NEUSE RIVER BASIN REGIONAL COUNCIL

Lenior Co. Cooperative Extension Service Building
Hwy. 11/55
Kinston, NC

August 10, 1999

MINUTES

The meeting was called to order by Chairman Bill Ritchie at 9:20am. He welcomed those present (See Attachment A), determined that the quorum requirement was satisfied, and then outlined the purpose of the "call meeting."

The special meeting was being held to select which of the NRBRC demonstration project proposals would be forwarded to the Coordinating Council. The proposals under consideration are included as Attachments B & C, *"Development of an Accountability Process to Ensure Success of the Neuse Agricultural Reduction Strategy Rule (15A NCAC 2B .0238)"*, and *"Model Strategy to Demonstrate the Advantages of Selected Creek Monitoring to Improve Nonpoint Source Pollution Strategies and Controls for Nutrients and Sediments in the Neuse River Basin."* Chairman Ritchie and Guy Stefanski outlined the guidance and criteria for the selection of demonstration projects (See Attachment D) and turned the floor over to NRBRC member Marion Smith, to present the first proposal submitted by the Neuse Agricultural Basinwide Oversight Committee, (BOC) (Attachment C). Discussion ensued, with concern expressed on behalf of the farming community, by Sondra Riggs.

The second proposal (Attachment B) was also presented by Ms. Smith, Executive Director of the Neuse River Foundation (NRF), for the NRF and the Neuse Riverkeeper. After much discussion Dr. John Costlow moved to combine the two proposals and explained that they were actually complementary. He, as others, felt that both proposals were good. Because it was brought out that the budgetary constraints prohibited doing both, Dr. Costlow withdrew his motion. In a second motion, Dr. Costlow moved to recommend the NRF proposal as the number one choice of the NRBRC, and endorsed the BOC proposal as being worthy of "funding from another source" such as EPA. Joe Hughes seconded the motion.

After lengthy discussion, and the motion still on the table, the question was called by motion of Margaret Holton, seconded by Joe Hughes. The motion to call the question passed.

The motion on the table to endorse the NRF proposal for funding, and the BOC proposal as worthy of funding elsewhere, was called with the following results:

In favor - 6 votes
Against - 2 votes

The motion carried.

Comment was made to have the demonstration project proposals sent back to NRBRC members if there was significant change by the Technical Committee of the Coordinating Council. Staff concurred with that recommendation saying that the proposals would be re-circulated to the principal investigators and the RC membership if changes were substantive.

Joan Giordano mentioned that the amendments to the by-laws were incorporated into the version distributed at the meeting, and that copies were being sent to the members not in attendance with the minutes of the present meeting.

In other discussion, centering on membership participation, Chairman Ritchie recommended that the APNEP Forum (New Bern - Nov. 1998) attendance listing be used to identify potential NRBRC members. Joan Giordano explained that the vacancies created by **local government** representatives throughout the basin was not an area of membership about which the NRBRC had direct purview. Those vacancies, and the authority to fill them, were entirely in the hands of the Boards of County Commissions. She said beyond contacting the counties and making them aware of their county's non-participation, NRBRC members or staff, were powerless. The NRBRC members however, were being called upon to make recommendations for filling the vacancies created by non-participating **interest group** representatives. (See latest membership roster included with this mailing.) Chairman Ritchie reinforced this recruitment request and added that potential interest-group representatives should be made aware that there is a responsibility to attend meetings, participate in program activities, and report back to their respective organizations.

The group was reminded that the fixed meeting time for the NRBRC was decided at the July 22, 1999 meeting as being the 4th Friday of the month. It was thought that this would allow for better planning by members. Staff clarified that, at the end of each meeting, it should be determined whether the next meeting would be a full RC meeting or an Executive Committee meeting. All were in agreement with Chairman Ritchie stating that perhaps the Executive Committee might meet on another day of the week because there were so few members. **The next meeting date was set for Sept. 24th** in either Raleigh or Goldsboro. Some present suggested meeting in Raleigh so that our upper basin members might be induced to attend.

