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Government of South Australia
Department of Environment, Water and Natural Resources

SOUTH AUSTRALIAN RESEARCH & DEVELOPMENT INSTITUTE
PIRSA

Fish assemblages in the Coorong

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PREMIUM FOOD AND WINE FROM OUR CLEAN ENVIRONMENT

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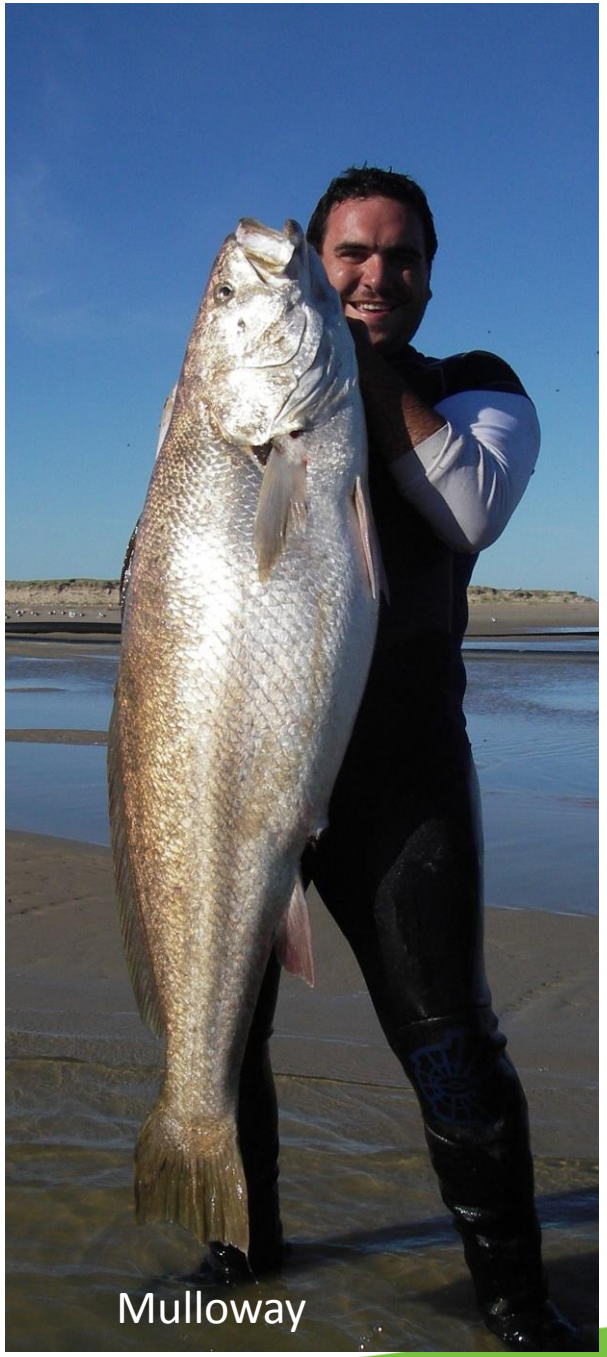
Coorong fishes


