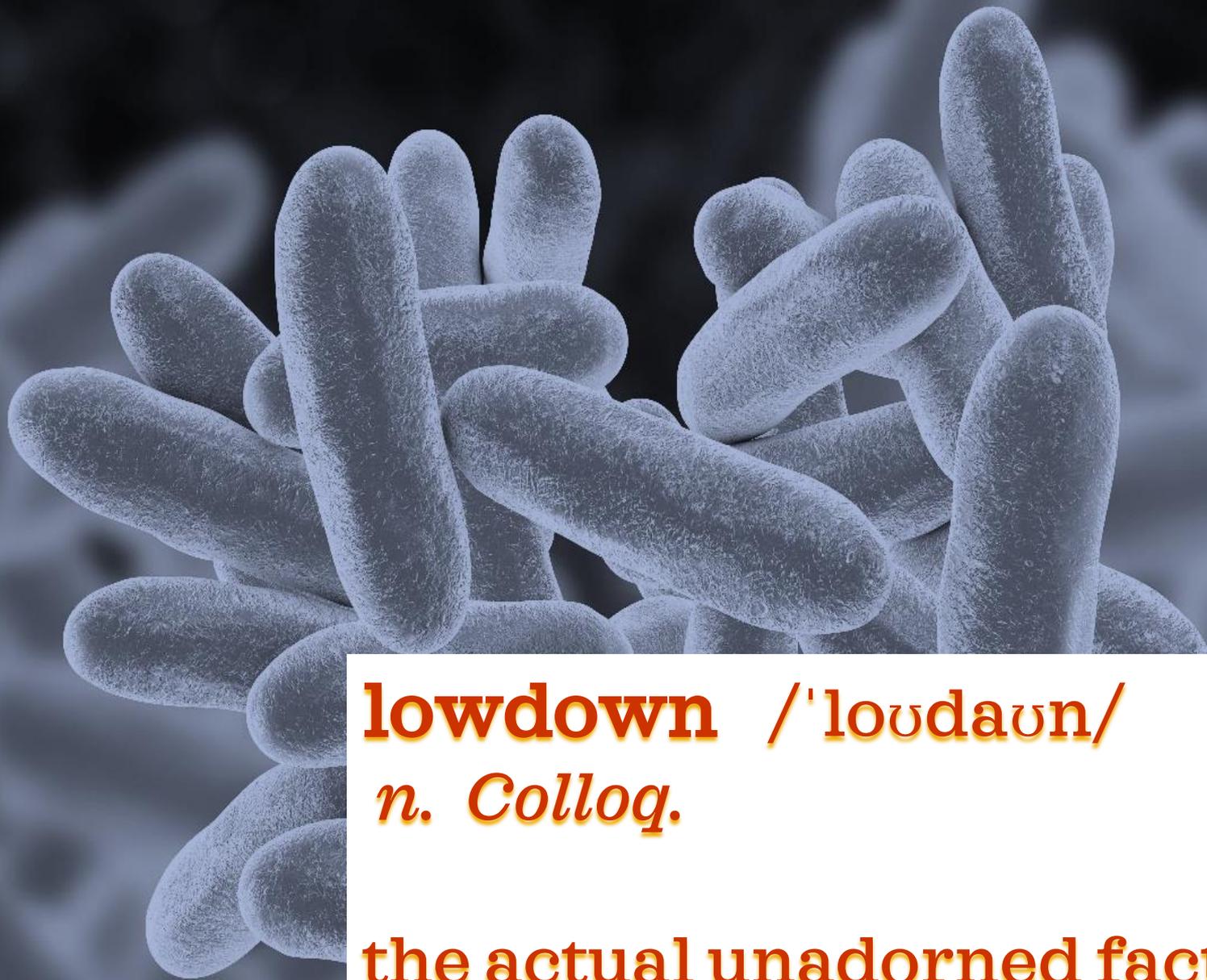
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LP1 Cases in SA

**the
lowdown.....**

Anne Neubauer
Health Protection Programs



lowdown /'ləʊdaʊn/
n. Colloq.