This discussion gave rise to the question of the election of officers. Staff reminded the group that there was provision in the by-laws for dealing with this issue. Dr. Costlow moved that the Chair select a nominating committee of three people and have them present a slate at the next meeting. Marguerite Whitfield seconded the motion. Motion carried.

There being no further business, the meeting was adjourned.

Attendance
NRBRC
8/10/99

Attachment A

NAME	Affiliation
Grace Giordano	APNEP
Guy Stofinski	APNEP
Marion Smith	NRF
Rick Dove	NRF (visitor)
Joe Hughes	Silviculture (Weyerhaeuser Co.)
SAM HOLTON	(Hazen - Orange County)
John D. Castlow	C County
Margaret Holton	Orange County
Kelly Griffin	WAYNE Co.
Sondra Spock Riggs	Jones County
Marguerite Whitfield	Gov's Appointee - L.C. Commissioner
BILL RITCHIE	CRAVEN COUNTY
DEE B SMITH	HENDIR COUNTY

Attachment B

Model Strategy to Demonstrate the Advantages of Selected Creek Monitoring to Improve Non Point Source Pollution Strategies and Controls for Nutrients and Sediments in the Neuse River Basin

By 1988 the State's Environmental Management Commission (EMC) had declared all the waters of the Neuse River Basin as "nutrient sensitive". This action was in response to algal blooms in both the fresh water and estuarine portions of the Neuse River system. While a "phosphate detergent ban" adopted in the eighties did reduce phosphorus levels until recently, when those trends of have stabilized or shown slight increases, levels of nitrogen had not been controlled. Massive algal bloom in the Neuse estuary, along with catastrophic fish kill events in 1991 and 1995 prompted more dramatic action by the State. In 1998, the EMC adopted a new regulatory strategy designed to reduce nutrient (specifically nitrogen). These rules contain specific regulatory initiatives to reduce nitrogen from both point source and, for the first time, from non point source contributions like agricultural fields and urban stormwater. In addition, to their target reduction of nitrogen, the most of the "best management practices" that are being implemented for both agriculture and urban stormwater will also reduce phosphorus and sediment contributions from those sources as well. Sedimentation problems in the Neuse River system have been documented for many years as well. Many of the streams in the Neuse Basin on the 303(d) list show sediments as a major cause of water quality impairment. With the dramatic rise in population in the upper Neuse area and the accompanying increase in construction activities, sedimentation has become an even more chronic problem in the tributaries that drain these rapidly developing subbasins. Although the State increased water quality monitoring in the Neuse Basin during the last four years, through additional ambient monitoring sites and the funding of water quality related research projects that include additional monitoring, most of this monitoring is either monthly or biweekly and the monitoring sites are in the river mainstem or for major drainage areas.

We have advocated for sometime the need to selectively monitor the mouth of selected creeks on a more frequent basis in order to develop a better understanding of their pollution contributions to the Neuse system.

Lead Organization: Neuse River Foundation, Inc.

Objectives: Demonstrate the effectiveness of using "mouth of creeks" as important components of a water monitoring program for the Neuse.

Likelihood of Success: This project has a high probability of success because the NRF has five years of experience in training and administering volunteer citizen water quality monitoring efforts.

Public Support: The Neuse River Foundation, Inc. enjoys broad-based public support throughout the Neuse River Basin. Our membership has increased almost 10 fold in the past five years.

Time/Resources Required: This project will require one primary volunteer and one alternate volunteer for each of the two creeks selected. The Neuse Riverkeeper (for the downstream portion) and the Upper Neuse Operations Director (for the upstream portion) will each devote an average of .5 hours per week to insure that monitoring is conducted on a timely basis, conduct unannounced quality assurance testing, and provide required re-supply or equipment calibration checks. During the startup phase additional time will be devoted to volunteer

training as needed on the test kits and equipment to be used at each site. The QA/QC plan will consist of unannounced spot checks on each monitoring site each month during the first quarter of the project and at random intervals once a quarter thereafter for the duration of the project. The Assistant Neuse Riverkeeper, who as a BS degree in environmental science, will receive, check and enter all water quality data for each site. This data set will be organized in a manner to permit seasonal trend analysis and comparative analysis with other state water quality data gathered from ambient sites located within reasonable proximity to the project areas.

