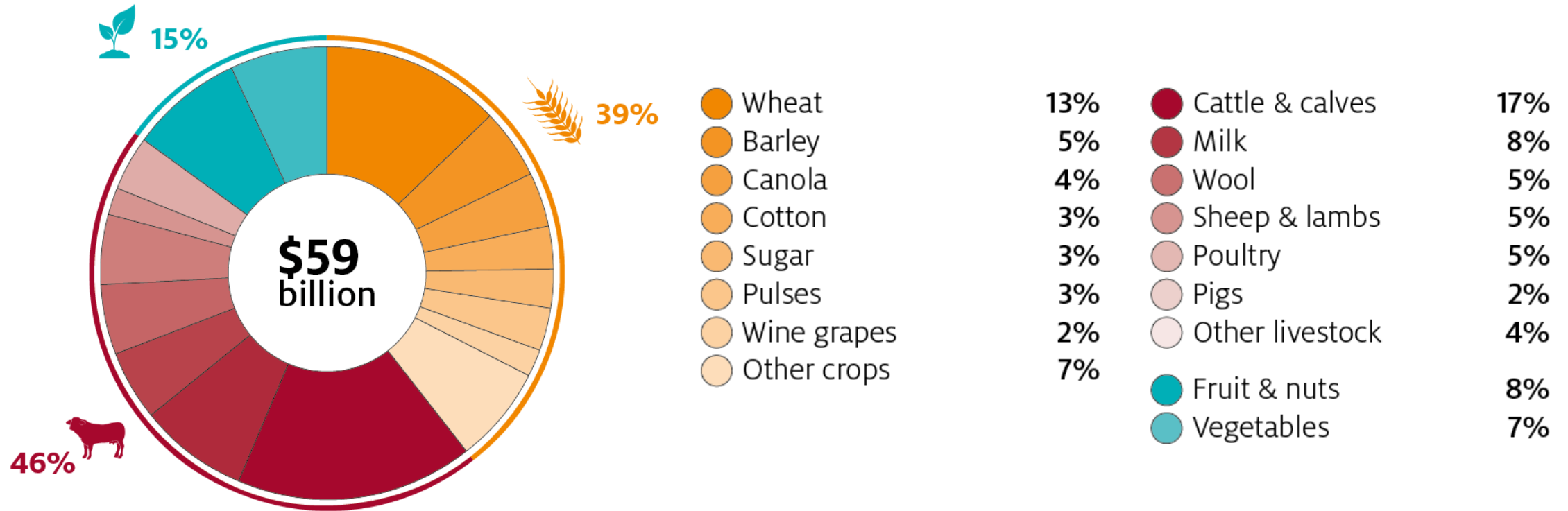




## A circular collage of images representing various aspects of the food system. The collage is composed of several overlapping circular segments, each containing a different image. The images include: a farmer in a plaid shirt and hat working in a field; a man in a safety vest standing in front of a building; a large white truck with 'ROAD' and 'TRAIN' on its bumper; a close-up of a bee on a textured surface; and a close-up of a blue, textured food item, possibly a fruit or vegetable. The background of the collage is a solid dark color.

