

# Tune In & Tune Up

Drought and  
Wellbeing  
Webinar Series

the  
power of  
humanity



# Webinars

1. Maintaining wellbeing through drought & prolonged stress (Wed 17 June)
2. The drought cycle; adaptation and strengthening resilience (Wed 1 July)
- 3. Wellbeing after the rains (Wed 15 July)**
4. Family wellbeing in the face of ongoing stress (Wed 29 July)
5. Preparing for tough times (Wed 12 August)

# This Session

- Recording:  
<https://bit.ly/2MqY7ez>
- Q&A
- Chat box



# Current drought and climate outlook

July 2020

Dr. Lynette Bettio

Climate Services, Bureau of  
Meteorology

<http://www.bom.gov.au/climate/drought/>

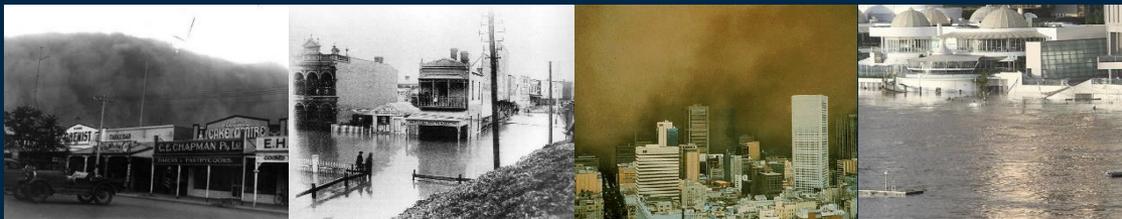
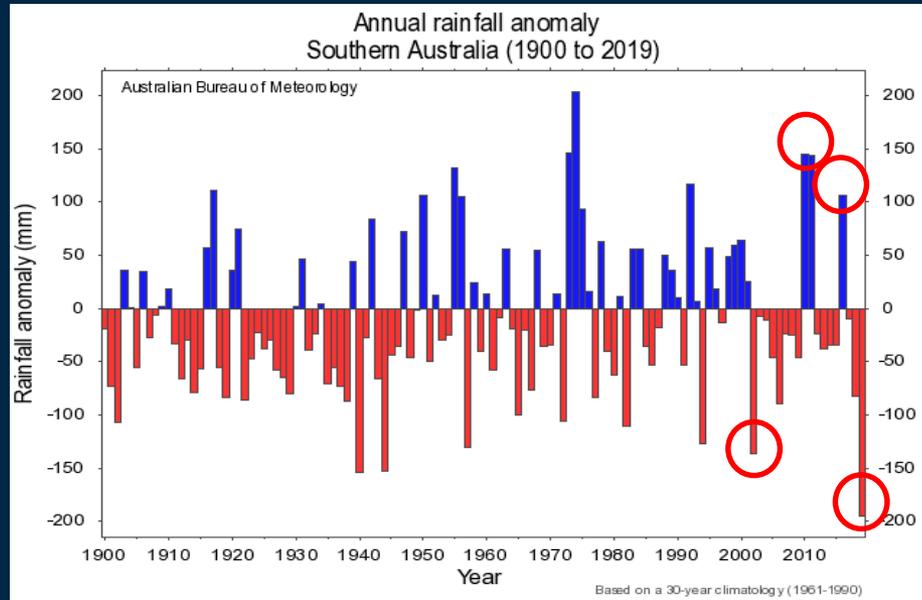
<http://www.bom.gov.au/climate/drought/knowledge-centre/>



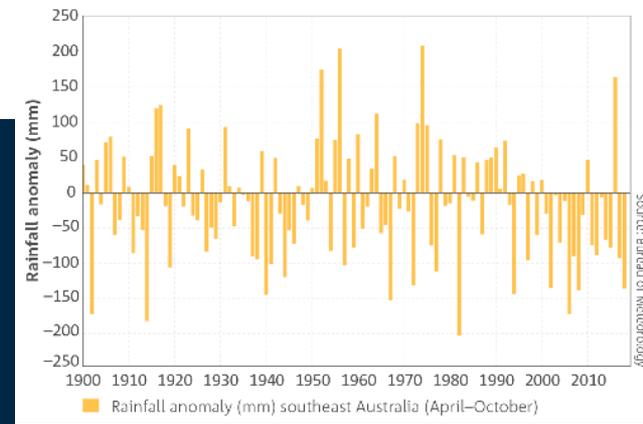
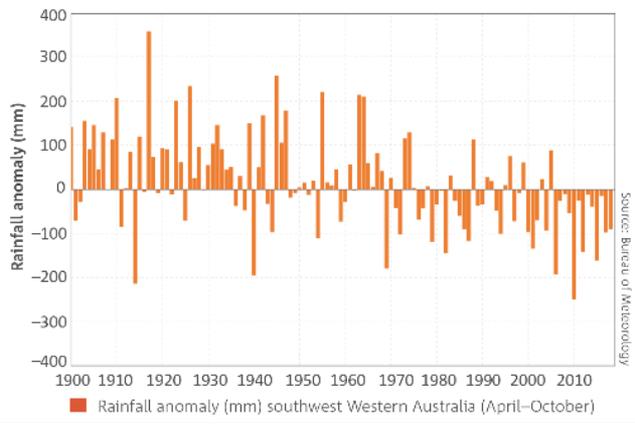
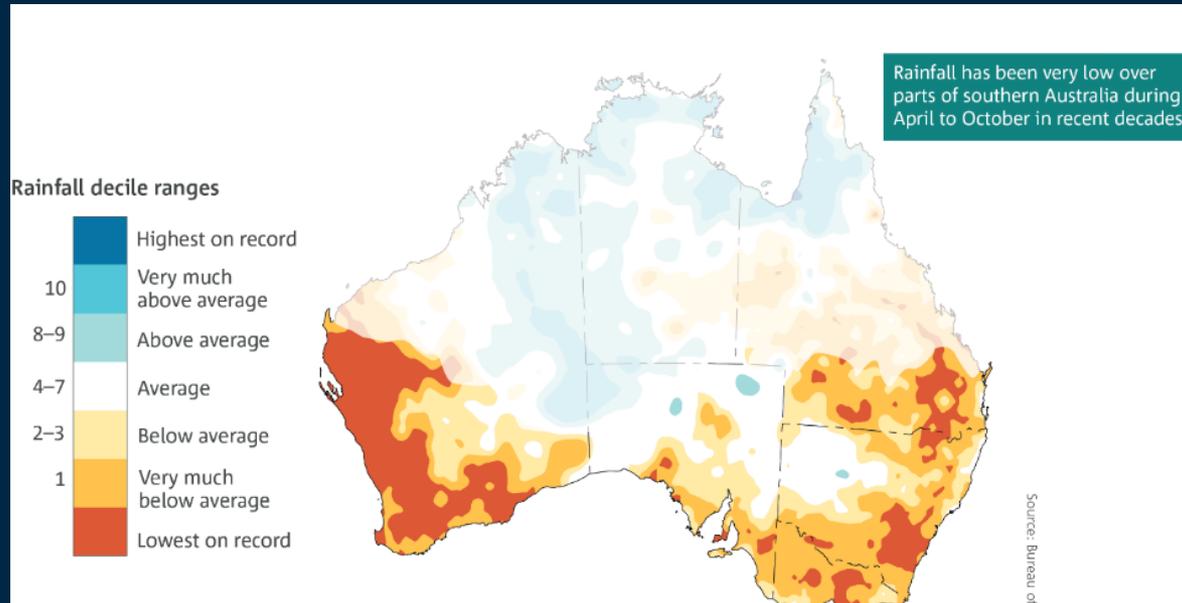
Timburra Fires Gippsland Helenka King @HelenkaKingTwitter

# Australia's climate is naturally highly variable

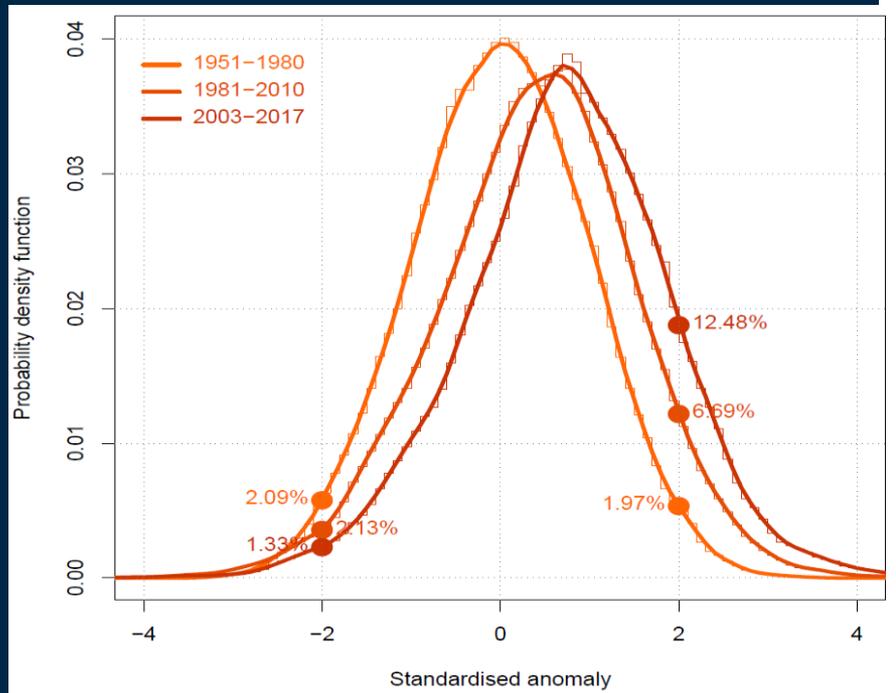
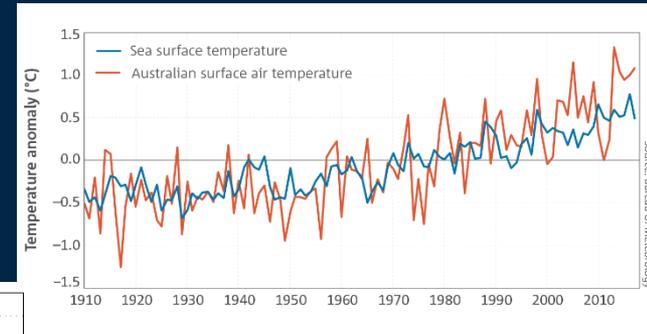
## Southern Australia rainfall anomalies since 1900



# 20 year April-October rainfall deciles: declines in the south



There has been a rise of over 1° C in Australian land surface temperatures. Why does 1 degree matter?

