CITY OF VANCOUVER

CITY CLERK'S DEPARTMENT
Access to Information & Privacy

File No.: 04-1000-20-2018-306

August 3, 2018

s.22(1)

Dear s.22(1)

Re: **Request for Access to Records under the Freedom of Information and Protection of Privacy Act (the "Act")**

I am responding to your request of June 3, 2018 for:

**Documents within the City of Vancouver and correspondence between the City of Vancouver and FortisBC related to the following:**

1. **Review of the route for the gas line replacement along 1st Avenue between Clark Drive and Nanaimo Street;**
2. **Any alternative route options discussed or proposed; and**
3. **Any items that document the decision-making process resulting in the 1st Avenue route being approved versus other routes that may have been considered.**

**Date Range: May 31, 2016 to May 31, 2018.**

All responsive records are attached.

Please note that routing alignment information can be found online in FortisBC's "Application for a Certificate of Public Convenience and Necessity (CPCN) for Approval of the Lower Mainland Intermediate Pressure (IP) System Upgrade (LMIPSU) Projects," located here: https://www.fortisbc.com/About/RegulatoryAffairs/GasUtility/NatGasBCUCSubmissions/Documents/141219_FEI_LMIPSU_CPCN_Application_FF.pdf

Engineering Services staff has confirmed that routing alignment information for Vancouver begins on page 71 of the above report.

Under section 52 of the Act you may ask the Information & Privacy Commissioner to review any matter related to the City's response to your request. The Act allows you 30 business days from the date you receive this notice to request a review by writing to: Office of the Information & Privacy Commissioner, info@oipc.bc.ca or by phoning 250-387-5629.

If you request a review, please provide the Commissioner's office with: 1) the request number assigned to your request (#04-1000-20-2018-306); 2) a copy of this letter; 3) a copy of your original request for information sent to the City of Vancouver; and 4) detailed reasons or grounds on which you are seeking the review.

Please do not hesitate to contact the Freedom of Information Office at foi@vancouver.ca if you have any questions.

Yours truly,

**Barbara J. Van Fraassen, BA**
**Director, Access to Information & Privacy**

*Barbara.vanfraassen@vancouver.ca*
*453 W. 12th Avenue Vancouver BC V5Y 1V4*
*Phone: 604 .873.7999*
*Fax: 604.873.7419*

Encl.

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## COMMENTS AND DISPOSITION SHEET

| | | |
|---|---|---|
| **PROJECT: FORTISBC – LOWER MAINLAND INTERMEDIATE PRESSURE SYSTEM UPGRADE PROJECT** | **Submission: 100% Design Drawings** | **Date Design Received:**<br>**Date Comments Provided:** |
| **Contractor:** N/A | **City Review Lead:** | **Date Response Received:**<br>**Date of Final Resolution:** |
| REVIEWER'S INFORMATION | | |
| **Review Coordinator:** | | |
| **Review Team:** | | |

| Item # | Document Reference (Drawing, Page, Section) | REVIEWER'S COMMENTS/ THIRD PARTY RESPONSE | REVIEWER | RESPONSE CODE | FINAL RESOLUTION |
|---|---|---|---|---|---|
| 1. | 42090-P-600-1000-R0 | **Comment:**<br>▪ Provide offset distance to all water infrastructure to property line (must be in all pages along E 1st Ave. & at crossing streets).<br>▪ Existing 200mm water main depth of cover = 1.07m. | | | • Offsets are shown from the gas line to the water line. Offsets are shown from water line to property line in vast majority of locations. Refer to page 1081 as example.<br>• Please clarify, no information on 200mm water main. |
| 2. | 42090-P-200-1079-R0 | **Comment:**<br>▪ VAN-W-2 Ø20mm small service typical cover = 0.6m<br>▪ High voltage stamp required. | | | • The depth was provided by our survey consultant, WorleyParsons would like to ensure our drawings reflect our survey data (also, the shown depth is deeper than 0.6m which is a more conservative assumption than the noted typical cover).<br>• We are working directly with BC Hydro to ensure all their requirements are met. *Note that FBC will be obtaining a Compatible Use Permit from BC Hydro for the entire project alignment. A copy of CUP can be provided once obtained.* |

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|---|---|---|---|---|---|
| 3. | 42090-P-200-1080-R0 | **Comment:**<br>▪ Missing the existing BC Hydro duct bank (462-U07-D200)<br>▪ Missing newly installed Bell duct bank (BELL-17011)<br>▪ High voltage stamp required. | | | • Per as built data, BC Hydro ducts are shown, please clarify location of duct bank.<br>• Please clarify. No information on Bell duct bank.<br>• Working directly with BC Hydro to ensure all their requirements are met. |
| 4. | 42090-P-200-1081-R0 | **Comment:**<br>▪ Provide offset to the proposed build reference from the property line.<br>▪ Missing Telus ductbank crossing at E 1st Ave. (VP-D-2604).<br>▪ High voltage stamp required.<br>▪ Missing offset to Ø300mm water from property line on Cassiar St. | | | • Offset shown at Lot 11 and Lot B.<br>• Regarding Telus duct bank - Cable line work on GIS cut appears to match our drawings (i.e. the drawings match the available as built and survey data)<br>• Continuing to work with BCH to ensure all their requirements are met<br>• Offsets are typically shown for waters that parallel, not for cross streets |
| 5. | 42090-P-200-1082-R0 | **Comment:**<br>▪ Provide offset to the proposed build reference from the property line.<br>▪ High voltage stamp required.<br>▪ Provide offset from property line to existing sewers. | | | • At Lot 5 proposed distance is shown to pipeline (east of location, where pipeline shifts, shown on previous page)<br>• Continuing to work with BCH to ensure all their requirements are met<br>• Refer to dimensions on edges of pipeline plan and at Lot 7. |

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| 6. | 42090-P-200-1083-R0 | **Comment:**<br>▪ Provide offset to the proposed build reference from the property line.<br>▪ High voltage stamp required. | | | • Offsets are shown on 1082 and 1084 (also shown after match line on 1083 at Lot 23) due to change in route in reference to road alignment.<br>• Continuing to work with BCH to ensure all their requirements are met |
| 7. | 42090-P-200-1084-R0 | **Comment:**<br>▪ Provide offset to the proposed build reference from the property line.<br>▪ High voltage stamp required.<br>▪ VAN-W-49 depth = 1.2m (according to records) | | | • Shown at Lot 23 and shown on new alignment on Sheet 1085.<br>• Continuing to work with BCH to ensure all their requirements are met<br>• We confirmed with our survey company that they sourced the depth locally in the field. Our survey data reflects this to be at a depth of 2.3m and our drawings must reflect the survey. |
| 8. | 42090-P-200-1085-R0 | **Comment:**<br>▪ Provide offset to the proposed build reference from the property line.<br>▪ High voltage stamp required.<br>▪ Provide offset from property line to existing sewers & waters. | | | • Offset shown at Lot B east of Kaslo Street; shown again after alignment shift at Lot 6.<br>• Continuing to work with BCH to ensure all their requirements are met<br>• Offsets shown – refer to left edge of page (water line offset shown at multiple locations on page). |
| 9. | 42090-P-200-1086-R0 | **Comment:**<br>▪ Provide offset to the proposed build reference from the property line.<br>▪ High voltage stamp required. | | | • Offset from property line shown on Lot 6.<br>• Continuing to work with BCH to ensure all their requirements are met |

