Working Group on Subeasonal to Interdecadal Prediction 24th session
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CSIR Climate Modeling Highlights

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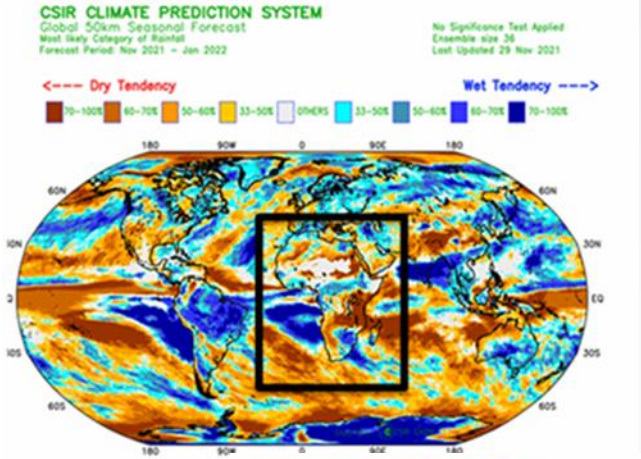
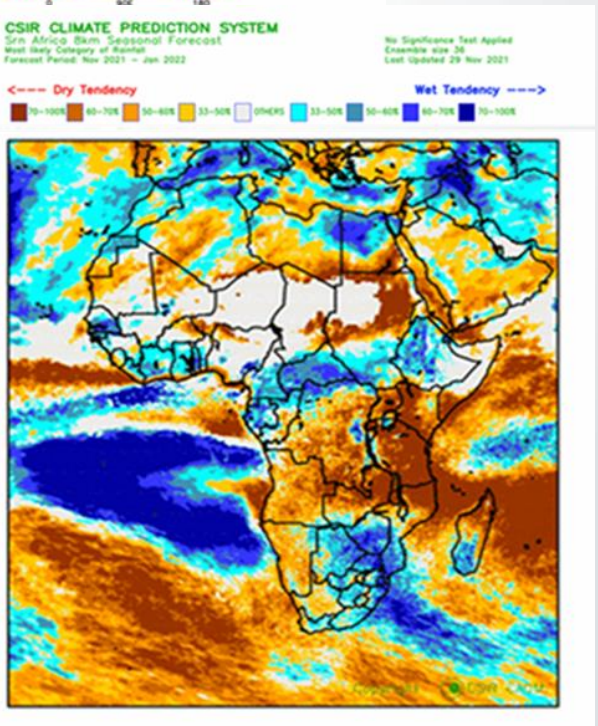
WCRP
World Climate Research Programme

