

Response to City of Cambridge, Region of Waterloo and Grand River Conservation Authority Post-Circulation Comments – iPort Cambridge Draft Plan of Subdivision 30T-20102

City of Cambridge Comments	
Comment – Development Planning	Response
My previous comments on the lands west of Street A have been addressed through the second submission	Acknowledged
City staff would like to clarify our previous comment on the first submission to state that in the future the City is supportive of large blocks being further subdivided so long as the subdivided lots meet the minimum 8 hectare size requirement as per the site specific Official Plan and Zoning By-law Amendments for these lands. City staff acknowledge that the large Business Park Blocks 1, 2 and 3 proposed in the draft plan of subdivision are 14.520 hectares, 36.584 hectares and 25.862 hectares respectively and could support 8 hectare blocks if subdivided in the future.	Noted
Planning Justification Report	
My previous comments on the Planning Justification Report have been largely addressed through the second submission. The following comments were not addressed from my previous comments: <ul style="list-style-type: none"> • Figures 1-11 – Identifies the Creekside Phase 1 and 2 lands as ‘Additional Lands Owned by Applicant’ when these lands are owned by Intermarket CAM Ltd. and not iPort Cambridge GP Inc. Please revise • Section 5.1 – The first paragraph of Section 5.1 still references the subject lands as Intermarket lands • Section 4.6 - City of Cambridge Zoning By-law – The 70 metre transition area should be referenced as ‘area’, not ‘zone’ to reflect the terminology in the site-specific provision. This is only applicable to the second last paragraph in this section, it is correctly referenced throughout the remainder of the document 	The Report has been updated to address the comments.

Urban Design Brief	
<p>My previous comments on the Urban Design Brief have been largely addressed through the second submission. The following comments were not addressed from my previous comments:</p> <ul style="list-style-type: none"> • Figures 1-2 – Similar to the comments made for the Planning Justification Report, the Figures identify the Creekside Phase 1 and 2 lands as ‘Additional Lands Owned by Applicant’ when these lands are owned by Intermarket CAM Ltd. and not iPort Cambridge GP Inc. Please revise • Section 1 - Introduction – The Official Plan and Zoning By-law Amendments are only applicable to the lands east of Intermarket Road 	The Brief has been updated to address the comments.
Environmental Planning - City	
Environmental Impact Study – General Comments	
<p>Wildlife Movement Corridor/Linkage</p> <p>The second submission provided further useful details with respect to the wildlife corridor in terms of a cross-section and proposed plantings. City Engineering have a number of comments with respect to the SWM function of the wildlife corridor that I am also interested in having answered. Particularly, how is the lowest portion of the wildlife corridor intended to function – will it be holding water only after a large storm event? How long will it take to infiltrate after a large storm event? How will this impact its use as a wildlife corridor? The SWM report states the wildlife corridor will encourage infiltration, but no details of how this will be achieved are provided. My previous comment to ensure that this area functions first and foremost as a wildlife corridor still applies</p>	Please see the EIS Addendum No. 2 prepared by NRSI
<p>Waterfowl Stopover and Staging Area</p> <p>The second submission provided additional information with respect to my previous questions on the waterfowl stopover and staging area. I echo comment 7 provided by the Grand River Conservation Authority on December 3, 2020 that suggests there is an opportunity to restore additional wetland habitat in the area located near the waterfowl stopover and staging monitoring area</p>	Please see the EIS Addendum No. 2 prepared by NRSI

Heritage Planning - City

The house of 105 Middle Block Road is outside the limits of the draft plan, but parts of the property are still included in the draft plan. The entire property is listed in the Heritage Properties Register. A Heritage Impact Assessment (HIA) is required to consider demolition of any building on the property; this includes the barn or shed across the street from 600 Riverbank Drive. Other secondary buildings are also on the property; they need to be evaluated in a HIA. It is suggested that a single HIA be submitted for the entire property of 105 Middle Block Road.

The heritage impact assessment from August 2019 provided many details of the barn construction, including the complex wood joinery for the roof structure and wall and floor supports.

The current report describes how most parts of the barn would be disassembled, moved off-site and stored, and eventually dispersed from the salvage company's property. The only large pieces to remain on-site would be the stone foundations; the stones are recommended for reuse within the new development.

Photographs document the building condition in November 2020. These, in addition to the pictures from 2019, provide a thorough photo documentation of the building. The building measurements show overall sizes but not fine details.

The report also includes proposed wording for a documentary plaque that is recommended for placement within the new development. Overall the report fulfills the MHAC resolution. Its acceptance by staff for further process is recommended.

A heritage condition for the draft plan of subdivision if approved will include completion of these and all other items of the salvage plan, to the satisfaction of City Planning staff.

