

ExoPlanet Task Force Call for White Papers

The ExoPlanet Task Force (ExoPTF), an Astronomy and Astrophysics Advisory Committee (AAAC) subcommittee formed at the request of NSF and NASA, announces a call for white papers to inform their assessment of techniques and approaches for extra-solar planet detection and characterization, using both space- and ground-based facilities. The ExoPTF has been asked to recommend a 15-year strategy to detect and characterize exoplanets and planetary systems, and their formation and evolution, including specifically the identification of nearby candidate Earth-like planets and study of their habitability. The ExoPTF charge and membership, as well as future documentation pertaining to committee activities, can be found at <http://www.nsf.gov/mps/ast/exoptf.jsp>.

The deadline for receipt of white papers is **5 PM EDT on 2 April 2007**. The committee's schedule is very tight; thus, this deadline will not be extended. White papers should not exceed **7 pages** and should be written in **12 pt font with 1-inch margins**. The page limit includes all figures, tables, references, and appendices. An optional cover page, which may include title, authors and non-essential (decorative) art but no abstract, is excluded from the 7-page limit. The white papers should be submitted electronically to whitepapers@lpl.arizona.edu (open from March 5 until the deadline of April 2).

White papers may be used as source material for the Task Force's final report, with or without specific attribution to the original authors. Thus, material within the papers is generally considered to be non-confidential; any information included that the authors wish to be confidential should be identified explicitly.

White papers may describe studies, measurements with existing facilities, new instruments, new facilities or missions, considerations from theoretical modeling, or other recommendations or information that can support the Task Force in its work as laid out in the charge. The Task Force will be most interested in science needs and descriptions of techniques rather than developed implementation plans and proposals. Each paper should explicitly and clearly lay out how the study, concept, technique, or mission addresses the fundamental issue of detecting and characterizing exoplanets. Each paper should indicate why a particular approach is relevant to the ExoPTF's charge and which part of the parameter space of exoplanet properties and statistics it addresses. Where appropriate, each paper should explicitly discuss key parameters such as sensitivities, spectral resolution, capabilities, limitations, and number of accessible targets, along with the modeling assumptions used to estimate these. The Task Force would prefer receiving one paper per concept, even for large missions, in view of the expected total volume of papers. Required research and development and precursor observations should be listed. Guidance on costs (order of magnitude) will be appreciated, provided the rationale for the estimate is given.

Figures within the page limit are encouraged, particularly if they clearly illuminate the key parameters associated with a study, concept, or technique. Figures that synthesize key aspects of planet detection in a novel and transparent way may be used, with author's permission, in the Task Force's final report.