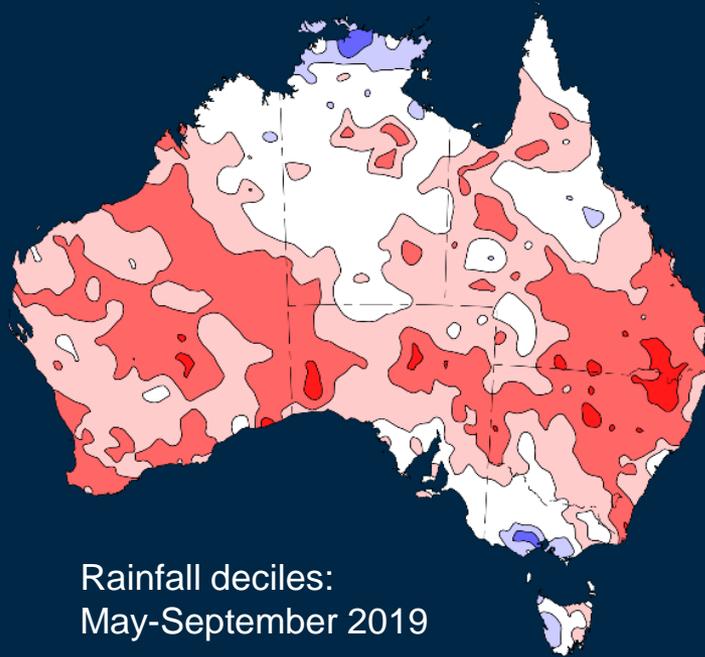


A 1° C shift in temperature has increased the occurrence of very warm monthly daytime temperatures

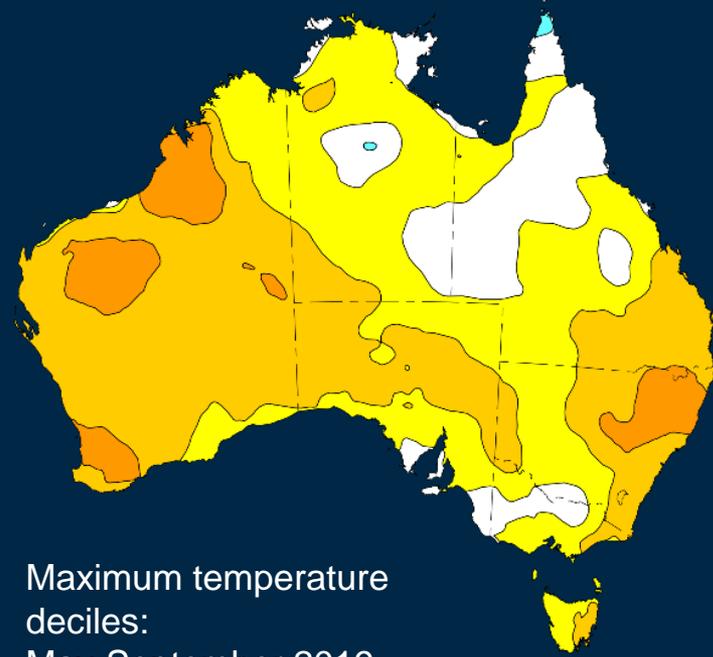
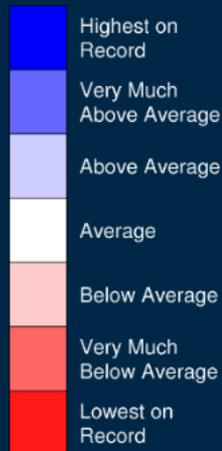
<http://www.bom.gov.au/state-of-the-climate/>

# Rainfall and maximum temperatures

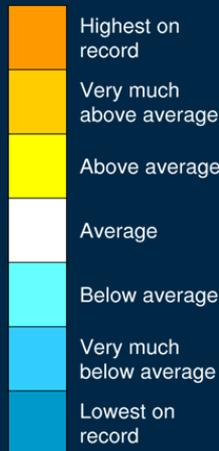
Northern fire season/start of southern fire season



Rainfall deciles:  
May-September 2019



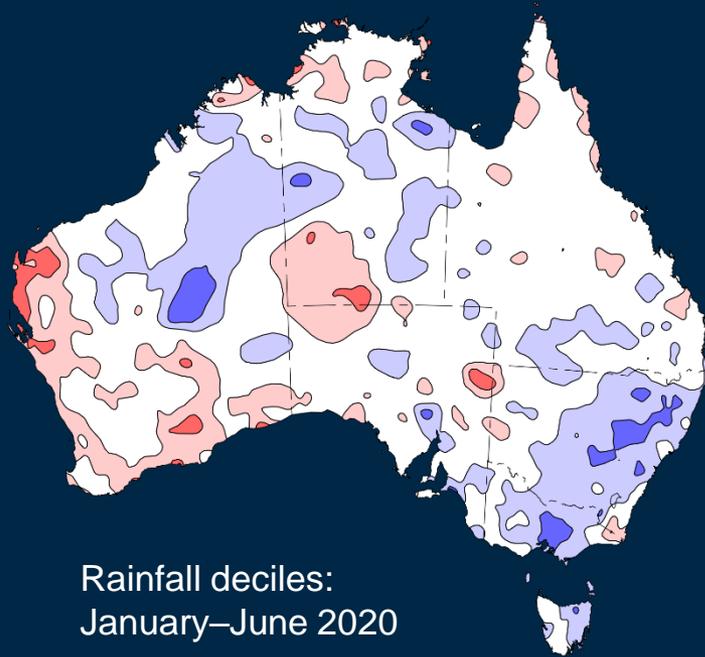
Maximum temperature  
deciles:  
May-September 2019



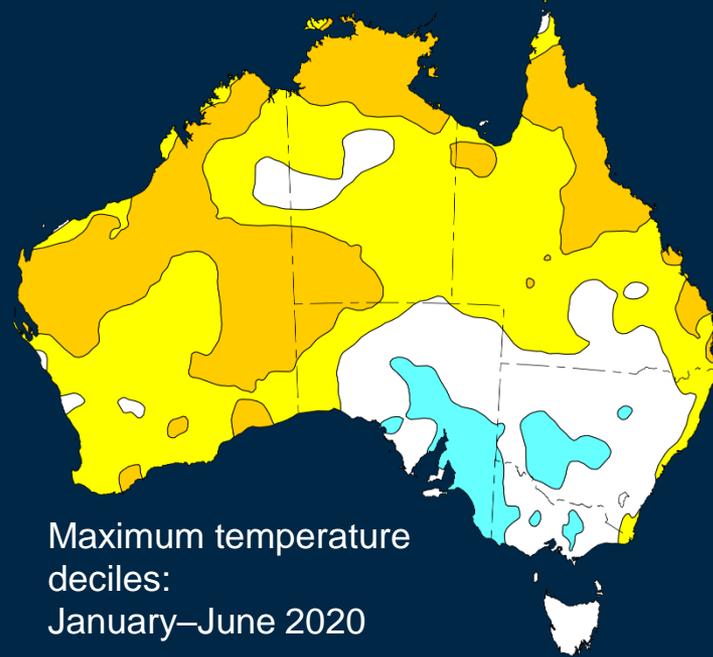
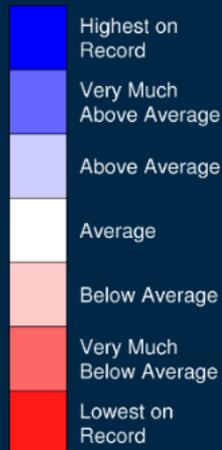
- Drought conditions which worsened during the year (peaking around December)
- Much warmer than average daytime temperatures

# Rainfall and maximum temperatures

Recent conditions (2020)