5 November 2019

# Australian agriculture



Source: Australian Bureau of Statistics 2019

# Agricultural zones

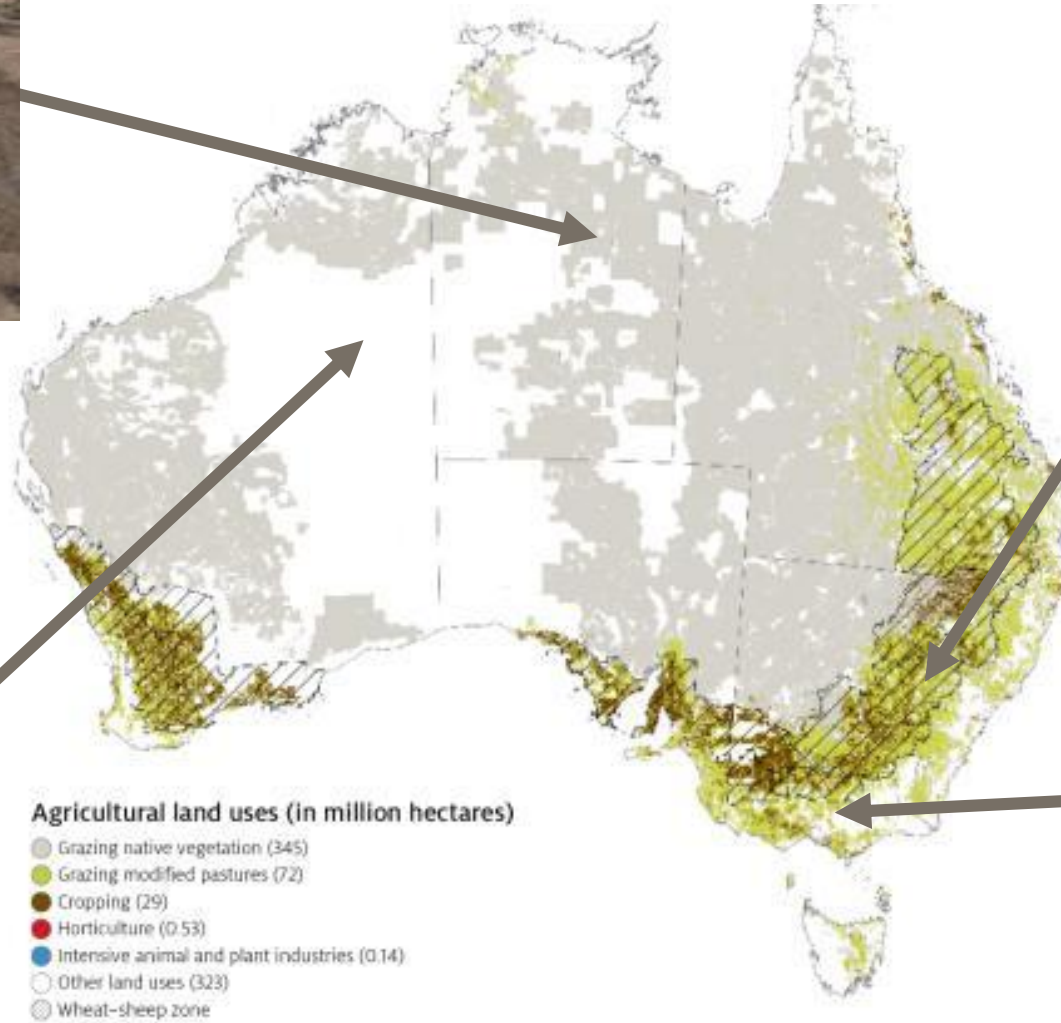


## Beef

2.1 million tonnes beef/year



## Great Sandy Desert



## Sheep

670 kilo tonnes of sheep meat/year

414 kilo tonnes of wool/year



## Dairy

9 billion litres of milk/year



# Pigs and poultry

- Relatively small industries
- Domestic focus

## Pigs

- 2.5 million pigs
- 417 kilo tonnes of pig meat/year

## Poultry

- Chicken meat industry vertically integrated
- 11.9 kilo tonnes of chicken meat/year
- 15 million eggs/day

