

VYUZITI METEOROLOGIE PRI OBCHODOVANI S ENERGETICKYMI KOMODITAMI

Ladislav Brezina, 9.3.2016

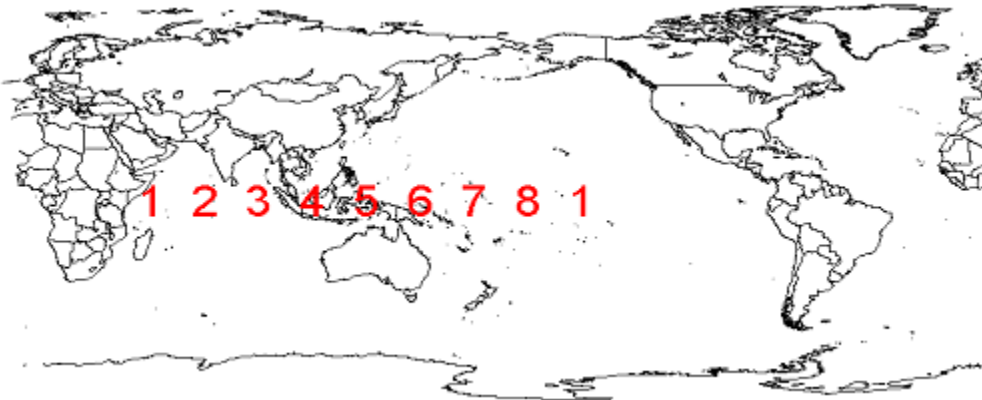
Ezpada

- Založena 2004, registrovana ve Švýcarsku
- Pobočky – Praha, Zug a Mnichov
- Cca. 70 zaměstnanců
- Hlavní činností je obchod s energetickými komoditami
- V současné době hledáme 2 Junior Meteorology do kanceláře v Praze
- Kontakt: ladislav.brezina@ezpada.com

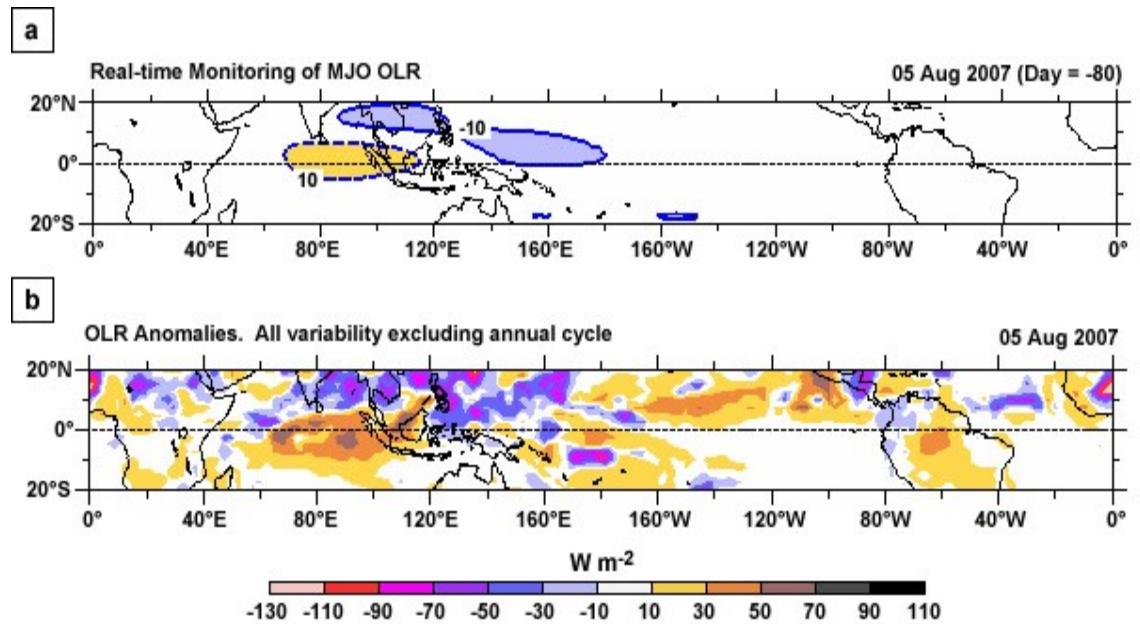
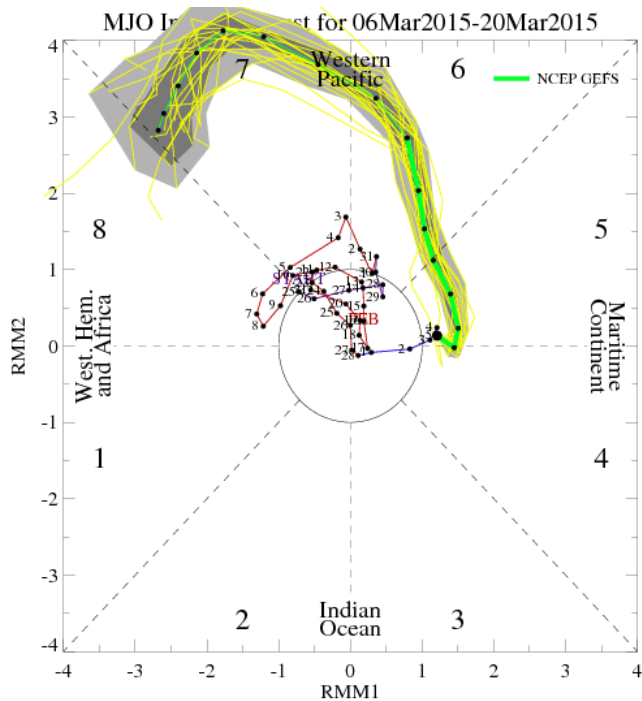
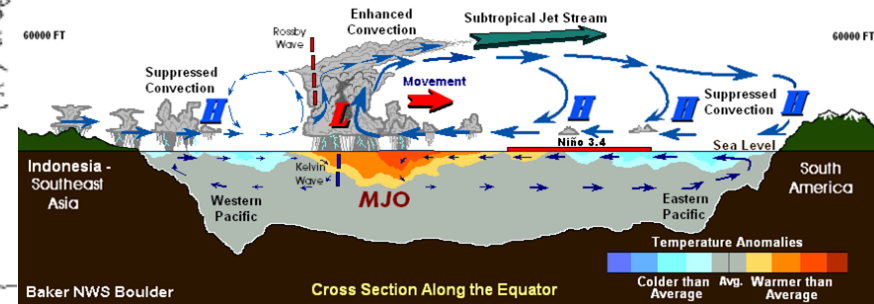
TÝDENNÍ A MĚSÍČNÍ PŘEDPOVĚDI POČASÍ