Noted

Engineering Services - City	
Functional Servicing Report	
Section 6.1.1 Please revise this section based on the Intermarket Road Sanitary Trunk Sewer design drawings and design brief and provide sizing calculations for the trunk sewer. Please contact Alex Nichols (nicholsa@cambridge.ca) for a copy of the design brief.	Addressed. Report revised. The sanitary trunk sewer proposed for iPort will follow the recommendation per Sanitary Trunk Sewer Design Brief.
The Interim SPS located on Intermarket Road is located within Phase 1, specifically Phase 1B. Please revise.	Addressed. Report revised
Section 6.2 1st Paragraph – Please indicate whose Phase 2 you are referring to.	Addressed. Cambridge IP Park Phase 2 was referred to in this section. Report revised
3rd Paragraph – The watermain will not dead-end in the western portion of Phase 1. The watermain will permanently connect to the Region’s 600mm dia watermain located on the west side of the CP rail land at Boychuk Drive (formerly referred to as the E-W Collector Road).	Addressed. Report revised
Section 6.2.2 – 2nd Paragraph – Services for each block are referred to as being 250mm dia, however Drawing SS-01 refers to it as 200mm. Please provide sizing calculations supporting the need for a 250mm dia water service if that is required.	Report revised, the service lateral is 200mm
Sanitary Sewer Design Sheet	
A Block 9 label is shown but doesn’t correspond with the draft plan	Addressed, no Block 9 label is showing on the design sheet.
Section 5.1 – Under existing conditions, it appears that parts of Middle Block Road may drain into the subdivision. Please confirm if Middle Block Road has been accommodated for in Intermarket Road storm sewer design and if the road drains onto the subdivision in any other locations.	As per discussion with the city, under existing condition the iPort (south of Middle Block Rd) is generally higher than Middle Block Rd and the adjacent property on the north based on topo information. In addition, the proposed grading will make sure no drainage from iPort to Middle Block Rd.
Stormwater Management Report	
Section 4.4 On Drawing SWM-02, area 3018 drains to Allendale Road, however as noted in prior correspondence and meetings, no provisions were made	As per discussion, it is confirmed with the City that Catchment 3018 can discharge to the proposed Allendale sewer system based on the interim condition as per Allendale SWM by MTE. Catchment 3018 will be

<p>for the proposed Allendale Road storm sewer to collect post-development drainage from iPort lands. Please revise.</p>	<p>controlled to the allowable release rate as designed by MTE, before connecting or discharging to the proposed Allendale storm sewer. Please review the updated Section 4.1 and 4.4 for revised allowable release rates summarized.</p>
<p>Section 4.5 Table 4-4 – Confirm if the area of Intermarket Road south of the pond has been included on this table.</p>	<p>Confirmed; Please refer to Area ID-Intermarket Rd in the table, corresponding to VOH Subcatchment ID 3012, which includes the whole stretch of Intermarket plan within the Property boundary with a total area of 3.04 ha.</p>
<p>Table 4-4 – Block 2 is not permitted to drain to the proposed Allendale Road storm sewer. Please revise this table and any other relevant sections/tables.</p>	<p>As per discussion, it is confirmed with the City that Catchment 3018 can discharge to the propose Allendale sewer system based on the interim condition as per Allendale SWM by MTE. Catchment 3018 will be controlled to the allowable release rate as designed by MTE, before connecting or discharging to the proposed Allendale storm sewer. Please review the updated Section 4.1 and 4.4 for revised allowable release rates summarized.</p>
<p>Section 4.6 Please note that the status of the ownership of the land at the outlet to the existing culvert under Riverbank Drive needs to be reviewed.</p>	<p>Noted</p>
<p>The 2nd paragraph makes reference to the Wildlife/SWM corridor as providing bio-retention but the use of this corridor for bio- retention is not addressed in the report. Please review.</p>	<p>Addressed, the report has been reworded for clarification. The wildlife/SWM corridor will provide temporary surface storage for flow attenuation during storm events.</p>
<p>As noted above, Block 2 is not permitted to drain to the proposed Allendale Road storm sewer. Please revise.</p>	<p>As per discussion, it is confirmed with the City that Catchment 3018 can discharge to the propose Allendale sewer system based on the interim condition as per Allendale SWM by MTE. Catchment 3018 will be controlled to the allowable release rate as designed by MTE, before connecting or discharging to the proposed Allendale storm sewer. Please review the updated Section 4.1 and 4.4 for revised allowable release rates summarized.</p>