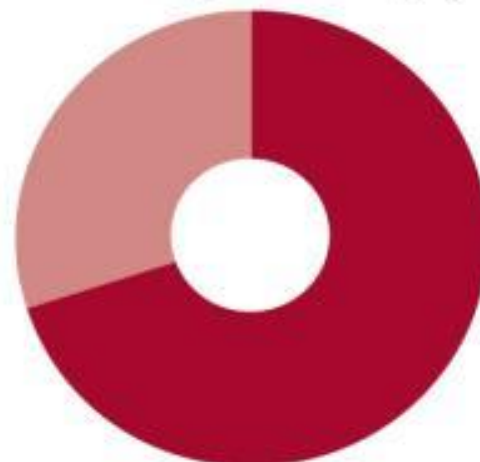


# Australia exports most of what it produces

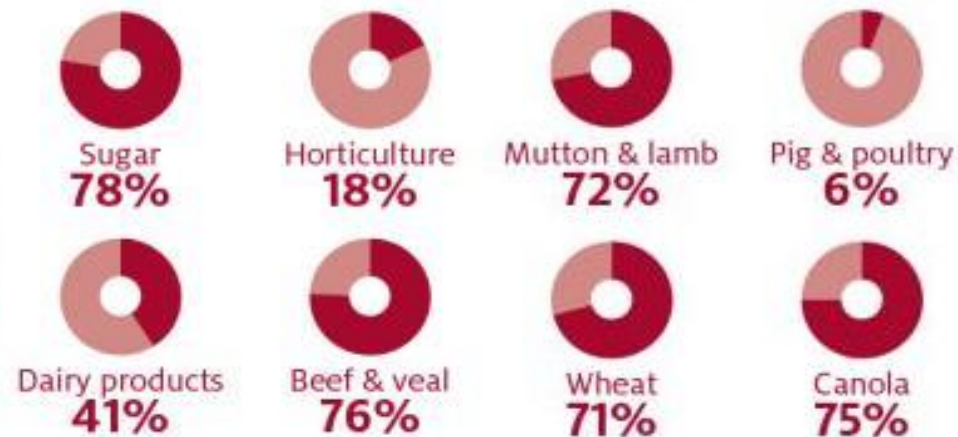


**\$49b**  
Value of exports

Share of agricultural production exported,  
3-year average, 2014–15 to 2016–17

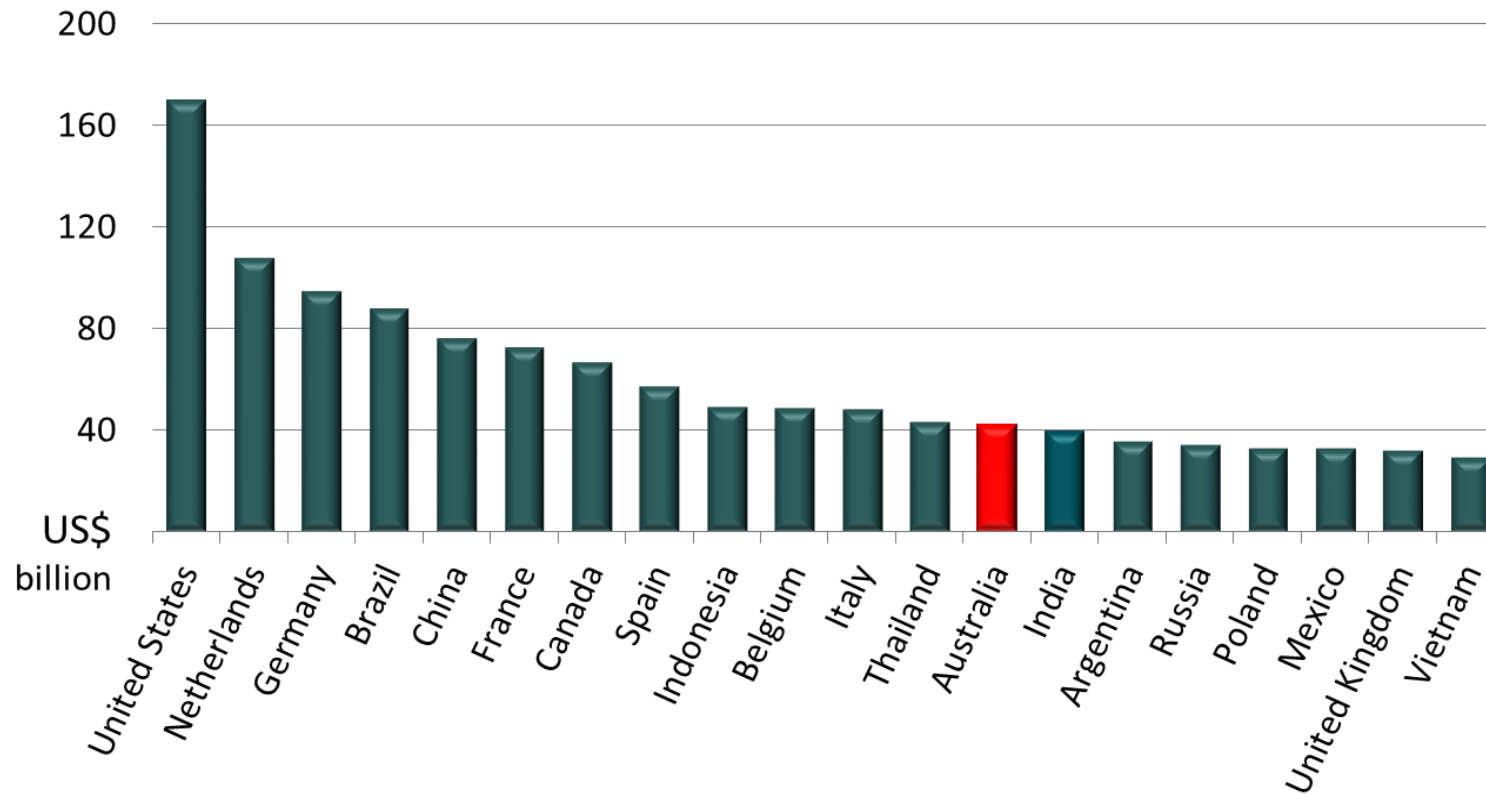


