15A NCAC 18C .0307 ENGINEER'S REPORT, WATER SYSTEM MANAGEMENT PLAN AND OTHER PLANS

(a) The applicant shall submit to the Department an Engineer's Report and Water System Management Plan.

(b) Engineer's Report. The Engineer's Report shall contain a system description for the entire project, including scheduled phase development and the following information, where applicable:

- (1) description of all existing water systems related to this project;
- (2) identification of the municipality, community, area, or facility to be served by the proposed water system;
- (3) the name and address of the applicant;
- (4) a description of the nature of the establishments and of the area to be served by the proposed water system;
- (5) a description of the future service areas of the public water system for 5, 10, 15 and 20 years;
- (6) consideration of alternative plans for meeting the water supply requirements of the area, including, for new systems, obtaining water service from an existing system;
- (7) for applicants seeking State loan or grant support for the project, financial considerations, including:
 - (A) technical alternatives;
 - (B) the costs of integral units; and
 - (C) the total costs.
- (8) population records and trends, present and anticipated future water demands, and present and future yield of source or sources of water supply, including provisions to supply water to other systems;
- (9) character of source or sources of water supply, including:
 - (A) hydrological or hydrogeological data;
 - (B) stream flow rates or well yields;
 - (C) for surface sources, analytical results for chemical, mineral, bacteriological, and physical qualities; and
 - (D) the location and nature of sources of pollution.
- (10) proposed water treatment processes, including:
 - (A) the criteria and basis of design of units;
 - (B) the methods or procedures used in arriving at recommendations; and
 - (C) the reasons or justifications for any deviations from conventional or indicated process or method.
- (11) for purchased water, a copy of the agreement with the supplier and the hydraulic analysis showing the supplier's capabilities for supplying the purchased water;
- (12) a description of the design basis of the source, treatment, and distribution system, and the useful life of all sources, treatment, and transmission facilities including pipes, pumping stations, and storage facilities;
- (13) for existing system projects intending to alter or expand a distribution system, a statement of maximum daily treated water supply and maximum daily demand, including supporting documentation and calculations; and
- (14) for existing systems, a prioritized list of infrastructure improvements.

(c) Water System Management Plan. The Water System Management Plan shall document the ability to finance, operate, and manage the system in accordance with this Subchapter for the current owner and for any entity that assumes ownership of the water system within the first 24 months of operation. The Water System Management Plan shall include the following information, where applicable:

- (1) Organization:
 - (A) a description of organizational structure or a chart showing all aspects of water system management and operation;
 - (B) an identification of positions responsible for policy decisions ensuring compliance with State rules and the day-to-day operation of the system; and
 - (C) a copy of all contracts for management or operation of the water system by persons or agencies other than the system's owner.
- (2) Ownership:
 - (A) identify the ownership structure, such as sole proprietor, partnership, corporation, limited liability company, homeowner association, nonprofit organization, local government unit,

state or federal agency, or other legal entity, and disclose if the ownership of the system is expected to change once the system is constructed and, if known, identify the future owners;

- (B) provide the mailing address and street address of the owner and the physical location of the water system;
- (C) disclose any encumbrances, trust indentures, bankruptcy decrees, legal orders or proceedings, or other items that may affect or limit the owner's control over the system and describe how compliance with the requirements of this Subchapter will be maintained; and
- (D) describe the legal authority, such as ownership, leases or recorded easements, allowing inspection, repair, and maintenance of system components.
- (3) Management qualifications:
 - (A) describe the qualifications of the owners and managers of the water system, including training and experience in owning or managing a water system; and
 - (B) provide the name and Public Water Supply Identification Number of all public water systems owned within the last five years as well as all systems operated under contract for another owner within the last five years. If any system has been assessed a penalty for violating a requirement set forth in this Subchapter, describe how the owner will prevent similar violations at this system.
- (4) Management training. Describe plans to keep management current with regulatory requirements for managing and operating a public water system.
- (5) Policies. The system shall have policies regarding the following procedures:
 - (A) cross-connection control;
 - (B) customer information, complaints, and public education;
 - (C) budget development and rate structure;
 - (D) response and notification if water quality violations occur;
 - (E) customer connection, disconnection, billing, and collection; and
 - (F) safety procedures.