Cost Effectiveness: Utilizing volunteers will make this project very cost effective. In addition, the Foundation is donating the use of existing test kits that meet all EPA and State requirements, along with some of the equipment needed for this project that is already owned by the Foundation.

Deliverables: This project will deliver interim and final reports on the data collected on all parameters from this innovative water monitoring strategy.

Detailed Project Description/Scope of Work

What: This is a two-year pilot program to determine the feasibility and effectiveness of monitoring the mouth of creeks throughout the Neuse watershed to establish the contribution of pollutants emanating from these creeks. This proposal furthers the objectives of the APES CCMP "Management Action #6 - Continue long-term, comprehensive monitoring of water quality in the APES System, collecting data to assess general system health and target regional problems." We believe this project meets that objective by demonstrating the benefits of this innovative monitoring strategy in selected creeks that are representative of the major pollution inputs in different regions of the Neuse Basin. While water monitoring the Neuse Basin, by state and federal agencies, has increased significantly in recent years; no monitoring of this type has been undertaken on the small watershed scale proposed here.

Who: This project will be a joint effort between the Neuse River Basin Regional Council (NRBRC), NRF and the Department of Environment and Natural Resources, Division of Water Quality (hereinafter DWQ). NRF Project Managers are Neuse Riverkeeper, Rick Dove and NRF Ex. Dir. Marion Smith. Address: PO Box 15451, New Bern, NC 28561; Phone 252/637-7972.

How: Pilot Project Description - Volunteers from the Neuse River Foundation, Inc., under the supervision of the Neuse Riverkeeper and other responsible officials to be designated by the Foundation, will sample at the mouth of two creeks in the Neuse watershed, i.e., Crabtree (Raleigh) and Beards (Lower Neuse near Minnesott). Volunteers will be trained by NRF and NRK to take weekly samples on the same day and at the same time each week at the mouth of the respective creek. The following samples will be taken: Ammonia, Sediments (NTU), Flow Data (used to calculate load) Nitrogen (TKN), Phosphorus, Fecal, Dissolved Oxygen, pH and Temperature. Sampling protocols and water testing competency of each volunteer will be established, based on the standards normally used for these parameter by DWQ for staff water quality testing. All volunteers will available to demonstrate their sampling protocols and testing procedures at the beginning of the project and, upon request subsequently to the satisfaction of designated DWQ staff.

The following samples will be collected by the trained volunteers and thereafter analyzed by a state certified laboratory: ammonia, nitrogen, phosphorus, and

fecal. All other tests will be accomplished by use of approved and properly maintained instruments in the test kits.

Where: Proposed project sites: Crabtree Creek, located in Wake County, is known to be a major contributor of sediments to the Neuse River. Sedimentation plumes from this Creek have been documented downstream of New Bern. The Crabtree Creek watershed is currently experiencing massive new development and sedimentation control measures have been largely ineffective in controlling or limiting sedimentation runoff. Weekly samples of sediment runoff will be sampled with an NTU meter and will provide a database for establishing the extent of the problem. If improved sedimentation practices are implemented, this sampling will be critical in determining their effectiveness.

While sediments are the main focus of the monitoring program in Crabtree Creek, the other sampling is necessary to measure the creek's overall contribution to the main body of the Neuse.

Beards Creek is a small creek located on the North shore of the Neuse River, immediately upstream of Minnesott Beach. This area of the Lower Neuse is impaired due to excessive nutrients. Land application of primary treated municipal wastewater is about to begin near the headwaters of this creek. The effect if any, that this land application site will have on the water quality of this creek and the Neuse River can be documented by monitoring the mouth of this creek. Sedimentation has not been a problem in Beards Creek and monitoring for sediments is not deemed necessary.

When: Project will begin in the first week of October 1999 and continue through the month of September 2001, for a total of 24 months.

