Permeable Pavement Design Review Check List

April 2015

Applicant: ____________________________________ Date: _________________________________

Submitted By: ________________________________ Project Location: _______________________

1) Drainage Area (DA) shedding to Permeable Pavement _____________SF and ____________Ac

2) Percent of DA shedding to the Permeable Pavement that is Impervious _______% (if soil quality
   restoration is done or if soils investigations indicate green space is capable of absorbing the WQv the
   green space can be eliminated from the DA for WQv calculation. If neither applies, assume ½ of the
   green space is equivalent to impervious surface.)

3) WQv __________________CF (show calculations below or attach)
   
   WQv = (Rv) x (P) x (DA) x 43,560 SF/ac x (1 ft/12in)

4) Surface Area of Permeable Pavement ____________________SF

5) Describe the type of pavement (i.e. type of paver, manufacturer, etc)
   ____________________________________________________________________________________
   ____________________________________________________________________________________
   ___________________________________________________________

6) Pore space storage of rock base ________________ CF (Length ____ft x width _____ ft x depth _____
   ft of rock base x 40%).

7) Discuss soils investigation findings (i.e. texture, degree of compaction, percolation potentials, depth to
   water table, contamination etc)
   ____________________________________________________________________________________
   ____________________________________________________________________________________
   ____________________________________________________________________________________

8) Describe the aggregate used (depth of layer / quantities / size / AASHTO or ASTM No. classification);
   a.  ____________________________________________________________________________________
   b.  ____________________________________________________________________________________
   c.  ____________________________________________________________________________________

9) Provide calculations of aggregate quantities or attach a copy of the calculations:

10) If permeable pavement is less than 10 ft from a foundation describe water proofing methods:
    ____________________________________________________________________________________
    ____________________________________________________________________________________
    ____________________________________________________________________________________

11) What is the maximum slope of the finished surface of the permeable pavement_____%?

12) What is the slope of the bottom of the rock base _______%
13) If the bottom of the rock base is greater than 0.5% slope describe how slope at the bottom of the rock base will be modified to maximize storage (i.e. installation of sheet piling to stair step the rock base down gradient).

____________________________________________________________________________________
____________________________________________________________________________________
___________________________________________________________________________________

14) Size of perforated drain tile _____________ inch

15) Depth of tile from surface of the pavement _________ inches

16) How many inches is the tile above the bottom of the rock base _____________ inches

17) Describe the outlet for the perforated drain tile _______________________________________

____________________________________________________________________________________
___________________________________________________________________________________

18) If fabric is used, describe the material and flow through rate

____________________________________________________________________________________
___________________________________________________________________________________

19) Describe overflow (i.e. what provisions are provided should the system plug – where would water flow, how would it be conveyed) _____________________________________________

____________________________________________________________________________________
___________________________________________________________________________________

20) Describe Erosion and Sediment Control measures used to protect permeable pavement if active construction will be taking place in the drainage area after installation:

____________________________________________________________________________________
___________________________________________________________________________________
___________________________________________________________________________________

21) Please attach a map of the drainage area.

22) Please attach a plan view, profile and cross sectional drawing

FOR REVIEWER USE ONLY

☐ Design appears to comply with the standards in the Iowa Stormwater Management Manual.

☐ Design does not appear to comply with the standards in the Iowa Stormwater Management Manual.

Comments: ____________________________________________

____________________________________________________________________________________
___________________________________________________________________________________
___________________________________________________________________________________

Name of Reviewer: ________________________________ Date: ____________________________

Signature: ______________________________________

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