ITEM # <u>34</u> DATE: 11-12-13

COUNCIL ACTION FORM

SUBJECT: POST CONSTRUCTION STORMWATER MANAGEMENT ORDINANCE

BACKGROUND:

In order to increase stormwater run-off quality, decrease stormwater run-off and minimize soil erosion, a new post construction stormwater management ordinance has been prepared. This ordinance will also help the City be in compliance with both federal and state environmental laws, which require the City to implement progressive stormwater management policies.

The City of Ames' Municipal Separate Storm Sewer Permit (MS4) (Permit No. 85-03-0-03), issued by the Iowa Department of Natural Resources (DNR), states that the City must adopt and enforce a stormwater management ordinance that addresses both water quality and water quantity components. This new ordinance is to be considered in the design of new construction and implemented when practical. The ordinance must promote the use of storm water detention, retention, grass swales, bio-retention swales, and riparian buffers, along with proper operation and maintenance of these facilities.

In order to meet this permit requirement, Public Works staff has been working for several years to establish a draft ordinance that meets these requirements while also aligning with flood mitigation efforts within the community. Near the conclusion of this process, in September City staff hosted three public meetings where citizens and business owners could learn about and comment on the proposed ordinance. Fourteen people attended these meetings. As a result of comments during these public meetings and input from the current Storm Water Advisory Committee, a final proposed ordinance has been developed.

In summary, the ordinance would adopt the Iowa Stormwater Management Manual that was created by the Statewide Urban Design and Specifications (SUDAS). That manual has now been published by the DNR. This manual is being maintained by the Iowa Storm Water Education Program (of which the City is a member), and will be adopted along with any locally adopted modifications. The ordinance is written to apply to development within the City limits and within the 2-mile limit where the City has exercised subdivision authority into the fringe area. Activities exempt from the ordinance would include agricultural activity and additions/modifications to existing single family properties.

Purposes and highlights of the ordinance include the following:

- Minimize increases in stormwater runoff from development in order to reduce flooding, siltation, increases in stream temperature, and stream bank erosion in order to maintain the integrity of stream channels.
- Minimize mass grading of sites to preserve natural features and drainage ways.
- Minimize increases in non-point source pollution caused by runoff.
- Encourage infiltration and soil storage of runoff through such practices as bioswales, bio-retention areas, rain gardens, and native vegetation.
- Mitigate stormwater runoff rates and volumes.
- Establish stream buffers.
- Establish and periodically update Maintenance, Repair, and Landscaping Plans.
- Build lowest opening of buildings impacted by stormwater practices at a minimum of 3 feet above the 100 year water surface elevation. (This is intended to address localized flooding issues such as those experienced in 2010 in the Northridge Parkway Subdivision.)
- Include waiver provisions that enable staff to work with developers to assure that these objectives are established to the maximum extent practicable.
- Provide for performance security and maintenance bonds for all stormwater features to ensure correct build-out and functionality for a minimum of four years.
- Establish a new form of maintenance agreement that obligates the developer/owner rather than the City to properly maintain all stormwater features.

The draft ordinance is attached. Unless Council has additional concerns or questions, this ordinance can be placed on the November 26 City Council agenda for additional public input and for approval on first reading.

ALTERNATIVES:

- 1. Place the proposed Post Construction Stormwater Management Ordinance on the November 26 City Council agenda for consideration on first reading.
- 2. Direct staff to make specific modifications to the proposed ordinance.

MANAGER'S RECOMMENDED ACTION:

Staff has spent several years developing this ordinance, which is required by both federal and state law. Input has been received from stormwater management experts, as well as from developers and civil engineers that will be impacted by the new requirements.

Therefore, it is the recommendation of the City Manager that the City Council adopt Alternative No. 1, thereby placing this ordinance on the Council's November 26 agenda.