Rainfall deciles:  
January–June 2020



Maximum temperature  
deciles:  
January–June 2020

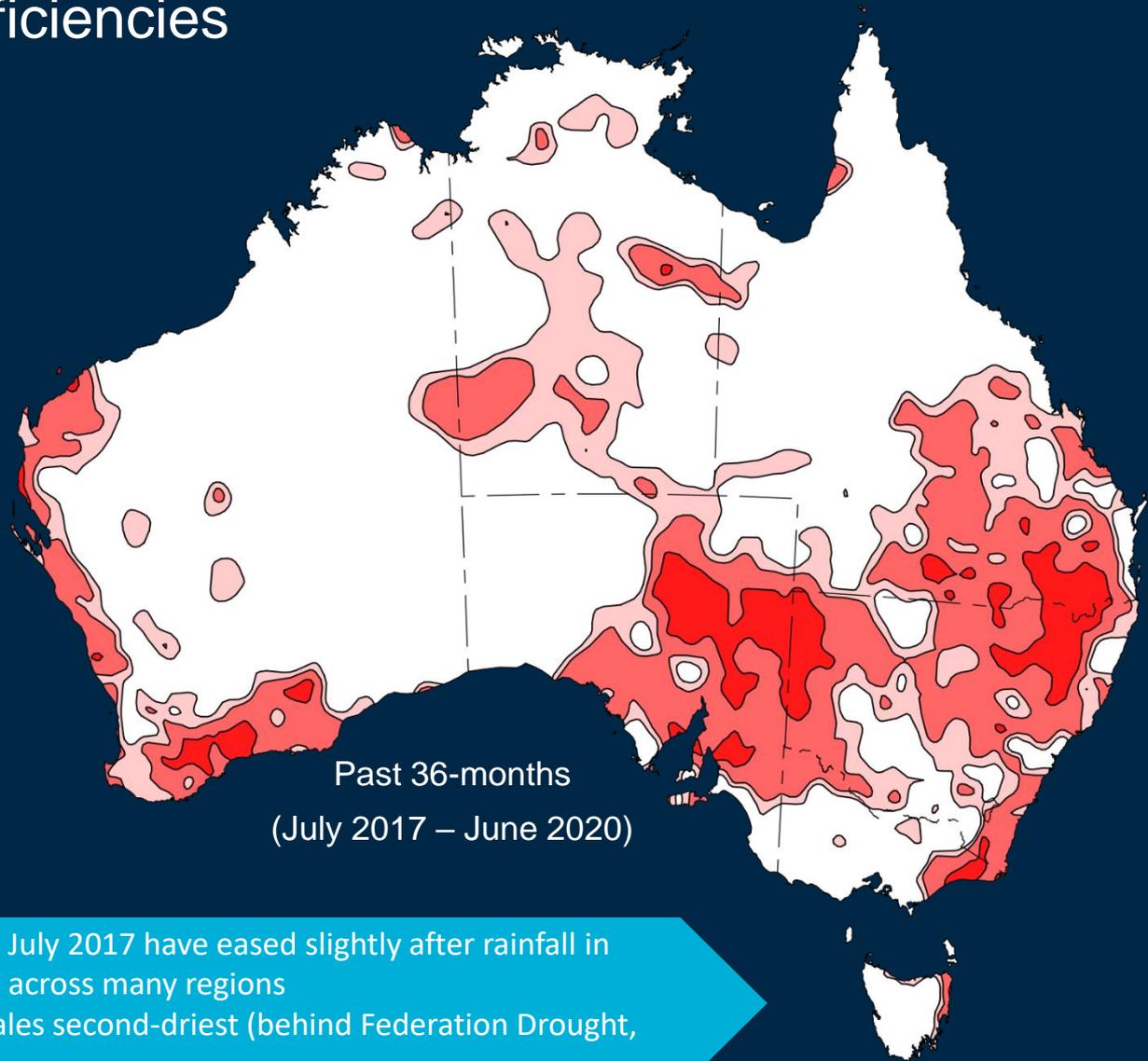


- Rainfall Jan-Jun 2020: Australia 3% below average | No states/territories in highest or lowest 10 on record
- Maximum temperature Jan-Jun 2020: Aust 0.95 °C above average – 9<sup>th</sup> highest on record | WA 5<sup>th</sup> highest | no other states/territories in highest/lowest 10 on record

# Long-term rainfall deficiencies



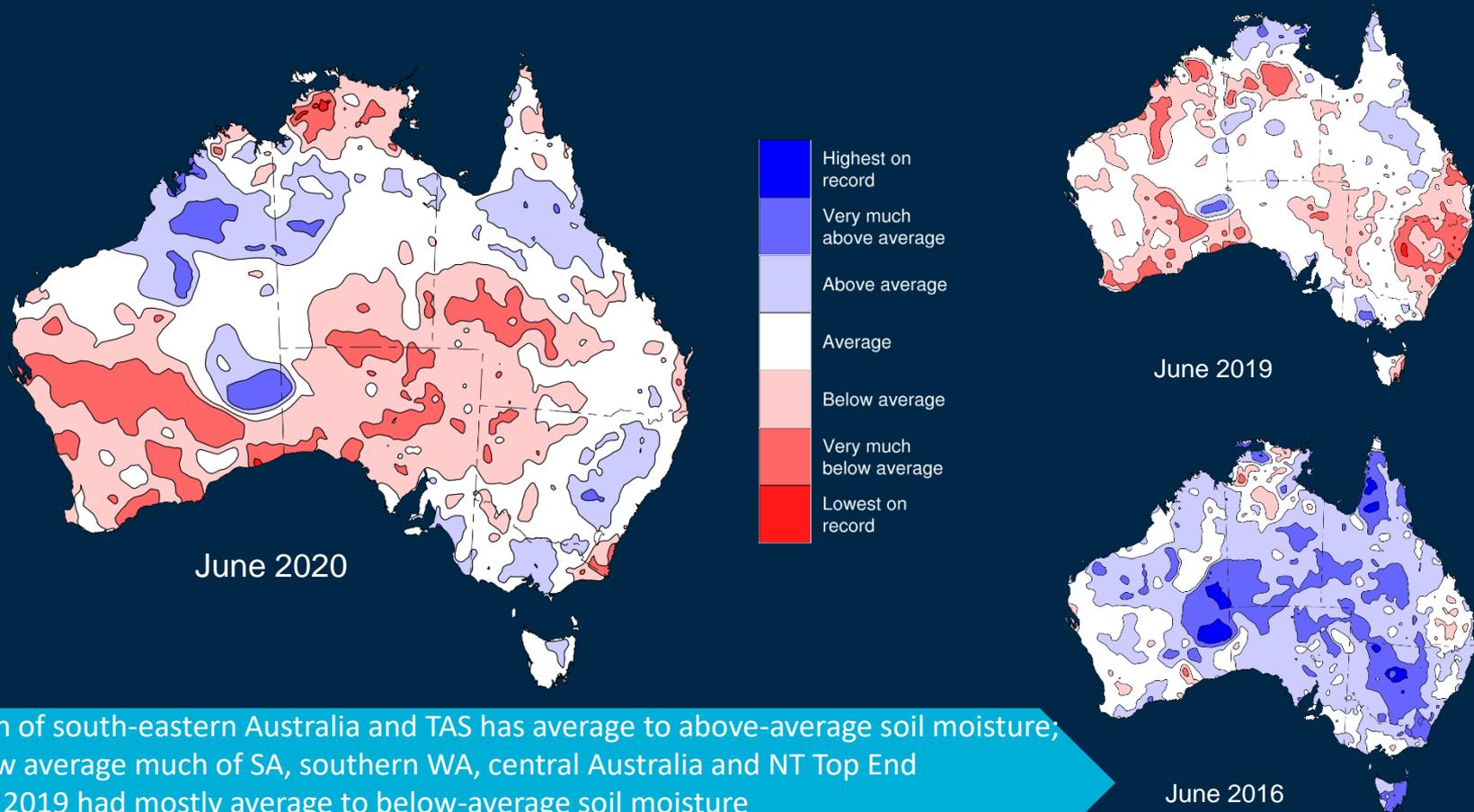
Compared to 1900-2020



- Rainfall deficiencies for the period since July 2017 have eased slightly after rainfall in early 2020, however deficiencies remain across many regions
- Murray-Darling Basin and New South Wales second-driest (behind Federation Drought, 1900-1903) for the 36-month period

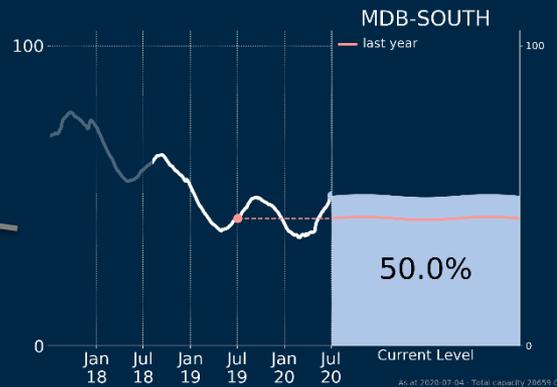
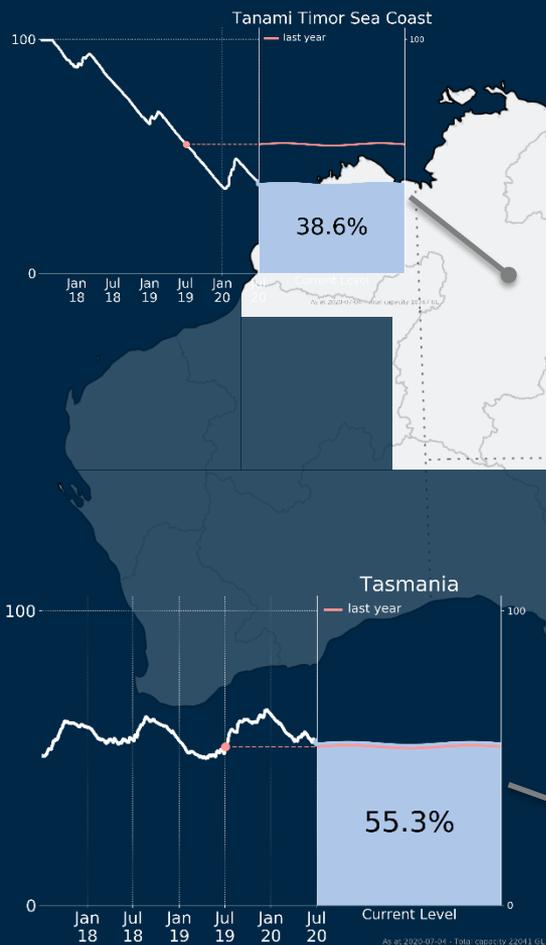
# Root Zone Soil Moisture