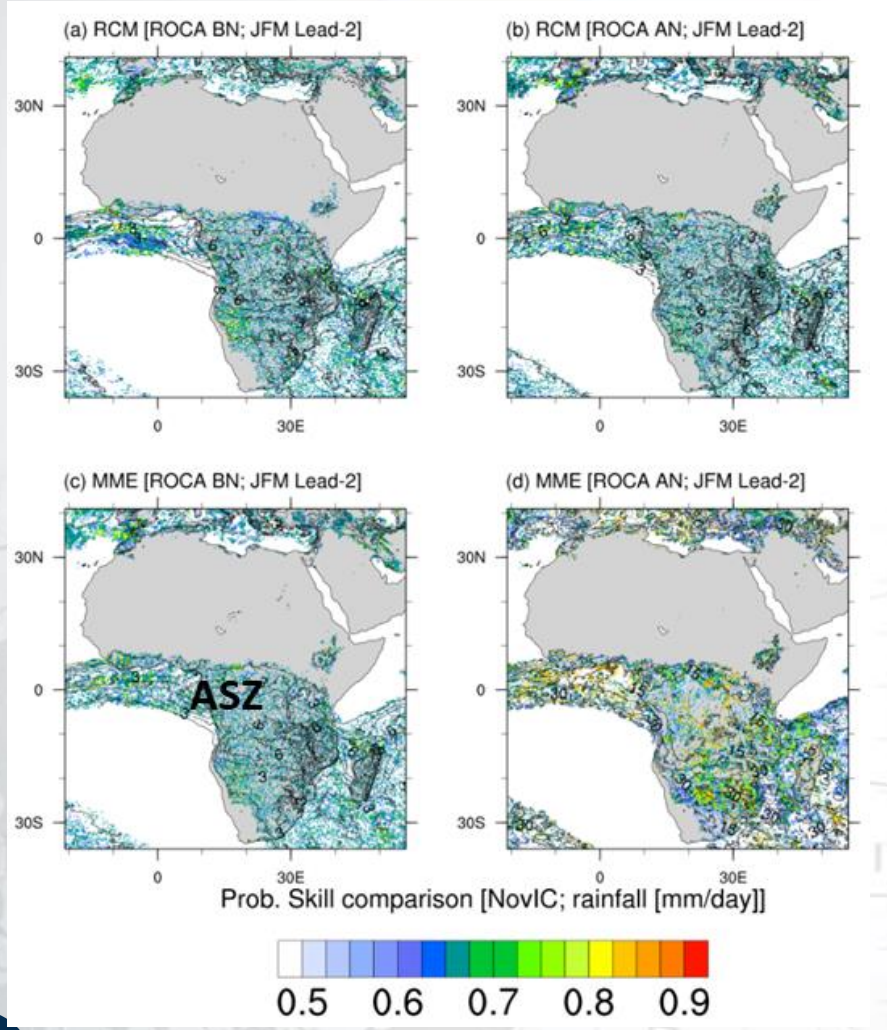
CSIR Seamless Forecasting System

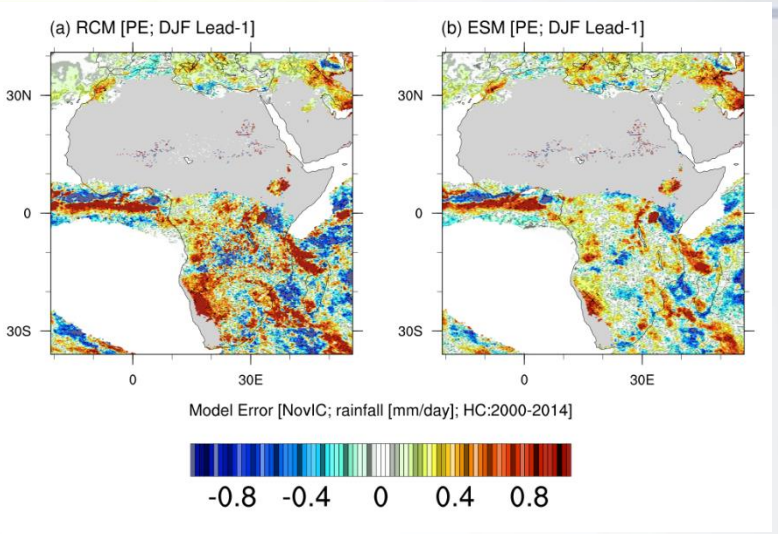
- CSIRO ESM: ocean (Thatcher et al. 2015), atmosphere (McGregor and Dix 2008), biosphere (Kowalczyk et al., 2013) and dynamic sea-ice (O'Farrell 2004) models (also described in Beraki et al., 2020)
- All model components cast on a cube-based grid and can be applied either at quasi-uniform horizontal resolution to function as a global climate model, or in stretched-grid mode to function as a high-resolution regional climate model.
- C-grid uniformity is computationally economical as it negates the need for grid type or resolution reconciliation in message exchange
- A prognostic aerosol scheme with anthropic GHG and O_3 forcings
- A dynamic river routing scheme adapted from the CSIRO Mk3.5 climate model.
- Seamless (temporal and spatial) capability
- Uses the CHPC computational facility

