

2009 MASTER COMMERCIAL DEVELOPMENT AGREEMENT

DEVELOPER _____

_____ HECTARES MORE OR LESS

_____ LOTS MORE OR LESS

DATE OF AGREEMENT - _____

AGREEMENT NUMBER - _____

CITY CLERK'S IDENTIFICATION NO. - _____

STANDARD DEVELOPMENT AGREEMENT APPROVED
IN 2009

2009 MASTER COMMERCIAL DEVELOPMENT AGREEMENT

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2009 MASTER COMMERCIAL DEVELOPMENT AGREEMENT

THIS AGREEMENT made this _____ day of _____, 20____.

BETWEEN:

THE CITY OF CALGARY, a municipal corporation
in the Province of Alberta
("the City")

OF THE FIRST PART

- and -

a duly registered corporation in the Province of Alberta,
("the Developer")

OF THE SECOND PART

RECITALS

WHEREAS the Developer is or will become the owner of lands situated in The City of Calgary, Province of Alberta, all or a portion of which the Developer intends to either subdivide, develop or both in 2009;

AND WHEREAS in connection with any subdivision or development application, the Developer will be obligated to design the Infrastructure required to service that portion of the lands forming the subject of the application and such other lands as the Manager, Urban Development determines appropriate, and obtain the approval for the design and construction of the Infrastructure from the Manager, Urban Development;

AND WHEREAS pursuant to Sections 648, 650, 651 and 655 of the *Municipal Government Act*, as a condition of subdivision and development approval the Approving Authority is authorized to require the Developer to enter into an agreement regarding the obligations associated with the construction of, installation of and payment for the Infrastructure, and the provision of sufficient Security to ensure that the terms of the agreement are carried out;

AND WHEREAS in anticipation of receiving approval in 2009 for the subdivision, development or both of all or a portion of the Lands, and the imposition of a condition pursuant to sections 648, 650, 651 and 655 of the *Municipal Government Act*, the Developer has determined it both desirable and expedient to enter into a single master agreement to establish the principles that will govern the general obligations associated with the construction and installation of and payment for the Infrastructure that will be required as a condition of any approval of residential subdivision or development and provision of Security to ensure that the terms of the agreement are carried out;

AND WHEREAS specific obligations regarding the Infrastructure imposed as a condition of approval by the Approving Authority shall be documented through the Special Clauses Agreement between the City and the Developer, into which the provisions of this Agreement shall be incorporated;

NOW THEREFORE WITNESSETH THAT IN CONSIDERATION OF the foregoing, the respective covenants contained herein, and other good and valuable consideration, the receipt and sufficiency of which is hereby acknowledged by each of the parties, the parties hereto agree as follows:

PART I
ADMINISTRATIVE PROVISIONS

A. DEFINITIONS

1.01 In this Agreement the following terms shall have the meanings set out below:

- (1) **“Actual Cost”** means the cost to the City for the construction of Boundary Roads and Lanes being the Unit Rate of the year of this Agreement and the accrued interest at Alberta Capital Finance Authority rates;
- (2) **“Agreement”** means this Agreement between the parties hereto including the above Recitals and Schedules attached hereto;
- (3) **“Approving Authority”** means
 - (a) in the case of subdivision applications, those City employees authorized to approve subdivision applications; and
 - (b) in the case of development permit applications, those City employees authorized to approve development permit applications, or the Calgary Planning Commission;
- (4) **“As-built Drawings”** means the plans and schedules showing the locations of the Infrastructure, constructed or installed, together with the lengths and sizes of materials, using for this purpose standard symbols and forms as authorized by the Manager, Urban Development;
- (5) **“Boulevard”** means the area between the back of a curb and edge of a separate sidewalk;
- (6) **“Boundary Costs”** means the cost of the construction of Boundary Roads and Lanes including the sidewalks, curbs and gutters, catch basins and leads, street lighting, paved roads and paved and gravelled lanes and regional pathways constructed within the Boundary Roads and Lanes computed using either the Unit Rate Schedule or Unit Rate as the case may be;
- (7) **“Boundary Roads and Lanes”** means a road or lane constructed along a boundary of the Development Area;
- (8) **“City”** means The City of Calgary, a municipal corporation in the Province of Alberta;
- (9) **“City Solicitor”** means the individual appointed to the position and holding title of the City Solicitor of the City of Calgary from time to time or the individual designated to act in his place generally or for the purpose of administering this Agreement;
- (9) **“City Specifications”** means the design and construction requirements for items arising in connection with the subdivision or development of land contained in all City policy documents, as amended and replaced from time to time, including but not limited to the Infrastructure, parks, subdivision servicing and erosion and sediment control;

- (11) **“Community and District Parks Assessment Levy”** means the charge per hectare for each and every hectare or part thereof within the Development Area including those areas which may be dedicated to the City for reserve parcels and any other public use, but excluding those lands dedicated as Environmental Reserve, the total amount of which will be specified in each Special Clauses Agreement, and which shall be deposited into the Developer Funded Infrastructure Stabilization Fund – Community and District Parks and shall be used by the City towards the cost of development of Community and District Parks within the City, regardless of the location of the Development Area within the City;
- (12) **“Community Park”** means municipal reserve parcels or municipal school reserve parcels that are approximately 3.6 to 8.8 hectares in size, dedicated to the City as part of the 10% reserve land dedication requirements pursuant to the *Municipal Government Act* , including but not limited to tot lots, school grounds, recreation grounds or community centre lease sites;
- (13) **“Community and Recreation Assessment Levy”** means the charge per Hectare for each and every Hectare or part thereof within the Development Area, including those areas which may be dedicated to the City for reserve parcels and any other public use, but excluding those lands dedicated as Environmental Reserve, the total amount of which will be specified within each Special Clauses Agreement, and which shall be used by the City towards the cost of the construction of fire stations, police stations, EMS stations, regional recreation centres and area libraries, as well as the acquisition of transit buses, for new growth areas, regardless of the location of the Development Area. No contributions will go towards the other rolling stock and equipment required for these facilities.
- (14) **“Conceptual Site Plan”** means those drawings containing the design details associated with the landscaping, development and construction of all parks within the Development Area;
- (15) **“Construction Completion Certificate”** means a document:
- (a) signed and sealed by the Consulting Engineer and stamped with his Alberta Association of Professional Engineers, Geologists and Geophysicists permit to practice stamp, certifying that the particular piece of Infrastructure identified was constructed in accordance with the City Specifications, or in the case of Infrastructure contemplated in Paragraph 22.13 herein, either signed by the Consulting Engineer or a Landscape Architect certifying that the particular piece of Infrastructure was constructed in accordance with the City Specifications;
 - (b) that contains the projected earliest maintenance expiry date for a specific piece of Infrastructure; and
 - (c) is acknowledged and dated by the Manager, Urban Development;
- (16) **“Construction Drawings”** means those drawings containing the technical details associated with the design, construction and installation of the Infrastructure;
- (17) **“Consulting Engineer”** means a Professional Engineer registered in the Province of Alberta who is a member in good standing of The Association of Professional Engineers, Geologists and Geophysicists of Alberta and is employed or retained by the Developer in connection with the obligations contained in this Agreement;

- (18) **“Consulting Engineer’s Field Services Guidelines”** means that document entitled “Consulting Engineer’s Field Services Guidelines” drafted by the City, in force as of the date of this Agreement, and as amended and replaced from time to time until the relevant Final Acceptance Certificate is issued, which governs the minimum level of field services to be performed by the Consulting Engineer relating to the construction, installation and inspection of the Infrastructure;
- (19) **“Contractor”** means the individual or corporation hired by the Developer to undertake the obligations contained in this Agreement on behalf of the Developer for the installation, construction and maintenance of the Infrastructure;
- (20) **“Deep Fills Report”** means a geotechnical analysis of the soils within areas of the Development Area being filled more than two metres deep by a Geotechnical Engineering Consultant prepared in accordance with the City’s “Guidelines for Preparing Geotechnical Reports”, as amended and replaced from time to time, which contains recommendations on any development restrictions, including bearing certificates and special foundation designs, that may be necessary to ensure the integrity of any structure, including buildings, roads and utilities, constructed on those fill areas;
- (21) **“Developer”** means _____, a duly registered corporation in the Province of Alberta;
- (22) **“Developer Funded Infrastructure Stabilization Fund – Community and District Parks”** means the trust account into which the funds from the Community and District Parks Assessment Levy are paid and redistributed back to developers based on specific criteria, which fund is monitored by the Urban Development Institute – Calgary on behalf of the development industry and administered by the City;
- (23) **“Developer Funded Infrastructure Stabilization Fund – Major Road Standard Oversize”** means the trust account into which the funds from the Major Road Standard Oversize Assessment Levy are paid and redistributed back to developers based on specific criteria, which fund is monitored by the Urban Development Institute – Calgary on behalf of the development industry and administered by the City;
- (24) **“Developer Funded Infrastructure Stabilization Fund – Utility Oversize”** means the trust account into which the funds from the Utility Oversize Assessment Levy are paid and redistributed back to developers based on specific criteria, which fund is monitored by the Urban Development Institute – Calgary on behalf of the development industry and administered by the City;
- (25) **“Development Area”** means any portion of the Lands that are the subject of a subdivision or development permit approval, which the Developer intends to immediately develop, and for which the Developer will be obligated to design, construct and install the Infrastructure, which will be more particularly described in each Special Clauses Agreement between the Developer and the City;
- (26) **“Development Officer”** means the City employee appointed to and holding the position of Development Officer as contemplated by the City of Calgary Land Use Bylaw 1P2007, as amended and the *Municipal Government Act*;

- (27) “**Director, Development and Building Approvals**” means the City employee appointed to the position of Director, Development and Building Approvals or the individual authorized to act in his place generally or for the purpose of administering this Agreement;
- (28) “**Director, Environmental Management**” means the City employee appointed to the position of Director, Environmental Management or the individual authorized to act in his place generally or for the purpose of administering this Agreement;
- (29) “**Director, Parks**” means the City employee appointed to the position of Director, Parks or the individual authorized to act in his place generally or for the purpose of administering this Agreement;
- (30) “**Director, Roads**” means the City employee appointed to the position of Director, Roads or the individual authorized to act in his place generally or for the purpose of administering this Agreement;
- (31) “**Director, Water Resources**” means the City employee appointed to the position of Director, Water Resources or the individual authorized to act in his place generally or for the purpose of administering this Agreement;
- (32) “**Director, Water Services**” means the City employee appointed to the position of Director, Water Services or the individual authorized to act in his place generally or for the purpose of administering this Agreement;
- (33) “**District Park**” means municipal reserve or municipal school reserve parcels that are greater than or equal to 9.2 hectares in size, and are not part of the 10% reserve dedication pursuant to the *Municipal Government Act*, and which are defined by the Park Specifications as “District Parks”;
- (34) “**Drainage Plans**” means one or more engineering design drawings included in the Construction Drawings, which detail the design parameters and solutions for all aspects associated with the management of storm water in and around the Development Area;
- (35) “**Entrance Road Standard**” means a portion of the road network extending from an arterial or collector road, as defined in the Roads Standards and Specifications, into a portion of the Development Area, which for marketing or aesthetic purposes the Developer determined that additional amenities are planned to be constructed in excess of the minimum technical requirements for the said portion of the road;
- (36) “**Erosion and Sediment Control Report**” means that document, including plans, prepared by the Consulting Engineer on behalf of the Developer in accordance with the City’s requirements contained in the Guidelines for Erosion and Sediment Control, as amended and replaced from time to time, satisfactory to the Manager, Urban Development, outlining measures to protect watercourses and adjacent lands from erosion and sediment pollution arising from the Development Area, which measures are to be adhered to prior to commencement of stripping and grading operations within the Development Area until completion of grading and site rehabilitation, which may be required until all Final Acceptance Certificates for the Development Area are acknowledged;

- (37) **“Final Acceptance Certificate”** means a document:
- (a) signed and sealed by a registered Professional Engineer and stamped with an Association of Professional Engineers, Geologists and Geophysicists of Alberta permit to practice stamp, certifying that the particular piece of Infrastructure identified was maintained in accordance with the City Specifications;
 - (b) that identifies that the particular piece of Infrastructure is in order for acceptance by the Manager, Urban Development; and
 - (c) is acknowledged and dated by the Manager, Urban Development;
- (38) **“Final Inspection Report”** means a report stating that deficiencies have been corrected and that a specific portion of the Infrastructure is recommended for acceptance by the City;
- (39) **“Geotechnical Engineering Consultant”** means a Professional Engineer who is a member in good standing of the Association of Professional Engineers, Geologists and Geophysicists of Alberta and knowledgeable or certified in the specialization of geotechnical engineering;
- (40) **“Growing Season”** means that period of time between the dates that the Park Development Inspector acknowledges the Construction Completion Certificate to:
- (a) June 30 of the following year; or
 - (b) the date when, in the sole opinion of the Director, Parks, the irrigation system(s) are operating and the vegetation is in full leaf, whichever event occurs last;
- (41) **“Infrastructure”** means those utilities (including but not limited to sanitary sewers, storm sewers, Storm Water Pond Facilities, water mains and hydrants, sewer and water service connections), improvements (including but not limited to sidewalks, curbs and gutters, paved roads, paved walkways, paved and/or gravelled lanes, Surface Drainage Facilities, bridges, culverts, retaining walls, stairways and landscaping), street lights, Boulevards, public utility lots and reserve parcels (including landscaping) and other services designed and intended to service the Development Area, and such other lands as the Manager, Urban Development determines appropriate;
- (42) **“Inspection and Testing Company”** means a consulting engineering firm certified by the Association of Professional Engineers, Geologists and Geophysicists of Alberta as evidenced by a permit to practice to undertake geotechnical engineering analysis;
- (43) **“Inspection Fee”** means the charge per Hectare for each and every Hectare or part thereof within the Development Area, including those areas which may be dedicated to the City for reserve parcels and any other public use, but excluding those lands dedicated as Environmental Reserve, regardless of the location of the Development Area within the City, the total amount of which will be specified in each Special Clauses Agreement, which shall be used by the City towards the cost of inspections by the City related to the installation of: sanitary sewers; storm sewers, water mains and hydrants; sewer and water service connections; parks irrigation systems; and for the construction of surface improvements including parks landscaping requirements. More specifically this covers only the cost of manpower and equipment required by the City for: inspections; the cost of quality control; and the materials testing program operated by the Roads Business Unit;
- (44) **“Joint Inspection Certificate”** means a document that is submitted to the City with the relevant Construction Completion Certificate, and is signed by both the relevant City inspector for the specific Infrastructure and

- (a) a Landscape Architect or the Consulting Engineer in the case of a Joint Inspection Certificate for Parks as contemplated in Paragraph 22.13; or
 - (b) signed and sealed by the Consulting Engineer in all other cases stating that the Infrastructure identified has been completed with the exception of the noted deficiencies;
- (45) “**Lands**” means those lands situated in The City of Calgary, Province of Alberta, which the Developer is the owner or will become the owner, and for which the Developer intends to receive subdivision or development permit approval in 2009;
- (46) “**Landscape Architect**” means an individual with membership in good standing with the Alberta Association of Landscape Architects;
- (47) “**Linear Park**” means that park type defined by the Park Specifications as “Linear Park”;
- (48) “**Major Regional Park**” means a park in excess of five (5) hectares, which provides open space on a regional rather than local level;
- (49) “**Major Road Standard**” means:
- (a) a four or six lane roadway designed to carry between 12,500 to 30,000 vehicle trips per day;
 - (b) direct vehicular access from/to residential lots abutting this road is prohibited and possibly restricted from commercial and industrial lots; and
 - (c) which is usually divided in residential areas, undivided in industrial areas or either in commercial areas;
- (50) “**Major Road Standard Oversize Assessment Levy**” means the charge per Hectare for each and every Hectare or part thereof within the Development Area including those areas which may be dedicated to the City for reserve parcels and any other public use, excluding those lands dedicated as Environmental Reserve, the total amount of which will be specified in each Special Clauses Agreement, and which shall be deposited into the Developer Funded Infrastructure Stabilization Fund – Major Road Standard Oversize and shall be used by the City towards the cost of Oversize for Major Road Standard within the City, regardless of the location of the Development Area within the City;
- (51) “**Manager, Urban Development**” means the City employee appointed to the position of Manager, Urban Development, or the individual authorized to act in his place generally or for the purpose of administering this Agreement;
- (52) “**Municipal Government Act**” means the *Municipal Government Act*, R.S.A. 2000, c.M-26, as amended;
- (53) “**Neighbourhood Park**” means that park type defined by the Park Specifications as “Neighbourhood Park”;
- (54) “**Optional Subdivision Amenities**” means facilities constructed by the Developer on public lands, at its choice, above the minimum requirements of the City, including but not limited to entrance signage and gates, walls and flower beds of generally high quality material, park features such as benches, gazebos, water features or other high maintenance cost features, all of which require a perpetual maintenance solution as a condition of approval, which are usually in the form of deposit or payment by the

developer sufficient to remove the facility or assumption of the maintenance and repair obligations by either a homeowner, resident or community association;

- (55) **“Oversize”** means the difference in size of the facility required to serve the Development Area and the size of the facility which the Developer is required by the condition of subdivision or development permit approval relating to the Lands and terms of this Agreement to construct either within or outside of the Development Area to service additional lands outside of the Development Area;
- (56) **“Park Development Inspector”** means the City employee appointed to and holding the position of Park Development Inspector who performs landscape construction inspections in accordance with the Park Specifications;
- (57) **“Park Specifications”** means that document entitled “Development Guidelines and Standard Specifications Landscape Construction” drafted by the City and as amended and replaced from time to time until the relevant Final Acceptance Certificate is issued, that outlines the minimum specifications, standards and requirements associated with the development, landscaping and maintenance requirement for City parks;
- (58) **“Payment Date”** means December 31, 2010;
- (59) **“Phase 3 ESA or Environmental Site Assessment”** means an implementation of the decontamination of a site in accordance with requirements set out in the Phase 2 ESA or Environmental Site Assessment, which is a report analyzing an environmental problem identified through a Phase 1 ESA or Environmental Site Assessment, and which recommends a solution and implementation plan to address the problem;
- (60) **“Primary Collector”** means a four lane divided roadway designed to carry between 5,500 and 12,500 vehicle trips per day, to or from which direct vehicular access to or from residential lots abutting this road is allowed;
- (61) **“Qualified Plumber”** means an individual holding a certificate of competency in the plumbing discipline as contemplated by the Certification and Permit Regulation AR 168/2002, as amended and replaced from time to time;
- (62) **“Roads Standards and Specifications”** means the City Specifications document entitled “Standard Specifications Roads Construction” drafted by the City, and as amended and replaced from time to time until the relevant Final Acceptance Certificate is issued, that governs matters associated with the design and construction of roads and all associated appurtenances;
- (63) **“School Board”** means the Calgary Board of Education or the Roman Catholic Separate School Board, as the case may be;
- (64) **“School Site”** means the land set aside for each type of school, such as Elementary, Junior High, Senior High operated by the School Board, including but not limited to municipal school reserve;
- (65) **“Security”** means:
 - (a) for Tier 1 Developers and Tier 2 Developers an irrevocable letter of credit, satisfactory to the City, with a Canadian chartered bank at a branch in Calgary, Alberta provided from the Developer to the City that shall be used to secure the

- performance of any and all obligations contained in this Agreement and any amendments hereto; and
- (b) for Tier 3 Developers an irrevocable letter of credit, performance bond, or other form of security, satisfactory to the City, with a Canadian chartered bank at a branch in Calgary, Alberta or bonding company approved by the City Solicitor, provided from the Developer to the City that shall be used to secure the performance of any and all obligations contained in this Agreement and any amendments hereto;
- (66) **“Shallow Utilities”** means those utilities that are operated by third party service providers including, but not limited to telephone, gas, cable and electric;
- (67) **“Special Clauses Agreement”** means the agreement that will be entered into between the City and the Developer to establish the specific obligations of the Developer arising from conditions of approval of a specific subdivision or development permit application for the Lands;
- (68) **“Storm Drainage”** means runoff that is the result of precipitation;
- (69) **“Storm Drainage System”** means the system for collecting, storing and disposing of Storm Drainage, and includes:
- (a) the catch basins, sewers and pumping stations that make up the storm drainage collection system;
 - (b) the storm drainage facilities, structures or things used for storage, management and treatment to buffer the effects of the peak runoff or improve the quality of the storm water;
 - (c) the sewers and pumping stations that transport Storm Drainage to the location where it is treated or disposed of;
 - (d) the storm drainage outfall structures; and
 - (e) the Surface Drainage Facilities; but
 - (f) does not include plumbing or service connections in buildings;
- (70) **“Storm Sewer Assessment Levy”** means the assessment charge calculated on a per hectare basis for each and every Hectare or part thereof within the Development Area including those areas which may be dedicated to the City for reserve parcels and any other public use, but excluding those lands dedicated as Environmental Reserve, the total amount of which will be specified within each Special Clauses Agreement, which is based upon the watershed areas specified in the Water Resources Business Unit’s Plan 475.03000.010 as revised from time to time, and in accordance with the amounts depicted in the Storm Sewer Assessment Levy Table contained in Schedule “2” attached hereto;
- (71) **“Storm Water Impound Easement”** means an area designated for the temporary storage of storm water from which the outflow is restricted to prevent surcharging of the storm sewer system;
- (72) **“Storm Water Pond Facilities”** means facilities either constructed or naturally existing for the purpose of collecting, retaining, treating and ultimately discharging storm water;
- (73) **“Stripping and Rough Grading Compaction Report”** means an engineering report prepared by the Consulting Engineer and submitted on behalf of the Developer to the City indicating how the land form of the Development Area has been changed to accommodate the proposed development, that outlines the cuts and fills made during

the stripping and grading, and provides compaction certification for all of the mass grading work undertaken;

- (74) "**Subdivision Approval**" means tentative plan approval of any subdivision application of the Lands by the Approving Authority;
- (75) "**Sub-neighbourhood Park**" means that park type defined by the Park Specifications as "Sub-neighbourhood Parks";
- (76) "**Surface Drainage Facilities**" means any facility or facilities associates with drainage or control of Storm Drainage that is ultimately directed to a Street or Storm Drainage System, and includes, but is not limited to:
- (a) a grass swale;
 - (b) a concrete or asphalt walkway, gutter or swale;
 - (c) a drainage control fence or structure; or
 - (d) the sloping and contouring of land to facilitate or control Storm Drainage;
- (77) "**Surveys Act**" means the *Surveys Act*, R.S.A. 2000, c.S-26, as amended;
- (78) "**Tier 1 Developers, Tier 2 Developers and Tier 3 Developers**" shall mean the classifications into one of which the Developer will be placed in the sole discretion of the Manager, Urban Development, which classification will be specified in the Special Clauses Agreement, and which will dictate the Security payable by the Developer, the form of Security and the availability of Security reduction all in accordance with Part XVIII (Performance Security) herein;
- (79) "**Traffic Signage and Road Marking Assessment Levy**" means the charge per Hectare for each and every Hectare or part thereof within the Development Area including those areas which may be dedicated to the City for reserve parcels and any other public use, but excluding those lands dedicated as Environmental Reserve, the total amount of which will be specified within each Special Clauses Agreement, which shall be used by the City towards the cost of the manufacturing and placement of subdivision traffic signage and road markings, and any permanent Transportation and Utility Corridor signage, regardless of the location of the Development Area within the City;
- (80) "**Traffic Signal Construction Specifications**" means the City Specifications document entitled "Standard Specifications Traffic Signals" drafted by the City, and as amended and replaced from time to time until the relevant Final Acceptance Certificate is issued, which governs matters associated with the design and construction of traffic signals and all associated appurtenances;
- (81) "**Transportation Assessment Levy**" means the charge per Hectare for each and every Hectare or part thereof within the Development Area including those areas which may be dedicated to the City for reserve parcels and any other public use, but excluding those lands dedicated as Environmental Reserve, the total amount of which will be specified within each Special Clauses Agreement, which shall be used by the City toward the costs of constructing that portion of the Infrastructure relating to or in connection with transportation including the acquisition of required land, regardless of the location of the Development Area within the City;

- (82) **“Transportation and Utility Corridor”** means land owned by the Province of Alberta identified for the purpose of installing and constructing public infrastructure including, but not limited to sanitary and storm sewers, Storm Water Pond Facilities, water mains, expressways, freeways or high voltage electrical distribution facilities;
- (83) **“Transportation and Utility Corridor (T.U.C.) Signage Policy”** means the policy approved by City Council requiring developers of land abutting Transportation and Utility Corridors to post signs thereon indicating that the land is a Transportation Utility Corridor and that the intent is to install and construct public infrastructure thereon;
- (84) **“Trapped Low Area”** means a component of a storm water overland drainage system that may be located on both public and privately owned lands, that is used to control and contain storm water through the temporary storage of storm water on streets, lanes and adjacent lands during and after high intensity rainfall events;
- (85) **“Unit Rate Schedule”** means the schedule of the Unit Rates for the year of this Agreement used in calculating cost recoveries identified herein for Infrastructure, or portions thereof, installed or constructed by the Developer or the City, which is attached hereto as Schedule “1”;
- (86) **“Unit Rate”** means the relevant rate that may change from year to year that is used in calculating cost recoveries contemplated in this Agreement;
- (87) **“Utility Oversize Assessment Levy”** means the charge per Hectare for each and every Hectare or part thereof within the Development Area including those areas which may be dedicated to the City for reserve parcels and any other public use, but excluding those lands dedicated as Environmental Reserve, the total amount of which will be specified in each Special Clauses Agreement, and which shall be deposited into the Developer Funded Infrastructure Stabilization Fund – Utility Oversize and shall be used by the City towards the cost of Oversize and water pressure reducing valve chambers within the City regardless of location of the Development Area within the City;
- (88) **“Winter Season”** means that period of time between November 1 and April 30 of the year following completion of construction.

