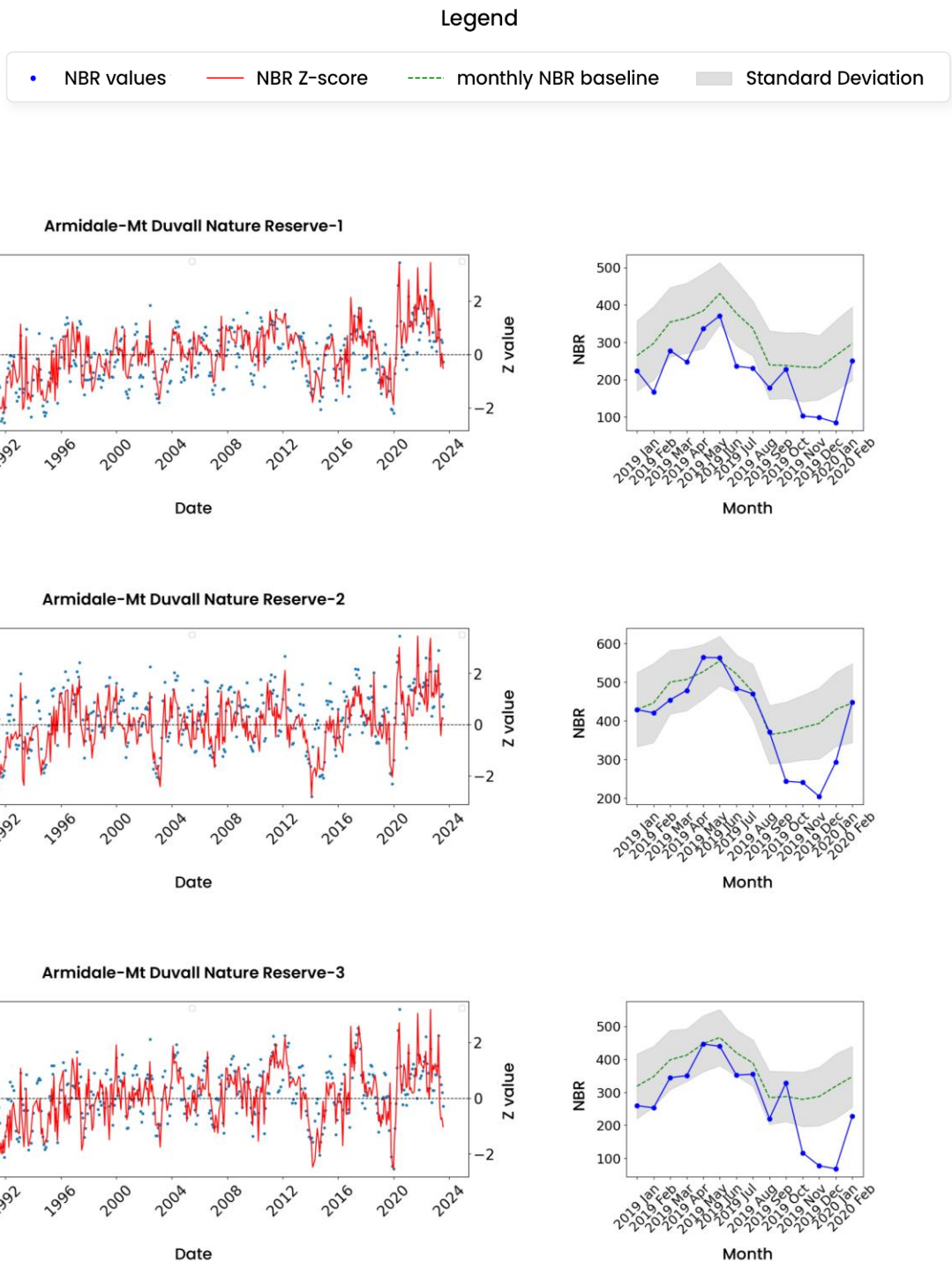
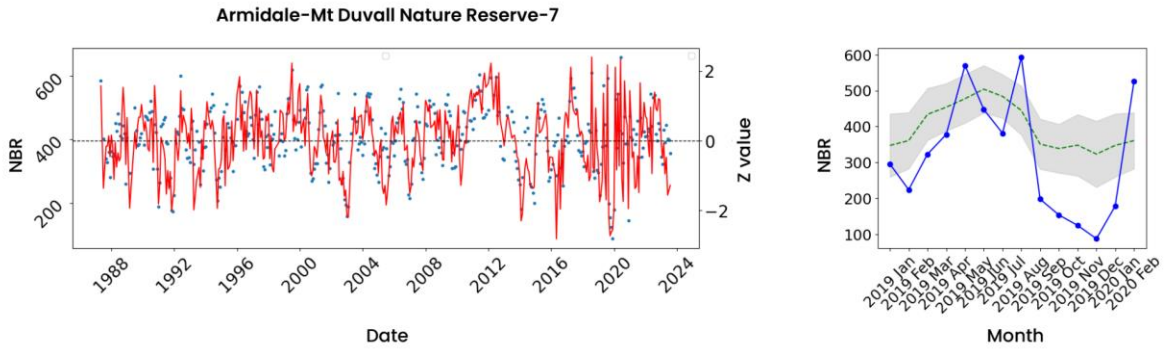
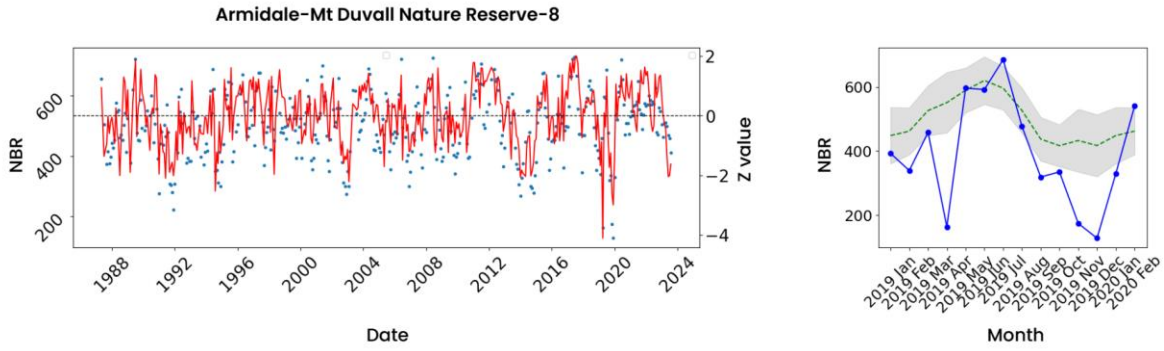
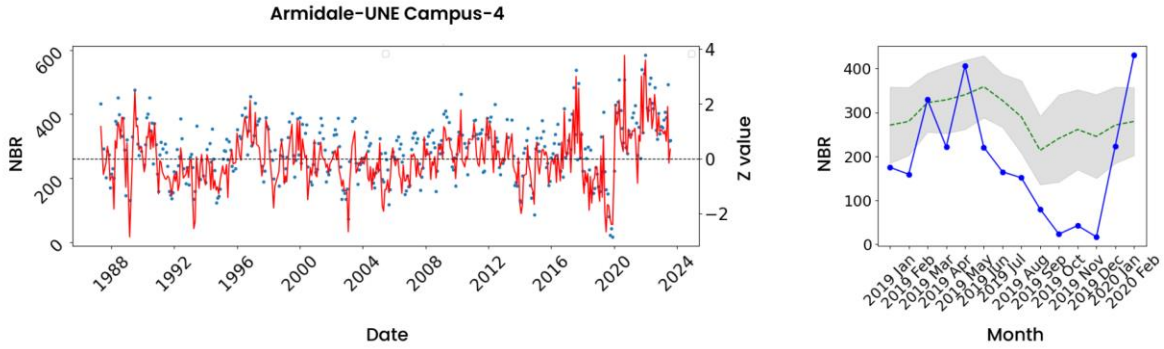
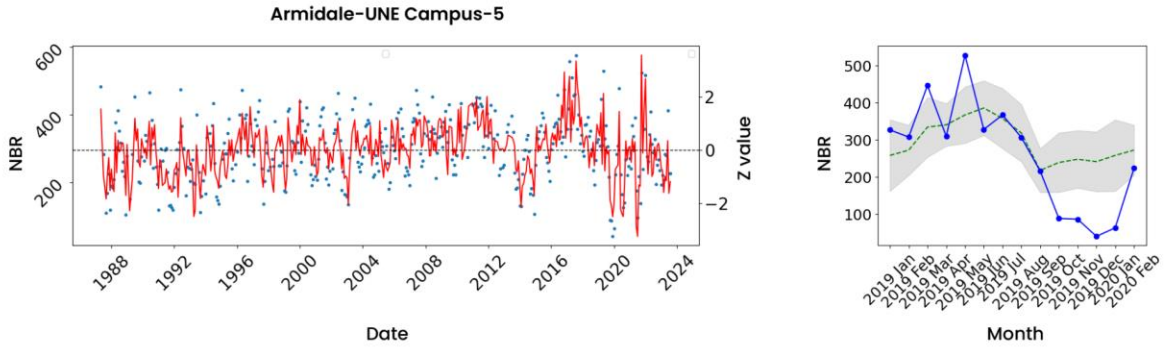
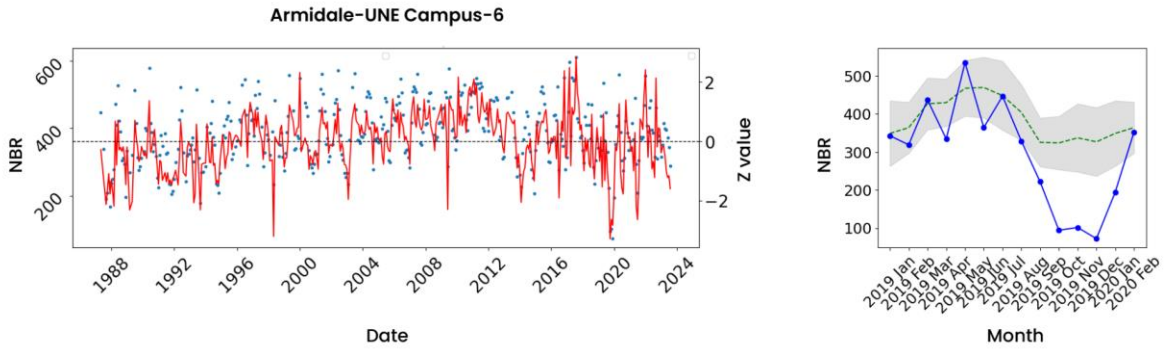

Legend
NBR values
NBR Z-score
monthly NBR baseline
Standard Deviation
Armidale-Mt Duvall Nature Reserve-1
NBR
Z value
Date
Month
Armidale-Mt Duvall Nature Reserve-2
NBR
Z value
Date
Month
Armidale-Mt Duvall Nature Reserve-3
NBR
Z value
Date
Month

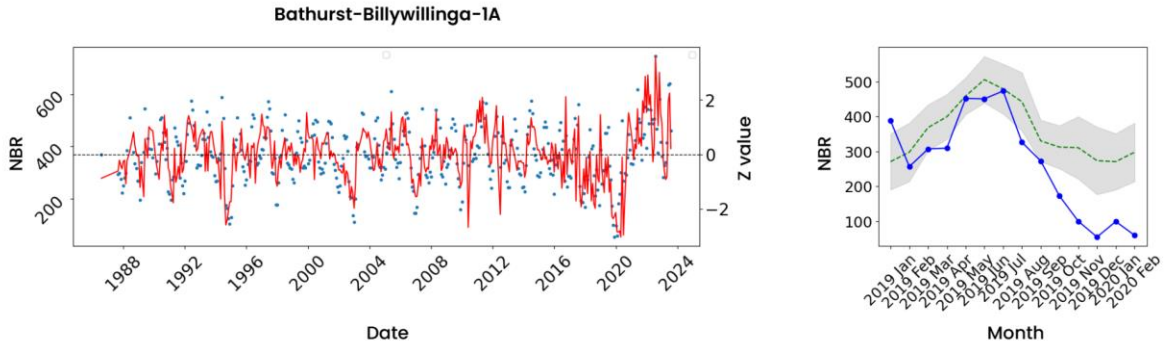

Armidale-Mt Duvall Nature Reserve-7
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Z value
Date
Month

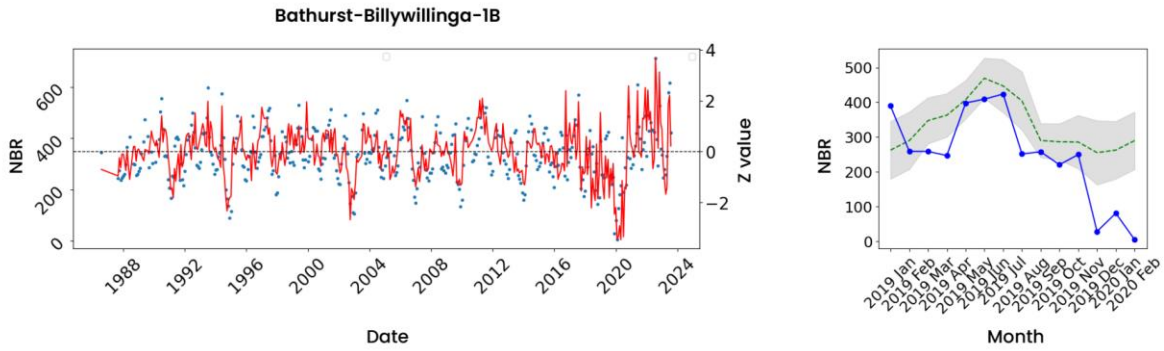

Armidale-Mt Duvall Nature Reserve-8
NBR
Z value
Date
Month

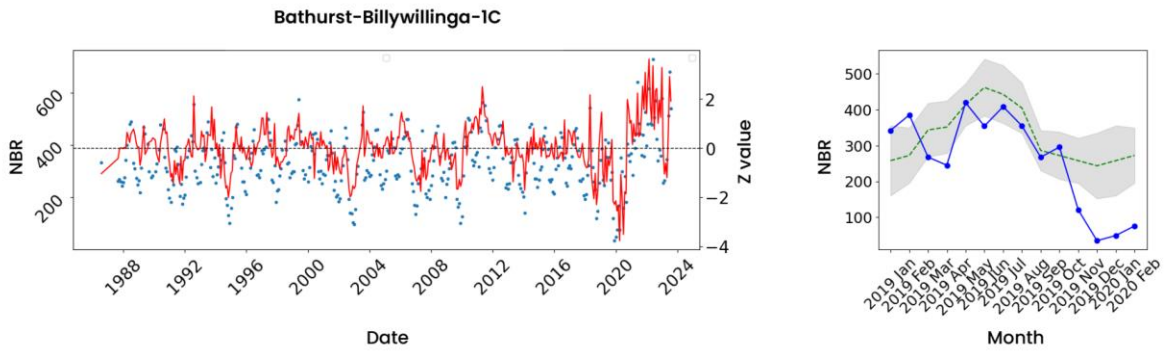

Armidale-UNE Campus-4
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Z value
Date
Month

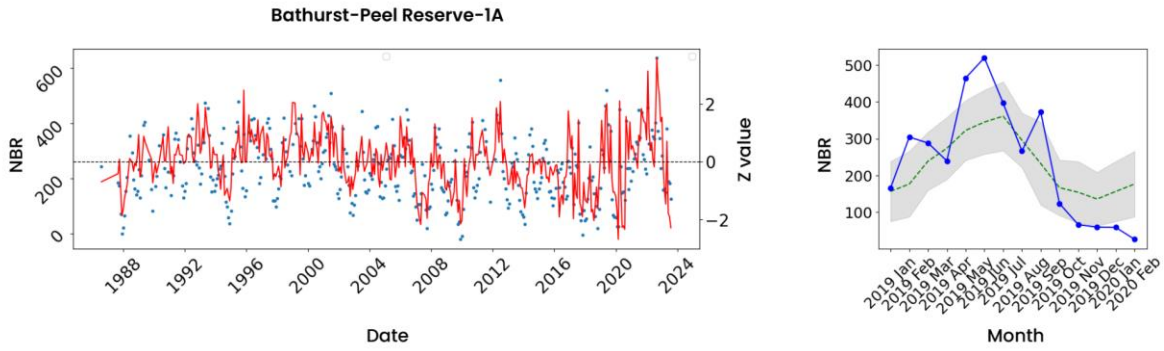

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NBR
Z value
Date
Month

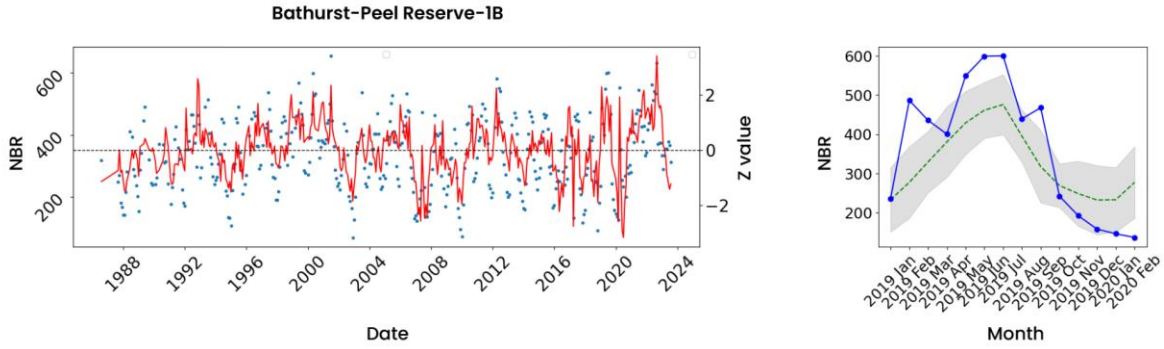

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Z value
Date
Month

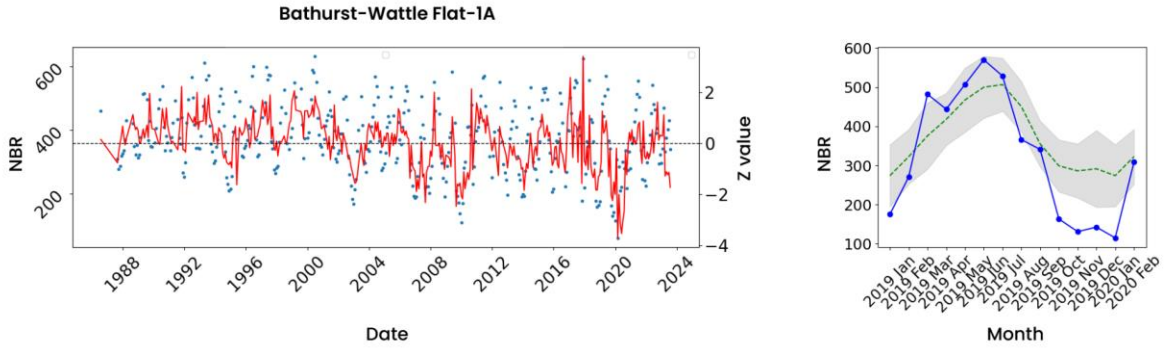

Bathurst-Billywillinga-1A
NBR
Z value
Date
Month

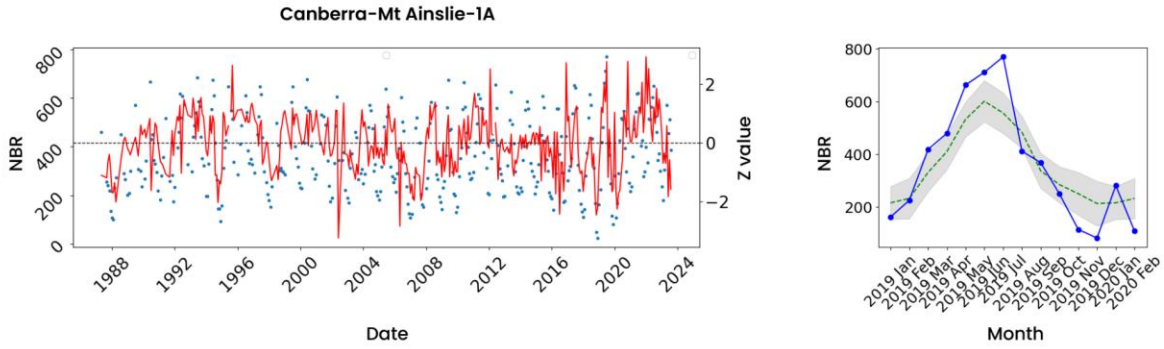

Bathurst-Billywillinga-1B
NBR
Z value
Date
Month

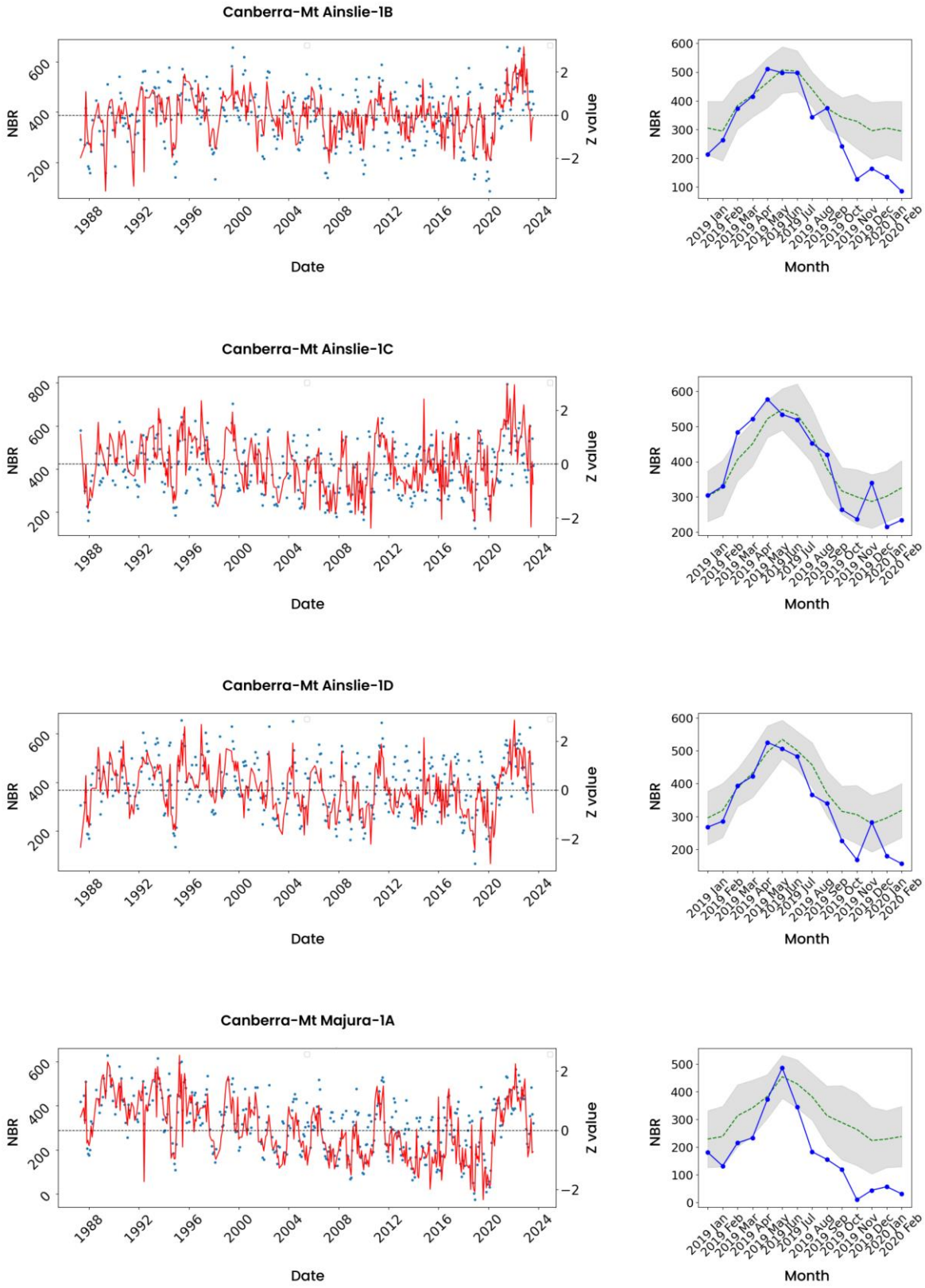

Bathurst-Billywillinga-1C
NBR
Z value
Date
Month


Bathurst-Peel Reserve-1A
NBR
Z value
Date
Month

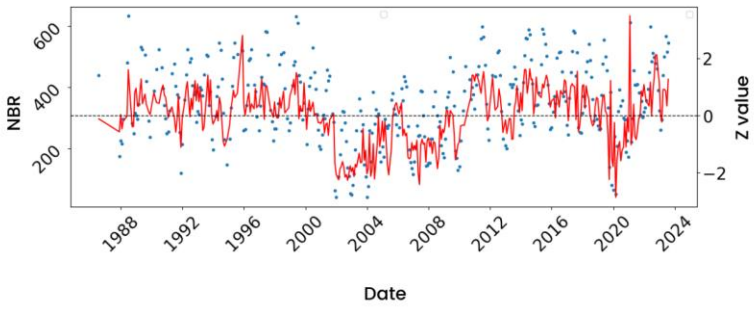

Bathurst-Peel Reserve-1B
NBR
Z value
Date
Month

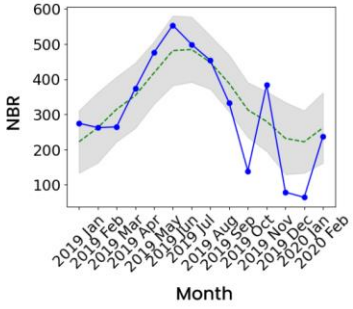

Bathurst-Wattle Flat-1A
NBR
Z value
Date
Month


Canberra-Mt Ainslie-1A
NBR
Z value
Date
Month

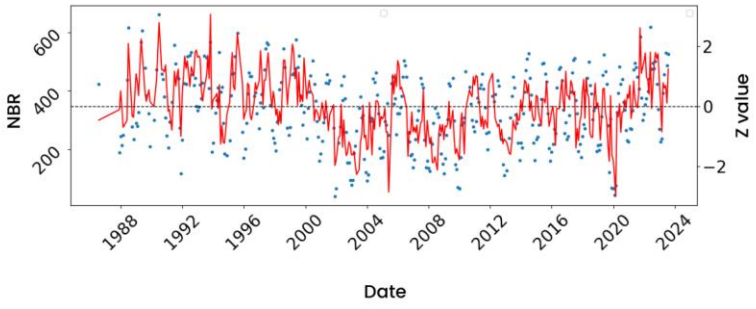

Canberra-Mt Ainslie-1B
NBR
Z value
Date
Month
Canberra-Mt Ainslie-1C
NBR
Z value
Date
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NBR
Z value
Date
Month
Canberra-Mt Majura-1A
NBR
Z value
Date
Month

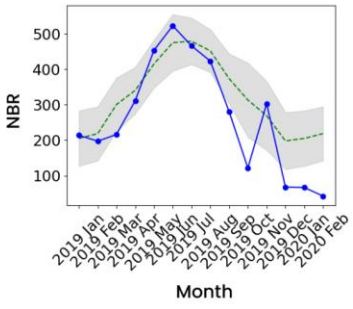
Eugowra-Eugowra Reserve-1A



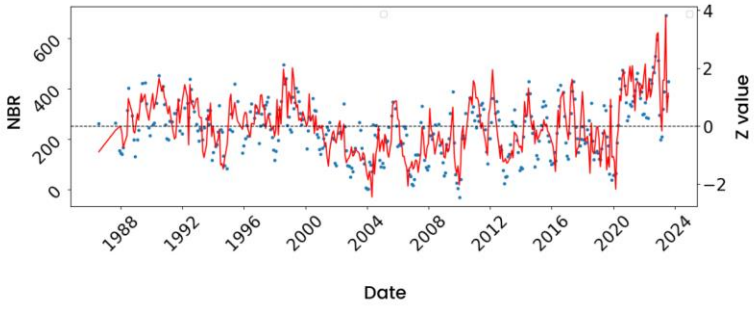


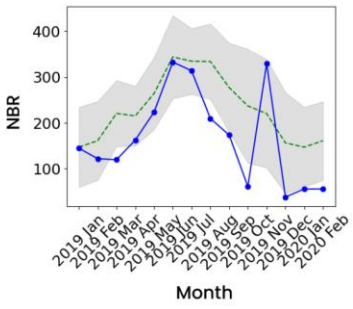
Eugowra-Eugowra Reserve-1B



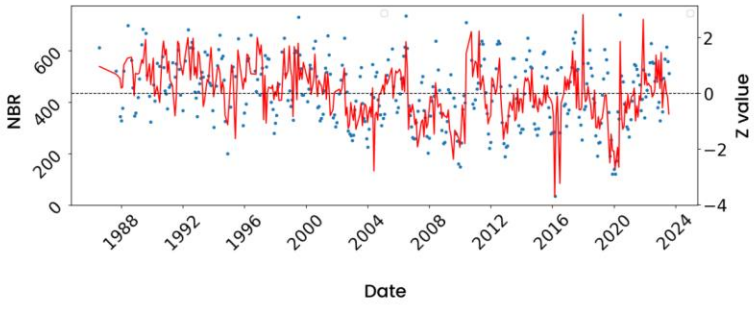


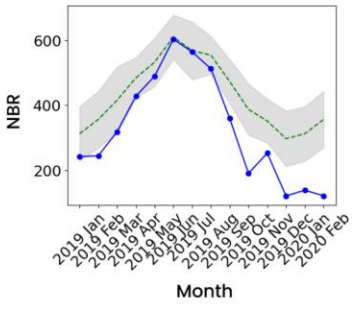
Eugowra-Nangar National Park-1A



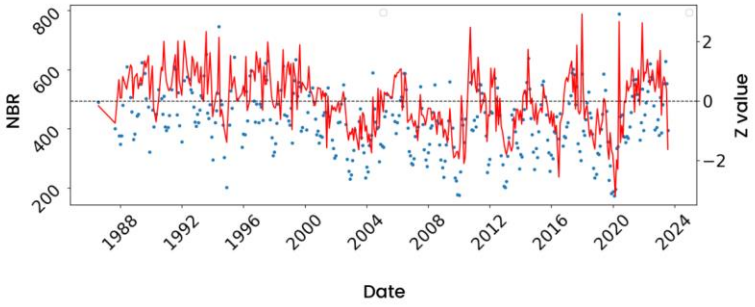


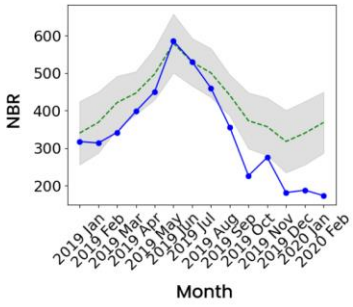
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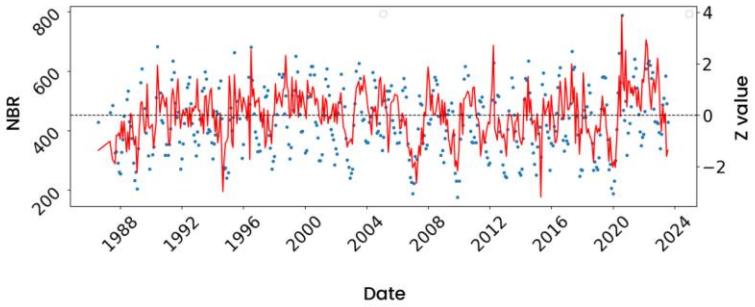