CHAPTER 5B 11/08/13

POST CONSTRUCTION STORMWATER MANAGEMENT ORDINANCE

Sec 5B.1. GENERAL PROVISIONS

- (1) The U.S. Environmental Protection Agency's National Pollutant Discharge Elimination System (NPDES) permit program (Program) administered by the Iowa Department of Natural Resources (IDNR) requires that cities meeting certain demographic and environmental impact criteria obtain from the IDNR an NPDES permit for the discharge of stormwater from a Municipal Separate Storm Sewer System (MS4) (the MS4 Permit). The City of Ames (City) is subject to the Program and is required to obtain, and has obtained, an MS4 Permit. The City's MS4 Permit is on file at the office of the City Clerk and is available for public inspection during regular office hours.
- (2) As a condition of the City's MS4 Permit, the City is obliged to develop, implement and enforce a program to address stormwater runoff from new construction and reconstruction projects for which stormwater permit coverage is required.
- (3) No state or federal funds have been made available to assist the City with inspections, monitoring and/or enforcing the Program. Accordingly, the City shall fund its inspection, monitoring and enforcement responsibilities entirely by fees imposed on the owners of properties which are made subject to the Program by virtue of state and federal law, and/or other sources of funding established by a separate ordinance.
- (4) Land development and associated increases in impervious cover alter the hydrologic response of local watersheds and increase stormwater runoff rates and volumes, flooding, stream channel erosion, and sediment transport and deposition if left uncontrolled; this uncontrolled stormwater runoff contributes to increased quantities of water-borne pollutants, and; stormwater runoff, soil erosion and nonpoint source pollution can be controlled and minimized through the regulation of stormwater runoff from development sites.
- (5) Therefore, City establishes this set of City stormwater standards applicable to all surface waters to provide reasonable guidance for the regulation of stormwater runoff for the purpose of protecting local water resources from degradation. It is determined that the regulation of stormwater runoff discharges from land development and other construction activities shall not result in increases in stormwater runoff rates and volumes, soil erosion, stream channel erosion, and non-point source pollution associated with stormwater runoff, is in the public interest and will prevent threats to public health and safety.
- (6) The Iowa Stormwater Management Manual published by the Iowa Department of Natural Resources and maintained by the Iowa Storm Water Education Program establishes guidelines consisting of unified sizing criteria (water quality volume, channel protection storage volume, overbank flood protection, extreme flood protection) stormwater management designs, specifications, and best management practices (BMPs). City hereby finds and declares that the guidelines provided in the Iowa Stormwater Management Manual, and in future editions thereof, along with any locally adopted modifications, are hereby adopted as the stormwater management standards of City. Any BMP installation that complies with the provisions of the Iowa Stormwater Management Manual, or future editions thereof, along with any locally adopted modifications, at the time of installation shall be deemed to have been installed in accordance with this ordinance.

- (7) The purpose of this ordinance is to adopt as City's standards the guidelines established in the Iowa Stormwater Management Manual (hereinafter collectively City's stormwater requirements or standards) in order to protect and safeguard the general health, safety, and welfare of the public within this jurisdiction. This ordinance seeks to meet that purpose through the following objectives:
- (a) Minimize increases in stormwater runoff from development within the city limits and within 2 mile limit where the City has exercised subdivision authority fringe area in order to reduce flooding, siltation, increases in stream temperature, and stream bank erosion in order to maintain the integrity of stream channels;
- (b) Minimize mass grading of sites to preserve natural features and drainageways as well as protection of open space and impervious cover minimization;
- (c) Minimize increases in non-point source pollution caused by stormwater runoff from development which would otherwise degrade local water quality;
- (d) Distribute and minimize runoff by utilizing vegetated areas for stormwater treatment (e.g. parking lot islands, vegetated areas along property boundaries, front and rear yards, building landscaping. Encourage infiltration and soil storage of runoff through such practices as bioswales, soil quality improvement with compaction reduction and compost amendments, bioretention cells and rain gardens. Plant vegetation that does not require irrigation beyond natural rainfall and runoff from the site;
- (e) Mitigate stormwater runoff rates and volumes, soil erosion and non-point source pollution, wherever possible, through establishment of appropriate minimum stormwater management standards and BMPs and to ensure that BMPs are properly maintained and pose no threat to public safety.
- (8) This ordinance shall be applicable to all development and redevelopment applications meeting the minimum square foot applicability criteria of 5B.1.(8)(a), unless eligible for an exemption or granted a waiver by City under Section 5B.4 of this ordinance. The ordinance also applies to land disturbance activities that are smaller than the minimum square foot applicability criteria specified in 5B.1.(8)(a) if such activities are part of a larger common plan of development or redevelopment that meets the minimum square foot applicability criteria of 5B.1.(8)(a), even though multiple separate and distinct land development activities may take place at different times on different schedules:
- (a) City stormwater requirements must be met for development or redevelopment to be approved. City stormwater requirements apply to any new development, redevelopment disturbing 1 acre or more of land, and to any development disturbing less than said acreage of land if the amount of impervious cover created exceeds 10,000 square feet. New development includes any new residential, commercial, or industrial subdivision or individual site improvement requiring a site plan. The following activities are exempt from this ordinance:
 - (i) Any agricultural activity.
 - (ii) Additions or modifications to an existing single family property.
 - (9) Compatibility with Other Permit and Ordinance Requirements is as follows:
- (a) It is intended that this ordinance be construed to be consistent with Municipal Code Chapter 5A Construction Site Erosion and Sediment Control, Chapter 23 Subdivisions, Chapter 28 Utilities, and Chapter 29 Zoning.