Recent conditions (0-100 cm below surface)



- Much of south-eastern Australia and TAS has average to above-average soil moisture; below average much of SA, southern WA, central Australia and NT Top End
- June 2019 had mostly average to below-average soil moisture
- 2016 was the last calendar year with widespread above-average rainfall

# Water storage levels



Date captured: 6 July 2020

# Climate influences summary

Global oceans remain very warm

- Largely the global warming trend
- Land temperatures above average across all outlook periods

## El Niño-Southern Oscillation (ENSO)

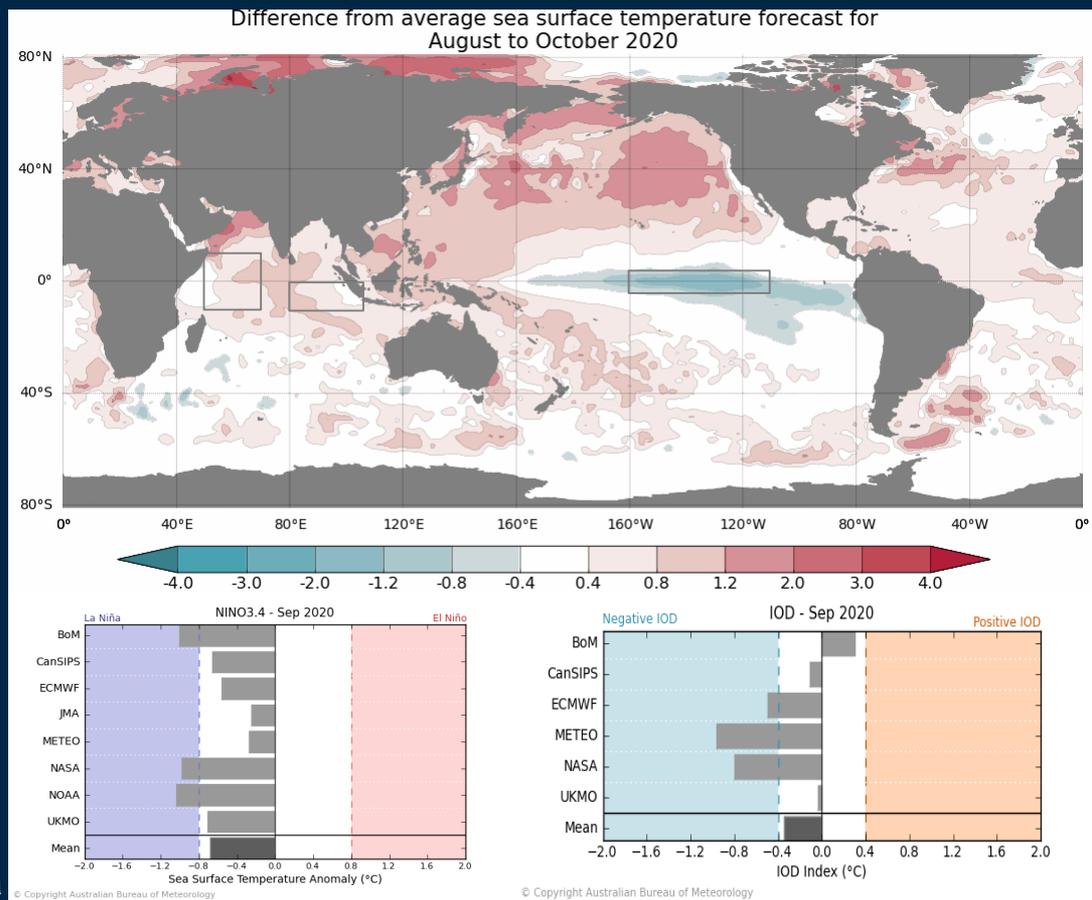
- ENSO currently neutral (neither El Niño nor La Niña)
- About half of surveyed models (NINO3.4) indicate La Niña may occur during spring
- La Niña assessed as having 50% chance of developing in 2020 (La Niña WATCH)

## Indian Ocean Dipole (IOD)

- IOD currently neutral
- About half of surveyed models indicate negative IOD may develop during spring

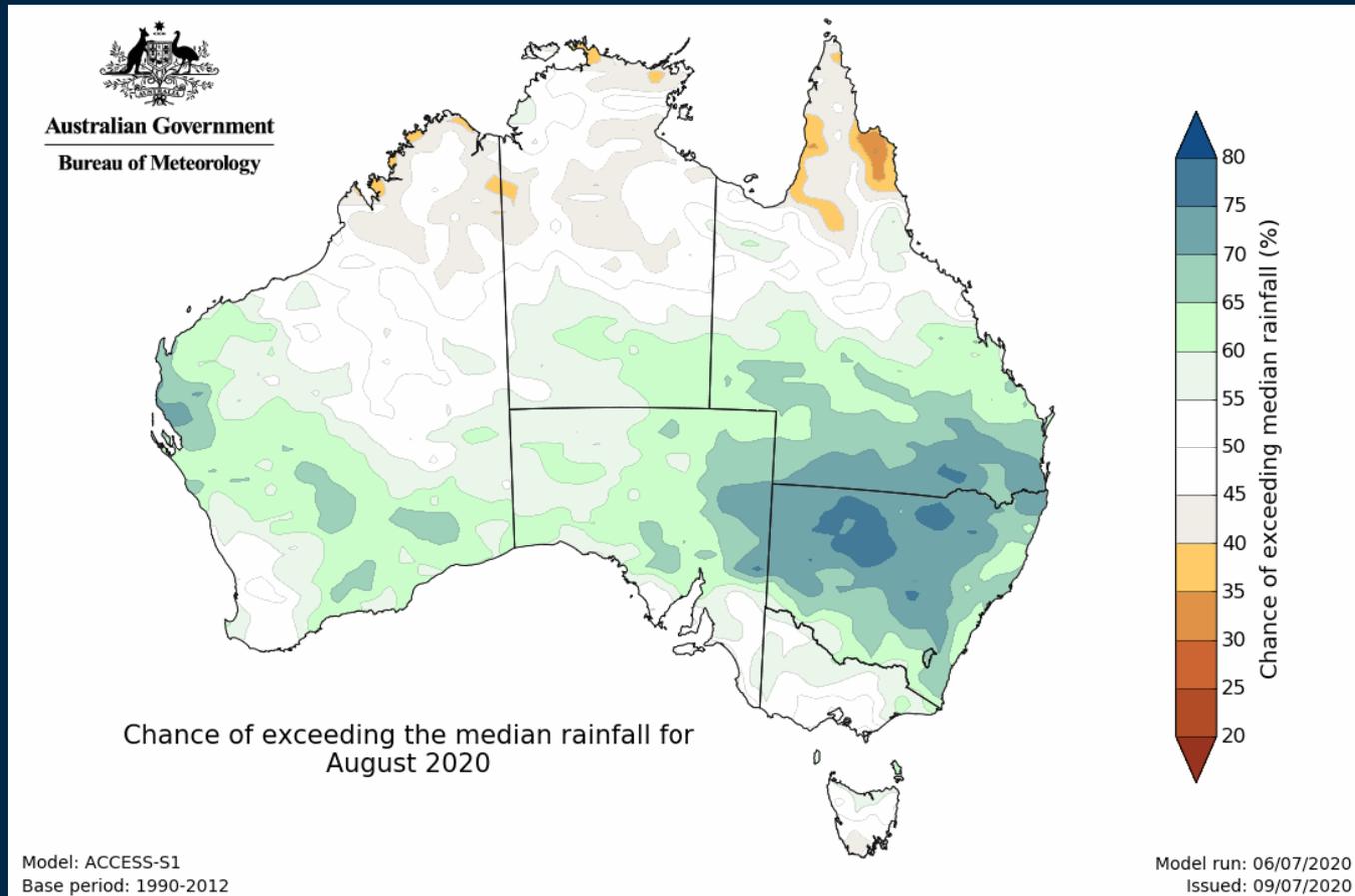
## Southern Annular Mode (SAM)

- SAM currently neutral
- Anomalously high MSLP around E/SE Australia may act to suppress rainfall