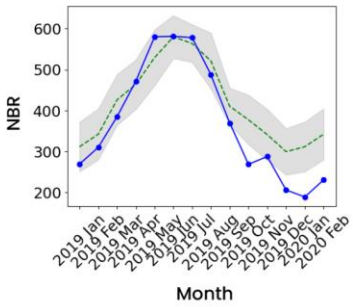
Eugowra-Nangar National Park-1C



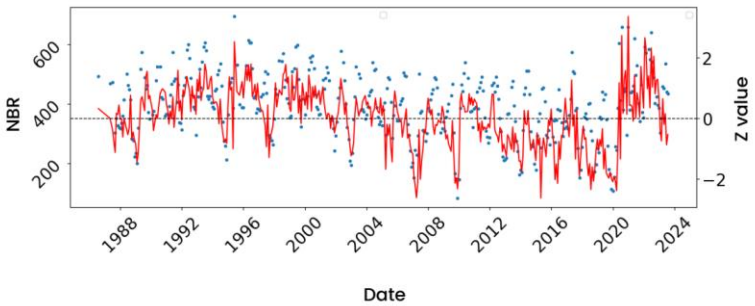


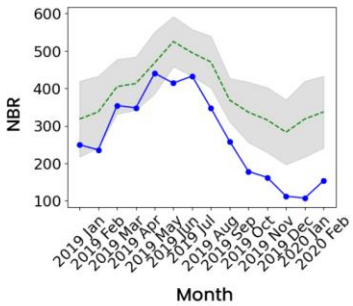
Mudgee-Mudgee, Henry Bayly Rd-1A



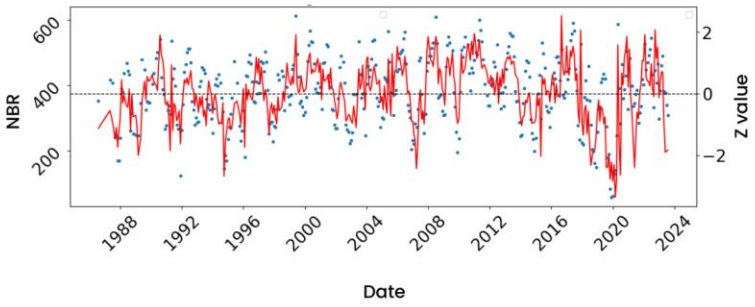


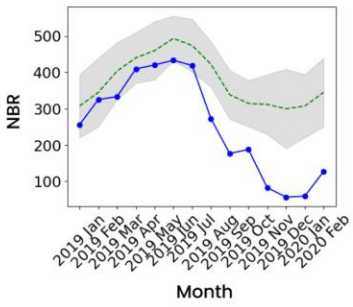
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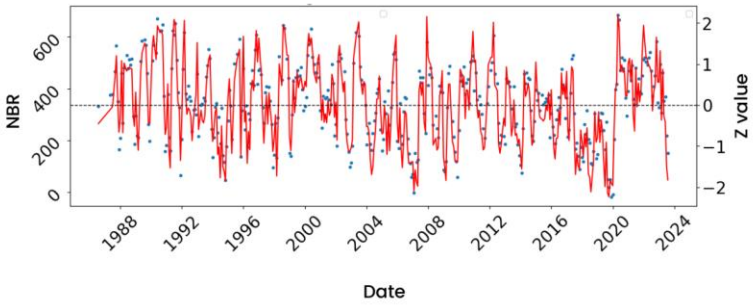


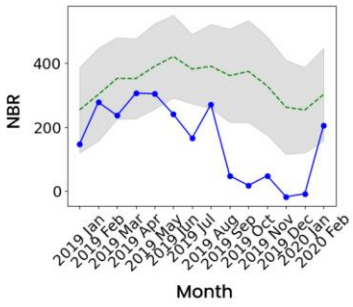
Mudgee-Mudhut Rd Site-1A



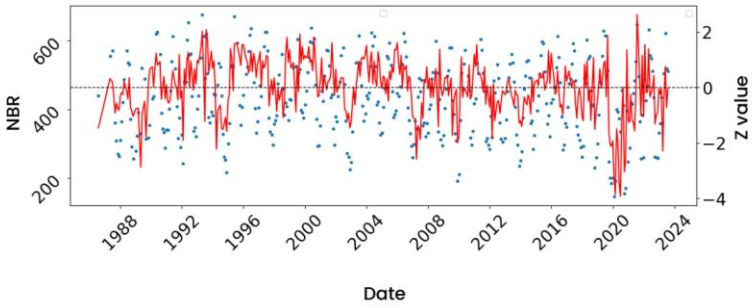


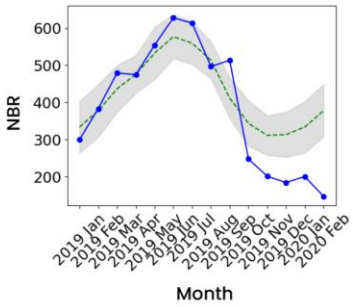
Mudgee-Mudhut Rd Site-1B



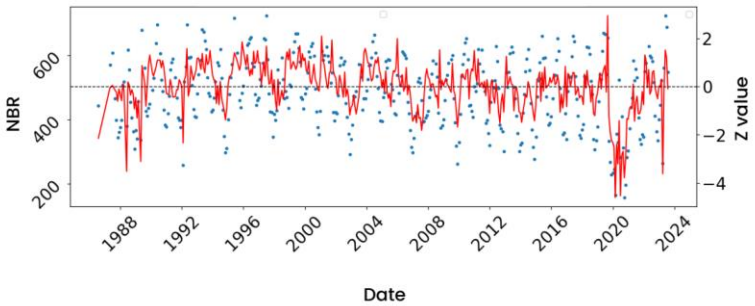


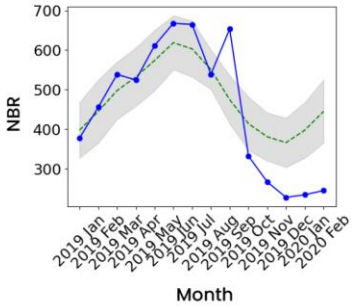
Mudgee-Munghorn gap nature reserve-1A



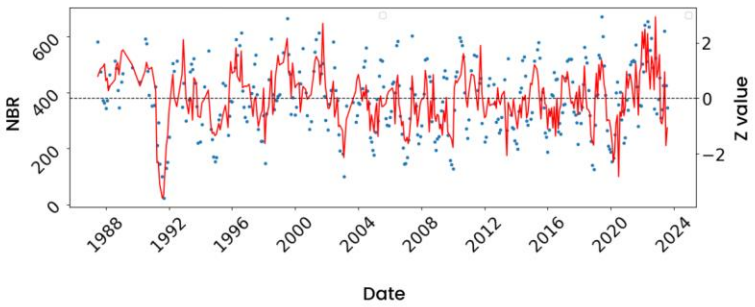


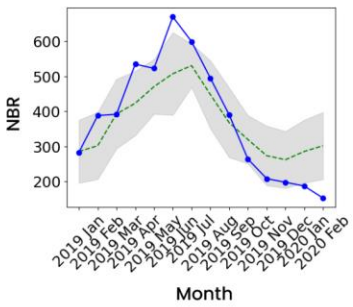
Mudgee-Munghorn gap nature reserve-1B



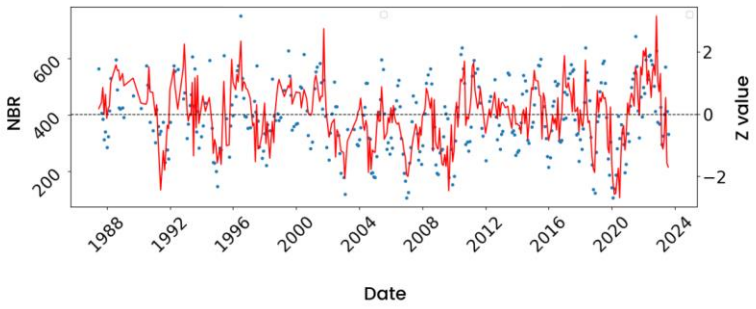


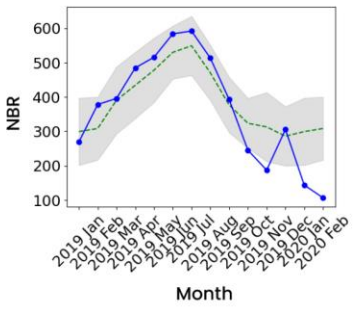
Southern Highlands-Goulburn-1A



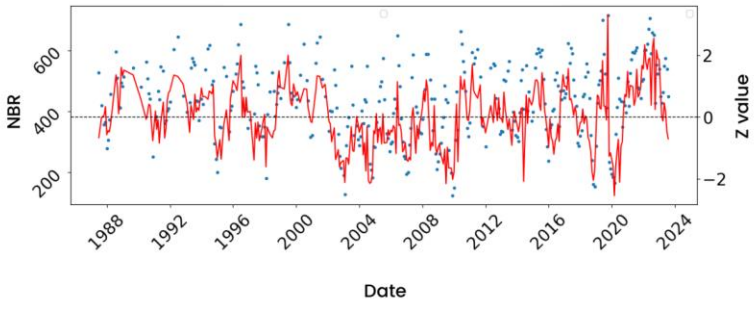


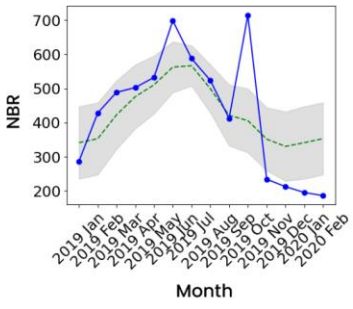
Southern Highlands-Goulburn-1B



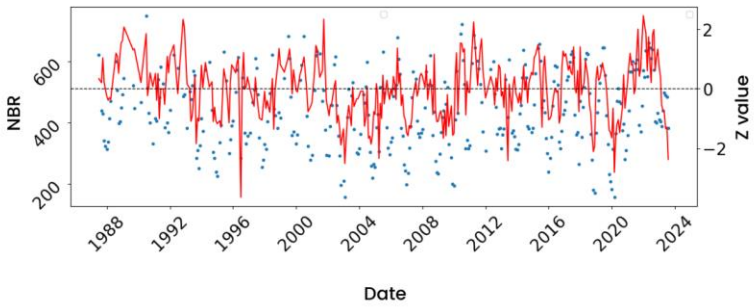


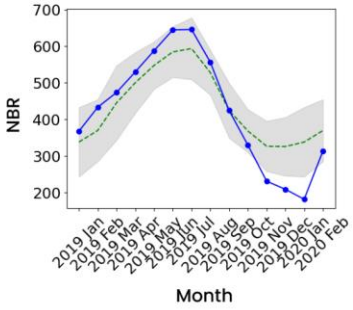
Southern Highlands-Goulburn-1C



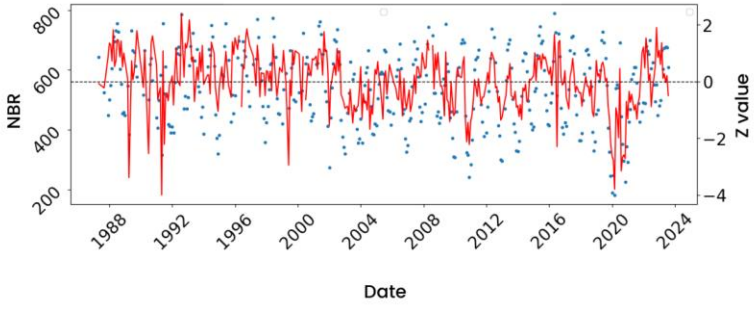


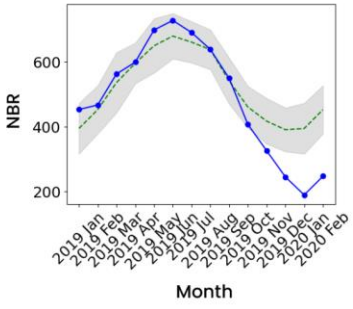
Southern Highlands-Goulburn-1D





Southern Highlands-Mt Alexandra-1A





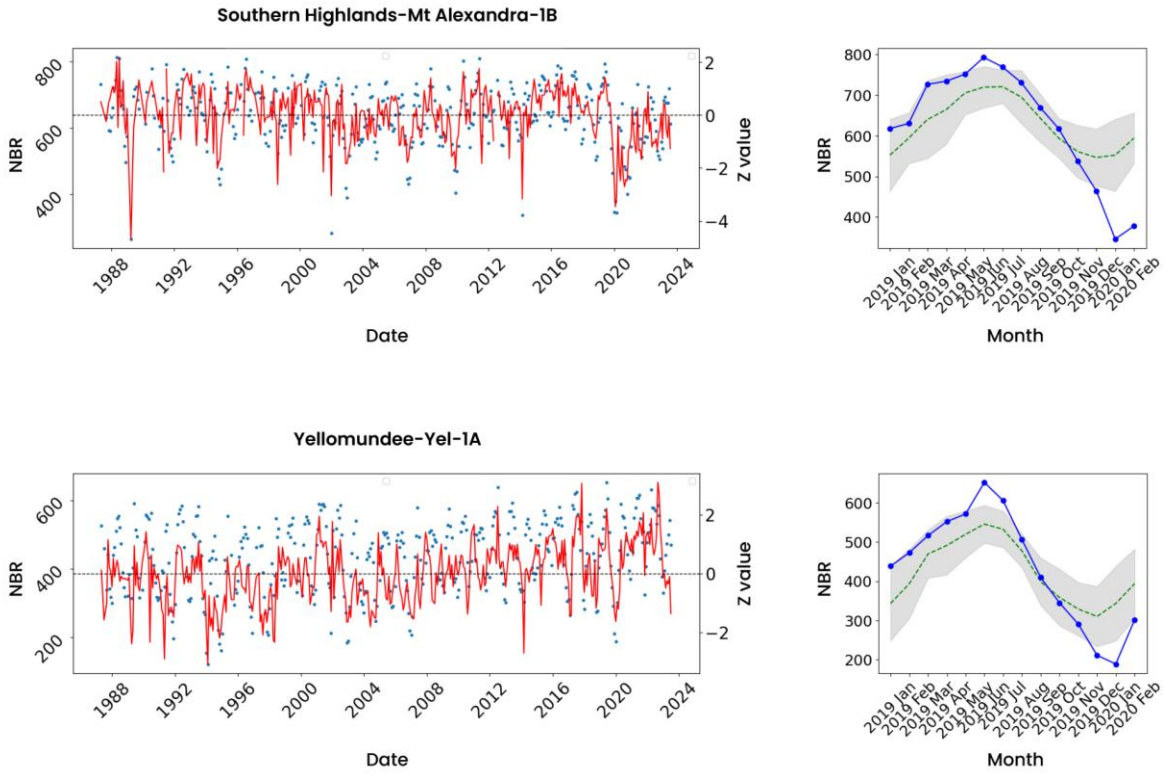
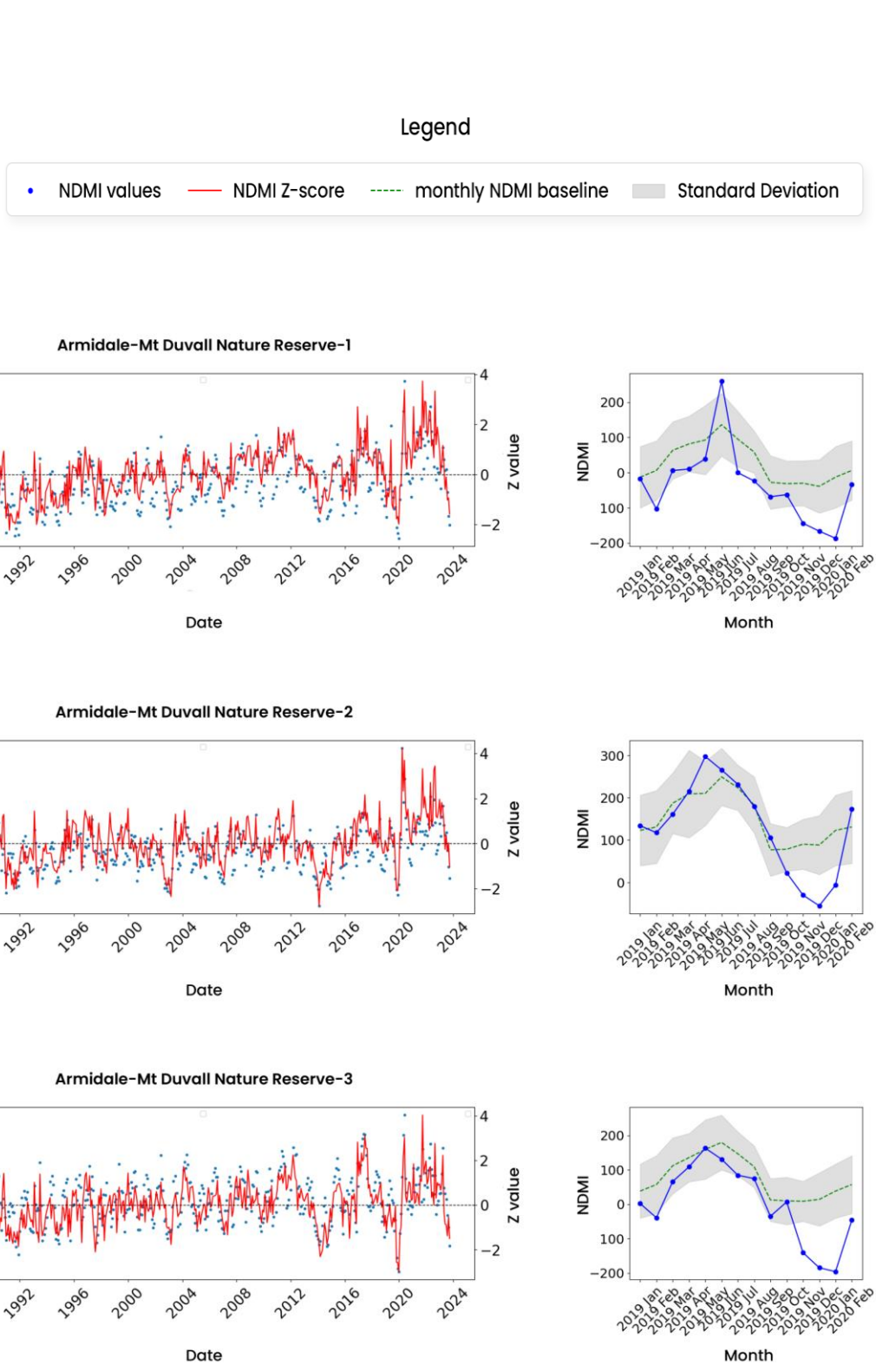
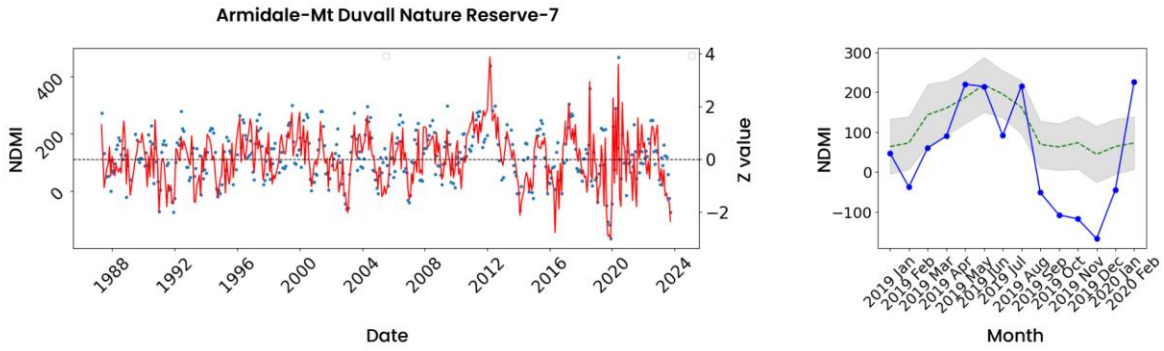
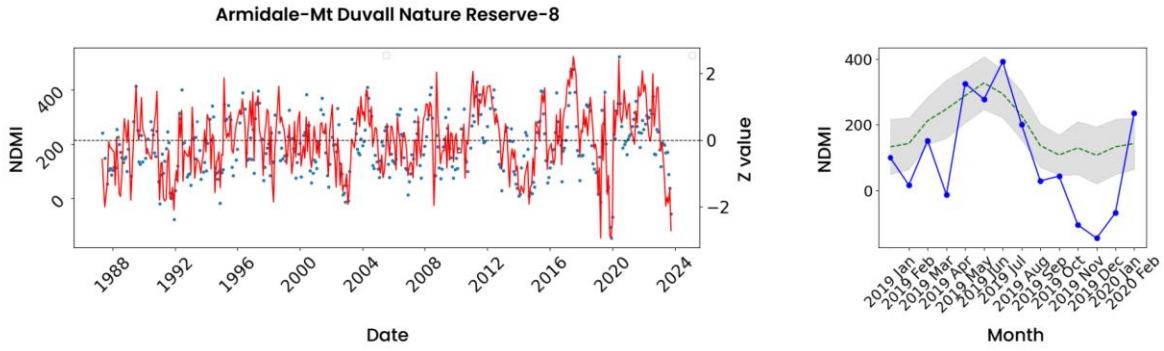
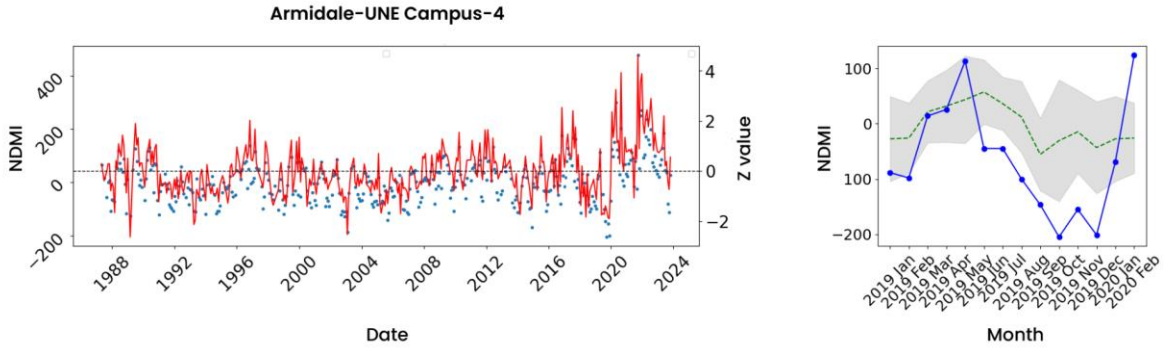


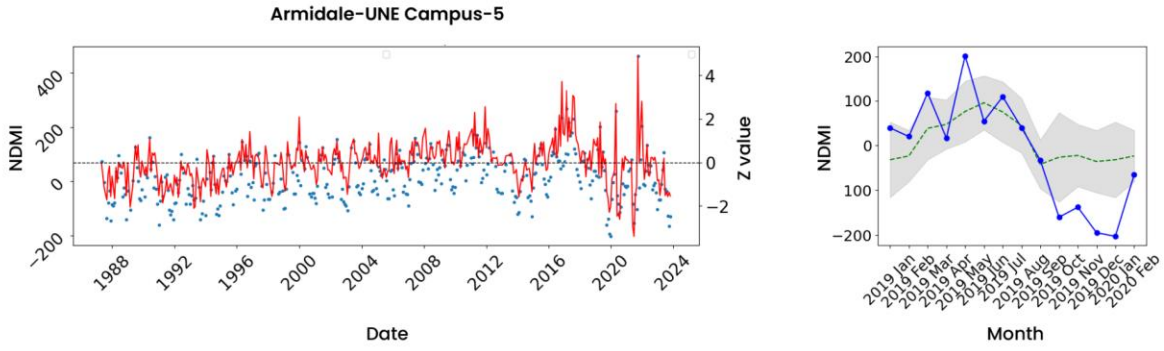
Figure S1. Time series of the monthly Normalised Burn Index (NBR) and z-scores at all the 37 sites across the study area. The left side figures represent the monthly Sentinel 2 time series from 1998-2022. The right figures represent a close-up of the 2019-20 drought event.

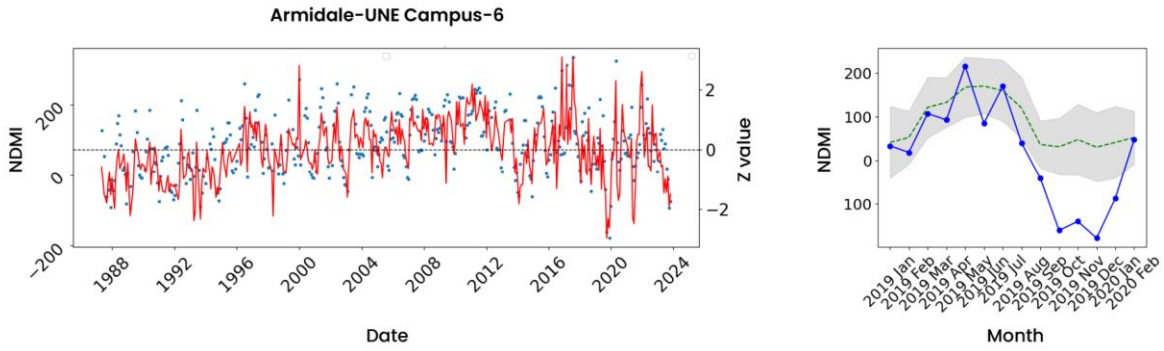

Legend
NDMI values
NDMI Z-score
monthly NDMI baseline
Standard Deviation
Armidale-Mt Duvall Nature Reserve-1
NDMI
Z value
Date
Month
Armidale-Mt Duvall Nature Reserve-2
NDMI
Z value
Date
Month
Armidale-Mt Duvall Nature Reserve-3
NDMI
Z value
Date
Month

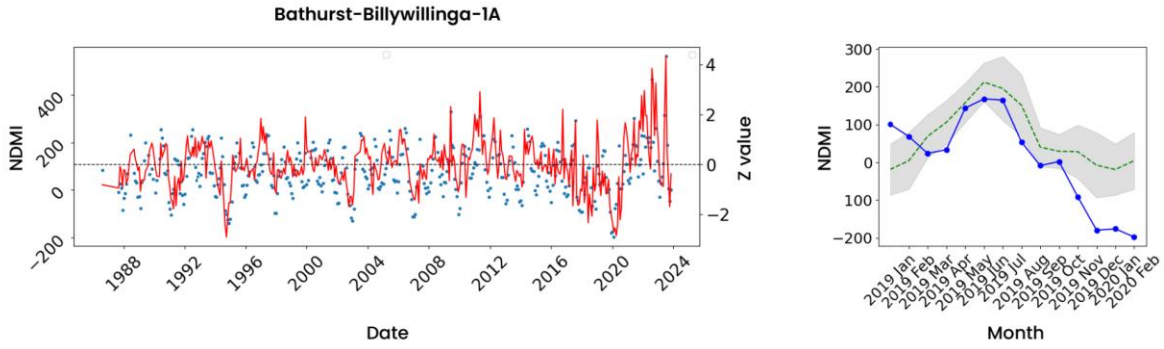

Armidale-Mt Duvall Nature Reserve-7
NDMI
Z value
Date
Month

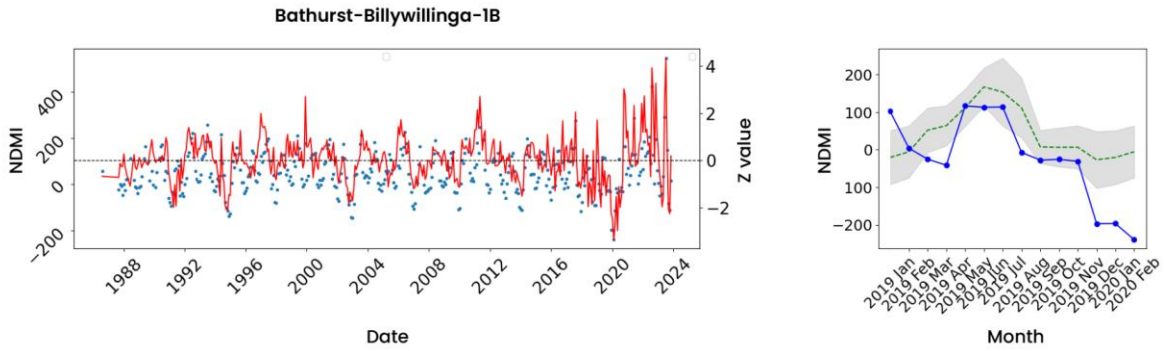

Armidale-Mt Duvall Nature Reserve-8
NDMI
Z value
Date
Month

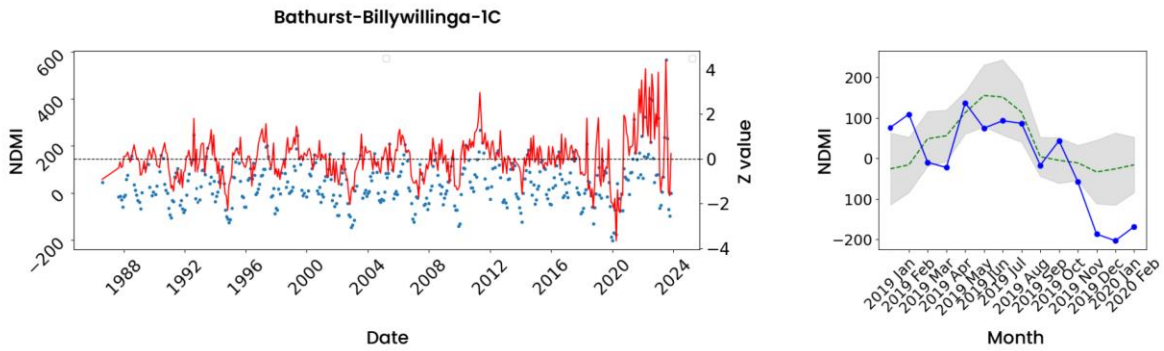

Armidale-UNE Campus-4
NDMI
Z value
Date
Month

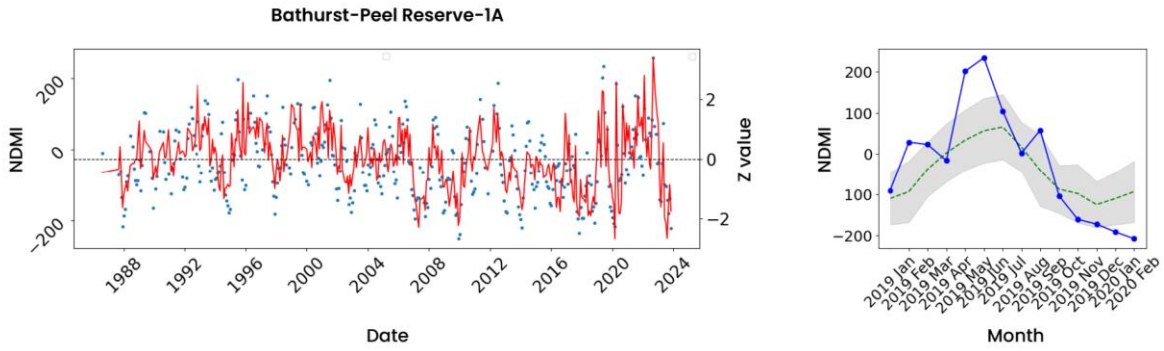

Armidale-UNE Campus-5
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Date
Month

