

THE CITY OF WARWICK
STATE OF RHODE ISLAND AND PROVIDENCE PLANTATIONS

CHAPTER 68
SOIL EROSION AND SEDIMENT CONTROL

No..... Date.....

Approved.....Mayor

Be it ordained by the City of Warwick:

Section I. Chapter 68 of the Code of Ordinances of the City of Warwick is hereby amended, as follows:

Chapter 68 – Soil Erosion and Sediment Control, Sec. 1 – 13 are deleted in their entirety.

Exhibit A - attached hereto and incorporated herein by reference is inserted in place, thereof.

Section II. The City Clerk of the City of Warwick is hereby authorized and directed to cause said changes to be made to the relevant provisions of the Code of Ordinances for the City of Warwick.

Section III. This Ordinance shall take effect upon passage and publication as prescribed by law.

SPONSORED BY: COUNCILMAN COLANTUONO
ON BEHALF OF
MAYOR AVEDISIAN

COMMITTEE: ORDINANCE

1 EXHIBIT A

2 Chapter 68

3 Chapter 68 - Soil Erosion, Sediment Control, and Post-Construction Storm Water Control

4
5 **Sec. 68-1. Definitions.**

6 The following words, terms and phrases, when used in this chapter, shall have the meanings ascribed
7 to them in this section, except where the context clearly indicates a different meaning:

8 *Applicant* means any persons, corporation, or public or private organization proposing a
9 development which would involve disturbance to the natural terrain as herein defined.

10 *Building Official* means the designated and appointed Building Official for the City of
11 Warwick

12 *City* means the City of Warwick, Rhode Island.

13 *Cut* means an excavation, or the difference between a point on the original ground and a
14 designated point of lower elevation on the final grade; also, the material removed in excavation.

15 *Development project* means any construction, demolition, or removal of structures, roadways,
16 parking or other paved areas, utilities, or other similar facilities, including any action requiring a
17 building permit by the city.

18 *Erosion* means the removal of mineral and/or organic matter by the action of wind, water,
19 and/or gravity.

20 *Excavate* means any act by which earth, sand, gravel, rock, or any other similar material is
21 dug into, cut, quarried, uncovered, removed, displaced, relocated, or bulldozed, and shall include the
22 conditions resulting therefrom.

23 *Fill* means any act by which earth, sand, or other material is placed or moved to a new
24 location above ground. The fill is also the difference in elevation between a point of existing
25 undisturbed ground and a designated point of higher elevation of the final grade.

26 *Land disturbing activity* means any physical land development activity which includes such
27 actions as clearance of vegetation, moving or filling of land, removal or excavation of soil or mineral
28 resources, or similar activities.

1 Runoff means the surface water discharge or rate of discharge of a given watershed after a fall
2 of rain or snow, including seepage flows that do not enter the soil but run off the surface of the land;
3 also, that portion of water that is not absorbed by the soil, but runs off the land surface.

4 Sediment means solid material, both mineral and/or organic, that is in suspension, is being
5 transported, or has been moved from its site of origin by wind, water and/or gravity as a product of
6 erosion.

7 Soil erosion and sediment control plan means the approved document required before any
8 person may cause a disturbance to the natural terrain within the city as herein regulated, also herein
9 referred to as the erosion and sediment control plan or approved plan.

10
11 **Sec. 68-2. Purpose.**

12 (a) Unmitigated storm water from areas altered by development may pose public health
13 and safety threats. Potential contaminants in storm water runoff may include
14 suspended solids, nitrogen, phosphorus, hydrocarbons, heavy metals, pathogenic
15 organisms (bacteria and viruses), and road salts.

16 (b) This ordinance establishes the administrative mechanisms necessary for the City to
17 ensure proper storm water management of runoff from new development and re-
18 development projects. The ordinance is written to work in conjunction with the
19 Rhode Island Department of Environmental Management's *General Permit Rhode*
20 *Island Pollutant Discharge Elimination System Storm Water Discharge from Small*
21 *Municipal Separate Storm Sewer Systems and from Industrial Activity at Eligible*
22 *Facilities Operated by Regulated Small MS4s.*

23
24 **Sec. 68-3. Applicability.**

25 This ordinance shall apply to all development and re-development occurring within the City. No
26 person shall engage in Development Projects without receiving approval from the Building Official,
27 unless specifically exempted by Sec. 68-4 of this ordinance.

