## Introductory Remarks to the Session on Remote Sensing and Data Assimilation

## Eric F. Wood

## Princeton University

In the introductory remarks to the session entitled: 'Remote sensing and data assimilation of hydrological components in the coming era of Earth Observation' the chair will pose what he feels are critical challenges to current remote sensing: 1. Issues of validation; 2. consistency of 'integrated' remote sensing observation of water cycle states and fluxes, and 3. the challenge of assimilating remote sensing retrievals into land surface models. These challenges will be supported by examples and recent results.