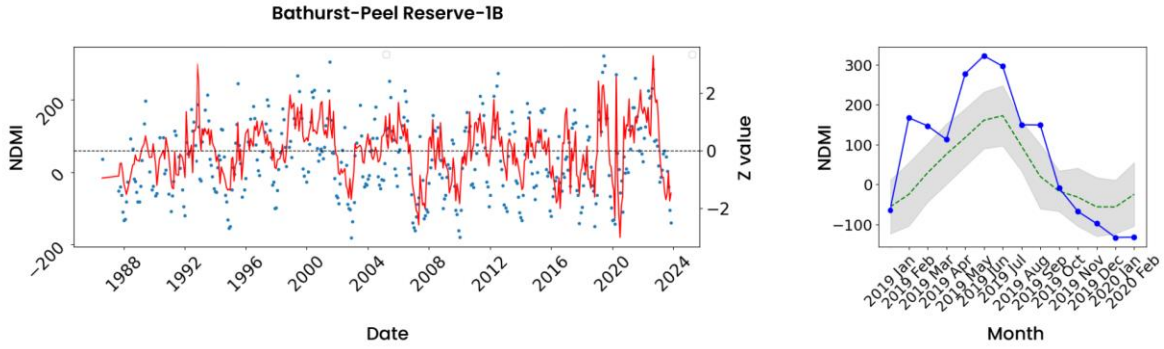

Armidale-UNE Campus-6
NDMI
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Date
Month

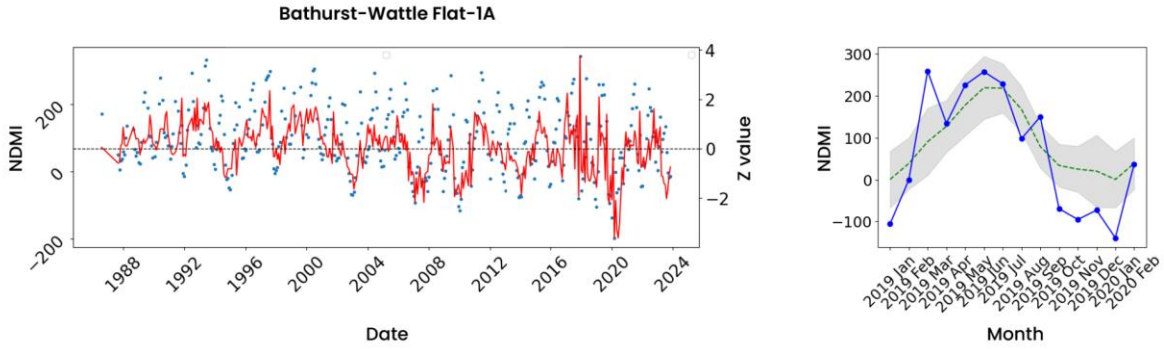

Bathurst-Billywillinga-1A
NDMI
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Date
Month

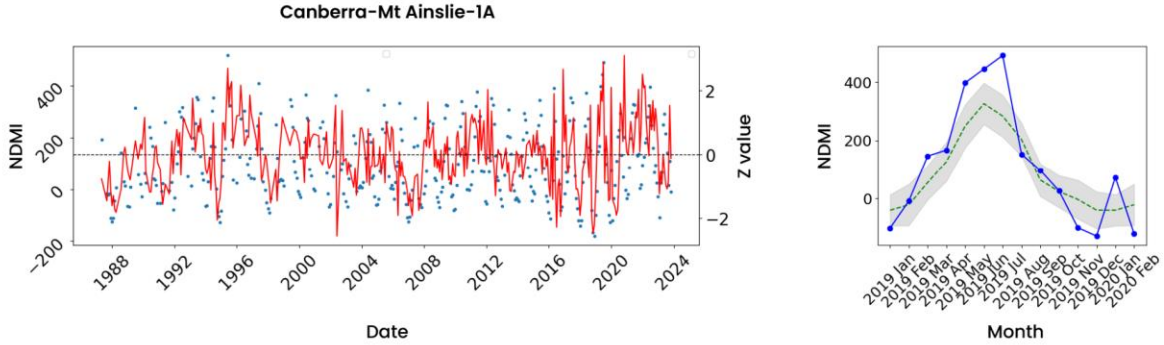

Bathurst-Billywillinga-1B
NDMI
Z value
Date
Month

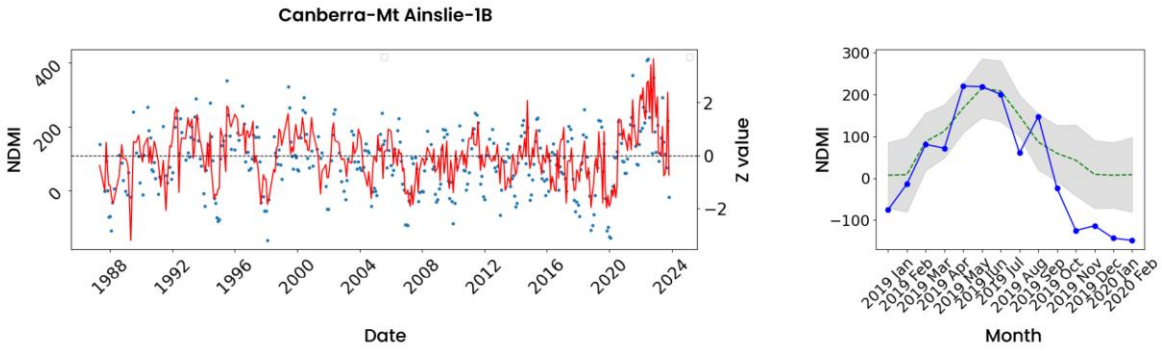

Bathurst-Billywillinga-1C
NDMI
Z value
Date
Month

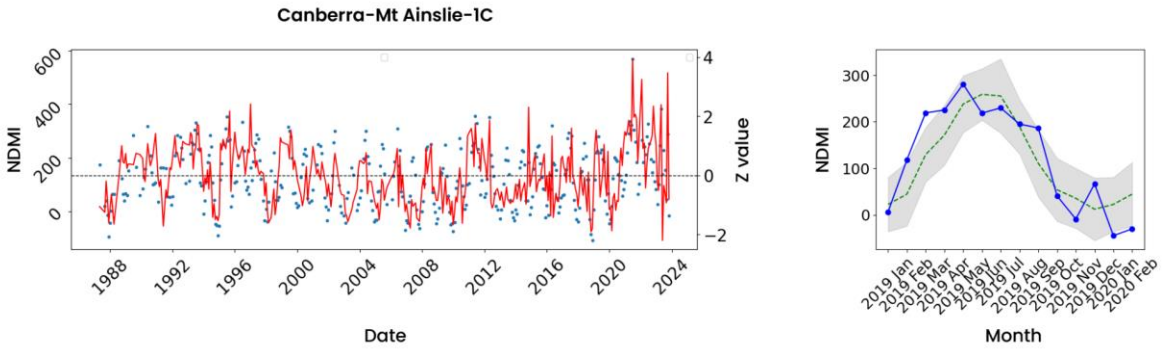

Bathurst-Peel Reserve-1A
NDMI
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Date
Month

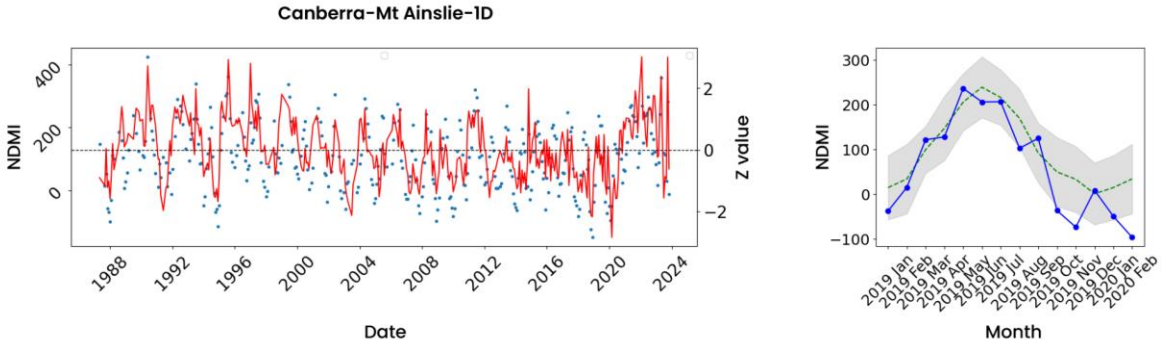

Bathurst-Peel Reserve-1B
NDMI
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Date
Month