(b) The requirements of this ordinance should be considered minimum requirements, and where any provision of this ordinance imposes restrictions different from those imposed by any other ordinance, rule or regulation, or other provision of law, whichever provisions are more restrictive or impose higher protective standards for human health or the environment shall be considered to take precedence.

Sec 5B.2. DEFINITIONS

- (1) Terms related to stormwater management in this ordinance other than those defined below shall have the meanings set out in the Iowa Storm Water Management Manual.
- "Applicant" means a property owner or agent of a property owner who has filed an application for a storm water management permit.
- "Best Management Practice (BMP)" means a practice or series of practices used to manage stormwater and as further defined in the Iowa Stormwater Management Manual.
- "Building" means any structure, either temporary or permanent, having walls and a roof, designed for the shelter of any person, animal, or property, and occupying more than 150 square feet of area.
- "Channel Protection Storage Volume" means providing for practices that will allow for extended detention of the runoff generated by a 1-year, 24-hour event. This means capturing the runoff volume from a storm of this nature, and slowly releasing it over a period of no less than 24-hours to reduce the rapid "bounce" effect common in many urban streams that leads to downcutting and streambank erosion.
- "City Stormwater Requirements" or "standards" mean the guidelines provided for in this ordinance and the Iowa Stormwater Management Manual.
- "COSESCO" means Construction Site Erosion and Sediment Control Ordinance permit issued by the City of Ames Public Works Department.
- "Dedication" means the deliberate appropriation of property by its owner for general public use.
- "Developer" means a person or entity that undertakes land development activities.
- "**Development**" means land disturbance activity of one acre (43,560 square feet) or more on land previously vacant of buildings or largely free of previous land disturbance activity other than agriculture.
- "Drainage Easement" means a legal right granted by a landowner to a grantee allowing the use of private land for stormwater management purposes.
- "Enforcement Officer" means that person or persons designated by the City having responsibility for administration and enforcement of this ordinance.
- "Extreme Flood Protection" means managing the effects of larger storm events (10-year to 100-year recurrence intervals) on the stormwater management system, adjacent property, and downstream facilities and property. The impacts of these extreme events is accomplished using detention controls and/or floodplain management.
- "Fee in Lieu" means a payment of money in place of achieving or exceeding all or part of City stormwater requirements.
- "Impervious Surface" means surfaces (roads, sidewalks, driveways and parking lots) that are covered by impenetrable materials such as asphalt, concrete, brick, and stone, rooftops as well as soils compacted by urban development.

- "Iowa Stormwater Management Manual (ISWMM)" means the manual collaboratively developed by the Iowa Department of Natural Resources (IDNR) and the Center for Transportation Research and Education (CTRE) at Iowa State University and updated by the Iowa Storm Water Education Program that contains the sizing criteria, design and specification guidelines and BMPs that address stormwater quality and quantity management.
- "Land Disturbance Activity" means any grading, digging, cutting, scraping, or excavating of soil, placement of fill materials, paving, construction, substantial removal of vegetation, or any activity which bares soil or rock or involves the diversion or piping of any natural or man-made watercourse.
- **"Low Impact Development"** means an approach to stormwater management that attempts to mimic pre-development conditions by compensating for losses of rainfall abstraction through infiltration, evapotranspiration, surface storage, and increased travel time to reduce excess runoff.
- "Landowner" means the legal or beneficial owner of land, including those holding the right to purchase or lease the land, or any other person holding proprietary rights to the land.
- "Maintenance Agreement" means a legally recorded document that acts as a property deed restriction, and which provides for long-term maintenance of storm water BMPs.
- "Overbank Flood Protection" means providing on-site stormwater detention to limit runoff peak flow rates from the 5-year recurrence interval storm event to prevent downstream surcharge of conveyance systems and reduce overbank flooding. At the site development level, this can be accomplished by providing detention practices with multi-stage outlets that control the outflow from these events to pre-settlement conditions (meadow in good condition).
- "Pre-Settlement Land and Vegetation Conditions" means for intended stormwater design calculations, meadow in good condition.
- "Redevelopment" means land disturbance activity in areas where existing land use is commercial, industrial, institutional or multi-family residential.
- "Stormwater Management" means the use of BMPs that are designed in accordance with City stormwater requirements to reduce stormwater runoff pollutant loads, discharge volumes, peak flow discharge rates and detrimental changes in stream temperature that affect water quality and habitat.
- "Stormwater Management Plan" means a plan that addresses post construction stormwater management addressing water quality and quantity.
- "Storm Water Pollution Prevention Plan" (SWPPP) means a plan that is designed to minimize the accelerated erosion and sediment runoff at a site during construction activities and includes provisions for additional pollution prevention and addresses stormwater quality and quantity management after construction.
- "Stream" means perennial and intermittent water sources identified through site inspection, and/or an approved city of Ames map, and/or United States Geological Survey (USGS) 7.5 minute series topographical map.
- "Stream Buffer" means a vegetated strip of land which lies adjacent to a stream and provides such functions as protecting water quality, providing wildlife habitat and storing flood waters.
- "Stream Order" means a classification rank, used by the United States Geological Survey and other hydrological entities, of the relative sizes of streams draining a watershed based on

the nature of their tributaries. The smallest unbranched tributary is first order, the stream receiving the tributary is second order etc.