28
29 **Sec. 68-4. Permit required; exceptions.**

30 It shall be unlawful for any person to disturb any existing vegetation, grades, and contours of land

1 without first applying for and receiving a permit from the Building Official.

2
3 The following Development Projects do not require written approval pursuant to this ordinance:

- 4 (a) Construction, alteration, or use of any additions or existing single-family or two-
5 family homes or related structures, when determined by the Building Official to be
6 insignificant, and such construction, alteration and use does not exceed one thousand
7 (1,000) square feet, does not occur within one hundred (100) feet of any watercourse
8 or coastal feature, and the slopes at the site of land disturbance do not exceed ten (10)
9 percent.
- 10 (b) Accepted agricultural management practices such as seasonal tilling and harvest
11 activities associated with property utilized for private or commercial agricultural or
12 silvicultural purposes.
- 13 (c) An excavation which exhibits all of the following characteristics:
- 14 (1) Is less than four (4) feet in vertical depth at its deepest point as measured
15 from the average elevation of the natural ground surface; and
- 16 (2) Does not result in a total displacement of more than fifty (50) cubic yards of
17 material on any lot, land, parcel or sub-division; and
- 18 (3) Has no slopes steeper than ten (10) feet vertical in one hundred (100) feet
19 horizontal ten (10) percent; and
- 20 (4) Has all disturbed surface areas promptly and effectively protected to prevent
21 soil erosion and sedimentation from occurring including seeding or sodding,
22 and provided that all disturbed surface areas which will be exposed for a
23 period of time in excess of thirty (30) days shall be covered with a suitable
24 temporary protective ground cover until permanent ground cover is in place.
- 25 (d) Grading, as a maintenance measure, or for landscaping purposes on existing
26 developed land parcels or lots, provided that all of the following conditions are met:
- 27 (1) The aggregate area of activity does not exceed one thousand (1,000) square
28 feet;
- 29 (2) The change of elevation does not exceed two (2) feet at any point;

1 (3) All bare surface area is promptly seeded, sodded, or otherwise effectively
2 protected from erosive actions; and

3 (4) The grading does not involve a quantity of fill greater than eighteen (18)
4 cubic yards; except where fill is excavated from another portion of the same
5 parcel and the quantity does not exceed fifty (50) cubic yards.

6 (e) Grading, filling, removal or excavation activities and operations undertaken by the
7 City under the direction and supervision of the Director of Public Works for work on
8 streets, roads or rights-of-way dedicated to public use; provided, however, that
9 adequate and acceptable erosion and sediment controls are incorporated in
10 engineering plans and specifications and employed. Appropriate controls shall apply
11 during construction as well as after the completion of such activities.

12 (f) Use of a home garden in association with residential use.

13
14 **Sec. 68-5. Plan approval procedure; appeals.**

15 (a) In accordance with this ordinance, all persons must obtain approval from the
16 Building Official prior to engaging in any land development activities, unless
17 exempted by Sec. 68-4 of this ordinance. To obtain approval applicants must
18 demonstrate compliance with all policy, standards and requirements of this ordinance
19 to the satisfaction of the Building Official. Applicants may demonstrate compliance
20 via submission of materials and documentation including but not limited to a Storm
21 Water Management Plan, site plan and maintenance agreement in accordance with
22 this ordinance. Plans will be reviewed in conjunction with site plan reviewed by the
23 Building Official in consideration with the Planning Director, Public Works Director,
24 Storm Water Manager, Fire Chief, Police Colonel or Warwick City Employee.

25 (b) Pre-application meetings may be requested by the applicant and held at the discretion
26 of the City for the purpose of informing the representatives of construction projects
27 of any local requirements and any additional limitations that may be imposed.

28 (c) Plan submission.

29 (1) To obtain approval for a permit under section 68-4, an applicant shall first file
30 an erosion and sediment control plan signed by the owner of the property, or

1 an authorized agent, on which the work subject to approval is to be
2 performed. The plan or drawings, as described in sections 68-7 and 68-8,
3 shall include proposed erosion and sediment control measures to be employed
4 by the applicant or his/her agent.