**70%**  
of agricultural production  
is exported



# On the world market Australia is a significant contributor to global agricultural exports

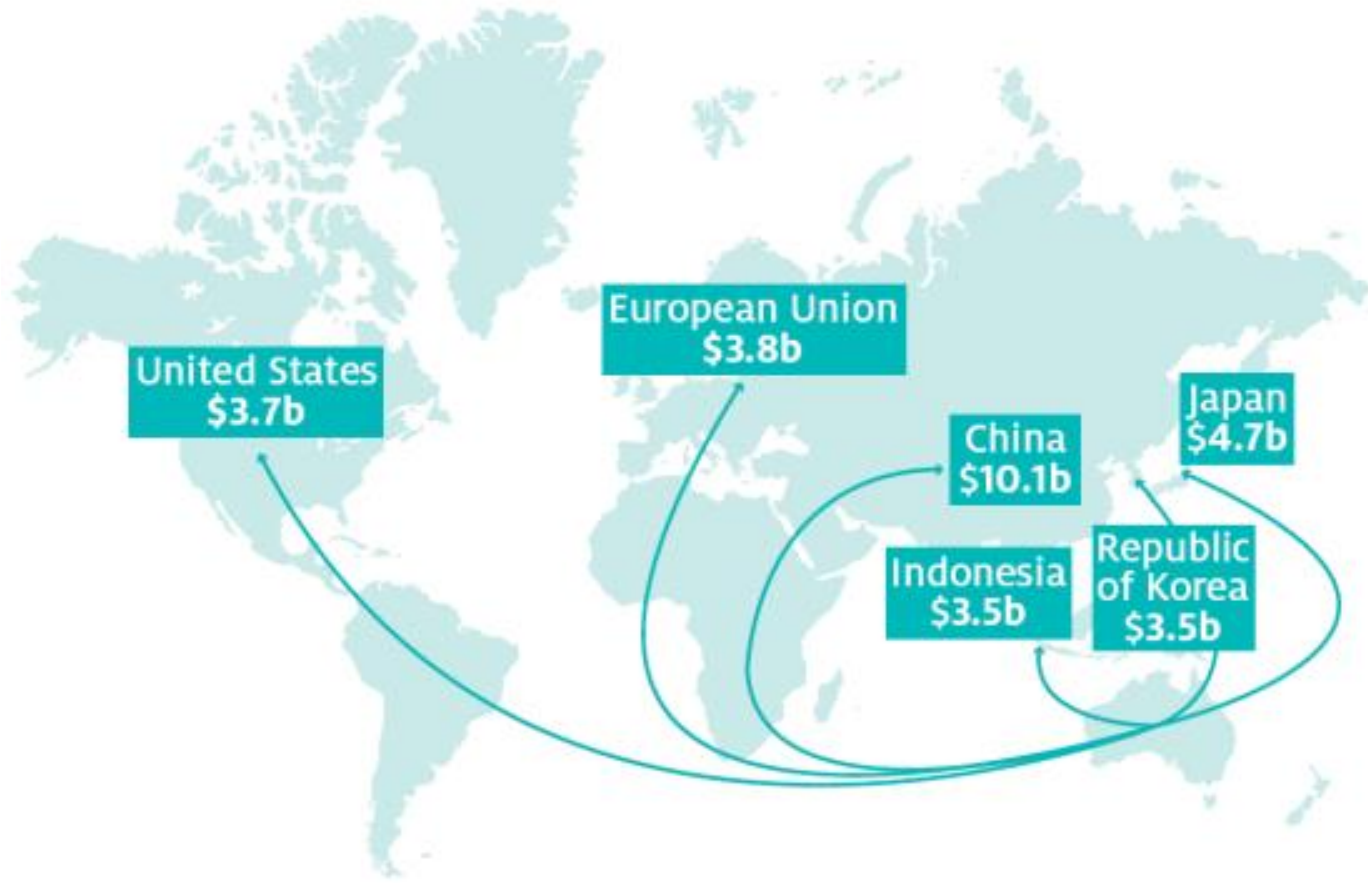
## Largest agricultural exporters, 2017—Australia ranked 13th