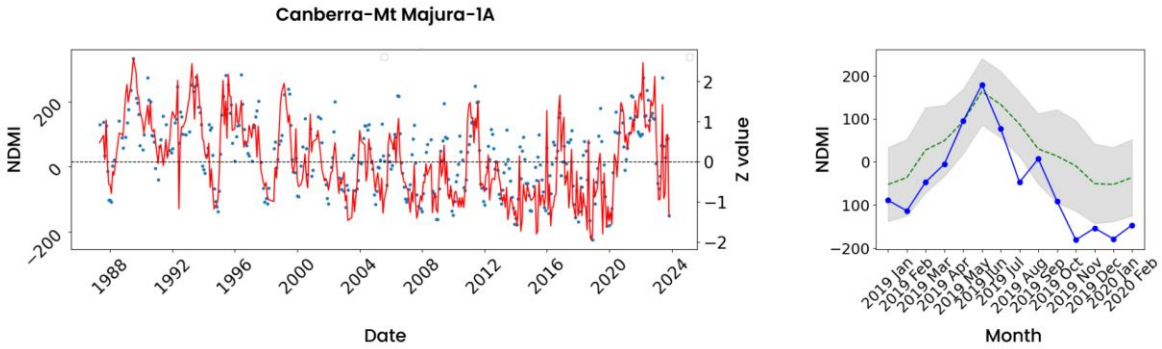

Bathurst-Wattle Flat-1A
NDMI
Z value
Date
Month


Canberra-Mt Ainslie-1A
NDMI
Z value
Date
Month

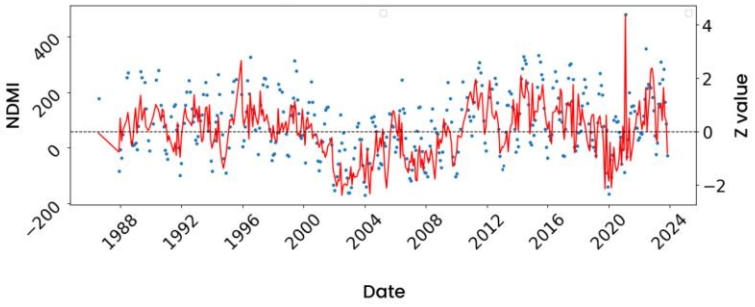

Canberra-Mt Ainslie-1B
NDMI
Z value
Date
Month

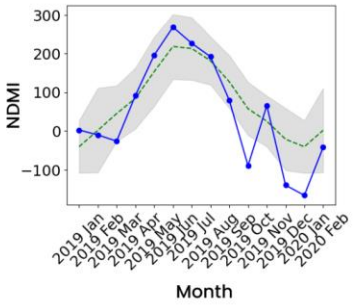

Canberra-Mt Ainslie-1C
NDMI
Z value
Date
Month


Canberra-Mt Ainslie-1D
NDMI
Z value
Date
Month

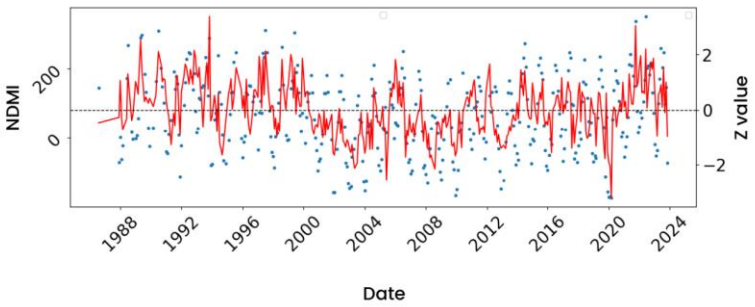

Canberra-Mt Majura-1A
NDMI
Z value
Date
Month

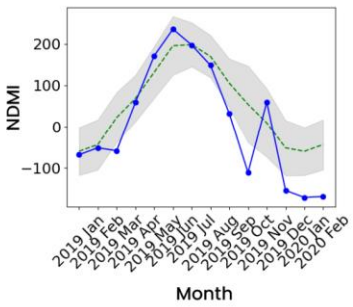
Eugowra-Eugowra Reserve-1A



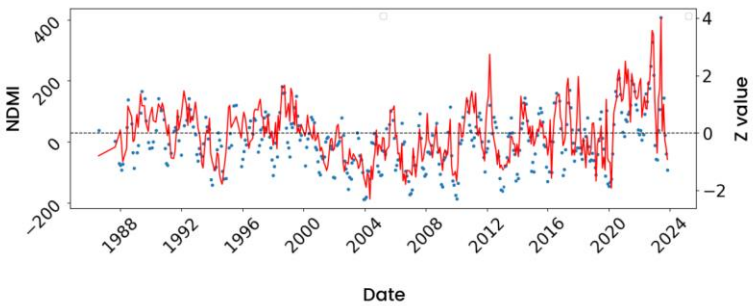


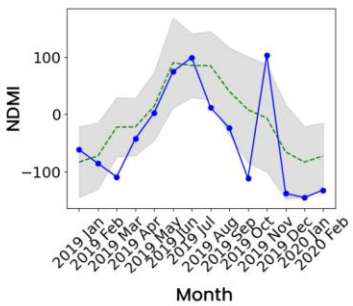
Eugowra-Eugowra Reserve-1B



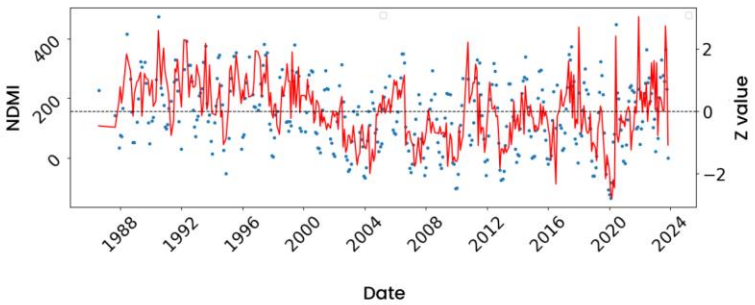


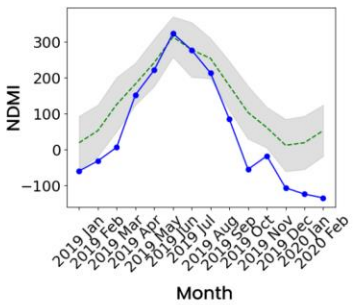
Eugowra-Nangar National Park-1A



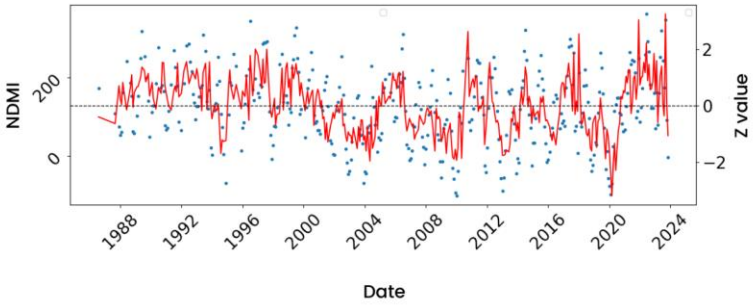


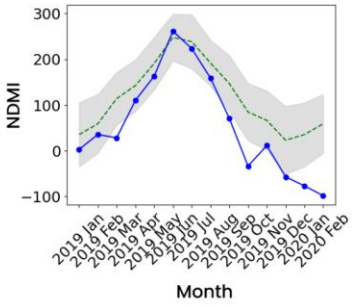
Eugowra-Nangar National Park-1B



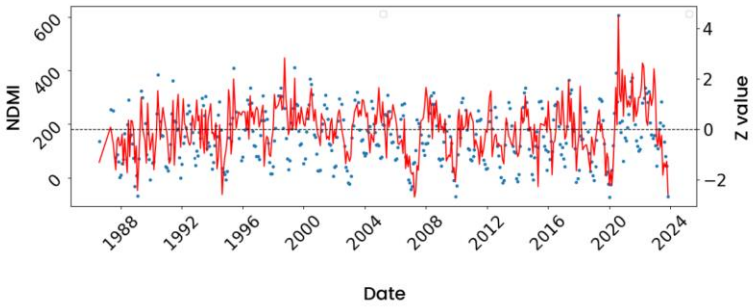


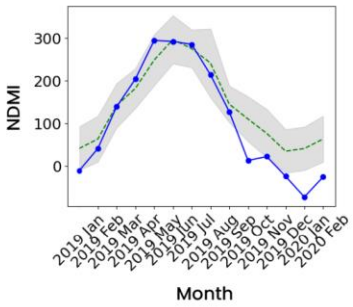
Eugowra-Nangar National Park-1C



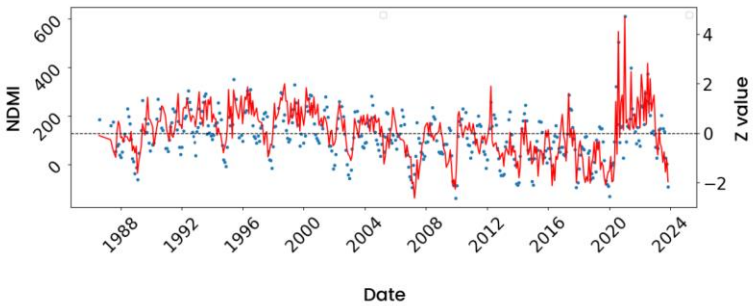


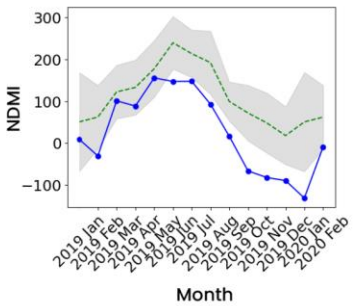
Mudgee-Mudgee, Henry Bayly Rd-1A



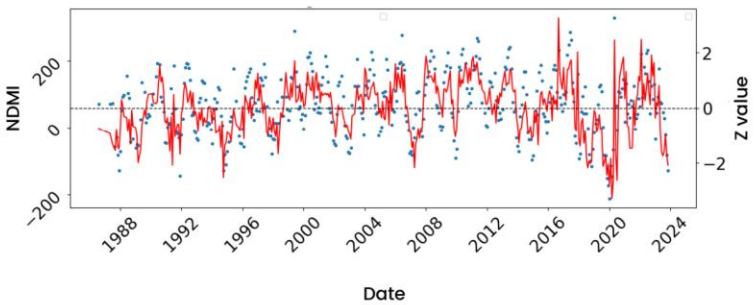


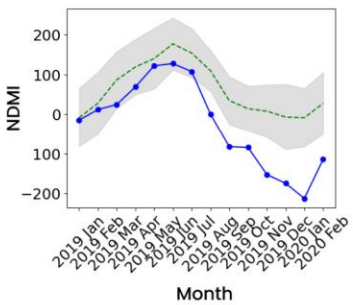
Mudgee-Mudgee, Henry Bayly Rd-1B



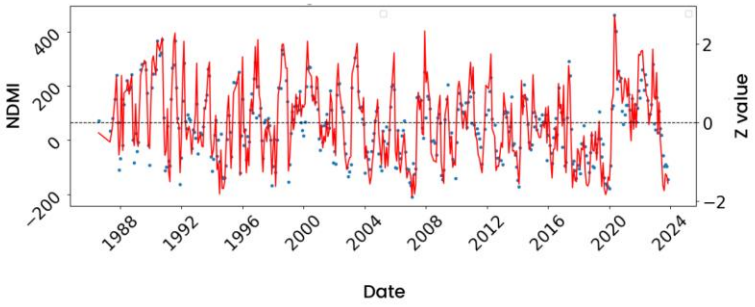


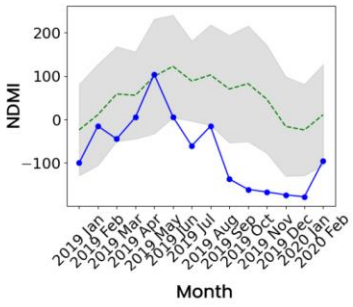
Mudgee-Mudhut Rd Site-1A



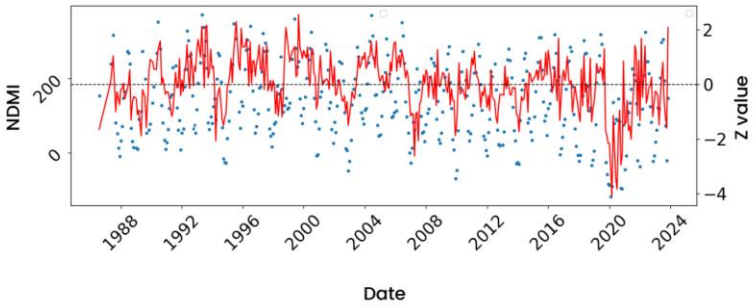


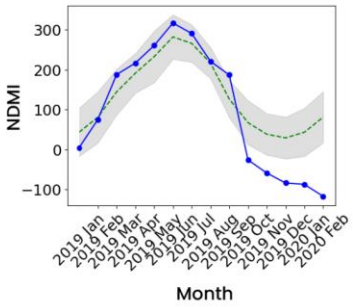
Mudgee-Mudhut Rd Site-1B



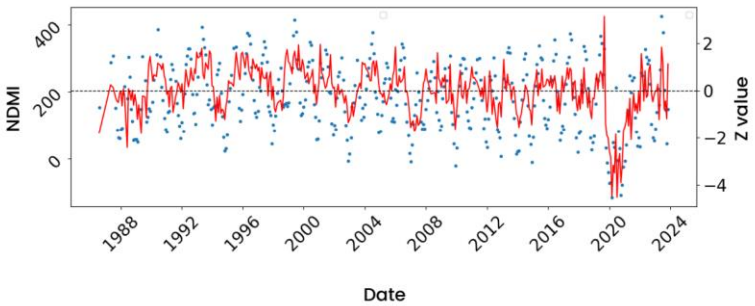


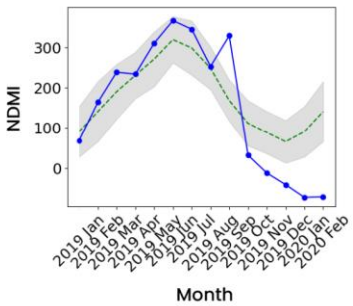
Mudgee-Munghorn gap nature reserve-1A



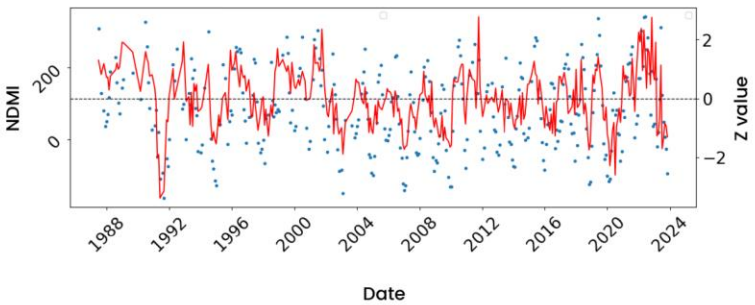


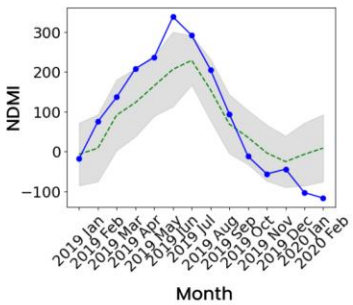
Mudgee-Munghorn gap nature reserve-1B



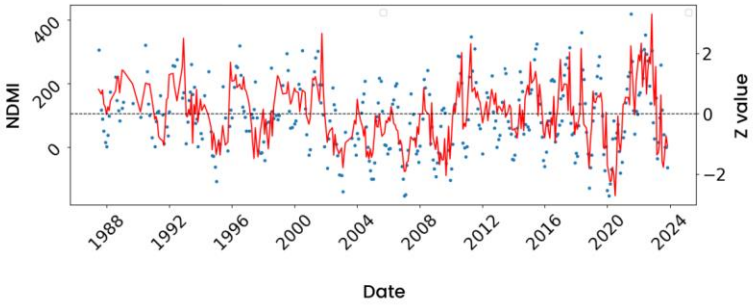


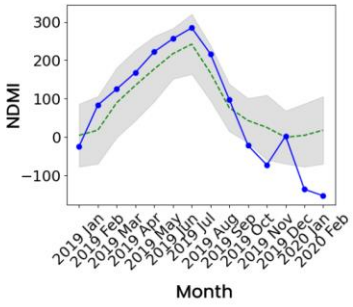
Southern Highlands-Goulburn-1A



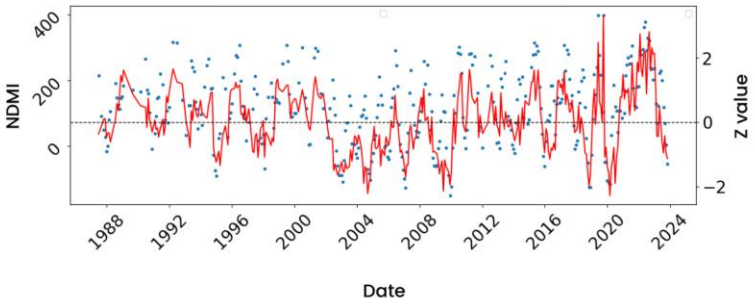


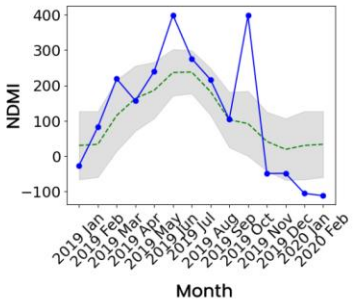
Southern Highlands-Goulburn-1B



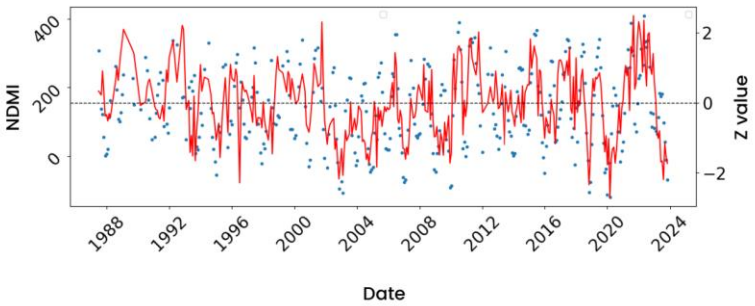


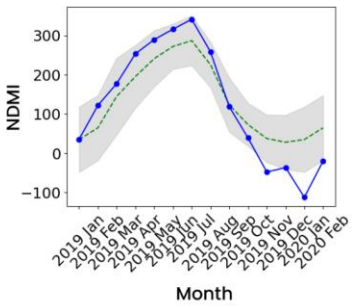
Southern Highlands-Goulburn-1C



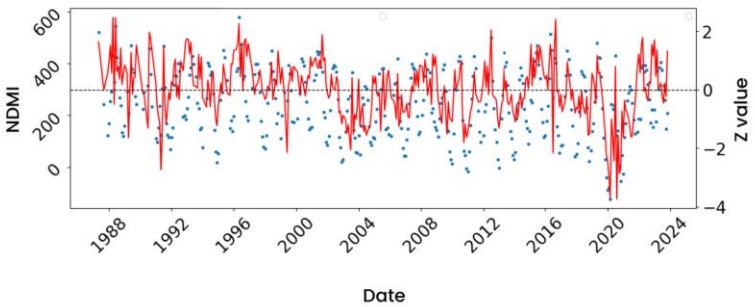


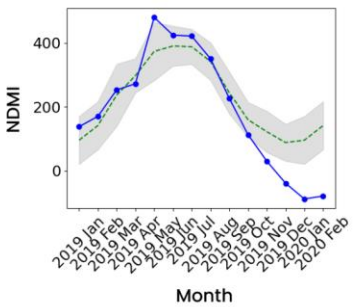
Southern Highlands-Goulburn-1D





Southern Highlands-Mt Alexandra-1A





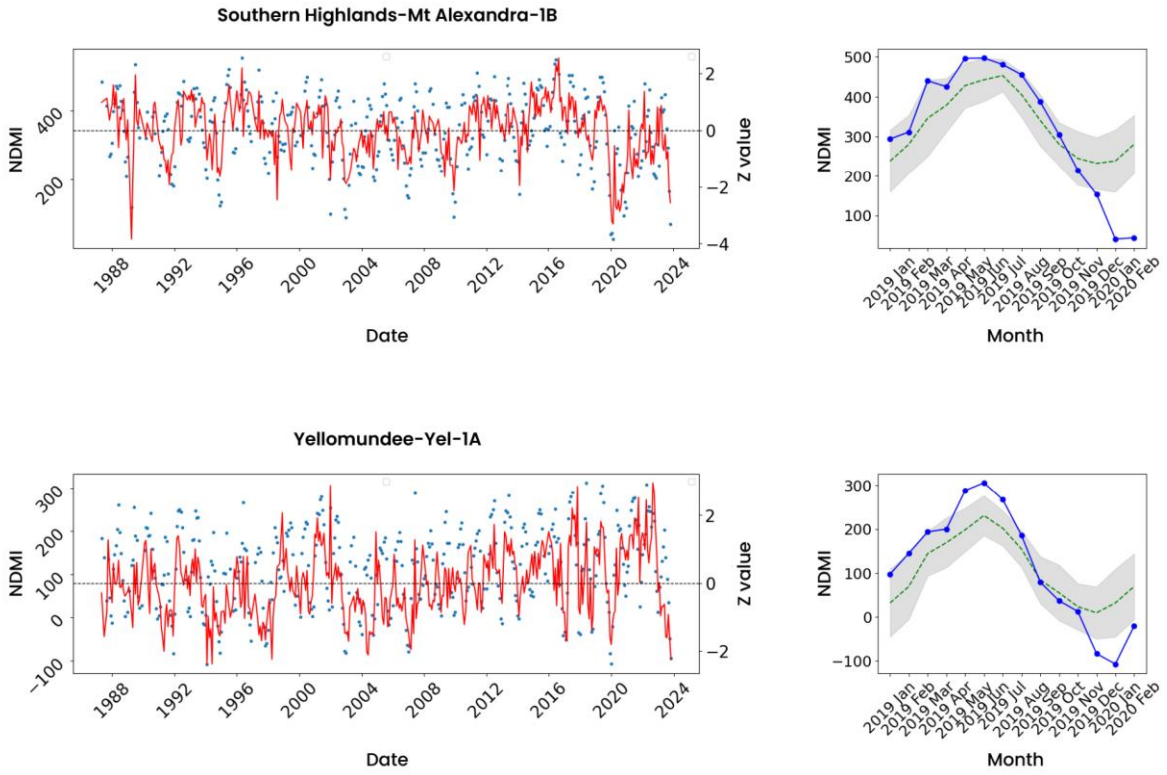
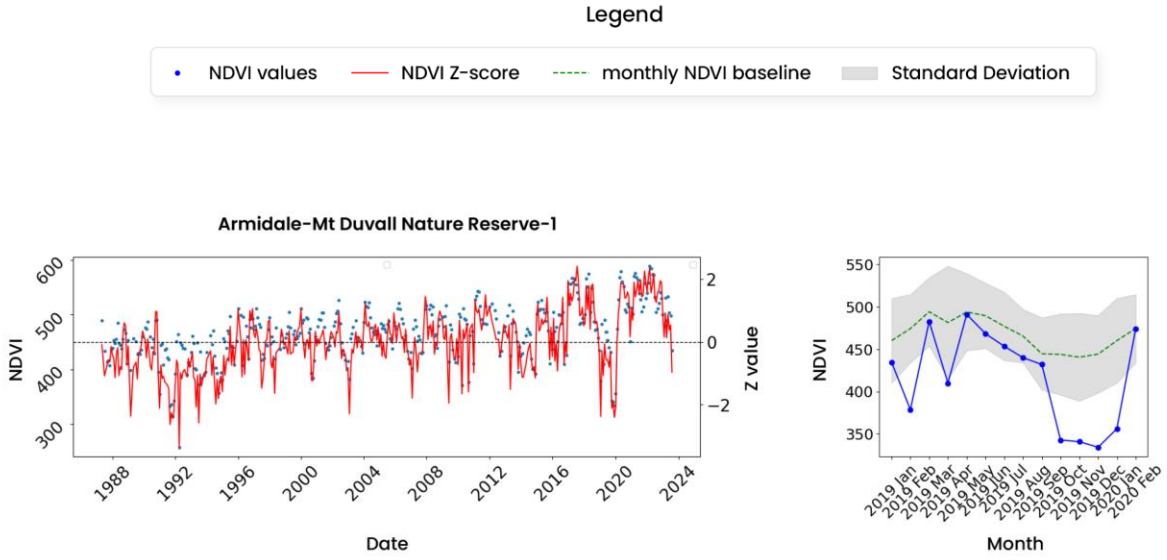
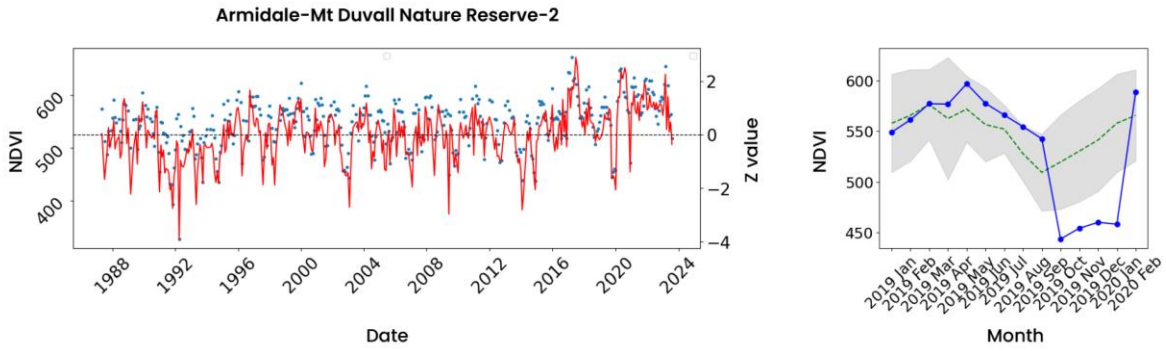
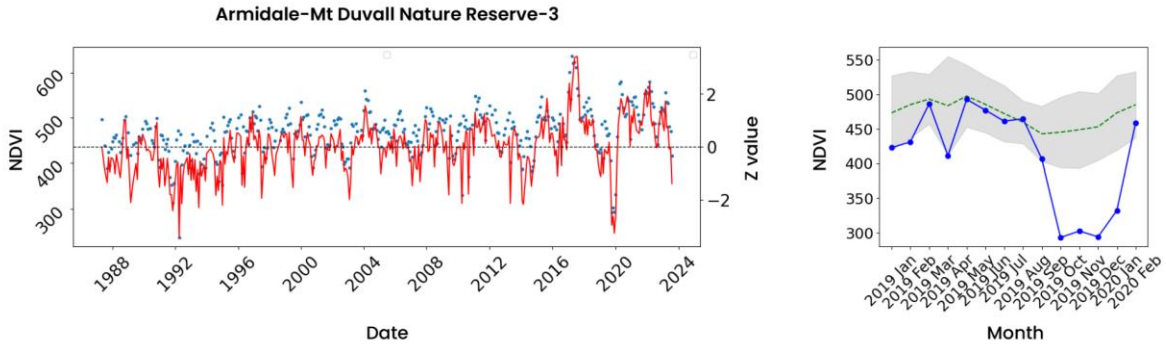
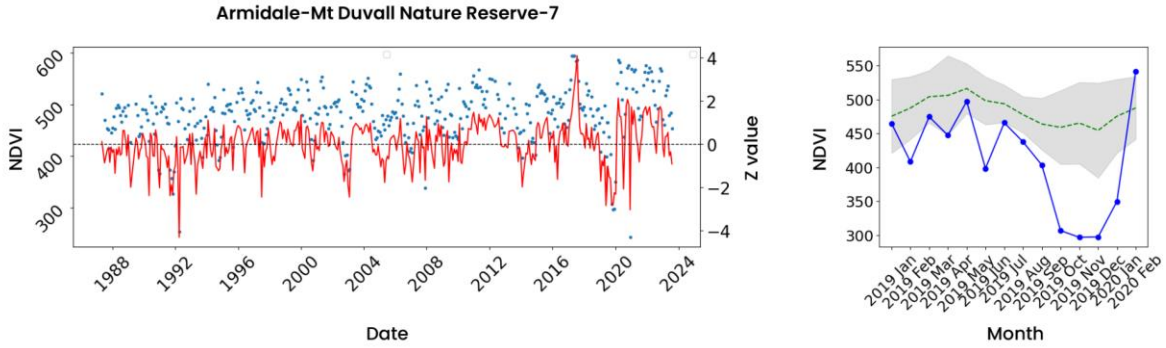


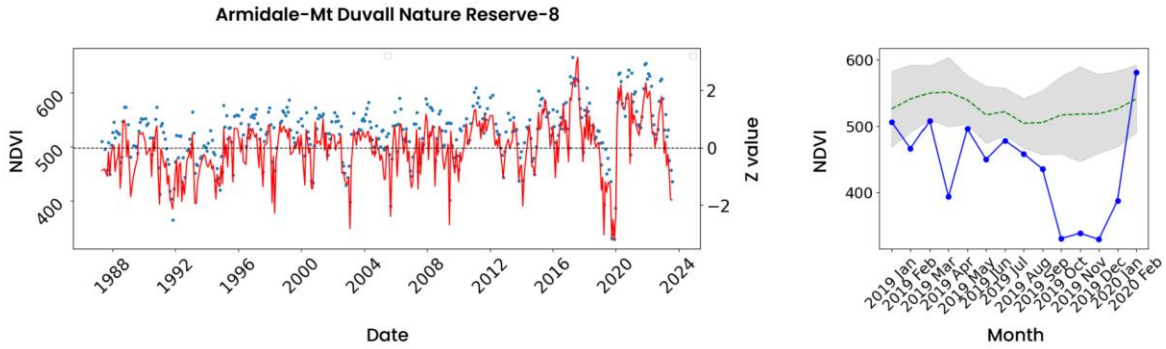
Figure S2. Time series of the monthly Normalised Difference Moisture Index (NDMI) and z-scores at all the sites across the study area. The left side figures represent the monthly Sentinel 2 time series from 1998-2022. The right figures represent a close-up of the 2019-20 drought event.

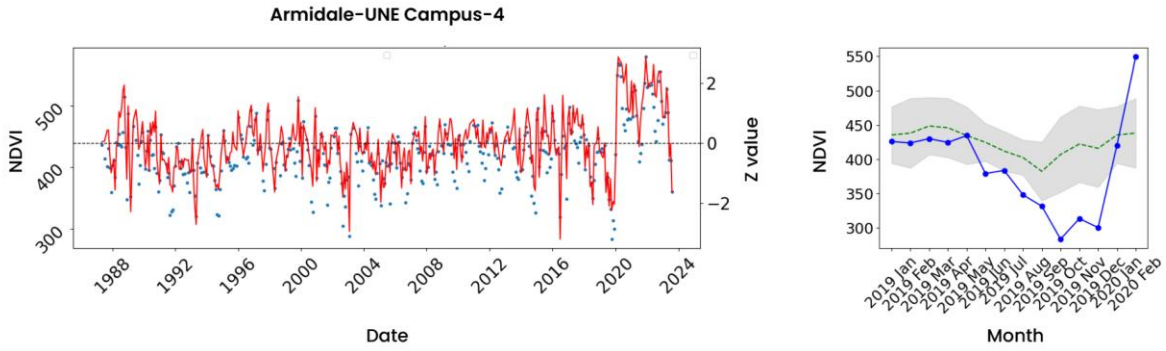


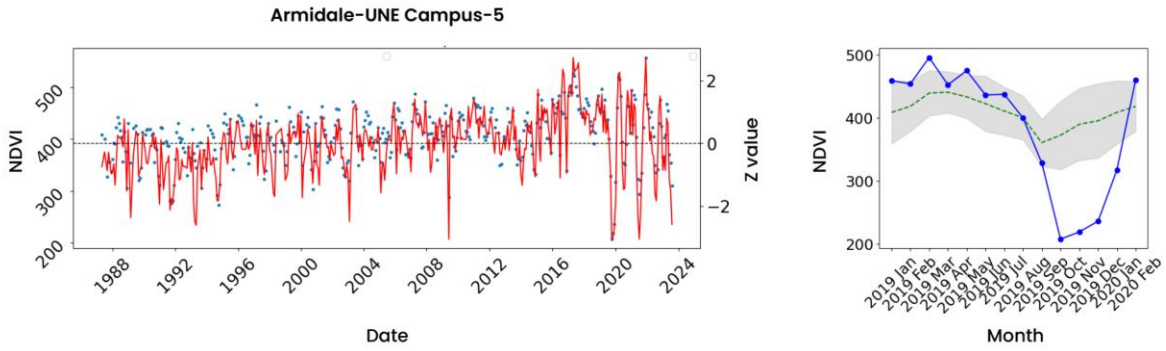

Armidale-Mt Duvall Nature Reserve-2
NDVI
Z value
Date
Month

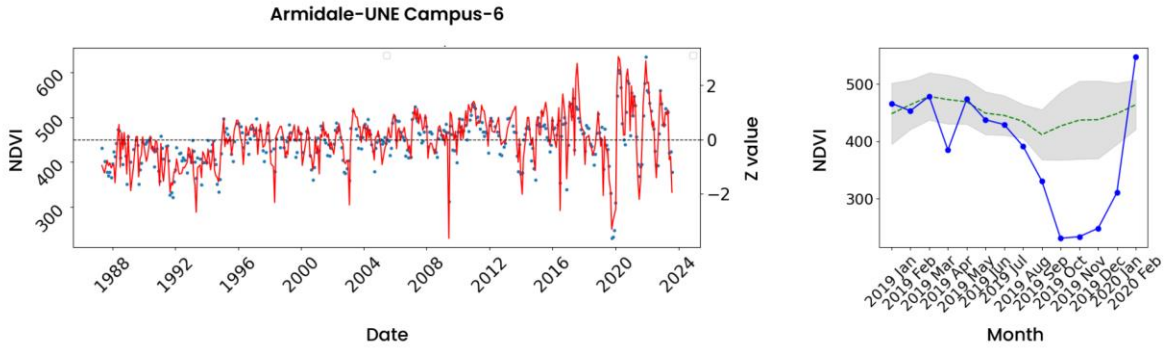

Armidale-Mt Duvall Nature Reserve-3
NDVI
Z value
Date
Month

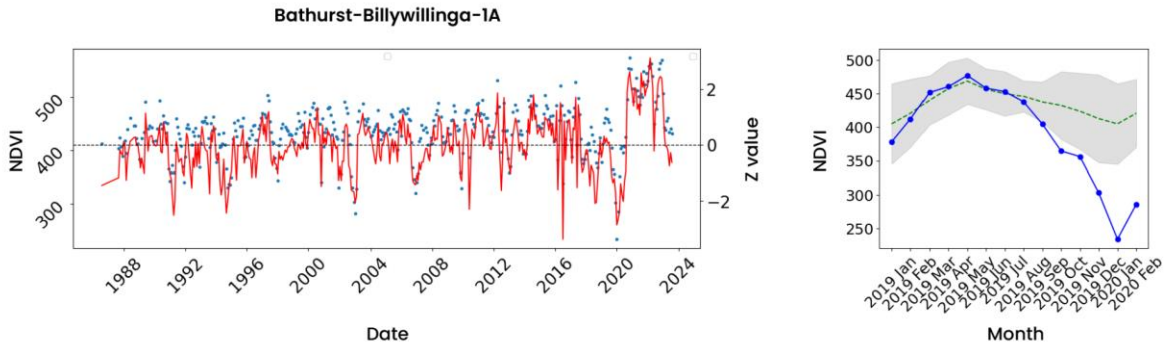

Armidale-Mt Duvall Nature Reserve-7
NDVI
Z value
Date
Month

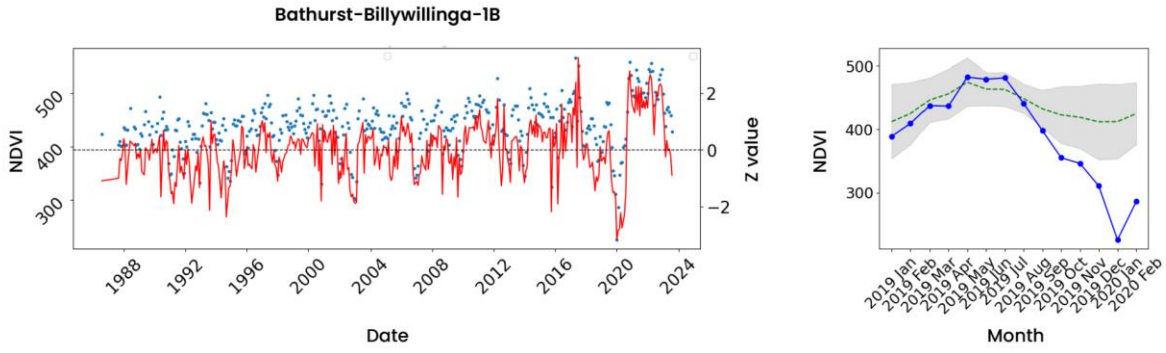

Armidale-Mt Duvall Nature Reserve-8
NDVI
Z value
Date
Month

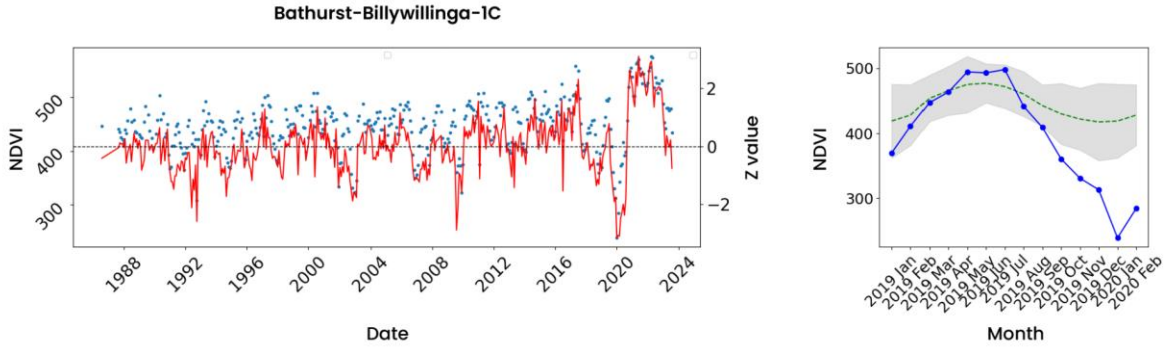

Armidale-UNE Campus-4
NDVI
Z value
Date
Month

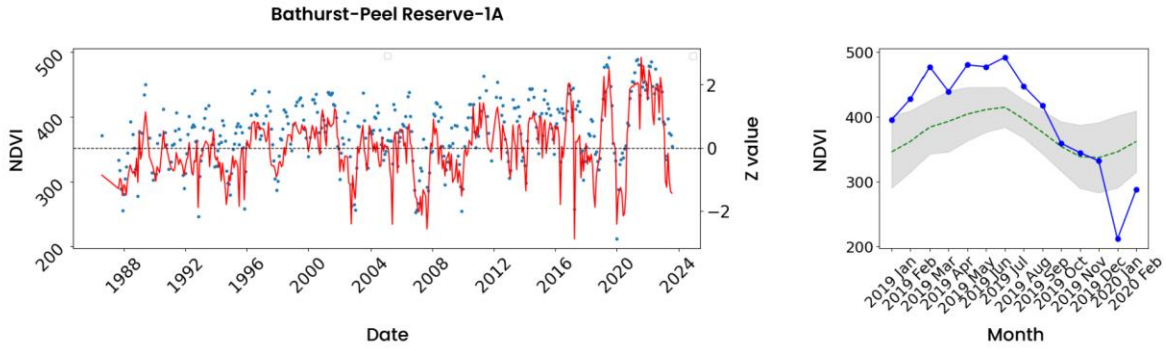

Armidale-UNE Campus-5
NDVI
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Date
Month

