

## **Executive Summary**

1. Introduction
  - 1.1 Objectives and scope of the Biennial Science Work Plan
  - 1.2 Outline of Plan
    - 1.2.1 Use of open standard
    - 1.2.2 Measurement, analysis, prediction and decision making
    - 1.2.3 Coordination across lead agencies
  
2. Priority Scientific Investigations
  - 2.1 Shoreline Alteration and Nearshore Habitat
    - 2.1.1 Marine and Nearshore Protection and Restoration
      - 2.1.1.1 Measurement of dashboard indicators and items identified in 2.1.1.3 as critical to indicator
      - 2.1.1.2 Analysis of data
      - 2.1.1.3 Prediction of future state using the Pressure-Effect approach
      - 2.1.1.4 Communication and Decision making-management of the dashboard.
  
  - 2.2 Land Development
    - 2.2.1 Toxics and Nutrients Prevention, Reduction, and Control
      - 2.2.1.1 Measurement of dashboard indicators and items identified in 2.2.1.3 as critical to indicator
      - 2.2.1.2 Analysis of data
      - 2.2.1.3 Prediction of future state using the Pressure-Effect approach
      - 2.2.1.4 Communication and Decision making-management of the dashboard.
  
    - 2.2.2 Pathogens Prevention, Reduction and Control
      - 2.2.2.1 Measurement of dashboard indicators and items identified in 2.2.2.3 as critical to indicator
      - 2.2.2.2 Analysis of data
      - 2.2.2.3 Prediction of future state using the Pressure-Effect approach
      - 2.2.2.4 Communication and Decision making-management of the dashboard.
  
  - 2.3 Waste Water
    - 2.3.1.1 Measurement of dashboard indicators and items identified in 2.3.1.3 as critical to indicator
    - 2.3.1.2 Analysis of data

- 2.3.1.3 Prediction of future state using the Pressure-Effect approach
- 2.3.1.4 Communication and Decision making-management of the dashboard.

## 2.4 Runoff from Built Environment

- 2.4.1.1 Measurement of dashboard indicators and items identified in 2.4.1.3 as critical to indicator
- 2.4.1.2 Analysis of data
- 2.4.1.3 Prediction of future state using the Pressure-Effect approach
- 2.4.1.4 Communication and Decision making-management of the dashboard.

## 2.5 Terrestrial Systems

- 2.5.1.1 Measurement of dashboard indicators and items identified in 2.5.1.3 as critical to indicator
- 2.5.1.2 Analysis of data
- 2.5.1.3 Prediction of future state using the Pressure-Effect approach
- 2.5.1.4 Communication and Decision making-management of the dashboard.

## 3.0 Puget Sound Science Communication and Outreach

### 3.1 2011 State of the Sound

- 3.1.1 Status of the indicators
- 3.1.2 Prediction of future directions
- 3.1.3 Management options and directions

### 3.2 Strategic Science Plan

- 3.2.1 Research priorities
  - 3.2.1.1 Measurement
  - 3.2.1.2 Understanding cause-effect relationships
  - 3.2.1.3 Communicating science and Puget Sound management

### 3.3 Conference Participation

- 3.3.1 Salish Sea Conference
- 3.3.2 Regional Chapters of Scientific Societies

### 3.4 Public Science Translation (the idea that we want to create PSP Science Power Point).

- 3.4.1 The science of restoration
- 3.4.2 Chemistry
- 3.4.3 Ecology
- 3.4.4 Cause-effect and risk management
- 3.4.5 Restoration methods
- 3.4.6 Decision-science

#### 4.0 Build Capacity for Conducting and Coordinating Science for Ecosystem Recovery

4.1 Lead Organization Strategies

4.2 Monitoring, Analysis, Prediction Consortium

4.3 Emerging Issues across lead agencies

4.4 Modeling current and Future Ecosystem Impacts across lead agencies

4.5 PSP Education, Training and Outreach

#### 5.0 Organization and Procedures

5.1 Peer Review

5.2 WSAS External Review

5.3 Advisory Committees