Mulloway

Black bream

Greenback flounder

Yelloweye mullet

Sandy sprat

Smallmouthed hardyhead

Congolli

Lamprey

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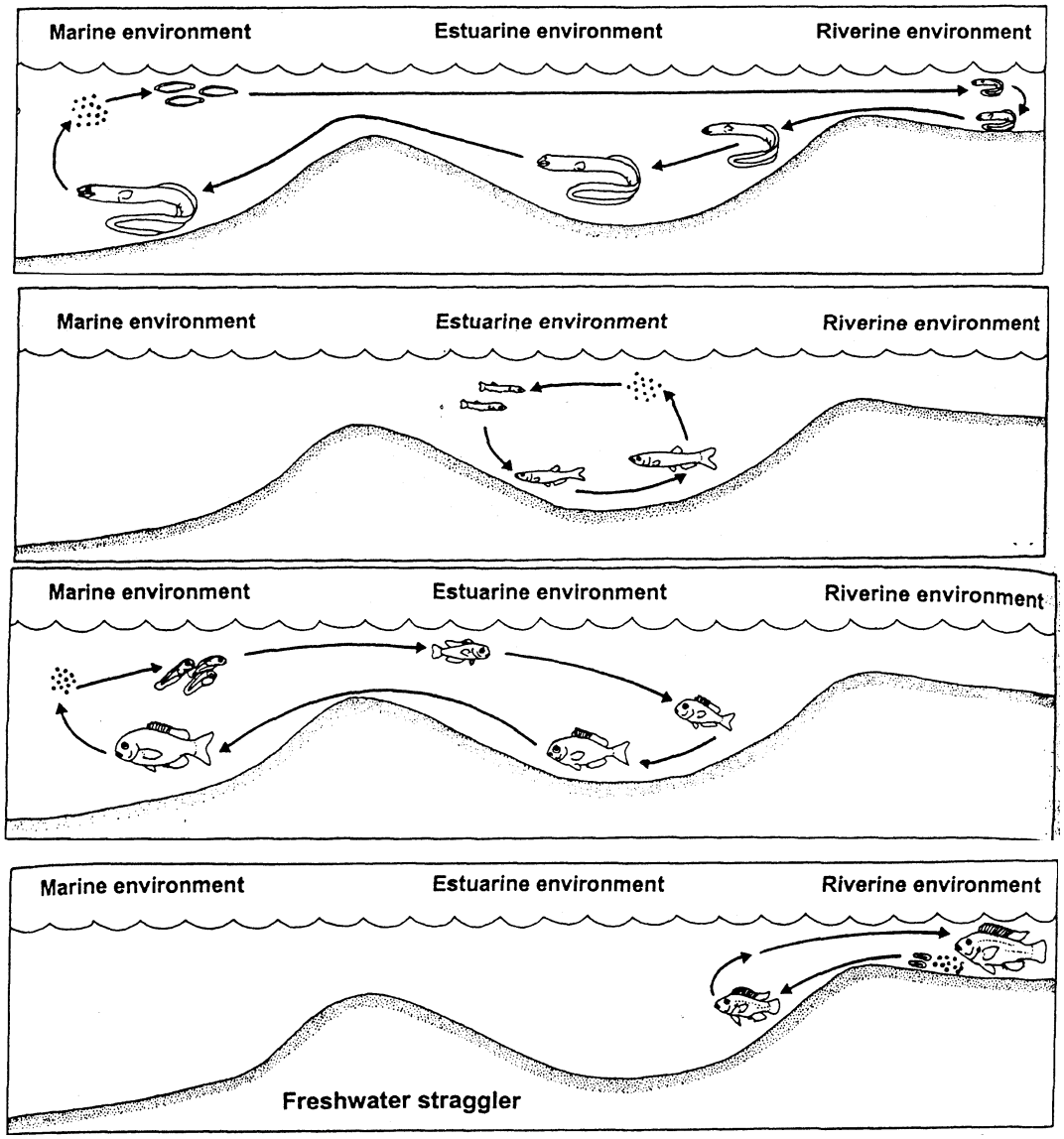
Fishes and Estuaries