<p>Section 4.12.1 – Please indicate if there are any other benefits being provided by the cells from a quality or water balance perspective, other sections of the report refer to the cells as bio-retention areas.</p>	<p>Address, refers to updated Section 4.6 and Section 4.8. Opportunities of water quality (such as planting strategy recommended per iPort Cambridge EIS study by NRSI) and infiltration from the Wildlife/SWM Corridor should be refined during detailed design.</p>
<p>Appendix F</p>	
<p>Storm Water Quality & Permanent Pool Volume - Based on MOE SWM Planning and Design Manual Table 3.2, an imperviousness of 82.37% would equate to a total volume required of 245.62 m³/ha (205.62 m³/ha for permanent pool and 40m³/ha for extended detention). Please review and revise.</p>	<p>The storage volume should be calculated through linear interpolation based on the data points provided on Table 3.2 of MOE SWM manual. Therefore, 248.22m³/ha is a result of the interpolation. A note is provided in the App F for clarification.</p>
<p>Hydraulic Calculation Sheet Pond Storage Stage Discharge Calculations – - Volumes for 2 year are inconsistent with OTTHYMO output - Extended Detention volume is inconsistent with draw down time calculations. Total Outflow for 100 year is inconsistent with OTTHYMO output.</p>	<p>Addressed</p>
<p>Storm Sewer Design Sheet</p>	
<p>Maximum MH spacing is 90m for 600mm dia sewers and smaller and 130m for 600mm dia sewers and larger. Please revise.</p>	<p>Addressed</p>
<p>Intermarket Road catchment areas’ runoff coefficients are inconsistent with what was provided for Intermarket Road as part of the IP Park Phase 2 SWM Report. Please review.</p>	<p>Runoff coefficient per MTE's sewer design sheet is 0.75, which was referred to the calculation for iPort. In addition, 0.75 runoff coefficient is generally consistent with roadway runoff coefficient. Please note that the actual runoff co-efficient are subject to actual planning during detailed design.</p>
<p>Please indicate how the Regional event from each block tributary to the Wildlife/SWM corridor is conveyed to the SWM pond. And indicate how overland flow from Intermarket Road will be conveyed into the SWM pond.</p>	<p>Flows in excess of the pipe conveyance capacity are to be conveyed overland. For areas east of Intermarket Road where catchments will be controlled by the SWM pond, the overall concept of the proposed grading is to direct flows from each block towards the SWM corridor (as the corridor will be located at low points of the site). In addition, low point of Intermarket road (refer to road profile near MH4 on drawing PP-3) will be located between the SWM corridor and the pond inlet to</p>

	further convey flow to the pond as an end of pipe treatment. For area west of Intermarket Road, overland generally flows towards Intermarket Road and further reaches to the low point near the pond inlet.
Block 3 – 100 year controlled flow is inconsistent with OTTHYMO output.	Addressed. Refer to HYD 513 in VOH, roof flow from Block 3 is 1.078m ³ /s, which is consistent with the design sheet
Block 2 – Based on Drawing SWM-03 area is 3.75ha, please confirm.	Addressed. Area of catchment 3019 is revised in sewer design sheet
Additional Land – Drawing SWM-03 indicates 0.90. Please review.	Revised. Currently the additional land is not intended to be industrial or commercial (It is assumed that these lands will eventually be residential). Please note that the planning of such land use is subject to change in the future. Assumption is provided to runoff coefficient of Additional land at 0.58 (Assuming imperviousness at 50%) on drawings. Label for 3009 on SWM2 is also revised for consistency.
Future Block S, Additional Land, Future Block C and Future Block N – Please indicate where and how flows will enter Intermarket Road storm sewer.	As per discussion with the City, the connections from these future blocks were removed on drawings.
Please indicate how the 100 year flows have been added to flows in Intermarket Road storm sewer downstream of Wildlife/SWM corridor.	Design sheet revised. 5-Year control flow from SWM corridor is used instead for the sizing of minor drainage sewer system. During 100-Year storm event, flow will be attenuated within the SWM corridor before discharging to the pond. Please note that the hydrodynamic of the SWM corridor should be deferred to the detailed design stage to refine the actual hydraulic performance of the SWM facility.
Area 3012J pipe slope is inconsistent with Drawing SWM-03.	Revised
SWM Corridor – 100 year flow is inconsistent with OTTHYMO output.	Design sheet revised. 5-Year control flow from SWM corridor is used instead for the sizing of minor drainage sewer system. During 100-Year storm event, flow will be attenuated within the SWM corridor before discharging to the pond. Please note that the hydrodynamic of the SWM corridor should be deferred to the detailed design stage to refine the actual hydraulic performance of the SWM facility.

Sediment Cleanout Frequency	
- Provide forebay storage calculations.	Addressed. Please refer to Sheet 9. Based on the calculation, approx. 6840m ³ of TSS loading will be accumulated in the pond over a period of 20 years. As per recommendation by MECP SWM Manual, "A conservative estimate would be to assume the maximum facility removal efficiency in the forebay and to ensure that the forebay volume is equal to, or greater than, 10 years of sediment accumulation." As such, 7000m ³ of forebay storage is provided to the wet pond.
- Total TSS Loading (1.07 m ³ /ha/year) is inconsistent with MOE SWM Planning and Design Manual Table 6.3.	Addressed. Table revised to match with the Table 6.3 on MECP SWM Manual. Please refer to App F for updated calculation.
- Please indicate how long it will take for it to need cleaning out.	Details regarding to the actual cleanout frequency and maintenance timing required for the cleanout should be deferred to the detailed design. Please note that the maintenance details of the pond are determined by various factors such as the ultimate amount of excess storages provided to the pond, type of methods used for sediment removal.
Section 4.7.1.1 – 2nd Paragraph – Please indicate what areas are not draining to the proposed SWM facility. As noted above Block 2 is not permitted to drain to Allendale Road.	Addressed. Please refer to updated Section 4.4 for areas not draining to the SWM pond
Section 4.7.1.2 – 1st Paragraph – The extended detention volume invert is indicated as 306.00 but this is well above the top of permanent pool. Please review.	Addressed. Please refer to update Section 4.7.1.2 in the report regarding the design and rational of extended detention volume. The pond elevation of extended detention volume is determined by the required erosion control volume for the proposed development and a minimum 24 hours of detention period for 25mm storm event.
Section 4.7.1.4 – Table 4-8 <ul style="list-style-type: none"> • 25mm water level is inconsistent with Section 4.7.1.2 but appears to be consistent with OTTHYMO output. Please review. • 2 yr volume is inconsistent with the OTTHYMO output. • 100 yr volume and flow is inconsistent with OTTHYMO output 	Revised. Please refer to updated Section 4.7.1.4 in report.
Section 4.7.2 Table 4-10 Provide flows from each block.	Addressed, please refer to Table 11 in Section 4.7.2 .