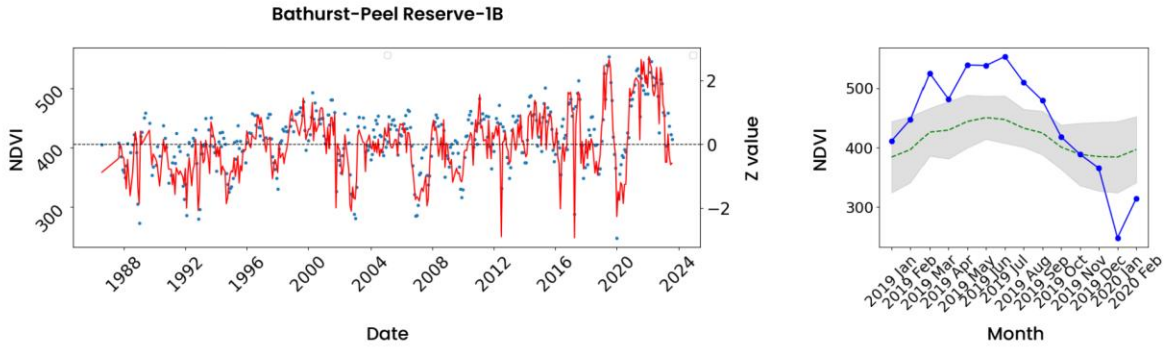

Armidale-UNE Campus-6
NDVI
Z value
Date
Month

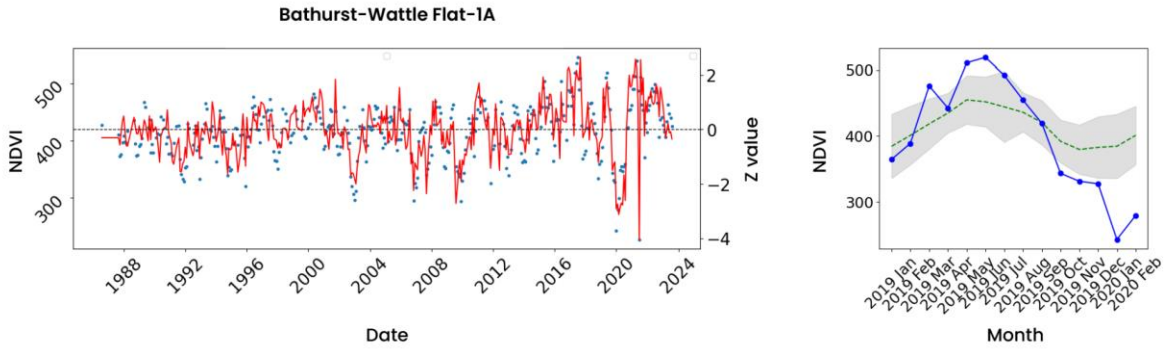

Bathurst-Billywillinga-1A
NDVI
Z value
Date
Month

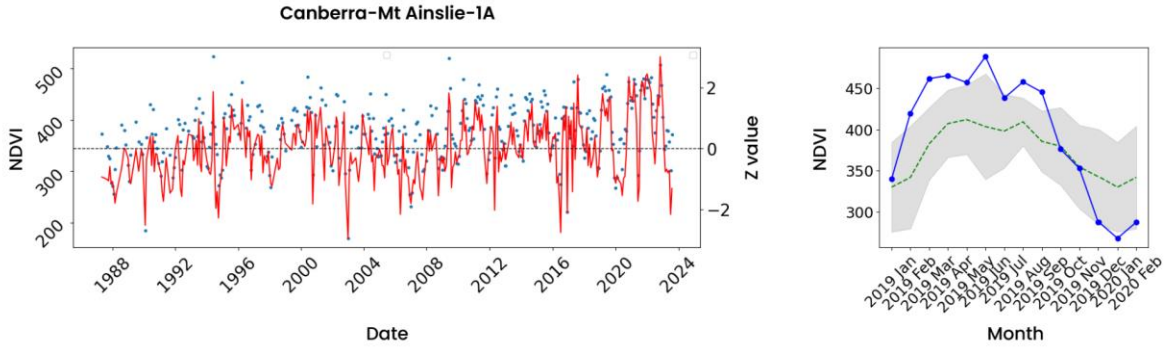

Bathurst-Billywillinga-1B
NDVI
Z value
Date
Month

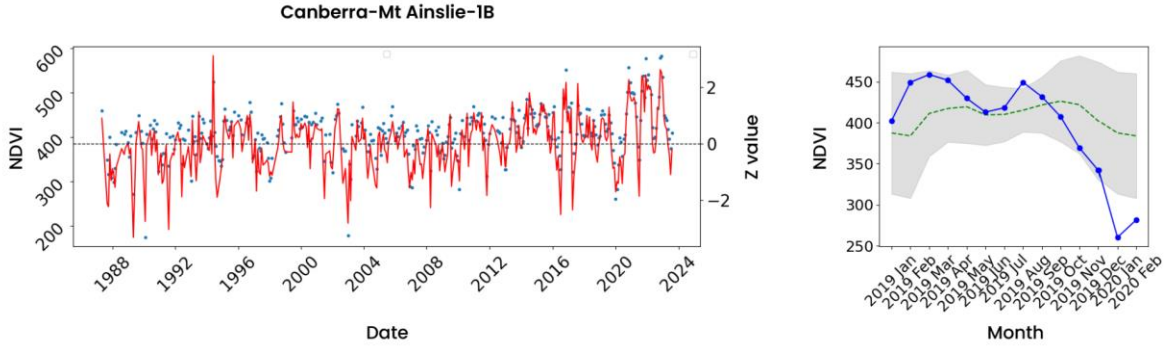

Bathurst-Billywillinga-1C
NDVI
Z value
Date
Month

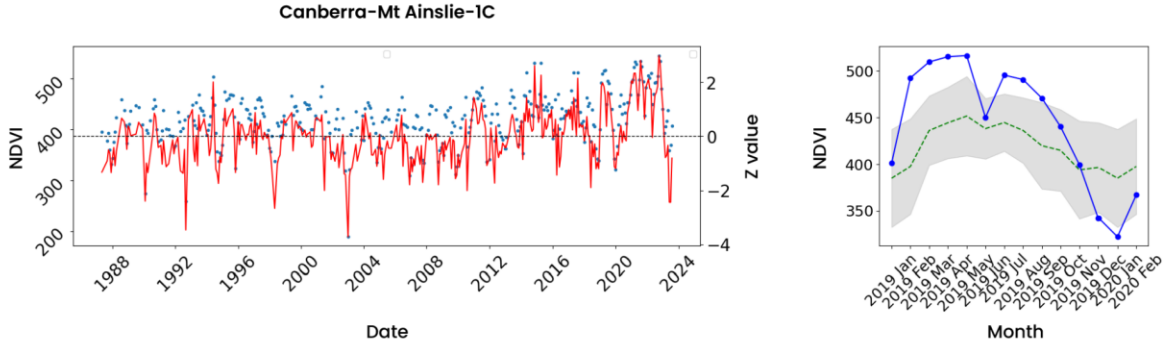

Bathurst-Peel Reserve-1A
NDVI
Z value
Date
Month

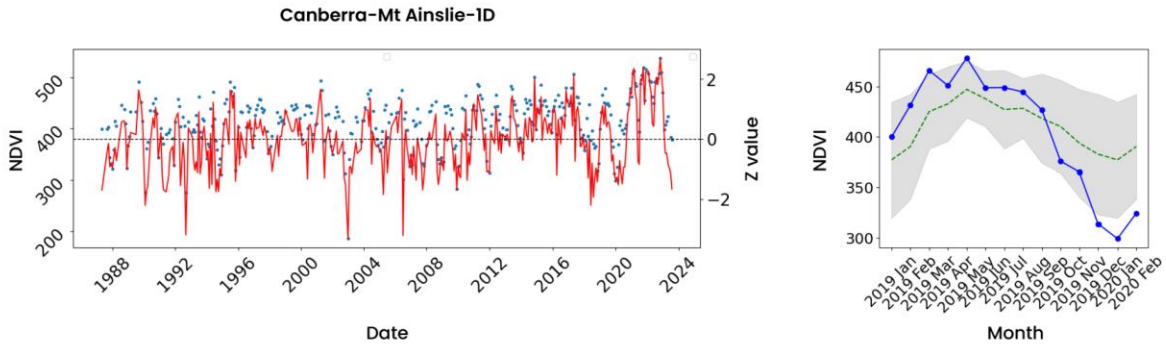

Bathurst-Peel Reserve-1B
NDVI
Z value
Date
Month

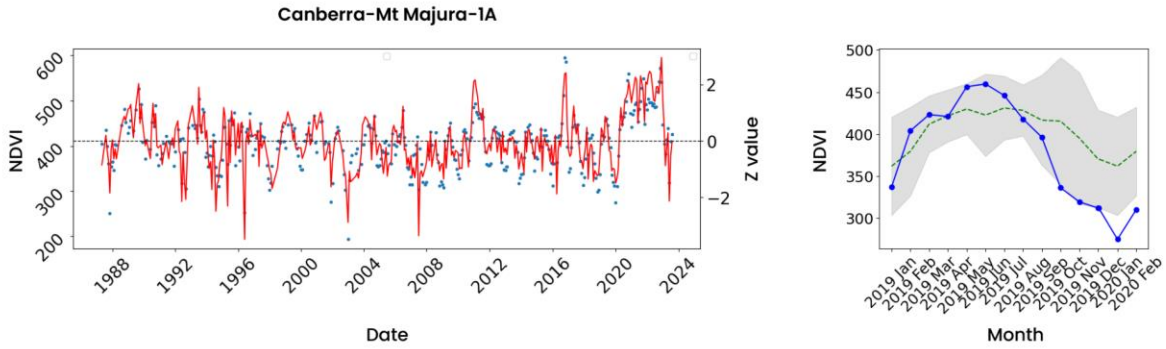

Bathurst-Wattle Flat-1A
NDVI
Z value
Date
Month

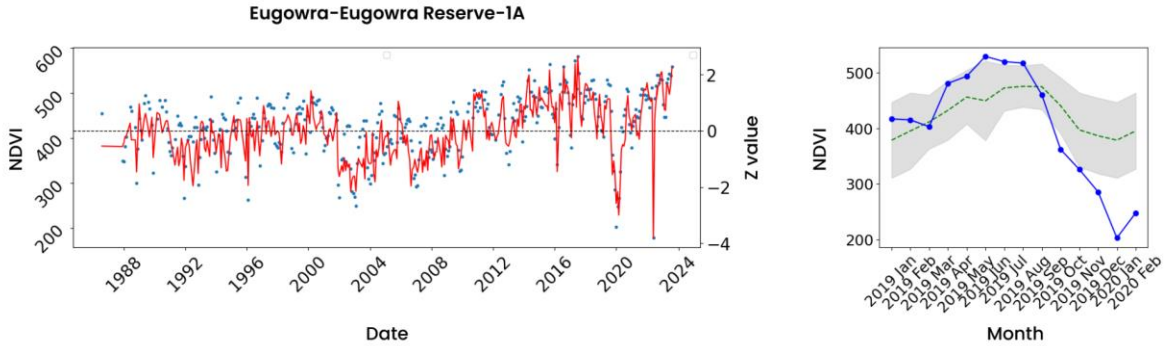

Canberra-Mt Ainslie-1A
NDVI
Z value
Date
Month

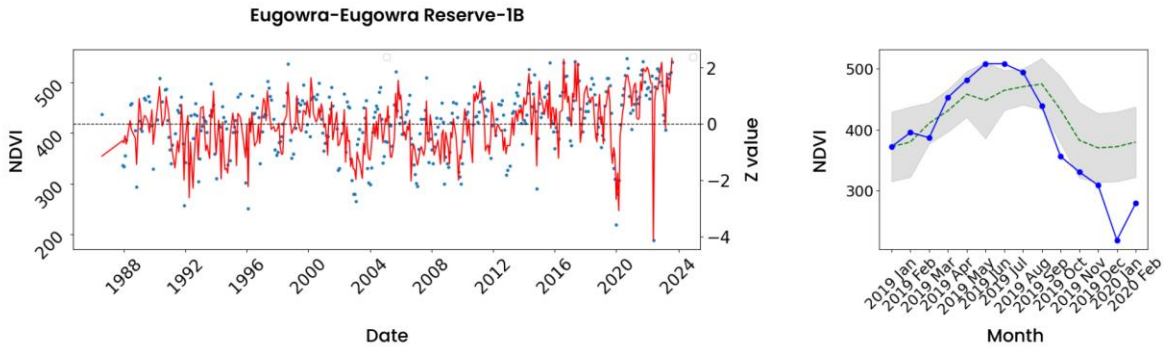

Canberra-Mt Ainslie-1B
NDVI
Z value
Date
Month


Canberra-Mt Ainslie-1C
NDVI
Z value
Date
Month

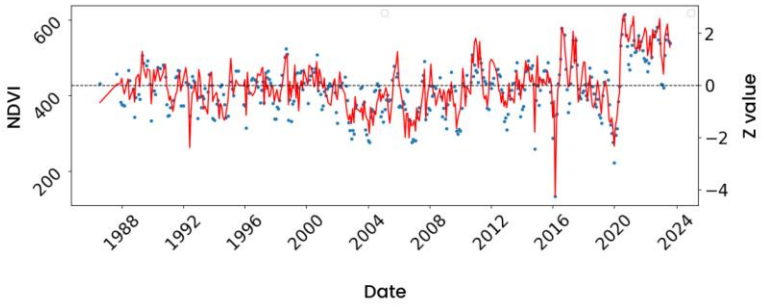

Canberra-Mt Ainslie-1D
NDVI
Z value
Date
Month

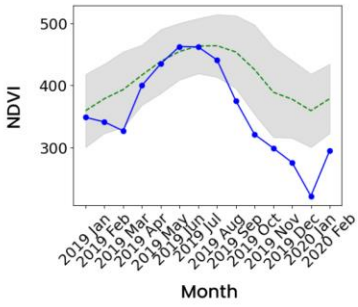

Canberra-Mt Majura-1A
NDVI
Z value
Date
Month


Eugowra-Eugowra Reserve-1A
NDVI
Z value
Date
Month

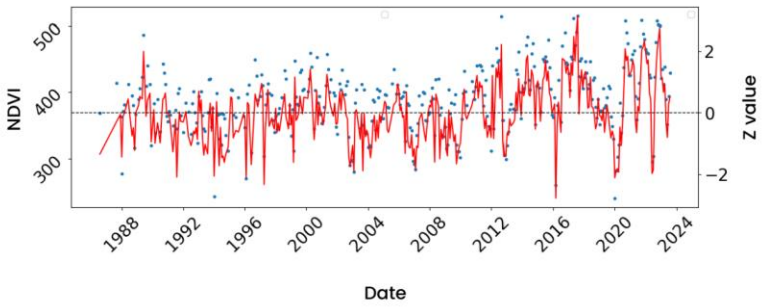

Eugowra-Eugowra Reserve-1B
NDVI
Z value
Date
Month

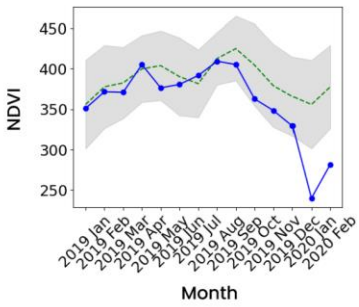
Eugowra-Nangar National Park-1A



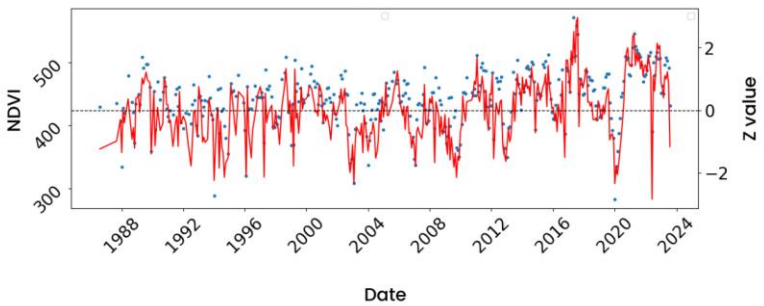


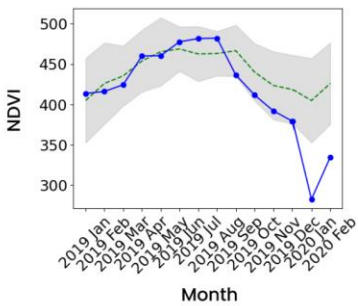
Eugowra-Nangar National Park-1B



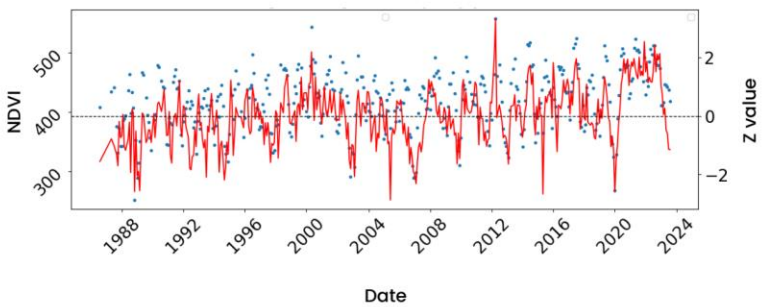


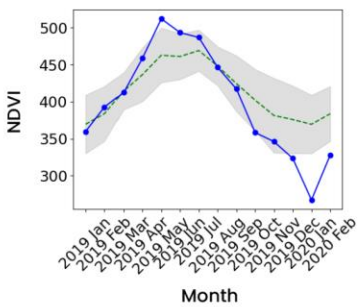
Eugowra-Nangar National Park-1C



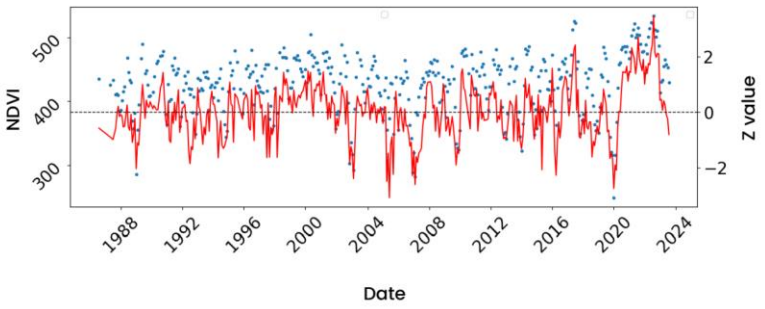


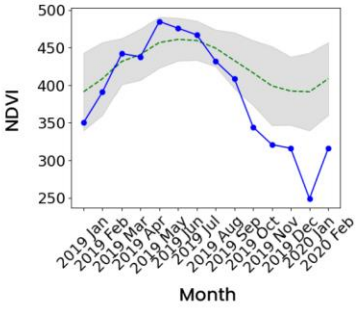
Mudgee-Mudgee, Henry Bayly Rd-1A



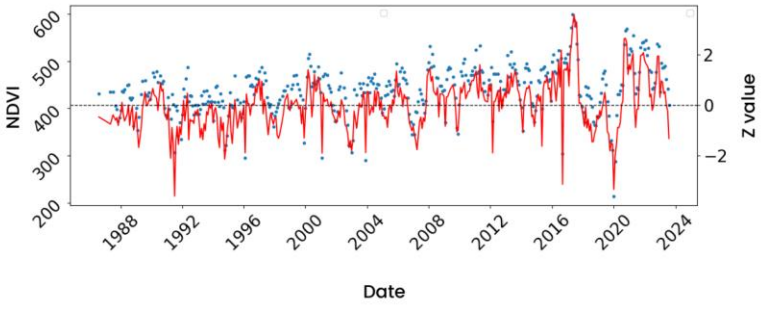


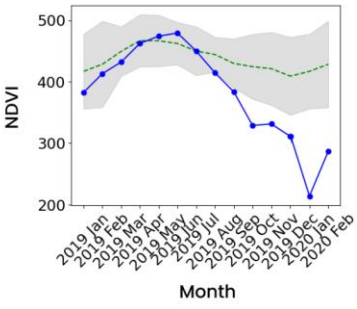
Mudgee-Mudgee, Henry Bayly Rd-1B



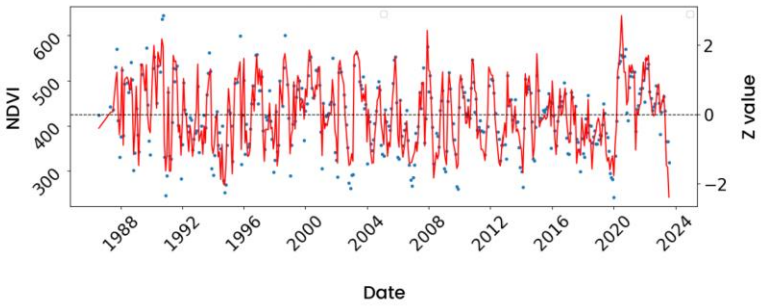


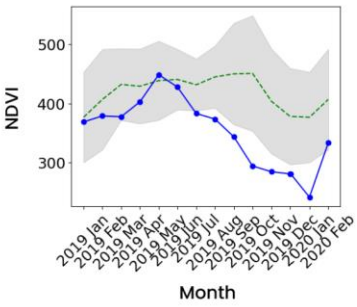
Mudgee-Mudhut Rd Site-1A



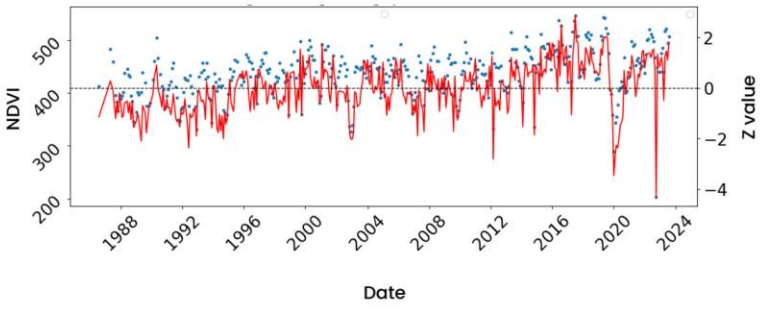


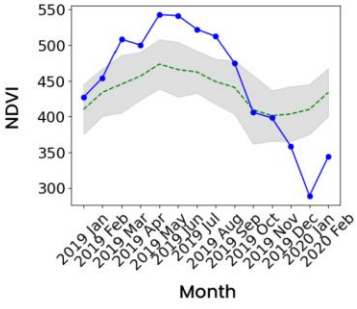
Mudgee-Mudhut Rd Site-1B



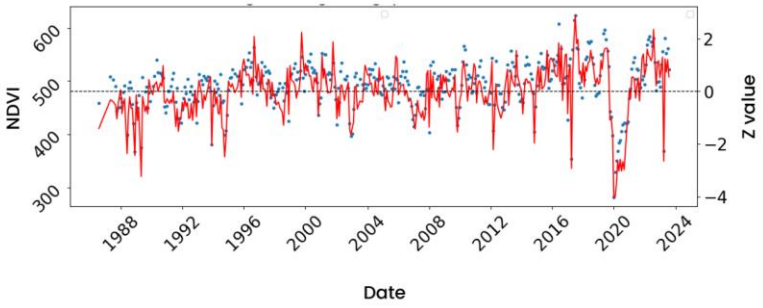


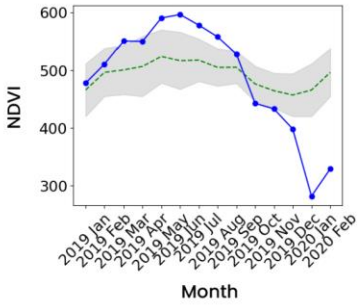
Mudgee-Munghorn gap nature reserve-1A



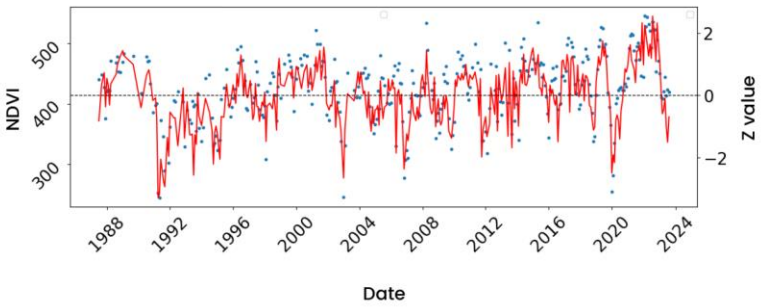


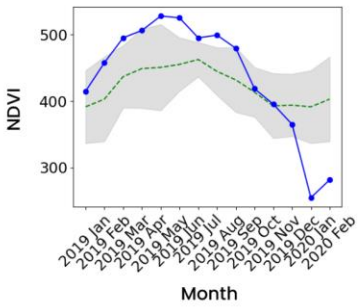
Mudgee-Munghorn gap nature reserve-1B



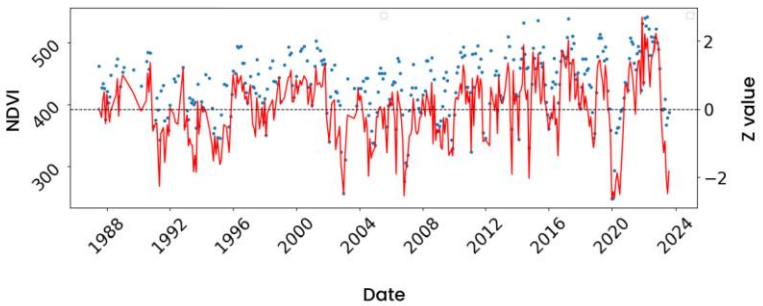


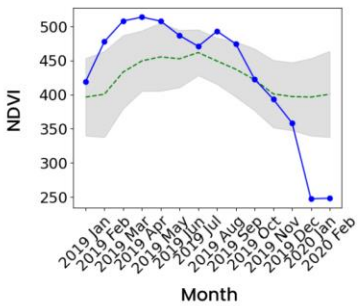
Southern Highlands-Goulburn-1A



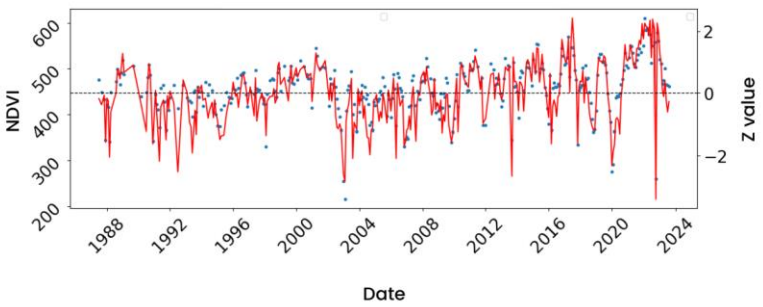


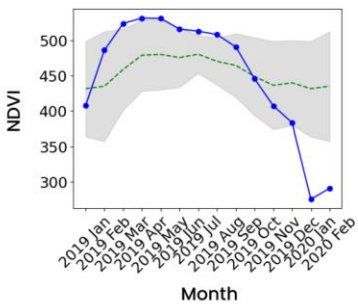
Southern Highlands-Goulburn-1B



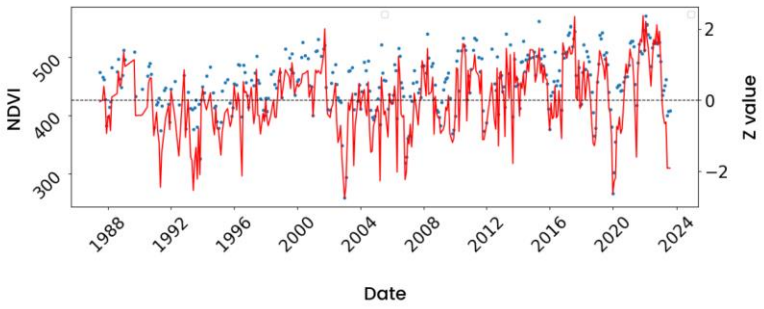


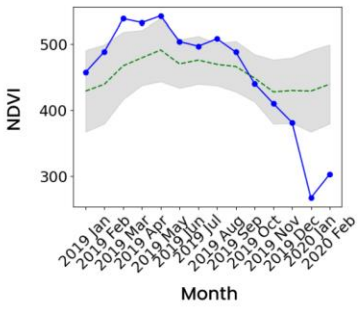
Southern Highlands-Goulburn-1C



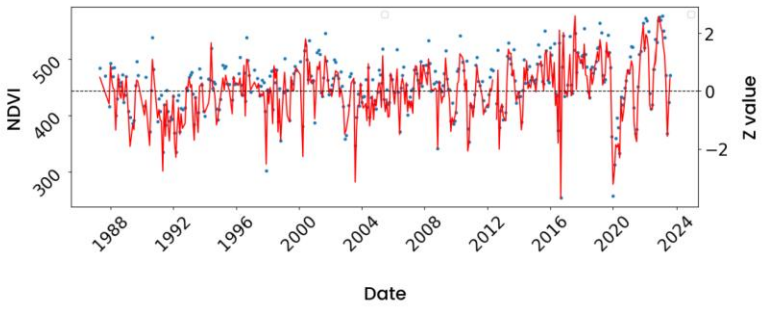


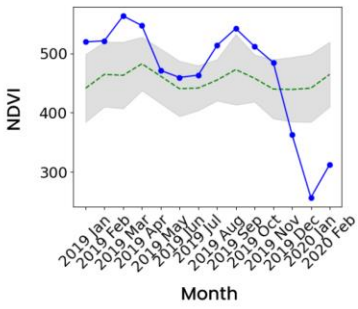
Southern Highlands-Goulburn-1D



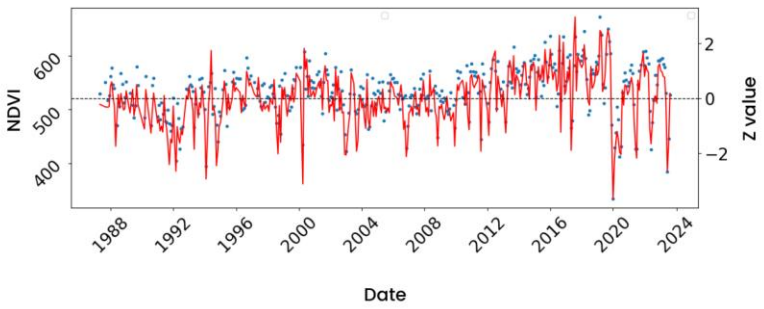


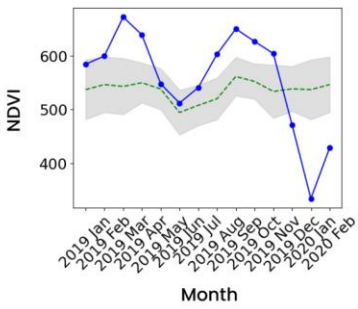
Southern Highlands-Mt Alexandra-1A



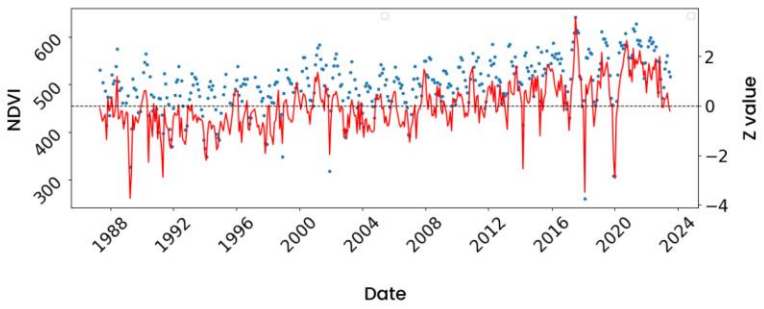


Southern Highlands-Mt Alexandra-1B





Yellomundee-Yel-1A



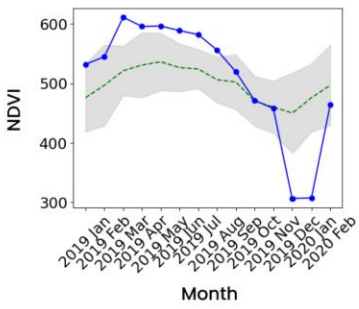
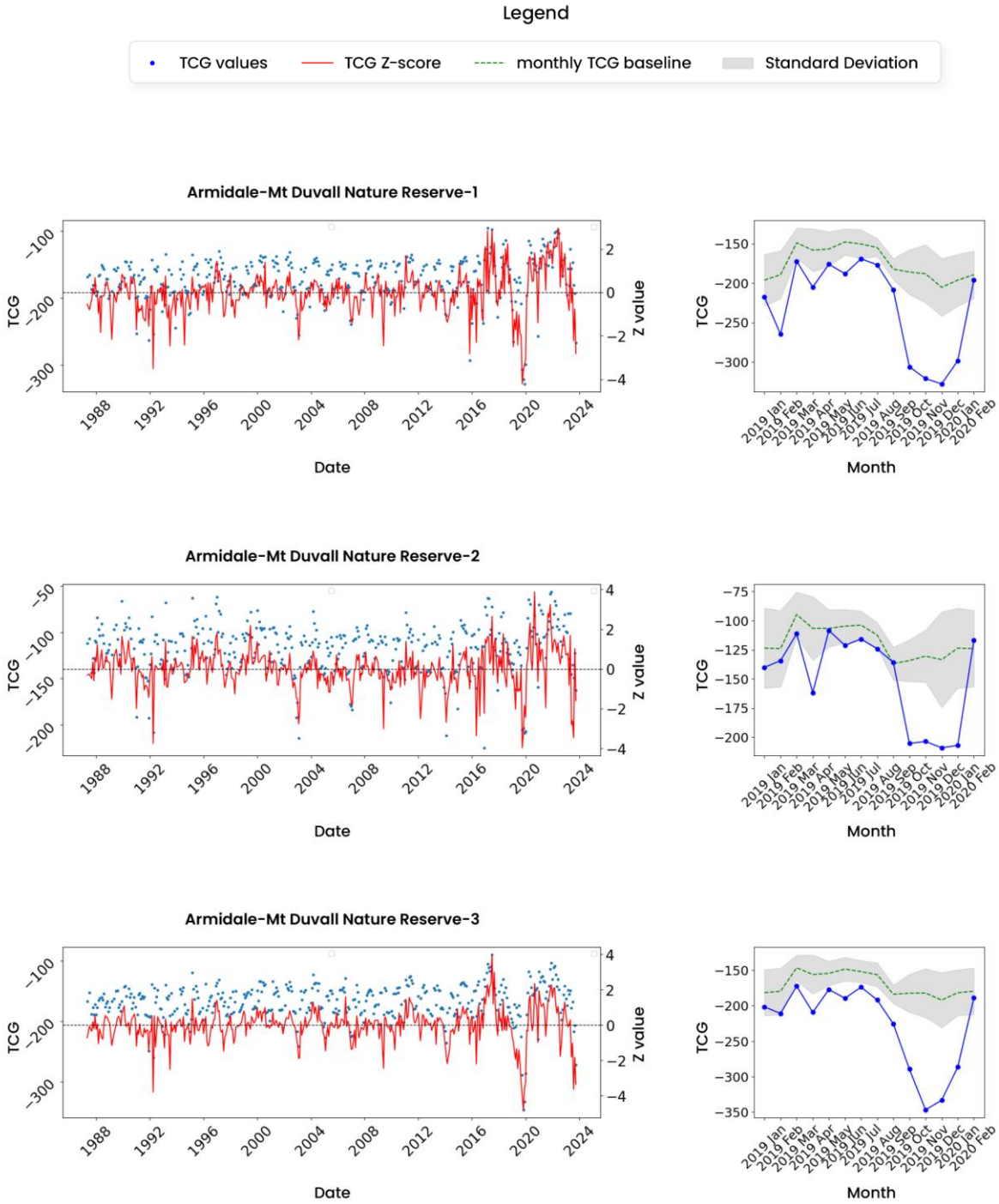
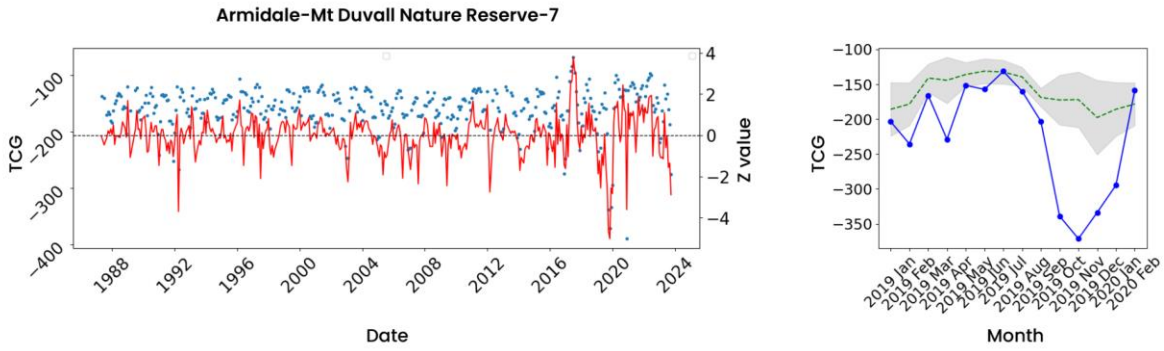
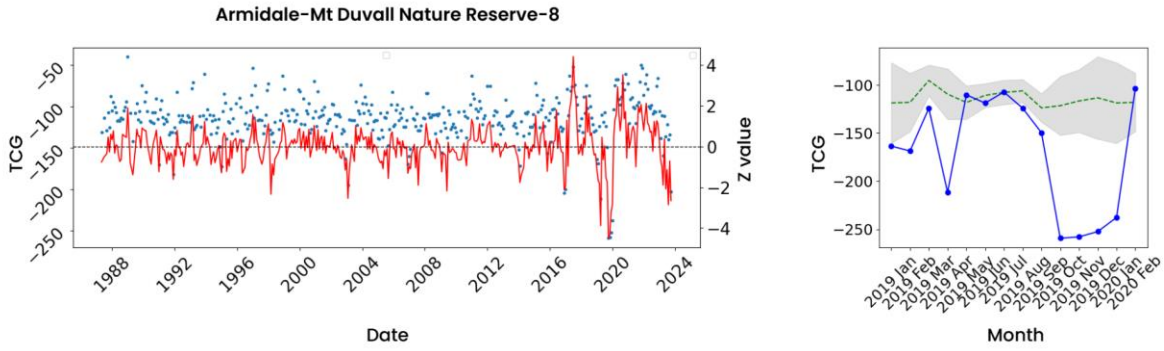
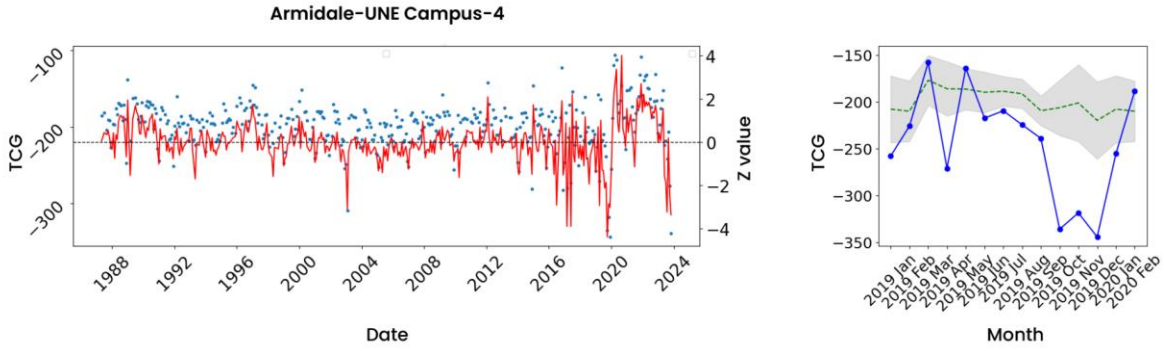


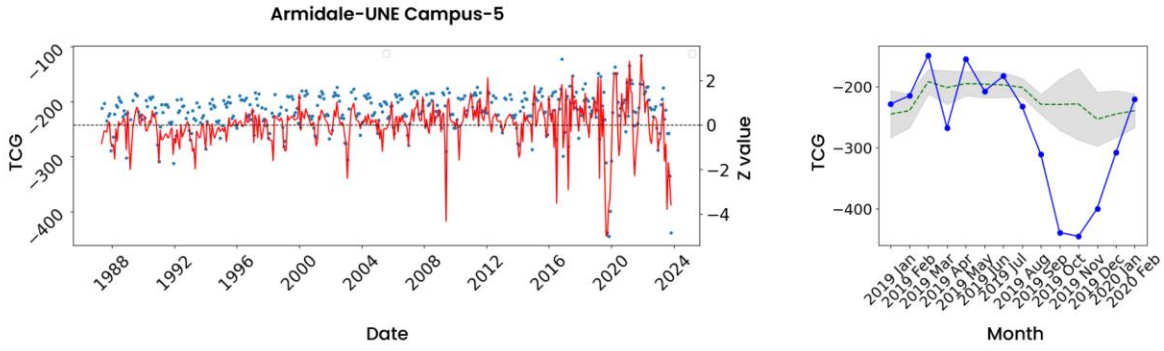
Figure S3. Time series of the monthly Normalised Difference Vegetation (NDVI) index and z-scores at all the 37 sites across the study area. The left side figures represent the monthly Sentinel 2 time series from 1998-2022. The right figures represent a close-up of the 2019-20 drought event.

