Water Institute Distinguished Scholar Seminar Series

Dr. David Yates Research Applications Laboratory National Center for Atmospheric Research Thursday, November 4, 2010 3:00 PM – 4:00 PM 282 J. Wayne Reitz Union

Co-Host: Florida Climate Institute

<u>Title:</u>

Helping Water Utilities consider climate change and other uncertainties in their planning process

<u>Abstract</u>

The water resources community has long assumed that hydrologic processes are stationary. For example, safe-yield (a standard measure of system risk in water infrastructure decision making), conceptually relies on the assumption of hydrologic stationarity, which is now recognized as invalid, primarily due to global climate change. Problematically, however, there is much uncertainty surrounding the projections of future climate, as is currently available from Global Climate Models (GCMs), especially at the local and regional level where water resource planning occurs. As David Behar of the San Francisco Public Utilities and director of the Water Utility Climate Alliance succinctly states: "The uncertainty is so great that there appears to be no 'actionable information' available." David Yates from the National Center for Atmospheric Research (NCAR) will give an overview of the state-of-the-science on regional climate projections, and present approaches to incorporating these data into water resources management planning processes.