"Unified Sizing Criteria" means an integrated approach to managing stormwater runoff quality and quantity by addressing the adverse impacts of stormwater runoff from development. The intent is to comprehensively manage stormwater to remove pollutants and improve water quality, prevent downstream streambank and channel erosion, reduce downstream overbank flooding and safely convey and reduce runoff from extreme storm events.

"Water Quality Volume" means the runoff resulting from a rainfall depth of 1.25", or less which is approximately 90% of the rainfall events in Central Iowa. By managing these storms many of the "first flush" pollutants of concern will be effectively managed on-site.

Sec 5B.3. PROCEDURES AND REQUIREMENTS

- (1) No land owner or developer shall receive any of the building or other site development approvals without first meeting the requirements of this ordinance.
- (2) Unless otherwise exempted by this ordinance, the Stormwater Management Plan and maintenance agreement must be included with the site plan or subdivision preliminary plat and include the COSESCO permit application or approved COSESCO permit.
- (3) The stormwater management plan and maintenance agreement shall be prepared to meet the requirements of Section 5B.3(7) of this ordinance, and fees shall be those established by the City as necessary by separate ordinance or resolution.
- (4) Following submission and approval of Stormwater Management Plans to the City, all applicable state and federal environmental permits shall be obtained prior to issuance of local permits including floodplain permits.
- (5) If the stormwater management plan and maintenance agreement are approved by the City, all appropriate local land development activity permits may be issued.
- (6) Approvals issued in connection with this ordinance shall be valid from the date of issuance through the date City notifies the permit holder that all stormwater management BMPs have passed the final inspection required and the performance security has been released.
- (7) The stormwater management plan and maintenance agreement shall be prepared to meet the following requirements:
- (a) Be prepared by a Licensed Professional Engineer (PE) or Professional Landscape Architect or credentialed in a manner acceptable to the City; and
- (b) Indicate whether stormwater will be managed on-site or off-site and, if on-site, the general location and type of BMPs, with clear citations to the Iowa Storm Water Management Manual; and
- (c) Include a signed and dated certification, under penalty of perjury by the preparer, of the stormwater management plan that it complies with all requirements of this ordinance and applicable sections of the Iowa Stormwater Management Manual, meets the submittal requirements outlined in the Iowa Stormwater Management Manual, and is designed to achieve City stormwater requirements.
- (d) Contact Information, including but not limited to the name, address, and telephone number of all persons having a legal interest in the property and the tax reference number and parcel number of the property or properties affected.

- (e) Topographic Base Watershed Map, at a scale no greater than 1" = 100' which extends a minimum of 200' beyond the limits of the proposed development and indicates existing surface water drainage including streams, ponds, culverts, field tiles, ditches, and wetlands; current land use including all existing structures; locations of utilities, roads, and easements; and significant natural and manmade features not otherwise shown. A minimum of 2' contours shall be shown on-site and 2' contours outside of the proposed property.
- (f) A written or graphic inventory of the natural resources at the site and immediate area as it exists prior to the commencement of the project and a description of the watershed and its relation to the project site. This description should include a discussion of existing predevelopment soil conditions such as hydric soils and areas for infiltration-based BMPs, vegetative and forest cover, topography, wetlands, and other native vegetative areas on the site. Particular attention should be paid to environmentally sensitive resources that provide particular opportunities or constraints for development.
- (g) Use hydrologic and hydraulic design calculations for the predevelopment and post-development conditions for the design storms specified in the Iowa Stormwater Management Manual. Low Impact Development hydrology should be applied where appropriate and as approved by the City Municipal Engineer. Provide information in accordance with Section 2A-5 Project Drainage Report using the methodologies referenced in Sections 2B and 2C in the Iowa Stormwater Management Manual.
- (h) Minimize the volume of surface water runoff which flows from any specific development project site after completion to not exceed the pre-development hydrologic regime of meadow in good condition.
- (i) If mass grading is used, flows shall not exceed the predevelopment hydrologic requirements of meadow in good condition. Classification of the altered soils shall be taken into consideration throughout the design.
 - (j) Utilize Low Impact Development features such as (but not limited to):
 - (i) Open space protection and restoration through conservation of existing natural areas, reforestation, re-establishment of prairies and wetlands, and re-establishment of native vegetation into the landscape including native turf.
 - (ii) Minimizing impervious cover.
 - (iii) Capture, store and reuse runoff for irrigation in areas where irrigation is necessary.
- (k) A technical assessment of soils shall be provided that identifies the soil series and the site limitations based on soils data provided in the Web Story County Soil Survey hosted by Natural Resources Conservation Service (NRCS). Soil borings shall be included when necessary to confirm suitable site conditions for placement of buildings with basements and related structures, especially in areas with hydric soils and shallow depth to groundwater. If a stormwater BMP depends on the hydraulic properties of soils, then the assessment shall include soil borings and measurements of percolation/infiltration rates. The number and location of required soil borings and/or soil test sites shall be determined based on what is needed to determine the suitability and distribution of soil types present at the location of the BMP. This information shall be used to provide a summary of the associated risks and potential for adequate drainage related to infiltration practices, groundwater