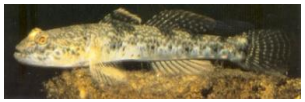


Diadromous

Estuarine

Marine

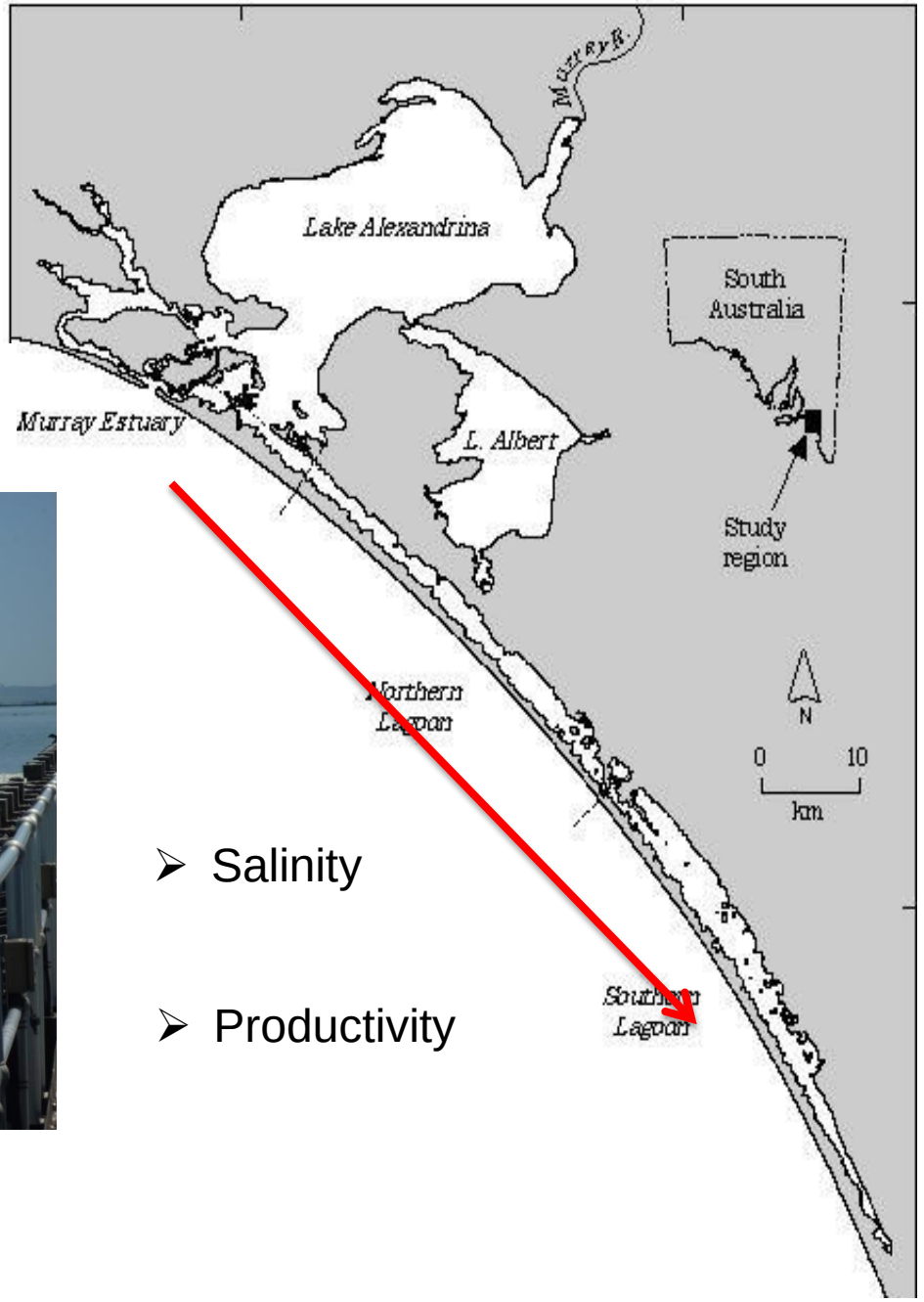
Freshwater



Adapted from Whitfield 1999