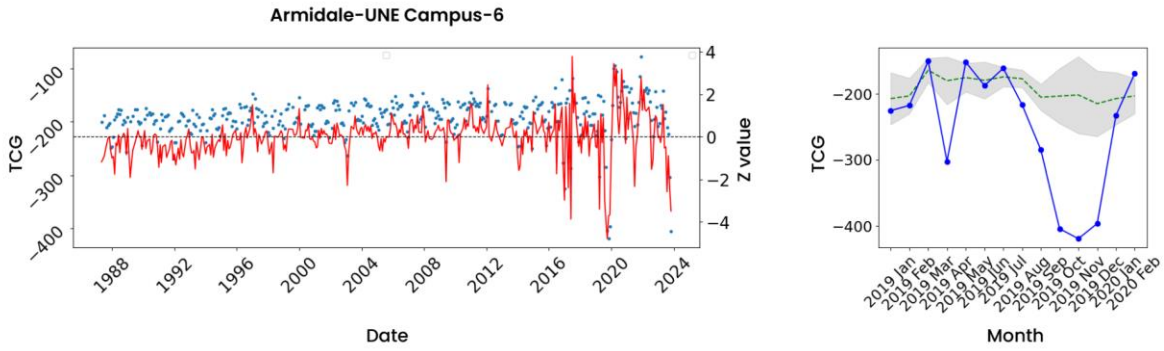


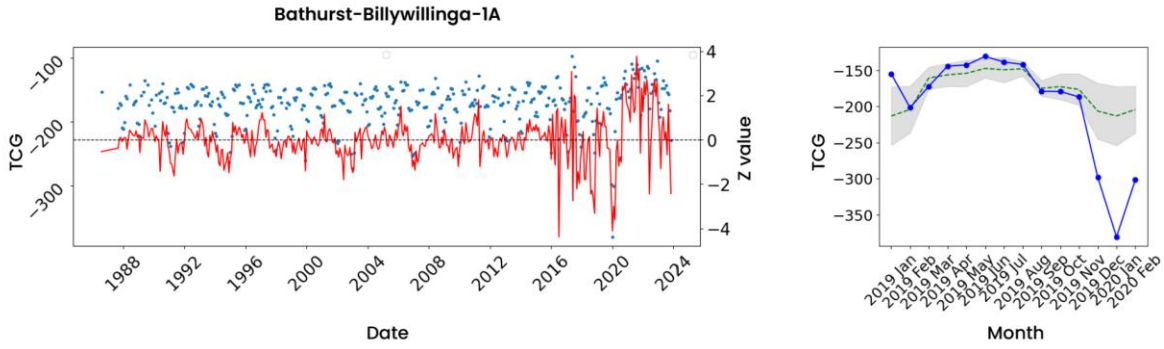

Armidale-Mt Duvall Nature Reserve-7
TCG
Z value
Date
Month

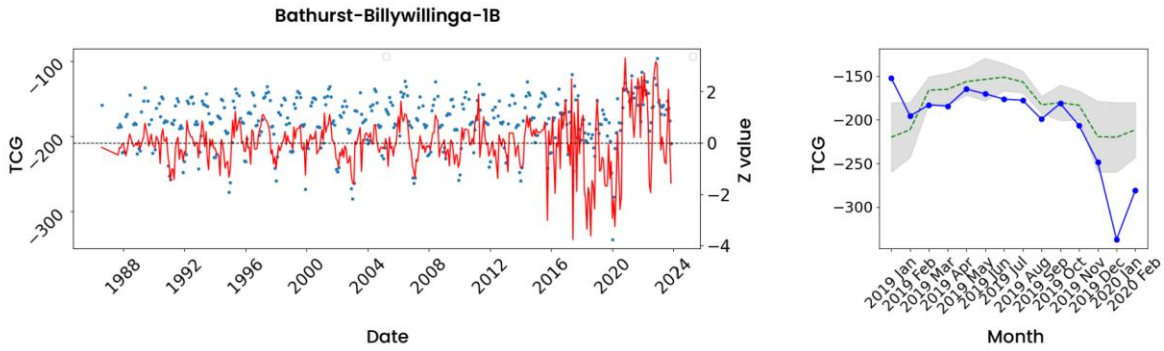

Armidale-Mt Duvall Nature Reserve-8
TCG
Z value
Date
Month

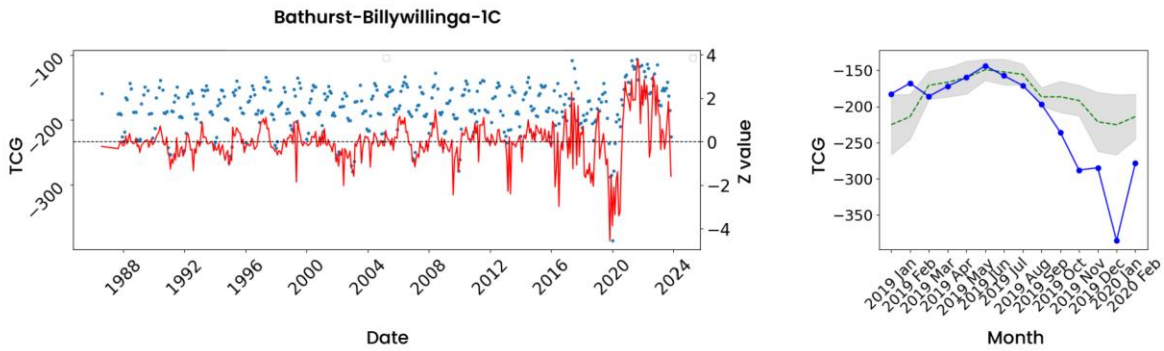

Armidale-UNE Campus-4
TCG
Z value
Date
Month

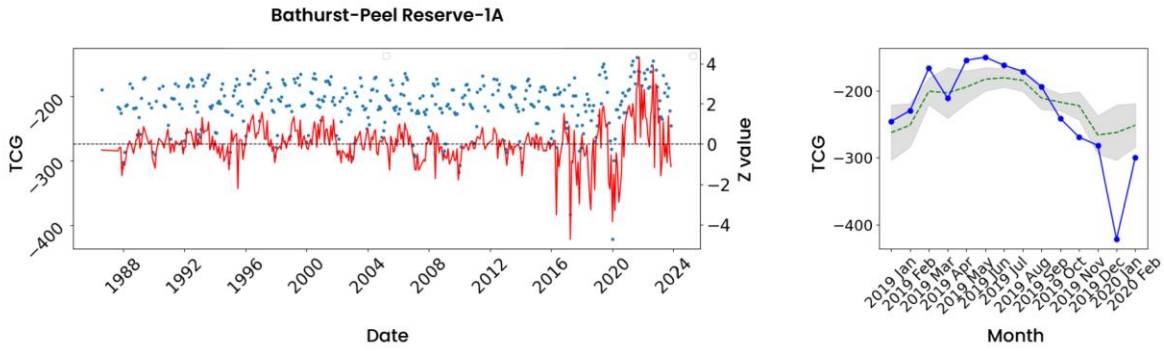

Armidale-UNE Campus-5
TCG
Z value
Date
Month

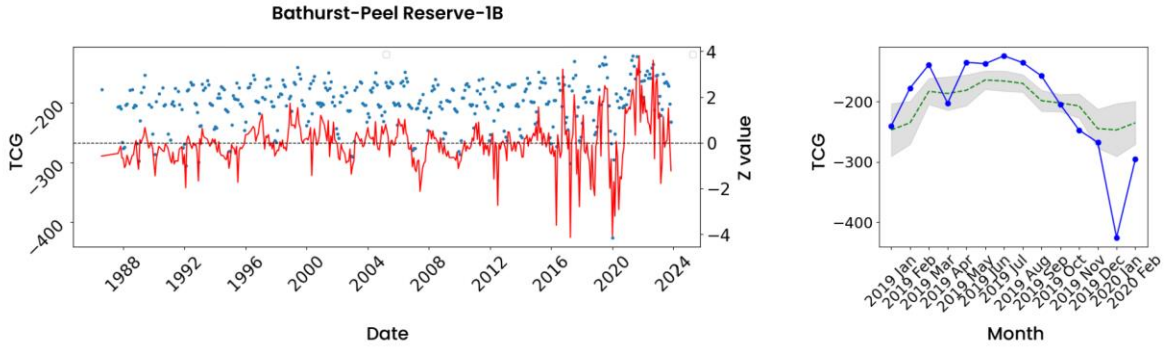

Armidale-UNE Campus-6
TCG
Z value
Date
Month

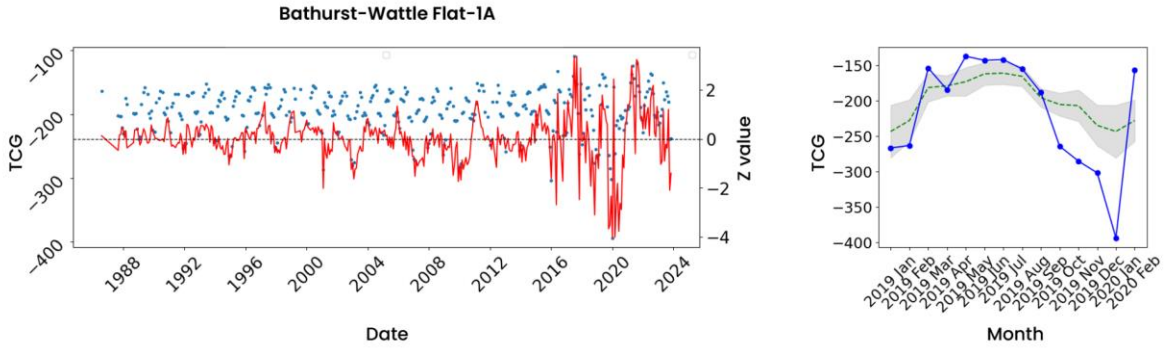

Bathurst-Billywillinga-1A
TCG
Z value
Date
Month

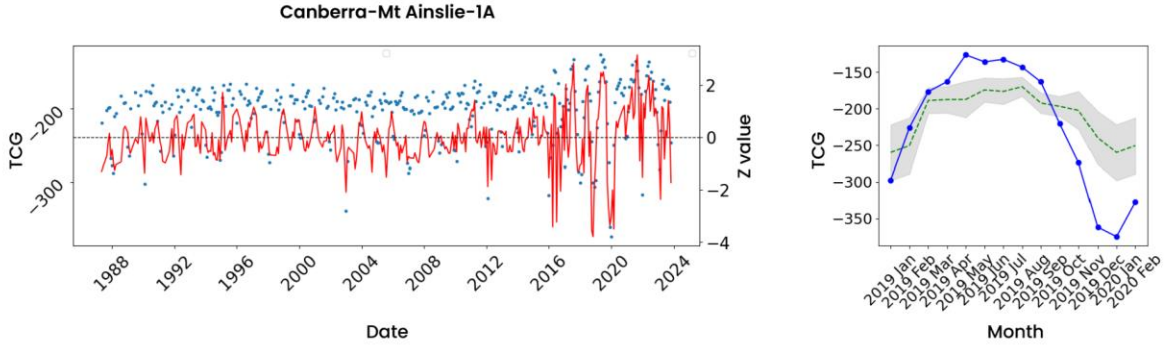

Bathurst-Billywillinga-1B
TCG
Z value
Date
Month

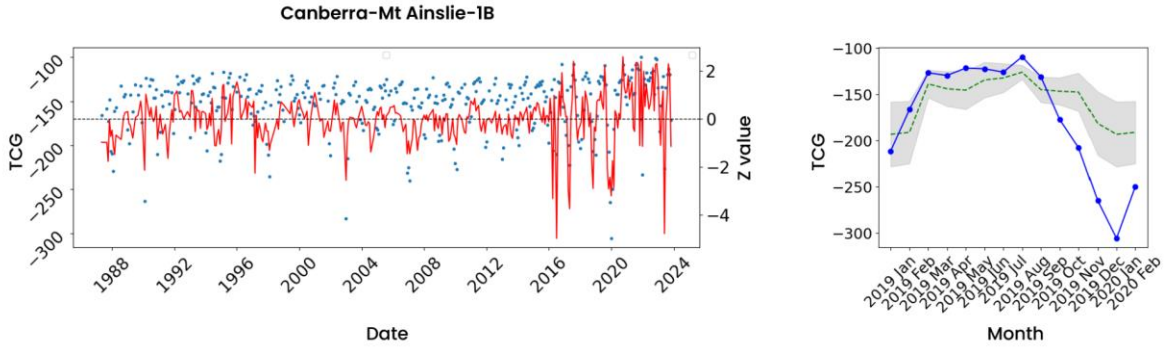

Bathurst-Billywillinga-1C
TCG
Z value
Date
Month

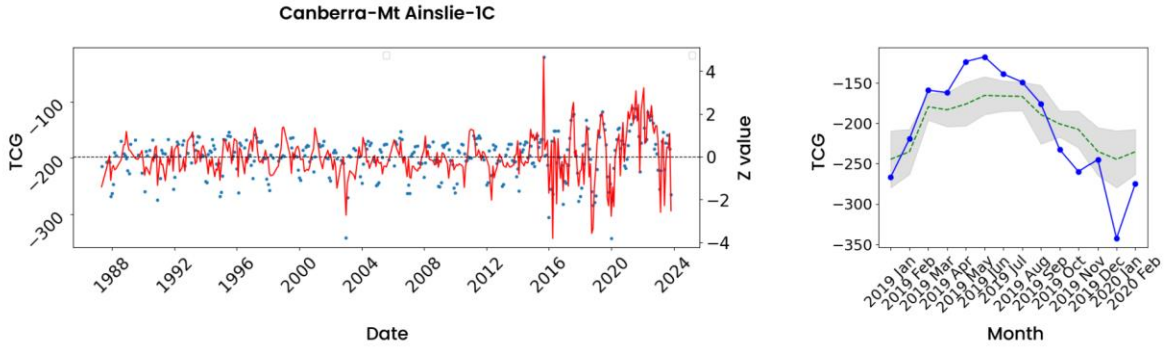

Bathurst-Peel Reserve-1A
TCG
Z value
Date
Month

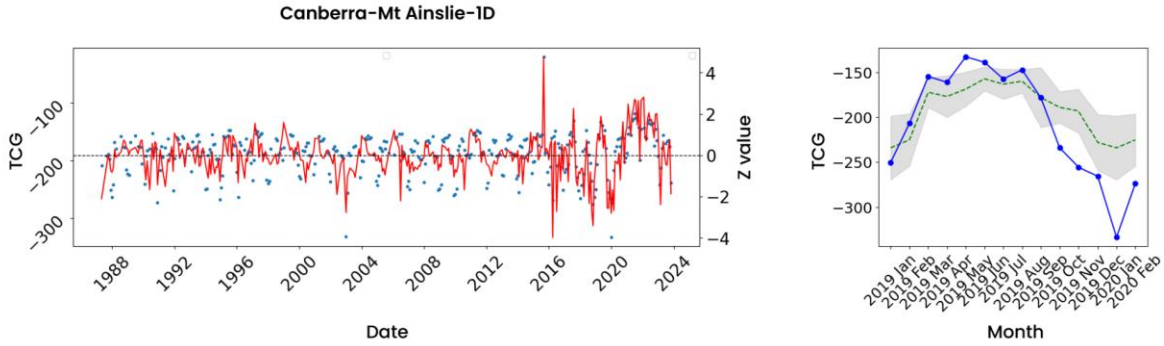

Bathurst-Peel Reserve-1B
TCG
Z value
Date
Month

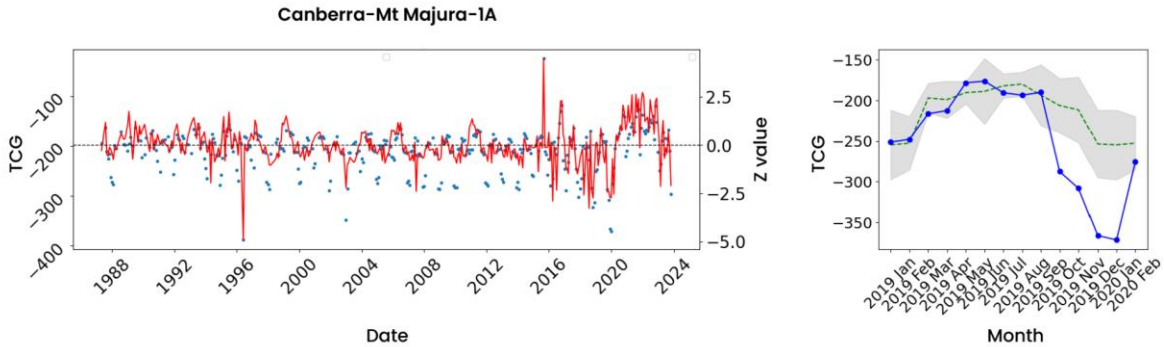

Bathurst-Wattle Flat-1A
TCG
Z value
Date
Month


Canberra-Mt Ainslie-1A
TCG
Z value
Date
Month

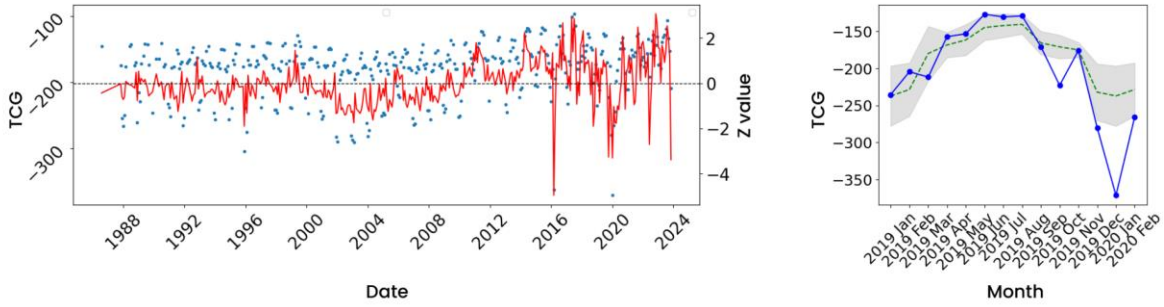

Canberra-Mt Ainslie-1B
TCG
Z value
Date
Month


Canberra-Mt Ainslie-1C
TCG
Z value
Date
Month

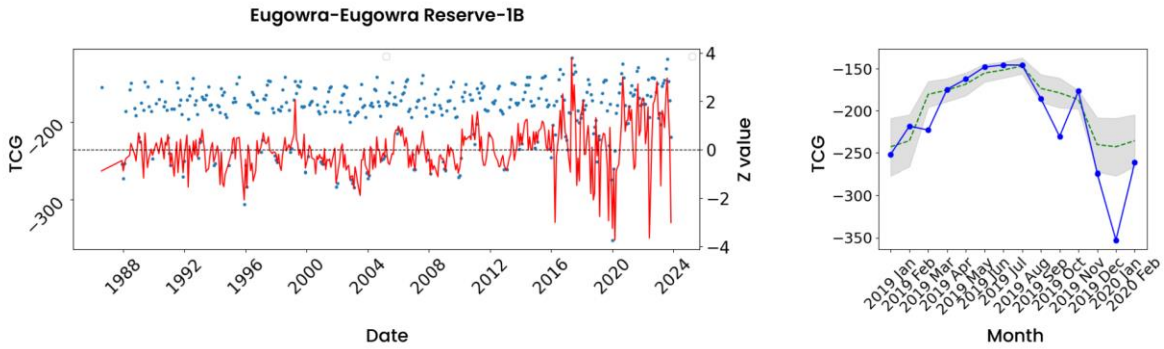

Canberra-Mt Ainslie-1D
TCG
Z value
Date
Month


Canberra-Mt Majura-1A
TCG
Z value
Date
Month

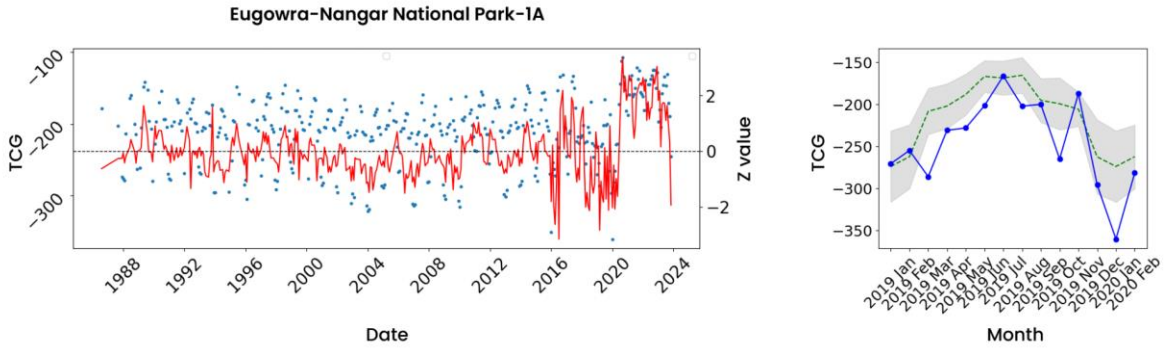
Eugowra-Eugowra Reserve-1A



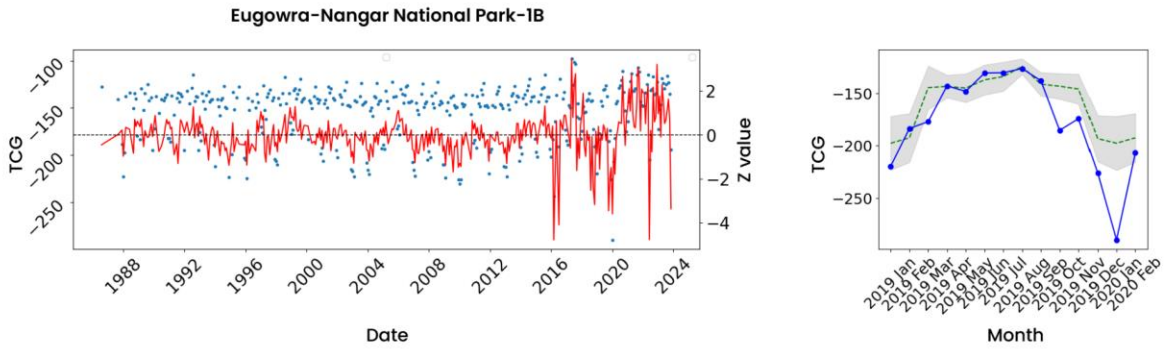
Eugowra-Eugowra Reserve-1B



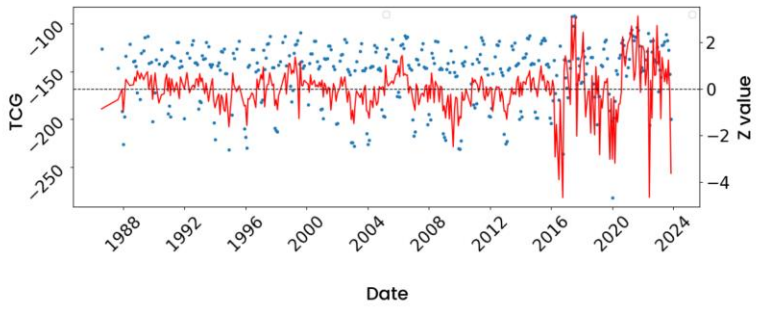
Eugowra-Nangar National Park-1A

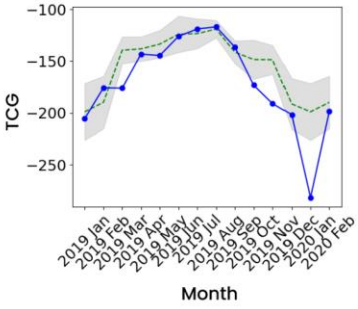


Eugowra-Nangar National Park-1B

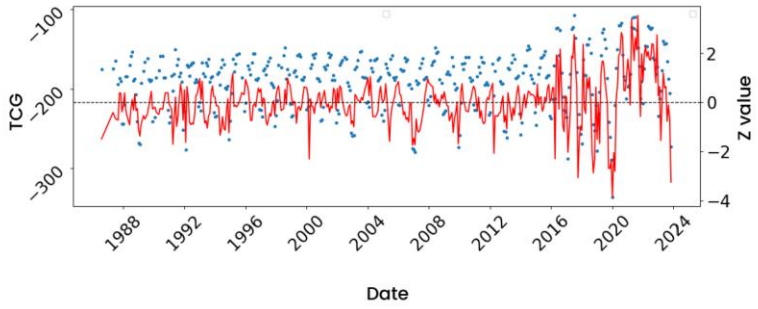