B. SCOPE OF AGREEMENT

- 1.02 This Agreement shall define the duties, liabilities and obligations of the Developer with respect to those matters that are specifically set out herein.

C. NOTICES

- 1.03 (1) Unless otherwise specified within this Agreement, any notice, communications or request to be given to either party shall be in writing and delivered by personal delivery or registered mail addressed to such party at the following address:

As to the City (by mail): Manager, Urban Development
P.O. Box 2100, Postal Station “M”
Calgary, Alberta T2P 2M5

As to the City (location): 3rd Floor, 205 – 8th Avenue S.E.
Calgary, Alberta

As to the Developer:

or at such address as either of the parties may from time to time advise the other in writing by notice.

- (2) When notices, communications or requests made in connection with this Agreement are delivered:
 - (a) by personal delivery, they are deemed received on the date of delivery; and
 - (b) by registered mail, they are deemed received three (3) days after posting.

D. REGISTRATION OF AGREEMENT

- 1.04 (1) The City shall be entitled, in its sole discretion, to file and maintain caveats evidencing the City's interest under this Agreement against each and every Certificate of Title within the Development Area.
- (2) The Developer shall pay all costs associated with the registration of this Agreement and all other costs incurred by the City as a result of the registration of any other documents pertaining to this Agreement, including but not limited to any amendment hereto, notwithstanding that such registration may be solely at the direction of the City.
- (3) The caveats referred to herein and this Agreement shall remain registered and in full force and effect until the last Final Acceptance Certificate has been issued.
- 1.05 (1) The City agrees to discharge this Agreement and any documents pertaining hereto from the Certificate of Title to the Lands upon the latter of:
 - (a) acknowledgement of the last Final Acceptance Certificate as contemplated herein; or
 - (b) the direction of the Manager, Urban Development following approval of the As-built Drawings of the Infrastructure.
- (2) The Developer shall pay all costs associated with the discharge of this Agreement and any documents pertaining to this Agreement, including but not limited to any amendment to this Agreement.

E. OBLIGATIONS AS COVENANTS

- 1.06 The parties hereby acknowledge and agree that every obligation or duty imposed upon them under this Agreement shall constitute a covenant, whether expressed as covenant or not.

F. APPLICABLE LAW

- 1.07 (1) This Agreement shall be interpreted under and governed by the laws of the Province of Alberta.
- (2) Nothing in this Agreement shall relieve the Developer from compliance with all applicable municipal bylaws, laws or regulations established by any other government body that may have jurisdiction over the Lands or activities thereon.

G. INTERPRETATION OF AGREEMENT

- 1.08 (1) The part, numbers, headings, subheadings, paragraphs, subparagraphs, and associated numbers are inserted for convenience of reference only and shall not affect the construction or interpretation of this Agreement.
- (2) This Agreement shall be construed with all changes in number and gender as may be required by the context.
- (3) If more than one entity constitutes the Developer, Developer and all words pending thereon shall be read and construed in the plural instead of the singular, in which case the covenants shall bind the entities severally as well as jointly.
- (4) Every provision of this Agreement by which the Developer is obligated in any way shall be deemed to include the words "at the expense of the Developer" unless the context otherwise requires.
- (5) References herein to any statute or provision thereof include such statute or provision thereof as amended, revised, re-enacted and/or consolidated from time to time and any successor statute thereto.
- (6) Whenever a statement or provision in this Agreement is followed by words denoting inclusion or example and then a list of or reference to specific items, such list or reference shall not be read so as to limit the generality of that statement or provision, even if words such as "without limiting the generality of the foregoing" or "including but not limited to" do not precede such list or reference.
- (7) All covenants and conditions contained in this Agreement shall be severable, and should any covenant or condition in this Agreement be declared invalid or unenforceable by a court of competent jurisdiction, the remaining covenants and conditions and the remainder of the Agreement shall remain valid and not terminate thereby.
- (8) This Agreement does not constitute a development permit nor any other permit issued by the City.

H. WAIVER

- 1.09 (1) The failure of the City at any time to require strict performance by the Developer of any obligation under this Agreement shall in no way affect its right thereafter to enforce such obligation, nor shall the waiver by the City of the performance of any obligation hereunder be taken or held to be a waiver of the performance of any other obligation hereunder at any later time.
- (2) The City shall specifically retain its rights at law to enforce this entire Agreement.
- (3) The City's waiver of all or any portion of this Agreement must, without exception, be in writing and signed by the Manager, Urban Development, and any action that fails to comply with this requirement will under no circumstances be considered or construed to be a waiver.

I. TIME

- 1.10 (1) Time shall be of the essence of this Agreement.
- (2) Any time limits specified in this Agreement
- (a) shall be calculated from the date of the applicable Special Clauses Agreement; and
 - (b) may be extended with the consent in writing of both the Developer and the City, but no such extension of time shall operate or be deemed to operate as an extension of any other time limit, and time shall be deemed to remain of the essence of this Agreement notwithstanding any extension of any time limit.

J. SUCCESSORS AND ASSIGNS

- 1.11 (1) This Agreement shall be enforceable by and against the parties hereto, their heirs, executors, administrators, successors and assigns, provided that in the case of an assignment, the assignee has first provided an assumption agreement to the City in accordance with the requirements of subparagraph 2, and has provided Security to satisfy the obligations of this Agreement to the satisfaction of the Manager, Urban Development.
- (2) Prior to any assignment, sale or transfer of all or any portion of the Development Area, the Developer shall cause the assignee, purchaser or transferee to enter into an assumption agreement with the City, in a form satisfactory to the City Solicitor, duly executed by the vendor, assignor or transferor and the assignee, purchaser or transferee, whereby the assignee, purchaser or transferee covenants and agrees to be bound by, observe, assume, perform and cause to be performed all of the covenants, terms and conditions contained in the Agreement, irrespective of whether said covenants, terms and conditions should have been performed prior to the date of this Agreement.
- (3) Upon receipt by the City of such assumption agreement and Security, the assignor, vendor or transferor of such portion shall be deemed to be released from the obligations contained herein.

K. WARRANTY

- 1.12 The Developer represents and warrants to the City as follows:
- (1) the Developer is a corporation validly subsisting under the laws of Alberta and has full corporate power and capacity to enter into this Agreement and any documents arising from or in connection with this Agreement; and
 - (2) all necessary corporate action has been taken by the Developer to authorize the execution and delivery of this Agreement.

L. RECITALS AND SCHEDULES

- 1.13 The above Recitals and Schedules attached hereto shall form part of this Agreement.

M. SPECIAL CLAUSES

- 1.14 Until the Developer and the City execute the relevant Special Clauses Agreement, and the City receives the security contemplated therein, or the Manager, Urban Development provides written consent to the Developer, which may be provided upon receipt of an executed Interim Indemnity Agreement, security and documentation required therein to the satisfaction of the Manager, Urban Development, the Developer shall not undertake on the Lands any work in connection with or contemplated by this Agreement or any condition of subdivision or development permit approval pertaining to the Lands.
- 1.15 (1) The Developer understands and agrees that upon approval of a subdivision application or development permit for a portion or all of the Lands, including the design detail of the Infrastructure, the Developer shall enter into a Special Clauses Agreement.
- (2) If the Developer fails to enter into a Special Clauses Agreement referenced in subparagraph (1) within thirty (30) days of receiving the same from a representative within the Urban Development Division, the Developer shall immediately cease any and all construction activity on the Lands that are governed by or associated with this Agreement, including that for which consent is provided by the Manager, Urban Development as contemplated in section 1.14 above.

N. PERFORMANCE OF OBLIGATIONS

- 1.16 Nothing in this Agreement shall be construed to relieve the Developer from the full performance of all obligations, terms, conditions and work to be performed under this Agreement.

O. TERM OF AGREEMENT

- 1.17 (1) This Agreement shall take effect from the date above first written and continue until all design, installation, construction and maintenance of the Infrastructure contemplated herein is complete, and all time periods for which indemnifications from the Developer to the City have expired.
- (2) (a) The terms of this Agreement shall be incorporated into those Special Clauses Agreements only for those portions of the Lands for which:
- (i) a subdivision or development permit application has been received by the City; and
 - (ii) a Special Clauses Agreement has been requested from the City by the Developer
- on or before December 31, 2009, regardless of the date of subdivision or development permit approval or commencement of construction; and
- (b) Notwithstanding subparagraph (a), the terms of this Agreement shall not be incorporated into those Special Clauses Agreements where the requirements of subparagraph (a) have been met, but the Developer fails to pay to the City the Security generally contemplated by this Agreement and specifically required by the Manager, Urban Development on or before March 1, 2010, or such later date authorized in writing at the sole and unfettered discretion of the Manager, Urban Development. In such case, the Developer shall be required to enter into a new Master Commercial Development Agreement.

P. STRIKES AND LOCKOUTS

- 1.18 If any party is prevented from carrying out any of its obligations, or is delayed in the performance of such obligations by reason of strikes, lockouts, government restrictions, acts of God, unavailability of materials, labour and similar causes, all beyond the reasonable control of the party in question, and such delay renders it uncertain or unlikely that such party can perform its obligations within the time provided, then the time for carrying out or performing such obligation on the part of such party shall be extended for a reasonable time which shall not be greater than the length of the delay caused by such beyond the party's reasonable control.

PART II
GENERAL CONSTRUCTION OBLIGATIONS

- 2.01 The Developer shall not commence construction or development of the Infrastructure or any construction, work, development or activity associated with or required for the construction or installation of the Infrastructure (including but not limited to excavations in road and lane rights of way), either within or external to the Development Area, until written consent to commence is obtained from the Manager, Urban Development.
- 2.02 (1) The Developer represents and warrants that it is familiar with the Consulting Engineer's Field Services Guidelines and with the requirements of the Manager, Urban Development, as they relate to this Agreement.
- (2) The Developer shall ensure that all work to be performed under this Agreement, including all materials and workmanship, shall be in accordance with the Consulting Engineer's Field Services Guidelines and the specific requirements of the Manager, Urban Development.
- (3) In the event of a conflict between the Consulting Engineer's Field Services Guidelines and the specific requirements of the Manager, Urban Development, the specific requirements of the Manager, Urban Development shall govern.
- 2.03 (1) The Developer shall employ a Consulting Engineer, who shall be identified in the Special Clauses Agreement, to design and supervise all work to be carried out under this Agreement.
- (2) The Developer shall empower the Consulting Engineer to:
- (a) observe and comply with the City Specifications when carrying out any activities in connection with this Agreement; and
 - (b) certify that all materials supplied and all work performed in connection with this Agreement conform in all respects with either the City Specifications or the direction of the Manager, Urban Development.
- (3) The Developer shall be entitled to employ additional Consulting Engineers, or substitute or replace the Consulting Engineer identified in the Special Clauses Agreement with a new Consulting Engineer upon the Developer giving at least three (3) days written notice to the City prior to the effective date of such change.

- (4) Each and every Consulting Engineer is deemed to be an agent of the Developer for the purpose of this Agreement, which includes, but is not limited to:
 - (a) certifying that all materials supplied and all work performed conforms in all respects to the City Specifications, or as approved by the Manager, Urban Development, in writing;
 - (b) preparing, submitting and certifying Construction Completion Certificates and Final Acceptance Certificates;
 - (c) certifying the correction of all defects and deficiencies as required by this Agreement;
 - (d) carrying out inspections under this Agreement;
 - (e) providing such other certification or documentation as may be required in accordance with this Agreement or the Consulting Engineer's Field Services Guidelines, including but not limited to geotechnical material testing; and
 - (f) the preparation, review, certification and submission of the plans, specifications and schedules which the Developer is required to supply under this Agreement.

2.04 The Developer grants to the City, its representatives, agents and contractors the free and uninterrupted access to any and all parts of the Lands for the purpose of making inspections and taking samples of materials being used in connection with the construction and installation of the Infrastructure.

2.05 If the Developer fails to comply with the Consulting Engineer's Field Services Guidelines as required herein, the Manager, Urban Development may order (either verbally or in writing) the immediate stoppage of any and all work associated with the non-compliance and the removal of materials considered to be unsatisfactory in the opinion of the Manager, Urban Development from the Development Area, and the Developer shall immediately comply with any such order.

2.06 The Developer, at its sole cost and expense, and as and when required by the Manager, Urban Development, shall:

- (1) supply test results from the Inspection and Testing Company of alkalinity and soil resistivity for determining abnormal soil conditions requiring special consideration for sanitary sewers, storm sewers and water mains;
- (2) supply Standard Proctor Density test results from the Inspection and Testing Company for sidewalk, paving and lane construction and utility trenches; and
- (3) supply samples of any materials proposed to be used or installed in any Infrastructure under this Agreement, which samples shall be suitable for testing and visual inspection by an Inspection and Testing Company under contract with the City.

2.07 (1) When this Agreement requires the Developer to undertake work or supply material for which the City is to pay, either in whole or in part, the Developer shall obtain the written authorization of the Manager, Urban Development for such work and materials prior to commencement of the work or supply of materials.

- (2) All work to be undertaken and material supplied for which:
 - (a) the City is to pay in whole or in part;
 - (b) the City is to undertake or supply at the Developer's cost; or
 - (c) deferred payments are to be made from the City to the Developershall be at the prices specified in the Unit Rate Schedule, unless otherwise specified in writing by the Manager, Urban Development.

- (3) If the Unit Rate Schedule fails to prescribe a price for work to be undertaken or materials supplied, the price shall be mutually agreed upon in writing prior to commencement of the work or supply of material.
- 2.08
- (1) Where the City pays only part of the total cost of any Infrastructure, such as Oversize, the City will pay the Developer a surcharge of 5% for administration computed on the City's share of the cost, but no engineering fees shall be paid.
 - (2) Notwithstanding subparagraph (1), the City will pay the Developer a surcharge of 5% for engineering fees and 5% for administration computed on the City's share of the cost in the following cases only:
 - (a) where the City pays the full cost of any installation of the Infrastructure done by the Developer;
 - (b) where the City pays a portion of the cost on boundary utilities and improvements as required herein; and
 - (c) where the City pays a portion of the cost of Infrastructure required to service School Sites.
 - (3)
 - (a) The Developer shall not be entitled to payment from the City for any work undertaken or supply of materials contemplated herein for which the City is obligated to pay, in full or in part, nor shall any such amount be a debt due and owing to the Developer from the City until:
 - (i) the Developer submits cost calculations and all supporting documentation to the City for approval by the Manager, Urban Development;
 - (ii) the City processes and returns to the Developer, the cost calculations detailing any changes which may be required, which the City shall complete within sixty (60) days from the date of its receipt thereof; however, if the cost calculations are not returned to the Developer within the sixty (60) day period, the cost calculations will be deemed approved as submitted; and
 - (iii) the Developer submits the invoice for the work undertaken and materials supplied along with the cost calculations and all supporting documentation as approved or deemed approved by the City.
 - (b) Notwithstanding anything to the contrary contained in this Agreement, the City shall be under no obligation to pay any cost otherwise recoverable by the Developer from the City unless and until the Developer submits to the City an invoice, with all supporting documentation, as required in subparagraph 3(a)(iii) herein, for the full amount claimed within six (6) years from December 31 of the year the Agreement was entered into, and the Developer shall thereafter make no demand or file any action or claim against the City for the payment thereof.
 - (4)
 - (a) It is understood and agreed between the parties hereto that payments from the City for utility Oversize, Major Road Standard Oversize and local parks cost recoveries as contemplated herein are paid from the Developer Funded Infrastructure Stabilization Fund – Local Parks, Developer Funded Infrastructure Stabilization Fund - Major Road Standard Oversize and Developer Funded Infrastructure Stabilization Fund - Utility Oversize.
 - (b) The Developer understands that funds in the above noted accounts fluctuate from time to time, and there may be insufficient funds available to reimburse the Developer for the said cost recoveries from time to time.

- (c) If funds are insufficient:
 - (i) the City is under no obligation to pay to the Developer the amount stipulated in the invoice(s) for these costs recoveries;
 - (ii) the Developer's invoice will be placed in a queue with other outstanding invoices and paid, in the sole direction of the Manager, Urban Development, on a first come, first served basis;
 - (iii) the Developer, in the sole direction of the Manager, Urban Development, will be reimbursed when sufficient funds become available and shall not be entitled to any interest recovery in the event that payment cannot be made within the normal thirty (30) day period.
- (d) The City shall be under no obligation to pay any cost otherwise recoverable by the Developer from the funds in the above noted accounts unless and until the Developer submits to the City an invoice, with all supporting documentation, as required in subparagraph 3(a)(iii) herein, for the full amount claimed within six (6) years from December 31 of the year the Agreement was entered into, and the Developer shall thereafter make no demand or file any action or claim against the City for the payment thereof.

PART III
ASSESSMENT LEVIES

A. STORM SEWER

- 3.01 Before the Payment Date, the Developer shall pay to the City the Storm Sewer Assessment Levy per hectare of the Development Area as set out in Schedule 2.

B. UTILITY OVERSIZE

- 3.02 Before the Payment Date, the Developer shall pay to the City the Utility Oversize Assessment Levy of \$5,000.00 (Five Thousand Dollars) per hectare of the Development Area.

C. MAJOR ROAD STANDARD OVERSIZE

- 3.03 Before the Payment Date, the Developer shall pay to the City the Major Road Standard Oversize Assessment Levy of \$11,800.00 (Eleven Thousand Eight Hundred Dollars) per hectare of the Development Area.

D. TRANSPORTATION

- 3.04 Before the Payment Date, the Developer shall pay to the City the Transportation Assessment Levy of \$63,507.00 (Sixty-Three Thousand Five Hundred and Seven Dollars) per hectare of the Development Area.

E. TRAFFIC SIGNAGE AND ROAD MARKINGS

- 3.05 Before the Payment Date, the Developer shall pay to the City the Traffic Signage and Road Marking Assessment Levy of \$613.00 (Six Hundred and Thirteen Dollars) per hectare of Development Area.

F. COMMUNITY AND DISTRICT PARKS

3.06 Before the Payment Date, the Developer shall pay to the City the Community and District Parks Assessment Levy of \$5,500.00 (Five Thousand Five Hundred Dollars) per hectare of Development Area.

G. COMMUNITY AND RECREATION

3.07 Before the Payment Date, the Developer shall pay to the City the Community and Recreation Assessment Levy of \$48,794.00 (Forty-Eight Thousand Seven Hundred and Ninety-Four Dollars) per hectare of Development Area.

H. INSPECTION FEE

3.08 Before the Payment Date, the Developer shall pay to the City the Inspection Fee, in the amount of \$2,208.00 (Two Thousand Two Hundred and Eight Dollars) per hectare of the Development Area, which shall be in addition to the requirements of Paragraph 2.06 herein.

**PART IV
PLANS**

4.01 (1) The Developer, at its sole cost and expense, shall submit to the City:
(a) one copy of the tentative plan of subdivision in digital format for each subdivision application for the Lands for the City's circulation and review process; and
(b) subsequent to approval of the tentative plan of subdivision by the Approving Authority, one copy of the legal plan in digital format of the Development Area which is intended to be registered at the South Alberta Land Titles Office all to the satisfaction of the Manager, Urban Development.

(2) The Developer shall provide or obtain the consent of the copyright holder of the above noted plans in digital format, as the case may be, for the City to use the information contained therein for:
(a) internal City use, including but not limited to tri-services dispatch; and
(b) licensing the use by third parties, including but not limited to third party utility companies who require such information to service the Development Area.

4.02 The Developer shall submit to the Manager, Urban Development for his approval, preliminary Construction Drawings, in duplicate, showing all the work proposed to be done, including but not limited to:

- (1) the Oversize of any sanitary sewers, storm sewers and water mains;
- (2) extra width and base depth of roads and lanes required as approved by the Manager, Urban Development;
- (3) a proposed land use classification map indicating the land use classification of all the lots within the Development Area;
- (4) the location of test holes with logs;
- (5) contours of the highest water table;

- (6) proposed lowest top of footing elevation;
- (7) lot corner elevations;
- (8) sewer connection invert elevations at the property line, or at three and one half (3.5) metres inside the property line or at five (5.00) metres, inside the property line where the gas line and other shallow utility are located within a front yard easement for each lot where applicable;
- (9) weeping drain tile requirements;
- (10) storm drainage areas and flow calculations;
- (11) an overall overland drainage control plan to indicate the overland (emergency) escape route and/or street/lane storage to facilitate major rain storms (trapped lows); and
- (12) a building grade plan indicating, amongst other things, the suggested front grade, and in identifiable areas the established lot grade for drainage protection, those lots requiring Storm Water Impound Easement;

and any other information which the Manager, Urban Development requires as to types of material and construction.

- 4.03 Construction Drawings shall conform to the requirements in the City Specifications documents entitled "Standard Block Profile Specifications".
- 4.04 Following examination of the preliminary Construction Drawings, the Manager, Urban Development shall advise the Developer or its representative of any necessary amendments.
- 4.05 The Developer shall provide to the City at least four (4) full copies and three (3) sets of the cover sheets of the final Construction Drawings amended in accordance with the direction of the Manager, Urban Development which must all be approved by the Manager, Urban Development before the Developer may commence construction of the Infrastructure or any part thereof, unless otherwise authorized by the Manager, Urban Development in writing.
- 4.06 If during the course of construction of the Infrastructure changes in the approved Construction Drawings are requested by the Developer, the Developer shall:
 - (1) submit four (4) copies of revised Construction Drawings, or a single electronic document to the satisfaction of the Manager, Urban Development, showing the proposed changes; and
 - (2) receive the written approval of the Manager, Urban Development prior to commencing work on the revised portions of the Infrastructure.
- 4.07 The Developer, for each calendar year during the currency of this Agreement, shall furnish the Manager, Urban Development with As-built Drawings as required by the Manager, Urban Development.
- 4.08 The Developer shall submit any and all plans and information that may be required by the Manager, Urban Development with respect to the Development Area and Infrastructure required in connection therewith.