Roof Storage Proposed and Surface Storage Proposed data is inconsistent with Storage Required for all Blocks in table.	Table 11 was revised to provide clarification. Roof Storage Proposed and Surface Storage Proposed indicates the available storage for water quantity control, while Storage Required (For 100-Year Storm quantity Control) indicates the amount of actual storage used during 100-Year storm event
Block 2 SOUTH Roof Storage is inconsistent with OTTHYMO output.	Addressed
Section 4.8 – Emergency spillway elevation is not shown on the pond drawings. Please shown and label all relevant features of the pond.	Addressed. Please refer to Detail 2 on drawing PND-1.
Section 4.9 – It is noted that the rear yards of residential properties on Banat Road drain into the subdivision and do not drain to Fountain Street under existing conditions, and drainage from between the rear yard of Allendale Road properties and Block 1 cannot drain to Allendale Road under proposed conditions due to grade differences at Allendale Road ROW limits. Please review and revise.	As per discussion with the city, under existing condition, the area from rear yards of residential property on Banat Road is within Hespeler West Sub-watershed. Under proposed condition, a ditch will be provided behind the rear yards and connects to the road side ditch west of Fountain Rd.
Section 4.10 1st Paragraph – a reference is made to subcatchment 2125, please indicate where this is located on the appropriate drawing.	Addressed on report. The site is partly located within the Middle Creek subcatchment 2125 (as per Mater Drainage Plan Figure 4.2 and Table 4.4)
Table 4-11 – Additional – An imperviousness of 50% is inconsistent with Drawing SWM-02 and if the site is to be developed in a similar manner to the other blocks, it would be expected that the imperviousness would be similar or the same.	The additional lands are not intended to be industrial or commercial (It is assumed that these lands will eventually be residential). Label for 3009 on SWM2 is revised (Imperviousness at 50%) for consistency.
Table 4-11 – Block 2 South cannot drain to Allendale Road as noted above	As per discussion, it is confirmed with the City that Catchment 3018 can discharge to the propose Allendale sewer system based on the interim condition as per Allendale SWM by MTE. Catchment 3018 will be controlled to the allowable release rate as designed by MTE, before connecting or discharging to the proposed Allendale storm sewer. Please review the updated Section 4.1 and 4.4 for revised allowable release rates summarized.

Section 4.10 – in-situ infiltration testing will be required at block site plan stage.	Report revised
Section 4.12.1 Please indicate if any tailwater conditions would develop for blocks draining to the corridor due to the detention system proposed in the corridor.	Report revised. Please refer to Section 4.8.1 . Please note that at this stage it is not feasible to provide an accurate picture of tailwater conditions to the blocks without understanding the actual finished floor elevations, building designs or site plan. It is suggested to conduct HGL analysis and further hydraulic modeling for the Corridor and the block storm sewers during detailed design stage.
Table 4-15 – Inflow for all storms for both parts of the table are inconsistent with OTTHYMO output.	Addressed
Table 4-15 – Please provide storage calculations for the corridor cells.	Addressed. Please refer to Appendix F Sheet 10
Section 4.12.2 – Confirm where this information is provided.	Report revised. Please refer to Section 4.8.2 .
Section 5 – 3rd bullet point – Any lot level quality controls are in addition to the downstream SWM pond.	Report revised. Please refer to Section 4.7.2 .
Drawing SWM-01	
It is noted that the rear yards of residential properties on Banat Road drain into the subdivision and do not drain to Fountain Street under existing conditions, and drainage from between the rear yard of Allendale Road properties and Block 1 cannot drain to Allendale Road under proposed conditions due to grade differences at Allendale Road ROW limits. Please review and revise.	As per discussion with the city, under existing condition, the area from rear yards of residential property on Banat Road is within Hespeler West Sub-watershed. Under proposed condition, a ditch will be provided behind the rear yards and connects to the road side ditch west of Fountain Rd.
Area 103 is inconsistent with Intermarket’s IP Park Phase 2 SWM plan. Please revise.	Existing catchment 103 for this development does not represent the same area shown in IP Park Phase 2 SWM-02. Area 1000/1002 on SWM-01 and SWM-02 for IP Park PH2 only represents the area draining to the Phase 2 lands, whereas area 103 in iPort SWM-01 represents the entire area draining south/west