The Neuse Riverkeeper, or other designated official of the NRF, will submit quarterly reports that document monitoring results and any significant problems that are associated with carrying out the project. These reports will include the type information that will be useful in determining the effectiveness of the project and be helpful in deciding whether to extend the project throughout the entire Neuse watershed and other watersheds in North Carolina. A review of the project will be conducted by DWQ on the one-year anniversary date in 2000. A final review and report of effectiveness will be conducted by the DWQ and submitted to the NRBRC when the project ends in September 2001.

Budget:

Cost of water sample testing by laboratory:

Ammonia Nitrogen (per sample)	$ 10.00
Total Nitrogen - TKN (plus NO2 plus NO4) (per sample)	$ 30.00
Phosphorus (per sample)	$ 12.00
Fecal (per sample)	$ 15.00
(Total cost per sample event (per creek)	$ 67.00

Total cost of laboratory analysis: Two creeks times $67.00 x 52 weeks x 2 years ---------- $13,936.00

Total costs of equipment & test kits:

(Note-NRF will supply 4 fully equipped test kits to be used by the primary & back-up volunteers to measure temperature, Dissolved Oxygen & pH & the use of a

Model 2100P Turbiditmeter, by Hach Company, to measure sediments (NTU). Total value of this equipment is $2,000.00)

1 Model 2100-1514 (Swoffer) Open Stream Current Velocity Meter ----	$2,175.00
Supplies for Test Kits ----------	$ 800.00
Oversight & Administration by NRF/RK (paid to NRF)----------	$7,500.00
Total cost of project----------	$24,911.00

PROJECT MONITORING/ACCOUNTABILITY

During the start up phase of the project, NRF will work with designated DWQ staff to insure that volunteers are appropriately trained, equipped and that the QA/QC plan meets standards set out by EPA/DWQ for water monitoring. Data collection and reporting procedures will be reviewed and the reporting process and schedule will be established. Review of the schedule will include designated intervals during the first quarter for more intensive examination in order to allow for any unanticipated adjustments in project strategy or implementation protocols in a timely manner. In addition, to the previously mentioned data reports, interim cost reports and a general narrative on the progress will be furnished to the NRBRC and to designated DWQ personnel.

BASINWIDE/REGIONAL APPLICATION

A core objective of this proposal is to demonstrate the added benefits of "mouth of creek" water quality monitoring. This strategy will augment other available water data and land cover information to help refine and better target the limited resources that are available to help restore water quality in the Neuse River Basin. Given the similarity of water quality issues, i.e. nutrients and sediments, in North Carolina's other river basins; this strategy should be adaptable in analogous situations statewide.

PUBLIC EDUCATION/OUTREACH

The NRF publishes quarterly newsletters that go to approximately 2,500 members plus approximately 300 regional public officials and interest groups. In addition, press releases for general media will be done at the start and completion of the project. The NRF will continue to work with interested local governments in the Neuse Basin to promote the concept of volunteer monitoring in local communities as requested.

Attachment C

NEUSE RIVER BASIN REGIONAL COUNCIL

Development of an Accountability Process to Ensure Success of the Neuse Agricultural Reduction Strategy Rule (15A NCAC 2B .0238)

Draft Proposal by *the Neuse Agricultural Basin Oversight Committee*

I.PRIORITY PROBLEM

Water quality has been an issue in the Neuse River Basin for over a century. Nutrients, especially excess nitrogen, have been identified as the main reason resulting in massive fish kills in recent years. After nearly two years in the making, the N.C. Environmental Management Commission adopted what Chairman David Moreau called "a landmark piece of basinwide water quality planning" when it approved the Neuse River Basin Nutrient Sensitive Waters (NSW) Management Strategy in December 1997. Most rules became effective in August 1998. For the first time in the state history, the strategy applies mandatory control not only on point source pollution but also on nonpoint source pollution in the Neuse River basin. All involved parties realize that we all collectively share responsibility for water quality problems in the Neuse River basin.

