



Draft Clean Water Act Section 208 Plan – Comments

November 20, 2014

The Association to Preserve Cape Cod (APCC) was founded in 1968 to promote policies and programs that foster preservation of Cape Cod's natural resources. APCC is a regional nonprofit environmental organization with more than 5,000 members Cape-wide. Our goals include protection of critical habitats, protection of groundwater, surface water, and wetland resources; preservation of open space; promotion of responsible, planned growth; and the achievement of an environmental ethic (see www.apcc.org). To achieve these goals, we provide technical assistance, outreach, advocacy for science-based policies, and education. We appreciate the opportunity to be engaged in the Clean Water Act Section 208 planning and updating process as well as this opportunity to comment on the draft plan. There is no single plan or policy that will impact the ecological health of the region more than this areawide water quality initiative.

APCC recognizes that the 208 Plan Update is not a “plan” in the classic sense of the word, but more of a manual of actions and options available to Waste Management Agencies (WMA) or Water Pollution Abatement Districts (WPAD). Designation of WMAs may be the biggest challenge moving forward. APCC supports a single regional WMA for the Cape (under county government and county bonding authority), or in the alternative, no more than four subregional WMAs along the lines of the subregional areas utilized in the 208 process. The absence of the county from the list of potential WMAs or WPAD should be corrected in the final plan. It will be a step backwards to permit town-wide WMAs based solely on municipal boundaries.

Planning process: The process used in updating the 208 plan is a national model. The integration of public and expert perspective into a plan of multiple tools and technologies that also includes up-to-date information is unique. Clearly, the resultant plan is an example of government at its best—integrating public involvement, science and technology into a results-driven menu of options that will cost taxpayers significantly less than earlier estimates and achieve water quality standards in a more timely fashion. Despite this exceptional process to date, APCC does believe that there are gaps in the draft plan that should be addressed before the plan is finalized.

The double edged sword of regulatory enforcement/compliance: Many federal, state and nongovernmental grants have requirements similar to the one included in the Clean Water Section 319 program, which states: “Projects undertaken to comply with local or governmental enforcement actions such as State or Federal Administrative Orders or Consent Orders cannot be funded.” This language has been used in the past to disqualify funding for projects that were viewed as complying with Municipal Separate Storm Sewer System (MS4) permits. To maximize availability of grant funding related to the Section 208 plan, it is imperative that the plan be

narrowly construed to avoid limitations on any potential outside funding. This is particularly true where the plan asks the state to specifically designate nutrient impaired waters. This potential loss of funding should be fully considered and vetted before the plan is finalized.

Overlooked low hanging fruit: Cesspools are one of the easy targets largely overlooked by the draft 208 plan. Anecdotal information primarily from engineers points out that many properties have escaped from Title 5 inspection under current regulations. It is our understanding that municipal records make it difficult to determine the exact number of properties that may be relying on cesspools. According to testimony during 208 public hearings, it was common practice in the past to build cesspools (particularly those in close proximity to coastal embayments and ponds) with a direct hydraulic connection to groundwater, thus making these systems “maintenance-free.” Obviously, if true, this mean raw septage is reaching these embayments and ponds. Recent work by the Center for Coastal Studies and Silent Spring indicate that some untreated septage is reaching our embayments. Silent Spring reports that acetaminophen is one pharmaceutical that is completely broken down and rendered undetectable after passing through a functioning Title 5 system. The Center for Coastal Studies reports detecting acetaminophen in the coastal embayments it is monitoring. This means that there are non-functioning septic systems contributing to those embayments. Cesspools should be aggressively phased out of existence. This action should be included as part of the plan’s regulatory reform chapter.

Regulatory reform: APCC notes that many of the most promising options identified in the draft 208 plan are not viable options under the current regulatory scheme.