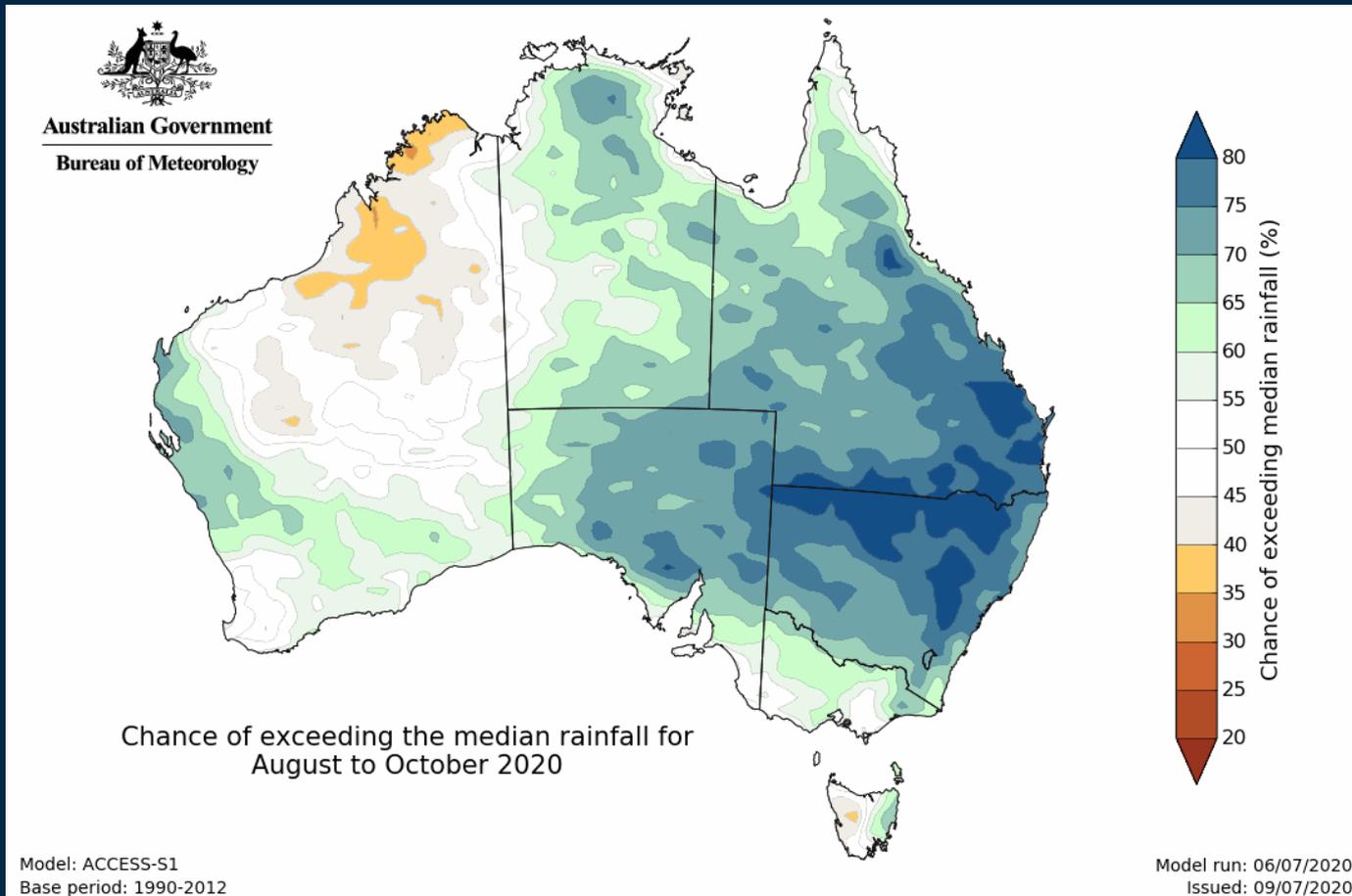
Forecast Conditions

# August 2020 outlook



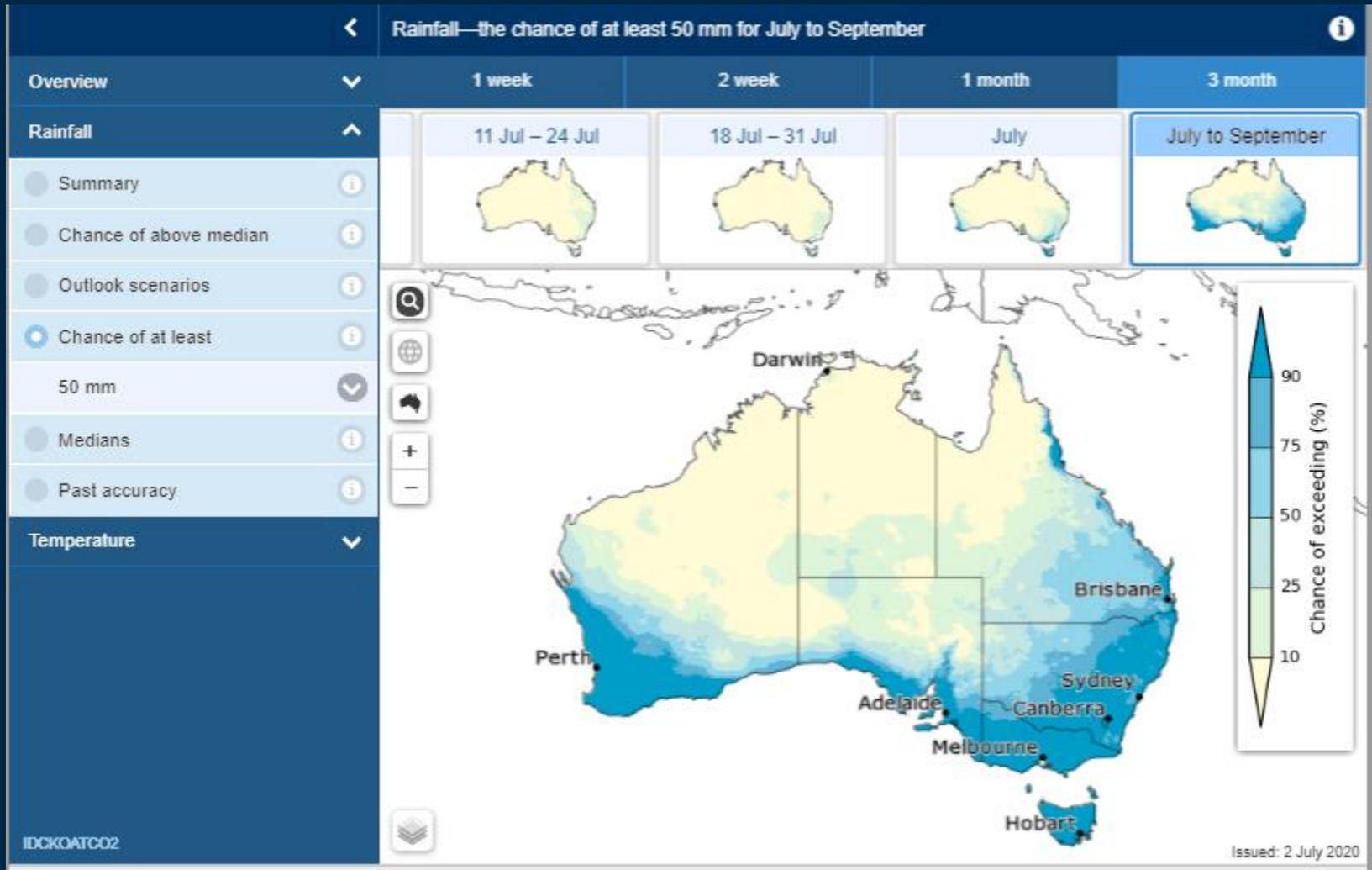
- High chance above-median daytime temperatures northern Australia
- High chances of above-median overnight temperatures most of Australia
- Rainfall likely to be near median across northern Australia (low rainfall period); above-median rainfall southern QLD and central Australia

# August–October 2020 outlook (season 1)



- High chance above-median daytime temperatures northern Australia
- High chances of above-median overnight temperatures
- Rainfall likely to be above median, except for parts of northern WA