5 (2) Where any portion of a proposed development requires approval under the
6 state Freshwater Wetlands Act, G.L. 1956, § 2-1-15 et seq., as amended, and
7 where said approval contains provisions for soil erosion and sediment
8 controls, that approved plan shall be a component of the overall soil erosion
9 and sediment control plan required hereunder for the development.

10 (d) Fees. Where a building permit is required under the building code, the site plans shall
11 include all the requirements of this chapter and the building permit fee shall be based
12 on the entire cost of the building plus improvements required by this chapter.
13 Application of such fees shall apply to all land disturbing activities, for example,
14 subdivisions, except as provided for under section 68-4

15 (e) Plan review.

16 (1) Within five working days of the receipt of a completed plan, the building
17 official shall send a copy of the plan to the public works department, the
18 planning board or the planning department for the purpose of review and
19 comment. The Building Official may also within the above timeframe submit
20 copies of the plan to other local departments or agencies, including the
21 conservation district that services the county, in order to better achieve the
22 purposes of this chapter.

23 (2) The time allowed for plan review shall be commensurate with the proposed
24 development project, and the review shall be done simultaneously with other
25 reviews.

26 (f) Plan approval.

27 (1) The Building Official shall take action in writing either approving or
28 disapproving the plan, with reasons stated, within ten days after he/she has
29 received the written opinion of the public works director and the planning
30 director. Failure of the public works director or the planning director to

1 respond within 21 days of the receipt of the plan shall be deemed as no
2 objection to the plan as submitted.

3 (2) In approving a plan, the Building Official may attach such conditions deemed
4 reasonably necessary by the director of public works and the planning
5 director to further the purposes of this chapter. Such conditions pertaining to
6 erosion and sediment control measures and/or devices may include, but are
7 not limited to, the erection of walls, drains, dams and structures, planting
8 vegetation, trees and shrubs, furnishing necessary easements, and specifying a
9 method of performing various kinds of work, and the sequence or timing
10 thereof. The applicant/owner shall notify the Building Official in advance of
11 his/her intent to begin clearing and construction work described in the erosion
12 and sediment control plan. The applicant shall have the erosion and sediment
13 control plan on the site during grading and construction.

14 (g) Appeals.

15 (1) Administrative procedures.

16 a. If the ruling made by the Building Official is unsatisfactory to the
17 applicant/owner, the applicant/owner may file a written appeal. The
18 appeal of the plan for a building permit shall be to the building
19 appeals board. The appeal of a plan for a subdivision shall be as
20 provided for in G.L. 1956, § 45-23-14.

21 b. Appeal procedures shall follow current requirements for appeal to
22 either of the two boards above.

23 c. However, under any appeal proceeding, the Building Official shall
24 notify the conservation commission of the appeal and the time, date,
25 and place of the hearing. The conservation commission shall submit
26 written comments on the appeal, and such comments, together with
27 the written decision of the Building Official, shall be read into the
28 official record of the hearing.

29 d. During the period in which the request for appeal is filed, and until
30 such time as a final decision is rendered on the appeal, the decision of

1 the Building Official shall remain in effect.

- 2 (2) Expert opinion. The Building Official, the building appeals board, or the
3 planning board of review may seek technical assistance on any soil erosion
4 and sediment control plan. Such expert opinion must be made available in the
5 office of the Building Official as a public record prior to the appeals hearing.

6
7 **Sec. 68-6. Variance.**

8 The Building Official reviewing an application under this ordinance may:

- 9 (a) Vary requirements of this ordinance when strict implementation of the requirements
10 will create an unnecessary hardship or are not feasible.
11 (b) Allow use of an innovative management practice where strict adherence to existing
12 criteria would be costly or of negligible environmental benefit.
13 (c) Allow use of an innovative management practice where the innovative practice is
14 expected to have an environmental benefit, which cannot be practicably realized
15 using standardized management practices.