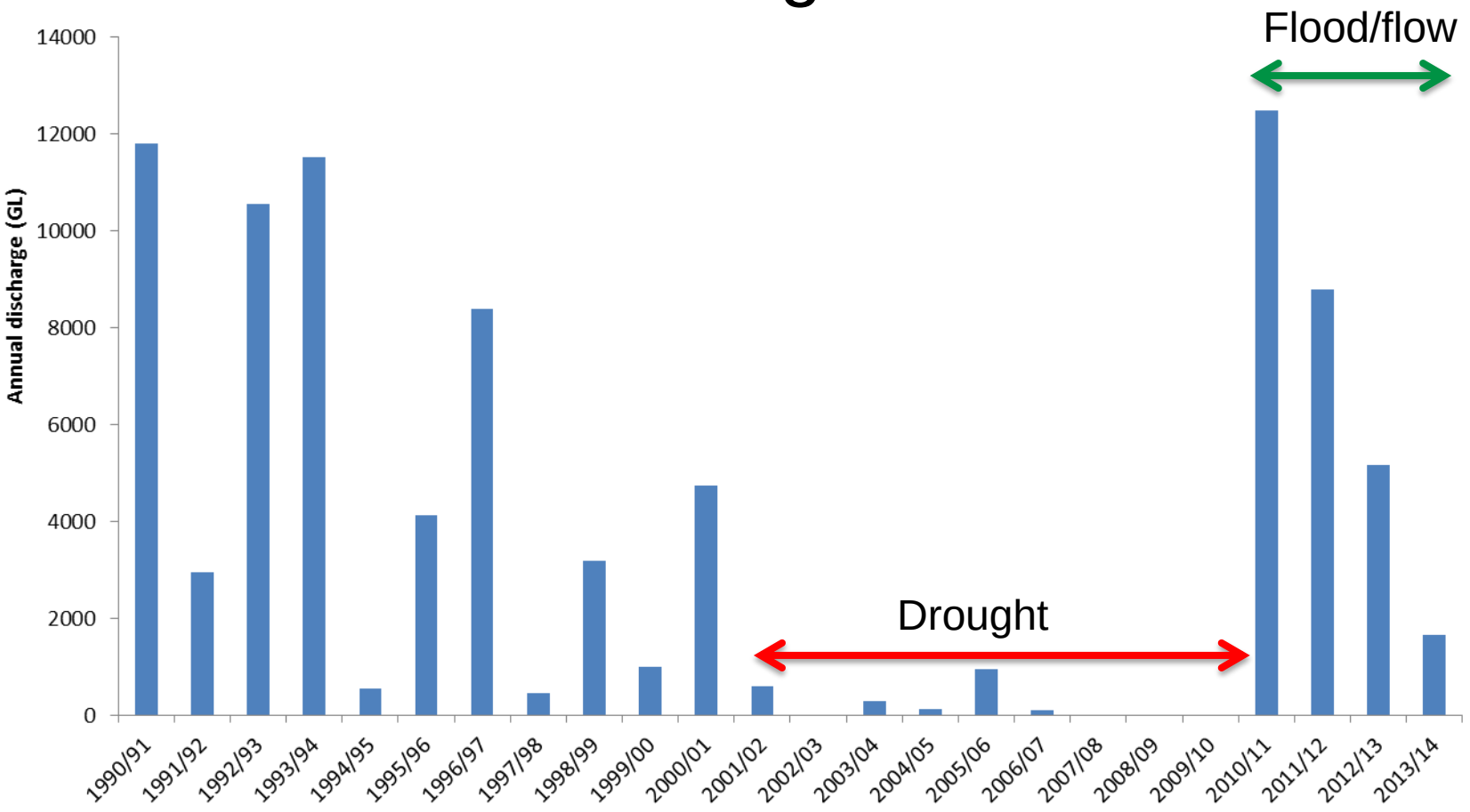
Dynamic estuarine – lagoonal system

- Flow
- Connectivity



- Salinity
- Productivity

Annual barrage flow



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