EOS 656/EVPP 652/GEOG 570 - The Hydrosphere

Homework #2

In this exercise, you will analyze a hydrologic time series for either a climate change or El Nino signal. You should start by doing some data exploration using HydroDesktop (i.e. to find a suitably long record of 50 years or more. Based on the class notes, you should start by devising a simple hypothesis about what you expect to find in your analysis. Then using the Hydro Desktop search tools, chose and download a long precipitation or temperature time series. Performa a simple trend analysis (to detect climate change) or correlation with SOI analysis (to detect El Nino). Depending on the dataset and analysis you chose, you may need to create annual averages, running means, or remove seasonal cycles. This may need to be done by extracting your data to a spreadsheet.

To turn in:

- Initial Hypothesis (1 sentence)
- Timeseries plot and analysis
- 1 paragraph explanation and conclusion

SOI Resources:

http://iridl.ldeo.columbia.edu/maproom/.ENSO/.Time Series/SOI.html http://www.esrl.noaa.gov/psd/data/climateindices/list/ http://www.cpc.ncep.noaa.gov/data/indices/