### 121-5. Definitions and Word Usage

### The following definitions are to be added:

"Public roadway or railroad" means a pathway for use by motor vehicles or trains that is intended for public use and is constructed by, or on behalf of, a public transportation entity. A public roadway or railroad does not include a roadway or railroad constructed as part of a private development, regardless of whether the roadway or railroad is ultimately to be dedicated to and/or maintained by a governmental entity.

"Public transportation entity" means a Federal, State, county, or municipal government, an independent State authority, or a statutorily authorized public-private partnership program pursuant to P.L. 2018, c. 90 (N.J.S.A. 40A:11-52 et seq.), that performs a public roadway or railroad project that includes new construction, expansion, reconstruction, or improvement of a public roadway or railroad.

#### 121-7. Stormwater Management Requirements for Major Development

The last sentence of Item e shall be deleted and replaced with:

The most current version of the BMP Manual can be found on the Department's website at: https://dep.nj.gov/stormwater/bmp-manual/.

#### 121-9. Groundwater Recharge Standards

### Item A(2) shall be deleted and replaced with:

Demonstrate through hydrologic and hydraulic analysis that the increase of stormwater runoff volume from pre-construction to post-construction for the projected 2-year storm is infiltrated.

### Item C(1) shall be deleted and replaced with:

Stormwater from areas of high pollutant loading. High pollutant loading areas are areas in industrial and commercial developments where solvents and/or petroleum products are loaded/unloaded, stored, or applied, areas where pesticides are loaded/unloaded or stored; areas where hazardous materials are expected to be present in greater than "reportable quantities" as defined by the United States Environmental Protection Agency (EPA) at 40 CFR 302.4; areas where recharge would be inconsistent with Department approved remedial action work plan

approved pursuant to the Administrative Requirements for the Remediation of Contaminated Sites rules, N.J.A.C. 7:26C, or Department landfill closure plan and areas; and areas with high risks for spills of toxic materials, such as gas stations and vehicle maintenance facilities; and

# 121-11. Stormwater Runoff Quantity Standards

The following text shall be revised in item A(1), A(2) and A(3).

Delete the phrase: the two-, ten- and 100 year storm events

Replace with: the current and projected two-, ten- and 100 year

storm events

# 121-12. Calculation of Stormwater Runoff and Groundwater Recharge:

Delete Section 121-12 in its entirety and replace with the following text:

- A. Stormwater runoff shall be calculated in accordance with the following:
  - (1) The design engineer shall calculate runoff using the following method:

The USDA Natural Resources Conservation Service (NRCS) methodology, including the NRCS Runoff Equation and Dimensionless Unit Hydrograph, as described in Chapters 7, 9, 10, 15 and 16 Part 630, Hydrology National Engineering Handbook, incorporated herein by reference as amended and supplemented. This methodology is additionally described in Technical Release 55 - Urban Hydrology for Small Watersheds (TR-55), dated June 1986, incorporated herein by reference as amended and supplemented. Information regarding the methodology is available from the Natural Resources Conservation Service website at:

https://directives.sc.egov.usda.gov/viewerFS.aspx?hid=21422

or at United States Department of Agriculture Natural Resources Conservation Service, New Jersey State Office.

(2) For the purpose of calculating curve numbers and groundwater recharge, there is a presumption that the pre-construction condition of a site or portion thereof is a wooded land use with good hydrologic condition. The term curve number applies to the NRCS methodology above. A curve number or a groundwater recharge land cover for an existing condition may be used on all or a portion of the site if the design engineer verifies that the hydrologic condition has existed on the site or portion of the site for at least

five years without interruption prior to the time of application. If more than one land cover has existed on the site during the five years immediately prior to the time of application, the land cover with the lowest runoff potential shall be used for the computations. In addition, there is the presumption that the site is in good hydrologic condition (if the land use type is pasture, lawn, or park), with good cover (if the land use type is woods), or with good hydrologic condition and conservation treatment (if the land use type is cultivation).