mounding and basement flooding. Consultation with a Certified Professional Soil Scientist or Soil Classifier may be necessary or required.

- (1) Provisions shall be made for stream buffers. The area shall be defined within a recorded easement that includes a management plan. They shall be maintained with native vegetation along naturally occurring stream areas using the following requirements based on stream order:
 - (i) Streams exceeding 3rd order and above, the City requires sketches, maps, studies, engineering reports, tests, profiles, cross-sections, construction plans and specifications to determine adequate buffer widths.
 - (ii) Perennial streams (1st and 2nd order). The total required stream buffer width is one hundred (100) feet on each side perpendicular to the waterway measured from the outer wet edge of the channel during base flows.
 - (iii) Intermittent streams. The total required stream buffer width is fifty (50) feet on each side perpendicular to the water way measured from the centerline of the channel.
 - (iv) Waterways and/or dry channels that have a contributing drainage area of fifty (50) acres or greater. The total required stream buffer width is thirty (30) feet on each side perpendicular to the waterway measured from the centerline of the waterway.
 - (v) Waterways and/or dry channels with a contributing drainage area of less than 50 acres. The total required stream buffer width is twenty (20) feet on each side perpendicular to the waterway measured from the centerline of the waterway.
- (m) A Maintenance, Repair, and Landscaping Plan that is periodically updated for all structural and nonstructural stormwater BMPs including detailed routine maintenance as well as long-term maintenance of vegetation, and repair procedures to ensure their continued efficient function shall be provided to the Public Works Department. These plans will identify the parts or components of a stormwater BMP that need to be maintained and the equipment, skills or training necessary. The plan shall also indicate who will be responsible for the maintenance of vegetation at the site. Provisions for the periodic review and evaluation of the effectiveness of the maintenance program and the need for revisions or additional maintenance procedures shall be included in the plan. Native Iowa plants and trees shall be considered for use with stormwater BMPs.
- (n) Proof of permanent recorded Maintenance Easements that will ensure access to all stormwater BMPs at the site for the purpose of inspection and repair. These easements will be recorded with the stormwater management final plan and will remain in effect even with transfer of title to the property.
- (o) Dedicating Drainage Easements: Any stormwater BMP outside of the public right-of-way shall be dedicated in a perpetual unobstructed easement with satisfactory access to a public way and from a public way to a natural watercourse or to other stormwater management measure. Any such easement shall be secured by the subdivider or developer and dedicated to the City without cost to the City.
- (p) Proof of a proposed Maintenance Agreement (recorded with final plat) binding on all subsequent owners of land served by stormwater BMPs to ensure maintenance and repair in accordance with the specifications of this ordinance.

- (q) Copies of all existing SWPPs (as required by the City's COSESCO ordinance) current as of the date of submission of the stormwater management final plan for all construction activities related to implementing any on-site stormwater BMPs.
- (r) For lot development impacted by stormwater BMPs and conveyance features:
 - (i) The builder shall provide to the Municipal Engineer, or designated City representative, for review and approval an as-built foundation survey by a licensed surveyor before the foundation is poured.
 - (ii) The lowest opening of all buildings shall be a minimum of 3 feet above the 100 year water surface elevation of stormwater BMPs.
 - (iii) Building foundations adjacent to stormwater BMPSs and/or stormwater infrastructure (i.e. conveyance features, inlets, manholes) shall be 3 feet above the 100 year water surface elevation.
- (s) Any required storm sewers including foundation drain collector lines shall be separate from any required sanitary sewers and shall be installed at the subdivider's or developer's expense and subject to requirements of the City and shall be adequate to serve all lots or parcels of land within the area to be subdivided.
 - (i) The storm sewer system shall be designed with due regard to the present and reasonably foreseeable needs of the area to be subdivided and to the location and capacity of existing storm sewers and other stormwater management measures available to serve existing and reasonably anticipated development or use of areas abutting the area to be subdivided.
 - (ii) Upon determination by Municipal Engineer, such storm sewers may become the property of the City, upon determination of the Municipal Engineer through the City's inspection, approval, and acceptance of such sewers, after the subdivider pays to the City any costs associated with their installation including any reasonable charge for any supervisory or other services provided by the City.
- (t) Accommodating Upstream Drainage Areas: Any necessary and appropriate stormwater BMPs shall be designed to accommodate runoff from any upstream area potentially draining into or through the area to be subdivided, whether such area is inside or outside the area to be subdivided. Such design shall assume that the upstream area upon development or redevelopment will be regulated such that volume of surface water runoff shall be equal to the runoff from the current landuse condition.
- (u) Protecting Downstream Drainage Areas: Any development shall provide for mitigation of any overload condition reasonably anticipated on any existing downstream stormwater BMPs outside the area to be subdivided, provided that the development or use of the area to be subdivided creates or contributes to such condition.

