



WATER HIGHLIGHTS

D.C. WATER RESOURCES RESEARCH CENTER, WASHINGTON, D.C.

UNIVERSITY OF THE DISTRICT OF COLUMBIA



FALL 1994

VOL XIV NUMBER 4

ENVIRONMENTAL GOOD NEWS

1) ***EPA Pledges Campaign and Money for Anacostia River cleanup***

According to the Washington Post of October 1, 1994, the EPA's officials promised new money and effort to clean the Anacostia River, calling the aid a down payment in a campaign against pollution in the District's poorest neighborhoods.

Del. Eleanor Holmes Norton (D-DC) welcomed the *efforts* and said: "In the District these days, we particularly love those announcements that come with money."

2) ***Support to Clean-up the Bay***

A vast majority of the *people* living throughout

the Bay watershed support the Chesapeake Bay clean-up and think even more should be done to restore the Bay, according to a recently conducted public opinion survey. The survey finds that some 90% of the 'people living throughout Pennsylvania, Maryland, Virginia, and Washington, D.C. are concerned about the health of the Bay and support the Bay clean-up. Over 60% believe more should be done, and two-thirds of the respondents believe the restoration effort should concentrate on making the Bay safe for fish, shellfish, and aquatic life. For information about this study, contact: Elliot Finkelstein, Chesapeake Bay Comm. Office (410)-267-5756. For a copy of the Bay Attitude Survey, call 1-800-YOUR BAY.

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ANNOUNCEMENT

The WRRC has relocated.

The new numbers are:

Tel (202) 274-6690

Fax (202) 274-6687

1994-95 Water Center's Research Projects

Summaries

Institutional and Financial Managements of the District's Water Resources: Trend Analysis 1980-1993

Investigator: Dr. Choi, University of the District of Columbia

The purpose of this research project is to assess institutional and financial management (e.g., water rate, water price), as a tool of water conservation (supply and demand) and water quality in the District of Columbia over a decade: 1980-1992.

The District of Columbia has been facing a budget crisis. With the escalation of the operating and capital costs, the revenues have not kept pace with costs. A rate study is underway to determine the appropriate revenue requirements and is expected to be completed soon. In the first four years in the 1980s, the water/sewer funds did show a cumulative deficit of \$61.5 million, and the District's General Fund subsidized the fund. Rate increases since then eliminated the accumulated deficit by the end of 1988.

Chesapeake Bay Water Quality Management

Investigator: Dr. Lieber, American University

Although public concern over the future of the Bay is very high, the implementation of the agreement's many plans, strategies, and policies depend on considerable funding resources and political commitment and cooperation from

many jurisdictions and local, state and federal agencies:

Several issues will be in the background of my research. The first is the growth and development question. It is clear that controlled development and land use policies are crucial to protecting, preserving and upgrading of the bay and its resources. As a citizens group wrote, "ultimately the public must decide whether to restrain development and change its life style;"

Feasibility Study of Recreational Potential of The Anacostia River Along the North Eastern Part of Washington, D.C.

Investigator: Dr. Azani, University of the District of Columbia

While the clean up and restoration efforts of local governments and concerned citizens have the potential to create a momentum in the revitalization of Anacostia river, it has not yet resulted in the allocation of the necessary financial and human resources to complete the clean up and, develop the recreational potential of the river. The 1984 and 1987 agreements between the Prince George and Montgomery' counties in Maryland and the District of Columbia laid the foundation for cooperation in the restoration of Anacostia river and was, indeed a very positive step in the right direction. But, the unequal expenditure of capital resources in the past has resulted in vast differences between the Potomac and the Anacostia.

The purpose of the following proposed research is to determine the extent of public demand and interest regarding the establishment of recreational facilities along the Anacostia River in the northeast part of the District of Columbia.

A Pilot Study of the Appropriateness of Inexpensive Methods for Piezometer Installation at Sites along the Anacostia River, Washington, D. C.

Investigator: Dr. Logan, George
Washington University

The Anacostia River is important from a recreational perspective (e.g. fishing, boating), as well as from an ecological one (e.g. being a source of water and contaminants for the Potomac River and, ultimately, the Chesapeake Bay). Unfortunately, in the District of Columbia alone there are seven Superfund sites, nine vehicle maintenance yards, three ash and coal stockpiles, and numerous underground and above-ground petroleum storage tanks within one-half mile of the river. Much of the Quaternary alluvium and artificial fill that is present on either side of the river is permeable. Since the underlying Arundel Clay must function to some extent as a vertical hydraulic barrier, most of the contamination generated in these sites would be channelled through the alluvium directly toward the river.

The principal objectives are: - to determine whether the sediments and/or fill along the Anacostia collapse around the mini-piezometers in such a manner that hydraulic testing fairly accurately reflects the true properties of the medium - to determine whether average vertical groundwater gradients and hydraulic

conductivities tend to be such that finite fluxes can be measured with seepage meters within a reasonable period of time.

Definition of Ground Water Flows in the Water Table Aquifer of Downtown Washington, D.C.