16
17 **Sec. 68-7. Plan contents.**

- 18 (a) The erosion and sediment control plan shall be prepared by a registered engineer or
19 land surveyor on standard 8½-inch by 11-inch, 11-inch by 17-inch, or 24-inch by 36-
20 inch sheets at a suggested scale of one inch equals 40 feet. A key sheet shall be
21 included if a plan consists of more than two sheets. The erosion and sediment control
22 plan shall include sufficient information about the proposed activities and land
23 parcel(s) to form a clear basis for discussion and review and to ensure compliance
24 with all applicable requirements of this chapter.
25 (b) A minimum of three copies, plus any additional copies that may be required by the
26 Building Official, shall be submitted.
27 (c) The following information may be drafted on the plans or may be included as
28 attachments, and shall consist of the following:

- 1 (1) Locus plan.
- 2 (2) The name and address of the owner of the site, and, if different, the applicant,
3 the designer, and the developer.
- 4 (3) The location, extent, and type of all proposed work to be performed,
5 including all existing and proposed buildings, structures, utilities, sewers,
6 water mains, and storm drains on the site.
- 7 (4) Topographic mapping with elevations keyed to the municipal base showing
8 existing contours at intervals of not more than two feet and contours at two-
9 foot intervals of the finished grade of all disturbed land area(s) at the
10 conclusion of the construction and/or land disturbing activities.
- 11 (5) A description of the general topographic and soil conditions at the project
12 site, including all significant limitations such as rock outcrops, existing
13 alterations to natural drainage, and any other site characteristics pertinent to
14 the work to be performed.
- 15 (6) The location and size of all parking and loading areas and driveways, both
16 public and private.
- 17 (7) The location of all existing and proposed buildings or structures, utilities,
18 including drainage facilities, and all significant natural features within 100
19 feet of the proposed work to be performed.
- 20 (8) The name, location, right-of-way width, and pavement width of all streets,
21 roads and highways within 100 feet of the site.
- 22 (9) The location and names, if applicable, of any streams, wetlands, water bodies,
23 drainage swales, watercourses, and areas subject to periodic flooding, both on
24 and within 100 feet of the site on which the work is to be performed. Included
25 shall be delineation of any areas designated as flood hazards by the Federal
26 Insurance Administration or other state or federal agencies.
- 27 (10) The names and addresses of all owners of abutting parcels and the location of
28 all adjoining lot boundaries according to the latest assessor's records.
- 29 (11) The approximate total quantity of earthwork involved in the proposed work,
30 with appropriate breakdown as to cut and fill.

- 1 (12) The location and extent of the removal of existing topsoil, trees, and other
2 vegetation; and the quantities and location of any material to be removed
3 from the site.
- 4 (13) The estimated time of exposure for all disturbed land area(s) on the site prior
5 to the completion of effective temporary and/or permanent erosion and
6 sediment control measures and facilities. This shall include planting and
7 seeding dates and application rates, and the phasing plan indicating the
8 anticipated starting and completion dates of all phases of proposed site work.
- 9 (14) Details of all proposed drainage provisions to be employed on the site,
10 including the location and type of all proposed erosion and sediment control
11 measures and stormwater runoff controls of both a permanent and temporary
12 nature and specifications for the maintenance of each.
- 13 (15) The type, location, and extent of all proposed temporary and permanent
14 vegetation and mulching that will be used to protect exposed areas of the
15 project site.
- 16 (16) Prompt submittal of such other information or construction plans and details
17 as deemed necessary by the building official or his/her designated agent for a
18 thorough review of the plan prior to action being taken as prescribed in this
19 chapter. Withholding or delay of such information may be reason for the
20 building official to judge the application as incomplete and grounds for
21 disapproval.

22

23 **Sec. 68-8. Technical Standards.**

24 All applicants are required to develop and submit a Storm Water Management Plan prepared by a
25 professional engineer licensed in the State of Rhode Island. All Storm Water Management Plans
26 must address storm water management on a site-by-site basis and all requirements of this ordinance.
27 All storm water management practices shall be consistent with the *Rhode Island Storm Water Design*
28 *and Installation Standards Manual* and the *Rhode Island Soil Erosion and Sediment Control*
29 *Handbook*, as amended.