The effect of best management practices (BMPs) on a field or a small watershed scale has been well documented. However, the relationship between water quality improvement at the Neuse estuary and implementation of agricultural BMPs is less well known. Monitoring and accounting for nutrient loadings and reductions from agricultural operations is a difficult task. Many people and agencies have contributed much time and energy towards accomplishing the above mission. Staff of NC Division of Water Quality and Division of Soil and Water Conservation have been working in conjunction with NC State University researchers, agricultural agencies and the Neuse Interagency Workgroup (now the Basin Oversight Committee) to develop and modify an accounting methodology that will be the basis for the process. The proposed accounting tool is the Nitrogen Loss Estimation Worksheet (NLEW). NLEW is a field-based procedure to estimate nutrient export from agricultural management units. The primary goal is to estimate relative effects of the implementation of BMP systems on nutrient export through a pre- and post-BMP implementation estimation. The output of the worksheet is an estimate of export from the cropped area, not an estimate of delivery to surface water.

To address the accuracy, and to enhance the confidence of the accountability process, a statistical field sampling procedure must be conducted. It is proposed that independently contracted statisticians design a field sampling procedure to determine the extent of pre-1996 fertilization rates and BMP coverage and practices. Results from this analysis will be used to verify and adjust fertilization and BMPs information surveyed basinwide, and to ensure that the county nitrogen reduction goal is reached. In order to ensure the success of the Neuse agricultural rule, it is critical that this evaluation be conducted.

II. OPTION CONSIDERED

Actual field visits must be conducted in order to know what practices are on the ground. However given existing resources and time, it is impossible for to visit every field in the

basin. The only alternative is to conduct a statistically valid sampling regime, which will be provided by this project.

III.DISCUSSION of SELECTED OPTION/PROJECT ABSTRACT

- **Project Title:** Development of an Accountability Process to Ensure Success of the Neuse Agricultural Reduction Strategy Rule (15A NCAC 2B .0238)
- **Lead Agency:** NC Division of Water Quality and Division of Soil and Water Conservation
- **Goal:** To address the accuracy, and to enhance the confidence of the accountability process
- **Objectives:**
  To determine the extent of pre-1996 fertilization rates and BMP coverage and practices in the Neuse basin
  To assist farmers to collectively achieve the nitrogen reduction goal mandated by the NC General Assembly
  To encourage farmers to implement site-specific cost effective BMPs to reduce nitrogen loss
- **Likelihood of Success:** This project will successfully demonstrate the use of NLEW to track the progress made towards nitrogen reduction goal.
- **Public Support:** Several local, state and federal agencies, as well as the scientific and agricultural communities support this project.
- **Time & Resources Required:** It will take approximately five months to establish sites and design statistic sampling procedure. Grant funds from the Neuse River Basin Regional Council would be pooled together with funds from other sources. It is estimated that a total of $100,000 is needed to successful conduct this project.
- **Cost-effectiveness:** Compared to site visitation of every crop field in the basin, a statistically valid field sampling project allows for efficient and effective use of resources in a timely manner.
- **Deliverables:** When this project is over, the agricultural baseline will be adjusted or revised if necessary. This verified accountability process will be used in the other river basins within or outside of North Carolina.

IV. DETAILED PROJECT DESCRIPTION/SCOPE of WORK

WHAT: This project will enhance the accuracy and confidence of an innovative agricultural accounting tool – Nitrogen Loss Estimation Worksheet (NLEW). The project will determine, through on-site evaluations, the extent of pre-1996 fertilization rates, BMPs and their coverage in the Neuse basin. This will verify agriculture's baseline loading of nitrogen to the Neuse, against which reductions can be measured. The BOC proposes that independently contracted statisticians design a field sampling procedure to collect information on pre-1996 fertilization rates and BMP coverage. Results from this analysis will be used to verify and adjust fertilization and BMP information surveyed basinwide. In order to ensure the success of the Neuse agricultural rule, it is critical that this project be conducted. Through the application of NLEW, farmers will be able to collectively achieve the nitrogen reduction goal mandated by the NC General Assembly and to implement site-specific cost effective best management practices (BMPs) to reduce nitrogen loss.