Vliv teleconnections na kvalitu dlouhodobých předpovědí

MJO

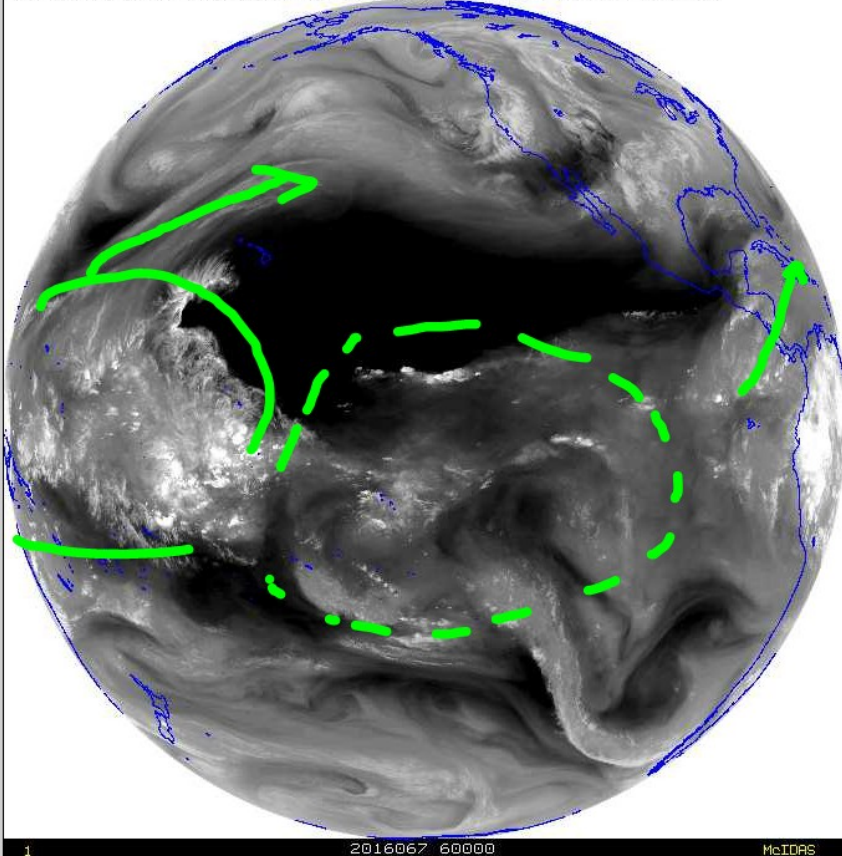


Madden-Julian Oscillation (MJO) in the Tropical Pacific Ocean

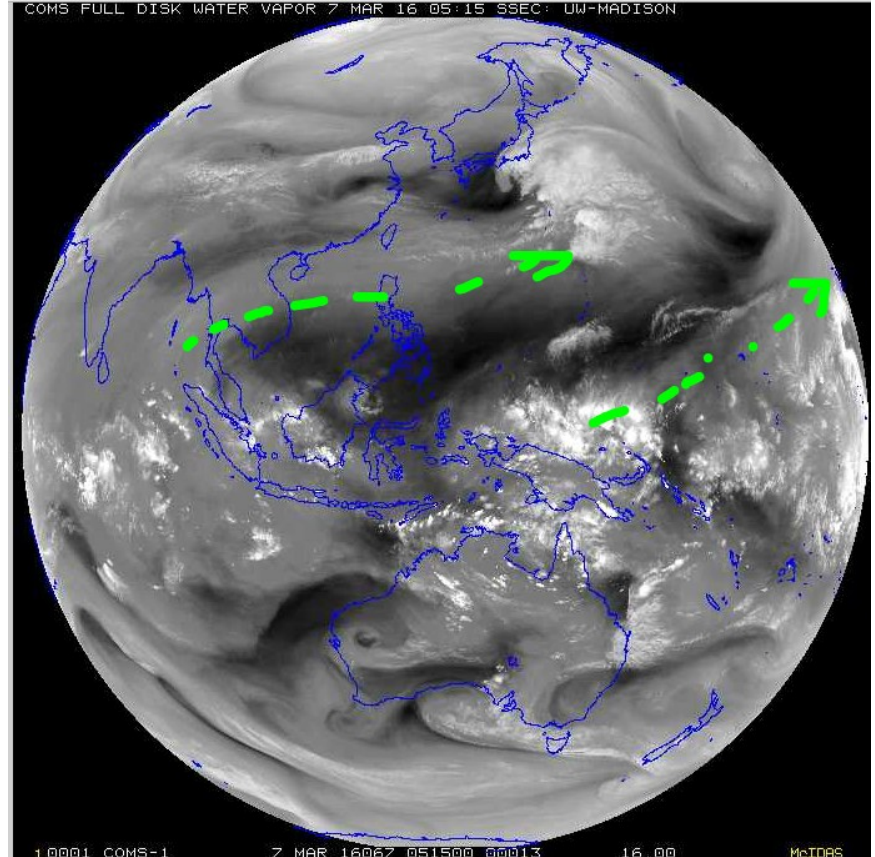


MJO

GOES WEST FULL DISK WATER VAPOR 7 MAR 16 06:00 SSEC: UW-MADISON