# Chance of getting at least a certain amount of rainfall



# Thank you

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# WELLBEING AFTER THE RAINS

Wellbeing in drought recovery – what the research says

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Jacki Schirmer

DISTINCTIVE BY DESIGN

HEALTH



UNIVERSITY OF  
CANBERRA



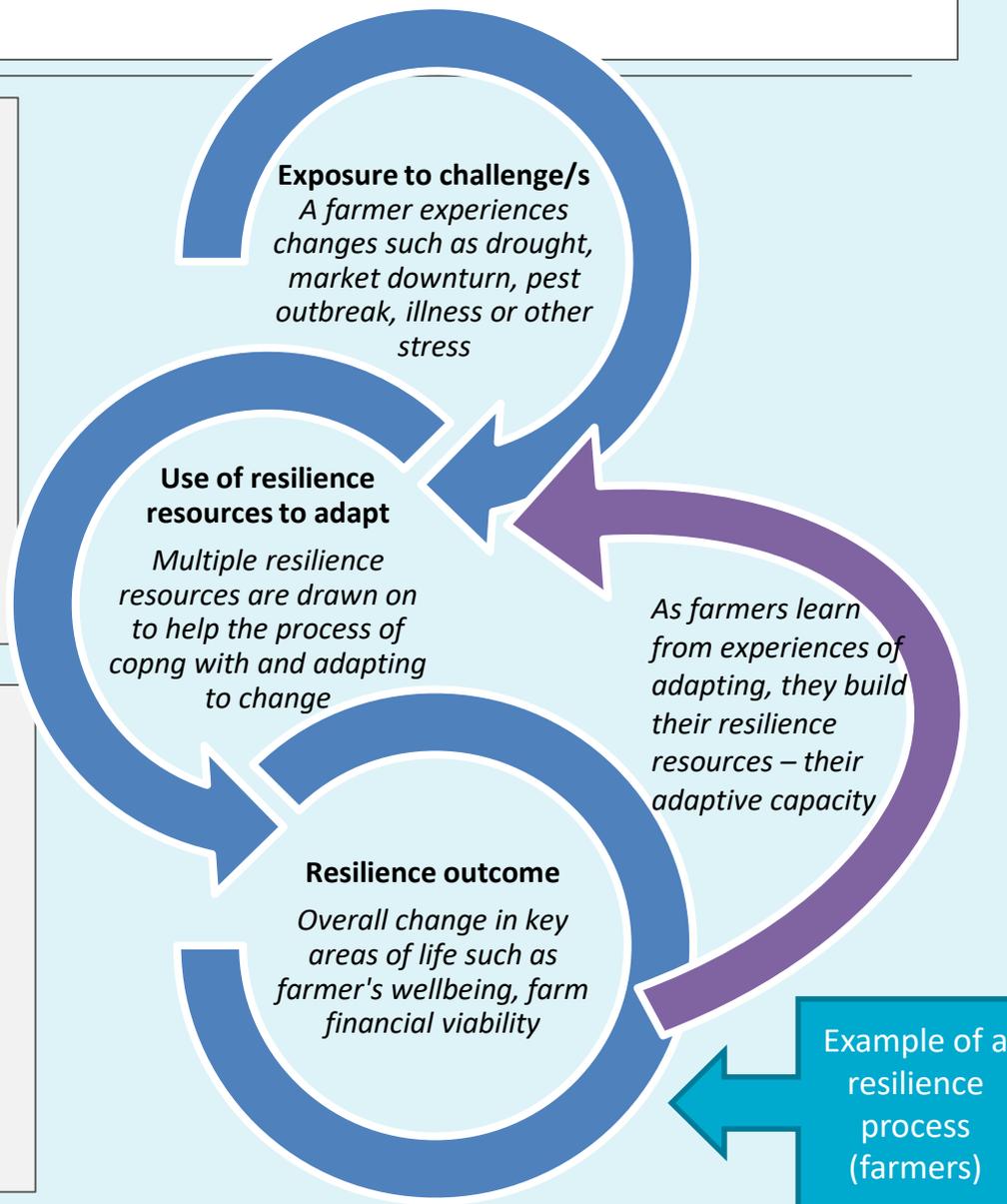
HEALTH RESEARCH  
INSTITUTE

# WELLBEING and RESILIENCE – what are we talking about?

**Individual wellbeing:** *“Mental health is a state of well-being in which every individual realizes his or her own potential, can cope with the normal stresses of life, can work productively and fruitfully, and is able to make a contribution to her or his community ...”* – **World Health Organization, 2013**

**Resilience:** *the ability of a person, household or community to successfully adapt to adversity and to capitalise on opportunities* (Luthar et al. 2003, Magis 2010).

Resilience is a process and changes over time – it’s not fixed. Can increase, and can decrease



# 'AFTER THE RAIN' – WHAT DOES THAT MEAN?



## What is 'after the rain'?

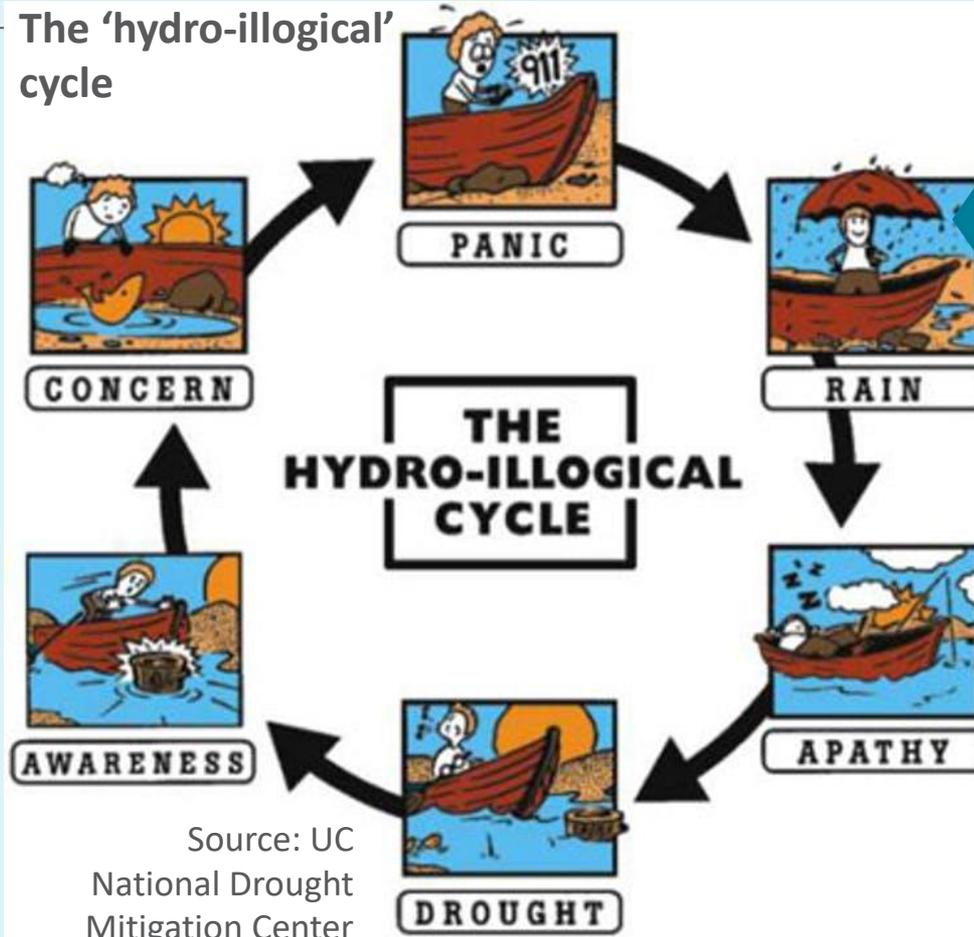
Implies rain is 'back to normal' ... but ...

- Takes many months (or years) for a region to exit rainfall deficiency
- End of drought very different for different people
  - Houseboat operator in SA waits months for river flows to reach bottom of catchment after 'drought ending rains'
  - Irrigator waits to get allocation in next water year
  - Many more examples

# “AFTER THE RAIN” IN THE PUBLIC MEDIA

There is an assumption that rain = end of impacts of drought

The ‘hydro-illogical’ cycle



Effects of drought going. Drought-affected communities can feel forgotten/ isolated as attention to drought & support falls.

Source: UC National Drought Mitigation Center

# COMMON WELLBEING/RESILIENCE CHALLENGES 'AFTER THE RAINS'

*Quote paraphrased from common issues raised in past studies*

*“It felt like everyone was celebrating and I was the only one still struggling”*

Regional Wellbeing Survey data suggest it is common for drought 'recovery' to take anything from 2 to 6 years, depending on a person's circumstances

Feelings of isolation can increase

We need realistic expectations of people after drought – recovery is a long-term process.

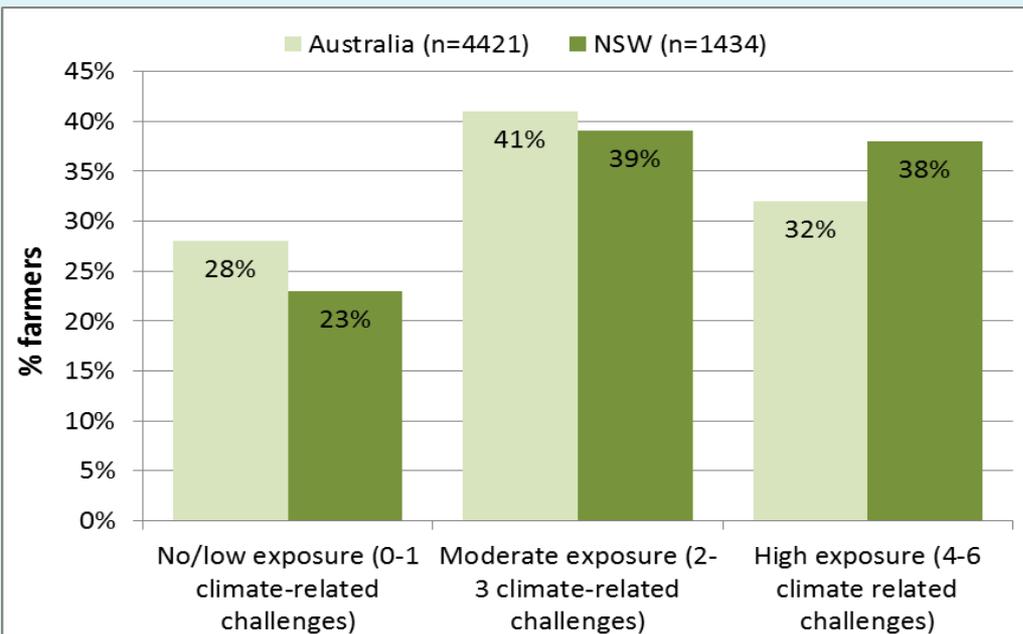
# COMMON WELLBEING/RESILIENCE CHALLENGES 'AFTER THE RAINS'

Quote paraphrased from common issues raised in past studies

*"The rain came and then we were hit by floods/ fire/ pest outbreak"*

The effects of drought often make the impacts of subsequent floods, fire, pest outbreak worse.

'Cumulative' events are surprisingly common.



Farmers across Australia were asked whether in the last 5 years they had experienced 1) drought, 2) cold snap, 3) heatwave, 4) bushfire, 5) severe storm causing damage, 6) floods. Drought most common – and most experienced *at least* two other climatic events in a five year period.