- 4.09 The Developer shall provide all building grades for each lot within the Development Area to the City until the last Final Acceptance Certificate contemplated under this Agreement has been issued, and before the final release from liability is given by the City to the Developer, all building grade slips shall be turned over to the Manager, Urban Development.
- 4.10 The Developer, as soon as possible after completion of construction of the Infrastructure and before being released from public and other liability, shall supply at its sole cost and expense to the Manager, Urban Development:
- (1) plans made on tracing linen, polyester base, or other approved material, or in an electronic format, conforming with the City requirements and standards showing the actual locations of the Infrastructure;
 - (2) profiles showing the elevations referenced to metric geodetic datum as installed by the Developer;
 - (3) all other appurtenant drawings such as outfall, special manholes, lift stations and railway crossing details, as installed by the Developer;
 - (4) profiles of all utility rights-of-way for the purpose of locating underground power, telephone, gas and cable facilities; and
 - (5) indicate and label the road grade to the lip of gutter on all profiles where curb and gutter has been installed.
- 4.11 (1) It is understood that the acknowledgement of each Final Acceptance Certificate (other than Parks) may be withheld until the As-built Drawings have been received and approved by the Manager, Urban Development.
- (2) For every additional review beyond the review of the initial submission and one re-submission of the As-built Drawings and plans or drawings required pursuant to section 4.10 above, a fee in the amount of \$125.00 will be assessed against the Developer. This fee will apply where, in the sole discretion of the Manager, Urban Development, the extra review is required as a result of the Developer's failure to provide complete and accurate submissions or the Developer's failure to address requested revisions prior to re-submission.
- 4.12 Before the City's Urban Development Division provides a clearance letter to the City's Development and Building Approvals Business Unit to facilitate the release of building permits, the Developer shall supply ten (10) copies of the Building Grade Plan to the Manager, Urban Development.
- 4.13 The cost of preparing and supplying all plans and specifications referred to herein shall be borne by the Developer.

PART V
SANITARY SEWERS

A. INSTALLATION

5.01 The Developer, at its sole cost and expense, except as otherwise provided in this Agreement, shall install and construct:

- (1) all sanitary sewers complete with manholes and other accessories, including but not limited to pipes, fittings and gaskets, within the Development Area which may, in the opinion of the Manager, Urban Development, be required to serve the Development Area and adjacent areas, whether or not in boundary lanes, roads and/or easements;
- (2) all sanitary sewer service connections within the Development Area from the sanitary sewers to:
 - (a) three and one half (3.5) metres inside the property line of each lot; or
 - (b) where the sanitary sewer service connection crosses a gas line and another shallow utility located within a front yard easement, in which case the service connection shall be installed five (5.0) metres inside the property line of each lot where the requirements for the sanitary sewer service connections are known during the time prior to the acknowledgement of the last Final Acceptance Certificate by the Manager, Urban Development for the lane or road within which the sanitary sewer service connections are to be installed; and
- (3) a sanitary sewer service connection from the sanitary sewer to the property line, to service a municipal reserve parcel (which shall not include a sanitary sewer service connection to a School Site) within the Development Area, subject to the following:
 - (a) the location and size of the sanitary sewer service connection to a community association building site will be subject to the approval of the Director, Water Resources and shall be shown on the approved Construction Drawings; and
 - (b) the Director, Parks shall provide to the Director, Water Resources the sizing calculations as necessary.

5.02 The installation of any sanitary sewer service connection from the sanitary sewer to any building on a lot within the Development Area shall be made under the supervision of a Qualified Plumber at no cost to the City.

B. OVERSIZE

- 5.03 (1) If the City requires a sanitary sewer either within or external to the Development Area to be larger than necessary to serve the Development Area:
- (a) all such Oversize sanitary sewer lines shall be designated at the time the Construction Drawings are given final approval by the Manager, Urban Development;
 - (b) the City shall pay, from the Developer Funded Infrastructure Stabilization Fund - Utility Oversize to the Developer the additional cost of such larger size pipe and accessories as approved by and in the sole discretion of the Manager, Urban Development, at prices in accordance with the Unit Rate Schedule; and
 - (c) the City shall not make any payments from the Developer Funded Infrastructure Stabilization Fund - Utility Oversize unless:
 - (i) the line is established as Oversize and approved by the Manager, Urban Development at the time of the said final approval of the Construction Drawings; and

- (ii) the internal diameter of the sanitary sewer pipe exceeds three hundred (300) mm.
- (2)
 - (a) In areas where the sanitary sewer mains are located deeper than six (6) metres, a dual sewer system may be required and the Developer will be entitled to an Oversize recovery for all mains installed at a depth of six (6) metres or more to crown of pipe;
 - (b) The dual sewer system requirement shall be determined as early as possible in the approval process; and
 - (c) The City shall pay, from the Developer Funded Infrastructure Stabilization Fund - Utility Oversize to the Developer the additional cost of the oversized portion of the mains that are located deeper than six (6) metres underground as approved by the Manager, Urban Development, at prices in accordance with the Unit Rate Schedule.

PART VI
STORM SEWERS

A. INSTALLATION

- 6.01 The Developer, at its sole cost and expense, except as hereinafter provided, shall install and construct:
- (1) all storm sewers and accessories, including but not limited to catch basins and catch basin leads (where applicable), whether or not in Boundary Roads and Lanes and/or easements, within the Development Area which may, in the opinion of the Manager, Urban Development, be required to adequately drain the Development Area and adjacent areas, including subsurface drainage;
 - (2) any inlet, storm detention facility or outfall structures with the necessary leads connected to the storm sewer to and from the Development Area as required by the Manager, Urban Development;
 - (3) all storm sewer service connections within the Development Area from the storm sewers to:
 - (a) three and one half (3.5) metres inside the property line of each lot; or
 - (b) where the storm sewer service connection crosses a gas line and another shallow utility located within a front yard easement, in which case the service connection shall be installed five (5.0) metres inside the property line of each lot where the requirements for the storm sewer service connections are known during the time prior to the acknowledgement of the last Final Acceptance Certificate by the Manager, Urban Development for the lane or road within which the storm sewer connection is to be installed;
 - (4) a storm sewer service connection, extending from the storm sewer to the property line, to service a municipal reserve parcel (which shall not include a storm sewer service connection to a School Site) within the Development Area subject to the following:
 - (a) the location and size of the storm sewer service connection to a Community Association building site will be subject to the approval of the Director, Water Resources and shall be shown on the approved Construction Drawings; and
 - (b) the Director, Parks shall provide to the Director, Water Resources the sizing calculations as necessary; and

- (5) all storm sewer service connections from the storm sewers to the property line of all commercial, multi family and church sites within the Development Area, where the requirements for the storm sewer service connections are known, or become known during the time prior to the acknowledgement of the Final Acceptance Certificate by the Manager, Urban Development for the lane or road wherein the storm sewer service connections are to be installed.

6.02 The installation of any storm sewer service connection from the storm sewer to any building on a lot within the Development Area shall be made under the supervision of a Qualified Plumber at no cost to the City.

B. OVERSIZE

- 6.03 (1) If the City requires a storm sewer within or external to the Development Area to be larger than necessary to serve the Development Area:
 - (a) all such Oversize storm sewer lines shall be designated at the time the Construction Drawings are given final approval by the Manager, Urban Development;
 - (b) the City shall pay from the Developer Funded Infrastructure Stabilization Fund - Utility Oversize to the Developer the additional cost of such larger size pipe and accessories as approved by and in the sole discretion of the Manager, Urban Development, at prices in accordance with the Unit Rate Schedule; and
 - (c) the City shall not make any payments from the Developer Funded Infrastructure Stabilization Fund - Utility Oversize unless the line is established as Oversize and approved by the Manager, Urban Development at the time of the said final approval of the Construction Drawings.
- (2) (a) In areas where the storm sewer mains are located deeper than six (6) metres, a dual sewer system may be required and the Developer will be entitled to an Oversize recovery for all mains installed at a depth of six (6) meters or more to crown of pipe;
- (b) the dual sewer system requirement shall be determined as early as possible in the approval process; and
- (c) The City shall pay, from the Developer Funded Infrastructure Stabilization Fund - Utility Oversize, to the Developer, the additional cost of the oversized portion of the mains that are located deeper than six (6) metres underground as approved by the Manager, Urban Development, at prices in accordance with the Unit Rate Schedule.

C. DRAINAGE DURING DEVELOPMENT

- 6.04 (1) During the course of construction, activity, work or development, the Developer shall, at its sole cost and expense, take all necessary measures to control the storm water run-off, sedimentation and erosion within the Development Area and to dispose of all storm water in and from the Development Area, including that which may be cut off from its natural drainage course by work occurring or which has occurred within the Development Area, all to the satisfaction of the Manager, Urban Development.
- (2) The Developer shall indemnify and save harmless the City and the owners of adjacent properties and any other parties from any losses or damage which the City or other persons or legal entities may sustain as a result of the Developer's failure to control and dispose of all storm water run-off, sedimentation and erosion in accordance with subparagraph 1.

D. WATER TABLE AND ALKALI CONTENT

- 6.05 (1) The Developer, at its sole cost and expense shall provide to the Manager, Urban Development a report from an Inspection and Testing Company identifying:
- (a) the height of the water table that might cause seepage or dampness in basements of buildings; and
 - (b) the presence of alkali in the soil which might damage the concrete in basements of buildings.
- (2) If the above referenced report concludes that the said seepage, dampness or damage to concrete may occur, the Developer shall:
- (a) in the case of a high water table, provide the necessary subsurface drainage from the property to a storm sewer system; and
 - (b) in the case of alkalinity, advise all parties erecting buildings and constructing the Infrastructure that alkali resisting materials must be used, all to the satisfaction of the Manager, Urban Development.

E. DRAINAGE CONTROL

- 6.06 The Developer shall, at its sole cost and expense, control surface drainage within the Development Area to the satisfaction of the Manager, Urban Development through:
- (1) (a) the design and construction of Surface Drainage Facilities, as required by and to the satisfaction of the Manager, Urban Development, that direct storm water to points of collection into the underground storm water collection system;
 - (b) design and construction of Surface Drainage Facilities, including but not limited to such facilities as:
 - (i) berms and grassed swales on reserve lands;
 - (ii) concrete swales, or fence and grassed swale arrangements at back of lots in laneless subdivisions; and
 - (iii) grassed swales to provide overland flow relief at trapped lows in lanes and streets;
 - (2) the provision of design details of the drainage control mechanisms;
 - (3) concrete swales at the rear of all laneless lots except where it is deemed unnecessary by the Manager, Urban Development, in which case the Developer may construct a fence and grassed swale arrangement or a rear walkway system in lieu of concrete swales; and
 - (4) the planting of grade stakes at the rear corners of the lots affected to show the elevation of the corners of the lots where concrete swales, fence and grassed swale arrangements or rear walkway system are not constructed; and
 - (5) the construction of berms and/or grassed swales, as required and subject to the approval of the Manager, Urban Development and the Director, Parks, to direct the drainage from ornamental parks and tot lots.
- 6.07 The design details of the drainage control mechanisms described in the foregoing paragraph will be subject to the approval of the Manager, Urban Development and depicted on the Construction Drawings.

6.08 When the construction of the Surface Drainage Facilities required as a condition of Subdivision or Development Permit Approval have been completed to the satisfaction of the Manager, Urban Development, and in accordance with the Drainage Bylaw, the Developer shall:

- (1) submit a Construction Completion Certificate for approval;
- (2) at its sole cost and expense, maintain the Surface Drainage Facilities, with the exception of the concrete swales, in accordance with the maintenance requirements referenced herein, including but not limited to those contained in Part XXIII (Maintenance) of this Agreement; and
- (3) rectify any and all drainage complaints until the last Final Acceptance Certificate for the Development Area is acknowledged.

6.09 It is expressly understood by the parties hereto that the Final Acceptance Certificate for Surface Drainage Facilities shall include all such facilities except the concrete swales.

F. OVERLAND DRAINAGE EASEMENT AND RESTRICTIVE COVENANT

6.10 The Developer shall, at its sole cost and expense, register an Overland Drainage Easement and Restrictive Covenant to the satisfaction of the Manager, Urban Development against all certificates of title for the Lands including that within the Development Area as determined by the Manager, Urban Development to:

- (1) permit the passage of water over the land; and
- (2) prohibit the alteration of side yard grades, rear grades and established overland drainage systems, including but not limited to emergency overland drainage facilities, concrete swales and grassed swales on each subject lot.

G. TRAPPED LOW AREAS (TEMPORARY STORM WATER STREET STORAGE)

6.11 (1) Where Trapped Low Areas are incorporated into the design of a storm water overland drainage system for the Development Area, the Developer, at its sole cost and expense and to the satisfaction of the Manager, Urban Development, shall register a Stormwater Impoundment Easement and Restrictive Covenant against all certificates of title for each of the lots adjacent to the Trapped Low Areas where the maximum depth of the storm water located in the streets and lanes is designed to be greater than 0.30 metres in depth, as shown on the building grade plan approved by the Manager, Urban Development:

- (a) permitting the collection and storage of water on such property; and
- (b) prohibiting either:
 - (i) any grading or re-grading of the lot, except in strict accordance with the building grade plan as approved by the Manager, Urban Development; or
 - (ii) the construction of any opening in the walls of any structures within any lot adjacent to the Trapped Low Areas unless such openings are higher than 0.30 metres above the maximum elevation of the said Trapped Low Areas.

- (2) Trapped Low Areas and pertinent grades shall be designed in accordance with City Specifications.

H. NOTIFICATION FOR STORM WATER POND FACILITIES

- 6.12 If Storm Water Pond Facilities are located on reserve parcels in accordance with City Council's requirements for Storm Water Pond Facilities, the Developer shall, at its sole cost and expense:
- (1) advise and clearly delineate to all potential home owners in the community in which the Development Area is located, through land use signs and marketing literature, the dual functions of the reserve lands on which the Storm Water Pond Facilities are located;
 - (2) if requested by the Manager, Urban Development, provide a copy of all Storm Water Pond Facilities literature to be made available to prospective homeowners; and
 - (3) post and maintain signs where the Storm Water Pond Facilities and overland drainage routes are located to indicate that the reserve lands serve as a dual use, the wording and location of which signs shall be to the satisfaction of both the Manager, Urban Development and the Director, Parks prior to installation.

PART VII WATER

A. INSTALLATION

- 7.01 The Developer shall, at its sole cost and expense, except as hereinafter provided:
- (1) install all water mains, valves, hydrants and fittings, pressure reducing valve chambers and appurtenances that in the opinion of the Manager, Urban Development, may be required to serve the Development Area and adjacent areas, whether or not the said water mains are in boundary lanes, roads and/or easements;
 - (2) install all water service connections within the Development Area from the water mains to:
 - (a) three and one half (3.5) meters inside the property line of each lot; or
 - (b) where the water service connection crosses a gas line and another shallow utility located within a front yard easement, in which case the service connection shall be installed five (5.0) metres inside the property line of each lotwhere the requirements for the water service connections are known during the time prior to the acknowledgement of the last Final Acceptance Certificate by the Manager, Urban Development for the lane or road within which the water service connection is to be installed;
 - (3)
 - (a) install a single one hundred and fifty (150) mm diameter water service connection and water meter box, which water meter box the City will install at no expense to the Developer, from the water main to the property line of each and every:
 - (i) Sub-neighbourhood Park, Neighbourhood Park, Community Park, District Park and community association building site; and
 - (ii) excluding all School Sites and environmental reserve lands within the Development Area;

- (b) identify the location and size of the water service connection to the Community Association building site, which shall first be approved by the Director of Water Resources and shall be shown on the Construction Drawings and plans; and
 - (c) the Director, Parks shall provide to the Director, Water Resources with the sizing calculations as necessary; and
- (4) prior to the acknowledgement of the Final Acceptance Certificate for water mains and hydrants, disconnect any temporary water service connection(s) at the water main installed for any temporary irrigation system, all to the satisfaction of the Manager, Urban Development.

7.02 The installation of any water service connection from the end of the water service connection to any building on a lot within the Development Area shall be made under the supervision of a Qualified Plumber at no cost to the City.

B. OVERSIZE

7.03 If the City requires a water main either within or external to the Development Area to be larger than necessary to serve the Development Area:

- (1) all such water mains shall be designated as Oversize at the time the Construction Drawings are given final approval by the Manager, Urban Development;
- (2) when a water main is installed between two lots in an easement or utility right-of-way, the Developer shall:
 - (a) be obligated to install a carrier and encasement pipe as specified in the Standard Specifications Waterworks Construction; and
 - (b) claim Oversize only for the carrier pipe if the pipe diameter exceeds three hundred millimetres (300 mm), as determined in the sole discretion of the Manager, Urban Development.
- (3) prior to awarding any tenders for the pressure reducing valve and chamber, the Developer shall first submit drawings, specifications and tendered documents to the Manager, Urban Development for review and approval;
- (4)
 - (a) the City shall pay, from the Developer Funded Infrastructure Stabilization Fund - Utility Oversize to the Developer, the additional cost of such larger size pipe and valves only, at prices in accordance with the Unit Rate Schedule; and
 - (b) where the installation of a pressure reducing valve and chamber is required, the City shall pay from the Developer Funded Infrastructure Stabilization Fund - Utility Oversize the full cost in accordance with the Unit Rate Schedule, including a payment of 5% for engineering and 5% for administration;
- (5) the City shall not make any payments from the Developer Funded Infrastructure Stabilization Fund - Utility Oversize for Oversize or pressure reducing valve chambers unless:
 - (a) the water main is established as Oversize and approved by the Manager, Urban Development at the time of the final approval of the Construction Drawings;
 - (b) the pressure reducing valve is designated for payment at the time of the final approval of the Construction Drawings; and
 - (c) the internal diameter of the water main exceeds three hundred millimetres (300 mm).

C. WATER FEEDER MAINS

- 7.04 (1) The City, except as hereinafter provided, shall install any water feeder mains from the existing City water mains that may lead into the Development Area as required by the Manager, Urban Development; and
- (2) the Developer shall, where possible, coordinate the installation of feeder mains with the City's Water Resources Business Unit so that the water feeder mains will be installed before surface works are undertaken within the Development Area.

D. CONNECTION TO CITY WATER SUPPLY

- 7.05 The Developer shall make arrangements with the Manager, Urban Development to have the water mains within the Development Area connected to the City water supply system, and shall pay the City charges for the said work.

E. CHARGES FOR WATER USAGE

- 7.06 (1) The water withdrawn from the water supply system shall be metered.
- (2) Water use will be charged to the Developer at the rate prescribed by the Water Utility Bylaw, 40M2006, as amended and replaced from time to time.
- (3) The Developer shall as soon as the parks water service connection to reserve parcels for irrigation purposes is installed, arrange for the installation of a water meter and shall pay to the City, on a monthly billing basis computed using the rate prescribed by the Water Utility Bylaw, 40M2006, as amended and replaced from time to time, the cost of the water used in the Development Area and irrigation of all parks located within the Development Area until such time as the Final Acceptance Certificates, as required under this Agreement, for the said parks have been acknowledged by the City.

F. CONDITION OF WATER SHUT-OFF

- 7.07 When the water supply within the Development Area, or any portion thereof, has been turned on and is being used by any third party, the Developer shall not, without the written consent of the Manager, Urban Development, shut off the water supply to any water mains or fire hydrants.

G. USE OF FIRE HYDRANTS

- 7.08 (1) Except for grading, pressure testing, disinfecting and flushing of water mains, the Developer and/or his Contractor(s) shall not use fire hydrant(s) connected to a closed zone distribution system (i.e. no reservoir on the system) to obtain water for construction purposes unless written permission has first been secured and received from the Director, Water Services.
- (2) The Developer shall endeavour to ensure that the unauthorized use of fire hydrants by all persons engaged in the construction or maintenance of the subdivision and development does not occur.
- (3) When water is withdrawn from a designated hydrant in accordance with the approval from the City's Water Services Business Unit, the Developer must use (or ensure that its Contractor uses) a hydrant connection unit (back flow meter assembly (BMA), meter

assembly (MA), back flow assembly (BA)) or approved air gap and adhere to the requirements in the Water Utility Bylaw 40M2006, as amended and replaced from time to time, and in accordance with City Specifications pertaining to waterworks construction.

H. INSTALLATION OF CATHODIC PROTECTION TEST POINTS

- 7.09 (1) The Developer, at its sole cost and expense, shall coordinate the supply and installation of a cathodic protection test point where a metallic water system crosses or parallels a major foreign pipeline; and
- (2) the test point shall have leads connected, in a manner approved by the Director, Water Resources to the foreign pipeline and the water system.

I. WATER SUPPLY – RELEASE OF BUILDING PERMITS

- 7.10 The Developer shall ensure that the infrastructure facilitating water supply to the Lands is installed and functional prior to requesting the release of a building permit for any building to be serviced by the same.

PART VIII **STREETS AND AVENUES**

A. CONSTRUCTION

- 8.01 The Developer, at its sole cost and expense, except as hereinafter provided, shall construct all streets and avenues within the Development Area, including all Boundary Roads and Lanes and roads abutting on or adjacent to all reserve parcels and other lands dedicated to the City for public use, to the width and depth of materials which the Manager, Urban Development may require to serve the Development Area and adjacent areas.
- 8.02 The Developer, at its sole cost and expense, shall rough grade with cuts and fills, the ground surface of all said roads and streets to finished elevation before excavating for any finished surface.
- 8.03 The Developer, at its sole expense, shall:
- (1) construct the temporary public oiled and gravelled turnabouts, which shall also include turnabouts for transit and school buses where required by the Manager, Urban Development, all of which shall be shown on the Construction Drawings; and
- (2) maintain all the temporary public oiled and gravelled turnabouts including the transit and school bus turnabouts until such time as the permanent construction of the roadways takes place on which the temporary public oiled and gravelled turnabouts are located or until such other time as determined by the Manager, Urban Development in his sole discretion.

B. OVERSIZE

- 8.04 Where a roadway is required by the Manager, Urban Development to be a divided Major Road Standard in the case of residential roads and an undivided Major Road Standard in the case of industrial roads, then the cost of the additional width and depth or equivalent construction

design shall be borne by the City and the City shall pay from the Developer Funded Infrastructure Stabilization Fund – Major Road Standard Oversize to the Developer the cost of such extra width and depth at prices in accordance with the Unit Rate Schedule.

- 8.05 Where roads adjacent to Major Regional Parks (including major athletic parks, municipal golf courses, natural open spaces and water areas) are less than a Major Road Standard and a road wider than required pursuant to City Specifications is required by the City, then the City shall pay to the Developer the difference in cost between the width of the carriageway constructed, and the cost of the road required.
- 8.06 Where a roadway is required by the Manager, Urban Development to be a divided Primary Collector standard or a divided Entrance Road Standard, Oversize shall not be payable.

C. BOUNDARY

- 8.07 Where roads adjacent to Major Regional Parks (including major athletic parks, municipal golf courses, natural open spaces and water areas) are constructed to a Major Road Standard, the City shall pay to the Developer, in addition to any oversize as provided within this Part, the cost of the boundary portion of the carriageway adjacent to the said Major Regional Parks.

D. SOIL INSTABILITY

- 8.08 Where on account of instability of the soil it is necessary, in the opinion of the Manager, Urban Development, to provide a greater depth of base for the road, the Developer, at its sole cost and expense, shall excavate, supply gravel for or replace with other suitable fill.

E. INSTALLATION OF TRAFFIC CONTROL DUCTS

- 8.09 The Developer, to the satisfaction of the Director, Roads, shall install the traffic control ducts, as shown on the Construction Drawings approved by the Manager, Urban Development, in accordance with the City's Traffic Signal Construction Specifications, and the Developer, shall be entitled to recover the full cost thereof, at prices in accordance with the Unit Rate Schedule, when the work has been certified as complete by the Consulting Engineer and acknowledged by the City.

F. ACCESS ROADS

- 8.10 (1) (a) The Developer is required to maintain to the satisfaction of the Manager, Urban Development any hard surfaced or gravelled access roads, including periodic oiling, into the Development Area until the Final Acceptance Certificate for paved roads, paved lanes and paved walkways has been issued, or as otherwise required by the Manager, Urban Development.
- (b) Prior to release from this maintenance requirement by the City, the Developer, if required by the Manager, Urban Development, shall rebuild or reinstate the said access roads to a condition satisfactory to the Manager, Urban Development or as otherwise set out under the Special Clauses Agreement.
- (2) If required, access roads referred to in subparagraph 1 shall be as indicated in the Special Clauses Agreement.