Drawing SWM-02	
Confirm that area 3012 is included in the OTTHYMO model.	Yes, Catchment 3012 in SWM-2 is included in Ottymo model. Please refer to STANDHYD 3012-ROW Intermarket Rd in the Ottymo model.
Show proposed road and services in Allendale Road.	Addressed
As noted above, Area 3018 is not permitted to be directed to Allendale Road. Please revise.	As per discussion, it is confirmed with the City that Catchment 3018 can discharge to the propose Allendale sewer system based on the interim condition as per Allendale SWM by MTE. Catchment 3018 will be controlled to the allowable release rate as designed by MTE, before connecting or discharging to the proposed Allendale storm sewer. Please review the updated SWM report Section 4.1 and 4.4 for revised allowable release rates summarized.
Under post-development conditions overland flow from Area 3009 should be directed to the SWM pond not to Riverbank Drive. Please revise overland flow direction arrow.	As per discussion with the City, Catchment 3009 will follow the existing drainage pattern under existing and drains towards the existing 450mm diameter CSP culvert on Riverbank Dr.
Drawing SWM-03	
Please confirm if Middle Block Road has been accommodated for in Intermarket Road storm sewer design and if the road drains onto the subdivision in any other locations.	Confirmed, under existing condition the iPort (south of Middle Block Rd) is generally higher than Middle Block Rd and the adjacent property on the north based on topo information. In addition, the proposed grading will make sure no drainage from iPort to Middle Block Rd.
Confirm that all of area 3005 can be drained to the wildlife/SWM corridor.	Confirmed
Confirm that all sewers and MHs are labeled.	Confirmed
Indicate why area 3007 runoff coefficient is 0.80.	The area for 3007 is 0.80ha. The runoff coefficient is 0.90. Drawing is revised for clarification.
A 133.4m label for a pipe in area 3008 is shown but no sewers are to be shown in area 3008.	Revised

<p>As noted above, Area 3018 is not permitted to be directed to Allendale Road. Please revise.</p>	<p>As per discussion, it is confirmed with the City that Catchment 3018 can discharge to the propose Allendale sewer system based on the interim condition as per Allendale SWM by MTE. Catchment 3018 will be controlled to the allowable release rate as designed by MTE, before connecting or discharging to the proposed Allendale storm sewer. Please review the updated SWM report Section 4.1 and 4.4 for revised allowable release rates summarized.</p>
<p>Drawing SAN-01</p>	
<ul style="list-style-type: none"> a. The majority of catchment area labels have the same peak flow rate. Please revise. b. Label all sanitary sewer lengths, including sanitary trunk sewer. c. The first length of trunk sewer is missing north of Allendale Road and the trunk sewer is missing south of Allendale Road. d. The sanitary trunk sewer is from the NCBP EA. e. The maximum spacing of the sanitary trunk MH is in excess of City standards, please review and revise. f. All sanitary service connections for Block 2 onto Allendale Road have incorrect slopes. Please ensure that they are coordinated with Allendale Road drawings. Please revise. g. Show proposed sanitary sewer on Allendale Road. h. 	<p>Revised</p>
<p>Drawing SG-01</p>	
<p>Please remove driveways from plans. This detail will be addressed at the individual block site plan stage.</p>	<p>Revised</p>
<p>Overland flow from the road, etc. is no longer being shown as being directed to the SWM pond. Please indicate how this will be addressed.</p>	<p>More arrows added for clarification. For areas east of Intermarket Road where catchments will be controlled by the SWM pond, the overall concept of the proposed grading is to direct flows from each block towards the SWM corridor (as the corridor will be located at low points of the site). In addition, low point of Intermarket road (refer to road profile near MH4 on drawing PP-3) will be located between the SWM corridor and the pond inlet to further convey flow to the pond as an end of pipe treatment. For area west of Intermarket Road, overland generally</p>

