SAB Priority Study Topics

1. **Leadership for Coastal Resilience**

   Identify the challenges of future decades and how NOAA can work across line offices, with other Federal agencies, and with the private sector to ensure coastal infrastructures, and those who rely on it, are resilient to both acute and chronic threats.

2. **Earth System Prediction and Predictability**

   How can NOAA best respond to the demand for broader forecasting services (from fisheries to space weather) by advancing geophysical observations, modeling systems, and computational resources and architectures, and transferring improvements to operations and services?

3. **Integrating Social and Behavioral Sciences Into Every NOAA Mission Area**

   In what ways and in what areas can the social and behavioral sciences be better integrated into NOAA missions to optimize the impact of information and services? What are organizational and structural barriers within NOAA that might limit the use of social and behavioral sciences and what organizational infrastructure is needed to overcome these barriers?

4. **Technology, Data, and Observations to Improve Understanding and Prediction of Earth Systems at S2S2D Time Scales**

   Assess approaches NOAA can use to apply technology, data, and observations to improve understanding and prediction of earth systems at S2S2D time scales. Observations are essential for improved understanding and model validation/verification so that NOAA can better predict future extreme events.

5. **Application of Emerging S&T and Public-Private Partnerships To Monitor and Predict Changes in the United States Living Marine Resources**

   Build on ESMWG Report to look at improved methods to monitor and predict changes in living marine resources.

6. **Assessment of NOAA's Capability to Understand Regional Sources of Environmental Impacts**

   1) Identify current capabilities across NOAA's portfolio used to identify regional sources and agents of environmental impact; and 2) recommend strategies and tactics which NOAA can use to better detect and communicate regional sources and agents.