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|---|---|---|---|---|---|
| **10.** | 42090-P-200-1087-R0 | **Comment:**<br>▪ Provide offset to the proposed build reference from the property line.<br>▪ High voltage stamp required.<br>▪ Provide offset from property line to existing waters. | | | • Offset from property line shown on Lot H and Lot 13.<br>• Continuing to work with BCH to ensure all their requirements are met<br>• Existing waters offsets shown at Lot H (markups on PDFs pending). |
| **11.** | 42090-P-200-1088-R0 | **Comment:**<br>▪ Provide offset to the proposed build reference from the property line.<br>▪ Thrust blocks behind 90° bend cannot be undermined.<br>▪ Provide offset from property line to existing waters. | | | • Offset shown at Lot 13 (east and dimensioned to the south) and Lot 14 (west and dimensioned to the north property).<br>• Will be communicated to construction team via Scope of Work Addenda.<br>• Offset shown at east side of drawing and at west side at Lot C. |
| **12.** | 42090-P-200-1089-R0 | **Comment:**<br>▪ Provide offset to the proposed build reference from the property line.<br>▪ Provide offset from property line to existing waters. | | | • Offsets are shown on drawing at Lot 10 at right side and at Lot 31 and at Lot B.<br>• Offsets are typically shown for waters that parallel, not for cross streets |
| **13.** | 42090-P-200-1090-R0 | **Comment:**<br>▪ Provide offset to the proposed build reference from the property line. | | | • Offsets are shown on drawing at Lot 31, Lot 18, and Lot 17. |
| **14.** | 42090-P-200-1091-R0 | **Comment:**<br>▪ Provide offset to the proposed build reference from the property line.<br>▪ Missing VED on Victoria Dr. and E 1st Ave. | | | • Offsets are shown on drawing at Lot 17 and lot west of Salisbury Drive.<br>• Need clarification |

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| 15. | 42090-P-200-1092-R0 | **Comment:**<br>▪ Provide offset to the proposed build reference from the property line.<br>▪ Provide offset from property line to existing waters.<br>▪ Provide information on the alignment of the gas mains to be relocated. | | | • Offsets are shown at Lot H and Lot D near west match line<br>• Offsets are typically shown for waters that parallel, not for cross streets<br>• Pending – Preliminary gas line realignment design is underway and will be submitted under separate cover to City of Vancouver. |
| 16. | 42090-P-200-1093-R0 | **Comment:**<br>▪ Provide offset to the proposed build reference from the property line.<br>▪ Missing Telus ductbank on Cotton Dr. & E 1st Ave (VP-D-3369). Is the purple "C" line referring to communication line on Cotton Dr. & E 1st Ave?<br>▪ Provide offset from property line to existing sewers & waters. | | | • Offsets are shown at Lot G and Lot 1<br>• Yes – Blue/Purple "C" line is indicative of communication line.<br>• Offsets are typically shown for waters that parallel, not for cross streets |
| 17. | 42090-P-200-1094-R0 | **Comment:**<br>▪ Provide offset to the proposed build reference from the property line.<br>▪ Not enough clearance with water service<br>▪ Clarification needed on potential VAN-W-161 relocation.<br>▪ VAN-D-44 is Ø300mm (not Ø375mm) | | | • Offset is shown, please refer to drawing (Lot A, 23, 24, and Lot 1)<br>• Mandatory clearance of 0.5 meter noted on drawing for VAN-WL-161 in profile text details (additionally, water line may be relocated; pls refer to next bullet).<br>• Relocation design underway<br>• At this time, prefer to leave at 375mm to be more conservative |

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| **18.** | 42057-P-200-1000-R0 | **Comment:**<br>▪ Provide offset to the proposed build reference from the property line.<br>▪ Provide the hundred block of E Kent Ave South.<br>▪ Twin Ø1200mm storm main (FRA-D-1(2)) invert elevation is 0.2m, crown of pipe at approximately 1.6m, will conflict with proposed build. Minimum 0.3m vertical clearance required.<br>▪ Where is FRA-W-1A Ø200mm coming from? | | | • Offset at Block 69 at asphalt driveway, east of public washrooms<br>• Drawings reference nearest intersection to the east per the request of City of Vancouver. Block numbers are also shown.<br>• Per our as built data, these storm mains are shown correctly; however they (along with the other utility crossings) will be hydrovac'd prior to construction. The minimum clearance shown exceeds city requirements.<br>• FRA-W-1A was sourced from as-builts |
| **19.** | General Comments | One E Kent South Ave – The Twin 1200 mm Concrete Storm Sewers are not shown at the right location in the profile. Based on As-built information, the invert of these pipes is closer to 0.2 m, which brings the crown to 1.6 m.<br>• This will likely conflict with their new design.<br>i. Our recommendation is to have them hydrovac to confirm the crossing elevation, and also maintain our standard clearance at the crossing.<br>ii. If adequate clearance cannot be provided, crossing detail should be provided to ascertain the crossing will not affect these major storm lines. | Mike Lam | | Refer to response on Comment #18. |

| Item # | Document Reference (Drawing, Page, Section) | REVIEWER'S COMMENTS/ THIRD PARTY RESPONSE | REVIEWER | RESPONSE CODE | FINAL RESOLUTION |
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| 20. | General Comments | There are services and CB leads along the design corridor that they will run into and COV will not be relocating mains/CB leads/sewer services to accommodate the proposed gas alignment.<br>• All lots and CBs have connections with existing sewers even if no record exists. Fortis shall confirm the depths and locations of all mains, CB leads, and services prior to construction.<br>• For services, their elevations cannot be changed, as they are installed to work with the private lot's drainage/plumbing. Therefore, relocation or adjustment of these services may not be feasible.<br>i. Their drawings called for services to be relocated at multiple locations, I am not aware that COV has planned for that. Fortis BC will be responsible for coordinating and constructing these relocations if necessary, and COV has to review their design prior to construction. | Mike Lam | | • As per the Notes page (drawing 407016-00212-01-PL-DAG-0001), Note 2.2, all foreign crossing locations must be field located and daylighted prior to construction.<br>• Agreed – Fortis will design services needing relocation and it is our understanding that Vancouver will complete construction; Project will coordinate. |
| 21. | General Comments | For the clearance measurements, their drawings did not account for pipe thickness:<br>• Suggest Fortis to review and hydrovac the storm crossings, to ensure the elevations are correct.<br>• Suggest Fortis to show O.D., such that the pipe thickness is accounted for on both plan and profile. For Concrete Pipes, O.D. can be up to 0.3 m + I.D.<br>i. The clearance measured from CL to CL, is over estimating the clearance. All clearance shall be measured from O.D. to O.D.<br>• Suggest Fortis to add our sewers and mains on their profile, or have a separate set of utilities base plan, such that contractor can reference during construction. | Mike Lam | | • As per the Notes page (drawing 407016-00212-01-PL-DAG-0001), Note 2.2, all foreign crossing locations must be field located and daylighted prior to construction.<br>• All clearance dimensions are wall to wall. Please refer to drawing 407016-00212-01-PL-DST-0052 as a visual example.<br>- Only centerlines are shown on the pipeline plan for all infrastructure.<br>• All crossings are shown on profile drawings. |