	flows towards intermarket Road and further reaches to the low point near the pond inlet.
Indicate how overland flow from Block 1 will be directed to the proposed wildlife/SWM corridor.	Proposed grading is provided for Block 1 to drain overland to SWM corridor, which is at a lower elevation in comparison to Block 1. <u>Detailed grading to be shown on detailed design stage</u>
It is noted that the rear yards of residential properties on Banat Road drain into the subdivision and do not drain to Fountain Street under existing conditions, and drainage from between the rear yard of Allendale Road properties and Block 1 cannot drain to Allendale Road under proposed conditions due to grade differences at Allendale Road ROW limits. Please review and revise.	As per discussion with the city, under existing condition, the area from rear yards of residential property on Banat Road is within Hespeler West Sub-watershed. Under proposed condition, a ditch will be provided behind the rear yards and connects to the road side ditch west of Fountain Rd.
In accordance with prior correspondence and discussions, drainage from Block 2 cannot be directed to Allendale Road.	As per discussion, it is confirmed with the City that Catchment 3018 can discharge to the propose Allendale sewer system based on the interim condition as per Allendale SWM by MTE. Catchment 3018 will be controlled to the allowable release rate as designed by MTE, before connecting or discharging to the proposed Allendale storm sewer. Please review the updated SWM report Section 4.1 and 4.4 for revised allowable release rates summarized.
Please confirm if Middle Block Road has been accommodated for in Intermarket Road storm sewer design and if the road drains onto the subdivision in any other locations.	As per discussion with the city, under existing condition the iPort (south of Middle Block Rd) is generally higher than Middle Block Rd and the adjacent property on the north based on topo information. In addition, the proposed grading will make sure no drainage from iPort to Middle Block Rd.
Please show proposed Allendale Road.	Addressed
Indicate how Block 9 will ensure that overland flow is directed to Intermarket Road.	Block 9 is only a 0.3m reserve. Under fully developed conditions site grading will ensure that overland flow is directed to the SWM Pond via Intermarket Rd

Drawing SS-01	
A sewer is shown embedded in the south berm of the proposed SWM pond which outlets just downstream of Intermarket Road. Please identify and indicate its intent.	Addressed. The sewer is no longer needed and removed.
A Block appears to be missing from the northwest area of the subdivision. Please revise.	As per agreement and preliminary discussion with the City, the block referred in this comment is not part of the draft plan. For blocks west of the subdivision, we only show: "Additional lands owned by applicant"
On some drawings the southwest block of additional land is shown as two blocks. Please review.	As per agreement and preliminary discussion with the City, the southwest block referred in this comment is "Additional lands owned by applicant". The rationale of showing it as two blocks is for future considerations, when these lands will have two different uses and therefore have been treated as two different areas on some drawings for design calculations.
Existing watermain and storm on Fountain Street is shown with a darkened line, please revise to be consistent with all other existing services.	Addressed
Clearly identify that the services shown in Allendale Road are being constructed by the City and make the lines appear different than proposed services for the subdivision.	Addressed
Confirm that the layout of the sewers and watermain in Intermarket Road are consistent with City standards.	Confirmed. The layout of the sewers and watermain on Intermarket Road comply with City standards.
Provide storm servicing cross sections for all blocks/areas draining to the wildlife/SWM corridor in order to confirm that the areas identified can drain to the corridor and that there will not be any issues with tailwater conditions resulting from the corridor acting as a stormwater detention system.	Revised. Refer to Drawing PND-02.
Drawing PND-01	
Section C is inconsistent with plan view. Please revise.	Addressed

Indicate how the proposed 200mm storm embedded in the south berm of the SWM pond is collecting and conveying flow to the Allendale Creek.	Addressed. The sewer is no longer needed and removed.
Indicate how the elevated groundwater level identified on Section D-D will affect the storage available in the SWM pond. The groundwater table is also shown in a “saw-tooth” pattern, please confirm that this is representative of existing groundwater conditions.	Addressed
Indicate if the existing culvert crossing Riverbank Drive is able to convey the Regional event.	As per discussion with the City, Regional event will not overtop Riverbank Dr. under post-development. Details refer to SWM report Section 4.7.1.6.
Drawing PND-02	
Indicate how the east cell will not overflow into the adjacent blocks.	The east cell is proposed with lower elevation of the adjacent properties. Proposed grading will also ensure that no overflow will occur onto existing blocks.
There is a hatched double line shown along the north side of the cells, please indicate the intent and any necessary information.	The double line indicated the proposed trail system. Drawings revised to indicate this information.
Drawing PP-01	
The proposed alignment of Intermarket Road is the result of the NCBP EA.	Addressed
Indicate why there is a high point shown at station 1+800.	The high point created was to achieve minimum road slope profile as a typical grading practice. In addition, the high point here is lower than the Allendale Road intersection, which will make sure that overland will drain towards the lowest point of Intermarket Road and further captured by the pond
The existing sanitary trunk invert is inconsistent with City Contract T20-50 drawing set. Please contact Alex Nichols (nicholsa@cambridge.ca) for conceptual trunk sewer target inverts at Middle Block Road.	Addressed

North of MH6T, the trunk sewer is labeled as being 268.9m, which is in excess of City standards. Please review all lengths (all drawings) and revise.	Addressed
Indicate if there will be a local sanitary sewer in the section of Intermarket Road shown on this drawing.	Confirmed. There will be a local sanitary sewer for the proposed development before connecting to the Intermarket Road trunk sewer.
In accordance with the DGSSMS all watermain shall have 2.0m of cover. Please revise.	Revised
Drawing PP-02	
The south invert of MH23 is lower than the north invert. Please revise.	Revised
The drop through MH05 should be based on obverts matching. Please revise.	The drop through MH5 is 0.05m as a result of the wildlife crossing. (To provide 0.3m clearance for wildlife crossing)
E invert of MH05 is higher than the invert at HW02. Please revise.	Revised
The local sanitary sewer between MH3A, MH17 and MH3T appears to be in conflict with the proposed storm sewer. Please review and revise.	The local sanitary is not in conflict with the proposed storm sewer (as the storm sewer is west of local sanitary). There is crossing of local sanitary between the watermain but the watermain profile is higher than the local sanitary crossing.
Drawing PP-03	
The drop through MH04 should be based on obverts matching. Please revise.	Addressed
Indicate how overland flow from blocks and Intermarket Road is conveyed to the SWM pond.	Flows in excess of the pipe conveyance capacity are to be conveyed overland. For areas east of Intermarket Road where catchments will be controlled by the SWM pond, the overall concept of the proposed grading is to direct flows from each block towards the SWM corridor (as the corridor will be located at low points of the site). In addition, low point of Intermarket road (refer to road profile near MH4 on drawing PP-3) will be located between the SWM corridor and the pond inlet to further convey flow to the pond as an end of pipe treatment. For area