- (3) In computing pre-construction stormwater runoff, the design engineer shall account for all significant land features and structures, such as ponds, wetlands, depressions, hedgerows, or culverts, that may reduce pre-construction stormwater runoff rates and volumes.
- (4) In computing stormwater runoff from all design storms, the design engineer shall consider the relative stormwater runoff rates and/or volumes of pervious and impervious surfaces separately to accurately compute the rates and volume of stormwater runoff from the site. To calculate runoff from unconnected impervious cover, urban impervious area modifications as described in the NRCS *Technical Release 55 Urban Hydrology for Small Watersheds* or other methods may be employed.
- (5) If the invert of the outlet structure of a stormwater management measure is below the flood hazard design flood elevation as defined at N.J.A.C. 7:13, the design engineer shall take into account the effects of tailwater in the design of structural stormwater management measures.
- B. Groundwater recharge may be calculated in accordance with the following:

The New Jersey Geological Survey Report <u>GSR-32</u>: A <u>Method for Evaluating Groundwater-Recharge Areas in New Jersey</u>, incorporated herein by reference as amended and supplemented. Information regarding the methodology is available from the New Jersey Stormwater Best Management Practices Manual; at the New Jersey Geological Survey website at:

https://www.nj.gov/dep/njgs/pricelst/gsreport/gsr32.pdf

or at New Jersey Geological and Water Survey, 29 Arctic Parkway, PO Box 420 Mail Code 29-01, Trenton, New Jersey 08625-0420.

C. The precipitation depths of the current two-, 10-, and 100-year storm events shall be determined by multiplying the values determined in accordance with items 1 and 2 below:

(1) The applicant shall utilize the National Oceanographic and Atmospheric Administration (NOAA), National Weather Service's Atlas 14 Point Precipitation Frequency Estimates: NJ, in accordance with the location(s) of the drainage area(s) of the site. This data is available at:

https://hdsc.nws.noaa.gov/hdsc/pfds/pfds map cont.html?bkmrk=nj; and

(2) The applicant shall utilize Table 5: Current Precipitation Adjustment Factors below, which sets forth the applicable multiplier for the drainage area(s) of the site, in accordance with the county or counties where the drainage area(s) of the site is located.

**Table 5: Current Precipitation Adjustment Factors** 

	Current Precipitation Adjustment Factors			
County	2-year Design Storm	10-year Design Storm	100-year Design Storm	
Sussex	1.03	1.04	1.07	

D. Table 6: Future Precipitation Change Factors provided below sets forth the change factors to be used in determining the projected two-, 10-, and 100-year storm events for use in this chapter, which are organized alphabetically by county. The precipitation depth of the projected two-, 10-, and 100-year storm events of a site shall be determined by multiplying the precipitation depth of the two-, 10-, and 100-year storm events determined from the National Weather Service's Atlas 14 Point Precipitation Frequency Estimates pursuant to (c)1 above, by the change factor in the table below, in accordance with the county or counties where the drainage area(s) of the site is located.

**Table 6: Future Precipitation Change Factors** 

	Future Precipitation Change Factors			
County	2-year Design Storm	10-year Design Storm	100-year Design Storm	
Sussex	1.24	1.29	1.50	

# 121-13. Sources for Technical Guidance:

<u>Delete Section 121-13 in its entirety and replace with the following text:</u>

A. Technical guidance for stormwater management measures can be found in the documents listed below, which are available to download from the Department's website at: <a href="https://dep.nj.gov/stormwater/bmp-manual/">https://dep.nj.gov/stormwater/bmp-manual/</a>.

- (1) Guidelines for stormwater management measures are contained in the New Jersey Stormwater Best Management Practices Manual, as amended and supplemented. Information is provided on stormwater management measures such as, but not limited to, those listed in Tables 1, 2, and 3.
- (2) Additional maintenance guidance is available on the Department's website at: <a href="https://dep.nj.gov/stormwater/maintenance-guidance/">https://dep.nj.gov/stormwater/maintenance-guidance/</a>.
- B. Submissions required for review by the Department should be mailed to:

The Division of Watershed Protection and Restoration, New Jersey Department of Environmental Protection, Mail Code 501-02A, PO Box 420, Trenton, New Jersey 08625-0420.

### 121-15. Safety Standards for Stormwater Management Basins:

Delete Section B(2)(b) and replace with the following text:

The overflow grate spacing shall be no greater than two inches across the smallest dimension

### 121-17. Maintenance and Repair:

<u>Delete Section B(8) and replace with the following text:</u>

The requirements of Section 121-18B(3) and B(4) do not apply to stormwater management facilities that are dedicated to and accepted by the municipality or another governmental agency, subject to all applicable municipal stormwater general permit conditions, as issued by the Department. Maintenance and inspection guidance can be found on the Department's website at:

https://dep.nj.gov/stormwater/maintenance-guidance/.