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| **22.** | General Comments | Drawings did not provide details on how FortisBC would install their new main at sewer crossing.<br>• For Major Crossing, they will have to support the pipe to avoid any settlements or sagging (especially for open trench).<br>• COV requires Fortis BC to provide their design drawings and strategies for these crossings. Our engineer will have to review and accept their method.<br>• COV will also require our construction coordinator or engineer to be on site during the construction of these crossings to witness the construction. | Mike Lam | | • Refer to Typical drawing 407016-00212-01-PL-DPS-0001 for a (stamped) pipe support drawing<br>• Agreed. Please refer to Typical drawing.<br>• Agreed. |
| **23.** | General Comments | Any COV combined sewers and services that Fortis BC's new line is crossing, will be separated in the future.<br>• This means that COV will require some right of way or acceptance from Fortis BC that we can go in there for construction in the future.<br>• For these combined sewers, the pipe sizes will be increased, and therefore the clearance will be reduced in the future.<br>i. COV requests Fortis BC to allow for minimum 1.5 m vertical clearance (to accommodate for increase in diameter and change in grade) and 3.5 m horizontal clearance (for trenching) at these combined sewers crossing accounting for future upgrades.<br>ii. For services, the vertical clearance may be reduced to 1.0 m. | Mike Lam | | • Please refer to Fortis' permitting and engineering (offset) requirements<br>• COV clearance will be per the previously agreed vertical clearances; 0.5m for bored and 0.6m for open cut. |

| **Legend – Originator Response Codes:** | **Legend - Final Resolution:** |
|---|---|
| A = Accept Comment – Correct, Add to, or Clarify plans<br>B = Evaluate but do not incorporate comment (explain)<br>C = Address comment in next design phase<br>D = Clarify or discuss comment – no action required<br>E = Action will be taken as part of another project submission<br>F = Major change for Project Manager approval | A = Accepted<br>B = Further Discussion Required |

Notes:

FORTIS BC

16705 Fraser Highway
Surrey, B.C., V4N 0E8
Tel: (604) 576-7000
Fax: (604) 592-7677

19 December 2016

City of Vancouver
Engineering Services
4th Floor - 507 Broadway
Vancouver, BC
V5T 1X4 Canada

Attention: Jerry Dobrovolny, Chief Engineer and General Manager Engineering Services

Dear Mr. Dobrovolny:

## RE: LMIPSU TRAFFIC MANAGEMENT STRATEGY - NANAIMO AND CLARK

FortisBC has been continuing planning and design work on the Lower Mainland Intermediate Pressure System Upgrade (LMIPSU) Project scheduled for construction in 2018. We have finalized our approach for traffic management where the gas line routes through the City of Vancouver (CoV) between Nanaimo Street and Woodland Drive on East 1st Avenue. FortisBC would like to provide an update on our studies and share what the plan is for construction activities between Nanaimo Street and Clark Street.

Two options were narrowed down for traffic management within this area:

- Option 1 - closing three lanes for construction workspace and keeping one eastbound lane open over a 2.5 month period
- Option 2 - closing all four lanes for construction workspace for a 2 month period

In both options, the crossing of Commercial Drive and Nanaimo Street would be completed using a trenchless method to ensure uninterrupted pedestrian, cyclist, bus and vehicle north-south movements. These two options also eliminated the necessity of construction night work which would have had a high impact to those residents along East 1st Avenue.

A Multiple Account Evaluation (MAE) was presented to CoV staff that aimed to understand the full range of implications of each option. The categories considered include the following:

- East/west road capacity
- Intersection modifications
- Signal modifications on alternate routes
- Vehicle access impacts
- Short-cutting (rat running)
- Pedestrian and cycling facilities
- Traffic safety
- Construction safety
- Noise

- Tree canopy pruning and potential negative tree impacts
- Schedule
- Business disruption

The results of the MAE indicate that while there will be traffic impacts in both options; the full closure option is preferred as it has a shorter construction period and is logistically less challenging.

CoV had requested FortisBC Energy Inc. carry out a business survey, and accordingly during the months of September and October 2016, this business survey was conducted in order to assess the preference of local businesses potentially affected by the proposed lane closure(s). Of the 73 businesses contacted during this time period, 16 responses were received. The majority of businesses preferred Option 1 to retain one eastbound lane.

Several mitigation and best practice measures will be implemented during the full closure including:

- Restricting construction to July and August 2018 when there is reduced traffic volumes
- Working 7 days a week, 10 hours a day
- Dedicated funding for the Vancouver Police Department to enforce detour signage and deter short-cutting
- Employ Vancouver traffic constables for busy intersections as required
- Ensure our traffic consultants are monitoring the detour implementation and making adjustments as required to East 1st Avenue and adjacent corridors
- Working with affected businesses to find alternative accesses and alternate neighbourhood parking arrangements
- Regular updates on construction schedule so businesses can plan impacts to their operations
- Marketing and promotional efforts to notify the public
- Truck access plan (truck deliveries, garbage pick-up, etc)
- Special traffic and pedestrian signage
- Encouraging Contractor's employees to support local businesses
- Community Liaison to be on site as required during construction.

The LMIPSU project is starting detailed traffic control plans and will like to have approval of our Traffic Management Strategy which will be sent next week. If you have any questions on this approach, please contact Gord Schoberg, Senior Manager, Community & Aboriginal Relations at (604) 592-7534.

Regards,

M Kilpatrick

Melanie J. Kilpatrick, P.Eng, PMP
Senior Project Manager
Lower Mainland Intermediate Pressure System Upgrade Project

| | |
|---|---|
| From: | "Schoberg, Gord" <Gord.Schoberg@fortisbc.com> |
| To: | "Charleston, Brian" <Brian.Charleston@vancouver.ca> |
| Date: | 9/8/2016 8:47:28 AM |
| Subject: | RE: Conference call numbers with FortisBC |

That sounds fine, Brian. I will not be joining the meeting this morning, and that is fine. As long as a decision is made concerning moving forward with the 2 lane option, I need to prepare our communications messaging for the public consultation very quickly so need to know for sure whether that is in scope or not. I will share your note below with Melanie.