Sec 5B.4. WAIVERS

(1) Every applicant shall provide for stormwater management as required by this ordinance except in certain redevelopment situations when confronted with difficult site conditions that limit design of such BMPs listed in the Iowa Stormwater Management Manual. In such case, a written request must be filed to waive implementation of BMPs in part or in whole. Requests to waive implementation of BMPs in part as defined in 5B.4(2) shall be submitted to the Municipal Engineer for approval.

(2) Partial Waivers

- (a) Partial waivers of BMPs required by this ordinance may be granted for redevelopment projects if the proposed development is not likely to impair attainment of the objectives of this ordinance. At least one of the following conditions, in successive order, shall be established by applicant based on authoritative written evidence satisfactory to the Municipal Engineer:
 - (i) Alternative minimum requirements for on-site management of stormwater have been established in a stormwater management plan that has been approved by the Municipal Engineer and fully implemented. If the applicant is unable, for good cause shown, to meet the requirements of this subsection, the applicant shall meet the following condition:
 - (ii) Provisions are made to manage stormwater by an off-site facility that has been approved by the Municipal Engineer. The off-site facility is required to be in place, to be designed and adequately sized to provide a level of stormwater control that is equal to or greater than that which would be afforded by on-site practices and there is a responsible entity legally obligated to monitor the performance of and maintain the efficiency of stormwater BMPs in accordance with a written and recorded maintenance agreement. If the applicant is unable, for good cause shown, to meet the requirements of this subsection, the applicant shall meet the following condition:
 - (iii) Monetary contributions (Fee-in-Lieu) to fund watershed studies, monitoring, and improvements to address water quality and flooding issues. The monetary contribution required shall be in accordance with a fee schedule (unless the developer and the City agree on a greater alternate contribution) established by City based on the estimated cost savings to the developer resulting from the waiver and the estimated future costs to City to achieve City stormwater requirements. All of the monetary contributions shall be credited to an appropriate capital improvements program project, and shall be made by the developer prior to the approval of any final plat or site plan.
- (b) In instances where one of the above conditions is established, the applicant must further establish by authoritative written evidence satisfactory to the Municipal Engineer that the partial waiver will not result in any of the following impacts to downstream waterways:
 - (i) deterioration of existing culverts, bridges, dams, and other structures;
 - (ii) degradation of biological functions or habitat;
 - (iii) accelerated streambank or streambed erosion or siltation;
 - (iv) increased threat of flood damage to public health, life, property.

Sec 5B.5. PERFORMANCE BOND

(1) City shall require the submittal of an installation performance security or bond prior to issuance of approval in order to insure that the stormwater BMPs are installed as required by the approved stormwater management final plan:

- (a) The amount of the installation performance security or bond shall be the total estimated construction cost of the stormwater BMPs approved in the stormwater management plan. The installation performance security or bond shall contain forfeiture provisions for failure to complete work specified in the stormwater management plan.
- (b) The installation performance security or bond shall be released in full only upon submission of "as built plans" of all stormwater BMPs specified in the stormwater management plan and written certification by a Licensed Professional Engineer or Professional Landscape Architect or person credentialed in a manner suitable to the city that the stormwater BMPs have been installed in accordance with the approved stormwater management final plan and other applicable provisions of this ordinance. City will make a final inspection of stormwater BMPs to ensure compliance with the approved stormwater management plan and the provisions of this ordinance. Provisions for a partial pro-rata release of the installation performance security or bond based on the completion of various development stages can be made at the discretion of the Municipal Engineer.
- (2) City shall also require the submittal of a maintenance performance security or bond prior to issuance of a permit in order to insure that the stormwater BMPs are maintained in an effective state for a minimum of four years. This maintenance performance security or bond may be released by the City upon a showing satisfactory to the Municipal Engineer that:
- (a) another bona fide financially responsible legal entity, such as a homeowners' or similar organization organized under Iowa law, has been assigned responsibility for maintenance of the stormwater BMPs in an effective state for the balance of the four year period after assignment; and
- (b) said assignee-legal-entity has fully accepted such responsibility in a written document that qualifies for recording and has been recorded in the county recorder's office under Iowa law; and
- (c) said assignee-legal-entity posts a substitute maintenance performance security or bond subject to release at the end of the initial four year period upon a further showing by the assignee-legal-entity that the stormwater BMPs are, in City's sole judgment, still reasonably effective.