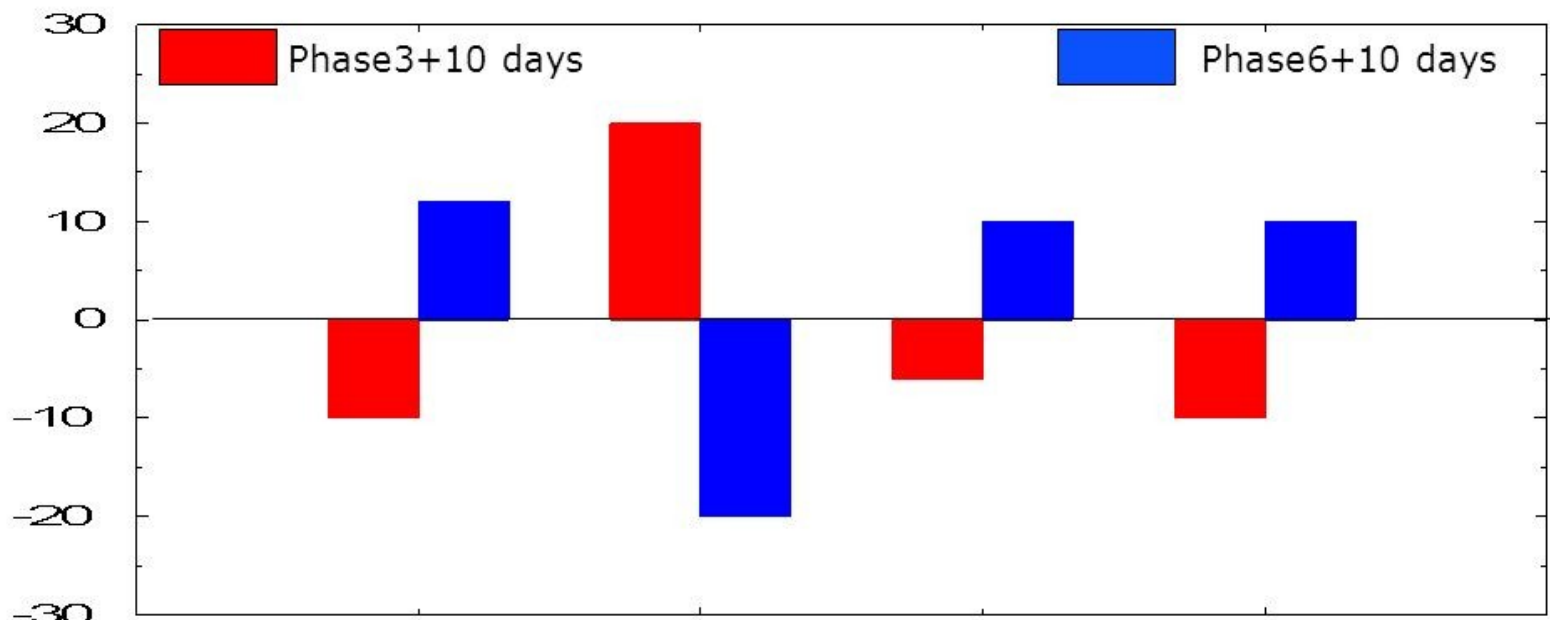


COMS FULL DISK WATER VAPOR 7 MAR 16 05:15 SSEC: UW-MADISON



MJO vs NAO

Impact on weather regimes in hindcasts

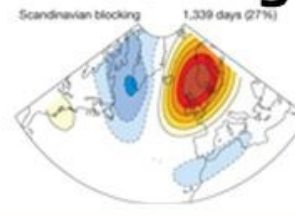
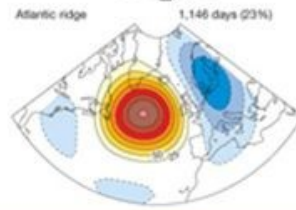
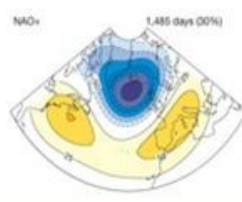
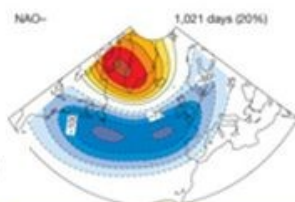