PART IX
LANES AND WALKWAYS

A. CONSTRUCTION

9.01 The Developer, at its sole cost and expense, except as hereinafter provided, shall:

- (1) grade to the standard cross section and profile approved by the Manager, Urban Development and construct all lanes and walkways within the Development Area to the width and depth of the materials which the Manager, Urban Development may require to serve the Development Area and adjacent areas, including all boundary lanes and walkways, and lanes and walkways abutting, or adjacent to reserve parcels and other lands dedicated to the City for public use;
- (2)
 - (a) construct a gravel base to residential road standards on those sections of the lane within the Development Area so designated at the time of approval of the Construction Drawings and plans by the Manager, Urban Development, in order to prevent erosion; and
 - (b) the City will undertake to complete the asphalt priming and surfacing at its own expense when considered necessary by the Manager, Urban Development;
- (3) rough grade with cuts and fills, the ground surface of all lanes and walkways, including side sloping, to within one hundred and fifty (150) mm of design grade before the installation of any underground shallow utilities;
- (4)
 - (a) grade, gravel and pave all public pathways and walkways within the Development Area that are not intended for use by vehicular traffic and shall block off or construct the ends thereof in such a manner as to prevent their use by vehicular traffic; and
 - (b) the Developer shall ensure that the paved surfaces of such public pathways and walkways are left thoroughly compacted and smooth;
- (5) provide concrete steps, landings and metal handrails in any of the aforementioned public ways, narrow lanes or walkways where the Manager, Urban Development deems it necessary;
- (6) compaction requirements in any gravelled lanes shall be no less than 95% of the Standard Proctor Density (with 98% of the Standard Proctor Density preferred) with two (2) tests per hundred (100) metre length, the first of which shall be taken halfway up the utility trench, and the second shall be taken 0.30 of a metre below the finished surface grade;
- (7)
 - (a) construct the temporary public oiled and gravelled lane turnabout(s), as shown on the Construction Drawings; and
 - (b) the Developer, at its sole expense, shall maintain all the temporary public oiled and gravelled lane turnabout(s) until such time as the permanent lanes(s) are constructed over the temporary public oiled and gravelled lane turnabout(s), or until such other time as determined by the Manager, Urban Development.

B. RESTRICTIVE COVENANTS

- 9.02 (1) In laneless subdivisions where public sidewalks or pathways are located within an easement, the Developer shall execute and register on all relevant certificates of title to the satisfaction of the Manager, Urban Development, prohibiting the construction of fences and other structures within the boundaries of the easement to ensure that the right of pedestrian passage is not interfered with on the said public sidewalks and pathways.
- (2) The Developer shall execute and register on all relevant certificates of title, to the satisfaction of the Manager, Urban Development, a Restrictive Covenant prohibiting the construction of driveways and vehicle accesses over a bus loading area where the upright curb is located within the bus zone.

PART X
SIDEWALKS, CURBS AND GUTTERS

A. CONSTRUCTION

- 10.01 The Developer, at its sole cost and expense except as hereinafter provided, shall construct:
- (1) all sidewalks, curbs and gutters, concrete pedestrian bus stop aprons, and catch basins and leads, within the Development Area, including those along the boundary of the Development Area and those abutting, on or adjacent to reserve parcels and other lands dedicated to the City for public use, in accordance with City Specifications, which the Manager, Urban Development may require to serve the Development Area and adjacent areas;
- (2) (a) all required driveways over sidewalks and related work in connection therewith, including curbs, gutters and approach aprons, prior to the acknowledgement of the Final Acceptance Certificate; however, the Developer shall not be liable for the construction costs of the driveways approved, or constructed, after the acknowledgement of the Final Acceptance Certificate for sidewalks, curbs and gutters; and
- (b) the Developer shall obtain approval from the Manager, Urban Development for all driveways constructed prior to the acknowledgement of the said Construction Completion Certificate, and obtain approval from the Director, Roads for all driveways constructed thereafter; and
- (3) the concrete pedestrian bus stop aprons on roads at those locations designated by the Director, Roads on the Construction Drawings and plans approved by the Manager, Urban Development.

B. BOUNDARY

- 10.02 Where roads adjacent to Major Regional Parks (including major athletic parks, municipal golf courses, natural open spaces and water areas) are constructed to a major thoroughfare category, the City shall pay to the Developer the full cost of the sidewalk, curb and gutter, including catch basins and leads, constructed adjacent to the said Major Regional Parks.

C. SCHOOL SITES

- 10.03 (1) (a) Where a School Board commits, prior to the signing of the Special Clauses Agreement, to the construction within two (2) years of the execution of the Special Clauses Agreement of a school on a particular site in the Development Area, the Developer, at its sole cost and expense, and at no cost or expense to the City or the School Board, shall install or construct the sidewalks as required by the Manager, Urban Development on two sides of the School Site; and
- (b) if this commitment is not fulfilled by the School Board within the two (2) year period, the Developer shall be entitled to recover the full cost of these sidewalks from the City at prices in accordance with the Unit Rate Schedule.
- (2) (a) If the Developer chooses not to build the sidewalk as contemplated in Subparagraph (1), it shall have the option to deposit the sum as indicated in the Special Clauses Agreement, as full settlement of the cost of constructing the said sidewalks; and
- (b) if the School Board does not fulfil the commitment, as outlined in the preceding Paragraph, the City shall refund the full amount of the said deposit to the Developer, with no interest or carrying charges payable by the City.

PART XI
FENCING

- 11.01 (1) The Developer, at its sole cost and expense, and to the satisfaction of the Manager, Urban Development, shall construct a wooden screening fence or a sound attenuation fence, if required, of uniform height and design, within the property line of the double frontage lots within the Development Area, where the said double frontage lots abut a roadway constructed to a major thoroughfare category, or lower standard.
- (2) Where it is determined by the Manager, Urban Development that sound attenuation fencing is required to be constructed within the Development Area adjacent to an expressway or freeway, the Developer shall construct the sound attenuation fence to the height and design, as approved by the Manager, Urban Development, inside the property line of the double frontage lots and on the property line of the road and lane rights-of-way where the double frontage lots and the road and lane rights-of-way abut the expressway or freeway, and the Developer shall be entitled to recover a portion of the cost thereof, based on the cost equivalent of constructing a 1.80 metre high chain link fence, at prices in accordance with the Unit Rate Schedule, when the work has been certified as complete.
- (3) Where it is determined by the Manager, Urban Development that sound attenuation fencing is not required to be constructed adjacent to an existing or proposed expressway or freeway, the Developer shall then be required to construct either a wooden screening fence or 1.80 metre high chain link fence, as approved by the Manager, Urban Development, inside the property line of the double frontage lots where the double frontage lots abut the existing or proposed expressway or freeway, and the Developer shall be entitled to recover a portion of the cost thereof, based on 50% of the cost equivalent of constructing a 1.80 metre high chain link fence, at prices in accordance with the Unit Rate Schedule, when the work has been certified as complete.

- (4) Where it is determined by the Manager, Urban Development that only a 1.80 metre high chain link fence is required to be constructed on the property line of a public road and/or lane which abuts an expressway or freeway, the Developer shall construct the 1.80 metre high chain link fence and the Developer shall be entitled to recover the full cost thereof at prices in accordance with the Unit Rate Schedule, when the work has been certified as complete.
- (5) In the event that the Developer chooses and receives approval from the Manager, Urban Development to construct a screening fence in place of the 1.80 metre high chain link fence required under the preceding subparagraph, the Developer shall not be entitled to any cost recovery for the construction of the screening fence.
- (6) The Developer, at its sole cost and expense and to the satisfaction of the Manager, Urban Development and the Director, Parks, shall construct a fence inside the property line of all residential lots, multi-family lots and/or commercial lots where they abut any municipal reserve parcels, school reserve parcels, environmental reserve parcels and/or public utility lots.
- (7) The Developer, at its sole cost and expense and to the satisfaction of the Manager, Urban Development and the Director, Parks, shall construct a post and cable fence on the property line of any lanes where they abut any municipal reserve parcels, school reserve parcels, environmental reserve parcels and/or public utility lots.
- (8) The Developer, at its sole cost and expense and to the satisfaction of the Manager, Urban Development, shall construct a fence inside the property line of all residential lots, multi-family lots and /or commercial lots where they abut any walkways.

PART XII

STRIPPING AND ROUGH GRADING

12.01 Only the Development Area shall be stripped and rough graded.

12.02 Prior to the commencement of stripping and rough grading of the Development Area, the Developer shall:

- (1) submit for approval by the individual appointed to the position of Subdivision Inspector of the Urban Development Division the following items:
 - (a) two (2) copies of the cut and fill plans identifying those areas with more than two metres of fill;
 - (b) a Deep Fills Report for those areas being filled more than two metres deep, containing recommendations on any development restrictions, including but not limited to bearing certificates, special foundation designs, that may be necessary to ensure the integrity of any structure constructed on fill areas, including but not limited to buildings, roads and utilities;
 - (c) two (2) copies of an Erosion and Sediment Control Report;
 - (d) a letter from the Developer stating that all affected utility companies have been contacted regarding the relocation or disposition of that utility;
 - (e) plans showing details of edge conditions and/or backsloping requirements and areas to be reloaded, seeded and maintained until natural conditions occur;
 - (f) a list identifying the owners of all lands and all parties having an interest in underground utility easements located on those lands, that will be affected by proposed stripping and grading;

- (g) written documentation from those affected parties, including from Calgary Roads where City road rights-of-way are involved, giving permission to access and/or work on such affected lands or easements; and
 - (h) where the stripping and grading boundary abuts other property owners, or affects road rights-of-way or underground utility easements, cross sections must be submitted;
 - (i) a plan showing the location where stripped loam will be stock piled, the location of which shall be outlined in green on the plan attached to the Erosion and Sediment Control Report;
 - (j) a letter from the Director, Parks and/or the School Board affected (where applicable) approving the location of the loam stock pile on a Municipal Reserve, School Reserve or Municipal School Reserve site, as contemplated in the *Municipal Government Act*, and outlining any conditions that may be required; and
 - (k) a letter from the Director, Roads approving the stockpiling of loam on interchange areas, or grading adjacent to existing or proposed roadways, and outlining other required conditions.
- (2) install all erosion and sediment control features, which shall be inspected, maintained and repaired regularly and as necessary, in accordance with the Erosion and Sediment Control Report and to the satisfaction of the Manager, Urban Development;
 - (3) ensure that water trucks are on site with sufficient frequency to control dust within the Development Area to the satisfaction of the Manager, Urban Development;
 - (4) submit a copy of the approval by the Province of Alberta for any stripping and grading encroachments within a Transportation and Utility Corridor as per the Provincial Transportation Utility Corridor policy;
 - (5) notify the individual appointed by the City as the Subdivision Inspector of the Urban Development Division twenty four (24) hours in advance of commencing the stripping and grading operations and arrange a site meeting with the Consulting Engineer and Contractor;
 - (6) notify the Manager, Urban Development of the use of any hard surfaced or gravelled road to be used as an access road;
 - (7) where applicable, erect fencing and provide other measures satisfactory to the Director, Parks to ensure the stripping and grading does not encroach into any land designated as Environmental Reserve; and
 - (8)
 - (a) execute the Special Clauses Agreement; or
 - (b) obtain written consent from the Manager, Urban Development to commence stripping and grading operations prior to the execution of the Special Clauses Agreement.
- 12.03 The Developer must contact 311 to make arrangements with Water Services for water supply, including but not limited to backflow prevention and water hydrant usage during the stripping and grading process.
- 12.04 The Developer, at its sole cost and expense, shall erect "Private Property" and "No Trespassing" signs on the perimeter of the Lands, stating the Developer's name and the phone number of a representative.

- 12.05 (1) Any and all loam stock pile(s) created in connection with the stripping and grading of the Development Area shall be neat in appearance, free from any hazardous condition, treated to prevent soil erosion from wind and rainfall, be posted with signs prohibiting dumping and designating the Lands as "Private Property", "No Trespassing" and "No Unauthorized Personnel Beyond this Point", all to the satisfaction of the Manager, Urban Development; and
- (2) details of loam stock piles including height, width, length and volume shall be submitted to the individual appointed by the City as the Subdivision Inspector of the City's Urban Development Division.
- 12.06 The Developer shall be responsible for controlling noxious weeds as contemplated in the *Weed Control Act*, RSA 2000, c.W-5, as amended.
- 12.07 (1) Any and all loam stock pile(s) created in connection with the stripping and grading shall be removed by the Payment Date, unless an extension of time is granted in writing by the Manager, Urban Development prior to the said date; and
- (2) extension applications must be requested in writing thirty (30) days prior to the Payment Date of this Agreement or the request will be automatically denied and removal procedures will be initiated.
- 12.08 No grading, filling or excavation is permitted within utility and road rights-of-way, under any overhead utility lines, or over any underground utilities, unless prior written authorization has been obtained from the utility agencies or City Business Units concerned.
- 12.09 The Developer shall submit modifications to the Erosion and Sediment Control Drainage Plans and Erosion and Sediment Control Report that may be necessary from time to time for various reasons, including but not limited to development of portions of the Development Area or adjacent lands, or drainage and/or erosion control facilities that may require rerouting or redesigning.
- 12.10 The Developer, at its sole cost and expense, before, during and after the stripping and grading and development of the Development Area, shall fulfill the obligations contained in the City Specifications regarding the control and disposal of all storm water in and from the Development Area and storm water which may be cut off from its natural drainage route by the development, including but not limited to inlet protection to any adjacent storm water sewer system.
- 12.11 The Developer shall employ appropriate measures in accordance with but not limited to the requirements contained in both the Erosion and Sediment Control Report and the City's Guidelines for Erosion and Sediment Control, as amended and replaced from time to time, best management practices and to the satisfaction Manager, Urban Development to control any dust, particularly in the vicinity of highways or occupied dwellings, to ensure traffic safety and minimize dust nuisance complaints from the public, and to minimize drainage, soil erosion, soil instability and other problems arising from stripping, rough grading, associated loam stock pile and all operations related thereto.
- 12.12 If during stripping and grading operations or any other construction within the Development Area, the applicant, owner of the development site, or any of their agents or contractors become aware of any contamination:

- (1) the Developer shall ensure that any person discovering such contamination shall forthwith report the contamination to Alberta Environmental Protection, Calgary Health Region and the Director, Environmental Management.
- (2) the Developer, prior to the release of any building permits, shall submit a Phase 2 Environmental Site Assessment acceptable to Alberta Environmental Protection, Calgary Health Region and the Director, Environmental Management.
- (3) if required to do so by Alberta Environmental Protection or Calgary Health Region or the Director, Environmental Management, the applicant shall submit to Alberta Environmental Protection or Calgary Health Region or the Director, Environmental Management, a remediation plan or risk management plan (Phase 3 ESA), acceptable to Alberta Environmental Protection or Calgary Health Region or the Director, Environmental Management.
- (4) Before the City's Urban Development Division provides a clearance letter to the City's Development and Building Approvals Business Unit to facilitate the release of Building Permits, the Developer shall submit to the Manager, Urban Development, a letter, in a form satisfactory to the Manager, Urban Development, certifying that the physical components identified in the Phase 3 ESA have been installed.

12.13 If the Developer encroaches into the adjacent land during the stripping and grading of the Development Area, the Developer, at its sole expense, shall rehabilitate the adjacent lands to the satisfaction of the adjacent land owners immediately after cessation of use of the adjacent land.

12.14 The Developer, at its sole cost and expense, and to the satisfaction of the Manager, Urban Development, shall rehabilitate in a timely manner any offsite areas or operations, storm water runoff, soil erosion, soil instability, sedimentation, dust or other problems which may arise from the stripping and grading, and shall employ the use of gravel pads to curb dirt, mud or other debris from being tracked out onto any streets located within and adjacent to the Development Area and reduce or stop activity when the site has excessive dust emissions in the sole opinion of the Manager, Urban Development.

12.15 A Stripping and Rough Grading Compaction Report shall be submitted by the Consulting Engineer to the Manager, Urban Development certifying that rough grading is in compliance as set out in the Consulting Engineer's Field Services Guidelines.

12.16 (1) The Developer shall provide written notification to the Manager, Urban Development that all septic systems, including but not limited to fields, tanks and water wells located within the Development Area have been decommissioned to the satisfaction of the Manager, Urban Development and that the impacted areas have been rehabilitated and are suitable for the intended use.

(2) In the event that any septic systems, including but not limited to fields and tanks and water wells, located within the Development Area have not been decommissioned, the Developer shall provide written notification to the Manager, Urban Development indicating why they have not been decommissioned and when they will be decommissioned in the future.

PART XIII
TRANSPORTATION AND UTILITY CORRIDORS

13.01 If the community in which the Development Area is located is adjacent to a Transportation and Utility Corridor, the Developer, at its sole cost and expense and to the satisfaction of the Director, Development and Building Approvals, shall install and maintain the temporary signs at the entrances to the community that are both required by and in accordance with the Transportation and Utility Corridor (T.U.C.) Signage Policy.

PART XIV
LANDSCAPING OF RESERVE PARCELS, PUBLIC UTILITY LOTS, STREETS AND AVENUES
AND UNDERGROUND IRRIGATION

A. GRADING, LOAMING AND SEEDING

- 14.01 The Developer, at its sole cost and expense, except as hereinafter provided shall:
- (1) grade, loam and seed to grass to the satisfaction of the Director, Parks and in conformity with the Park Specifications, all:
 - (a) sub-neighbourhood parks;
 - (b) linear parks;
 - (c) public utility lots;
 - (d) boulevards;
 - (e) medians;
 - (f) traffic islands with a minimum five hundred (500) square metres in area;
 - (g) Public Utility Lots located adjacent to Municipal Reserve specifically for shallow utility infrastructure;
 - (h) those portions of the Neighbourhood, Community and District Parks that are designated by the City's Parks Business Unit as decorative parks, ornamental parks and tot lots; and
 - (2) ensure that the grass is well established and in a vigorous growing condition after the first cutting after germination, to the satisfaction of the Director, Parks.
- 14.02 Notwithstanding anything contained herein, the Developer shall:
- (1) construct all Neighbourhood, Community and District Parks, and associated amenities, required as a condition of Subdivision Approval in accordance with the Park Specifications; and
 - (2) use the Conceptual Site Plan approved at the time of the Outline Plan as a guide to prepare construction plans for the said parks.
- 14.03 The Final Acceptance Certificate for Community and District Parks shall be submitted to the City no later than:
- (1) at least one full year prior to occupancy of a school located on the park;
 - (2) when thirty (30) percent of the lots or projected lots located within all lands located within 1.2 kilometres from the property line of the said Community and District Park, as

the case may be, have building permits released and the community has made a formal written request to the Director, Parks to develop the said park;

- (3) when the City requires the said Community and District Parks for municipal purposes; or
- (4) September 30th in the year in which the Community and District Parks are constructed.

14.04 Neighbourhood and Sub-neighbourhood Parks are to be completed to the satisfaction of the Director, Parks once fifty (50) percent of the lots adjacent to the said parks have building permits released.

14.05 The Developer shall ensure that any fill material placed on reserve parcels is placed in a workmanlike manner, including:

- (1) the removal of loam prior to the placement of the fill material; and
- (2) all fill materials and the compaction of all fill materials placed in those areas that can be identified as potential building sites by the City's Joint Use Coordinating Committee.

14.06 The Developer shall be entitled to cost recovery of the minimum landscape development activities as defined in the Park Specifications for Community and District Parks, including amenities, at prices in accordance with the Unit Rate Schedule upon acknowledgement of the relevant Construction Completion Certificate.

14.07 The Developer, at its sole cost and expense shall ensure that prior to the acknowledgement of the respective Construction Completion Certificate, all items referenced in paragraph 14.01 are maintained in a "weed free" condition, all to the satisfaction of the Director, Parks.

B. UNDERGROUND IRRIGATION AND POWER SUPPLY

14.08 The Developer, at its sole cost and expense shall:

- (1) install water service and underground irrigation in all Sub-neighbourhood Parks, Linear Parks and only those portions of the Neighbourhood, Community and District Parks which are designated in accordance with the Park Specifications; and
- (2)
 - (a) provide a 110 volt, 30 ampere power supply for all Sub-neighbourhood Parks, Linear Parks, Neighbourhood Parks and Community and District Parks within fifteen (15) metres of the parks water service in accordance with the *Safety Codes Act*, R.S.A. 2000, c.S-1, as amended from time to time and the Park Specifications; and
 - (b) in the case of Sub-neighbourhood Parks and Linear Parks, other types of power supply may be used subject to the approval of the Director, Parks.

C. OPTIONAL SUBDIVISION AMENITIES

14.09 The Developer, at its option, may construct or install Optional Subdivision Amenities in reserve parcels, streets, avenues rights-of-way located within the Development Area, at the locations, to the specifications and subject to any conditions approved by the Approving Authority.

D. ENVIRONMENTAL RESERVES (PROTECTION AND FENCING)

14.10 The Developer, at its sole cost and expense shall:

- (1) (a) prior to the approval for stripping and rough grading of the Development Area, erect a temporary fence on the property lines of all environmental reserves within or adjacent to the boundaries of the Development Area, and the Developer shall continuously maintain the said temporary fence until the final grading and landscaping of the adjacent land is completed, at which time the fence shall be removed by the Developer; and
- (b) erect temporary fencing in the working easement of a utility easement (being the area inside of the utility easement in which the Developer is authorized to work) that is located within land designated as Environmental Reserve when the work is being undertaken in a utility easement;
- (2) grade, loam, seed and rehabilitate to the satisfaction of the Director, Parks, the portions of any environmental reserve that is disturbed as a result of activity undertaken in connection with this Agreement;
- (3) ensure that the proposed grades of the Development Area are compatible with the existing grades of all lands designated as Environmental Reserve, to the satisfaction of the Manager, Urban Development;
- (4) institute erosion control measures, satisfactory to the Manager, Urban Development, to protect land designated as Environmental Reserve taking into account the surrounding topography; and
- (5) keep all lands designated as Environmental Reserve clean of construction debris on an ongoing basis.

E. LOAM STOCKPILING

- 14.11 (1) The Developer may stockpile loam which has been removed from land within the Development Area or land external to the Development Area upon or within which Infrastructure will be constructed as contemplated in this Agreement:
- (a) on a reserve parcel after receipt of written approval from the Director, Parks, provided that it is in accordance with such approval; and
 - (b) on land owned by the Developer within the Development Area after receipt of written approval of the Manager, Urban Development, provided that it is in accordance with such approval.
- (2) In addition to any conditions or obligations imposed by the Director, Parks or the Manager, Urban Development, in connection with an approval contemplated in subparagraph (1) above, the Developer, at its sole cost and expense, shall erect signs around the lands upon which the loam is stockpiled to indicate that the dumping and storage of other materials is prohibited.
- (3) (a) Subject to subparagraph 14.11(5) below, a loam stockpile located on a reserve parcel within the Development Area may remain on the said land for a maximum of two (2) years from the date of this Agreement, after which the time period may be extended in writing by the Manager, Urban Development, after having consulted with the Director, Parks if the land in question is required for municipal purposes, until the City desires to use the said land or portions thereof for municipal purposes.