Tomorrow at 9am is good. I believe some of your public engagement folks may join the call?

Gord

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**From:** Charleston, Brian [mailto:Brian.Charleston@vancouver.ca]
**Sent:** September 8, 2016 7:58 AM
**To:** Schoberg, Gord
**Cc:** Luongo, Al
**Subject:** RE: Conference call numbers with FortisBC

Hi Gord,

Let's cancel the 2pm meeting. We'll discuss it at our meeting this morning. In regards to that, we agreed on the 1st Avenue alignment with the traffic impacts being limited to 2 lanes. The 3 lane closure and full closure were options presented to us for consideration. We haven't approved either of those options. Thus, the go to option is constructing the pipeline under a 2 lane closure.

Can we move the conference call tomorrow to 9am?

Thank you,
Brian

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**From:** Schoberg, Gord [mailto:Gord.Schoberg@fortisbc.com]
**Sent:** Wednesday, September 07, 2016 10:58 AM
**To:** Charleston, Brian
**Subject:** Conference call numbers with FortisBC

Brian: Thanks again for helping set up these meetings on short order.

Dial in number: 1.866.214.9572

Code: 3554513557

This would apply to a 2pm meeting tomorrow afternoon and the 9am meeting on Friday.

Gordon Schoberg
Senior Manager, Community & Aboriginal Relations
FortisBC
16705 Fraser Hwy
Surrey, B.C.
Canada, V4N 0E8

604.220.9785 Cell phone
604.592.7534 Office
604.576.7122 Fax



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WorleyParsons
resources & energy

# LMIPSU
## Comment Log - City of Burnaby

FORTIS BC™

**Customer:** FortisBC
**Project:** LMIPSU
**Phase:** Detailed Engineering
**Author:** Shaun Kavalinas

**Comment Log Document No.**: N/A
**Revision:** 0
**Description:** City of Vancouver Comments

**Project No.:** 407016-00212
**Checked by:**
**Last update:** 22-Feb-17
**Approved by:** N/A

| No. | Comment Revision | Date issued | Drawing | Commenter | Comment | WorleyParsons Response | City Response | Status |
|---|---|---|---|---|---|---|---|---|
| | | | DXG-0020-RB | City of Vancouver | Show Manhole (see attachment) | Manholes have been added for 90% | | CLOSED |
| | | | | City of Vancouver | Provide offset dimensions from property line for all utilities (typical) | Has been added for 90% review versions of the alignment sheets | | CLOSED |
| | | | | City of Vancouver | Show diameter of sewers as provided by GIS cut (typical) | Diameters will be shown for IFB | | CLOSED |
| | | | | City of Vancouver | Revise profile to show all sewer crossings at correct elevation as provided by GIS cut. Sewer Design to comment on proposed vertical alignment and crossings once revisions are made (typical) | This will have to be updated for IFB using elevation information from the CoV as per email sent on Feb. 27, 2017. | | OPEN |
| | | | DXG-0021-RB | City of Vancouver | maintain minimum 0.3m horizontal clearance from existing CB | The updated centerline maintains a minimum of .3m from CBs | | CLOSED |
| | | | | City of Vancouver | Provide offset dimensions from property line for all utilities (typical) | Has been added for 90% review versions of the alignment sheets | | CLOSED |
| | | | | City of Vancouver | Show diameter of sewers as provided by GIS cut (typical, see | Diameters will be shown for IFB | | CLOSED |
| | | | | City of Vancouver | Revise profile to show all sewer crossings at correct elevation as provided by GIS cut. Sewer Design to comment on proposed vertical alignment and crossings once revisions are made (typical) | This will have to be updated for IFB using elevation information from the CoV as per email sent on Feb. 27, 2017. | | OPEN |
| | | | DXG-0022-RB | City of Vancouver | Show Manhole | Manholes have been added | | CLOSED |
| | | | | City of Vancouver | Provide offset dimensions from property line for all utilities (typical) | Has been added for 90% review versions of the alignment sheets | | CLOSED |
| | | | | City of Vancouver | Show diameter of sewers as provided by GIS cut | Diameters will be shown for IFB | | CLOSED |
| | | | | City of Vancouver | Revise profile to show all sewer crossings at correct elevation as provided by GIS cut. Sewer Design to comment on proposed vertical alignment and crossings once revisions are made (typical) | This will have to be updated for IFB using elevation information from the CoV as per email sent on Feb. 27, 2017. | | OPEN |
| | | | | City of Vancouver | Both 300mm diameter water mains have 1.2m of cover | This will have to be updated for IFB | | OPEN |
| | | | DXG-0023-RB | City of Vancouver | Show Manholes (see attachment) | Manholes have been added | | CLOSED |
| | | | | City of Vancouver | Provide offset dimensions from property line for all utilities (typical) | Has been added for 90% review versions of the alignment sheets | | CLOSED |
| | | | | City of Vancouver | Show diameter of sewers as provided by GIS cut (typical) | This will have to be updated for IFB | | OPEN |
| | | | | City of Vancouver | Revise profile to show all sewer crossings at correct elevation as provided by GIS cut. Sewer Design to comment on proposed vertical alignment and crossings once revisions are made (typical) | This will have to be updated for IFB | | OPEN |
| | | | | City of Vancouver | 200mm diameter water main have 1.2m of cover | This Drawing has been replaced by a 1:250 alignment sheet for 90%. | | |
| | | | DAG-0001 & DAG-0002 | City of Vancouver | Show street names (typical); | This has been addressed for 90% | | CLOSED |
| | | | | City of Vancouver | Provide offsets of proposed and existing underground utilities referenced to the property lines (typical). | This has been addressed for 90% | | CLOSED |
| | | | DAG-0061 | City of Vancouver | Provide offsets of proposed and existing underground utilities referenced to the property lines (typical); | This has been addressed for 90% | | CLOSED |
| | | | | City of Vancouver | Drawing DXG-0019 missing from hard copy plan set provided; | Drawing DXG 19 has been replaced by a 1:250 scale alignment sheet for 90% review | | CLOSED |
| | | | | City of Vancouver | 300mm diameter water cover of 1.07m – show it in profile and show offset to property line; | This WL has been shown for 90% review. It is labeled in the profile | | CLOSED |
| | | | | City of Vancouver | Label the diameter of existing City sewer and water pipes (typical) | This has been addressed for 90% for parallel utilities. This information for the crossings in shown in the profile and the construction schematic. | | CLOSED |
| | | | DAG-0062 | City of Vancouver | Provide offsets of proposed and existing underground utilities referenced to the property lines (typical); | This has been addressed for 90% | | CLOSED |
| | | | | City of Vancouver | Label the diameter of existing City sewer and water pipes (typical). | This has been addressed for 90% for parallel utilities. This information for the crossings in shown in the profile and the construction schematic. | | CLOSED |
| | | | | City of Vancouver | Check on 1200mm storm and 300mm sanitary – check GIS cut for invert elevations and provide labels for diameters | These utilities have been updated for 90% | | CLOSED |
| | | | DAG-0063 | City of Vancouver | Provide offsets of proposed and existing underground utilities referenced to the property lines (typical); | This has been addressed for 90% | | CLOSED |
| | | | | City of Vancouver | Missing the existing BC Hydro Distribution duct (see drawing 462-U07-D200) – might conflict with proposed line | The missing BC Hydro duct has been added. It will not conflict with our line. | | CLOSED |
| | | | | City of Vancouver | Show CB | Catch Basin has been added for 90% review drawings | | CLOSED |
| | | | DAG-0064 | City of Vancouver | 300 diameter water – cover 0.9 to 1.07m | Water line updated for 90% review | | CLOSED |
| | | | | City of Vancouver | Show CB | Catch Basin has been added for 90% review drawings | | CLOSED |
| | | | | City of Vancouver | Provide offsets of proposed and existing underground utilities referenced to the property lines (typical); | This has been addressed for 90% | | CLOSED |
| | | | | City of Vancouver | Label the diameter of existing City sewer and water pipes (typical). | This has been addressed for 90% for parallel utilities. This information for the crossings in shown in the profile and the construction schematic. | | CLOSED |
| | | | | City of Vancouver | Missing Telus, BC Hydro and water main crossing Cassiar @ E 1st Ave. | Linework has been been added for the 90% review. If there are still missing lines please identify which one is missing. | | OPEN |
| | | | DAG-0065 | City of Vancouver | Missing water information – PRV Station (see pdf) | This has been addressed for 90% | | CLOSED |
| | | | | City of Vancouver | 1800 diameter GVRD | 1800MM dia included in 90% drawings | | CLOSED |
| | | | | City of Vancouver | 900 diameter abandoned water (VAN-WL-3) | 900mm dia included in 90% drawings | | CLOSED |
| | | | | City of Vancouver | Contact GVRD for approval and information of 1800 diameter water main crossing Rupert | WP to investigate for RFP package | | OPEN |
| | | | | City of Vancouver | 300 diameter water – why is it jogging so much? Has it been m-scoped? (VAN-WL-4) – cover from 0.91m to 3.05m (see attached as-built) | Line work provided by survey contractor from field survey. WP proposes leaving line work as is. Cover has been updated for 90% review based on comments | | OPEN |
| | | | | City of Vancouver | Provide offsets of proposed and existing underground utilities referenced to the property lines (typical); | This has been addressed for 90% | | CLOSED |
| | | | | City of Vancouver | Label the diameter of existing City sewer and water pipes (typical). | This has been addressed for 90% for parallel utilities. This information for the crossings in shown in the profile and the construction schematic. | | CLOSED |
| | | | | City of Vancouver | Revise profile to show all sewer crossings at correct elevation as provided by GIS cut. Sewer Design to comment on proposed vertical alignment and crossings once revisions are made (typical) | This will have to be updated for IFB using elevation information from the CoV as per email sent on Feb. 27, 2017. | | OPEN |
| | | | | City of Vancouver | Provide offsets of proposed and existing underground utilities referenced to the property lines (typical); | This has been addressed for 90% | | CLOSED |
| | | | | City of Vancouver | Label the diameter of existing City sewer and water pipes (typical). | This has been addressed for 90% for parallel utilities. This information for the crossings in shown in the profile and the construction schematic. | | CLOSED |
| | | | | City of Vancouver | Check GIS cut and revised combined sewer invert. | Depth has been updated for 90% | | CLOSED |