- 1 (a) Performance Standards. Storm Water Management Plans shall incorporate structural
2 and non-structural Best Management Practices (BMPs) for water quality control, in
3 accordance with Rhode Island Storm Water Design and Installation Standards
4 Manual. Development in chinking water supply watersheds or watersheds where
5 impaired waters as defined by the State's 303(d) list exist may be held to higher
6 standards.
- 7 (b) Disallowed Storm Water Best Management Practices. The placement of storm water
8 structures within a flood plain shall be avoided. If there is no alternative, the
9 applicant must show what effects, if any, the tailwaters created by the flood plain will
10 have on the outflow and effective storage capacity of the storm water best
11 management practice.
- 12 (c) Facilitation of Maintenance. Facilities that require maintenance shall be designed to
13 minimize the need for regular maintenance, facilitate required maintenance, and
14 ensure accessibility of components that require maintenance. At a minimum, all
15 Storm Water Management Plans must incorporate BMPs with appropriate
16 maintenance design in accordance with the Rhode Island Storm Water Design and
17 Installation Standards Manual, as amended.
- 18 (1) Control and maintenance of post-development peak discharge rates from the
19 2-year, 10-year, 25-year, and 100-year storm events to pre-development
20 levels.
- 21 (2) Downstream analysis of the 100-year storm event and control of the peak
22 discharge rate for the 100-year storm to mitigate downstream impacts.
- 23 (3) Discharge from any storm water facility must be conveyed through properly
24 constructed conveyance system to provide for non-erosive flows during all
25 storm events. The proposed storm water conveyance system consisting of
26 open channels, pipes, and other conveyance devices shall at a minimum
27 accommodate the runoff from a 25-year storm event. The storm water
28 conveyance system must provide for non-erosive flows to receiving waters.
- 29 (d) Flood Protection. Storm Water Management Plans shall demonstrate that a proposed
30 project provides for protection of life and property from flooding and flood flows.

1 Water quantities must be controlled in accordance with the *Rhode Island Storm*
2 *Water Design and Installation Standards Manual*, as amended, or a municipally
3 approved regional Storm Water Management Plan for the watershed in which the
4 project site is located. Storm Water Management Plans shall demonstrate
5 incorporation of the following standards into the proposed project:

- 6 (e) *Surface Water and Groundwater*. Storm Water Management Plans shall, in
7 accordance with the *Rhode Island Storm Water Design and Installation Standards*
8 *Manual*, as amended, demonstrate that during development and post-development, all
9 receiving waters will be recharged in a manner closely resembling pre-development
10 conditions and that the developed site will retain hydrological conditions that closely
11 resemble of those prior to disturbance. The goal of the storm water design shall be
12 that hydrologic conditions in each sub-watershed match pre-development conditions.

13
14 Where practicable, development and re-development projects should aim to reduce
15 runoff volumes. This may include minimizing and eliminating impervious surface
16 areas such as roads, parking, paving or other surfaces, encouraging infiltration of a
17 non-contaminated runoff, preventing channelization, encouraging sheet flow, and
18 where appropriate, preserving, enhancing or establishing buffers along surface water
19 bodies and tributaries.

20
21 **Sec. 68-9. Storm Water Management Plans.**

- 22 (a) *Calculations*. In addition to the information required for the site plan the following
23 information must also be included with the application, where applicable.
- 24 (1) The area of each sub-watershed shall be identified on final site plans.
 - 25 (2) The area of impervious surfaces (including all roads, driveways, rooftops,
26 sidewalks, etc.) for each sub-basin as identified in the Rhode Island Storm
27 Water Design and Installation Standards Manual, as amended.
 - 28 (3) Weighted curve numbers as determined using Urban Hydrology for Small
29 Watersheds (USDA Soil Conservation Service, 1986 or as amended).