- (b)
 - (i) Following the expiration of the two (2) year period, or extension granted pursuant to subparagraph (a) above, the Director, Parks shall notify the Developer in writing of the termination of the Developer's right to stockpile loam on the said land; and
 - (ii) the Developer shall, at its sole cost and expense, remove such loam stockpile within six (6) months from the date of receipt of such written notice from the Director, Parks.
- (4)
 - (a) Subject to subparagraph 14.11(5) below, a loam stockpile located on land owned by the Developer within the Development Area may remain on the said land for a maximum of three (3) years from the date of this Agreement, after which time the period may be extended until the Manager, Urban Development, in his sole discretion, notifies the Developer in writing of the termination of the consent to maintain the loam stockpile on the said land.
 - (b)
 - (i) Following the expiration of the three (3) year period, or extension granted pursuant to subparagraph (a) above, the Manager, Urban Development may notify the Developer in writing of the termination of the Developer's right to stockpile loam on the said land; and
 - (ii) the Developer shall, at its sole cost and expense, remove such loam stockpile within six (6) months from the date of receipt of such written notice from the Manager, Urban Development .
- (5)
 - (a) If the Director, Parks or the Manager, Urban Development, as the case may be, determines, in his or her sole opinion, that any such loam stockpile referenced herein is not being operated or maintained:
 - (i) in compliance with the terms or conditions of the written approval given by him relating to such loam stockpile; or
 - (ii) in compliance with the terms or conditions of this Agreement, he may notify the Developer to take such remedial action as he deems necessary to remedy or correct such non-compliance within a specified period of time as he deems appropriate in his or her sole discretion.
 - (b) Upon the failure, neglect or refusal of the Developer to comply with any such notice, or in the event that a hazardous condition exists requiring immediate action (in which case no notice to the Developer shall be required to be given), the City may, but shall not be obliged to perform or cause to be performed any remedial, corrective or immediate action deemed necessary in the sole opinion of the Director, Parks or the Manager, Urban Development including, but not limited to removal of the loam stockpile, without any notice to and at the sole cost of the Developer.
- (6) If the City removes any loam stockpile pursuant to the terms of this Agreement, it shall:
 - (a) have the right, but not the obligation, to store or market and sell the loam or any portions thereof, in any manner and at any price or prices as may be determined in the sole discretion of the Director, Parks or the Manager, Urban Development, as the case may be;
 - (b) be entitled to recover any and all costs and expenses as may be incurred with the removal, storage, management, maintenance, marketing or sale of such loam, and any and all other costs and expenses as may, from time to time, be outstanding from the Developer in respect of the obligations of the Developer under this Agreement; and
 - (c) such proceeds as may be obtained in excess of the City's aforementioned costs and expenses shall be credited to the account of the Developer, and set off against any of the Developer's outstanding debts to the City.

- (7) For clarity, the parties agree that the Developer's indemnification contained in Part XX (Indemnification) of this Agreement shall apply to any and all claims, losses, liabilities, actions, demands, damages, causes of actions, interest, legal fees, legal or administrative proceedings, suits, costs and expenses of whatsoever kind or nature, which may be brought against or incurred by the City or its employees by any person or persons for injury, loss or damage whether personal or to property arising directly or indirectly out of the creation, removal, maintenance or existence of any loam stockpile, or the Developer's operations, acts or omissions relating thereto.
- (8) The Developer shall, in accordance with the *Municipal Government Act* and the City of Calgary Land Use Bylaw 1P2007, as amended, submit and obtain approval of a Development Permit application for any stripping of loam operations or stockpiling of any loam intended to be performed or located on any land outside of the Development Area prior to commencing any operations relating to such stripping or loam stockpiling.

F. URBAN FOREST MANAGEMENT (TREE PLANTING)

14.12 The Developer, at its sole cost and expense shall

- (1) plant all trees within the Development Area in conformity with the Tree Planting Guidelines and the Urban Forest Management Policy using the one tree per two lot formula and giving first priority to the planting of trees on public lands; and
- (2) plant all trees on public land within the Development Area in conformity with Park Specifications, the Tree Planting Guidelines and the Urban Forest Management Policy.

PART XV

STREET LIGHTING, WALKWAY LIGHTING AND RESERVE PATHWAY LIGHTING

- 15.01 Prior to the installation of any street, walkway or reserve pathway lighting required pursuant to conditions of subdivision or development permit approval, the Developer shall determine whether it will retain a private third party or the City to carry out the installation, and shall notify the City of its decision within eight (8) weeks of the desired installation date.
- 15.02 Where the Developer arranges for a private third party to design and install any street, walkway or reserve pathway lighting, it shall do so in accordance with the following, all at the Developer's sole cost and expense, unless otherwise provided:
- (1) make its own arrangements satisfactory to the Director, Roads, including approval of the electrical consultant to be used, to design and install the street, walkway and reserve pathway lighting in accordance with City Specifications;
 - (2) install all street, walkway and reserve pathway lighting (including all walkways and paved pathways located on reserve parcels forming part of the pedestrian element of the City's overall transportation network) within the Development Area, along all boundary roads and roads abutting or adjacent to all reserve parcels and other lands dedicated to the City for public use, which may be, in the opinion of the Manager, Urban Development, required to serve the Development Area and within offsite areas as required as a condition of subdivision or development approval or otherwise required by this Agreement;

- (3) prior to the commencement of installation of all street, walkway and reserve pathway lighting, the Developer shall forward the proposed design and construction drawings to the Director, Roads and obtain his approval, along with confirmation from the City's Community Services and Protective Services Business Unit of the location of pathways located on reserve land;
- (4) provide temporary street, walkway and reserve pathway lighting wherever new roadways transition to the existing roadway where future traffic signals will be installed, all of which may be beyond the boundary of the Development Area;
- (5) survey and stake the location of the lights on streets, walkways and reserve pathways according to the construction drawings approved by the Director, Roads;
- (6) where non-standard street, walkway and reserve pathway lighting is chosen by the Developer, the Developer shall select the lighting style from the City's Roads Business Unit's approved list of non-standard street, walkway and reserve pathway light types;
- (7) ensure that the grade along the street light, walkway light and reserve pathway light routes is within one hundred and fifty (150) mm of the final grade shown on the construction drawings approved by the Director, Roads; and
- (8) after the installation of the street, walkway and reserve pathway lighting poles, establish and maintain the grade to ensure that the landscaping is a minimum of one hundred and fifty millimetres (150mm) within a tolerance of fifty millimetres (50 mm) between the top of the concrete base of the poles and grade, all in accordance with City Specifications.

15.03 When the Developer requests the City to install the required street lighting, walkway or reserve pathway lighting within the Development Area, in addition to the obligations contained in paragraphs 15.02(2) through (8) inclusive, it shall proceed in accordance with the following:

- (1)
 - (a) submit to the City's Roads Business Unit, in a form satisfactory to the Director, Roads copies of the approved tentative plan of subdivision (in the case of a Subdivision Approval), the sidewalk and water cover sheets, plans depicting the location of Shallow Utilities, building grade plan and any other documents determined relevant by the Director, Roads;
 - (b) in no case shall the plans referred to in subparagraph (a) be submitted less than eight (8) weeks prior to the start of construction of the electrical distribution or street, walkway or pathway lighting systems;
 - (c) following receipt of these plans, the City shall provide the Developer with a plan showing the proposed street, walkway and reserve pathway lighting system and estimated cost (including additional costs for non-standard street, walkway and reserve pathway lighting)
 - (d) should the installation of street, walkway and/or reserve pathway lighting be installed in frozen ground conditions, and is agreed to mutually between the developer and the Director, Roads, a cost estimate will be provided for the additional costs which will include frost ripping; and
 - (e) the cost estimated for the design and installation of the street, walkway and reserve pathway lighting shall be valid for thirty (30) days or as mutually agreed to in writing between the Developer and the Director, Roads.
- (2) work with representatives from the City's Roads Business Unit and other utilities and agencies to coordinate the design and construction of street lighting in a cooperative, timely and efficient manner;

- (3) notify the Director, Roads to construct street lighting at least four (4) weeks prior to the completion of eighty five (85) percent of the sidewalks, curbs, gutters and pavement;
- (4) survey and stake the location of the lights on streets, walkways and reserve pathways according to the construction drawings approved by the Director, Roads;
- (5) ensure that the grade along the street light, walkway light and reserve pathway light routes is within one hundred and fifty (150) mm of final grade shown on the construction drawings approved by the Director, Roads;
- (6) after the installation of the street, walkway and reserve pathway lighting poles, establish and maintain the grade to ensure that the landscaping is a minimum of one hundred and fifty millimetres (150mm) between the top of the concrete base of the poles and grade, all in accordance with City Specifications.
- (7) at least ninety (90) days before construction of street lighting is required on any Major Road Standard, the Developer shall notify the Director, Roads in writing in order that the street lighting can be designed and the installation scheduled;
- (8) the City's Roads Business Unit will erect the street light units, as soon as practicable, following the completion of eighty five (85) percent of the sidewalks, curbs, gutters and pavement;
- (9) (a) with respect to the payment for street, walkway and reserve pathway lighting the Developer shall:
 - (i) pay the Director, Roads the full cost referred to in paragraph 15.03(1)(c) above prior to the commencement of installation; or
 - (ii) complete a credit application and pay a deposit of twenty five percent (25%) of the total estimated cost referred to in paragraph 15.03(1)(c) above prior to the commencement of installation, or provide another form of payment security in a form acceptable to the City's Roads Business Unit in lieu of the twenty five percent (25%), and the remainder of the estimated cost shall be invoiced by the City to the Developer at the substantial completion of the job with any additional cost as described in paragraph 15.03(1)(c) included in this billing;
- (b) if a deposit is made in accordance with subparagraph (a), but eighty five percent (85%) of the construction of the sidewalks, curbs, gutters and pavement required under this Agreement has not been completed by August 31 of the year in which this Agreement is written, the Developer shall either:
 - (i) pay the remaining balance on or before March 1 in the year following the year this Agreement was made to secure installation of the street, walkway and reserve pathway lighting in accordance with the cost estimate; or
 - (ii) pay any further costs incurred from the installation in accordance with a new cost estimate for the remaining work based on rates for the year in which the installation of the street, walkway and reserve pathway lighting is carried out and completed.

15.04 The Developer shall pay the cost of the relocation of street light poles if the lots were re-subdivided by the Developer, which cost shall be determined in the sole discretion of the Director, Roads.

- 15.05 (1) Where street lighting that is non-standard within the Roads Standards and Specifications is requested by the Developer, the Developer shall select the lighting style from the City's Roads Business Unit approved list of non-standard street lighting types.
- (2) The costs for the non-standard street lighting include construction and material costs as well as incremental costs of energy and maintenance calculated over a fifteen (15) year period.

**PART XVI
EASEMENTS**

- 16.01 The Developer covenants with the City that it shall grant to the City, electric, natural gas, cable, telephone and any other utility company such easements as are necessary and required at the outline plan and tentative plan stages, for the supply of the respective utilities to the Development Area or any part thereof, and further covenants that it will execute and deliver registerable easements to the City to allow for their registration at the South Alberta Land Titles Office.
- 16.02 If the Developer does not own the lots over which the easements required by this Agreement are to be located, prior to providing the City with any registerable easements, the Developer covenants to obtain same from any subsequent owner of lots over which the easements are to be located prior to the Payment Date, or the acknowledgement of the last Final Acceptance Certificate, whichever is the earlier.

**PART XVII
LAND PURCHASE**

A. LAND PURCHASE OPTION AGREEMENT

- 17.01 (1) Concurrent with this Agreement, the Developer shall grant the City an "Option to Purchase" (in the form and conditions contained in the City's Land Purchase Option Agreement), or at the request of the City enter into an "Agreement for Purchase and Sale" with the City in accordance with the City's standard form of Agreement for Purchase and Sale, for the acquisition of additional land(s) the City may require for expressways, freeways, interchanges or regional parks.
- (2) It is hereby acknowledged that when the Developer and the City enter into a Land Purchase Option Agreement or Agreement for Purchase and Sale under this Part, the date associated therewith shall be indicated in the relevant Special Clauses Agreement.

B. LAND PURCHASE - L.R.T. PURPOSES

- 17.02 (1) When the City identifies additional requirements for the Light Rail Transit System, including right of way and station requirements, the Developer agrees to sell and the City agrees to purchase subject to the approval of City Council.
- (2) The value of the land shall be determined at the date of the approval of the Outline Plan of Subdivision Approval, which value shall not exceed the current market value of the land to be acquired.

C. LAND PURCHASE - MUNICIPAL PURPOSES

- 17.03 (1) Where land, in excess of that which the City can compel the Developer to dedicate as a condition of Subdivision Approval, is required by the City for municipal purposes generally or for public roadways and public utilities, and is identified at the outline plan stage, the Developer agrees to sell and the City agrees to purchase subject to the approval of City Council.
- (2) The value of the land shall be determined at the date of the approval of the Outline Plan of Subdivision Approval, which value shall not exceed the current market value of the land to be acquired.

D. LAND PURCHASE - RESERVE PURPOSES

- 17.04 (1) Where land, in excess of that which the City can compel the Developer to dedicate as a condition of Subdivision Approval, is required by the City as reserve, the Developer agrees to sell and the City agrees to purchase subject to the approval of City Council.
- (2) The value of the land shall be based on a price per hectare equal to that which would have been determined for the dedicated reserves, in accordance with the provisions of the Municipal Government Act, had the Developer been obligated to pay cash-in-lieu of reserves as a condition of Subdivision Approval.

PART XVIII
PERFORMANCE SECURITY

- 18.01 (1) The Developer shall provide the City with Security in the amount of:
- (a) Tier 1 Developers: One Hundred Percent (100%) of all estimated construction costs of the Infrastructure contemplated herein with a minimum payable amount of One Hundred and Fifty Thousand Dollars (\$150,000.00) in addition to all levies and other amounts payable to the City under this Agreement and any amendments hereto;
- (b) Tier 2 Developers: Fifty Percent (50%) of all estimated construction costs of the Infrastructure contemplated herein with a minimum payable amount of One Hundred and Fifty Thousand Dollars (\$150,000.00) in addition to all levies and other amounts payable to the City under this Agreement and any amendments hereto; and
- (c) Tier 3 Developers:
- (i) Three Thousand and Five Hundred Dollars (\$3,500.00) for every lot that is not a multi-family or commercial lot; and
- (ii) Seventeen Thousand Five Hundred Dollars (\$17,500.00) for each and every hectare or part thereof for each lot that is a multi-family or commercial lot
- contained within the Development Area, with a minimum payable amount of One Hundred and Fifty Thousand Dollars (\$150,000.00) in addition to all levies and other amounts payable to the City under this Agreement and any amendments hereto.

- (2) The City's use of Security shall be restricted to securing the performance of the obligations under this Agreement, including but not limited to the removal of any loam that is stockpiled inside or outside of the Development Area and rehabilitation of the loam stockpile site to the satisfaction of the Director, Parks, the Manager, Urban Development or the Development Officer as the case may be.

- 18.02 (1) For Tier 3 Developers:
 - (a) The amount of the Security may be reduced, upon the Developer's request and in the sole discretion of the Manager, Urban Development, after the acknowledgement of all Construction Completion Certificates for the sanitary sewers, storm sewers, water mains and hydrants, sewer and water service connections, paved roads and walkways and sidewalks, curbs and gutters and catch basins; and
 - (b) The reduction of the Security shall only be by such amount as determined by the Manager, Urban Development, in his sole discretion, so that the remaining Security is sufficient to cover the cost of all of the Developer's remaining obligations under this Agreement including, without limiting the generality of the foregoing:
 - (i) the control or abatement of all nuisances associated with construction within the Development Area, including but not limited to storm water run-off, sedimentation, erosion and dust;
 - (ii) maintenance and removal of any loam stockpile created from loam removed from the Development Area whether located inside or outside of the Development Area; and
 - (iii) rehabilitation of any loam stockpile site.
- (2) For Tier 1 Developers and Tier 2 Developers, the reduction of security shall occur only upon such direction of and in such amount specified by the Manager, Urban Development.

18.03 The Security shall not be entirely released by the City until all of the Final Acceptance Certificates have been approved and all other requirements under this Agreement have been met by the Developer (excepting only the requirements secured by an irrevocable letter of credit, performance bond or other additional Security provided by the Developer pursuant to this Part).

- 18.04 (1) To secure its obligations to remove loam that was stockpiled in connection with the stripping and grading of the Development Area and rehabilitation of loam stockpile site(s) contained herein, the Developer may either:
 - (a) increase the value of the Security provided in accordance with Paragraphs 18.01 and 18.02 if acceptable to the Manager, Urban Development; or
 - (b) provide the City with a new form of Security to the satisfaction of the Manager, Urban Development,all of which may be used by the City to specifically secure the performance of the Developer's obligations to remove the loam stockpile(s) and rehabilitate any loam stockpile site as contemplated herein.
- (2) Such Security shall be in an amount that does not exceed the original Security amount required under this Agreement.

- (3) (a) The City, at its option, may hold the Security specific to the loam removal in addition to other securities held by the City from other Development Areas which have stockpiled loam on the said loam stockpile site.
- (b) The total amount of Security held by the City pursuant to this Paragraph shall not exceed the amount which is in the sole opinion of the Manager, Urban Development to be the estimated cost of removing the loam stockpile and rehabilitating the said loam stockpile site.
- (c) The Security required under this Paragraph shall not be released until the loam stockpile is removed and the site upon which the loam stockpile was located has been rehabilitated to the satisfaction of the Director, Parks or the Manager, Urban Development, as the case may be, or unless the City has sufficient Security, in the opinion of the Manager, Urban Development, from other lands within the Development Area for such purpose.

18.05 To secure its obligation to maintain final top lift asphalt, the Developer shall provide additional Security to the City for its use:

- (1) in an amount that is, in the sole opinion of the Manager, Urban Development, equal to the estimated cost of removing and replacing all of the final top lift asphalt, referred to above, based on the Unit Rate Schedule in effect at the time the final top lift asphalt is placed; and
- (2) that shall not be released until a Final Acceptance Certificate has been issued in respect of the final top lift asphalt referred to above.

18.06 To secure the performance of its obligation to repair builder damage to sidewalks, curbs and gutters (when located adjacent to undeveloped lots requiring building, driveway, or landscape construction) that occurs after acknowledgement of the Final Acceptance Certificate for the same, the Developer may choose one of the following options:

- (1) where the Developer continues to maintain and repair the said sidewalks, curbs and gutters following the acknowledgement of the Final Acceptance Certificate, it shall provide Security to the City (that the City shall be entitled to use in the event of a default of the obligation to maintain and repair) in the amount of Five Hundred Dollars (\$500) per undeveloped lot prior to the City's acknowledgement of the said Final Acceptance Certificate, which Security shall not be released by the City until a joint inspection with the City and the Consulting Engineer reveals:
 - (a) development of the adjacent lots (as identified by the Manager, Urban Development) is complete; and
 - (b) the Developer has completed, to the satisfaction of the Manager, Urban Development, any and all repairs to the sidewalks, curbs and gutters damaged by actions of builders adjacent to the undeveloped lots; or
- (2) where the Developer ceases to maintain and repair the said sidewalks, curbs and gutters following the acknowledgement of the Final Acceptance Certificate, in which case the City will assume the maintenance for the said sidewalks, curbs and gutters following its acknowledgement of the Final Acceptance Certificate for the same, it shall pay to the City One Thousand Dollars (\$1,000.00) per undeveloped lot, which amount the City will be entitled to keep regardless of whether any or all of it is expended by the City for said maintenance or repair.

- 18.07 (1) The Developer shall ensure the performance Security under this Agreement contains a condition for the auto-renewal of the Security to the satisfaction of the Manager, Urban Development.
- (2) The Developer, at the request of the City, shall provide to the City prior to fifteen (15) days of the expiration date of the Developer's performance Security under this Agreement, a renewal or amendment to the Security extending the term of the Security for a time period specified by the City.
- (3) If the Developer fails to provide the required renewal or amendment to the Security as required herein, the City shall, without further notice to the Developer and in its sole discretion, cash in or realize upon the Security.

PART XIX
INSURANCE

- 19.01 The Developer, during the term of this Agreement and at its own expense, shall provide and maintain in full force and effect with insurers allowed by the laws of the Province of Alberta to issue insurance policies in Alberta and in form and content satisfactory to the City Solicitor the following insurance policies covering the Developer's obligations set out in the Agreement:
- (1) Commercial general liability insurance policy for bodily injury (including death) and property damage in an amount of not less than Two Million Dollars (\$2,000,000.00) inclusive limit for any one occurrence and shall include:
- (a) the City as an Additional Insured (if a third party is providing the insurance then the Developer must also be shown as an Additional Insured);
 - (b) a cross liability clause;
 - (c) products and completed operations coverage;
 - (d) broad form of a contractual liability clause;
 - (e) non-owned automobile liability extension; and
 - (f) operation of attached machinery clause; and
- (2) an automobile third party liability insurance policy (owner's form) for bodily injury (including death) and property damage in an amount of not less than Two Million Dollars (\$2,000,000.00) inclusive limit covering all vehicles used in the performance of this Agreement.
- 19.02 The insurance policies mentioned within this Part shall include provision for the City to be given thirty (30) days written notice prior to cancellation or material change of said policies of insurance. The Developer shall immediately advise the City should said policies of insurance lapse or otherwise be discontinued.
- 19.03 The Developer shall provide a Certificate of Insurance indicating compliance with Paragraphs 19.01 and 19.02 to the Manager, Urban Development at inception of this Agreement, and furnish documentary evidence satisfactory to the Manager, Urban Development of the renewal or continuance of such insurance during the life of this Agreement within ten (10) business days of any expiry date(s) thereof.
- 19.04 In addition to Paragraph 19.03, the City shall have the right to demand at any time and the Developer shall be obligated to provide proof of insurance when so requested by and in a form satisfactory to the Manager, Urban Development.

- 19.05 If the Developer fails to provide the City with any of the documents mentioned in this Part, or otherwise failing to prove to the City the existence of any required insurance, the City may, at its option, purchase on behalf and at the expense of the Developer the required insurance coverage.
- 19.06 Nothing contained in this Part or in any policy of insurance required or provided under this Agreement shall in any way whatsoever limit the liability of the Developer under this Agreement or otherwise howsoever.

PART XX
INDEMNIFICATION

- 20.01 From the commencement of any activity, work or construction undertaken in connection with or contemplated by this Agreement:
- (1) regardless of whether or not the activity, work or construction is:
 - (a) commenced prior to the execution of this Agreement;
 - (b) along the boundaries of, within or outside the Development Area; or
 - (c) commenced prior to the execution of a Special Clauses Agreement by the City and Developer with respect to the land upon which the activity, work or construction is occurring;
 - (2) the Developer covenants and agrees to indemnify, defend and save completely harmless the City, and all of its agents, contractors, employees, officials, officers and authorized representatives from and against any and all losses, actions, causes of action, suits, claims, damages, demands, interest, legal fees, legal or administrative proceedings, liabilities, costs and expenses of whatsoever kind or nature
 - (a) whether arising before or after completion of the said activity, work or construction, and
 - (b) in any manner directly or indirectly caused, occasioned or contributed in whole or in part, by reason of any act, error, omission or fault (whether active or passive) of the Developer, Contractor, Consulting Engineer or other representative or agent of the Developer or acting on its behalf in connection with the obligations contained in this Agreement,which may be brought against or incurred by the City, its agents, contractors, employees, officials, officers or authorized representatives by any person or persons by reason of any act or omission of the Developer during the period from the commencement of any activity contemplated under this Agreement until all obligations contained herein are complete, or the date of the last Final Acceptance Certificate issued in respect of such activity, work or construction, whichever is the latter.

PART XXI
RECOVERY OF COSTS, BOUNDARY ROADS, LANES AND SCHOOL LANDS

A. GENERAL

- 21.01 When the Developer is required to install Infrastructure in Boundary Roads and Lanes, it is agreed that:
- (1) if subdivision or development of the adjoining property to such Boundary Roads and Lanes takes place within two (2) years from the date of the acknowledgement of each Construction Completion Certificate for Boundary Roads and Lanes:

- (a) the Developer shall be entitled to recover a portion of the costs (exclusive of Oversize) from the owner of adjoining property for the sidewalks, curbs and gutters, catch basins and leads, street lighting, paved roads and paved or gravelled lanes that are installed or constructed in the Boundary Roads and Lanes as outlined in Paragraph 21.01(3); and
 - (b) the amount of the recovery by the Developer shall be computed using the Unit Rate Schedule or using the Unit Rates in effect in the year of recovery, whichever is the lesser.
- (2) If no subdivision or development of the adjoining property takes place within two (2) calendar years from the date of the acknowledgement of each Construction Completion Certificate:
 - (a) the City shall pay to the Developer a portion of the costs (exclusive of Oversize) of the sidewalks, curbs and gutters, catch basins and leads, street lighting, paved roads and paved and/or gravelled lanes constructed in the Boundary Roads and Lanes as outlined in Paragraph 21.01(3); and
 - (b) the amount of the payment to be made by the City to the Developer shall be computed using the Unit Rate Schedule or the Unit Rates in effect two (2) years from the year of this Agreement, whichever is the lesser.
- (3)
 - (a) The Developer understands that any developer of the property immediately adjacent to a Boundary Road, by way of subsequent Development Agreement, shall be required to repay to the City the Boundary Costs paid by the City whether the surface improvements are used or not.
 - (b) In the event that the Actual Cost to the City of the design and construction of the Boundary Roads and Lanes exceeds the Unit Rates in effect at the time the adjacent land is developed, the current Unit Rates will be used to calculate the cost recovery payable to the City.
 - (c) If payment of the Boundary Costs referred to herein is delayed by the City beyond the two (2) year period, the amount of the payment to be made by the City to the Developer shall be computed using the Unit Rate Schedule or using the Unit Rates in effect at the time the payment is made by the City, whichever amount is the lesser.
 - (d) If the Developer fails to invoice the City for the Boundary Costs immediately when due, the amount of the payment to be made by the City to the Developer shall be computed using the Unit Rate Schedule or using the Unit Rates in effect two (2) years from the year of this Agreement, whichever amount is the lesser.
- (4) Notwithstanding anything contained in this Agreement to the contrary, the Developer shall not be entitled to a Boundary Cost payment from the City in those cases where the surface improvements are constructed adjacent to land that is not developable at the time of this Agreement, in the opinion of the Manager, Urban Development, such as parks, Provincial parks, reserve parcels, railway rights-of-way, AltaLink corridors, lands outside the City limits, service roads, or roads that are a Major Road Standard.