	west of Intermarket Road, overland generally flows towards intermarket Road and further reaches to the low point near the pond inlet.
Drawing PP-04	
<p>Indicate why the storm sewer is deep.</p> <ul style="list-style-type: none"> • The drop through MH02 should be based on obverts matching. Please revise. • Indicate how the proposed road will match to existing Middle Block Road. • A 2.0% grade is shown north of Middle Block Road in profile. Please remove. 	Revised
City Parks	
<p>Block 4 is accepted for a park Based on October 27, 2020 draft plan, 2% parkland dedication (net environmental) would comprise 1.705 ha. The balance of 0.765 ha will be required in cash-in-lieu with an appraisal as per Official Plan/ Planning Act policies.</p>	Further discussions with City staff are required regarding the potential off-site dedication of land immediately to the west of the Draft Plan that would satisfy the required parkland dedication, such that cash-in-lieu is not required.
<p>Modification of draft plan required to show dashed line as Trail Concept Plan. This is typical for the City of Cambridge, was done on the OPA 35 for very deliberate reasons, arises out of past issues with consultation (public and other agencies) and will be shown as per the markup provided through the appropriate blocks and taken into account in related documents (outside of the trails plan) such as the EIS. See markup (blue line) below for the line to be depicted on the draft plan</p>	The Draft Plan has been revised to include the conceptual trail locations as a dashed line, in accordance with OPA 35.
City Fire Department	
<p>Same as first submission. The comments can generally be addressed at the site plan and detailed design stage and are provided in this submission to ensure that any changes to the design do not create a conflict.</p>	Noted – the proposed municipal street exceeds fire requirements. Individual Block developments would proceed through the Site Plan process.

Regional Comments	
Region – Planning	
As a condition of draft plan approval, the Region will require the Owner/Developer to enter into a development agreement with the City of Cambridge to complete, as part of any site plan application for Business Park Block 1 in this plan, a detailed Stationary Noise Study to confirm the requirement for a noise barrier wall, and/or recommend other appropriate noise mitigation measures, and if required, to enter into a subsequent agreement with the City to implement any approved noise mitigation measures	Noted.
Hydrogeology and Source Water Protection	
<p>Section 6 Water Balance Assessment of the Hydrogeological Report states: “Only runoff from the building rooftops will be collected in the underground infiltration and storage galleries, and therefore no significant water quality impacts are expected for these features.” Whilst in Section 7.5.2 Mitigation Measures it states: “Where infiltration of runoff from roads or parking lots is considered, additional measures to treat the water may be required to minimize potential for groundwater contamination.”</p> <p>The report should be very clear on whether the post-development water quantity balance can be achieved through the use of clean at-source infiltration alone or whether the infiltration of “dirty” water through conveyance and end-of-pipe infiltration measures will also be required. Given that the results of the Chloride Impact Study concluded that post development chloride concentrations in groundwater would exceed Reasonable Use Concept guidelines due to winter runoff from streets and parking lots, and the report also recommended the implementation of additional salt mitigation measures (e.g. Salt Management/Salt Reduction Plans), the Hydrogeological Report should recommend only the use of stormwater best management practices which infiltrate clean water.</p>	<p>Please see the revised SWM Report.</p> <p>Also attached is a Technical Memorandum prepared by EXP that addresses post-development water quantity balance. The Memo responds to the comments regarding runoff and provides clarification. We acknowledge that the statement: “Where infiltration of run-off from roads or parking lots is considered, additional measures to treat the water may be required to minimize potential for groundwater contamination” is no longer applicable.</p>

Region – Water Services	
Water Services Staff have reviewed the Preliminary Functional Servicing Report (Exp Services Inc., September 16, 2020) and staff's technical comments regarding this report in an email dated December 18, 2020 were provided to the City and the Owner/Developer separately. Prior to draft plan approval, the FSR must be updated and submitted to the satisfaction of the Region and the City	Please see the enclosed updated reports prepared by EXP