Source: WTO 2019

# Trade

Australia's key agricultural export markets, 2016–17  
A\$ billion





# The world is changing

## Opportunities and challenges for agriculture

Population growth



Climate change



Asia emerges



Competitiveness race



Changing consumer preferences



Spread and control of animal diseases



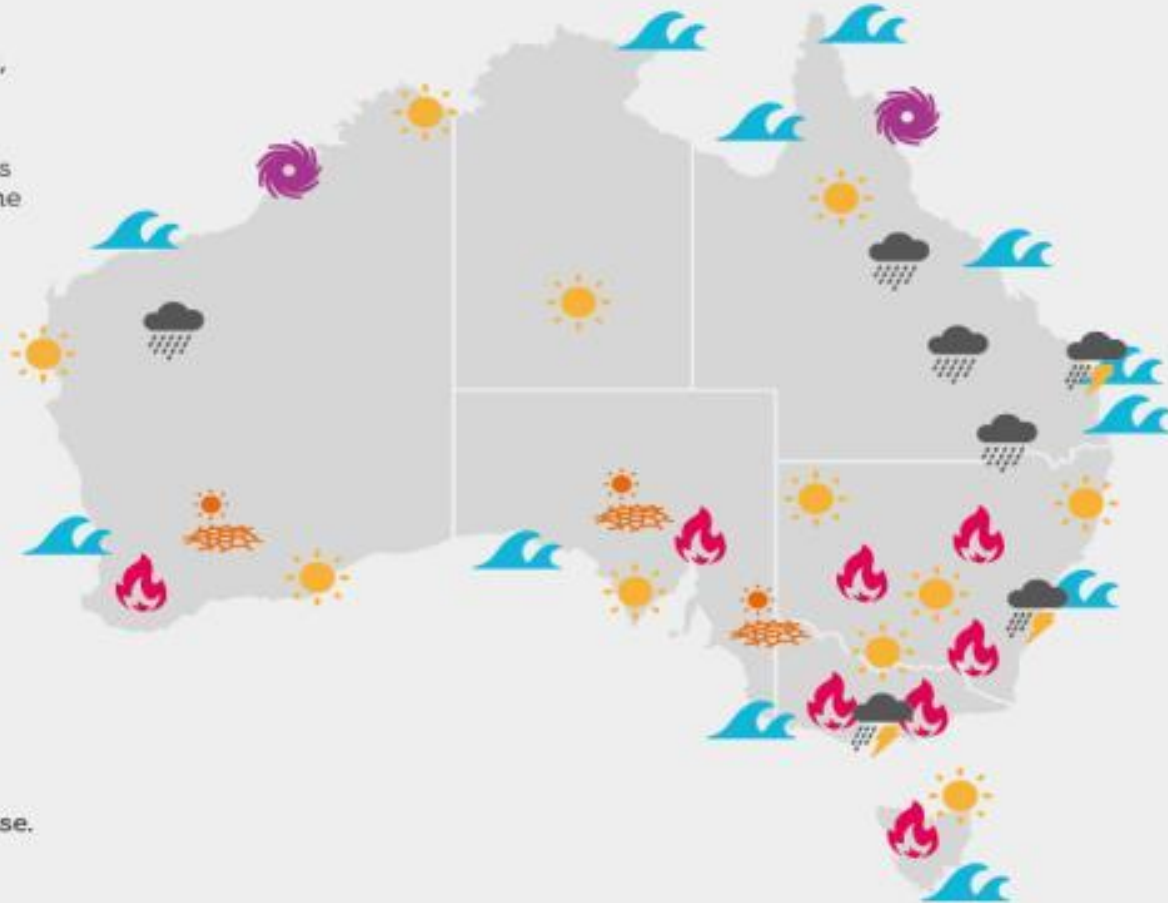
Resource scarcity





# HOW WILL CLIMATE CHANGE AFFECT AUSTRALIA?

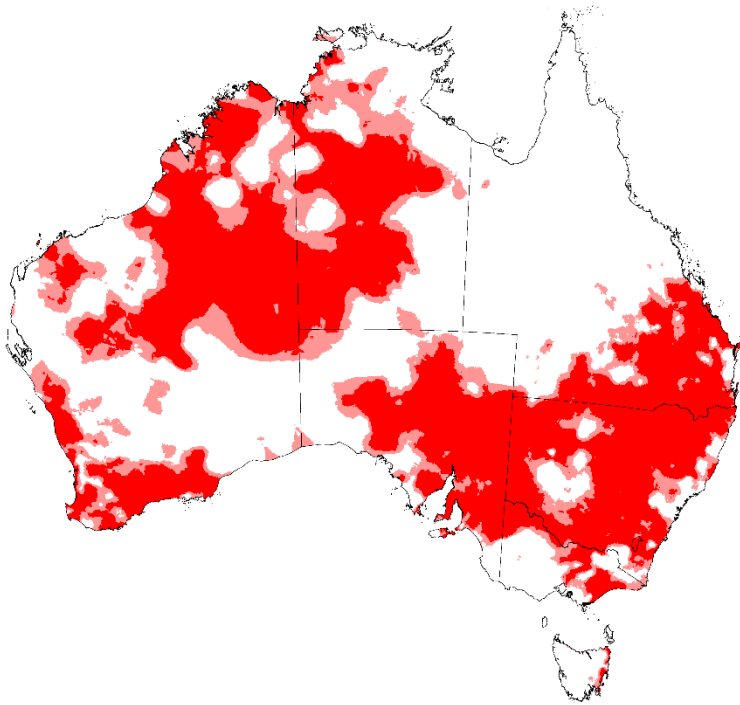
-  Cyclones are likely to become **more intense**, but less frequent.
-  Extreme rainfall events are expected to become **more intense**.
-  Hotter and drier conditions will lead to harsher bushfire weather.
-  Heatwaves will become even **longer and hotter**.
-  Higher sea levels will **increase flooding** in coastal cities and towns.
-  Potential severe thunderstorm days are expected to **increase**.
-  Droughts are likely to happen **even more often**.



Source: Climate Council

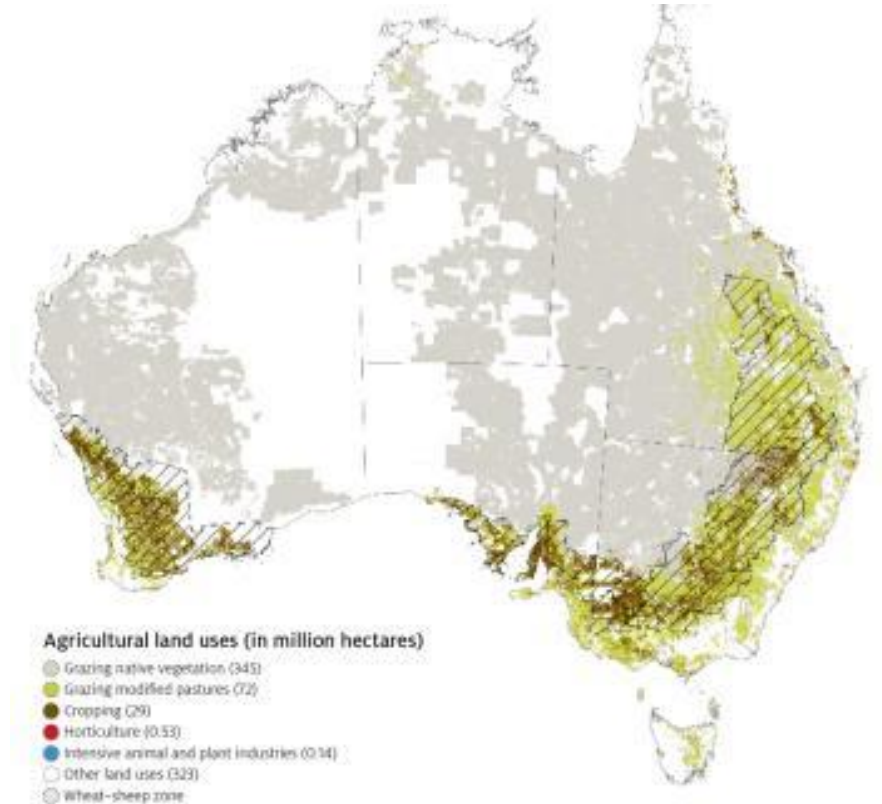
# Current drought affecting many regions

## 18 month rainfall deficiency to 30 August 2019



● Severe deficiency

● Extremely low



# Response to climate change

- Australia can play an important role in sharing knowledge and innovation
- Leadership role - significant improvements can be made for the sustainable, humane production of livestock





# Spread and control of animal diseases

## Antimicrobial resistance

- Affects treatment and control of animal diseases
- Affects animal health, welfare, productivity, food safety, public health and trade
- Collaboration required



## African swine fever

- Biosecurity important
- Increased global demand for protein



# Consumer preferences and societal expectations



# Conclusion

- Australian livestock production is mostly pasture based and export focused
  - Asia is the main market
- Many challenges and opportunities
  - Climate change
  - Control of animal diseases
  - Changes in consumer preferences and societal expectations
- Response needed to remain competitive and sustainable
- Livestock production can make contributions to animal welfare, human health, the environment and food security