B. ENDEAVOURS TO ASSIST IN COST RECOVERY

- 21.02 (1) (a) The City shall endeavour to assist the Developer in the recovery of a portion of the costs incurred by it (being the proportionate share of costs based on length of frontage along Boundary Roads and Lanes, exclusive of Oversize) relating to any sanitary sewer, storm sewer, water main and hydrant installations in the Boundary Roads and Lanes, and extensions of these utilities to and from adjacent areas from the developer of the adjoining property prior to the execution of the Master Development Agreement and Special Clauses Agreement by the developer(s) for the said adjoining property, provided that such underground utility will be utilized by the developer of the adjoining property.
- (b) The endeavour to assist with costs payable in accordance with subparagraph (a) will be calculated using the Unit Rates in effect in the year of the recovery ("Year of Recovery"). For the purposes of this subparagraph (b), the Year of Recovery shall be deemed to be the year of the Master Development Agreement executed by the developer of the adjoining property.
- (2) Notwithstanding anything to the contrary contained within this Agreement, the Developer shall only be entitled to recover the endeavours to assist payable herein within twenty (20) years from the date of this Agreement, and the Developer thereafter shall make no demand or file any action or claim against the City or any other developer for the payment thereof.
- (3) (a) It is understood and agreed that if the City is requested to mediate a dispute between the Developer and other developer(s) with respect to endeavours to assist or Boundary Cost recoveries, the City shall be entitled to recover from the disputing parties the direct costs it incurs to resolve the dispute, for which the disputing parties shall be jointly and severally liable.
- (b) The decision of the Manager, Urban Development, acting reasonably, resulting from the mediation of a dispute as contemplated in subparagraph (a), shall be final and binding between the disputing parties.

C. SCHOOL SITES

- 21.03 (1) If the School Boards are able to indicate School Site servicing requirements prior to the approval of the Construction Drawings, the Developer shall:
- (a) provide underground utilities, at no cost to the City or the School Boards, in the line assignment approved by the City in a street or lane immediately adjoining the School Site;
- (b) provide sanitary sewer, storm sewer and water service connections from the mains in the adjacent street or lane to the property line of the School Site, and the Developer shall be entitled to recover the full cost thereof from the School Board at the Developer's tendered contract prices when the work has been certified as complete; and
- (c) provide pre-servicing of the School Site with the electrical conduits required for the provision of three phase electrical power to the School Site, and the Developer shall be entitled to recover from the School Board the full cost of the installation of the said electrical conduits.

- (2) If the School Boards are unable to indicate School Site servicing requirements prior to the approval of the Construction Drawings, the School Boards, in addition to the cost of the service connections, shall pay the full cost of all the sanitary sewer, storm sewer and water main extensions that may be required to service the School Site.
- 21.04
- (1) After the work referred to in Paragraph 21.03(1) has been certified by the City as complete, the Developer shall submit calculations to the Manager, Urban Development for approval for the costs of the service connections, main extensions and electrical conduits referred to therein.
 - (2) Following approval of the calculations by the Manager, Urban Development, the Developer may submit an invoice to the School Board concerned for repayment.
 - (3) The Developer shall make its own arrangements directly with the School Board concerned for repayment.

PART XXII
CONSTRUCTION COMPLETION CERTIFICATES

A. CONSTRUCTION COMPLETION

- 22.01 The following items shall be considered “complete” or “completed” when all written instructions or directions given to the Developer by the Manager, Urban Development have been resolved to the satisfaction of the Manager, Urban Development, the following items have been constructed in accordance with the Construction Drawings and the following conditions have been met:
- (1) Sanitary Sewers and Storm Sewers
 - (a) All pipes are of the size and laid to the grades as approved on the Construction Drawings, all manholes are completed with properly formed inverts, are undamaged and are free from obstructions and foreign matter such as rocks, silt, and gravel.
 - (b) The manhole rims and covers shall be finished to the approved design grade of the lane or road in which they are installed.
 - (2) Storm Water Pond Facilities
 - (a) All piping, subdrainage system and associated pond structures, including but not limited to inlets/outlets, control structures, and catch basins, have been laid to approved grades and are free of accumulated sediment and gravel and other obstructions such as rocks, construction material, and leaves.
 - (b) Final grading and pond design volume requirements have been constructed to approved grades, including but not limited to side slopes, bottom slopes and spillway elevation and must not show signs of erosion or areas of standing water (dry ponds).
 - (c) Vegetation must be installed and approved by the City’s Parks Business Unit, including but not limited to seeding, sodding, plants and trees, and the irrigation must be approved by the Director, Parks;
 - (d) Monitoring equipment and other specialized structures, including but not limited to automatic gates, have been installed and are operating as per approved drawings, unless the time period for installation and operation has been extended by the City’s Water Resources Business Unit, and operating manuals have been supplied as requested.

- (e) Where required, all water quality monitoring requirements have been established with the Water Quality Group within the City's Water Resources Business Unit.
 - (f) As-built Drawings for items (a) and (b) above have been submitted to and approved by the City's Water Resources Business Unit.
- (3) Water Mains and Hydrants
- (a) The water mains have been installed to the approved grades, tested, inspected, backfilled and sterilized to the satisfaction of the Manager, Urban Development, and are ready for the supply of water to the public.
 - (b) All the main and service connection valves and curb boxes, fire hydrants, pressure reducing valve chambers and other appurtenances are operable and undamaged and at elevations which are satisfactory to the Manager, Urban Development.
- (4) Sewer and Water Service Connections
- (a) The sewer and water service connections have been installed to the approved grades, tested, cleaned, inspected and backfilled and all appurtenances are operable and undamaged, all to the satisfaction of the Manager, Urban Development.
 - (b) The water mains and hydrants are deemed to be complete.
- (5) Sidewalks, Curbs, Gutters and Catch Basins
- (a) All sidewalks, curbs, gutters, concrete pedestrian bus stop aprons, catch basins, hard surfaced medians, traffic islands and Boulevards shall be fully constructed to the approved design grade and free of damage, except
 - (i) at lane crossings and easements/rights of way wherein utilities are to be installed; however, not included as exceptions are underground wiring, service connections and sidewalks on fill; and
 - (ii) where the installation of the electric power, gas, telephone and cable utilities has caused the omission of construction of portions of the sidewalks, where the total length of the omitted sections do not exceed fifteen percent (15%) of the total length of the sidewalks being constructed.
 - (b) All work shall be free from conditions deemed to be hazardous by the Manager, Urban Development.
 - (c) Those portions omitted shall be completed within one (1) year from the acknowledgement of the Construction Completion Certificate for adjacent sidewalks, curbs and gutters, which shall be a condition of the acknowledgement of the Construction Completion Certificate.
 - (d) Should the omitted items not be completed within one (1) year from the date of the acknowledgement of the Construction Completion Certificate, then the maintenance period for the entire piece of Infrastructure shall be extended one (1) year from the date of the completion of the omitted items.
- (6) Paved Roads, Paved Lanes and Paved Walkways
- (a) All catch basin leads, manhole frames and covers, water main valves, hydrant valves and valve operating mechanisms shall have been completed in the paved roads, paved lanes and paved walkways, prior to the acknowledgement of the Construction Completion Certificate for paved roads, paved lanes and paved walkways.
 - (b) The paved road, paved lane and paved walkway surfaces shall be constructed except where:

- (i) the installation of the electric power, gas, telephone and cable utilities has caused the omission of construction of portions of the asphalt surface but the gravel base is in place, and in any event the total length of the omitted sections shall not exceed fifteen percent (15%) of the total length of the paved roads, paved lanes and paved walkways being constructed; or
 - (ii) when the Manager, Urban Development deems it necessary to construct portions of any paved walkways at a later date to facilitate the landscaping with adjoining lots.
 - (c) The construction of the said omitted sections of asphalt surface shall be constructed within one (1) year from the acknowledgement of the Construction Completion Certificate for the adjacent paved roads, paved lanes and paved walkways.
 - (d) Should the omitted sections not be completed within one (1) year of the date from the acknowledgement of the Construction Completion Certificate, the maintenance period shall be extended one (1) year from the date of the completion of the omitted sections.
 - (e)
 - (i) Notwithstanding the foregoing, the placement of the final top lift asphalt may be omitted upon approval being given by the Manager, Urban Development.
 - (ii) The omitted final top lift asphalt must be placed at least thirty (30) days prior to the City issuing the Final Acceptance Certificate for paved roads, paved lanes and paved walkways as required under Part XXIV (Final Acceptance Certificates) herein.
 - (iii) In addition, the final top lift asphalt shall also be subject to the requirements under Parts XVIII (Performance Security) and XXIII (Maintenance) herein.
- (7) Gravelled Lanes
- (a) A Construction Completion Certificate will be issued for gravelled lanes after the first spring thaw, being that time period between March 1st and June 1st inclusive of the previous year, if the Construction Completion Certificates for all the underground utilities have been issued prior to the commencement of the first spring thaw.
 - (b) The lanes shall be graded and gravelled to proper grade and cross-sectioned and backsloped in accordance with the Roads Standards and Specifications.
 - (c) All underground distribution facilities (electric power, gas, telephone and cable) in the lanes have been installed as required by the subdivision or development permit approval.
- (8) Surface Drainage Facilities – When all Surface Drainage Facilities have been constructed to the satisfaction of the Manager, Urban Development.
- (9) Sound Attenuation Fencing – When all of the work identified on the Construction Drawings has been constructed and completed to the satisfaction of the Manager, Urban Development.
- (10) Fence
- (a) A Construction Completion Certificate is required if a fence is constructed pursuant to Part XI (Fencing) herein on City owned property.
 - (b) The design, specifications and maintenance period of the said fence must first be approved by the Manager, Urban Development before commencing construction of the fence.

- (11) Landscaping for Reserve Parcels, Public Utility Lots, soft landscaping of medians, boulevards, traffic islands and underground irrigation
- (a) All underground irrigation and water services, water meter boxes, and water meters required for:
 - (i) Sub-neighbourhood Parks;
 - (ii) Linear Parks;
 - (iii) those portions of the Neighbourhood, Community and District Parks which are designated as decorative parks, ornamental parks and tot lots; and
 - (iv) only water services for reserve parcels other than environmental reserveshave been installed, tested and inspected;
 - (b) the “as constructed” drawings for the parcels described in subparagraph (a) are in compliance with the City’s Community Services and Protective Services Business Unit’s requirements, showing the actual location of the underground irrigation as installed by the Developer;
 - (c) the “as constructed” drawings referred to in subparagraph (b) have been submitted to and approved by the Director, Parks; and
 - (d) the Sub-neighbourhood Parks, Linear Parks, decorative parks, ornamental parks, tot lots and public utility lots and the soft landscaping of the medians, Boulevards and traffic islands have been graded, loamed, and seeded, the trees have been planted and, if applicable, the paved reserve pathways have been constructed in accordance with the Park Specifications.
 - (e) The following landscaping components shall be listed and administered on separate Construction Completion Certificates in accordance with the following groupings:
 - (i) all reserve parcels (Sub-neighbourhood Parks, Linear Parks and those portions of the Neighbourhood, Community and District Parks designated as decorative parks, ornamental parks and tot lots) public utility lots and rights-of-way;
 - (ii) all medians, Boulevards and traffic islands;
 - (iii) all Environmental Reserves; and
 - (iv) all Storm Water Pond Facilities.
- (12) Optional Subdivision Amenities – All Optional Subdivision Amenities have been constructed, inspected and approved by the Manager, Urban Development.
- (13) Street Lighting, Walkway Lighting, Reserve Pathway Lighting – All street lighting, walkway lighting and reserve pathway lighting that is installed within the Development Area through the Developer’s private arrangement and independently of the City is fully constructed in accordance with City Specifications, the approved design and construction standards and drawings, and free of damage.

B. PROCEDURE FOR OBTAINING CONSTRUCTION COMPLETION CERTIFICATES

- 22.02 (1) Upon completion of the Infrastructure, or portion thereof, excluding Optional Subdivision Amenities and landscaping of reserve parcels, public utility lots and underground irrigation, the Consulting Engineer shall arrange a joint inspection(s) with the appropriate City business unit to determine whether or not the Infrastructure, or portion thereof, is acceptable to the City.

- (2) If the infrastructure, or portion thereof is acceptable to the City, the Consulting Engineer or Landscape Architect, and the City shall execute a Joint Inspection Certificate, which shall include any outstanding deficiencies.
- 22.03 The Consulting Engineer shall cause to be prepared and issued, four (4) copies of a Construction Completion Certificate for the Infrastructure completed, duly signed, sealed and certified by the signing officer of the Consulting Engineer for each utility and improvement completed or by the Landscape Architect for landscaping of reserve parcels, public utility lots, soft landscaping of medians, traffic islands and Boulevards, and underground irrigation, including the projected earliest maintenance expiry date.
- 22.04 Where applicable, the Developer shall submit a separate certificate duly signed, and sealed, by a Professional Engineer registered in the Province of Alberta who is a member in good standing of the Association of Professional Engineers, Geologists and Geophysicists of Alberta certifying that all the backfilling operations, carried out by the Developer, have been carried out in accordance with the backfilling requirements as agreed to by the Urban Development Institute (Calgary Chapter).
- 22.05 In addition to all other requirements contained herein, prior to the acknowledgement of the Construction Completion Certificate for water mains and hydrants, the Developer shall obtain from the Director, Water Resources, certification of the pressure testing, chlorination and water sampling of the said water mains.
- 22.06 The Developer, within thirty (30) days of the acknowledgement of each Construction Completion Certificate shall forward to the Manager, Urban Development:
- (1) four (4) copies of the said Construction Completion Certificate for acknowledgement of receipt;
 - (2) four (4) copies of the Joint Inspection Certificate;
 - (3) four (4) copies of the compaction testing report; and
 - (3) four (4) copies of an 8 ½ inch by 11 inch map indicating that the Infrastructure has been completed.
- 22.07 Within thirty (30) days of receipt of each Construction Completion Certificate, the City shall acknowledge the receipt of or reject the Construction Completion Certificate, whichever the case may be.
- 22.08 Notwithstanding Paragraph 22.07 or anything to the contrary herein, upon receipt of a Construction Completion Certificate for sidewalks, curbs, gutters, concrete pedestrian bus stop aprons and catch basins or for paved roads, paved lanes and paved walkways, which may include omissions as specifically authorized by this Agreement, the City shall within thirty (30) days acknowledge receipt of the said Construction Completion Certificate.
- 22.09 (1) Notwithstanding Paragraphs 22.07, 22.08 or anything to the contrary contained herein, the Manager, Urban Development may withhold acknowledgement of receipt of the said Construction Completion Certificate and return it to the Consulting Engineer if in his opinion the Infrastructure, or portion thereof, is not complete.

- (2) The Developer shall correct the defects or deficiencies and subsequently resubmit the said Construction Completion Certificate with a revised projected earliest maintenance period expiry date.

22.10 (1) The Developer, upon acknowledgement of the Construction Completion Certificate for water mains and hydrants shall cause to be issued to the City's Fire Department a letter and plan certifying the completed and operable hydrants constructed and located within the area covered by the water mains and hydrants Construction Completion Certificate.

- (2) The letter and plans shall be sent to:

Strategic Services Division Attention: Assistant Fire Marshall
City of Calgary Fire Department
4124 – 11 Street S.E.
Calgary, AB T2G 3H3

and

Strategic Services Division Attention: Response Mapping
City of Calgary Fire Department
4124 – 11 Street S.E.
Calgary, AB T2G 3H3

22.11 The Construction Completion Certificate may be issued if sanitary sewer, storm sewer, and water service connections are not completed to church sites, School Sites and commercial areas where the final layout is unknown.

22.12 (1) The Developer shall complete all outstanding deficiencies noted on the Joint Inspection Certificate within the time frames specified on the Joint Inspection Certificate.

- (2) If the Construction Completion Certificates have been issued and any outstanding deficiencies have not been corrected within the time frames specified on the Joint Inspection Certificate, the Manager, Urban Development may, in his sole discretion, either reject the Construction Completion Certificate or extend the maintenance period for the length of time calculated from the first identification of the deficiencies until the deficiencies are corrected to the satisfaction of the appropriate City Business Unit and the Manager, Urban Development.

C. PROCEDURES – PARKS

22.13 Notwithstanding Paragraphs 22.02 through 22.12 inclusive, the following procedures shall apply to the Construction Completion Certificates for Optional Subdivision Amenities and landscaping of reserve parcels, public utility lots and underground irrigation:

- (1) The Landscape Architect or Consulting Engineer, upon completion of the landscaping requirements contained in Paragraph 22.01 and as required by the Manager, Urban Development, shall arrange a joint inspection(s) with the City's Parks Business Unit to determine whether or not landscaping is acceptable to the City;
- (2) if the landscaping is acceptable to the City, the Landscape Architect or Consulting Engineer and the City shall execute a Joint Inspection Certificate, which shall include any outstanding deficiencies;

- (3) The Developer shall submit to the Manager, Urban Development:
 - (a) four (4) copies of the Construction Completion Certificate for acknowledgement of receipt;
 - (b) four (4) copies of the Joint Inspection Certificate; and
 - (c) four (4) copies of an 8 ½ inch by 11 inch map indicating that the Infrastructure has been completed;
- (4) Where applicable, the Developer shall submit a separate certificate duly signed, and sealed by a Professional Engineer registered in the Province of Alberta who is a member in good standing of the Association of Professional Engineers, Geologists and Geophysicists of Alberta certifying that all the backfilling operations carried out by the Developer, have been carried out in accordance with the backfilling specifications of the City;
- (5) Upon receipt of the Construction Completion Certificates and Joint Inspection Certificates, the Manager, Urban Development shall sign the Construction Completion Certificate and shall indicate thereon the projected earliest maintenance period expiry date.
- (6) If the Construction Completion Certificate(s) have been issued and any outstanding deficiencies have not been corrected within the time frames specified on the Joint Inspection Certificate, the Manager, Urban Development may, in his sole discretion, either reject the Construction Completion Certificate(s) or extend the maintenance period for the length of time calculated from the first identification of the deficiencies until the deficiencies are corrected to the satisfaction of the Parks Business Unit and the Manager, Urban Development.

PART XXIII
MAINTENANCE

A. GENERAL

- 23.01 (1) After the acknowledgement of each Construction Completion Certificate, the Developer shall be responsible for any and all repairs and replacements to the Infrastructure that may, in the Manager, Urban Development's sole opinion, become necessary from any cause whatsoever, up until the acknowledgment of the Final Acceptance Certificate.
- (2) Notwithstanding subparagraph (1), the Developer shall be responsible for any and all repairs and replacements necessitated by builder damage to sidewalks, curbs and gutters after the acknowledgement of the Final Acceptance Certificate as outlined in Paragraph 18.06.
- 23.02 (1) If during the construction and maintenance period any defects become apparent in any portion of the Infrastructure installed or constructed under this Agreement and the Manager, Urban Development requires repairs or replacements to be done, the Developer, within thirty (30) days after the delivery of notice in writing to the Developer, or within such other time as is agreed to or specified by the Manager, Urban Development acting reasonably, shall cause such repairs or replacements to be done.

- (2) If, in the sole opinion of the Manager, Urban Development, any emergency arises, the City may carry out the repairs or replacement and the Developer shall reimburse the City for the full cost of such repairs or replacements, failing which the City may recover full cost of such repairs or replacement in the manner provided in Paragraph 25.01.

23.03 The Developer shall be responsible for the maintenance of all Infrastructure installed and constructed by it, which maintenance includes, but is not limited to:

- (1) remedying the failure of or damage to underground utilities resulting from defective materials, or improper installation;
- (2) settlement of ditches;
- (3) grading;
- (4) gravelling;
- (5) street sweeping;
- (6) repairs to and/or replacement of road and lane surfaces including any access roads specified herein, sidewalks, curbs and gutters, bridges, culverts, Surface Drainage Facilities, catch basins and catch basin leads;
- (7) adjustment and repairs to watermains, mainvalves, water hydrants, hydrant valves, pressure reducing valve chambers, water service connections and valves and valve operating mechanisms including the casings enclosing these mechanisms;
- (8) repairs, replacements and adjustments to sewer mains, sewer service connections, manholes, manhole frames and covers, repairs or replacement of trees, landscaping and underground irrigation;
- (9) street lighting, walkway lighting and reserve pathway lighting that is installed within the Development Area through the Developer's private arrangement and independently of the City; and
- (10) such other repairs as may be required by and to the satisfaction of the Manager, Urban Development.

23.04 (1) The Developer agrees that maintenance is a continuous operation and obligation that must be carried on until the date of acknowledgement of the Final Acceptance Certificate for each portion of the Infrastructure.

(2) The City shall not release the Developer from liability of any kind until all repairs or replacements required by the Manager, Urban Development as noted in the City's Final Inspection Reports have been made.

(3) The City will only provide snow and ice removal for road and paved lanes where a Construction Completion Certificate has been issued, the road or lane is paved, all signage and lights have been installed, and the road or lane is open to the public.

B. SANITARY SEWER, STORM SEWER AND STORM WATER POND FACILITIES MAINTENANCE

- 23.05 (1) (a) The City, from the date of the Construction Completion Certificate, will flush and clean out the sanitary and storm sewers as required in ordinary maintenance procedures.
- (b) The cost of removing obstructions caused by gravel, rocks or silt which is other than that deposited from sewage, may be charged to the Developer.
- (2) Until the respective Final Acceptance Certificate is issued for each portion of the Infrastructure, the Developer shall be responsible for:
- (a) inspecting and maintaining on a regular basis, all piping, subdrainage and associated structures (inlets/outlets, control structures, catch basins, etc.) and shall keep them free from operational problems (which includes but is not limited to accumulated sediment and gravel and other obstructions such as rocks and leaves, that can impact operations and function);
- (b) ensuring all monitoring equipment is and remains operational including any repairs or maintenance that may be required;
- (c) maintaining and repairing all grading as required;
- (d) maintaining and/or replacing all vegetation as required; and
- (e) submitting water quality monitoring reports to the City's Water Resources Business Unit as required.

C. WATER HYDRANTS, MAIN AND SERVICE VALVE BOXES

- 23.06 The Developer shall be responsible for adjusting all hydrants, hydrant and main valve boxes and all service valve boxes to the established grades as they are developed, and maintaining the valves and appurtenances in operating condition until such time as the City assumes the responsibility for the maintenance of streets and lanes as provided in this Agreement.