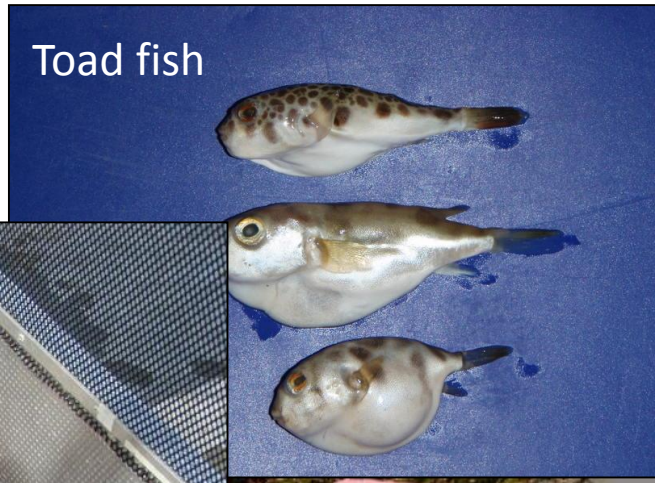
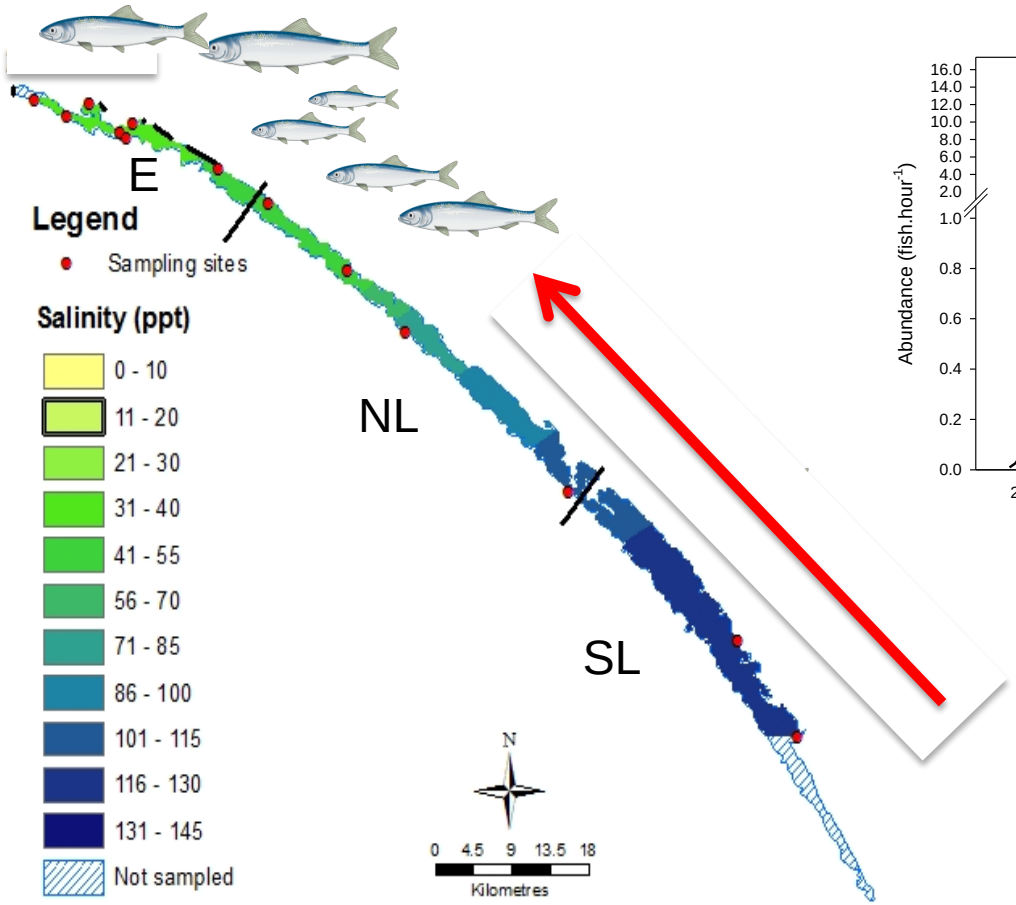
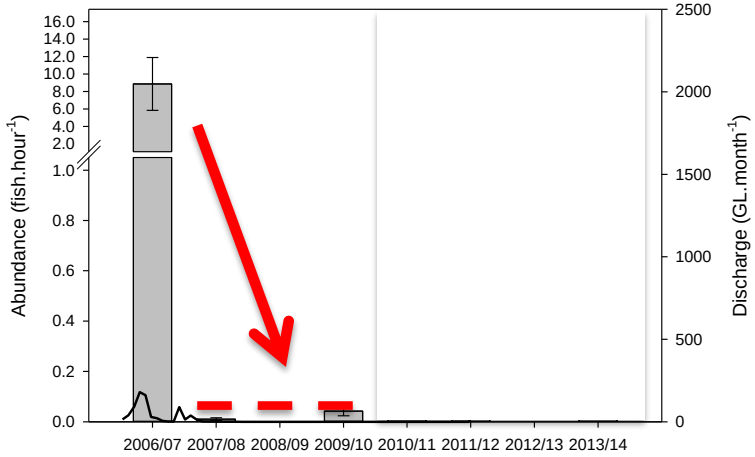
2007–2010 (drought)