Investigators: Dr. Amini, University of the District of Columbia and Dr. Matheson, Catholic University of America

In order to evaluate the effects of ground water contaminant contribution to the Anacostia and Potomac Rivers, an understanding of the ground water flow system in the downtown area of Washington, D.C. is necessary. Urbanization has greatly affected the subsurface character with fills, utility lines, and sump pumps. To adequately describe flow patterns in such an environment requires ground water level readings from a multitude of monitoring wells. This research will complement the previous project "definition" of Ground Water Flow in the Water table Aquifer of the Southern Anacostia River Basin" by investigating ground water levels and flow patterns in the urbanized (filled and sewered) Tiber creek Basin.

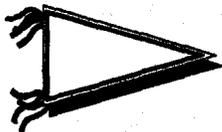
Lead in Residential Drinking Water; Risk Assessment

Investigator: Dr. Ocran, Howard University

In recent years, the public and the Congress have become highly concerned about the quality and safety of drinking water. The list of substances reported to contaminate water is extensive and include all classes of chemical material.

Additionally, it includes metals, inorganic and synthetic organic compounds. Metals, such as lead, have the greatest potential for combining with and inhibiting the functioning of enzymes, thereby- causing adverse physiological and neurological effects. The Former Secretary of Health and Human Services, Louis Sullivan, has *stated that lead exposure is the most important environmental health problem for American children.*

The results of this project may also contribute to the establishment of a comprehensive information database which can be used by the DC Department of Environmental Regulations in developing an appropriate program ,to "cleanse drinking water of dissolved lead from pipes and solder". The program may be implemented jointly with the EPA, which has jurisdiction over lead contamination and it is one of the primary federal agencies which is charged with administering the proposed funds which will be appropriated for the cleaning `up of toxic lead contamination.



ADVERSITY - Do not fear the winds of adversity. Remember: A kite rises against the wind rather than with it.

EPA Receive Grant for National Service Projects

JOB ANNOUNCEMENT

The National Association of Environmental Professionals (NAEP) is soliciting qualified individuals interested in becoming editor-in-chief of The Environmental Professional For more information contact NAEP at (202)966-1500, Fax (202)966-1977.

On June 20, the White House announced a grant award of \$1.8 million to EPA to conduct six AmeriCorps projects under the President's new National Service Program. The AmeriCorps Program offers opportunities for Americans of all ages to perform community service in return for tuition funding and minimum salaries. AmeriCorps projects are expected to focus on some of the country's most critical problems in environment, education, human services, and public safety.

In Washington, D.C., participants will work with several other organizations to establish a Small Habitat Improvement Program project in the Anacostia watershed. They will assist and involve residents in restoring portions of Anacostia Tributaries, increase awareness of environmental protection needs, identify trends in environmental quality, reducing erosion, increase recreational opportunities, and build additional community-level partnerships.

ANNOUNCEMENTS

BOOKS AVAILABLE

Summary of Selected Computer Programs

Produced by the US Geological Survey. The report indicates how to obtain copies of the computer software programs and or reports that describe the programs. For information contact; USGS ESIC, Open File Report Section. Denver Federal Center, Denver, CO. 802250046. (303)236-7476.

Anacostia River and Tributaries, District of Columbia and Maryland Feasibility Study

Produced by the US Army Corps of Engineers. Available from the District Engineer, Attention: CENAB-PL-P. US Army Corps of Engineers, Baltimore District. P.O. Box 1715. Baltimore, MD. 21203-1715.

Anacostia River and tributaries, District of Columbia and Maryland Feasibility Study

Produced by the US Army Corps of Engineers. Available from the District Engineer, Attention: CENAB-PL-P. US Army Corps of engineers, Baltimore District. P.O. Box 1715. Baltimore, MD .21203-1715

UPCOMING MEETING

After Everyone Leaves

Preparing For, Managing and Monitoring Mid- and Long-Term Effects of Large Scale Disasters

November 4-6, 1994
Radisson Hotel South
Bloomington, Minnesota
Contact: Continuing Medical Education, University of Minnesota a 1-800-776-8636 or (612) 626-7600

American Water Resources Association's 30th Annual Conference

November 6-10, 1994
The Fairmont Hotel Chicago,
Illinois Contact: AWRA a
(301)493-8600

Superfund RV

Nov. 29- Dec. 1, 1994
Sheraton Washington
Hotel
Washington, DC
Contact: Hazardous
Materials Control
Resources Institute a
(301)251-1900

Protecting Ground Winter

December 12-13, 1994
Renaissance Hotel
Washington, D.C.
Contact: Terrene Institute
(202)833=8317

Firs International Conference on water Resources engineering

August 14-18, 1995
San Antonio, Texas
Contact: ASCE

GREEN LABS FOR URBAN TEACHERS

The University of DC and the Audubon Society in cooperation with others are organizing a 1994-95 series of environmental education workshops for teachers.

For details, call Prof. J. V. O' Connor, (202) 274-5000.

1994-95 WRRC Schedule of Events

Events	November	February	March	April
Seminars		Black History	Phelps`	May/Eng
Conferences			NAFE4/USGS	
African Series	UN & US Military Support in Rwanda/Zaire	Women in Development	African Diaspora: The Latin Experience	Food & Nutrition in Africa

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