**Customer:** FortisBC
**Project:** LMIPSU
**Phase:** Detailed Engineering
**Author:** Shaun Kavalinas

**Comment Log Document No.**: N/A
**Revision:** 0
**Description:** City of Vancouver Comments

**Project No.:** 407016-00212
**Checked by:**
**Last update:** 22-Feb-17
**Approved by:** N/A

| No. | Comment Revision | Date issued | Drawing | Commenter | Comment | WorleyParsons Response | City Response | Status |
|---|---|---|---|---|---|---|---|---|
| | | | DAG-0066 | City of Vancouver | 300 diameter water – cover 1.0 to 1.2m | Diameter and depth have been updated for 90%. | | CLOSED |
| | | | | City of Vancouver | Provide offsets of proposed and existing underground utilities referenced to the property lines (typical); | This has been addressed for 90% | | CLOSED |
| | | | | City of Vancouver | Label the diameter of existing City sewer and water pipes (typical). | This has been addressed for 90% for parallel utilities. This information for the crossings in shown in the profile and the construction schematic. | | CLOSED |
| | | | | City of Vancouver | Revise profile to show all sewer crossings at correct elevation as provided by GIS cut. Sewer Design to comment on proposed vertical alignment and crossings once revisions are made (typical) | This has been addressed for 90% | | CLOSED |
| | | | DAG-0067 | City of Vancouver | 1500 diameter water – cover of 1.2m (VAN-WL-9) | Diameter and depth have been updated for 90%. | | CLOSED |
| | | | | City of Vancouver | Provide offsets of proposed and existing underground utilities referenced to the property lines (typical); | This has been addressed for 90% | | CLOSED |
| | | | | City of Vancouver | Label the diameter of existing City sewer and water pipes (typical). | This has been addressed for 90% for parallel utilities. This information for the crossings in shown in the profile and the construction schematic. | | CLOSED |
| | | | | City of Vancouver | 300 diameter water – cover = 1.2m (VAN-WL-10) | Diameter has been updated for 90% review. Depth will be updated to 1.2m for IFB | | OPEN |
| | | | DAG-0068 | City of Vancouver | Check GIS cut and revised combined sewer invert. | This will have to be updated for IFB using elevation information from the CoV as per email sent on Feb. 27, 2017. | | OPEN |
| | | | | City of Vancouver | Provide offsets of proposed and existing underground utilities referenced to the property lines (typical); | This has been addressed for 90% | | CLOSED |
| | | | | City of Vancouver | Label the diameter of existing City sewer and water pipes (typical). | This has been addressed for 90% for parallel utilities. This information for the crossings in shown in the profile and the construction schematic. | | CLOSED |
| | | | DAG-0069 | City of Vancouver | 300 diameter water – cover 1.07 to 1.27m (VAN-WL-71) | Diameter and depth have been updated for 90%. | | CLOSED |
| | | | | City of Vancouver | Provide offsets of proposed and existing underground utilities referenced to the property lines (typical); | This has been addressed for 90% | | CLOSED |
| | | | | City of Vancouver | Label the diameter of existing City sewer and water pipes (typical). | This has been addressed for 90% for parallel utilities. This information for the crossings in shown in the profile and the construction schematic. | | CLOSED |
| | | | | City of Vancouver | Missing 8" sewer main crossing Penticton at E 1st | Linework has been been added for the 90% review. Cannot find this 8" sewer main. | | OPEN |
| | | | | City of Vancouver | Missing BC Hydro duct @ the SW corner of Kamloops @ E 1st | BC Hydro duct has been added. | | CLOSED |
| | | | | City of Vancouver | 200 diameter water (VAN-WL-12) | Diameter has been updated for 90% review. | | CLOSED |
| | | | | City of Vancouver | Combined sewer missing | A 900mm Combined Sewer has been added | | CLOSED |
| | | | DAG-0070 | City of Vancouver | Check GIS cut and revised combined sewer invert | Diameter and depth have been updated for 90%. | | CLOSED |
| | | | | City of Vancouver | - Provide offsets of proposed and existing underground utilities referenced to the property lines (typical); | This has been addressed for 90% | | CLOSED |
| | | | | City of Vancouver | Label the diameter of existing City sewer and water pipes (typical). | This has been addressed for 90% for parallel utilities. This information for the crossings in shown in the profile and the construction schematic. | | CLOSED |
| | | | | City of Vancouver | Label existing city infrastructure | This has been addressed for 90% for parallel utilities. This information for the crossings in shown in the profile and the construction schematic. | | CLOSED |
| | | | | City of Vancouver | Missing the existing 21" & 12" sewer mains crossing Garden Dr at E 1st Ave | Linework has been been added for the 90% review. Cannot find this these two sewer main crossings. | | OPEN |
| | | | | City of Vancouver | Maintain minimum 0.3m clearance from existing CB | We maintain minimum .3m separation from catch basins on the updated centerline | | CLOSED |
| | | | | City of Vancouver | 81 or 80? See drawing DXG-0022 | Route has been adjusted through this section, and DXG 0022 has been replaced by alignment sheet. This crossing is currently 81 deg | | CLOSED |
| | | | | City of Vancouver | 150 diameter water; cover 1.07m (VAN-WL-16) | Diameter and depth have been updated for 90%. | | CLOSED |