NAO-

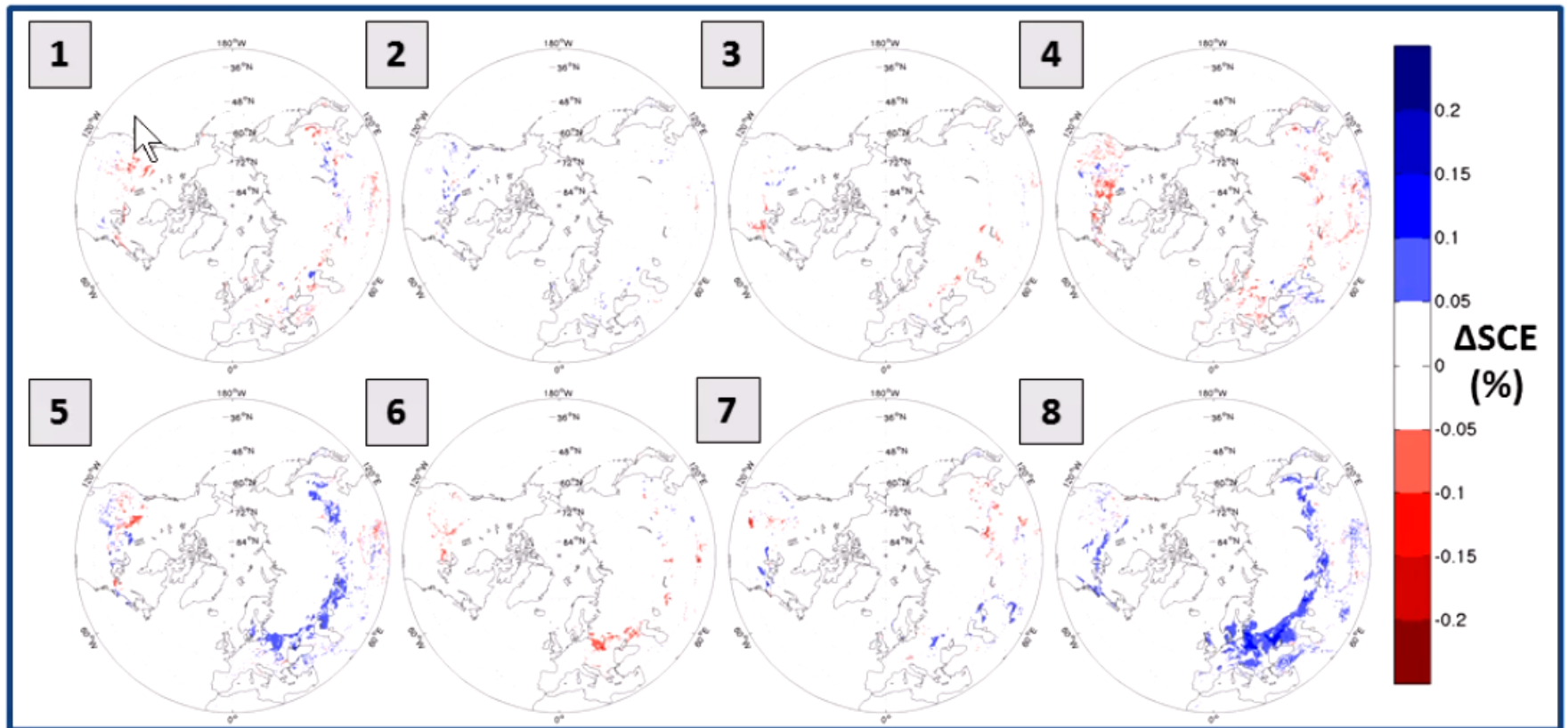
NAO+

Atlantic ridge