D. MAINTENANCE PERIODS

- 23.07 The Developer, at its sole cost and expense, shall maintain the following Infrastructure for the following minimum time periods following the acknowledgement of the relevant Construction Completion Certificate, or until the acknowledgement of the relevant Final Acceptance Certificate, whichever is later:
- (1) Sanitary Sewers: one (1) year;
- (2) Storm Sewers: one (1) year;
- (3) Storm Water Pond Facilities: three (3) years
- (a) All piping, subdrainage systems and associated pond structures (inlets/outlets, control structures, catch basins, etc.) shall be free of accumulated sediment and gravel and other obstructions such as rocks and leaves;
- (b) Storm Water Ponds – The Developer shall remove all accumulated sediment and gravel such that the original contours/grades (pond bottom) are met;
- (c) Wetlands – The Developer, in the sole discretion of the City, shall either clean the pond (including the removal of accumulated sediment and gravel such that the original contours/grades (pond bottom) are met) or shall deposit the sum of Fifty Thousand Dollars (\$50,000.00) with the City for future cleaning;
- (d) All pond staging must be completed (a Final Acceptance Certificate will not be issued for an individual stage of a pond);

- (e) Vegetation and landscaping (grass, trees, plants, etc.) must be established and approved by the City's Water Resources and Parks Business Units. Irrigation systems must be approved by the City's Parks Business Unit;
 - (f) Where required, water quality monitoring requirements must be met; and
 - (g) Where an extension has been granted by the City's Water Resources Business Unit, monitoring equipment and other specialized structures have been installed and operating properly for a minimum of one summer.
- (4) Water Mains & Hydrants: One (1) Year;
- (5) Sewer & Water Service Connections: One (1) Year;
- (6) Sidewalks, Curbs and Gutters, Concrete Pedestrian Bus Stop Aprons and Catch Basins: Two (2) Winter Seasons, provided that:
- (a) the underground utilities have, in the opinion of the Manager, Urban Development been installed and compacted in other than winter conditions; or
 - (b) if installed in winter conditions, the backfilling has been properly compacted with granular material;
 - (c) in addition, the Developer shall be responsible for any and all repairs and replacements necessitated by builder damage to sidewalks, curbs and gutters after the acknowledgement of the Final Acceptance Certificate as outlined in Paragraphs 18.06 and 23.01.
- (7) Paved Roads, Paved Lanes and Paved Walkways, including but not limited to manhole frames and covers, water main and hydrant valves and valve operating mechanisms, cathodic protection test points, water service connection valves and valve operating mechanisms, and catch basin leads installed in paved road, paved lanes or paved walkways: Two (2) Winter Seasons, provided that:
- (a) the underground utilities have in the opinion of the Manager, Urban Development been installed and compacted in other than winter conditions; or
 - (b) if installed in winter conditions, the backfilling has been properly compacted with granular material.
- (8) (a) Gravelled Lanes, including but not limited to manhole frames and covers, water main and hydrant valves and valve operating mechanisms, cathodic protection test points, water service connection valves and valve operating mechanisms installed in these lanes: One (1) year;
- (b) If the Developer fails to obtain the Final Acceptance Certificate for gravelled lanes prior to the onset of the second Winter Season for the installation of the Infrastructure located underground, the Developer shall reshape the lanes to design grades and slopes, gravel where considered necessary by the Manager, Urban Development, repair and adjust manholes, hydrants and all valves, cathodic protection test points, catch basins and catch basin leads provided that:
- (i) at least seventy five percent (75%) of the lots in the Development Area that are lane serviced all have the underground house services installed by the Developer, natural gas provider, telephone and cable services providers; and
 - (ii) no single lane has less than fifty percent (50%) of the house services installed.
- (9) Surface Drainage Facilities, which shall include all overland drainage control facilities except concrete swales: One (1) year;

- (10) Sound Attenuation Fence
 - (a) if the sound attenuation fence is constructed in accordance with the Roads Standards and Specifications: two (2) years; or
 - (b) if the sound attenuation fence is constructed to a specification other than the Roads Standards and Specifications, then:
 - (i) the fence design and specification must be approved by the Manager, Urban Development prior to the construction of the sound attenuation fence; and
 - (ii) the Manager, Urban Development shall establish the maintenance period for the sound attenuation fence in his sole discretion.

- (11) Screening Fence
 - (a) if the screening fence is constructed in accordance with the Roads Standards and Specifications: two (2) years; or
 - (b) if the screening fence is constructed to a specification other than the Roads Standards and Specifications, then:
 - (i) the fence design and specification must be approved by the Manager, Urban Development prior to the construction of the screening fence; and
 - (ii) the Manager, Urban Development shall establish the maintenance period for the screening fence in his sole discretion.

- (12) Landscaping for reserve parcels, public utility lots, soft landscaping of medians, Boulevards, traffic islands and underground irrigation: One (1) Growing Season, provided that:
 - (a) all Sub-neighbourhood Parks, Linear Parks and those portions of the Neighbourhood, Community and District Parks designated as decorative parks, ornamental parks, tot lots, and public utility lots shall have been graded, loamed and seeded in accordance with Park Specifications;
 - (b) there is a satisfactory catch of grass in the opinion of the Director, Parks;
 - (c) if applicable, the paved reserve pathway has been constructed; and
 - (d) all other reserve parcels have been graded and loamed and the construction of all the necessary underground irrigation and fencing required under this Agreement have been completed to the satisfaction of the Director, Parks.

- (13) Optional Subdivision Amenities shall be maintained in accordance with the time period to be determined by the Manager, Urban Development in the Special Clauses Agreement or as otherwise agreed to in writing between the Parties;

- (14) Street lighting, walkway lighting and reserve pathway lighting that is installed within the Development Area through the Developer's private arrangement and independently of the City, the Developer shall maintain all components of the street lighting, walkway lighting and reserve pathway lighting for two (2) years;

- (15) (a) Final top lift asphalt on paved roads, prior to the placement of which the Developer shall obtain the approval of the Manager, Urban Development, placed on any:
 - (i) Major Road Standard at any time, in addition to the Security requirements contained herein: two (2) years; or
 - (ii) road, other than a Major Road Standard, after September 15 in any year, in addition to the Security requirements contained herein: one (1) year.

- (b) The maintenance obligation pertaining to final top lift asphalt is limited to installation work and performance of materials, excluding third party damage or settlements.

PART XXIV
FINAL ACCEPTANCE CERTIFICATES

- 24.01 (1) (a) Not less than 3 months prior to the earliest maintenance expiry date as specified in the relevant Construction Completion Certificates for the Infrastructure or portion thereof noted in Paragraphs 23.07 (1), (2), (3), (4), (5), (8), (9), (10), (11) and (14), the Consulting Engineer, Contractor and the City, and for the infrastructure or portion thereof noted in paragraph 23.07(12), the landscape architect and the City, shall inspect the Infrastructure or portion thereof and the Consulting Engineer shall ensure that the Contractor corrects all damage, defects and deficiencies howsoever caused, except that caused by the negligence of the City or its agents, employees or servants in the performance of their duties on behalf of the City.
- (b) Subsequent to the correction of the said damage, defects and deficiencies, the Consulting Engineer and the City, or landscape architect and the City, as the case may be, shall execute a Joint Inspection Certificate.
- (c) Following the execution of the Joint Inspection Certificate referred to in subsection (b), the Consulting Engineer, or the landscape architect, as the case may be, shall submit to the City for the Infrastructure or portion thereof, four (4) copies of the Final Acceptance Certificate, duly signed and sealed by a signing officer of the Consulting Engineer or the landscape architect, as the case may be, together with the Joint Inspection Certificate.
- (2) (a) Notwithstanding 24.01(1), following the end of the second winter for the Infrastructure or portions thereof referenced in Paragraphs 23.07(6) and (7), and not less than three (3) months prior to the earliest maintenance period expiry date as specified in the relevant Construction Completion Certificates, or earlier if weather conditions permit, the City, Consulting Engineer and Contractor shall make a complete joint inspection of the same constructed pursuant to this Agreement.
- (b) The City and the Consulting Engineer shall prepare a joint report of any damage, defects and deficiencies discovered and shall forward a copy thereof to the Developer and his Consulting Engineer.
- (c) Following the correction of all damage, defects and deficiencies by the Contractor, the Consulting Engineer and the City, shall execute a Joint Inspection Certificate.
- (d) Following the execution of the Joint Inspection Certificate, the Consulting Engineer shall submit to the City, for that portion of the Infrastructure referenced in Paragraph 23.07(6) and (7), four (4) copies of the Final Acceptance Certificate, duly signed and sealed by a signing officer of the Consulting Engineer, together with the Joint Inspection Certificate.
- (3) (a) Within thirty (30) days of the City's receipt of the Final Acceptance Certificate, the Manager, Urban Development shall acknowledge the Final Acceptance Certificate provided that if the inspection shows, to his satisfaction, that the Infrastructure or portion thereof is complete and in accordance with the requirements of this Agreement, and that all top lift asphalt has been placed for

at least thirty (30) days from the date of the said Manager, Urban Development's approval.

- (b) In the event the conditions of Subparagraph 3(a) are not met, the Manager, Urban Development may reject the Final Acceptance Certificate and return to the Consulting Engineer the unsigned Final Acceptance Certificate and a written report of the defects and deficiencies to be corrected.
- (c) The Developer shall correct the defects and deficiencies in accordance with the said written report and shall resubmit the Final Acceptance Certificate to the City for acknowledgement.

24.02 The Developer also agrees, that until all of its obligations to supply final plans, easements and pay all monies owing to the City under this Agreement have been fulfilled, the City may refuse to accept the Development Area, and retain the Security as contemplated herein.

PART XXV **GENERAL PROVISIONS**

A. DEFECT OR DEFAULT BY DEVELOPER

25.01 Upon failure, neglect or refusal of the Developer to comply with any notice of defect or default in connection with this Agreement, given in writing to the Developer by the Manager, Urban Development, within thirty (30) days of the delivery of the notice to the Developer, the City shall have the right, and is hereby entitled but not obligated to take all or any of the following actions:

- (1) to remedy or cause to be remedied the defect or default;
- (2) to terminate this Agreement upon 15 days notice in writing to the Developer;
- (3) to complete or cause to be completed the development or portions thereof; and
- (4) to recover the costs of any action taken by the City pursuant to (a), (b), or (c) above, and any other monies owing to the City by the Developer under this Agreement, from the Developer by drawing upon the Security, or by any or all other methods of recovery, or any one of them, deemed advisable or expedient by the City including, but not limited to, any methods of recovery available to the City pursuant to the *Municipal Government Act*.

B. MAINTENANCE OF ACCESS ROUTE

- 25.02 (1) The Developer, at all times shall, to the satisfaction of the Manager, Urban Development provide and continuously maintain access to the Development Area for the provision of emergency services.
- (2) The Developer, at all times after any premises are occupied as dwellings within the Development Area, shall, to the satisfaction of the Manager, Urban Development provide and continuously maintain access to occupied premises for garbage removal and the provision of emergency services.

C. DUST, DIRT AND CONSTRUCTION MATERIAL DEBRIS CONTROL

- 25.03 (1) (a) The Developer is solely responsible for ensuring dust and dirt control within the Development Area to the satisfaction of the Manager, Urban Development.
- (b) The Developer shall take effective measures to reasonably control dust and dirt in the Development Area to the satisfaction of the Manager, Urban Development, and without limiting the generality of the foregoing, in any loam stockpile site so that dust and dirt originating therein shall not be conveyed by any means whatsoever or cause annoyance or become a nuisance to property owners and others within or adjacent to the Development Area.
- (c) (i) If the Developer's actions to control dust and dirt within the Development Area are not to the satisfaction of the Manager, Urban Development, he shall attempt to notify the Developer of the problem by telephoning the Developer or its Consulting Engineer.
- (ii) Notwithstanding any provision contained herein to the contrary, if the Manager, Urban Development is unable to contact the Developer or its Consulting Engineer, or if after notification the actions of the Developer or its Consulting Engineer to control dust and dirt within the Development Area are not to his satisfaction, then the City may take such steps as are necessary to eliminate the dust or dirt problem without further notice to and at the expense of the Developer, and shall within seventy-two (72) hours notify the Developer in writing of the action taken by the Manager, Urban Development.
- (2) (a) The Developer shall take effective measures, at no cost to the City, to reasonably control construction material debris arising in connection with activity within or related to the Development Area.
- (b) (i) The Developer shall remove any construction material debris deposited on any reserve lands located within and in proximity to the Development Area, which are being maintained by the City, within five (5) working days from the date of receiving written notice from the Director, Parks to remove the said debris.
- (ii) Notwithstanding anything to the contrary contained in this Agreement, if the Developer fails to remove the debris from the reserve lands within the time prescribed in the notice, the City may remove the construction material debris without further notice to and at the expense of the Developer.

D. LAND USE CLASSIFICATION SIGN

- 25.04 (1) The Developer shall be responsible for informing and keeping the public informed of all land use classifications, bus zones, community mail boxes, NEF zones, truck routes, overhead power feeder mains, sewage treatment plants, arterial roads, the location of School Sites (and when specified by the School Board the school building sites), reserve parcels, storm water ponds and other amenities within the Development Area, and the said information shall be shown in all brochures and billboards and other advertising where maps are used in connection with promotion and sale of lots in the Development Area.

The Developer shall make available to all prospective purchasers, in sales centres, information which includes the contact information pertaining to; the relevant Area Structure Plan, approved Outline Plan, Land Use Sign, the Community or Phase boundary, the Developer's land holdings within the community, location of future

development areas. The information shall include a statement indicating that development of land within the city is such that information may not be relevant in the future as landowners at any time may approach the City for a change of land use, subdivision or development permit, regardless of the information displayed or otherwise obtained by a prospective purchaser. The Developer shall also provide a list of questions for consideration by a prospective homeowner to consider when making their housing decision in relation to the information above.

- (2) The Developer shall erect the land use classification sign, as approved by the Director, Development and Building Approvals, in the Development Area showing the above mentioned amenities prior to issuance of building permits by the City.
- (3) If the Developer proposes to erect the land use classification sign on publicly owned lands, the Developer shall submit, for approval by the Manager, Urban Development, a plan showing the size and location of the said sign.
- (4) If the said sign is located on publicly owned lands, the Developer upon the removal of the said sign, shall rehabilitate, to the satisfaction of the Manager, Urban Development, the area disturbed as a result of the removal of the said sign.
- (5) Any sign located on publicly owned lands is an improvement and the City is indemnified therefore pursuant to the provisions of Part XX (Indemnification) herein.
- (6) The Developer shall maintain the said sign until the acknowledgement of the last Final Acceptance Certificate for the lands shown on the said sign, following which the Developer shall remove the said sign.

E. SURVEY CONTROL AND MAPPING

- 25.05 (1) (a) The Developer shall pay to the City a fee to replace any or all HPN survey control markers (within road allowances, surveyed roads or on private land) that have been removed or damaged due to the development of the area.
- (b) The replacement charges for any such HPN survey control markers shall be Five Thousand Dollars (\$5,000.00) for each HPN survey control marker.
- (2) The Developer, prior to the City's release of the linen for registration of the Development Area, shall pay to the City a fee of \$400.00 per hectare for each and every hectare or part thereof contained within the area outlined on the linen for the costs set out under Section 7 of the Surveys Act.

F. TRAFFIC DETOUR CONTROL

- 25.06 (1) Until the Construction Completion Certificate for paved roads, paved lanes and paved walkways is issued, the Developer shall make arrangements, at its sole cost and expense, satisfactory to the Director, Roads, for payment of the installation and maintenance by the City, of all traffic detour signs that may be required to control traffic on the streets within and along the boundaries of the Development Area; and
- (2) Until the Development Area has been accepted by the City, the Developer shall make satisfactory arrangements with the Director, Roads, for the installation and maintenance of traffic detour signs, as required, during the maintenance period.

G. RECREATIONAL VEHICLE PARKING

25.07 Using its best efforts, the Developer shall provide to the purchaser(s) of each lot located within the Development Area notice of restrictions on the parking of recreational vehicles by way of written notice (information package) or by inclusion in any architectural controls for the lots located in the Development Area:

“City of Calgary Land Use Bylaw 1P2007, as amended, and the Calgary Traffic Bylaw 26M96 restrict the parking of recreational vehicles, other vehicles, trailers, etc. either in front of or in the front yard of residential properties. Owners of lots in laneless residential subdivisions are advised to familiarize themselves with these restrictions if they own or intend to own vehicles, trailers, etc. other than passenger vehicles.”

H. CESSATION OF RIGHT TO INSTALL OR CONSTRUCT

25.08 At any time after the Payment Date, the City may provide the Developer with thirty (30) days written notice that the Developer’s right to install and construct the Infrastructure, or any portion thereof, shall cease thirty (30) days after receiving the notice, and thirty (30) days after the receiving such notice, the Developer’s right to install and construct the Infrastructure or portion thereof shall cease.

25.09 On the first day of January in each year following the Payment Date:

- (1) all assessments, charges and other sums of money to be paid by the Developer to the City under this Agreement shall be deemed to have been adjusted in accordance with the rates that are approved for the then current year regardless of whether or not such rates are established prior to, on or after January 1st;
- (2) any reference in this Agreement to all City Specifications, shall in respect of work performed after the Payment Date, be deemed to be a reference to the City Specifications approved for the then current year; and
- (3) notwithstanding the foregoing, the Park Specifications shall apply for one (1) additional year following the Payment Date.

25.10 (1) For greater clarity, the assessments, charges and sums of money to be paid by the Developer, as set out herein, shall apply only in respect of work and payments made prior to the Payment Date.

(2) In the event of any dispute as to the applicable rate or the City Specifications applicable for any year, the decision of the Manager, Urban Development shall be final and binding upon the parties.

I. INVOICING AND PAYMENT

25.11 (1) The Developer shall pay to the City all amounts owing, excluding deposits, for work to be done or materials to be supplied by the City.

(2) The amounts of such billing shall be based on the proportion of the area of land for which building permits have been issued to the actual total area of land shown on the registered plans of the Development Area to the nearest 1% on a monthly basis, with all balances due and payable on or before the Payment Date, unless otherwise specified in writing by the Manager, Urban Development.

- (3) The Developer shall pay to the City all deposits to cover work or materials which the City may be required to do, or supply, under this Agreement before the 31st day of December of the year in which the Special Clauses Agreement is executed; however, street lighting, walkway lighting and reserve pathway lighting deposits which shall be due and payable in accordance with Part XV (Street Lighting, Walkway Lighting and Reserve Pathway Lighting), failing which the City may collect the monies as set out in Paragraph 25.01 of this Agreement.
- (4)
 - (a) The Developer shall comply with and abide by all laws and the lawful directions of any authority or person regarding the imposition, collection or payment of any federal or provincial taxes, rates, levies, duties or assessments (hereinafter called the "Taxes").
 - (b) All sums of money set out herein (or to be calculated or determined as provided herein) are expressed exclusive of any Taxes which may be imposed in respect of this Agreement or any work, matter or thing contemplated herein.
 - (c) The Developer shall pay and be solely responsible for all Taxes arising out of this Agreement or any work, matter or thing contemplated herein.
 - (d) The Developer shall indemnify and save harmless the City, its officers, agents, employees and contractors from and against all Taxes arising in connection with this Agreement or any work, matter or thing contemplated herein.
- (5) Notwithstanding anything to the contrary contained herein, including the provisions of Paragraphs 2.07, 2.08, and 25.08 through 25.11, all amounts that are due and payable by either of the parties herein, shall be paid within thirty (30) days from the date of billing of an invoice approved for payment by the invoiced party.

J. PAYMENTS

- 25.12 (1) If payment for an approved invoice has not been made within thirty (30) days from the date of billing thereof, then the party requesting payment shall be entitled to receive an additional payment for interest, at the rate of one and one half (1.5%) percent per month (18% per annum) or as otherwise provided by City Bylaw Number 104/75, as amended from time to time.
- (2) In the event of the Developer's default in payment, the City may without further notice recover the amount outstanding in accordance with Paragraph 25.01.

K. PENALTIES

- 25.13 (1) The Developer shall not install the Infrastructure, or any portion thereof, without first obtaining from the Manager, Urban Development, written permission to construct the Infrastructure or portion thereof.
- (2) In the event the Developer proceeds with the installation of the Infrastructure, or any portion thereof prior to obtaining the permission to construct referenced in subparagraph (1), the City may impose a penalty of up to a maximum of \$10,000 for each and every day the Developer proceeds without the required permission to construct.
- (3) (a) The amount of the penalty shall be solely determined by the Manager, Urban Development and shall be paid by the Developer within thirty (30) days of the mailing of an invoice by the City, which shall immediately become a debt due and owing the City.

- (b) If payment of the invoice referred to in subparagraph (a) has not been received by the City within thirty (30) days of mailing the invoice, the City shall be entitled to recover the amount in accordance with Paragraph 25.01.

IN WITNESS WHEREOF the Parties hereto have hereunto affixed their corporate seals duly attested by the hands of their proper signing officers in that behalf and the individual parties have hereunto set their hands as properly witnessed on the date ascribed above.

APPROVED	
As To Content	
Subdivision Development Coordinator	
Manager Urban Development	
As To Form	
Law Department	

THE CITY OF CALGARY

General Manager

City Clerk

DEVELOPER

Signature
Name:
Title:

(Corporate Seal)

Signature:
Name:
Title:

**2009 MASTER DEVELOPMENT AGREEMENT
UNIT RATES SCHEDULE**

**APPROVED RATES FOR SANITARY SEWERS AND STORM SEWERS
PIPE SUPPLY COSTS**

- NOTE:**
- 1) Concrete Pipe costs are based on 2009 market prices supplied by Lafarge Construction Materials
 RG – Rubber gasket pipe or equivalent, including gaskets, etc.
 SRC – Sulphate resistant concrete pipe
 - 2) PVC pipe costs are based on 2009 market prices as supplied by IPEX for the 2004 Development Agreement Rates
 - 3) Ultra Ribbed pipe costs are based on 2009 pipe supply prices to the City of Calgary as supplied by IPEX
 - 4) Pipe supply costs do not included G.S.T.

A. SDR 35 PVC PIPE & PVC PROFILE PIPE

Note: Pipe Joints are bell and spigot

PIPE SIZE (mm)	PVC	ULTRA-RIBBED
150	11.5	NA
200	20.34	15
250	32.34	20
300	46.33	28
375	66.52	40
450	100.00	62
525	150.00	90
600	190.00	115
675	250.00	NA
750	350.00	160
900	450.00	260
1050	600.00	NA

B. REINFORCED CONCRETE PIPE – C76

Note: Pipe Joints are tongue and groove

PIPE SIZE	CLASS II SRC	CLASS III SRC	CLASS IV SRC	CLASS V SRC
	RG	RG	RG	RG
300	-	-	-	63.00
375	-	-	-	79.00
450	-	-	-	98.00
525	-	-	-	129.00
600	-	-	170.00	175.00
675	-	-	223.00	254.00
750	-	-	282.00	314.00
900	-	358.00	389.00	450.00
1050	425.00	445.00	507.00	600.00
1200	523.00	555.00	665.00	805.00
1350	670.00	710.00	835.00	950.00
1500	770.00	835.00	1,000.00	1,165.00
1650	925.00	1,000.00	1,160.00	1,380.00
1800	1,065.00	1,210.00	1,385.00	1,600.00

**2009 MASTER DEVELOPMENT AGREEMENT
UNIT RATES SCHEDULE**

**C. SDR 35 PVC PIPE , PVC PROFILE PIPE AND REINFORCED CONCRETE (C76) PIPE
PLACING COSTS**

PIPE SIZE	DEPTH RANGES IN METRES									
	0-2.5	2.5-3.0	3.0-3.5	3.5-4.0	4.0-4.5	4.5-5.0	5.0-5.5	5.5-6.0	6.0-6.5	6.5-7.0
150	85.00	89.00	93.00	96.00	101.00	110.00	123.00	139.00	159.00	180.00
200	85.00	89.00	93.00	96.00	101.00	110.00	123.00	139.00	159.00	180.00
250	88.00	92.00	96.00	100.00	105.00	114.00	127.00	144.00	165.00	187.00
250	100.00 CATCH BASINS – ALL DEPTH RANGES									
300	88.00	92.00	96.00	100.00	105.00	114.00	127.00	144.00	165.00	187.00
300	100.00 CATCH BASINS – ALL DEPTH RANGES									
375	103.00	107.00	111.00	116.00	121.00	131.00	145.00	163.00	186.00	209.00
450	105.00	109.00	113.00	118.00	125.00	135.00	150.00	168.00	191.00	214.00
525	108.00	112.00	116.00	121.00	129.00	140.00	155.00	174.00	197.00	220.00
600	110.00	114.00	117.00	122.00	134.00	146.00	162.00	182.00	204.00	228.00
675	112.00	116.00	119.00	125.00	139.00	153.00	170.00	191.00	211.00	236.00
750	115.00	119.00	122.00	128.00	142.00	156.00	173.00	194.00	216.00	239.00
900	118.00	123.00	127.00	134.00	148.00	163.00	182.00	204.00	226.00	253.00
1050	122.00	127.00	132.00	140.00	155.00	171.00	191.00	214.00	236.00	271.00
1200	129.00	135.00	142.00	151.00	168.00	186.00	209.00	233.00	256.00	182.00
1350	132.00	138.00	146.00	156.00	174.00	194.00	219.00	245.00	271.00	301.00
1500	135.00	141.00	150.00	161.00	180.00	203.00	229.00	257.00	287.00	321.00
1650	139.00	145.00	155.00	168.00	185.00	213.00	243.00	274.00	307.00	348.00
1800	143.00	149.00	161.00	176.00	184.00	223.00	257.00	291.00	327.00	374.00

NOTE: Sewer prices for all sewers over 1800 mm in size and/or deeper than 7.0 m to be established by a public tender with concrete duct or equivalent capacity as an alternative.