| | | | | City of Vancouver | 200 diameter water (VAN-WL-13) | Diameter has been updated for 90% review. | | CLOSED |
| | | | DAG-0071 | City of Vancouver | Check GIS cut and revised combined sewer invert. | Diameter has been updated for 90% review. | | CLOSED |
| | | | | City of Vancouver | Provide offsets of proposed and existing underground utilities referenced to the property lines (typical); | This has been addressed for 90% | | CLOSED |
| | | | | City of Vancouver | Label and provide the diameter of existing City sewer and water pipes (typical). | This has been addressed for 90% for parallel utilities. This information for the crossings in shown in the profile and the construction schematic. | | CLOSED |
| | | | | City of Vancouver | Missing street names and addresses | Street names have been addressed 90% review | | CLOSED |
| | | | | City of Vancouver | 200 diameter water; cover – 1.07m | Diameter and depth will have to be updated for IFB | | OPEN |
| | | | DAG-0072 | City of Vancouver | 150 diameter water; cover – 1.07m (VAN-WL-17) | Diameter has been updated for 90% review. Depth will be updated to 1.07m for IFB | | OPEN |
| | | | | City of Vancouver | Provide offsets of proposed and existing underground utilities referenced to the property lines (typical); | This has been addressed for 90% | | CLOSED |
| | | | | City of Vancouver | Label and provide the diameter of existing City sewer and water pipes (typical). | This has been addressed for 90% for parallel utilities. This information for the crossings in shown in the profile and the construction schematic. | | CLOSED |
| | | | | City of Vancouver | Check GIS cut and revise storm and sanitary elevation. | This will have to be updated for IFB using elevation information from the CoV as per email sent on Feb. 27, 2017. | | OPEN |
| | | | | City of Vancouver | Maintain minimum 0.3m horizontal clearance from existing CBs | 0.3m clearance to CB's has been maintained on updated centerline | | CLOSED |
| | | | | City of Vancouver | Show manholes | Manholes have been added. | | CLOSED |
| | | | | City of Vancouver | 450 diameter water; cover – 1.2m | This will have to be updated for IFB | | OPEN |
| | | | DAG-0073 | City of Vancouver | 200 diameter water; cover – 0.91m | This will have to be updated for IFB | | OPEN |
| | | | | City of Vancouver | - Provide offsets of proposed and existing underground utilities referenced to the property lines (typical); | This has been addressed for 90% | | CLOSED |
| | | | | City of Vancouver | - Label and provide the diameter of existing City sewer and water pipes (typical). | This has been addressed for 90% for parallel utilities. This information for the crossings in shown in the profile and the construction schematic. | | CLOSED |
| | | | | City of Vancouver | Check GIS cut and revise storm and sanitary elevation. | This will have to be updated for IFB using elevation information from the CoV as per email sent on Feb. 27, 2017. | | OPEN |
| | | | | City of Vancouver | 200 diameter water; cover – 1.2m | This will have to be updated for IFB using elevation information from the CoV as per email sent on Feb. 27, 2017. | | OPEN |
| | | | DAG-0074 | City of Vancouver | 150 diameter water; cover – 0.91m | This will have to be updated for IFB using elevation information from the CoV as per email sent on Feb. 27, 2017. | | OPEN |
| | | | | City of Vancouver | Provide offsets of proposed and existing underground utilities referenced to the property lines (typical); | This has been addressed for 90% | | CLOSED |
| | | | | City of Vancouver | Label and provide the diameter of existing City sewer and water pipes (typical). | This has been addressed for 90% for parallel utilities. This information for the crossings in shown in the profile and the construction schematic. | | CLOSED |

**Customer:** FortisBC
**Project:** LMIPSU
**Phase:** Detailed Engineering
**Author:** Shaun Kavalinas

**Comment Log Document No.**: N/A
**Revision:** 0
**Description:** City of Vancouver Comments

**Project No.:** 407016-00212
**Checked by:**
**Last update:** 22-Feb-17
**Approved by:** N/A

| No. | Comment Revision | Date issued | Drawing | Commenter | Comment | WorleyParsons Response | City Response | Status |
|---|---|---|---|---|---|---|---|---|
| | | | | City of Vancouver | Check GIS cut and revise storm and sanitary elevation. | This will have to be updated for IFB using elevation information from the CoV as per email sent on Feb. 27, 2017. | | OPEN |
| | | | | City of Vancouver | 150 diameter water; cover – 1.2m | Diameter has been updated for 90% review. Depth will be updated to .91m for IFB | | OPEN |
| | | | DAG-0075 | City of Vancouver | 200 diameter water; cover – 0.91m | This has been addressed for 90% | | CLOSED |
| | | | | City of Vancouver | Provide offsets of proposed and existing underground utilities referenced to the property lines (typical); | This has been addressed for 90% | | CLOSED |
| | | | | City of Vancouver | Label and provide the diameter of existing City sewer and water pipes (typical). | This has been addressed for 90% for parallel utilities. This information for the crossings in shown in the profile and the construction schematic. | | CLOSED |
| | | | DAG-0076 | City of Vancouver | Check GIS cut and revise storm and sanitary elevation. | This will have to be updated for IFB using elevation information from the CoV as per email sent on Feb. 27, 2017. | | OPEN |