The Neuse Agricultural Nitrogen Reduction Strategy Rule requires the Basin Oversight Committee (BOC) to develop an accountability process. This process includes a tracking and

accounting methodology for evaluating nitrogen loading from agricultural operations and progress toward reaching the 30% reduction goal. The proposed accounting tool is the Nitrogen Loss Estimation Worksheet (NLEW). NLEW is a field-based procedure to estimate nutrient export from agricultural management units. The primary goal is to estimate relative effects of the implementation of best management practice (BMP) systems on nutrient export through a pre- and post-BMP implementation estimation. The output of the worksheet is an estimate of export from the cropped area.

WHY: The Neuse Agricultural Nitrogen Reduction Strategy requires a 30% reduction in nitrogen delivered to the Neuse River Estuary from agricultural sources. The baseline to be determined must represent the average loading from 1991 through 1995. While a baseline will be estimated initially through a survey of local technical specialists, verification must obtained to determine the actual success in achieving nitrogen reductions. To address the accuracy, and to enhance the confidence of the accountability process, a statistical field sampling procedure must be conducted.

WHO: The Neuse Agricultural Basin Oversight Committee will oversee this project. NC Division of Soil and Water Conservation and Division of Water Quality are the lead organizations. Tom Jones and Lin Xu are the primary contact persons.

HOW: It is proposed that independently contracted statisticians design a field sampling procedure to determine the extent of pre-1996 fertilization rates and BMP coverage and practices. Field visits will then begin to be conducted to assess actual practices implemented prior to 1996.

WHERE: This project will be conducted on cropland in the Neuse River Basin.

WHEN: It will take approximately five months to establish sites and design statistic sampling procedure.

PROJECT BUDGET:

	Regional Council Grant
STAFF	$7,000.00
EQUIPMENT	$7,000.00
SUPPLIES	$3,000.00
TRAVEL	$7,000.00
TOTAL	**$24,000.00**

V. ACTIVITIES to MONITOR SUCCESS

Progress reporting to the BOC by the contractor will be required, including sites visited, BMPs tracked acres affected, agency involvement and methods used. The BOC will review and summarize results, using NLEW to estimate pre-1996 loss of nitrogen from cropland compared with existing baseline estimates.

VI. PROGRESS REPORTS

Progress reports will be made available to the council on a quarterly basis. The reports will be made available to the general public upon request.

VII. REVIEW, EVALUATION and REDIRECTION

This demonstration project will be reviewed, evaluated and redirected (if necessary) by the Technical Committee of the Coordinating Council for the Albemarle-Pamlico National Estuary Program and the Neuse Agricultural Basin Oversight Committee.

VIII. BASINWIDE or REGIONAL APPLICATION

The results of this demonstration project can be transferable to other river basin with wide application.

IX. EDUCATION and OUTREACH

This verified accountability process will be used in the other river basins within or outside of North Carolina.

X. ENDORSEMENT by REGIONAL COUNCIL

DRAFT
1-14-99
Attachment D

Albemarle-Pamlico National Estuary Program
Regional Councils

Criteria for Selection of Demonstration Projects

Preparing a Demonstration Project Proposal

A demonstration project is a scaled-down version of an innovative or unique engineering or management strategy. The project proposal should call for immediate action. Available funding will not pay for planning, but is strictly intended for implementation of specific management or engineering strategies (shovel in the ground type projects). These projects are being funded to demonstrate the process of implementation and the effectiveness of a specific control strategy prior to basinwide or regional application. The demonstration project proposals submitted to the Coordinating Council for funding should discuss each of the components described in the Demonstration Project Checklist. It is important that each of the components be addressed under its own section in the proposal. Use of the checklist will ensure that the proposal is complete.

Selection Criteria

Regional Councils convened under Governor Hunt's Executive Order #75 (as amended #118) are eligible to receive funds from the existing U.S. Environmental Protection Agency grant to support local demonstration projects. In selecting demonstration projects, proposals will be reviewed according to and funds provided based on the following criteria:

1. Projects must address a priority problem in the estuary or its watershed as identified in the Comprehensive Conservation and Management Plan (CCMP), Governor Hunt's Coastal Agenda, or a basinwide management plan approved by the North Carolina Department of Environment and Natural Resources.

