

COASTAL PELAGIC SPECIES ADVISORY SUBPANEL REPORT ON
THE ATLANTIS MODEL REVIEW

The Coastal Pelagic Species Advisory Subpanel (CPSAS) reviewed the Report of the Methodology Review Panel (Agenda Item H.1.a, Attachment 1) and also points made in the letter submitted by Dr. Richard Parrish (Agenda Item H.1.c, Supplemental Public Comment). We appreciate the Council's consideration of the following:

The Atlantis model has been expanded to include the Southern California Bight. This expansion is essential before the Atlantis or other models can be used to infer anything about the dynamics of CPS (and Highly Migratory Species) fisheries. However, as Dr. Parrish commented, this expansion "...will require considerable effort to ensure that the models are 'realistic' before they can be used for even conceptual understanding."

As one example, and as noted in the Methods Review Report, the Atlantis model does not handle market squid well. It divides squid into two functional groups – market squid and Humboldt squid – but excludes the majority of squid species, which are largely unfished. A separate group should be added that includes all the unfished squid species before attempting to evaluate the fishery impact of market squid.

Dr. Parrish also noted that the Atlantis Technical Team does not include representation from California or the Southwest Fisheries Science Center (SWFSC). The SWFSC is developing complementary modeling approaches involving sardine and anchovy. It will be important for the Council to consider these approaches in addition to Atlantis, in light of the population dynamics of coastal pelagic and highly migratory species.

In summary, the CPSAS appreciates the significant efforts now underway to develop ecosystem modeling approaches to achieve ecosystem-based management goals. We support continuing development of complementary modeling approaches, and we also support Dr. Parrish's recommendation that the Council defer considering use of the Atlantis model, or others, for fishery impact evaluation until they are fully mature, reviewed, and approved by the Council's Scientific and Statistical Committee, Management Teams, Advisory groups and the public.