Distribution



Recruitment/Abundance



Drought Period

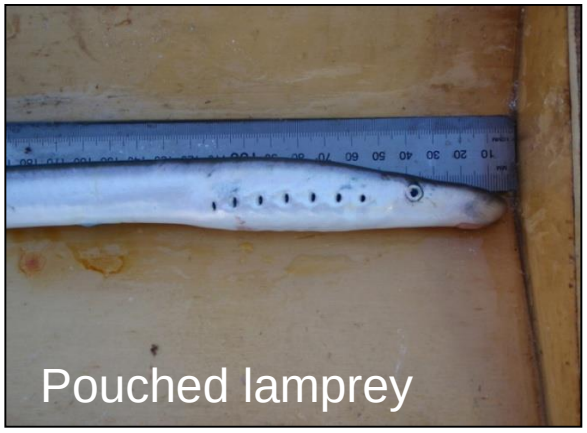
Data: Bice & Zampatti

2010–2013 (flow)

‘Freshwater’

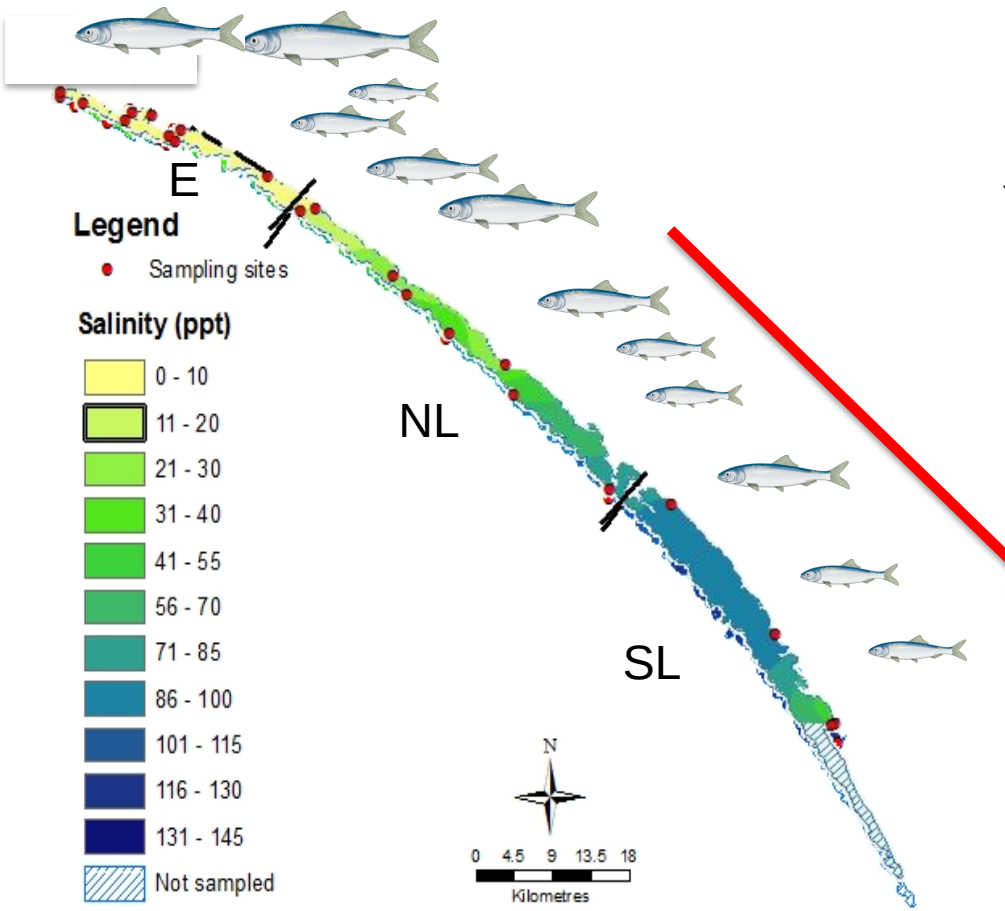
‘Diadromous’

‘Estuarine’