Sec 5B.6. CONSTRUCTION INSPECTION

- (1) After construction is completed, applicants are required to submit actual "as built" drawings satisfactory to City for any stormwater BMPs located on-site. The drawings must show the final design specifications for all stormwater BMPs and must be certified by a Professional Engineer, Landscape Architect or credentialed in a manner acceptable to the city. A final inspection by City is required before the release of any performance securities can occur.
- (2) Construction inspections will be conducted by the City or designated representative of the City at the conclusion of a development or redevelopment project after as-built plans are submitted to the City to ensure the stormwater BMPs have been built according to the stormwater management plan. For subdivisions, the owner is responsible for covering actual Engineering cost per City code. For individual site developments, the cost is included in the COSESCO fee.
 - (3) Performance security or bond will be released upon acceptance.

Sec 5B.7. MAINTENANCE AND REPAIR OF STORMWATER BMPs

- (1) The applicant or owner of every site, or an assignee qualified pursuant to Section 6, shall be responsible for maintaining as-built storm water BMPs in an effective state.
- (2) Prior to the issuance of a COSESCO permit that has a stormwater management BMP as one of its requirements of the permit, the applicant or owner of the site must execute a maintenance and repair easement agreement that shall be binding on all subsequent owners of land served by the stormwater management BMP. The agreement shall provide for access to the BMP and the land it serves at reasonable times for periodic inspection by City or City's designee and for regular or special assessments of property owners to ensure that the BMP is maintained in proper working condition to meet City stormwater requirements. The easement agreement shall be recorded by City at the expense of the permit holder or property owners.
- (3) Maintenance of all stormwater management BMPs shall be ensured through the creation of a formal maintenance agreement that must be approved by City and recorded into the land record at time of the stormwater management plan approval. As part of the agreement, a schedule shall be developed for when and how often maintenance will occur to ensure proper function of the stormwater management BMPs. The agreement shall also include plans for periodic inspections to ensure proper performance of the BMPs between scheduled cleanouts.
- (4) City, in lieu of a maintenance agreement, may accept dedication of any existing or future stormwater BMP through a dedication agreement to include City responsibility for maintenance and repair, provided that the maintenance and repair of such element will not impose an undue burden on other City taxpayers which may include requirements that the Applicant pay all costs and fees, including reasonable attorneys' fees and consultant fees, incurred by the City in connection with said dedication, the BMP meets all the requirements of this chapter, and the dedication includes adequate and perpetual access and sufficient area, by easement or otherwise, for inspection and regular maintenance.
- (5) All stormwater management BMPs must undergo an annual inspection to document maintenance and repair needs and ensure compliance with the requirements of this ordinance and accomplishment of its purposes. Any maintenance or repair needs detected must be corrected by the developer or entity responsible under a written maintenance agreement under Section 5(B.)3 in a timely manner, as determined by City, and the inspection and maintenance requirement may be increased as deemed necessary to ensure proper functioning of the stormwater management BMPs.
- (6) Inspection programs may be established on any reasonable basis. Inspections may include, but are not limited to: reviewing maintenance and repair records; sampling discharges, surface water, groundwater, and material or water in storm water BMPs, and evaluating the condition of stormwater management BMPs.
- (7) Parties responsible for the operation and maintenance of stormwater management BMPs shall make records of the installation and of all maintenance and repairs, and shall retain the records for at least 3 years. These records shall be made available to City during inspection of the facility and at other reasonable times upon request.
- (8) If a responsible party fails or refuses to meet the requirements of the maintenance agreement or any provision of this ordinance, City, after reasonable notice, may correct a violation by performing all necessary work to place the BMP in proper working condition. In the event that the stormwater management BMP becomes a danger to public

safety or public health, City shall notify the party responsible for maintenance of the stormwater management BMP in writing. Upon receipt of that notice, the responsible person shall have 30 days to effect maintenance and repair of the stormwater management BMP in an approved manner. After proper notice, City may assess, jointly and severally, the owner(s) of the stormwater management BMP or the property owners or the parties responsible for maintenance under any applicable written agreement for the cost of repair work and any penalties; and the cost of the work shall be a lien on the property, or prorated against the beneficial users of the property, and may be placed on the tax bill and collected as ordinary taxes.