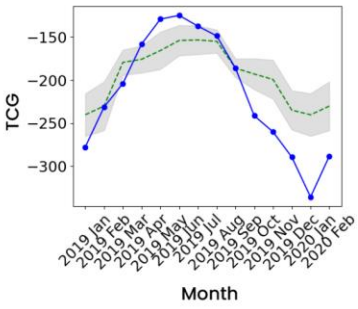
Eugowra-Nangar National Park-1C



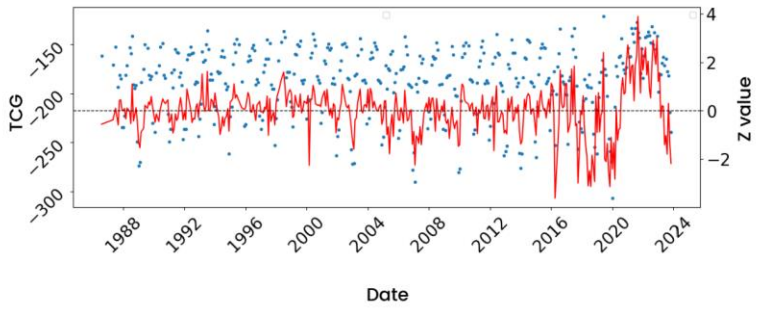


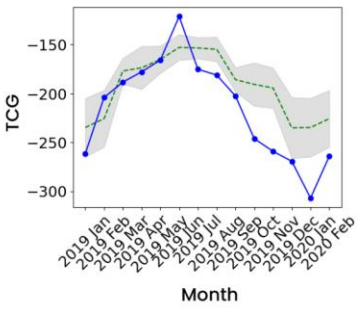
Mudgee-Mudgee, Henry Bayly Rd-1A



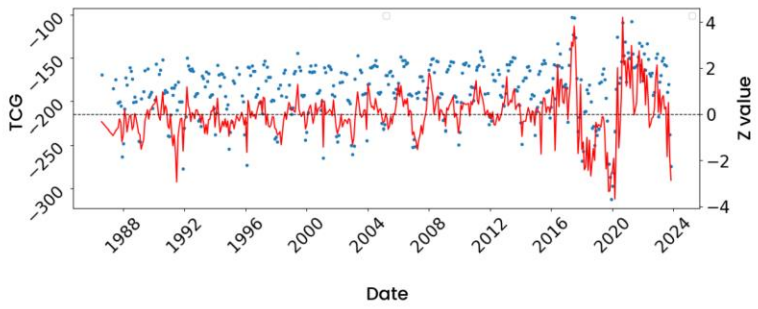


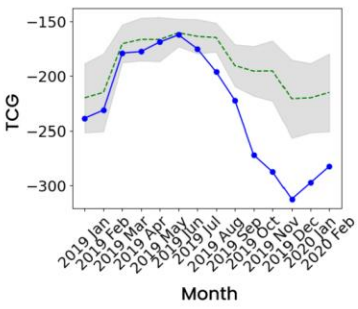
Mudgee-Mudgee, Henry Bayly Rd-1B



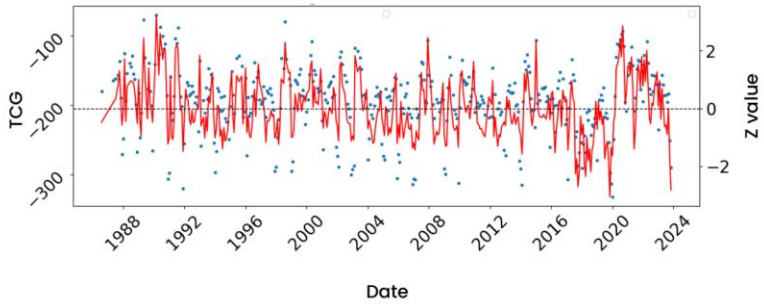


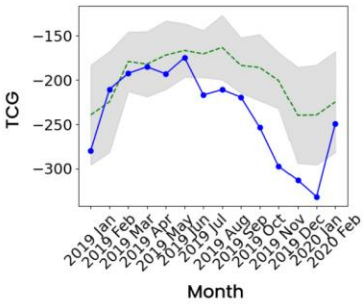
Mudgee-Mudhut Rd Site-1A



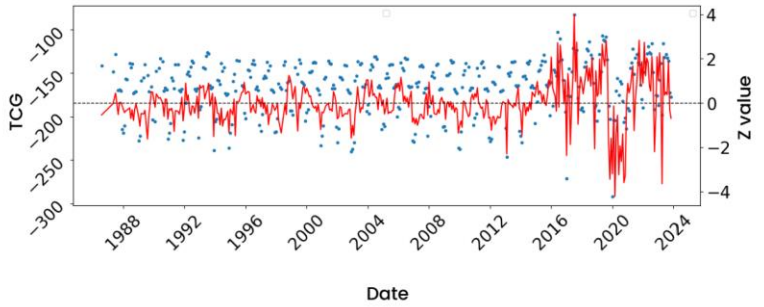


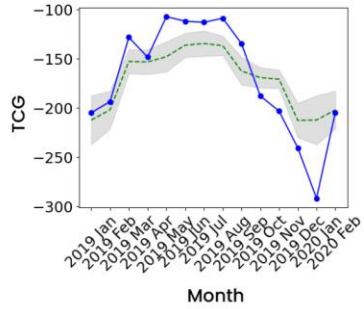
Mudgee-Mudhut Rd Site-1B



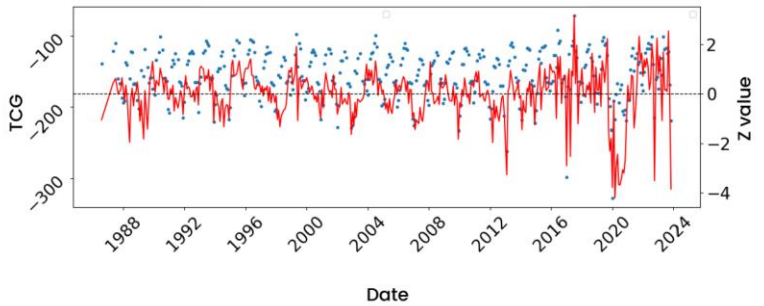


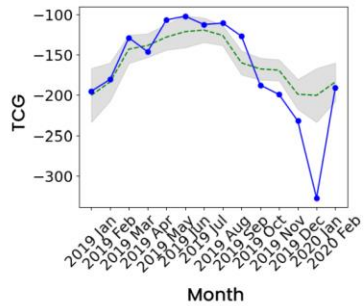
Mudgee-Munghorn gap nature reserve-1A



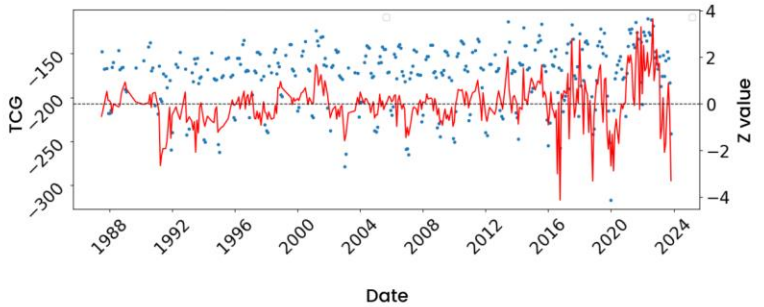


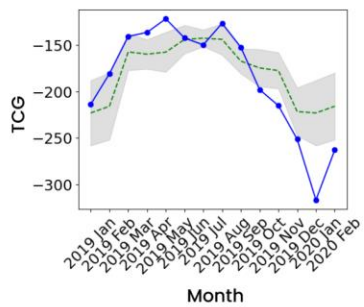
Mudgee-Munghorn gap nature reserve-1B

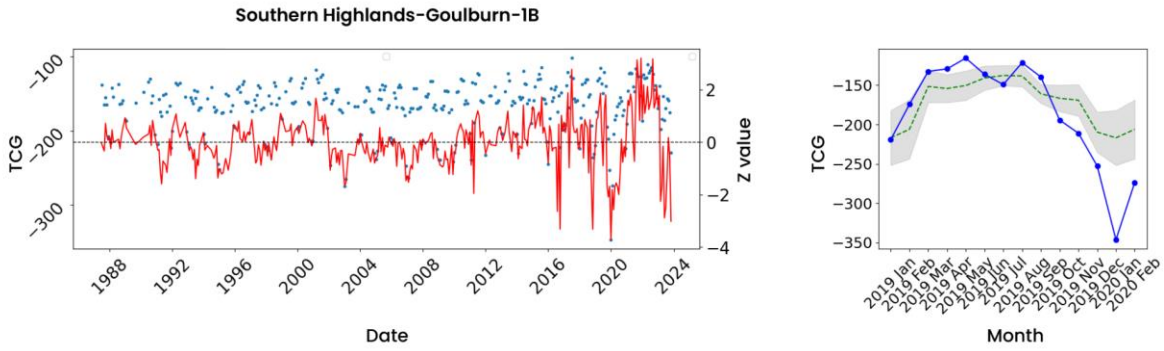


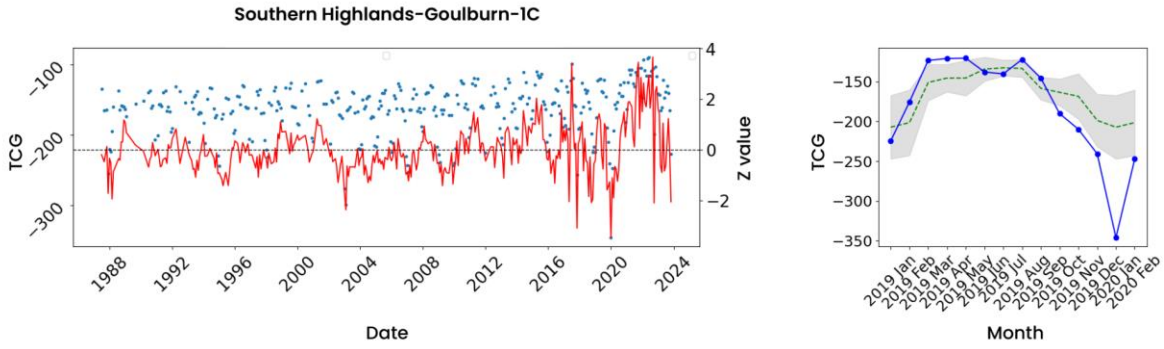


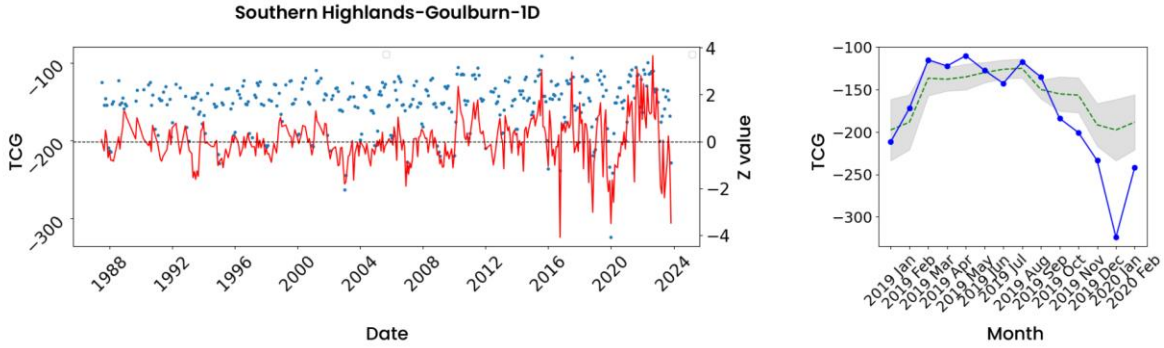
Southern Highlands-Goulburn-1A

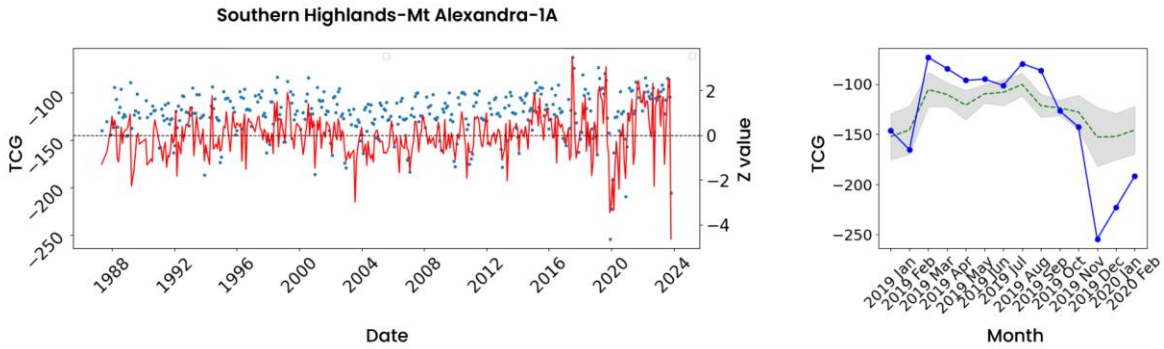





Southern Highlands-Goulburn-1B
TCG
Z value
Date
Month


Southern Highlands-Goulburn-1C
TCG
Z value
Date
Month


Southern Highlands-Goulburn-1D
TCG
Z value
Date
Month


Southern Highlands-Mt Alexandra-1A
TCG
Z value
Date
Month

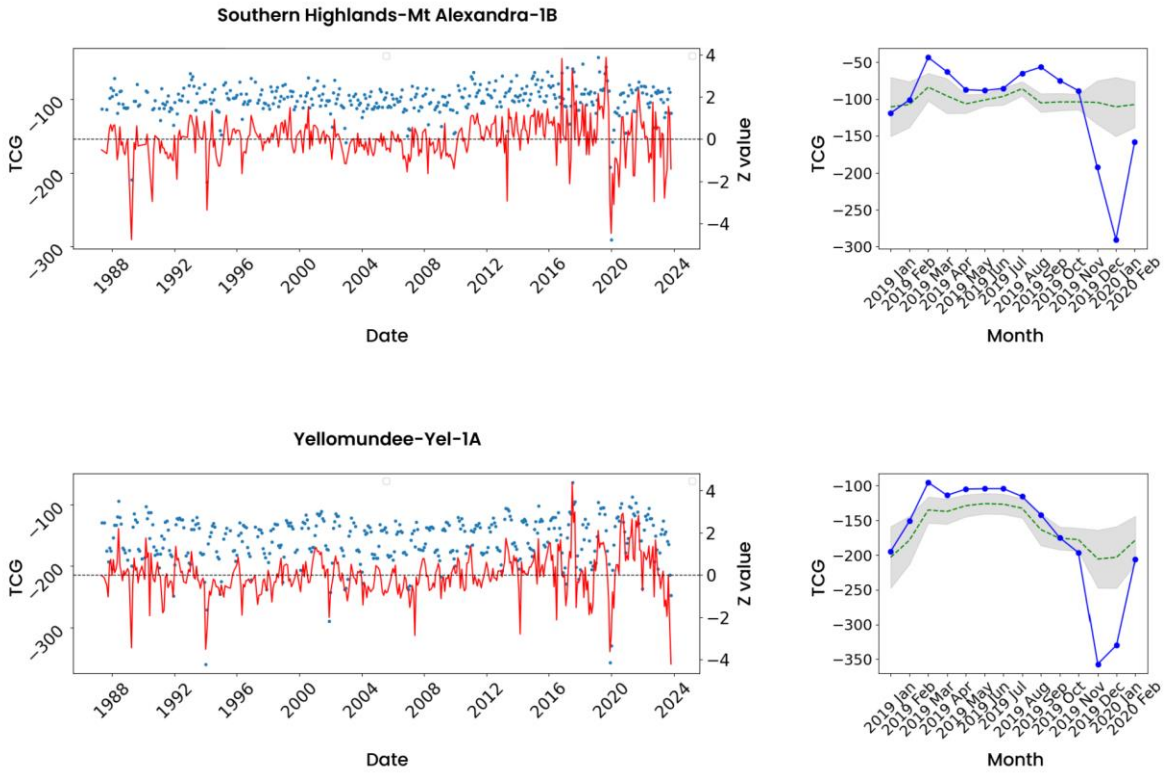
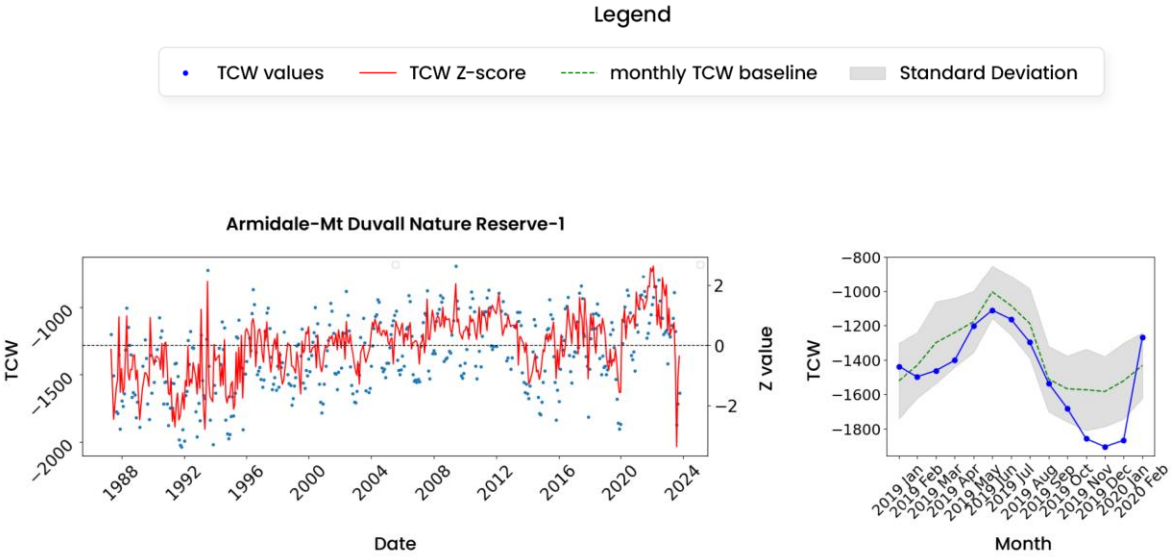
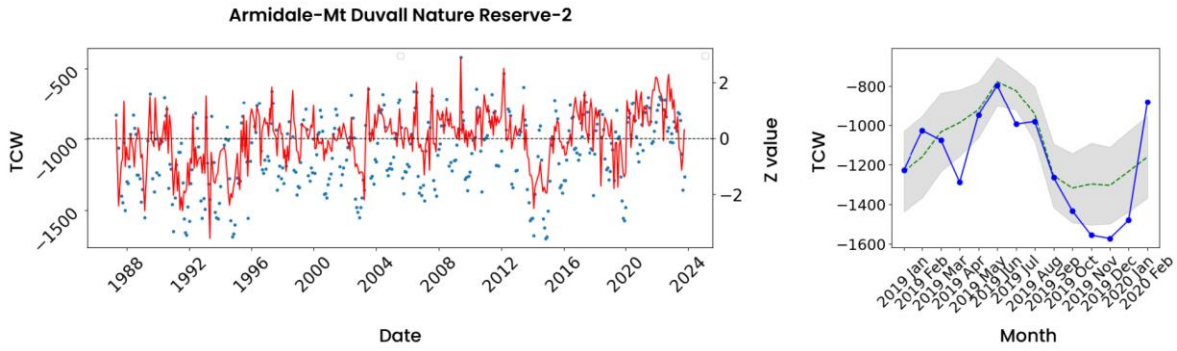
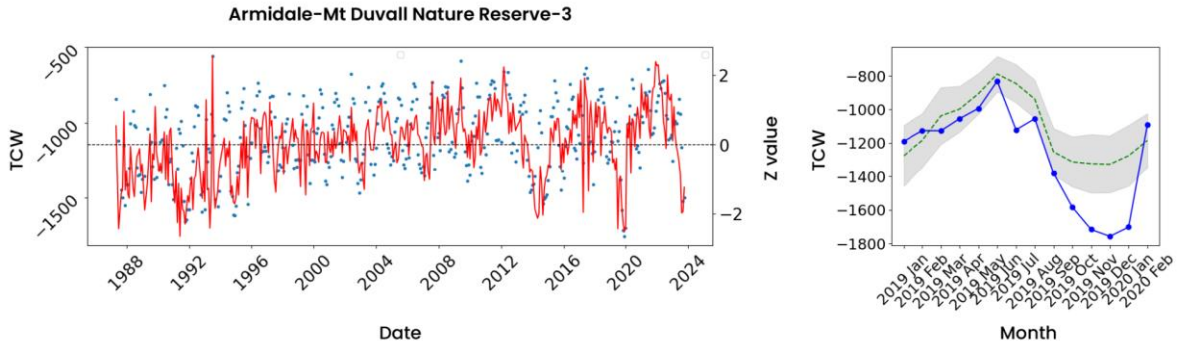
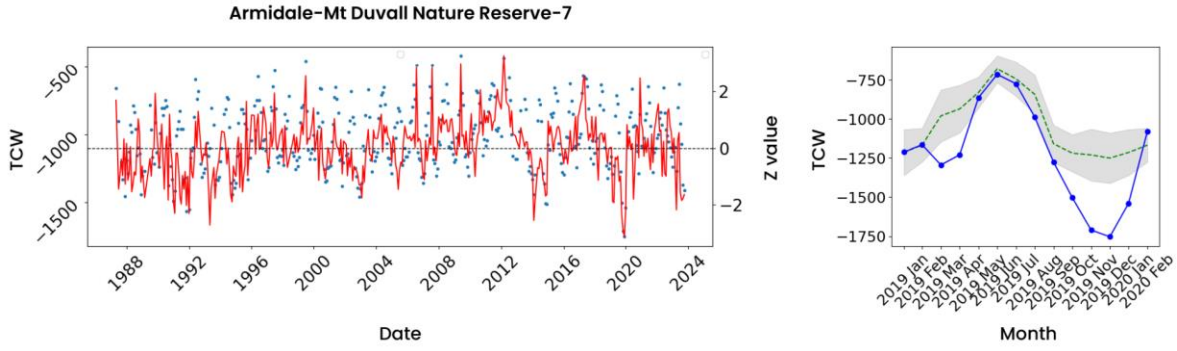


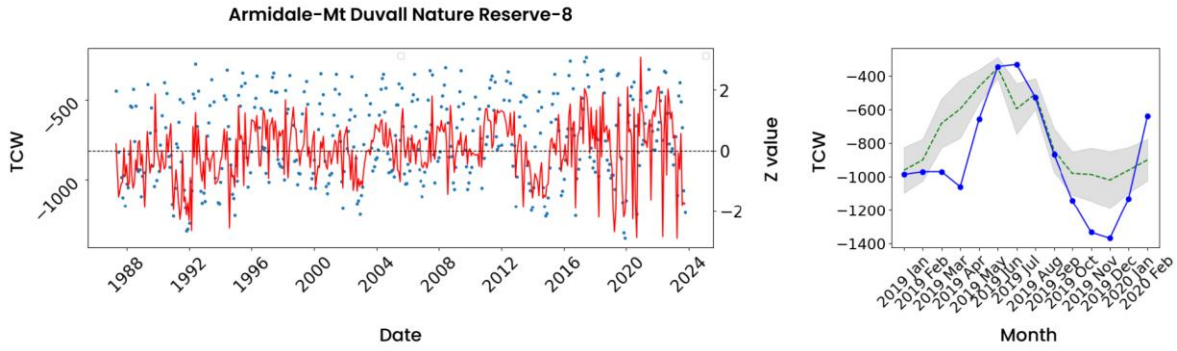
Figure S4. Time series of the monthly Tasseled Cap Greenness (TCG) index and z-scores at all the 37 sites across the study area. The left side figures represent the monthly Sentinel 2 time series from 1998-2022. The right figures represent a close-up of the 2019-20 drought event.