*Source: Regional Wellbeing Survey*

# CUMULATIVE EVENTS HAVE BIG IMPACTS ON WELLBEING

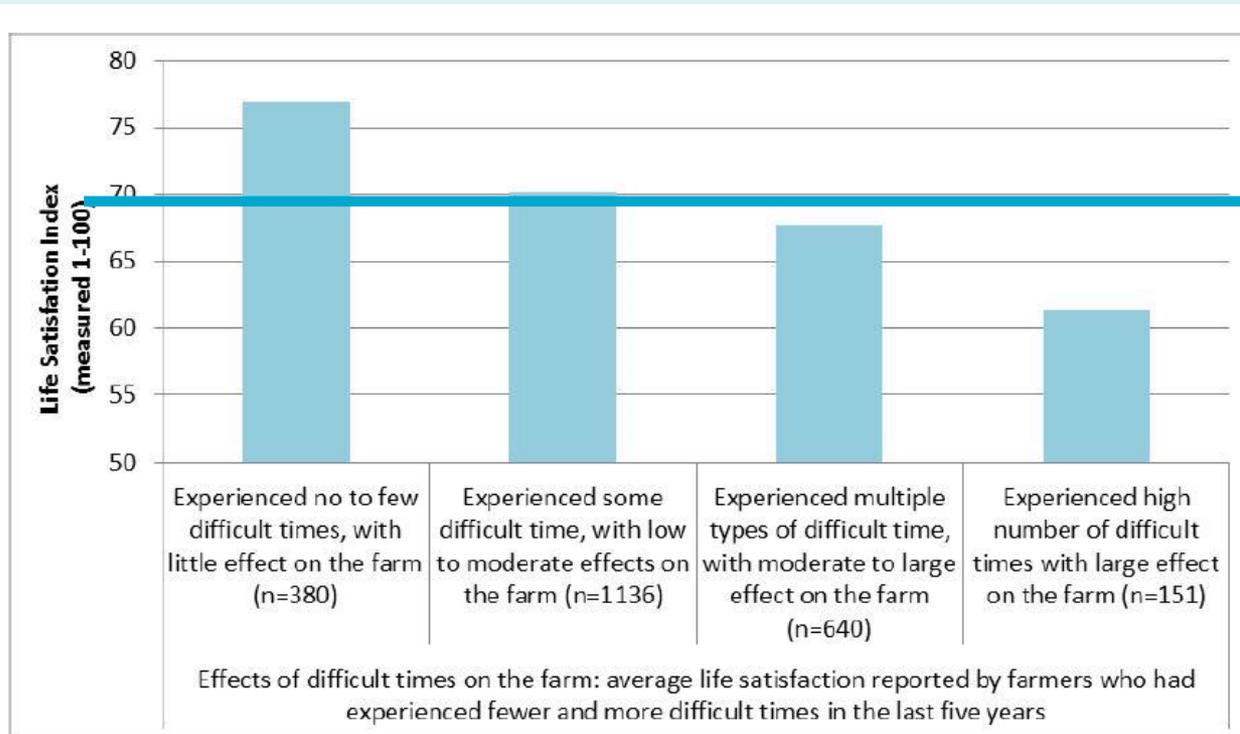


Figure 10.3 Life satisfaction index scores for farmers who reported experiencing different amounts of difficult times on their farm in the last five years

Australian farmers who experienced only one or two challenges had pretty good wellbeing.

Wellbeing was much lower for those who had to cope with multiple difficult times, each of which impacted their farm.

Source: 2013 Regional Wellbeing Survey;

# COMMON WELLBEING/RESILIENCE CHALLENGES 'AFTER THE RAINS'

*Quote paraphrased from common issues raised in past studies*

*"I was so tired and there were so many decisions I needed to make"*

More decisions need to be made

If drought has been impacting your wellbeing, it's often harder to make decisions

The uncertainty of whether the drought has really often makes these decisions harder

Sometimes, decisions are 'make or break' ones

# COMMON WELLBEING/RESILIENCE CHALLENGES 'AFTER THE RAINS'

*Quote paraphrased from common issues raised in past studies*

Support programs often withdrawn before many people are financially stable

Similarly, mental health programs often see reduced funding before recovery complete – at a time when many experience as many or more challenges as they did before the rains came

Charities face difficulties – donations reduce; and they may be criticised if they hold onto funds during drought to ensure some funding is available later

*“The support dropped off even though we were still doing it just as hard - we were forgotten”*

# SUPPORTING WELLBEING AND RESILIENCE

## After the rains

I'm the only one struggling

Create space for people to share what they are experiencing – so they don't feel they are the only one still finding it hard.

Cumulative events

Provide support to those in need, irrespective of what caused that need (instead of people having to apply for drought support under one program, flood support under another).

Withdrawal of support

Support long-term community organisations to keep providing support as drought-specific support withdraws.

Fatigue and decision making

Support to work through decision options. Those who see business planners, Rural Financial Counselling Service, often report this helps. Support to plan for 'after the rains' when still in drought.

Being forgotten

Keep celebrating the ongoing work & spirit of those recovering from drought. Ensure the long-term nature of recovery is acknowledged.



University of  
South Australia

Department of  
Rural Health



**ifarmwell.com.au**  
growing farmers' wellbeing

## Wellbeing after the rains

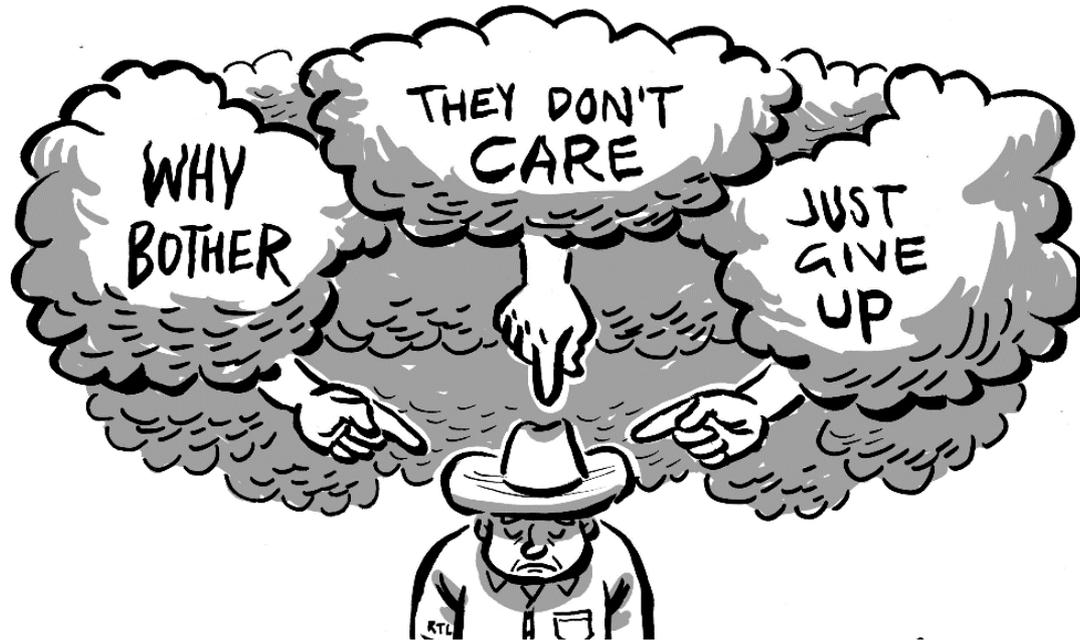
Dr Kate Gunn, Clinical Psychologist, Research Fellow, Founder  
[www.ifarmwell.com.au](http://www.ifarmwell.com.au)