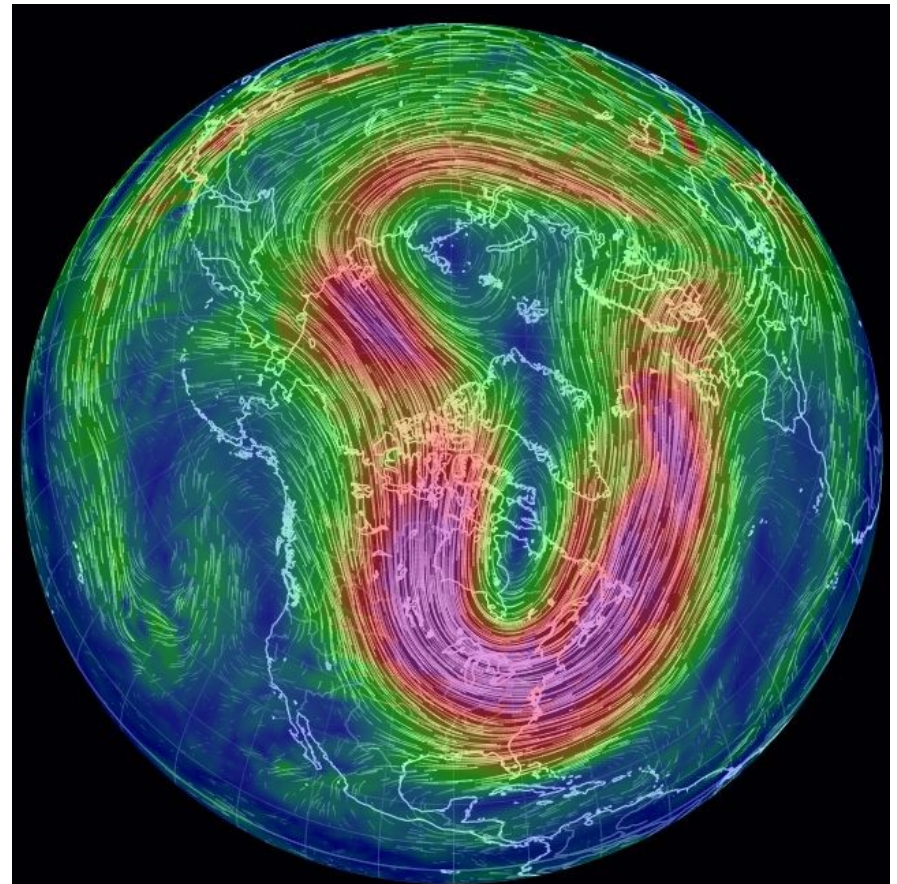
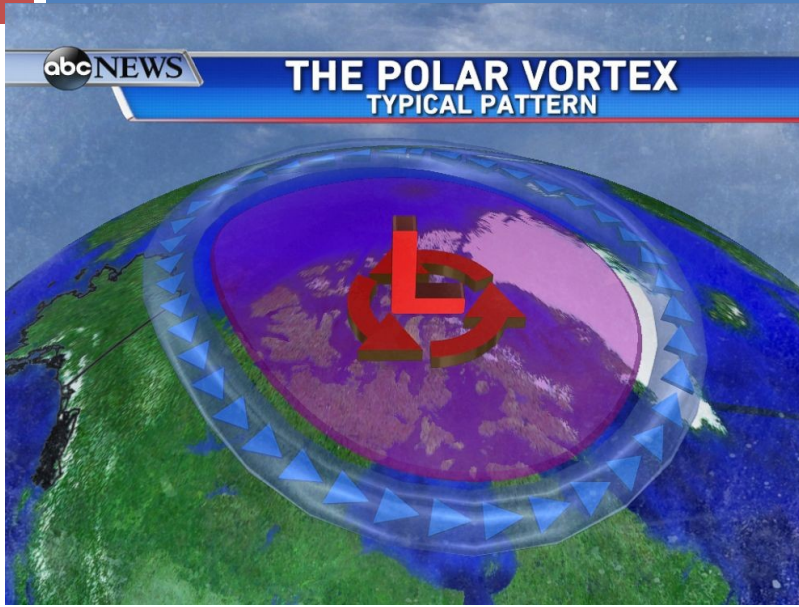
Scandinavian blocking