2. Proposals should demonstrate that the problem identified for action has been adequately characterized and evaluated and show that the cause(s) of the problem have been adequately assessed.

3. A majority of the members of the Regional Council(s) should support the project(s) recommended for funding. The proposal must be signed by the chair(s) or co-chair(s) of the Council(s).

4. Proposals should establish the commitment to action made by the respective local government entity, other agencies and/or educational institutions and the private sector. Commitment to ensuring regulatory, administrative, financial, and political cooperation that would enhance project success would be beneficial.

5. Proposals should establish that the opportunities and likelihood for success and improvements in environmental quality are good.

6. Proposals must accurately and thoroughly address all required components, as described in the Proposal Checklist.

7. Demonstration of innovative techniques or approaches which can be transferred throughout the watershed or other watersheds in the region will improve chances of selection or approval.

8. Proposals must guarantee that the project will include the development of cost estimates for full-scale application of the strategy throughout the watershed.

9. The proposal should describe appropriate public education and outreach methods to reach constituents and stakeholders throughout the watershed/region.

Albemarle-Pamlico National Estuary Program
Regional Councils

Format for Demonstration Project Proposals

I. Discussion of Priority Problem(s)

II. Options Considered

III. Discussion of Selected Option/Project Abstract
- A. Project Title
- B. Lead Agency/Organization
- C. Objectives
- D. Likelihood of Success
- E. Public Support
- F. Time and Resources Required
- G. Cost Effectiveness
- H. Deliverables

IV. Detailed Project Description/Scope of Work
- A. What
- B. Who
- C. How
- D. Where
- E. When
- F. Budget

V. Activities to Monitor Success
- A. Monitoring Requirements
- B. QA/QC Plan

VI. Reports on Progress, Costs, and Results

VII. Review, Evaluation, and Redirection

VIII. Basinwide or Regional Application
- A. General Discussion
- B. Cost Estimate

IX. Public Education and Outreach

X. Endorsement by Regional Council(s) and Other Partners

Albemarle-Pamlico National Estuary Program - Regional Councils
Demonstration Project - Proposal Checklist

____ 1. Discussion of the priority problem, identifying the probable causes and resource uses affected.

____ 2. Statement of the specific objectives of the project related to the problem, source, or cause.

____ 3. Discussion of the various management options considered.

____ 4. Discussion of the chosen option with reference to likelihood of success, public support, and time and resources (cost effectiveness).

____ 5. A complete outline of the specific plan needed to abate and control the problem or protect the resource. Each outline should address:

What: Describe specific environmental objectives and related measures of success and what will be done to attain them. For example, specify nutrient load reductions and use designations in the proposed location.

Who: Identify who will act, plan, and enforce; spell out roles and resource commitments for each participating agency, institution, or other entity.

How: Outline the procedure/process used to perform this project.

Where: Describe the location this project will affect.

When: Include schedules.

Budget: Provide detailed cost estimate.

____ 6. Description and schedule of activities to monitor success of the project.

____ 7. Timetable and description of reports (e.g., quarterly, final) concerning progress, costs, and results.

____ 8. Discussion of methods and schedules for review, evaluation, and redirection of the project.

____ 9. Discussion of possible basinwide and/or region wide application of the strategy.

____ 10. Commitment to develop cost estimates for basinwide application of the project.

____ 11. Discussion of public education and outreach methods.

____ 12. Formal endorsement of the demonstration project by the Regional Council(s).

NEUSE RIVER BASIN REGIONAL COUNCIL

CARTERET

County Representative
Vacant

Municipal Representative
Vacant

Environmental Science
Dr. John Costlow
201 Ann Street
Beaufort, NC 28516
252-728-4027
FAX: 252-728-5327

CRAVEN

County Representative
Gary Bleau
County Commissioner
2102 Neuse Cliff Dr.
New Bern, NC 28560
252-636-6601
FAX: 252-633-9208