Watershed-based permits: While APCC favors watershed-based permits as the most efficient means of attaining water quality goals, we are skeptical of this permit system working under the standard intermunicipal agreement format often discussed. APCC favors a regional entity acting on a watershed by watershed basis as the most advantageous means to attaining success. Clearly there are successes in intermunicipal agreements, but in wastewater the track record is not reassuring. Falmouth, Mashpee and Sandwich have made little or no progress on the Waquoit Bay watershed despite years of attempts to craft a multi-town solution. Harwich and Chatham, often viewed as the best available example of intermunicipal wastewater solutions, have had some recent breakdowns in their efforts to work toward shared management. The Dennis and Yarmouth school cooperation is an example of how such mutually beneficial arrangements can sour quickly.

Comprehensive Wastewater Management Plans (CWMP): If Cape Cod adopts watershed-based permits, then we should also change to watershed-based CWMPs. Because of the complexity of municipal boundary-based CWMPs, watershed-based plans would decrease the time to prepare, be more targeted, be more likely to integrate adaptive management and reduce costs. This requires a regulatory change by the Department of Environmental Protection (DEP).

Cape Cod Commission Special Review Process: APCC strongly supports this more realistic process for wastewater planning efforts.

Development of Regional Impact (DRI): In addition to other Cape Cod Commission regulatory changes identified in the draft plan, APCC endorses a more predictable approach for projects reviewed as DRIs. The proposed Lowes project in South Dennis pointed out the challenge of evaluating projects that propose a net increase in nutrient loading. APCC supports an approach that requires a net reduction in nutrients to the relevant watershed for all DRIs that will produce wastewater. Ironically, that is the approach that Lowes followed in Pembroke, Massachusetts but seemed dead set against in Dennis.

Land use regulatory reform: The draft 208 plan recognizes the importance of sound land use regulation and offers a small menu of options that can be considered by towns largely through zoning authority. State Revolving Fund (SRF) statutory requirements mandate “flow neutral” bylaws in place for communities and potentially watersheds to obtain the best interest and terms for loans and grants. The plan should recognize the challenge of implementation of new zoning regulations and so-called grandfather protection to address land use at the beginning of the planning process and not in due course. Inventive land use regulatory reform should be added as a chart to the plan, including natural resource protection zoning; floor area regulation; site plan review of large residential properties; mandatory advanced treatment requirements based upon the quantity of nitrogen per acre being discharged; wetland buffer protection beyond the Wetland Protection Act limits especially for siting of on-site septic systems; programs to acquire undersized undeveloped lots and reductions in impermeable surfaces. Reductions in flow should be rewarded. Regulatory changes should be integrated in the adaptive management to determine the effectiveness of various strategies. The District of Critical Planning Concern tool should be encouraged as a means of drafting and implementing flow neutral bylaws in order to address concerns about new grandfather protections that would undermine the goals of the municipality.

Aquaculture: For successful use of aquaculture and shellfish bed/reef restoration as a clean water tool/technology, the Division of Marine Fisheries (DMF) will need to reevaluate current regulations and identify new enforcement strategies to prevent potential contaminated shellfish from reaching the human food supply. The current regulatory framework makes it difficult if not impossible to maximize the efficacy of shellfish as a tool. Preliminary results from work in Little Pond in Falmouth indicate that the oysters may have to be transplanted for depuration at an earlier than optimum time for nutrient reduction under current DMF guidelines and regulations. This is a regulatory challenge to maximize ecological benefit while eliminating any risk to public health. Regulatory reform is in order.

Bad timing opportunities must not be lost: Testimony during the stakeholder process and public hearings on the 208 plan noted that there is a significant amount of research and development for potential solutions for treating wastewater that is occurring across a broad spectrum of technologies. A number of commenters have opined that the Cape simply has a bad timing problem and that all we have do is wait for technology to catch up. APCC believes that this

waiting approach is both shortsighted and fool hearty. Nonetheless, as a region faced with a 50 year-long capital improvement project we must be in a position to quickly evaluate, test and implement appropriate technologies as they become available. This means that we have to have procedures in place to embrace new technologies and abandon projects that are underway when that makes sense from a clean water and economic perspective. The adaptive management decision matrix in the plan should be modified to incorporate a periodic technology review/update even for technologies that appear to be meeting targets.