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# LMIPSU
## Comment Log - City of Vancouver

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|---|---|---|---|
| **Customer:** | FortisBC | **Comment Log Document No.:** N/A | **Project No.:** 407016-00212 |
| **Project:** | LMIPSU | **Revision:** 0 | **Checked by:** |
| **Phase:** | Detailed Engineering | **Description:** City of Vancouver Comments | **Last update:** 1-May-17 |
| **Author:** | | | **Approved by:** |

| # | Comment Revision | Date issued | Old Drawing # | Current Drawing No. | Comment | WorleyParsons Response | City Response | Status |
|---|---|---|---|---|---|---|---|---|
| 1 | 0 | 30-Mar-17 | Varies (General Mark-up) | Varies (General Mark-up) | Locations where the City of Vancouver requires offset dimensions based on their mark-ups | Incorporated in all locations | | |
| 2 | 0 | 30-Mar-17 | Varies (General Mark-up) | Varies (General Mark-up) | Show offset distance from P/L to Sewer Mains | We have incorporated a number of new offsets which will meet this requirement | | |
| 3 | 0 | 30-Mar-17 | Varies (General Mark-up) | Varies (General Mark-up) | High voltage stamped required for crossing or construction within 6m of a duct within BCH electrical division | Thank you, and we are working directly with BC Hydro to ensure all their crossing requirements are met. | | |
| 4 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0078 | 42090-P-200-1078 | Maintain a 0.3 minimum vertical clearance from all water infrastructure when crossing | The condition has been met or exceeded in all crossing locations, except for the water infrastructure that are to be relocated. | | |
| 5 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0078 | 42090-P-200-1078 | VAN-D-3 - Check diameter, confirm Inv Elev with GIS cut<br>VAN-S-2 - Check Diameter | Confirmed and updated diameter and elevations as per GIS cut | | |
| 6 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0078 | 42090-P-200-1078 | Send to Burd for review (referring to the Burnaby side of the alignment sheet | The City of Burnaby has also provided comments for their portion of the route. | | |
| 7 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0078 | 42090-P-200-1078 | Show offsets from PL to existing utilities in every page | Offsets have been incorporated. | | |
| 8 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0080 | 42090-P-200-1080 | Check the GIS cut for the invert elevation of the following crossings:<br>Van-D-7<br>Van-S-4<br>VAN-D-5 | Confirmed and updated diameter and elevations as per GIS cut | | |
| 9 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0080 | 42090-P-200-1080 | Add the missing BC Hydro duct bank (462-U07 D200) | This will be included in the IFC submission of the drawing | | |
| 10 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0080 | 42090-P-200-1080 | Add the missing 24" gas main | Two gas mains have been added - one to the north and one to the south along East 1st ave based on updated FortisBC data. | | |
| 11 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0080 | 42090-P-200-1080 | Add the missing 48" sanitary | We have added a 300mm sanitary to the drawings, but due to the limits of the window, only a portion of it is visible on the north side of the road. However, we could not locate the 48" sanitary line in the GIS cut. | | |
| 12 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0081 | 42090-P-200-1081 | Missing the Telus duct bank crossing E/1st | Cable line work on GIS cut appears to match our drawings (i.e. the drawings match the available as built and survey data) | | |
| 13 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0082 | 42090-P-200-1082 | Check the GIS cut for the invert elevation of the following crossings:<br>Can-D-12 | Confirmed and updated diameter and elevations as per GIS cut | | |
| 14 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0082 | 42090-P-200-1082 | Show ex 400mm dia water depth = +/-2m | Added and incorporated | | |

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**LMIPSU**
**Comment Log - City of Vancouver**

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|---|---|---|---|
| **Customer:** | FortisBC | **Comment Log Document No.:** N/A | **Project No.:** 407016-00212 |
| **Project:** | LMIPSU | **Revision:** 0 | **Checked by:** |
| **Phase:** | Detailed Engineering | **Description:** City of Vancouver Comments | **Last update:** 1-May-17 |
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| # | Comment Revision | Date issued | Old Drawing # | Current Drawing No. | Comment | WorleyParsons Response | City Response | Status |
|---|---|---|---|---|---|---|---|---|
| 15 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0082 | 42090-P-200-1082 | Contact GVRD for Rupert Crossing | Metro Vancouver was sent 90% drawings for review and comment | | |
| 16 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0082 | 42090-P-200-1082 | Add waterline to pipeline plan and show existing line work as abandoned. | WorleyParsons incorporated the new line work, and will change the line type of the abandoned waterline on the appropriate line for IFC. | | |
| 17 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0083 | 42090-P-200-1083 | Show 200mm diameter waterline on the north side of East 1st. | We will incorporate this for IFC (does not impact our proposed centerline) | | |
| 18 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0083/0084 | 42090-P-200-1083/1084 | Check UE (street light) | We are working with BC Hydro to confirm if this is a UE under their ownership, it does not appear as a street light on the street light map. However, as our survey picked up this data, and the data sources don't clarify what it is, we would prefer to leave it as a UE as it is more conservative in terms of our design. Additionally, we will add a note to our drawings clarifying to the contractor | | |
| 19 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0084 | 42090-P-200-1084 | VAN-W-49 is shown at a depth of 2.3m, yet records show it at 1 2m, how did survey determine the depth shown? | We confirmed with our survey company that they sourced the depth locally in the field. Our survey data reflects this to be at a depth of 2 3m and our drawings must reflect the survey. | | |
| 20 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0085 | 42090-P-200-1085 | VAN-W-65 has a diameter of 150mm and depth = 1.1m, how did survey determine the depth shown? | We confirmed with our survey company that they sourced the depth locally in the field. We updated the diameter, however, we would prefer to leave depth as is because it matches the survey, which is more conservative and we need to reflect our survey data on our drawings. | | |
| 21 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0085 | 42090-P-200-1085 | Add a new WL crossing with a diameter of 150mm and a depth of 1.2m. This refers to the waterline on the south side of East 1st at Kaslo | Added to profile, construction schematic and pipeline plan. However, the GIS cut showed the existing waterline further to the west then the sketch mark-ups. | | |
| 22 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0085 | 42090-P-200-1085 | Add a new WL with a diameter of 150mm to the pipeline plan. This refers to the waterline on the North Side of East 1st at Kaslo | Added | | |
| 23 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0085/0086 | 42090-P-200-1085/1086 | Show waterline along the center of East 1st as Abandoned. | Added | | |
| 24 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0086 | 42090-P-200-1086 | VAN-W-81 has a depth of 1.3m, how did survey determine the depth shown? | We confirmed with our survey company that they sourced the depth locally in the field. Our drawings must reflect the survey. | | |
| 25 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0087 | 42090-P-200-1087 | Confirm depth and diameter of VAN-S-10 from GIS cut | Updated | | |
| 26 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0087 | 42090-P-200-1087 | Add missing BC Hydro duct at Kamloops | Added | | |
| 27 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0088 | 42090-P-200-1088 | Show Van-S-12 on Plan | To be added for the IFC drawings | | |
| 28 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0088 | 42090-P-200-1088 | Change Van-W-84 from a diameter of 200mm to 300mm and put it at a depth of 1 2m | Diameter will be changed to 300mm on the IFC drawings (however the as-built VanMap appears to identify this as 200mm). | | |