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- (6) System monitoring, reporting and record keeping. The applicant shall provide:
 - (A) a summary of the applicable system monitoring and reporting requirements; and
 - (B) a description of procedures for keeping and compiling records and reports in accordance with this Subchapter.
- (7) Financial Plans. The plan shall contain the following financial information, where applicable:
 - Units of Local Government:
 - (i) For projects that require the unit of local government to incur debt, the unit of local government shall submit a statement from the Local Government Commission stating that debt issue has been approved.
 - (ii) For projects that do not require the unit of local government to incur debt, the unit of local government shall submit the following:
 - (I) a statement from the unit of local government documenting that they are in compliance with G. S. 159, Article 3, The Local Government Budget and Fiscal Control Act; and
 - (II) estimated revenues, expenditures, and rate structure for the construction, operation and maintenance, administration, and reasonable expansion of the project. This information shall be provided on a form designated by the Department and shall demonstrate that revenues are greater than expenses.
 - (B) The North Carolina Utilities Commission's financial determination may be used as the financial plan for systems subject to its regulations:
 - (i) submit a copy of the Order Granting Franchise and Approving Rates from the North Carolina Utility Commission; or
 - (ii) submit a copy of the Order Recognizing Continuous Extension and Approving Rates from the North Carolina Utilities Commission.
 - (C) Non-transient non-community water systems. Owners of existing non-transient noncommunity water system(s) which receive no violation of this Subchapter during the preceding three years shall provide a description of negative impacts the project would

have on the financial ability to comply with this Subchapter. The owner of either a proposed new or existing non-transient non-community water system that was in violation of this Subchapter within the prior three years shall follow the requirements in Part (D) of this Subparagraph.

- (D) All other community and non-transient non-community water systems shall document the following:
 - (i) analysis that compares anticipated revenues with planned expenditures for a five-year period that demonstrates a positive cash flow in each year, and a 20year equipment replacement cost plan documenting the methods to finance equipment replacement;
 - (ii) the creation and funding of a continuous operating cash reserve greater than or equal to one-eighth of the annual operating, maintenance, and administrative expenses for the water system. The operating cash reserve shall be fully funded by the end of the first year of operation;
 - (iii) the creation and funding of an emergency cash reserve greater than or equal the cost of replacing the largest capacity pump. The emergency cash reserve shall be fully funded by the end of the fifth year of operation; and
 - (iv) a description of the budget and expenditure control procedures that assure budget control for the applicant, including procedures or policies to prevent misuse of funds and a demonstration that the system has adopted generally accepted accounting procedures.
 - (v) In lieu of Sub-Items (ii) and (iii) of this Paragraph, substitute documentation shall be accepted in the following instances:
 - (I) an applicant with multiple water systems showing reserves affording greater or equal capabilities; or
 - (II) an applicant showing equivalent financial capacity to comply with requirements of this Section.
- (8) One Water System Management Plan may be submitted on behalf of an applicant owning and operating multiple water systems or an applicant pursuing multiple alterations or expansions and may include future projected construction or system acquisitions. The applicant shall submit a new Water System Management Plan for a project not covered under the existing Water System Management Plan or if violations of this Subchapter occur or continue at a system under an applicant's ownership or control.

(d) Operation and Maintenance Plan. The plan shall be completed prior to submitting the applicant's certification in accordance with Rule .0303(c) of this Section. This plan shall be accessible to the operator on duty at all times and available to the Department upon request. The Operation and Maintenance Plan shall include, at a minimum, a description of the location and routine operation and maintenance procedures for:

- (1) components of the treatment facility;
- (2) pumps, meters, valves, blowoffs, and hydrants;
- (3) backflow devices;
- (4) storage tanks; and
- (5) all other appurtenances requiring routine operation and maintenance.

(e) Emergency Management Plan. The Emergency Management Plan shall be completed prior to submitting the applicant certification required in Rule .0303(c) of this Section. The Emergency Management Plan shall be available to personnel responsible for emergency management and operator on duty at all times and available to the Department upon request. The supplier of water shall consider using the principles, practices, forms, nomenclature, structure, and definitions found in the National Incident Management System and shall contain the following information where applicable:

- (1) For community water systems, a plan with the following elements shall be required:
 - (A) an identification and phone numbers of personnel responsible for emergency management, including public water system, local, State, and federal emergency contacts;
 - (B) an identification of foreseeable natural and human-caused emergency events, including water shortages and outages;
 - (C) a description of the emergency response plan for each identified event;
 - (D) a description of the notification procedures; and

- (E) an identification and evaluation of all facilities and equipment whose failure would result in a water outage or water quality violations.
- (2) For a supplier of water that treats and furnishes water from a surface water source, completion of the Source Water Protection Plan in accordance with Rule .1305 of this Subchapter shall fulfill the Emergency Management Plan requirement.
- (3) For non-transient, non-community water systems, the plan shall contain the positions and phone numbers of responsible persons to contact in the event of an emergency, including public water system, local, State and federal emergency contacts.

History Note: Authority G.S. 130A-315; 130A-317; P.L. 93-523; Eff. January 1, 1977; Readopted Eff. December 5, 1977; Amended Eff. July 1, 1994; September 1, 1990; June 30, 1980; September 1, 1979; Temporary Amendment Eff. October 1, 1999; Amended Eff. August 1, 2000; Readopted Eff. July 1, 2019.