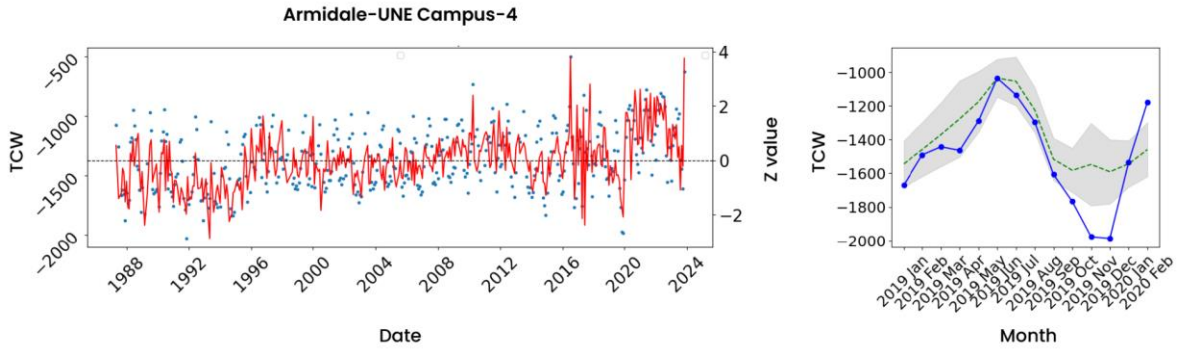


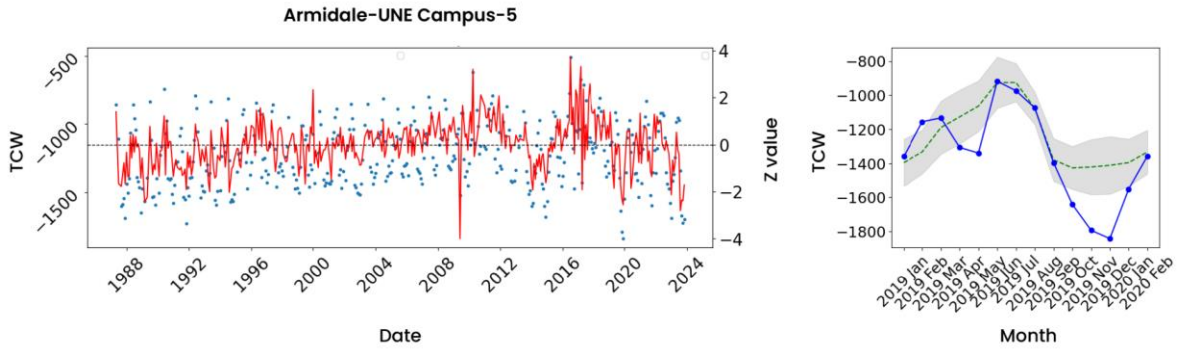

Armidale-Mt Duvall Nature Reserve-2
TCW
Z value
Date
Month

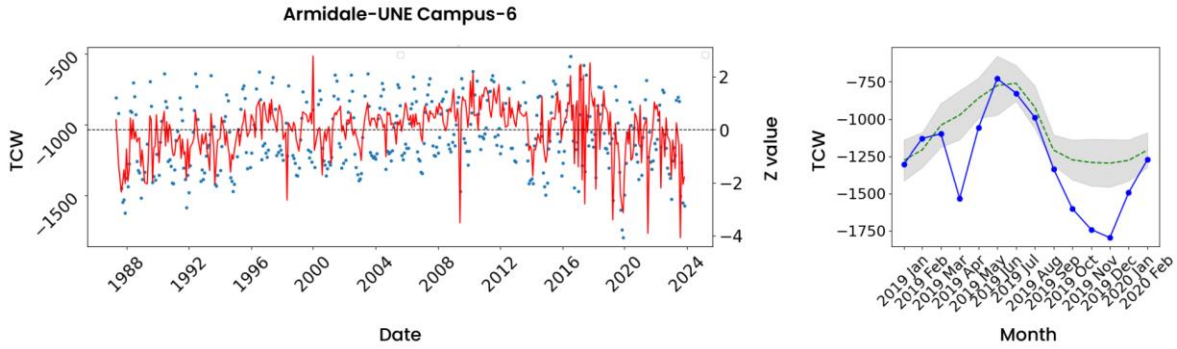

Armidale-Mt Duvall Nature Reserve-3
TCW
Z value
Date
Month

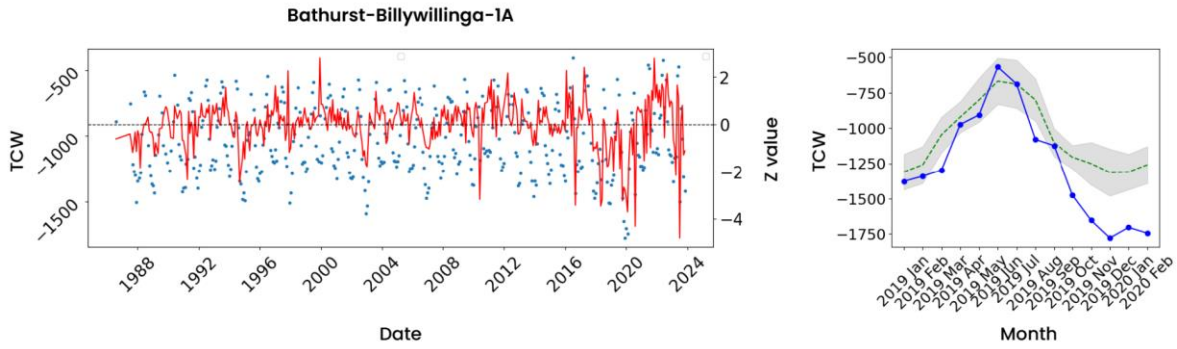

Armidale-Mt Duvall Nature Reserve-7
TCW
Z value
Date
Month

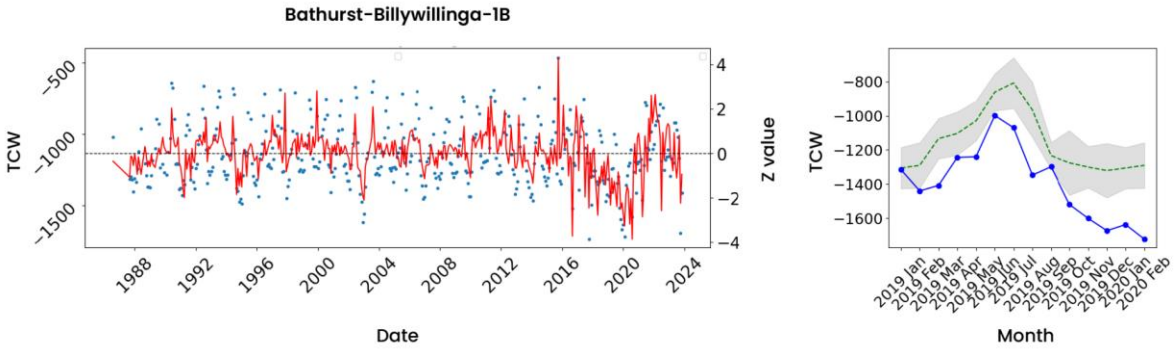

Armidale-Mt Duvall Nature Reserve-8
TCW
Z value
Date
Month

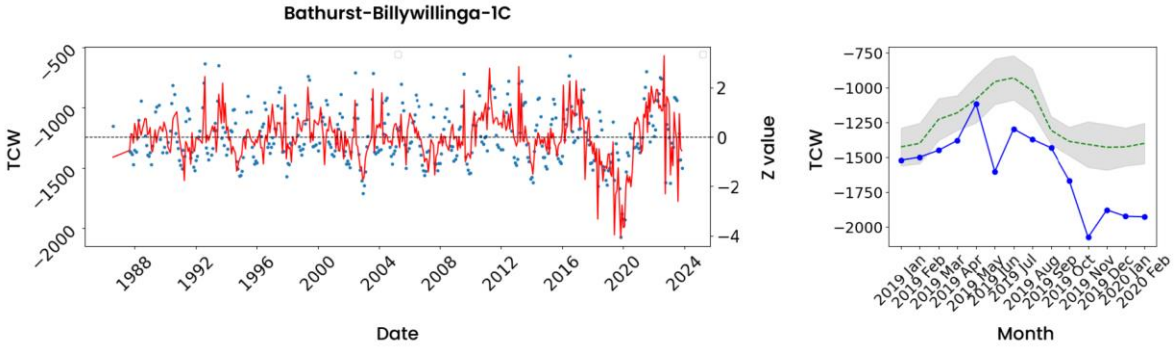

Armidale-UNE Campus-4
TCW
Z value
Date
Month

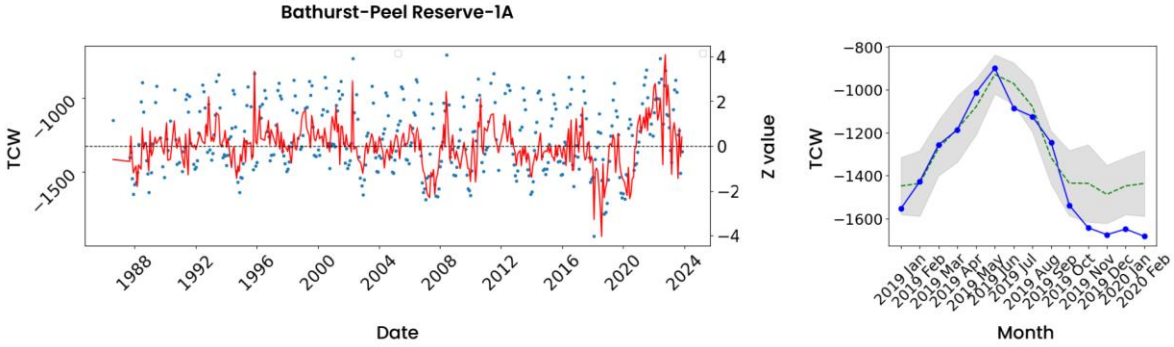

Armidale-UNE Campus-5
TCW
Z value
Date
Month

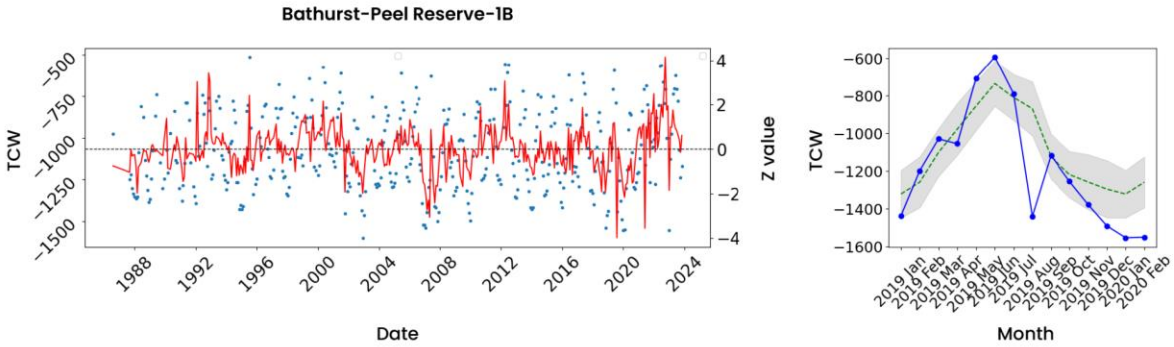

Armidale-UNE Campus-6
TCW
Z value
Date
Month

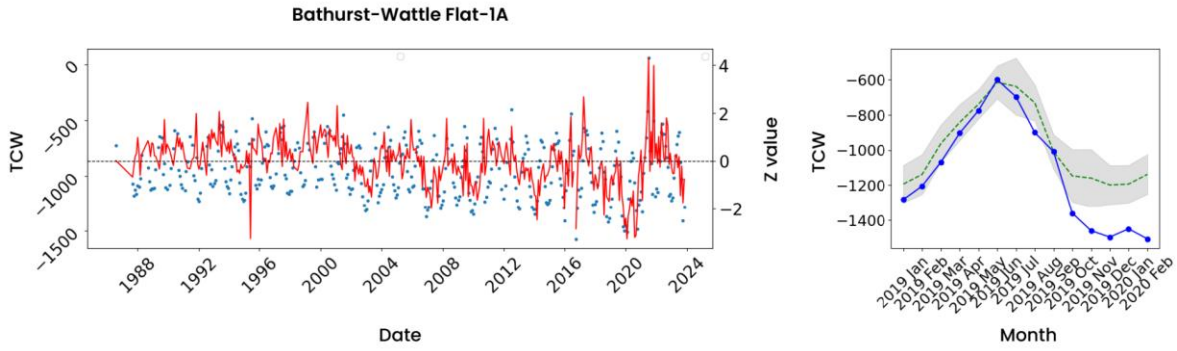

Bathurst-Billywillinga-1A
TCW
Z value
Date
Month

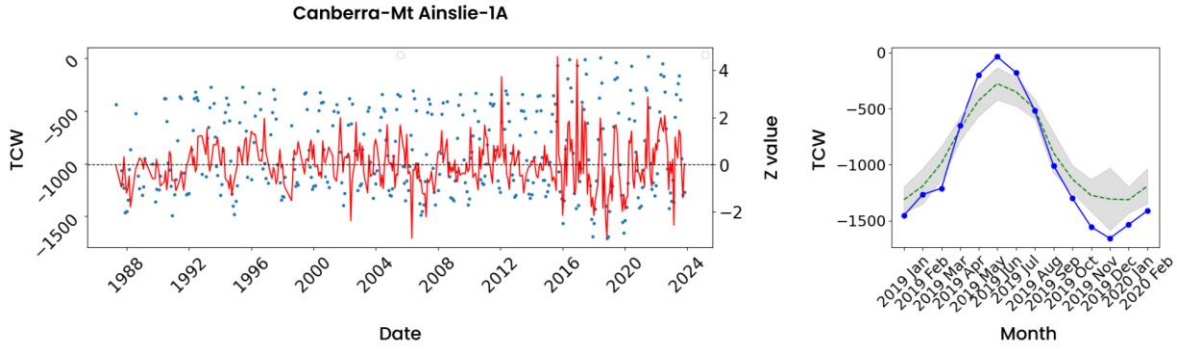

Bathurst-Billywillinga-1B
TCW
Z value
Date
Month

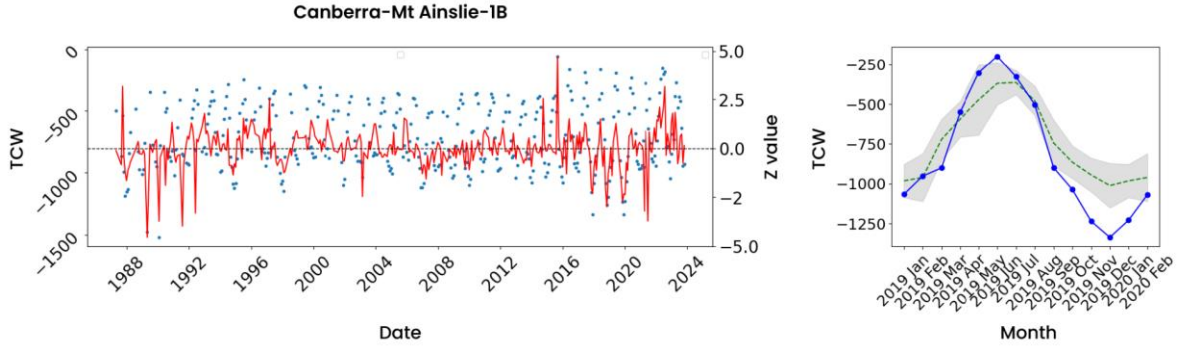

Bathurst-Billywillinga-1C
TCW
Z value
Date
Month

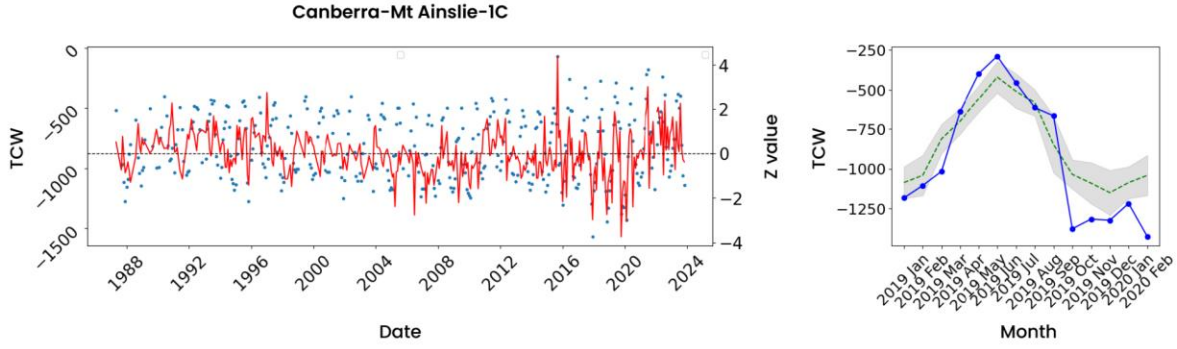

Bathurst-Peel Reserve-1A
TCW
Z value
Date
Month

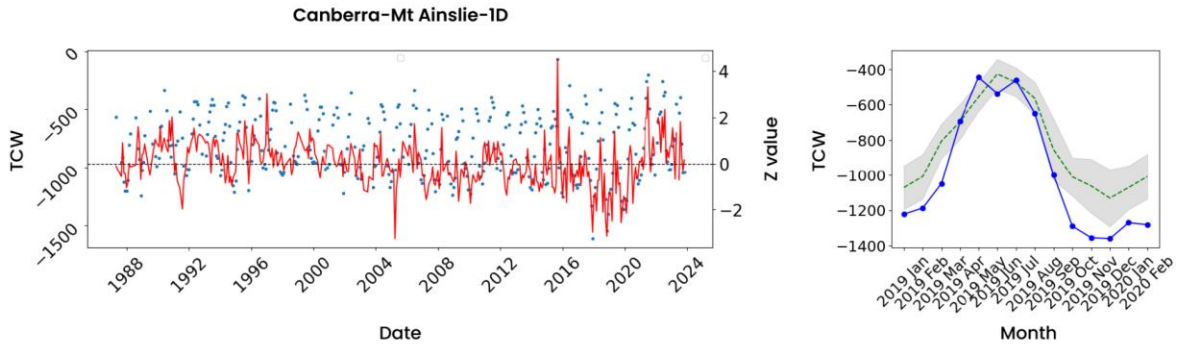

Bathurst-Peel Reserve-1B
TCW
Z value
Date
Month

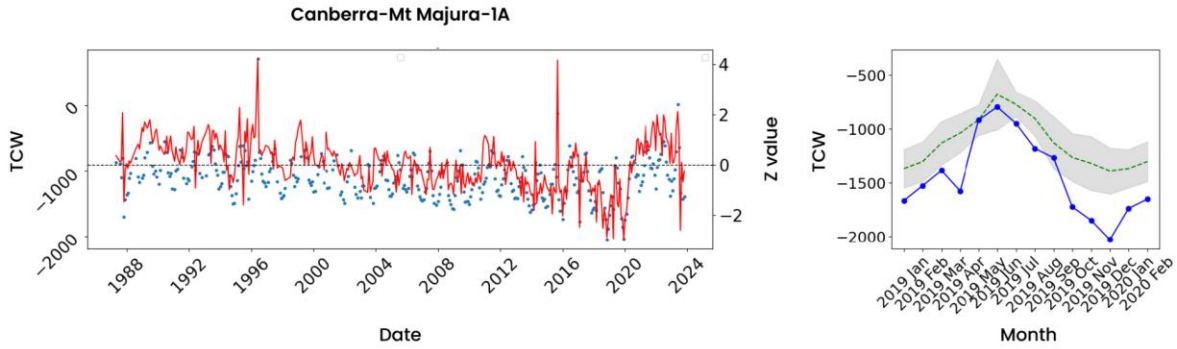

Bathurst-Wattle Flat-1A
TCW
Z value
Date
Month

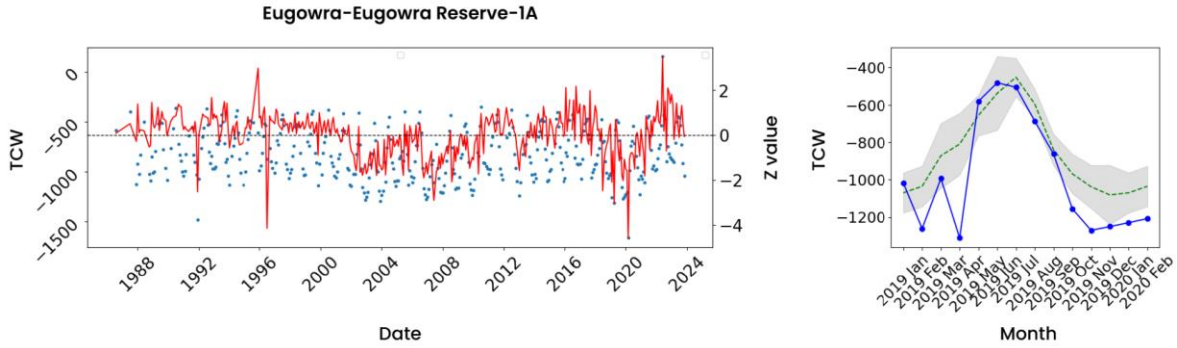

Canberra-Mt Ainslie-1A
TCW
Z value
Date
Month

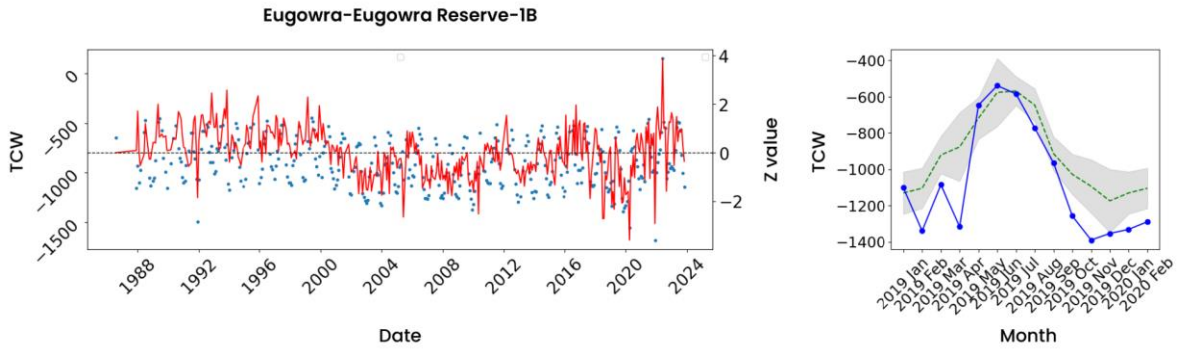

Canberra-Mt Ainslie-1B
TCW
Z value
Date
Month


Canberra-Mt Ainslie-1C
TCW
Z value
Date
Month

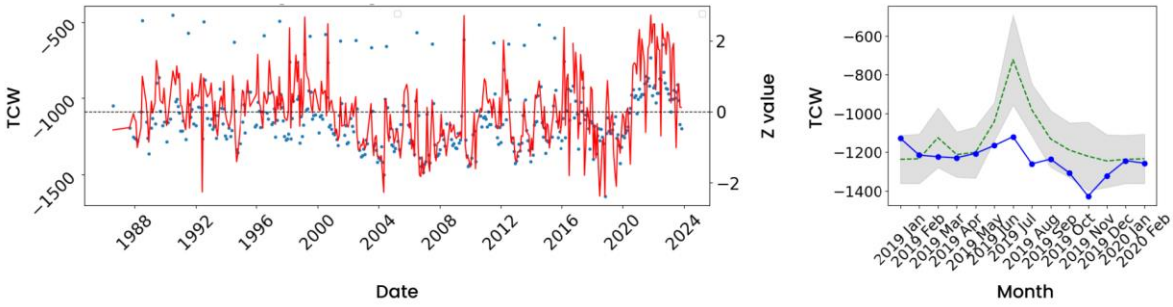

Canberra-Mt Ainslie-1D
TCW
Z value
Date
Month


Canberra-Mt Majura-1A
TCW
Z value
Date
Month

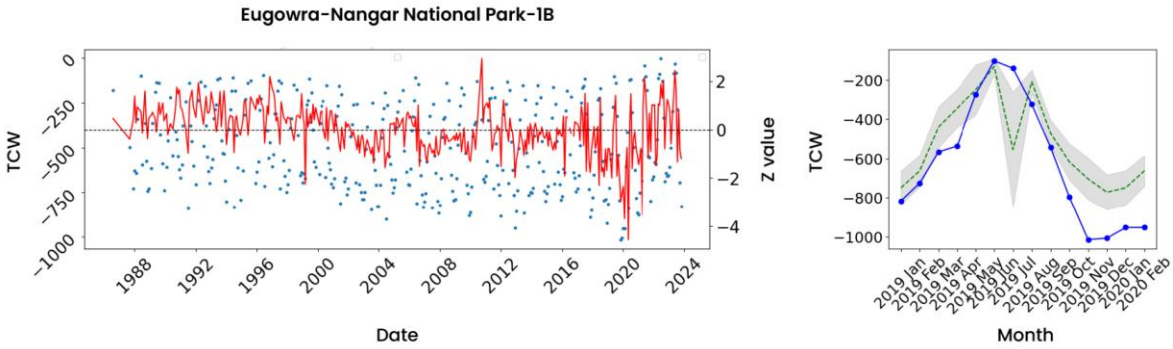

Eugowra-Eugowra Reserve-1A
TCW
Z value
Date
Month


Eugowra-Eugowra Reserve-1B
TCW
Z value
Date
Month

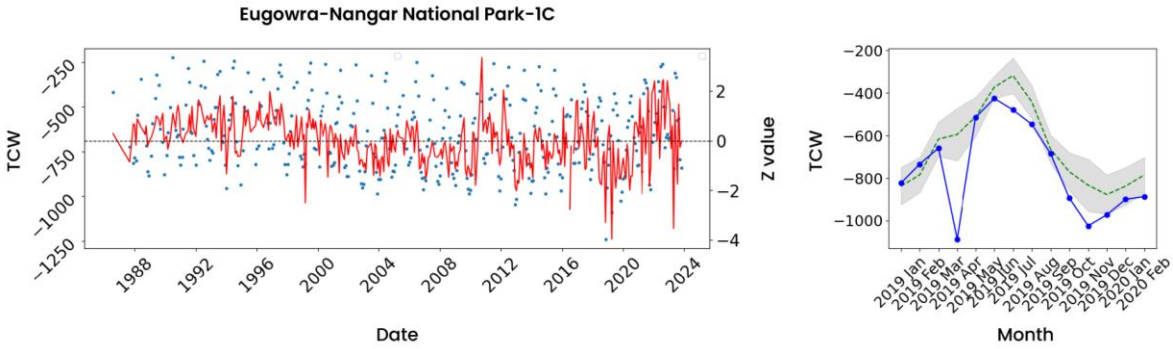
Eugowra-Nangar National Park-1A



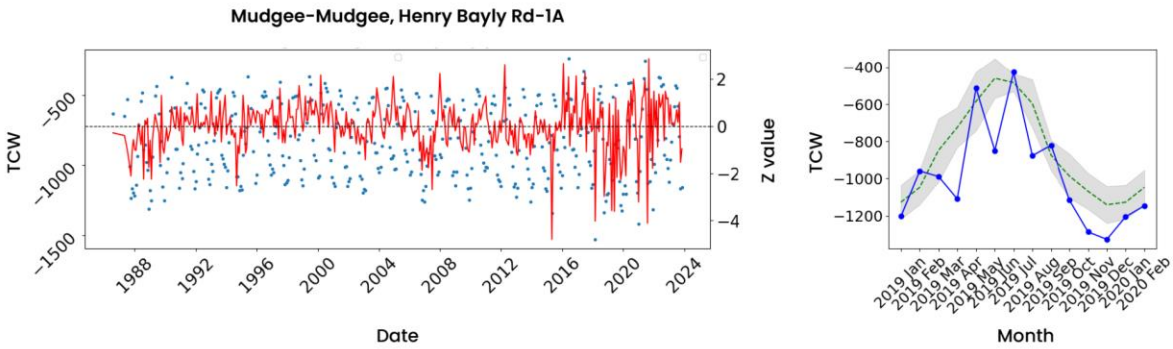
Eugowra-Nangar National Park-1B

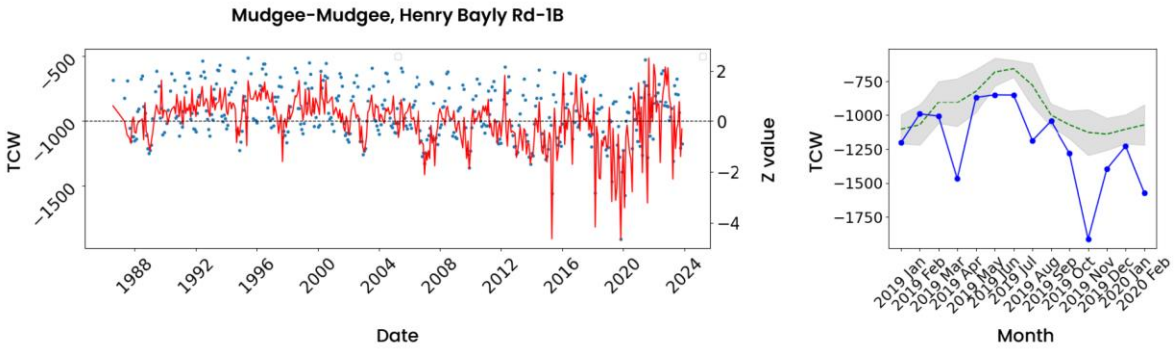


Eugowra-Nangar National Park-1C

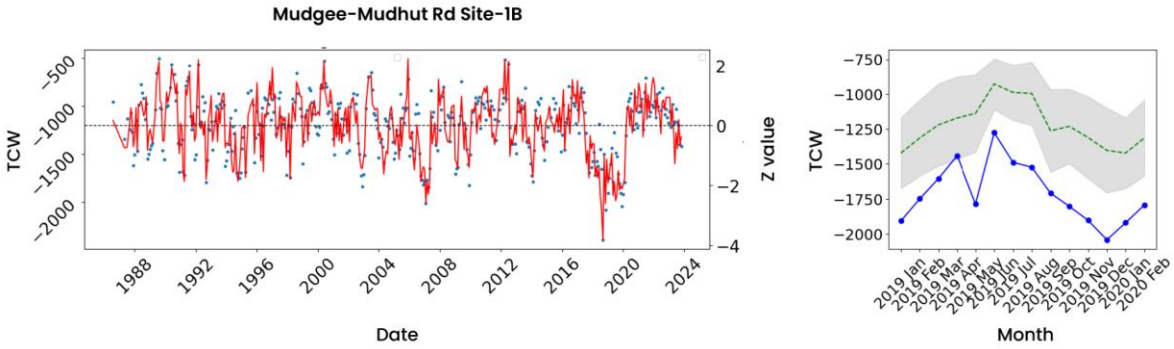


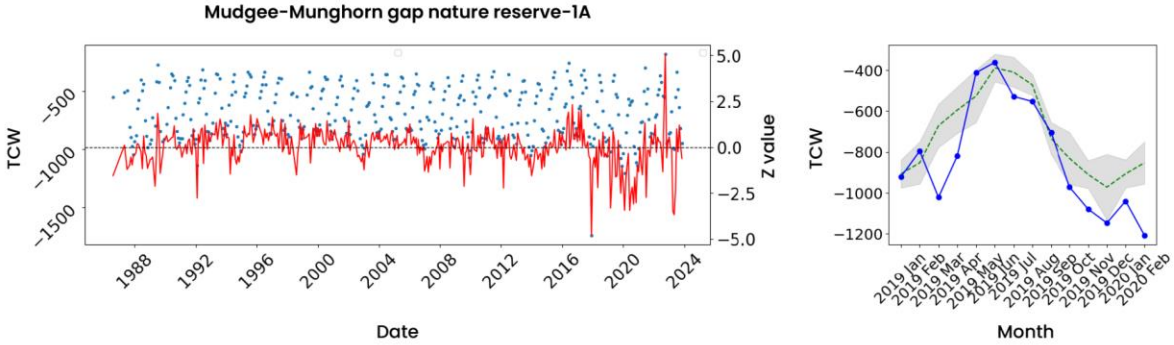
Mudgee-Mudgee, Henry Bayly Rd-1A



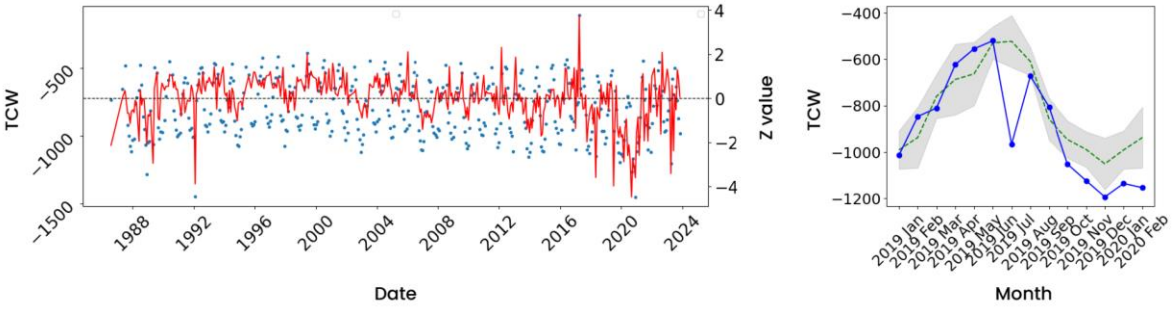

Mudgee-Mudgee, Henry Bayly Rd-1B
TCW
Z value
Date
Month


Mudgee-Mudhut Rd Site-1A
TCW
Z value
Date
Month

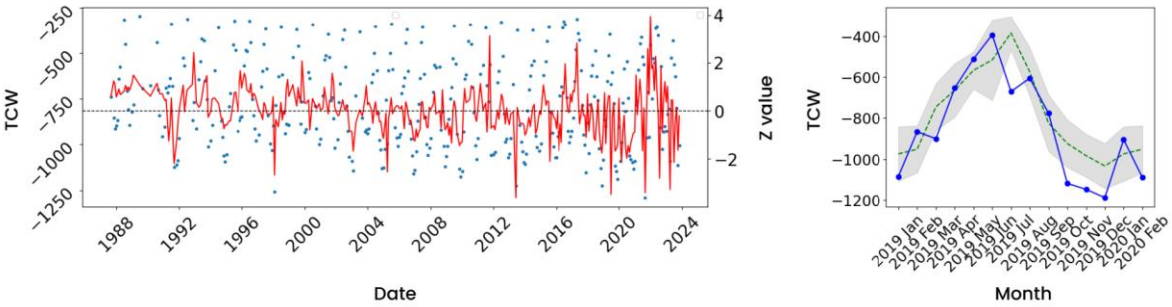

Mudgee-Mudhut Rd Site-1B
TCW
Z value
Date
Month


Mudgee-Munghorn gap nature reserve-1A
TCW
Z value
Date
Month

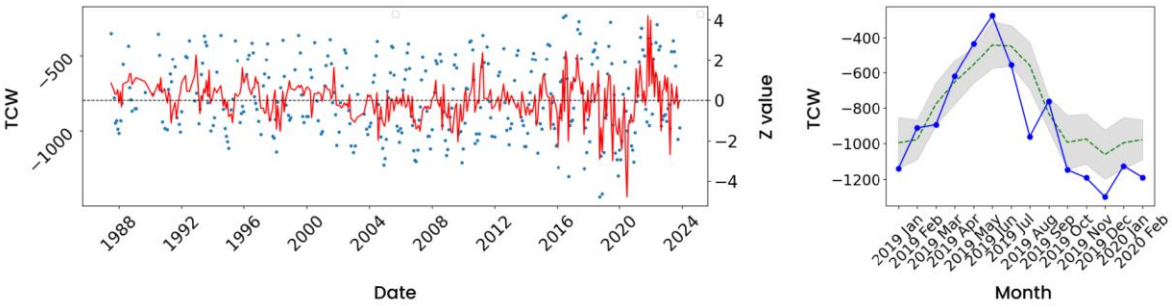
Mudgee-Munghorn gap nature reserve-1B



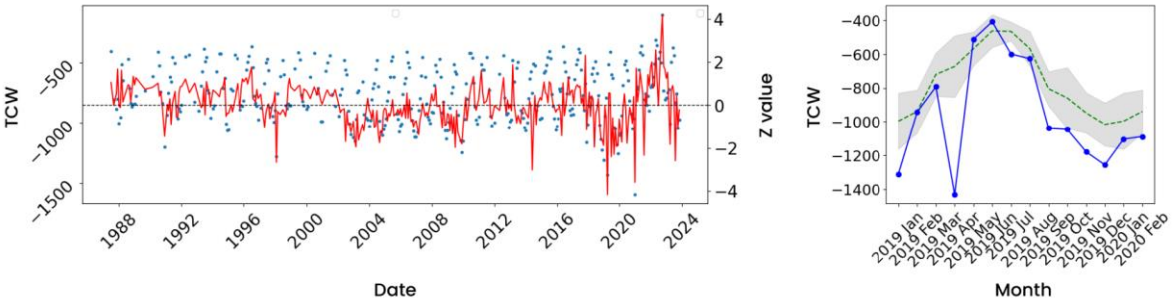
Southern Highlands-Goulburn-1A



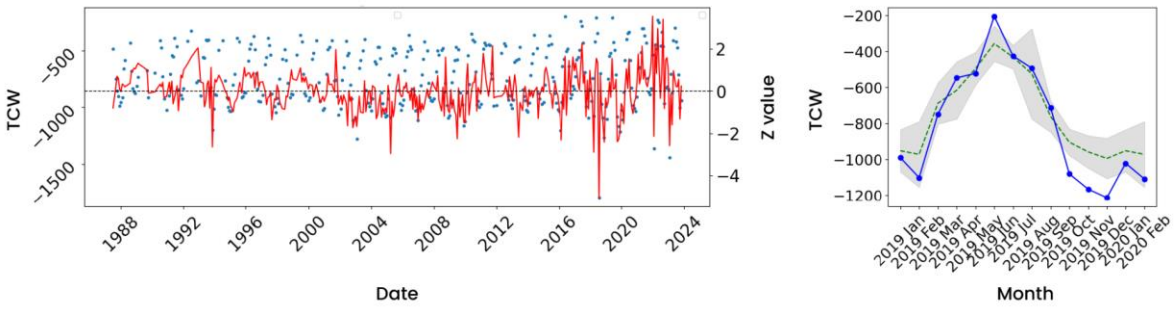
Southern Highlands-Goulburn-1B



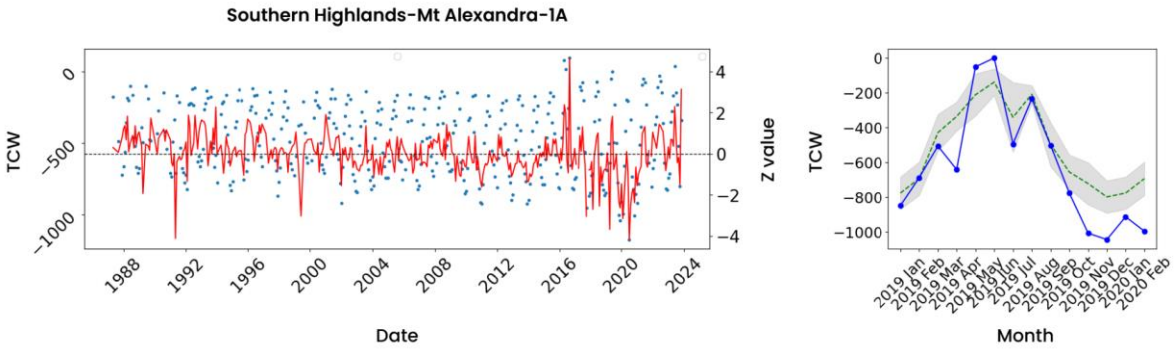
Southern Highlands-Goulburn-1C



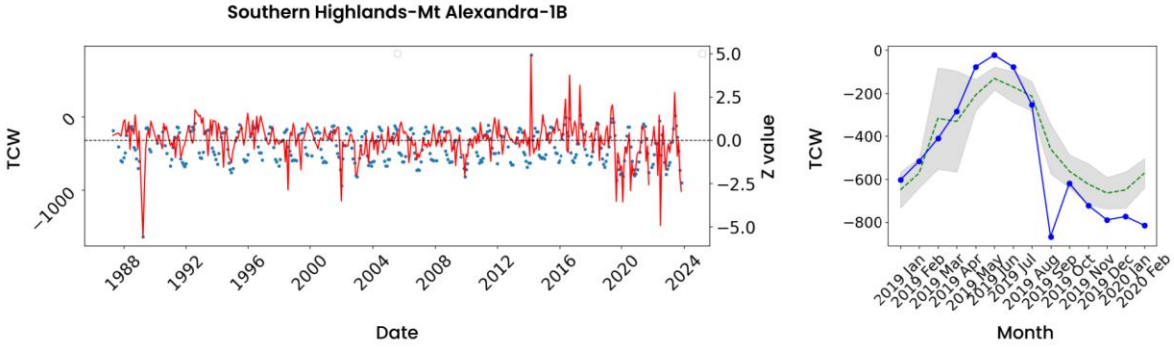
Southern Highlands-Goulburn-1D



Southern Highlands-Mt Alexandra-1A



Southern Highlands-Mt Alexandra-1B



Yellomundee-Yel-1A

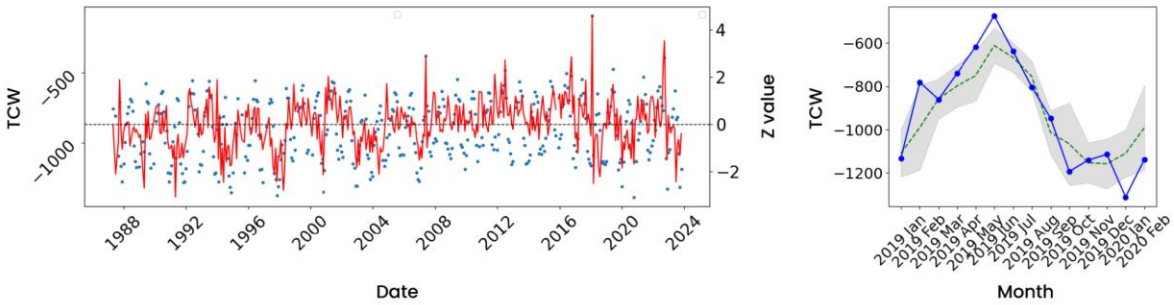


Figure S5. Time series of the monthly Tasseled Cap Wetness (TCG) index and z-scores at all the 37 sites across the study area. The left side figures represent the monthly Sentinel 2 time series from 1998-2022. The right figures represent a close-up of the 2019-20 drought event.