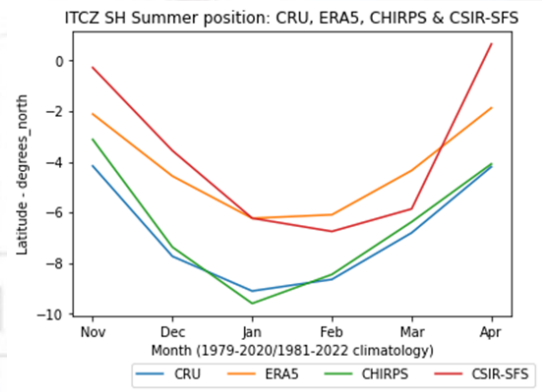




Model Skill







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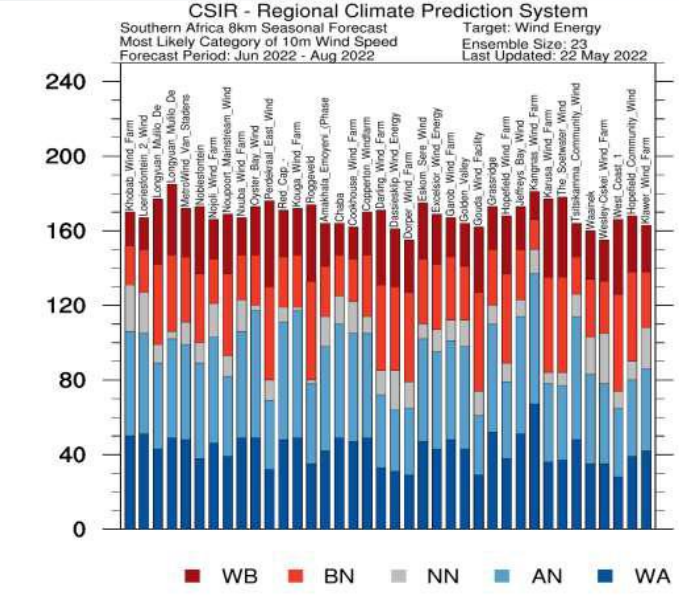
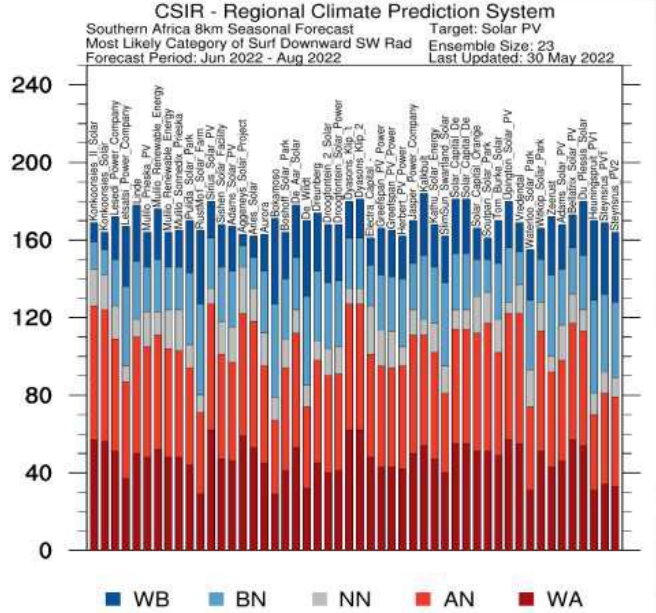
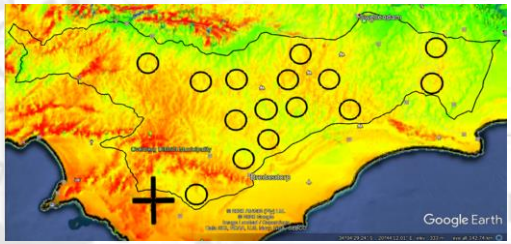
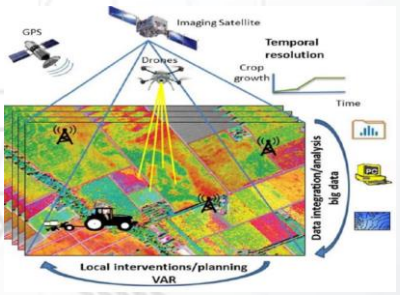
Application









Thank You!

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