**the actual unadorned facts or
truth on some subject.**



HPP
notified

Confirmed

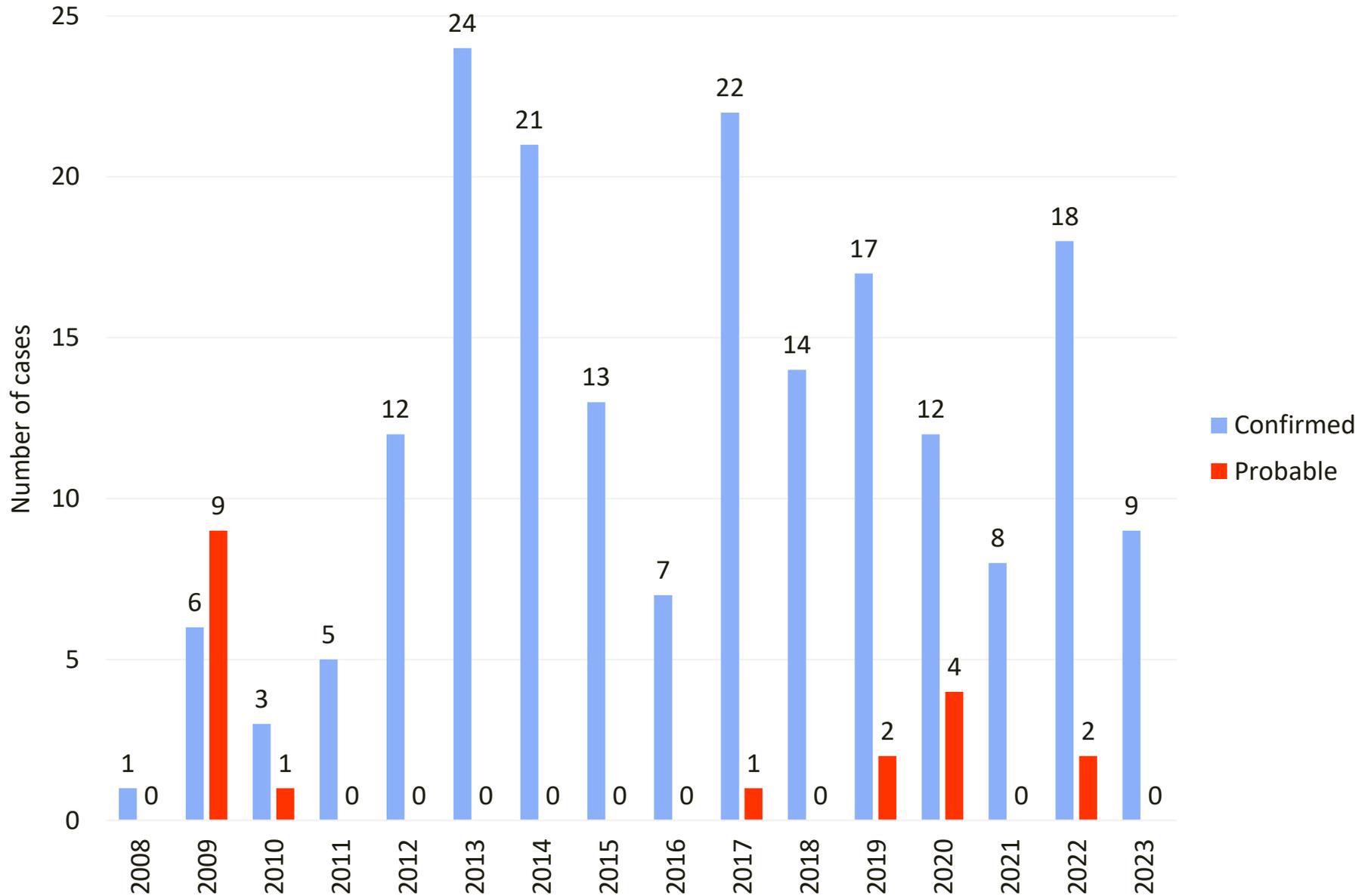
Probable

Case notifications 2008 - 2023

- > 211 LP1 cases notified by CDCB
- > 192 confirmed
- > 19 probable

- > 16 year period - average of 13.2 cases per year

LP1 case notifications in SA

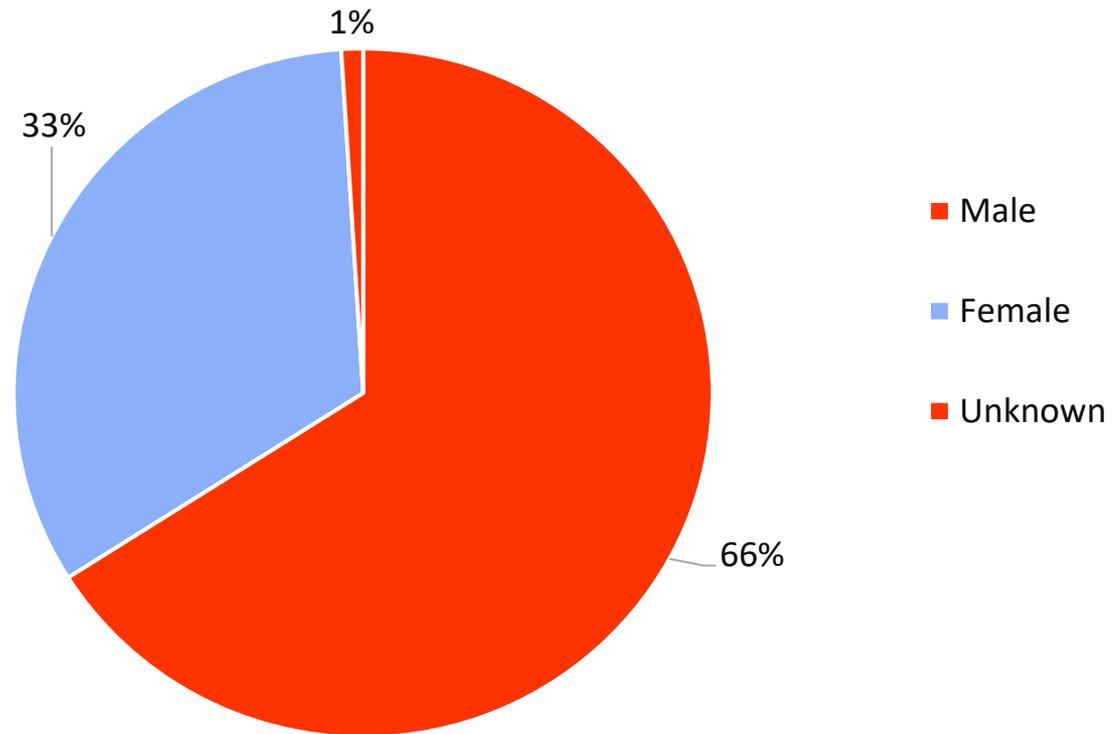


- > 2 x Longbeachae cases
- > 17 x LP2-24 cases
- > 2 x not LP1 or LP2 (unspecified)

- > 75% of LP1 case notifications > 50 years of age
- > Majority male

LP1 cases by gender

n = 211



- > 199 investigated by relevant authorities
- > 12 not investigated
- > Why?
 - false positive
 - no SA exposure
 - case too ill to interview
 - uncooperative

Source found?

- > Individual cases - rarely
- > Outbreaks / case clusters - more likely
- > Often detections are found in the home

Risk of illness increased by:

(Source: Guidelines for the Control of Legionella)

Being >50 years

Immunodeficiency

Cancer

Diabetes

Male

Kidney disease

Smoking

Chronic heart / lung
disease



Fatalities

- > 6 deaths in a 16 year period
- > Comorbidity
- > Long term burden



Comparison to other risks

- > 13 drowning deaths in 2021/2022 (Source: RLS Australia)
- > Influenza deaths (Source: Australian Bureau of Statistics)
 - 2019 – 1,076
 - 2020 – 55
 - 2021 – 2
- > 3886 died from cancer in 2020 (average 10 per day) (Source: Cancer Council SA)

Comparison to other risks

- > **Workplace fatalities** (Source: Safework Australia)
 - 2019 – 15
 - 2020 – 11
 - 2021 – 16

- > **Road crashes – 99 deaths in 2021, 71 deaths in 2022** (Source: SAPOL)



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