- 1 (4) Invert elevations for inlets and outlets. In addition, invert elevations shall be
2 provided for all basins including permanent and/or flood pool stages,
3 including peak discharge rates for each stage.
- 4 (5) The total volume capacity for all flood control and water quality BMPs (e.g.,
5 infiltration basin, detention basins, wet ponds, etc.). Volumes must be
6 segregated into permanent arid flood pool stage volumes where applicable.
7 Furthermore, the volumes of all sediment storage (basins, forebays, etc.) areas
8 must also be provided.
- 9 (6) Pre-development and post-development peak discharge rates and runoff
10 volumes for the 2-year, 10-year, 25-year, and 100-year frequency storm
11 events for each sub-watershed to each separate water or discharge point. The
12 water quality volume must also be calculated for each sub-watershed. All
13 relevant variables such as curve numbers and time of concentration, along
14 with the supporting computations and worksheets must be included. The
15 entire site shall be included in an evaluated sub-watershed.
- 16 (7) Supporting calculations to demonstrate that the proposed Development
17 Project will meet Sec. 69-6 of this ordinance.
- 18 (b) *Narrative Description.* As part of the Storm Water Management Plan, the applicant
19 shall include a discussion of the protection of environmental resource functions and
20 values. The following outline is provided as guidance for preparing a narrative
21 description for the Storm Water Management Plan. Depending on the size and scope
22 of the proposed project, the amount of information required by the City may vary;
23 therefore, it is advised to consult the City for specific requirements.
- 24
- 25 (1) Site description - general topography, soil types, current vegetative
26 composition and relative abundance, existing infrastructure, and/or adjacent
27 properties, identification of major resources (e.g., wetlands, groundwater,
28 surface waters, etc.), name of receiving water(s), potential water quality
29 and/or hydrologic impacts on resources.

- 1 (2) Site input data - watershed characteristics, area of all impervious surfaces,
2 total area of site, annual mean rainfall, runoff coefficients, curve numbers for
3 various land uses, peak discharge rates.
- 4 (3) Land use planning and source control plan.
- 5 (4) Best management practices - identify the type of BMP(s) employed both
6 during and post-construction and justification for selection, including any
7 deviation from the Rhode Island Storm Water Design and Installation
8 Standards Manual, as amended, and the potential effect on pollutant removal
9 efficiency.
- 10 (5) Technical feasibility - include sizing, location, hydraulic and environmental
11 impacts. Alternatives, which were considered but determined not to be
12 feasible, should also be discussed.
- 13 (6) Maintenance schedule - of BMPs to be used, both during and post-
14 construction including frequency of inspection and maintenance.

15 **Sec. 68-9. Performance bond.**

16 (a) Generally.

- 17 (1) Before approving an erosion and sediment control plan, the Building Official
18 may require the applicant/owner to file a surety company performance bond
19 or deposit of money or negotiable securities. When any land disturbing
20 activity is to take place within 100 feet of any watercourse or within an
21 identified flood hazard district, or on slopes in excess of ten percent, the
22 filing of a performance bond shall be required. The amount of such bond, as
23 determined by the public works department, shall be sufficient to cover the
24 cost of implementing all erosion and sediment control measures as shown on
25 the plan.
- 26 (2) The bond or negotiable security filed by the applicant shall be subject to
27 approval of the form, content, amount and manner of execution by the public
28 works director and the city solicitor.
- 29 (3) A performance bond for an erosion and sediment control plan for a
30 subdivision may be included in the performance bond of the subdivision. The

1 posting of such bond as part of the subdivision performance bond does not,
2 however, relieve the owner of any requirement(s) of this chapter.

3 (b) Notice of default on performance secured by bond.

4 (1) Whenever the building official shall find that a default has occurred in the
5 performance of any term(s) or condition(s) of the bond or in the
6 implementation of measures secured by the bond, written notice thereof shall
7 be made to the applicant and to the surety of the bond by the municipal
8 solicitor. Such notice shall state the nature of default, the work to be done, the
9 estimated cost thereof, and the period of time deemed by the Building
10 Official to be reasonably necessary for the completion of such work.

11 (2) Failure of the applicant to acknowledge and comply with the provisions and
12 deadlines outlined in such notice of default shall mean the institution, by the
13 city solicitor, without further notice of proceedings whatsoever, of
14 appropriate measures to utilize the performance bond to cause the required
15 work to be completed by the city, by contract or by other appropriate means
16 as determined by the city solicitor.

17 (c) Notice of default on performance secured by cash or negotiable securities deposit. If a
18 cash or negotiable securities deposit has been posted by the applicant, the notice and
19 procedure shall be the same as provided for in subsection (b) of this section.

20 (d) Release from conditions. The performance bonding requirement shall remain in full
21 force and effect until satisfactory completion of the work.