Sec 5B.8. ENFORCEMENT BY LEGAL OR ADMINISTRATIVE ACTION

- (1) Violation of any provision of this ordinance may be enforced by civil action including an action for injunctive relief. In any civil enforcement action, administrative or judicial, the City shall be entitled to recover its attorneys' fees and costs from a person who is determined by a court of competent jurisdiction to have violated this ordinance.
- (2) Violation of any provision of this ordinance may also be enforced as a municipal infraction within the meaning of Iowa Code Section §364.22, pursuant to the City's municipal infraction ordinance.
- (3) Restoration of lands: Any violator may be required to restore land to its undisturbed condition. In the event that restoration is not undertaken within a reasonable time after notice, City may take necessary corrective action, the cost of which shall become a lien upon the property until paid.
- (4) Holds on Occupation Permits: Occupancy permits shall not be granted until all storm water management BMPs have been inspected and approved by City.

Sec 5B.9. MEANS OF APPEAL

Sec. 5B.900. Stormwater Appeal Board

There is established a Stormwater Appeal Board to hear appeals of persons in matters of the Post Construction Stormwater Management Ordinance adopted by the City of Ames.

Sec. 5B.901. Appeal application.

Any person directly affected by a decision of the Municipal Engineer or other City staff, or a notice or order issued under this code, shall have the right to appeal. That appeal shall be heard by the Stormwater Appeal Board. An appeal shall be made in writing and be filed with the City Clerk no later than 20 days after the date of the notice or order. The written appeal shall specify in detail the action appealed from, the errors allegedly made by the enforcement officer giving rise to the appeal, a written summary of all oral and written testimony the applicant intends to introduce at the hearing, including the names and addresses of all witnesses the applicant intends to call, copies of all documents the applicant intends to introduce at the hearing, and the relief requested.

An application for appeal shall be based on a claim that:

- (1) the true intent of this Code or the rules legally adopted hereunder have been incorrectly interpreted, or
- (2) the provisions of this Code do not fully apply, or

- (3) the requirements of this Code are adequately satisfied by other means, and the specific proposed alternative action will increase the degree of general code compliance of the specific system or the building and premises, or
- (4) there are specific fixed conditions that make strict compliance with this Code impracticable, or
- (5) required actions cannot be completed within the time limit specified by the Municipal Engineer or other City official.

Sec. 5B.902. BOARD MEMBERSHIP AND APPOINTMENT.

- (1) The Board shall consist of five members who are qualified by experience and training to pass on matters pertaining to stormwater mitigation and who are not employees of the City of Ames. The Municipal Engineer shall be an ex-officio member but shall have no vote on any matter before the Board.
- (2) Board members shall be appointed by the Mayor with the approval of the City Council. The term of office shall be for three (3) years, except for the terms of office for the Board when initially established. The Mayor may prescribe a shorter than a full term of appointment in order to stagger terms. No member who has served two (2) full consecutive terms is eligible for reappointment.
- (3) Membership shall consist of individuals chosen for their expertise in stormwater management, soils, biology, development, or related relevant fields of experience.

Sec. 5B.903. BOARD CHAIRPERSON.

The Board shall annually elect one of its members to serve as chairperson.

Sec. 5B.904. CONFLICT OF INTEREST.

A member shall not hear an appeal in which the member or immediate family member has a personal, professional or financial interest.

Sec. 5B.905. BOARD RECORDS.

The Municipal Engineer shall designate a qualified person to serve as secretary to the Board. The secretary shall file a detailed record of all proceedings in the offices of the Municipal Engineer and the City Clerk.

Sec. 5B.906. MEMBER COMPENSATION.

Members shall receive no compensation.

Sec. 5B.907. MEETING SCHEDULE.

The Board shall meet upon notice from the Municipal Engineer within 20 days of the filing of an appeal, or at stated periodic dates. An appellant may waive a timely hearing by filing a written waiver explaining the cause for seeking a delay.

Sec. 5B.908. OPEN MEETINGS.

The Board shall adopt and make available to the public, procedures under which hearings will be conducted.

Sec. 5B.909. BOARD AUTHORITY.

The Board has authority to affirm, modify or reverse the decision of the Municipal Engineer.

Sec. 5B.910. ACTION ON BOARD DECISION.

The Municipal Engineer shall take prompt action in accordance with the decision of the Board.

Sec. 5B.911. STAY OF ENFORCEMENT.

Appeal of a notice and order (other than an Imminent Danger notice) shall stay enforcement of the notice and order until the appeal is heard by the Board.