Pipe supply costs in the schedules are F.O.B. plant. Delivery from the plant is included in the pipe placing costs.

**APPROVED RATES FOR SANITARY SEWER AND STORM SEWER MANHOLES
MATERIALS AND PLACING COSTS**

TYPE & SIZE	DEPTH RANGES IN METRES									
	0 - 2.5	2.5 - 3.0	3.0 - 3.5	3.5 - 4.0	4.0 - 4.5	4.5 - 5.0	5.0 - 5.5	5.5 - 6.0	6.0 - 6.5	6.5 - 7.0
5A	2,530.00	3,036.00	3,542.00	4,048.00	4,554.00	5,060.00	5,566.00	6,072.00	6,578.00	7,084.00
1 - S 1220 X 1220	4,536.75	5,042.75	5,548.75	6,054.75	6,560.75	7,066.75	7,572.75	8,078.75	8,584.75	9,090.75
1 - S 1500 X 1500	6,083.50	6,589.50	7,095.50	7,601.50	8,107.50	8,613.50	9,119.50	9,625.50	10,131.50	10,637.50
1 - S 1800 X 1800	7,935.00	8,441.00	8,947.00	9,453.00	9,959.00	10,465.00	10,971.00	11,477.00	11,983.00	12,489.00
1 - S 2100 x 2100	10,810.00	11,270.00	11,730.00	12,190.00	12,765.00	13,340.00	13,915.00	14,490.00	15,065.00	15,640.00
1 - S 2400 X 2400	15,881.50	16,387.50	16,893.50	17,399.50	17,905.50	18,411.50	18,917.50	19,423.50	19,929.50	20,435.50
T - RISER 1200	6,785.00	7,302.50	7,808.50	8,314.50	8,820.50	9,326.50	9,832.50	10,338.50	10,844.50	11,350.50
T - RISER 1350	7,595.75	8,101.75	8,607.75	9,113.75	9,619.75	10,125.75	9,481.75	9,987.75	11,643.75	12,149.75

Continued on next page

**2009 MASTER DEVELOPMENT AGREEMENT
UNIT RATES SCHEDULE**

TYPE & SIZE	DEPTH RANGES IN METRES									
	0 - 2.5	2.5 - 3.0	3.0 - 3.5	3.5 - 4.0	4.0 - 4.5	4.5 - 5.0	5.0 - 5.5	5.5 - 6.0	6.0 - 6.5	6.5 - 7.0
T - RISER 1500	8,326.00	8,832.00	9,338.00	9,844.00	10,350.00	10,856.00	11,362.00	11,868.00	12,374.00	12,880.00
T - RISER 1650	8,935.50	9,441.50	9,947.50	10,453.50	10,959.50	11,465.50	11,971.50	12,477.50	12,983.50	13,489.50
T - RISER 1800	9,683.00	10,189.00	10,695.00	11,201.00	11,707.00	12,213.00	12,719.00	13,225.00	13,731.00	14,237.00
NOTE:	T-Riser manholde prices include the cost of one length of pipe, 2400 mm. Manhole prices are resistant concrete. 2100 X 2100 Type 1-S is not regular supply. Price shown is based on 2400 X 2400 as supplied by Lafarge Construction Materials									

**APPROVED RATES FOR SANITARY SEWERS AND STORM SEWERS
MISCELLANEOUS COSTS**

ITEM	DESCRIPTION	UNIT PRICE PER CUBIC METRE
1	Rock excavation - Type A - Type B	\$15.00 \$35.00
2	Concrete bedding	\$275.00
3	Washed gravel	\$38.00
4	Bulk concrete in place	\$200.00
5	Reinforced concrete in place	\$300.00
6	Ordinary gravel backfill	\$30.00
7	Reinforced concrete outfall	\$450.00
8	Screened gravel	\$50.00
9	Crushed gravel for surface restoration	\$50.00
10	Compaction To be paid only on boundary conditions or where the City pays for full cost of the installation. Using the formula: Amount of compaction (m3) = length x (depth - 0.61m) x 1.07m Depth = Centre Line Depth to Pipe Invert (meters) Length - Length of Trench (meters) Trench Width - 1.07 meters for all pipe sizes	\$5.00
NOTE:	Any claim for any items noted above must be in excess of \$250.00 and all items must be authorized as provided in clause 2.07 of the 2009 Development Agreement.	

**2009 MASTER DEVELOPMENT AGREEMENT
UNIT RATES SCHEDULE**

**APPROVED RATES FOR WATERWORKS
SUPPLY AND PLACING COSTS**

ITEM	DESCRIPTION	UNIT PRICE PER LINEAR METRE
1	Trenching, laying, jointing, backfilling and supply of the water distribution pipe including cathodic protection for fittings.	
	A. 400 mm Mains	
	0 m 3 m Cover	\$338.00
	3 m 3.6 m Cover	\$350.00
	3.6 m 4.2 m Cover	\$360.00
	4.2 m 4.9 m Cover	\$370.00
	B. 300 mm Mains	
	0 m 3 m Cover	\$263.00
	3 m 3.6 m Cover	\$270.00
	3.6 m 4.2 m Cover	\$280.00
	4.2 m 4.9 m Cover	\$290.00
	C. 250 mm Mains	
	0 m 3 m Cover	\$206.00
	3 m 3.6 m Cover	\$210.00
	3.6 m 4.2 m Cover	\$220.00
	4.2 m 4.9 m Cover	\$230.00
	D. 200 mm Mains	
	0 m 3 m Cover	\$167.00
	3 m 3.6 m Cover	\$170.00
	3.6 m 4.2 m Cover	\$180.00
	4.2 m 4.9 m Cover	\$190.00
	E. 150 mm Mains	
	0 m 3 m Cover	\$139.00
	3 m 3.6 m Cover	\$140.00
	3.6 m 4.2 m Cover	\$150.00
	4.2 m 4.9 m Cover	\$160.00
	F. 100 mm Mains	
	0 m 3 m Cover	\$130.00
	3 m 3.6 m Cover	\$140.00
	3.6 m 4.2 m Cover	\$150.00
	4.2 m 4.9 m Cover	\$160.00

**2009 MASTER DEVELOPMENT AGREEMENT
UNIT RATES SCHEDULE**

ITEM	DESCRIPTION	UNIT PRICE PER LINEAR METRE
3	Encased Water Main – Augering Method Material, equipment and labour to install encased water main by an augering method in conformity to the Standard Specifications Waterworks Construction.	
	150 mm Carrier Pipe c/w Encasement Pipe	\$370.00
	200 mm Carrier Pipe c/w Encasement Pipe	\$510.00
	250 mm Carrier Pipe c/w Encasement Pipe	\$660.00
	300 mm Carrier Pipe c/w Encasement Pipe	\$810.00
	400 mm Carrier Pipe c/w Encasement Pipe	\$950.00
		UNIT PRICE PER EACH
4	Supply, setting and jointing of hydrants including seat and anchor blocks and all fittings, coating, cathodic protection (hydrant lead and valve extra at unit price for pipe and valve).	\$4,653.00
5	Supply, setting and joint valves, including box and rod, coating and cathodic protection.	
	A 400 mm Valves	\$6,100.00
	B 300 mm Valves	\$2,600.00
	C 250 mm Valves	\$2,100.00
	D 200 mm Valves	\$1,400.00
	E 150 mm Valves	\$1,100.00
6	Supply and installation of Pressure Reducing Valve(s) and Chamber(s) including excavating backfilling, compacting, mechanical piping, and appurtenances. The depth range is 0 – 4.2 m as measured from the pipe invert to finished grade.	
	Single PRV installation per Std. Dwg. 453-1039-001	
	A 150 mm	\$18,400.00
	B 200 mm	\$23,100.00
	C 250 mm	\$28,900.00
	Dual PRV installation per Std. Dwg. 453-1038-001	
	A 150 mm	\$26,500.00
	B 200 mm	\$32,600.00
	C 250 mm	\$39,000.00
	All materials and installations shall conform to the 2009 Standard Specifications, Waterworks Construction.	
		UNIT PRICE PER CUBIC METRE
7	Rock excavation - Type A	\$15.00
	- Type B	\$35.00

Continued on next page

**2009 MASTER DEVELOPMENT AGREEMENT
UNIT RATES SCHEDULE**

8	Sand bedding material		\$15.00
9	20 mm crushed gravel in trenches		\$25.00
10	Pit run gravel in trenches		\$32.00
11	Compaction	To be paid only on boundary conditions or where the City pays for full cost of the installation. Using the formula: Amount of compaction (m3) = length x (depth – 0.61m) x 1.07m Depth = Centre Line Depth to Pipe Invert (meters) Length – Length of Trench (meters) Trench Width – 1.07 meters for all pipe sizes	\$5.00
<p>NOTE: Any claim for any items noted above must be in excess of \$250.00 and all items must be authorized as provided in clause 2.07 of the 2009 Development Agreement.</p>			

APPROVED RATES FOR SIDEWALK, CURB AND GUTTER

ITEM	DESCRIPTION	UNIT	UNIT RATE
1	Sidewalk only (includes lane aprons with wire mesh and/or reinforcing bars)	m2	\$75.60
2	Median (concrete) infill	m2	\$77.20
3	Curb and Gutter		
	A Standard or Low Profile – 250 mm – Class "A" concrete	m	\$71.60
	B Standard or Low Profile – 250 mm – Class "B" concrete	m	\$70.90
	C Standard (on asphalt base) – 250 mm – Class "A" concrete	m	\$70.10
	D Low Profile (on asphalt base) – 250 mm – Class "A" concrete	m	\$70.10
	E Standard (on asphalt base) – 500 mm – Class "A" concrete	m	\$78.25
	F Low Profile (on asphalt base) – 500 mm – Class "A" concrete	m	\$78.20
4	Combined Sidewalk, Curb and Gutter		
	A Standard Curb – 1100 mm walk – Class "A" concrete	m	\$108.50
	B Standard Curb – 1100 mm walk – Class "B" concrete	m	\$108.40
	C Low Profile Curb – 1100 mm walk – Class "A" concrete	m	\$107.50
	D Low Profile Curb – 1100 mm walk – Class "B" concrete	m	\$107.25
	E Standard Curb – 1525 mm walk – Class "A" concrete	m	\$125.10
	F Standard Curb – 1525 mm walk – Class "B" concrete	m	\$125.10
	G Low Profile Curb – 1525 mm walk – Class "A" concrete	m	\$123.60
	H Low Profile Curb – 1525 mm walk – Class "B" concrete	m	\$123.60
5	Catch Basins and Inlet Control Devices		
	A Single Type C	ea.	\$3,130.00
	B Twin Type C	ea.	\$4,730.00
	C Type K-2 Single	ea.	\$3,350.00
	D Type K-2 Twin	ea.	\$4,840.00
	E Plug Inlet Control Device 200 mm	ea.	\$375.00
	F Plug Inlet Control Device 250 mm	ea.	\$375.00
	G Plug Inlet Control Device 300 mm	ea.	\$375.00
	H Framed Inlet Control Device (250 to 300 mm)	ea.	\$375.00

Continued on next page

**2009 MASTER DEVELOPMENT AGREEMENT
UNIT RATES SCHEDULE**

ITEM	DESCRIPTION	UNIT	UNIT RATE
6	Concrete Invert Crossing A Overland concrete drainage	m	\$88.00
7	Breakout and Replace (Residential) A Sidewalk only B Curb and Gutter only C Combined Sidewalk, Curb and Gutter D Asphalt Rehab 250 mm width E Boulevard Rehab 250 mm width	m2 m m m m	\$117.80 \$130.10 \$181.80 \$31.00 \$21.00
8	Breakout and Replacement (Majors) A Curb and Gutter (standard or low profile) 250 mm Class "A" Concrete on Asphalt Base B Curb and Gutter (standard or low profile) 500 mm Class "A" Concrete on Asphalt Base C Asphalt Rehab 250 mm width D Boulevard Rehab 250 mm width	m m m m	\$118.90 \$141.60 \$31.00 \$21.00
NOTE:	The above prices include unstable material costs. The Rates for Items 1 through 8 are not applicable on oversize recoveries for 2009 Development Agreements. The oversize calculations are based on the Linear Metre Rates on Pages 10 and 11.		

APPROVED RATES FOR PAVING AND LANES

ITEM	DESCRIPTION	UNIT	UNIT RATE
1	Conventional Construction A Excavation and Disposal (in place measurements) B Subgrade preparation C Pit run gravel (placed and compacted) D 25 mm crushed gravel E Prime on 25 mm crushed gravel F Tack coat on asphalt G Asphaltic Mix "A" H Asphaltic Mix "B"	m3 m2 Tonne Tonne m2 m2 Tonne Tonne	\$4.20 \$1.90 \$21.30 \$30.00 \$0.65 \$0.42 \$83.40 \$105.50
2	Full Depth Construction A Excavation and Disposal B Subgrade preparation C Tack Coat D Asphaltic Mix "A" E Asphaltic Mix "B"	M3 M2 M2 Tonne Tonne	\$4.20 \$1.90 \$0.42 \$83.40 \$105.50
Continued on next page			

**2009 MASTER DEVELOPMENT AGREEMENT
UNIT RATES SCHEDULE**

ITEM	DESCRIPTION	UNIT	UNIT RATE
3 (i)	Residential Roads		
	A Excavation and Disposal	m2	\$1.35
	B Subgrade preparation	m2	\$1.90
	C Asphaltic Mix "A" 110 mm lift	m2	\$22.65
	D Tack Coat	m2	\$0.42
	E Asphaltic Mix "B" 40 mm	m2	\$10.60
	TOTAL USE RATE		\$36.92 \$37.00
3 (ii)	Conventional Construction - The following rates shall be used to determine the cost per square metre for non-standard pavement construction		
	A Excavation and Disposal (50 mm depth)	m2	\$0.75
	B Subgrade preparation (do not pro-rate)	m2	\$1.90
	C Base gravel – 50 mm lift	m2	\$2.60
	D 25 mm crushed gravel – 50 mm lift	m2	\$3.60
	E Prime on 25 mm crushed gravel (do not pro-rate)	m2	\$0.65
	F Asphaltic Mix "A" – 50 mm lift	m2	\$10.25
	G Tack Coat (per application)	m2	\$0.42
	H Asphaltic Mix "B" – 50 mm lift	m2	\$12.50
4 (i)	Residential Collector & Industrial		
	A Excavation and Disposal	m2	\$1.40
	B Subgrade preparation	m2	\$1.90
	C Asphaltic Mix "A" 185 mm – 2 lifts	m2	\$38.20
	D Tack Coat (2 applications)	m2	\$0.85
	E Asphaltic Mix "B" 40 mm lift	m2	\$10.60
	TOTAL USE RATE		\$52.95 \$53.00
4(ii)	Major		
	A Excavation and Disposal	m2	\$1.80
	B Subgrade preparation	m2	\$1.90
	C Asphaltic Mix "A" - 235 mm – 2 lifts	m2	\$46.75
	D Tack Coat (2 applications)	m2	\$0.85
	E Asphaltic Mix "B" – 40 mm lift	m2	\$10.60
	TOTAL USE RATE		\$61.90 \$6200
5 (i)	Asphalt under 500 mm Curb and Gutter	LM	\$19.35
5 (ii)	Asphalt under 250 mm Curb and Gutter	LM	\$17.90
6	Asphalt Median Strips		
	A Excavation and subgrade compaction	m2	\$8.50
	B 25 mm crushed gravel (placed)	m2	\$3.90
	C Asphaltic Mix "B" – 50 mm	m2	\$12.75
	TOTAL USE RATE		\$25.15 \$25.00

Continued on next page

**2009 MASTER DEVELOPMENT AGREEMENT
UNIT RATES SCHEDULE**

ITEM	DESCRIPTION	UNIT	UNIT RATE
7 (i)	Gravelled Lanes		
	A Excavation and Disposal	M3	\$4.80
	B 25 mm crushed gravel	Tonne	\$29.60
7 (ii)	Lane Construction		
	A Excavation and Disposal	m2	\$4.90
	B Subgrade preparation	m2	\$2.30
	C 25 mm crushed gravel – 75 mm lift	m2	\$5.50
	TOTAL USE RATE		\$12.70
			\$12.70
8	Asphalt Walkway and Pedestrian / Bicycle Paths		
	A Excavation	m2	\$4.85
	B Subgrade preparation	m2	\$3.20
	C Asphaltic Mix "B" 100 mm lift at double rate	m2	\$28.90
	TOTAL USE RATE		\$36.95
			\$37.00
9	Miscellaneous Asphalt Works		
	A Asphalt planing – less than 100 m2	m2	\$28.75
	B Asphalt planing – more than 100 m2	m2	\$7.40
	C Asphalt Removal and Disposal over 100 m2	m2	\$17.80
NOTE:	The Rates for Items 2 through 9 are not applicable on oversize recoveries for 2009 Development Agreements. The oversize calculations are based on the Linear Metre Rates below.		

APPROVED RATES FOR PAVING

ITEM	DESCRIPTION	UNIT	UNIT RATE
1	Major Standard Roads		
	A Divided – 16.0 metre wide carriageway on 36 metre R.O.W.		
	(i) Half Cost (with no Traffic Signals)	Lineal Metre	\$1,545.00
	(ii) Full Cost (with no Traffic Signals)	Lineal Metre	\$3,090.00
	(iii) Top Lift Holdback Half Cost	Lineal Metre	\$115.00
	(iv) Top Lift Holdback Full Cost	Lineal Metre	\$230.00
	B Divided – 14.8 metre wide carriageway on 36 metre R.O.W.		
	(i) Half Cost (with no Traffic Signals)	Lineal Metre	\$1,500.00
	(ii) Full Cost (with no Traffic Signals)	Lineal Metre	\$3,000.00
	(iii) Top Lift Holdback Half Cost	Lineal Metre	\$106.00
	(iv) Top Lift Holdback Full Cost	Lineal Metre	\$212.00
	Continued on next page		

**2009 MASTER DEVELOPMENT AGREEMENT
UNIT RATES SCHEDULE**

ITEM	DESCRIPTION	UNIT	UNIT RATE
	Major Standard Roads continued		
	C Undivided – 14.8 metre wide carriageway on 36 metre R.O.W.		
	(i) Half Cost (with no Traffic Signals)	Lineal Metre	\$1,340.00
	(ii) Full Cost (with no Traffic Signals)	Lineal Metre	\$2,680.00
	(iii) Top Lift Holdback Half Cost	Lineal Metre	\$106.00
	(iv) Top Lift Holdback Full Cost	Lineal Metre	\$212.00
	D Divided Local Major 27 metre R.O.W.		
	(i) Half Cost (with no Traffic Signals)	Lineal Metre	\$1,395.00
	(ii) Full Cost (with no Traffic Signals)	Lineal Metre	\$2,790.00
	(iii) Top Lift Holdback Half Cost	Lineal Metre	\$106.00
	(iv) Top Lift Holdback Full Cost	Lineal Metre	\$212.00
2	Collector Standard Road – 12.0 metre wide carriageway on 21 metre R.O.W.		
	(i) Half Cost	Lineal Metre	\$875.00
	(ii) Full Cost	Lineal Metre	\$1,750.00
NOTE:	The Rates for Items 1 and 2 are to be used in calculating oversize payments and deposits for 2009 Development Agreements. The above rates include 5% for Engineering and 5% for Administration.		

APPROVED RATES FOR BUS LAYBY COST RECOVERY

DESCRIPTION	UNIT	UNIT RATE
Bus Layby cost recovery	Lump Sum	
20 Metre Length – lump sum		\$14,960.00
25 Metre Length – lump sum		\$17,050.00
37 Metre Length – lump sum		\$22,220.00
NOTE:	The above rates include 5% for Engineering and 5% for Administration.	

APPROVED RATES FOR FENCING

DESCRIPTION	UNIT	UNIT RATE
1.80 metre high chain link fence		
Includes wire mesh, poles and installation	Lineal Metre	\$52.00
NOTE:	The above rates include 5% for Engineering and 5% for Administration.	

**2009 MASTER DEVELOPMENT AGREEMENT
UNIT RATES SCHEDULE**

APPROVED RATES FOR PARKS AND BOULEVARDS

DESCRIPTION		UNIT	UNIT RATE
A	Includes supplying of loam to 150 mm in depth, preparation (levelling And rototilling) and seeding. (Does not include any excavation)	m2	\$3.65
B	Includes supplying of loam to 150 mm in depth, excavation, preparation (levelling and rototilling) and seeding	m2	\$5.35
C	Community and District Parks – Building Envelope Areas	hectare	\$37,813.00
D	Community and District Parks – MSR Areas	hectare	\$105,522.00
NOTE:	The above rates for items C and D above do not include GST.		

**APPROVED RATES FOR INSTALLATION OF UNDERGROUND
TRAFFIC CONTROL DUCTS**

DESCRIPTION		UNIT	UNIT RATE
A	Includes excavation, installation of traffic control ducts, backfilling, Compaction of ditches and where applicable, road rehabilitation.	Linear metre	\$43.65
B	The Contractor will supply pull rope, duct material, duct end markers and a scaled drawing of the intersection showing the location of the duct end markers.		
NOTE:	The above rates for items C and D above do not include GST.		

**2009 MASTER DEVELOPMENT AGREEMENT
UNIT RATES SCHEDULE**

APPROVED RATES FOR STREET LIGHTING

DESCRIPTION	UNIT	UNIT RATE
1 The 2009 Street Lighting Rate for residential, collector roads, registered walkway and reserve pathway.	Linear metre	\$117.00
2 The 2009 Street Lighting Rate for major roads: Applicable if one carriageway is developed Applicable if both carriageways are developed	Linear metre Linear metre	\$114.00 \$228.00
3 All above rates shall apply in all standard developments subject to the conditions outlined in Clause 90 of the Development Agreement.		
4 Reserved pathway lighting rate will only apply to all Reserve Pathways that are required to be lit for the transit pedestrian movement.		
5 The formula for calculating linear metre is as follows: a) Linear length of roadways to be lighted are calculated based on the City of Calgary's established "Road Net" road centre line mapping product. This replaces the previous complicated method of lot assessment involving measurement of both sides of the residential roads with allowance for MRs, ERs, sides of corner lots etc. b) Linear length for roadways with double centre lines will be the average length of two lines. c) At intersections, the end point for each roadway will be the point where the two centre lines meet.		

APPROVED RATES FOR STORM POND COST SHARING

DESCRIPTION	RATE
1 Storm Pond Base Recovery Rate	\$21,500.00

**2009 MASTER DEVELOPMENT AGREEMENT
STORM SEWER ASSESSMENT LEVY TABLE**

No.	AREA SERVED BY THE:	COST PER HECTARE
1	Bow River Watershed	\$2,300.00
2	Elbow River Watershed	\$200.00
3	Fish Creek Watershed	\$200.00
4	Nose Creek Watershed	\$15,300.00
5	Pine Creek Watershed	\$3,100.00
6	Shepard Watershed	\$41,200.00