Impact of MJO on pan-Arctic terrestrial snow



Sudden Stratospheric warming

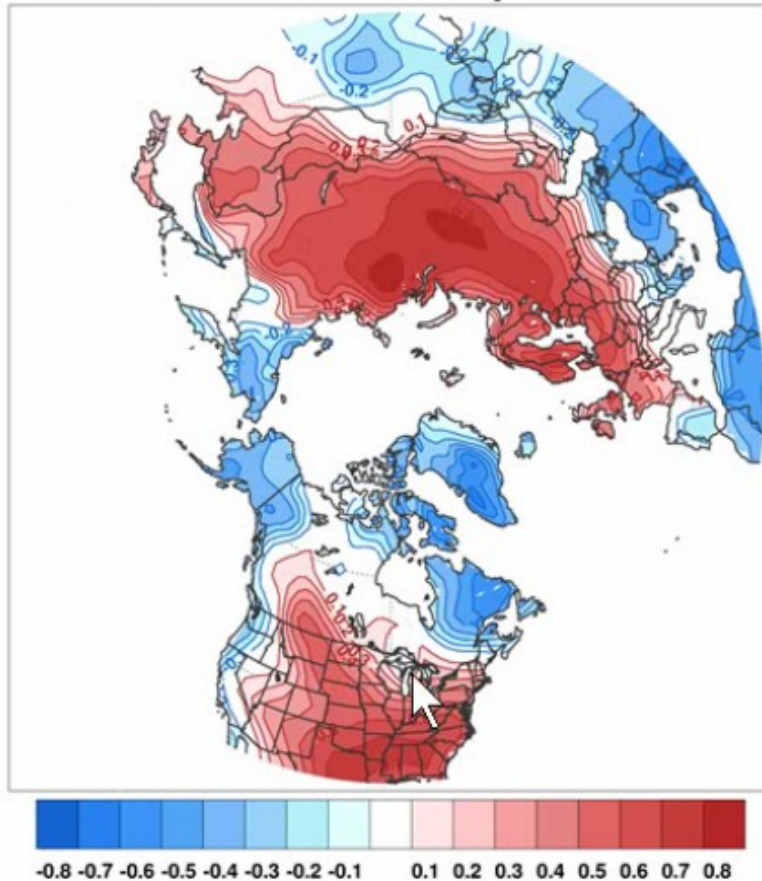


Outline (extratropical NH perspective)