GRCA Comments	
Although the Response to City of Cambridge, Region of Waterloo and GRCA document indicates that the November 2020 Planning Justification Report (PJR) has been updated, this is not the case. Figures 1 and 2 are identical to the original PJR from March 2020. There are still references in the Figures 1 and 2 that the applicants (IPort Cambridge GP Inc./Triocest Realty Advisors Inc.) on this draft plan owns additional lands referred to as Phase 1 and Phase 2 Business Park. This is not correct. These lands are not owned by the applicants but rather by Intermarket CAM Ltd. This should be corrected in a future resubmission	Noted – the Report has been updated to correct the Figures.
Water Resources Engineering Comments	
Please revise the stormwater management (SWM) report to indicate that the site discharges to Allendale Creek and meets applicable targets	Proposed development directed to the SWM pond will not discharge to the Allendale Creek but to a downstream 1350mm Riverbank Culvert instead. The base flow condition of Allendale Creek will be maintained through infiltration. Please refer to updated report Section 4.4 and 4.10 .
Please revise Section 4.3 in the SWM report that refers to the Grand River sub-watershed. This should be Tributaries-to-the-Grand River subwatershed.	Revised
Please explain the inconsistency in the critical discharge value for Allendale Creek between the East Side Lands MDP (0.25 cms) and the current geomorphic analysis (3.5 cms).	Separate calculations had been developed based on the bed and bank particle size distributions. The bed is armoured by larger materials, while the bank has finer exposed sediment. The calculations based on the bank sediment yields similar results to the East Side Lands MDP, so it is likely that any erosion will be on the banks rather than the bed of the channel.

	Please see Section 2.2 of the Fluvial Geomorphic Assessment dated December 24-2020
Please explain the inconsistency in the 2, 5 and 100 year flows for Allendale Creek, between the current geomorphic analysis and the SWM report	<p>Please see Section 1.1 of the Fluvial Geomorphic Assessment dated December 24-2020</p> <p>The flows in the initial submission were based on OFAT. The OFAT flows were removed and replaced with the SWM report flows</p>
Slope	
The top of slope and setback identified in the slope stability assessment needs to include all slopes 5:1 or steeper, as outlined in the GRCA policies for erosion slopes. Slopes steeper than 6.7:1 and contiguous with a regulated floodplain are regulated by the GRCA	Slope stability assessment to be revised
Natural Heritage Comments	
Additional details are required to support a reduced 17 m buffer along the south and southeast edge of the Provincially Significant Wetland (PSW). We also suggest that there is an opportunity to restore additional wetland habitat in the wet area located near the waterfowl stopover and staging monitoring area. The proposed setback is not adequate to capture this seasonally flooded area, which qualifies as significant wildlife habitat according to the original EIS submitted by NRSI. A detailed buffer restoration plan is required to support the reduced setbacks. We agree this should be a condition of draft plan approval	See EIS Addendum No. 2 prepared by NRSI
<p>The water balance assessment suggests there will be an alteration in the drainage patterns on this site as follows:</p> <p>a. The catchment for the PSW will increase from 32.72 to 40.36 hectares (a 23% increase).</p> <p>b. Annual surface water runoff volume toward the wetland is predicted to decrease by 49% whereas annual infiltration will increase by 123%.</p> <p>c. The EIS notes that monthly infiltration volumes will increase between 5,734 and 7,694 m³ during the growing season. Infiltration volumes in May are expected to increase by 300%, which is significant.</p> <p>d. Under current conditions, there is no infiltration during the months of June, July, and August. According to the hydrogeology</p>	See EIS Addendum No. 2 prepared by NRSI

<p>assessment, groundwater elevations fluctuate seasonally, with high elevations in the spring and low elevations through the late summer and winter. However, post-development infiltration volumes are expected to increase by 6,814 m³, 7,694 m³, and 7,233 m³. Assuming 10 rainfall events per month, the maximum volume infiltrated per event would be 769 m³, not 77 m³ as reported in the EIS.</p>	
<p>The EIS addendum suggests that the annual net surplus of 15,290 m³ will not likely result in significant impacts but does not comment on the monthly changes. It is unclear if or how hydroperiods within the PSW, a mature swamp, will be altered. Potential ecological impacts should be identified. Please address and clarify</p>	<p>Please see EIS Addendum No .2</p>
<p>We agree with the suggestions outlined in the fluvial geomorphological assessment for improved channel conveyance and to ensure the ecological and geomorphic health of Allendale Creek. This should be a condition of draft plan approval</p>	<p>Noted</p>
<p>The revised Draft Plan identifies a “normalized 30 m wetland buffer, which is misleading. The wetland setback limit shown represents a 15-94 m wetland buffer as recommended by NRSI and which can be conditionally supported by the GRCA as noted above. Please correct the map labelling to avoid confusion.</p>	<p>Labelling has been corrected</p>
<p>The legend on the revised set of engineering drawings includes a reference to a wetland compensation area. This legend category should be removed from the drawings to avoid confusion</p>	<p>Reference has been removed from the legend</p>
<p>With respect to the revised Draft Plan, a 30 m setback was recommended to protect Allendale Creek. This setback should be clearly illustrated and labelled on the final Draft Plan.</p>	<p>The setback is clearly illustrated on the Draft Plan</p>