22
23 **Sec. 68-10. Inspections for Storm Water Best Management Practices.**

24 The City shall have the right to inspect best management practices constructed after the passage of
25 this ordinance. Inspections shall address whether best management practices have been installed in
26 accordance with approved storm water management plans.

27
28 **Sec. 68-11. Operation and Maintenance Requirements for Best Management Practices.**

29 (a) Routine Operation and Maintenance and Repair Procedures. Routine maintenance
30 shall be performed on a regular basis to ensure proper performance and may include

1 such routine procedures as training of staff, periodic inspections, grass cutting
2 elimination of mosquito breeding habitats, and pond maintenance in accordance with
3 a storm water management plan approved pursuant to this ordinance. Repair
4 procedures may be required to correct a problem or malfunction of a storm water
5 management practice and to restore the management practice's intended operation
6 and safe condition. Repairs may include such procedures as structural repairs,
7 removal of debris, sediment and trash removal, erosion repair, snow and ice removal,
8 fence repair, mosquito extermination, and restoration of vegetated and non-vegetated
9 linings.

10 (b) General Operation and Maintenance Standards for Storm Water Best Management
11 Practices. Maintenance design and maintenance procedures for all storm water
12 management practices shall be documented in Storm Water Management Plans in
13 accordance with Rhode Island Storm Water Design and Installation Standards
14 Manual, as amended; or Manufacturer's specifications. A maintenance schedule for
15 each type of BMP must be included in the Storm Water Management Plan. These
16 schedules shall list the frequency and type of maintenance operations necessary along
17 with the legally responsible party's name, address, and telephone number. The owner,
18 as well as all future owners, shall be required to implement the maintenance schedule
19 of the best management practices. If the storm water facility is to be deeded to the
20 City, the applicant must obtain a letter from the City acknowledging maintenance
21 responsibility and intent of ownership.

22
23 **Sec. 68-12. Maintenance Agreements.**

24 (a) Maintenance agreements shall provide written, contractual documentation, which
25 demonstrate compliance with this ordinance and legal arrangements for the upkeep of
26 storm water facilities to assure their proper function and safety in accordance with
27 this ordinance.

28 (b) After final construction is completed, the owner or responsible person shall maintain
29 "as built" plans of storm water management practices located on site. The plans must

1 show the final design specifications for all storm water management facilities and
2 must be certified by a professional engineer.

3 (c) Maintenance agreements, which describe maintenance schedules and requirements,
4 must be developed for each storm water management facility unless the facility is
5 dedicated to and accepted by the City. Schedules shall be based on the complexity
6 and frequency of maintenance needs and shall be subject to the approval of the City.
7 At a minimum, maintenance frequency should be in accordance with the Rhode
8 Island Storm Water Design and Installation Standards Manual, as amended.

9 (d) Right of Entry. Upon the presentation of credentials and other documents, as may be
10 required by law, or if authorized by the owner or other party in control of the
11 property, the Director of Public Works, Building Inspector, and other City
12 representatives designated by the Building Inspector or Director of Public Works may
13 enter upon privately owned property for the purpose of performing their duties under
14 this ordinance and may make or cause to be made such inspections as the City deems
15 reasonably necessary.

16 (e) Record Keeping for Maintenance Activities. Maintenance agreements shall include
17 provisions for maintenance record keeping. All activities conducted in accordance
18 with a maintenance agreement must be recorded in a work order and inspection log.
19 Timely updates of the log shall be the responsibility of the storm water management
20 facility owner or other responsible party pursuant to this ordinance. Review of the
21 maintenance and inspection log shall be completed by the City to determine the
22 effectiveness of operation, maintenance and safety activities. Reviews shall occur as
23 part of each on-site inspection. Additional reviews may be made as deemed
24 appropriate by the City.

25 (f) Responsibility for Maintenance to Assure Function and Safety. Appropriate
26 maintenance to assure function and safety of storm water management facilities shall
27 be the responsibility of the owner or may be assumed by another party via a written
28 contractual arrangement in accordance with this ordinance.