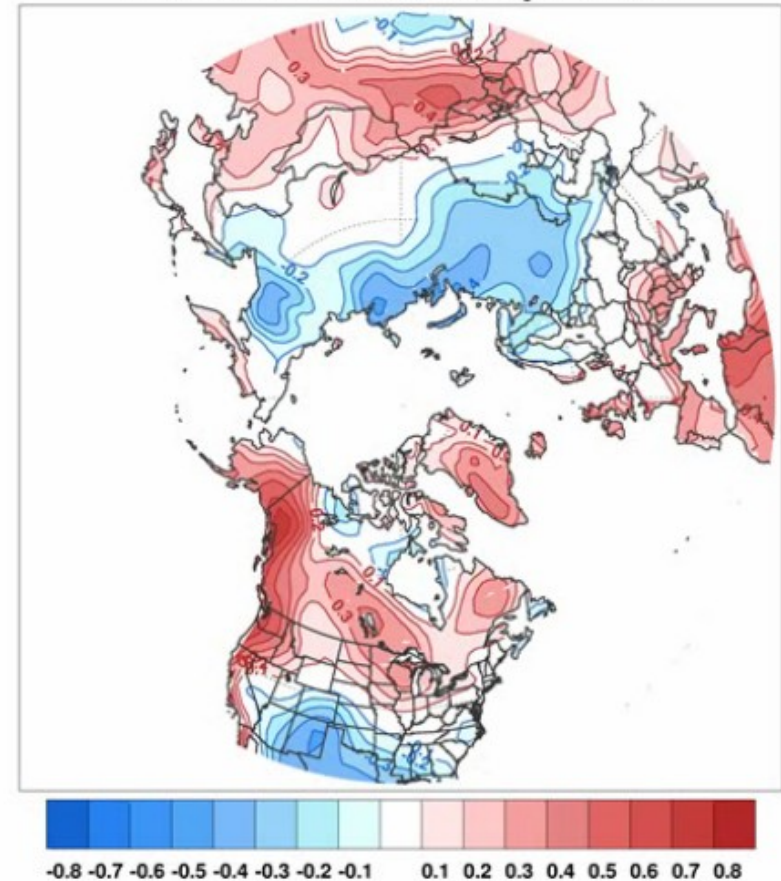
- ENSO is the cornerstone of winter seasonal forecasting, yet it provides little skill of Northern Hemisphere land-surface temperatures
- Troposphere-stratosphere coupling and the Arctic Oscillation show much greater potential for skillful prediction of winter land surface temperatures.
- Analysis of troposphere–stratosphere coupling puts the limit of predictability in October.

Correlations with surface temperature

Corr of DJF AO and DJF T_s , 1997-2010

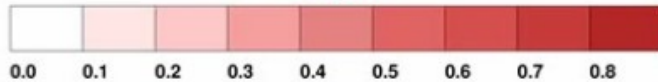
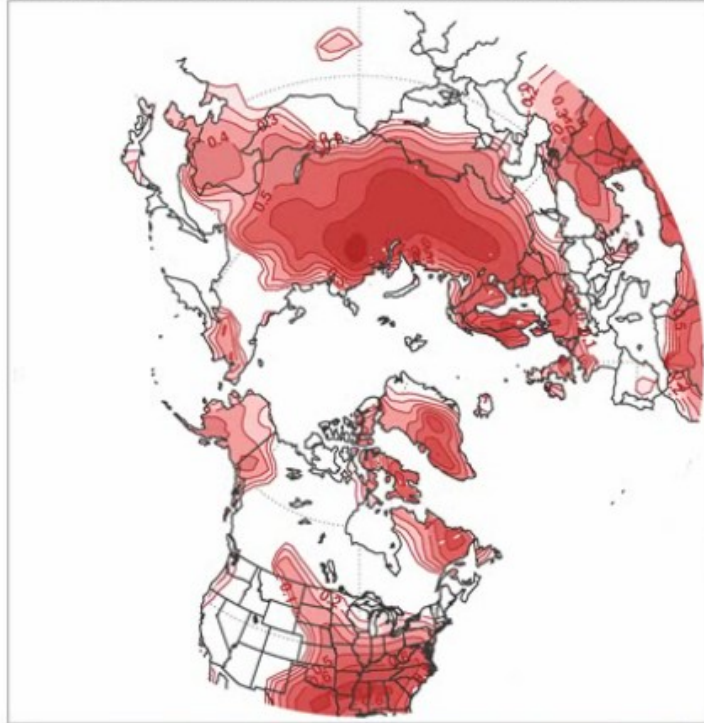