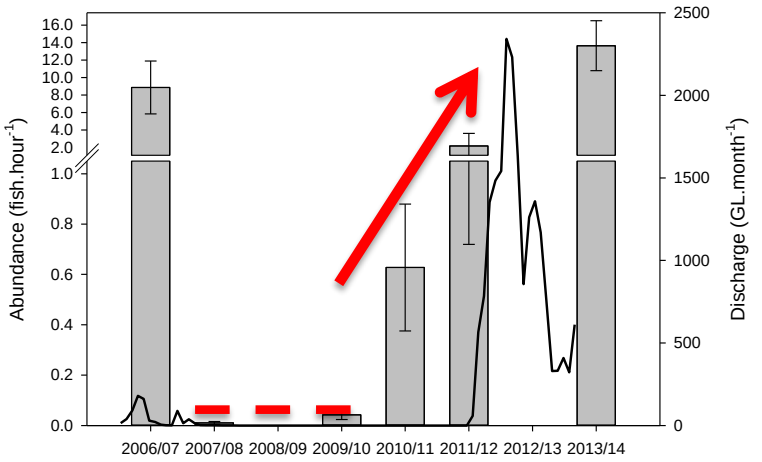


‘Marine migrant’

Distribution



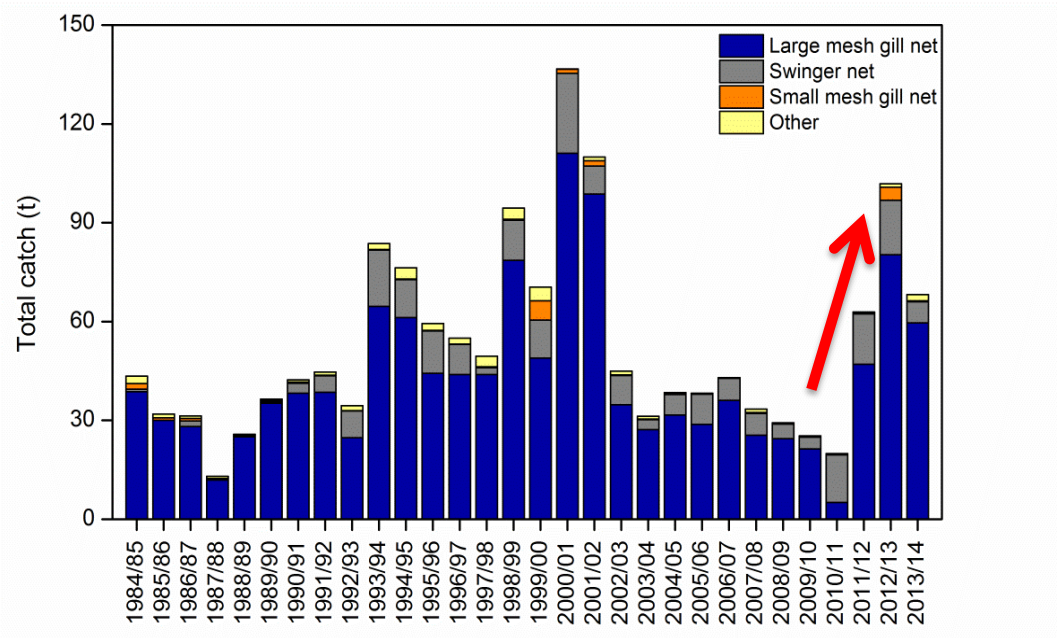
Recruitment/Abundance



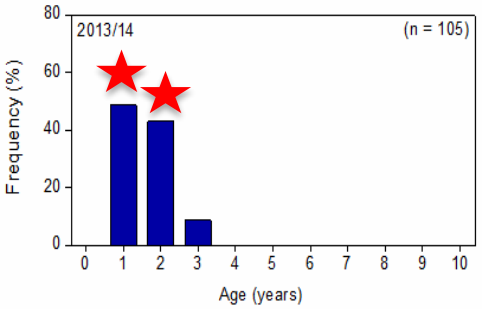
2010–2013 (flow)

Data: Bice & Zampatti

Mulloway production – Coorong estuary



Research sampling (*multi-panel gill nets*)



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Summary

- Dynamic fish assemblages in the Coorong
  - Flow, salinity and connectivity key drivers
- Freshwater inflows promote diversity, abundance, recruitment and distribution in estuarine-dependent fish
- High variability of estuarine system
  - long-term data needed to support management and policy decisions

Acknowledgements

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