# Be realistic

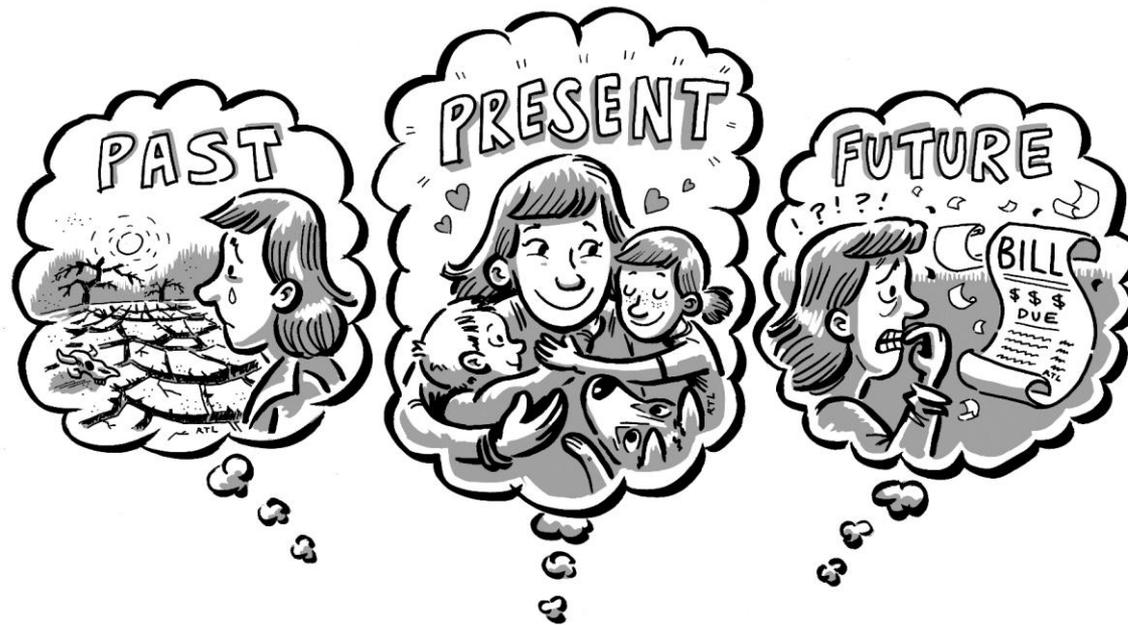
Your mind is an  
**IDEA GENERATOR!**



Not everything your mind says to you is **true**



What **you choose** to focus your attention on, influences how you feel

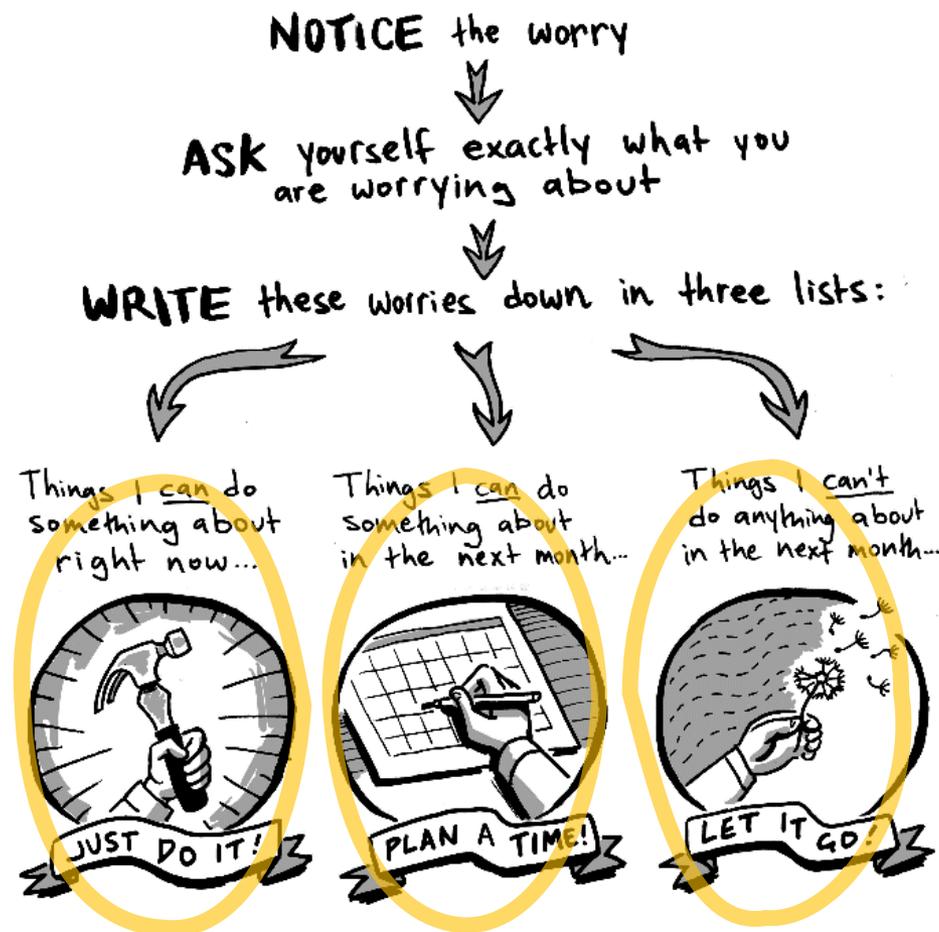


Notice what  
your mind says  
to you

and

if it is helpful  
to focus on it

(or not)



# Use your **senses** to get out of your mind and in to your life



VISION



HEARING



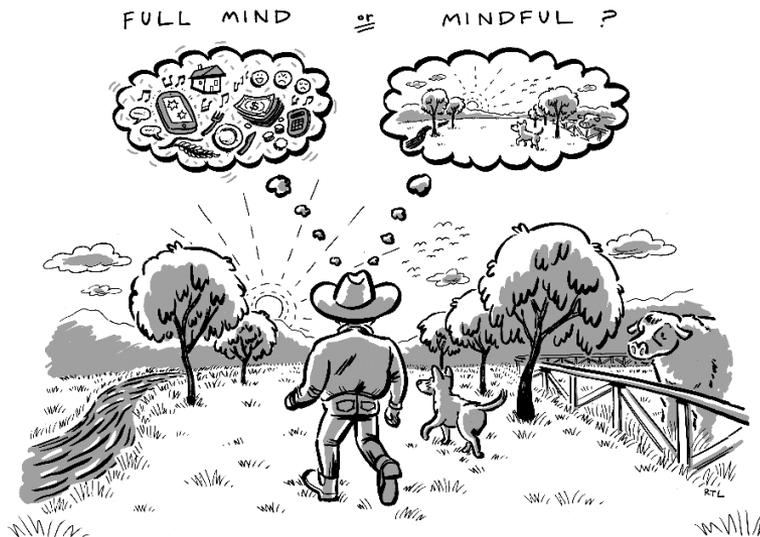
SMELL



TASTE



TOUCH



## and to help you **pay attention to positive changes in the landscape**

# Reflect on what you are likely to be proud that you **did** and **stood for**, when you are old

Adventure

Appreciation

Adaptability

Caring for others

Creativity

Courtesy

Dependability

Fairness

Family

Fitness

Friendship

Fun

Generosity

Genuineness

Growth

Health

Helpfulness

Honesty

Independence

Humour

Leisure

Loving

Non-conformity

Openness

Power

Responsibility

Risk

Self-acceptance

Service

Simplicity

Spirituality

Tolerance

Tradition

Wealth

Humility

Flexibility

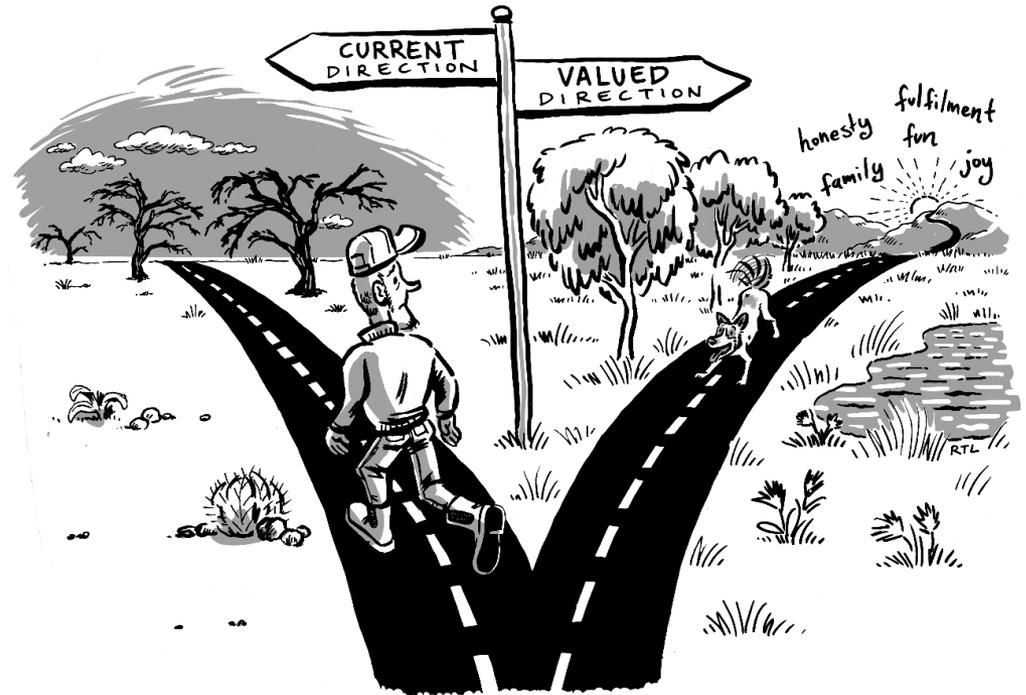
Forgiveness

Ecology

Fame

Contribution

Plan out what you can do in the next week and next month, and deliberately put your attention on doing more of these things right NOW!



Take a break if you can

Connect with family and friends



Reach out if you need a hand, chat or other ideas

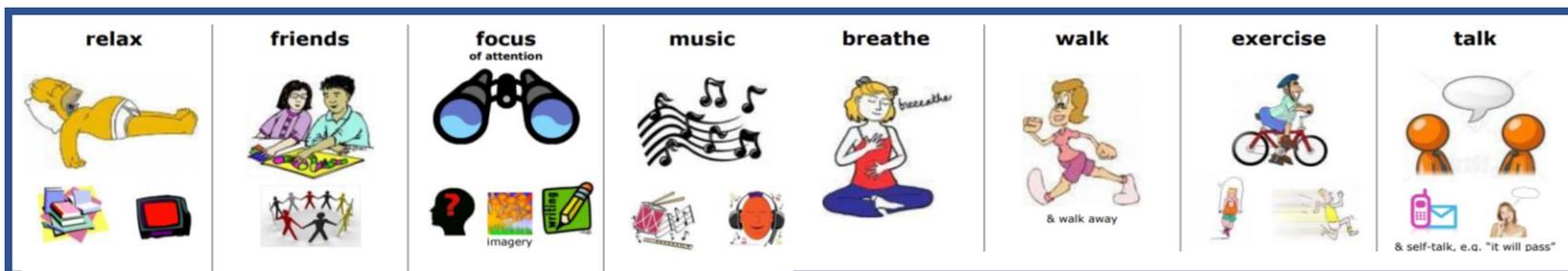


Please view this video here:

<https://www.ifarmwell.com.au/what-to-do-in-a-crisis/>

# How to lend a helpful hand (or ear) to others

- ✓ Ask them about **how they are** [coping] [sleeping] [feeling/going since...]
- ✓ **Listen carefully** without interrupting. Respect their feelings and opinions, even if you don't agree with them
- ✓ Ask them about **what they are already doing** to help themselves manage
- ✓ **Praise them up** for things they are doing that are likely to be helpful



- ✓ If necessary, ask them if they have **considered using [service/program]**
- ✓ **Tell them a positive story** about [the service/program] if you can
- ✓ **Follow up at a later date** to see how they are travelling
- ✓ **Don't try to solve other people's problems on your own** (not good for either of you)



“ Never be afraid to speak to those who you feel are in need.

Always remember the power of the simple smile, a helping hand, a listening ear and a kind word. ”

*Don Richie*



# Questions!



# ARC Drought Resilience Program

- Support the Supporter
- Psychological First Aid
- Resilient Leaders
- Mentor Program
- Farm First Aid
- Outreach
- Expert advice
- Wellbeing resources



# Thankyou!

- Recordings and Registering: <https://bit.ly/2MqY7ez>
- Questions: [drought@redcross.org.au](mailto:drought@redcross.org.au)
- Next Webinar: . Family wellbeing in the face of drought and ongoing stress (Wed 29 July)