Corr of DJF ENSO and DJF T_s , 1997-2010

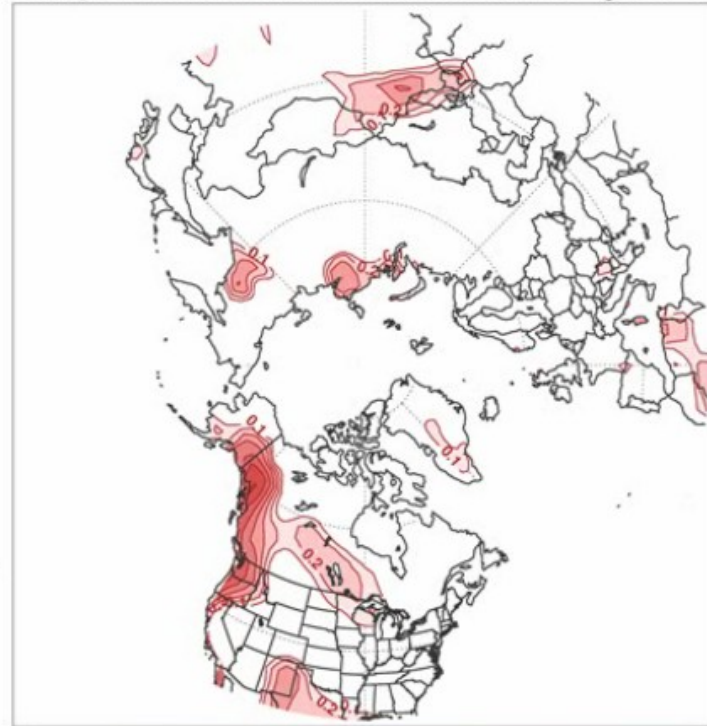


Anomaly correlations of cross validated hindcasts

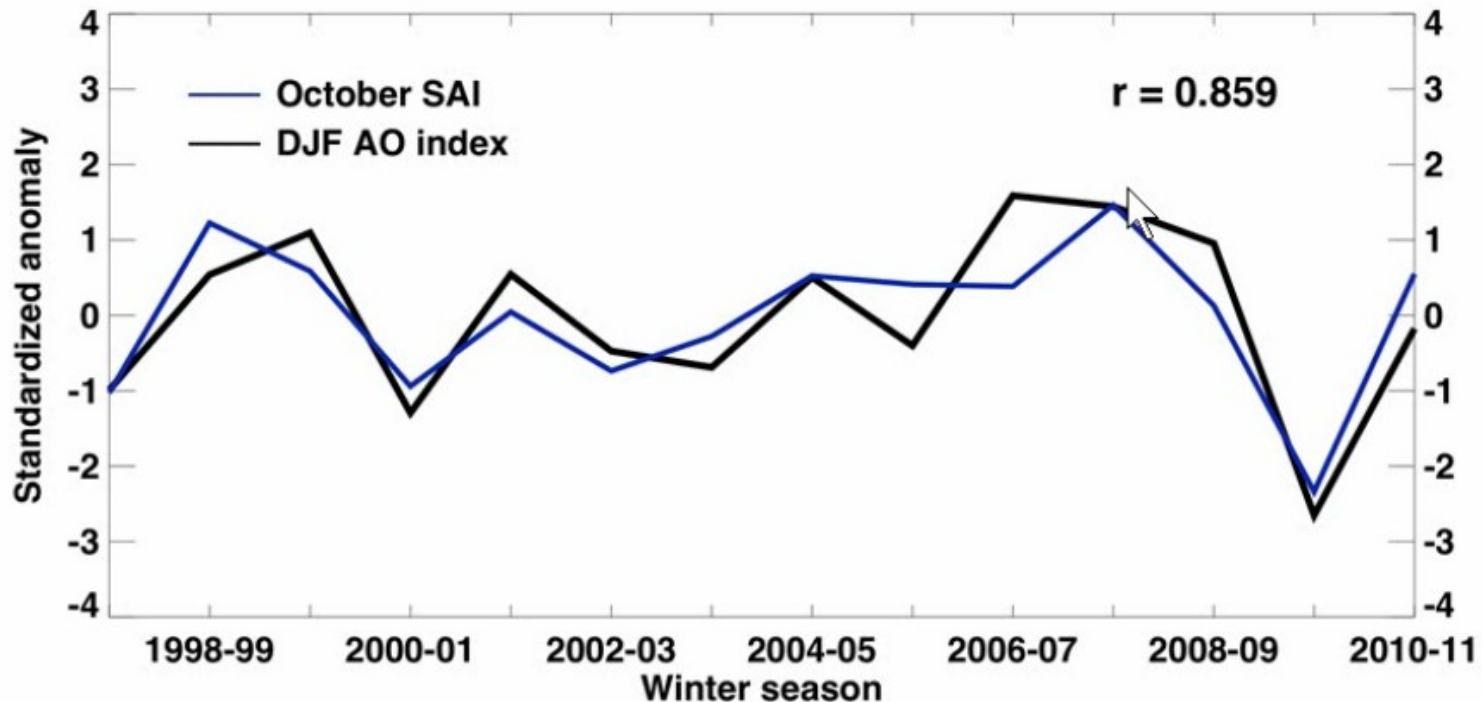
Anomaly Correlation of AO Index and DJF T_s , 1997-2010



Anomaly Correlation of Nino 3.4 Index and DJF T_s , 1997-2010



Snow Advance Index (SAI)



- Uses daily values
- Limited to equatorward of 60°N
- Measures rate of change of snow cover

Cohen and Jones (2011)

Snow Forced Cold Signal