29 (g) Alterations to Maintenance Agreements. Any alterations in maintenance
30 responsibility or alterations to maintenance agreements must be reviewed and

1 approved by the Building Official or designee. If portions of the land serviced by a
2 storm water management facility are to be sold, written contractual arrangements
3 shall be made to pass all responsibility of the maintenance agreement to the purchaser
4 and shall be subject to review and approval of the Department of Public Works and
5 the Storm Water Manager or City of Warwick Employee. All alterations to
6 maintenance agreements shall be made and recorded in accordance with this
7 ordinance.

8 (h) Recordation of Maintenance Agreements. All maintenance agreements and
9 alterations to maintenance agreements shall be recorded in the land evidence records
10 of the City. Copies of all maintenance agreements and alterations to maintenance
11 agreements shall be included in Storm Water Management Plans. Recordation of
12 maintenance agreements in accordance with this ordinance shall be the responsibility
13 of the owner.

14
15 **Sec. 68-13. Authorized Enforcement Agent.**

16 For purposes of this ordinance, the Authorized Enforcement Agent means the City Building Official
17 or designee.

18
19 **Sec. 68-14. Notification of Non-Compliance; correction of violations**

20 If, at any stage, the work in progress and/or completed under the terms of an approved erosion and
21 sediment control plan does not conform to such plan, a written notice from the building official to
22 comply shall be transmitted to the owner. Such notice shall set forth the nature of corrections
23 required and the time limit within which corrections shall be completed. Failure to comply with the
24 required corrections within the specified time limit shall be considered in violation of this chapter,
25 in which case the performance bond or cash or negotiable securities deposit shall be subject to
26 notice of default, in accordance with sections 68-9 (b) and (c).

27
28 **Sec. 68-15. Appeal of Notice of Non-Compliance.**

29 Any person receiving notice of non-compliance may appeal the determination of the Authorized
30 Enforcement Agent. The appeal must be received within thirty (30) days from the date of the receipt

1 of the notice of non-compliance. The appeal shall be in writing and contain a detailed basis upon
2 which the appeal was taken. The Authorized Enforcement Agent shall then determine whether to
3 grant the appeal within ten (10) business days or issue a notice of violation and summons to the
4 appellant to appear in municipal court.

5
6 Any person who shall violate any provision of this article shall be punished by a fine not to exceed
7 two hundred and fifty (\$250) dollars per day for each day the violation remains unabated. In
8 addition, the Authorized Enforcement Agent may, at the discretion of the municipal court, may
9 undertake measures necessary to abate the violation and restore the property at the Owner or
10 Operator's expense.

11
12 **Sec. 68-16. Penalties.**

13 (a) Revocation or suspension of approval. The approval of an erosion and sediment
14 control plan under this chapter may be revoked or suspended and work initiated
15 under the plan halted for an indefinite time period by the building official or his/her
16 authorized agent, after written notification is transmitted to the developer, for one or
17 more of the following reasons:

- 18 (1) Violation of any condition of the approved plan, or conditions or
19 specifications pertaining thereto;
- 20 (2) Violation of any provision of this chapter or any other applicable law,
21 ordinance, rule or regulation related to the work or site of the work; and
- 22 (3) The existence of any condition or the performance of any act constituting or
23 creating a nuisance, hazard, or endangerment of human life or the property of
24 others, or contrary to the spirit or intent of this chapter.

25 (b) Other penalties; correction of violations by city. In addition thereto, whenever there
26 is a failure to comply with the provisions of this chapter, the city shall have the right
27 to notify the applicant/owner that he/she has five days from the receipt of notice to
28 temporarily correct the violations and 30 days from receipt of notice to permanently
29 correct the violations. Should the applicant/owner fail to take the temporary
30 corrective measures within the five-day period and the permanent corrective

1 measures within the 30-day period, the city shall then have the right to take whatever
2 actions it deems necessary to correct the violations and to assert a lien on the subject
3 property in an amount equal to the costs of remedial actions. The imposition of any
4 penalty shall not exempt the offender from compliance with the provisions of this
5 chapter, including revocation of the performance bond or assessment of a lien on the
6 property by the city.

7 **Sec. 68-17. Remedies Not Exclusive.**

8 The remedies listed in this ordinance are not exclusive of any other remedies available under any
9 applicable federal, state or local law and it is within the discretion of the Authorized Enforcement
10 Agent to seek cumulative remedies.

11
12 **Sec. 68-18 – 24 Reserved.**