Municipal Representative
Bill Ritchie
Mayor, Town of River Bend
324 Plantation Dr.
River Bend, NC 28562
252-633-2396

Conservation
Marion Smith
Neuse River Keeper
The Neuse River Foundation
P.O. Box 15451
New Bern, NC 28561
252-637-7972

Silviculture
Joseph Hughes
Weyerhaeuser, Inc.
P.O. Box 1391
New Bern, NC 28563-1391
252-633-7239

DURHAM

County Representative
VACANT

Municipal Representative
Terry Rolan
Director, Water Resources
101 City Hall Plaza
Durham, NC 27701
919-560-4381

Soil & Water Conservation District
VACANT

FRANKLIN

County Representative
James Moss, Jr.
County Commissioner
P.O. Box 268
Youngsville, NC 27596
919-781-6300

Municipal Representative
Jim Underwood
PO Box 97
Youngsville, NC 27596
W - 919-556-5073
H - 919-556-5235

Business & Industry
VACANT

GRANVILLE

County Representative
Ronald Alligood
County Commissioner
1935 West "B" Street
Butner, NC 27509
919-693-4761

Municipal Representative
Thomas McGee
Manager, Town of Butner
205-C West "E" St
Butner, NC 27509
919-575-3032

Business & Industry
VACANT

GREENE

County Representative
VACANT

Municipal Representative
VACANT

Recreational fishing
VACANT

JOHNSTON

County Representative
VACANT

Municipal Representative
VACANT

Conservation
VACANT

JONES

County Representative
Sondra Riggs
County Commissioner
105 Riggstown Rd.
Pollocksville, NC 28573
252-224-7431

Municipal Representative
VACANT

Agriculture
VACANT

LENOIR

County Representative
Mr. Dee Smith
County Commissioner
Route 8, Box 225
Kinston, NC 28501
252-522-4171

Municipal Representative
Les Turner
PO Box 68
Kinston, NC 28502
W - 252-527-5505
H - 252-568-2357

At-large
Marguerite Whitfield
5677 Hwy. 55 West
Kinston, NC 28504
252-569-5421

NASH

County Representative
VACANT

Municipal Representative
VACANT

Agriculture
VACANT

ORANGE

County Representative
VACANT

Municipal Representative
Margaret Holton
Water/Natural Resources
411 Holly Lane
Chapel Hill, NC 27514
919-929-1339

Soil & Water Conservation District
VACANT

PAMLICO

County Representative
Anita Huffman
Planning Director
P.O. Box 776
Bayboro, NC 28515
252-745-3081

Municipal Representative
Donna Bridges
1225 Roberts Road
Grantsboro, NC

Commercial Fishing
VACANT

PERSON

County Representative
William Hurdle
County Commissioner
P.O. Box 200
Hurdle Mills, NC 27541
910-364-1776
Hurdleb@person.net

Municipal Representative
VACANT

Soil & Water Conservation District
Bruce Whitfield
5968 Gordonton Rd.
Hurdle Mills, NC 27541
910-597-4805

PITT

County Representative
Andy McLawhorn
Employment for People w/ Disabilities Committee
Rt. 1, Box 225
Winterville, NC 28590
252-756-3343

Municipal Representative
Paul Spruill
Administrator
Town of Grifton
P.O. Box 579
Grifton, NC 28530
252-524-5168

Tourism Representative
VACANT

WAKE

County Representative
VACANT

Municipal Representative
VACANT

Business & Industry
VACANT

WAYNE

County Representative
Norman Ricks
Finance Director
Wayne County
P.O. Box 227
Goldsboro, NC 27533
919-731-1417

Municipal Representative
Kelly Griffin
PO Box 302
Seven Springs, NC 28578
W - 252-569-1420
H - 252-569-1420

Recreational fishing
VACANT

WILSON

County Representative
Eldon Newton
County Commissioner
1317 Lakeside Drive
Wilson, NC 27893
252-237-2020

Municipal Representative
Charles Pittman, III
Deputy City Mngr.
City of Wilson
PO Box 10
Wilson, NC 27893
252-399-2462

Agriculture
VACANT