

The Pollution and Restoration of the Chesapeake Bay: A Public Policy Perspective

PUAF 698B

Purpose: To thoroughly discuss and learn the public policy behind decision making on the restoration of the Chesapeake Bay. The public policy and legal, socio-economic and political dynamics behind decision making in the restoration of the Chesapeake Bay will be thoroughly examined. The Chesapeake Bay Agreements and the legislative, administrative, and budgetary initiatives to restore the Bay will be discussed. The structure and effectiveness of Bay clean-up plans, legislation, and funding will be scrutinized. This course will present students with the opportunity to gain a thorough understanding of the underlying science and policies guiding efforts to restore America's largest estuary. Such an understanding can be applied to other environmental efforts throughout North America and the rest of the world, as the Chesapeake Bay restoration is seen as a model environmental effort.

Outline of Weekly Discussions:

I. Introduction to Chesapeake Bay Decision Making

- A. The Bay system and its problems
- B. Structure of governmental/private organizations dealing with the Bay cleanup
- C. The Chesapeake Bay Agreements and their implementation
- D. The inter-jurisdictional politics of the Bay clean-up
- E. Genesis of save the Bay activity in the Congress and states
- F. The framework for action

II. Implementation of the Chesapeake Bay Agreements

- A. Specific administrative, legislative, and budgetary actions behind the 1983 and 1987 Chesapeake Bay Agreements
- B. Effectiveness of Bay clean-up plans
- C. Dynamics of policy formation including the 40% nutrient reduction goal
- D. Development of implementing strategies
- E. The politics of success and failure in implementation
- F. The 1992 Bay Agreement, The Chesapeake 2000 Bay Agreement, and the future for

Bay strategies

III. Land Use, Development, and Population Growth

- A. Past, present, and future trends in land use and population growth around the Bay
- B. The Maryland Critical Area Law - 1984
- C. Examination of recent decisions of MD Court of Appeals on Critical Areas and 2004 Legislation
- D. Development of a nontidal wetlands protection policy-1989 Nontidal Wetlands Act
- E. 2020 Legislation - The Growth Act of 1992
- F. Reforestation Initiatives - Forest Conservation Act of 1991
- G. Inhibitions to more protective land use policies
- H. GreenPrint, Rural Legacy, Smart Growth (Glendening)
- I. Priority Places Initiative (by Ehrlich Executive Order)

IV. The Maryland Economic Growth, Resource Protection and Planning Act of 1992 and Smart Growth Act of 1997

- A. Genesis of 2020 land use legislation and subsequent Smart Growth Act of 1997
- B. The status of land use and its regulation in Maryland
- C. The development of State legislation to better manage growth
- D. The economic and environmental basis for development of State land use legislation
- E. Public policy conflicts in enacting State land use regulations
- F. Did the 1992/1997 Acts provide the basis for sound land use management for the future?

V. Evolution of Non-Point Source Controls

- A. Agricultural programs and legislative efforts to mandate best management systems
- B. Nutrient Management Legislation “Water Quality Improvement Act”--1998
- C. Stormwater management and sediment control

D. Retrofit of existing urban areas

E. Shoreline erosion

F. Critical Area Law, Nontidal Wetlands Act, Reforestation Act and Growth Management Act

VI. Evolution of Point Source Controls

A. Sewage treatment plants

B. Industrial discharges

C. Sludge wars

D. Enforcement issues

VII. Toxic Chemicals and the Bay

A. The Bay study and toxics - circa 1983

B. Toxic reduction strategy - December 1988

C. Case studies of legislative prohibitions of organotins (TBT) and carbofuran

D. Regulation of toxics including pesticides

E. Status of toxic reduction strategy

VIII. Dynamics of fisheries management

A. Regulatory structure of fisheries management in Maryland

B. Problems in developing fisheries management plans

C. Case studies in management: rockfish and oysters.

D. The public policy difficulties of biologically correct fisheries management

E. Can we have our oysters and eat them, too?

IX. Failures and Successes of Environmental Legislation

A. The Phosphate Ban of 1984 and 1985

- B. The Endangered Species and Chesapeake Bay Tax Checkoff Act of 1988
 - C. The Environmental Education Act of 1988
 - D. The Patuxent River Nutrient Reduction Enforcement Act of 1988
 - E. The Nontidal Wetlands Act of 1989
 - F. The Maryland Reforestation Act of 1989, 1990 and 1991
 - G. Mandatory fines for sewage treatment violations - SB 532 of 1992
 - H. Pfiesteria Related /Nutrient Management Legislation--Water Quality Improvement Act of 1998
 - I. Issues of implementation and compliance
- X. New, Old, and Newly Discovered Threats to the Bay
- A. Acid rain and atmospheric deposition of nutrients
 - B. TBT (tributyltin)/organotins in marine paints
 - C. Toxic chemicals in the micro layer
 - D. Are sediment loadings sinking the Bay and losing wetlands
 - E. Global warming and sea-level rise
 - F. Population growth and sprawl
 - G. The 1992 Bay Computer Model and meeting the Bay clean-up goals
- XI. The Future of the Chesapeake Bay
- A. Public education and information
 - B. Lessons of individual responsibility
 - C. The growth v. environment dilemma
 - D. Political will to restore the Bay
 - E. Land Use
 - F. Are we/will we win the Battle of the Bay?

XII. Class Drafting of Effectiveness/Implementation of Bay Cleanup Initiatives (Research Paper)

A. Presentation by students

B. Discussion - questions and answers

C. Critiques

D. Team and group discussions of needed changes in Bay Restoration Program

XIII. Final Exam

Attendance at a legislative or other public hearing on a Bay related issue is suggested.