Phosphorus: While the focus of the 208 plan was not freshwater ponds and phosphorus, the 1,000-plus ponds across the Cape are often as equally nutrient-impaired as embayments. Towns continue to use alum and other treatment technologies to deal with the reactivity of phosphorus, but fail to address source reduction or phosphorus elimination. There are simple, low cost steps such as prohibiting so-called organic fertilizers (manure-based) within 300 feet of freshwater wetlands to help with source reduction. This issue, which has a somewhat counterintuitive ring with the public because of the favorability of organic products, requires an aggressive public education component. Additionally, the plan should address/restrict the siting of on-site septic systems, which are not capable of treating phosphorus within 300 feet of a freshwater wetland. This recommendation should be added to the regulatory change section of the plan. Phosphorus source reduction is easier to attain than nitrogen source reduction because of the limited travel range of phosphorus.

Emerging contaminants: There is far more we don't know about emerging contaminants in our aquifer than we do know. We know enough to be concerned about pharmaceuticals, cleaning products and other chemicals introduced into our aquifer through wastewater discharges. We need to better protect our aquifer from the cumulative impact of repeated small doses of pharmaceuticals excreted or chemicals discharged into the groundwater. Congress needs to mandate that drug testing regimens include waste products excreted and accumulated in the environment as part of the Food and Drug Administration evaluation of all pharmaceuticals. Physicians should be provided information on the waste products of pharmaceuticals. We also need to be able to quickly remove from the market household cleaning products and personal care products that are discharged to the groundwater in potentially harmful forms.

Socioeconomic and social justice: For decades the Cape allowed developers to avoid paying the full cost to address wastewater contamination of our ponds and estuaries. While it is likely impossible to obtain funding from these developers to pay for those past impacts, we need to insure that these oversights of the past are corrected and the cost of correcting these inadequacies are not passed along to those least able to pay. APCC supports the establishment of a fund based upon water usage that will in part be used to insure that no one loses their home or is forced to move because of the economic impacts of wastewater treatment. There are a number of tools and vehicles available, including tax avoidance programs for the elderly and the Community Septic Management Loan Program that can be models for such a program.

Carrots and sticks: The final plan should enumerate more incentives, especially targeting those communities that have been unwilling or unable to engage even in rudimentary planning and evaluation around wastewater management. The rewards should be targeted to recognize those communities that have been out front in efforts to deal with the wastewater challenges.

Integrated water protection (ponds, drinking water, emerging contaminants): Integrated water resources management plan (IWRMP) is a planning process that promotes the coordinated development and management of water, land and related resources in order to maximize the resultant economic and social welfare in an equitable manner without compromising the sustainability of vital ecosystems. The draft 208 plan does discuss IWRMP in connection with Brewster's interest and recognition of the interconnectivity of the Cape's water resources, including coastal, freshwater, drinking water, ponds, streams and stormwater. The draft 208 plan is not an IWRMP, but the Cape must move in this direction to secure sustainable water resources at all points in the ecosystem. IWRMP was endorsed in the Massachusetts Executive Office of Energy and Environmental Affairs' Massachusetts Water Policy, which was developed during the Romney administration.

Case for regional entity: There is no better case for a regional wastewater authority than the 208 process itself. The 208 plan is more comprehensive and fact driven than any municipal effort. The 208 process is evidence that the region as a whole is more likely to garner large state and federal grants and loans compared to similar efforts on a municipal level. The 208 process did not add a single penny to the Cape's tax rate.

The Draft 208 Plan is an important step forward in protecting all of our water quality – freshwater, saltwater and ground water. We applaud the public engagement and tireless staff that worked cooperatively and efficiently to assemble this plan. No doubt, the difficult work remains in front of all Cape Codders.

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