Memorandum

To: NC Environmental Health Specialists
From: Nancy Deal, On-Site Water Protection Branch Head
Subject: Design Daily Flow Reduction for Family Dollar Stores
Date: February 3, 2014

Onsite Water Protection Branch Staff have reviewed data sets supporting a general flow reduction for Family Dollar Stores (retail discount stores). Assuming compliance with all other pertinent provisions of the Rules (15A NCAC 18A .1900), applicants may propose a design daily flow of 200 gallons per day (gpd) for the referenced retail stores under the following conditions:

1. Tank capacity based upon the un-reduced daily design flow (120 gpd/1,000 square feet of retail sales area);
2. Use of low-flow plumbing fixtures such as spring-loaded or automatically activated faucets with flow rates of one gallon per minute or less, low-flow urinals using 0.5 gallons per flush or less, and low-flow toilets using 1.28 gallons per flush or less (manufacturers’ cut sheets with specifications for all fixtures provided);
3. Submittal of a detailed floor plan of the entire building showing fixtures, area designations and other appurtenances;
4. Retail sales area not to exceed 8,000 square feet;
5. If a pump system is proposed:
   a. Use of a Branch-approved flow equalization control panel;
   b. Configuration of the flow equalization control panel to limit the volume of effluent discharged to the drainfield such that only one timed dose is delivered upon lag float activation;
   c. Configuration of the control panel to limit the total daily dose volume to no more than the maximum daily design flow of 200 gpd;
6. Prohibition of disposal of any cleaning/disinfecting wipes, moist toilettes, personal hygiene wipes, baby wipes, chemical cleaners including, but not limited to, quaternary ammonia compounds or any other compound which may adversely affect biological activity into the system;
7. Prohibition of disposal of any food waste (solid, liquid, or semisolid) into the system;
8. Associated Improvement Permits, Authorizations to Construct, and Operation Permits shall specify the business tenant or owner as a Family Dollar store or, in the case of multiple stores served by the same system, designation of the specific location of the Family Dollar store, and;
9. Any change of designation as a Family Dollar store requires submittal of a new application and re-evaluation of the design daily flow, wastewater characteristics and system design to determine specific suitability for the proposed change of use.
10. If a private water supply will serve the facility, we strongly recommend installation of a water meter for the Family Dollar store to ensure that the design daily flow conditions of the Operation Permit are met.