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| **Customer:** | FortisBC | **Comment Log Document No.:** N/A | **Project No.:** 407016-00212 |
| **Project:** | LMIPSU | **Revision:** 0 | **Checked by:** |
| **Phase:** | Detailed Engineering | **Description:** City of Vancouver Comments | **Last update:** 1-May-17 |
| **Author:** | | | **Approved by:** |

| # | Comment Revision | Date issued | Old Drawing # | Current Drawing No. | Comment | WorleyParsons Response | City Response | Status |
|---|---|---|---|---|---|---|---|---|
| 29 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0088 | 42090-P-200-1088 | Confirm how the depth of Van-W-85 was calculated. | The depth was provided by our survey consultant, who we queried, and they responded that the depths were sourced (located) in the field. WorleyParsons would would like to ensure our drawings reflect our survey data. | | |
| 30 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0089 | 42090-P-200-1089 | Maintain a 0.3 minimum vertical clearance from existing sewer infrastructure. | Updated and met or exceeded clearance. | | |
| 31 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0089 | 42090-P-200-1089 | Confirm how the depth of Van-W-91 was calculated. | The depth was provided by our survey consultant, who we queried, and they responded that the depths were sourced (located) in the field. WorleyParsons would would like to ensure our drawings reflect our survey data. | | |
| 32 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0090 | 42090-P-200-1090 | Change line type of Waterline on Lakewood Drive to ABD (the waterline to the east in the road crossing) | We will incorporate for the IFC Drawings | | |
| 33 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0090 | 42090-P-200-1090 | Add missing Telus Crossing on Victoria | We believe we already have these crossings - VAN-C-14 and VAN-C-15 | | |
| 34 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0090 | 42090-P-200-1090 | Maintain a 0.3 minimum vertical clearance from existing sewer infrastructure. | Updated and met or exceeded clearance. | | |
| 35 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0090 | 42090-P-200-1090 | Records show for Van-D-26 that the invert is ~45.8, ensure clearance is met. | Updated profile and incorporated invert elevations | | |
| 36 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0090 | 42090-P-200-1090 | VAN-W-128 has a depth of cover of 1.4m according to as-built (currently show as TBD) | Will update for IFC drawings (doesn't impact pipe profile due to low depth of VAN-D-26) | | |
| 37 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0090 | 42090-P-200-1090 | VAN-W-117 has a depth of cover of 1.07m according to as-built. | We confirmed with our survey company that they sourced the depth locally in the field. Our survey data reflects this to be at a depth of 1.6m and our drawings must reflect the survey. | | |
| 38 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0091 | 42090-P-200-1091 | Maintain a 0.3 minimum vertical clearance from existing sewer infrastructure. | Updated and met or exceeded clearance. | | |
| 39 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0091 | 42090-P-200-1091 | VAN-D-29 and VAN-S-54 - check GIS cut for crossing elev and maintain a 0.3m vertical clearance. | Updated and met or exceeded clearance. | | |
| 40 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0091 | 42090-P-200-1091 | VAN-W-148has a depth of cover of 0 91m according to as-built. | We confirmed with our survey company that they sourced the depth locally in the field. Our survey data reflects this to be at a depth of 1.7m and our drawings must reflect the survey. | | |
| 41 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0091 | 42090-P-200-1091 | VAN-W-139has a depth of cover of 0 91m according to as-built. | We confirmed with our survey company that they sourced the depth locally in the field. Our survey data reflects this to be at a depth of 2 2m and our drawings must reflect the survey. | | |
| 42 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0091 | 42090-P-200-1091 | Change waterline type to ABD on Salisbury Drive (the waterline to the east in the road crossing) | We will incorporate for the IFC Drawings | | |

**Customer:** FortisBC
**Project:** LMIPSU
**Phase:** Detailed Engineering
**Author:**

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|---|---|---|---|---|---|---|---|---|
| 43 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0092 | 42090-P-200-1092 | VAN-D-32 and VAN-S-66 - check GIS cut for crossing elev and maintain a 0.3m vertical clearance. | Updated and met or exceeded clearance. | | |
| 44 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0092 | 42090-P-200-1092 | VAN-W-154 has a diameter of 200mm and a depth of 1.2m | Incorporated | | |
| 45 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0092 | 42090-P-200-1092 | Remove OH UE | We would like to leave it in as our survey picked it up and we cannot delete survey picks. | | |
| 46 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0093 | 42090-P-200-1093 | VAN-D-35 maintain a 0.3m vertical clearance. | Updated and met or exceeded clearance. | | |
| 47 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0093 | 42090-P-200-1093 | VAN-W-155 has a depth of cover of 0.91m according to as-built. | We confirmed with our survey company that they sourced the depth locally in the field. Our survey data reflects this to be at a depth of 1.7m and our drawings must reflect the survey. | | |
| 48 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0094 | 42090-P-200-1094 | VAN-D-43- check GIS cut for crossing elev and maintain a 0.3m vertical clearance. | Updated and met or exceeded clearance. | | |
| 49 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0094 | 42090-P-200-1094 | VAN-W-160 has a depth of cover of 1.2m according to as-built. | Updated | | |
| 50 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0094 | 42090-P-200-1094 | Add a 100mm dia Waterline at cover of 1.07, maintain clearance | Added and updated profile (VAN-W-159A) | | |
| 51 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0094 | 42090-P-200-1094 | Change the diameter of Van-W-159 to 200mm and its depth of cover to 0 91m (also add the line to the profile plan). | Updated diameter, and we confirmed with our survey company that they sourced the depth locally in the field. Our survey data reflects this to be at a depth of 1.7m and our drawings must reflect the survey. | | |
| 52 | 0 | 30-Mar-17 | 407016-00212-13-PL-DAG-0094 | 42090-P-200-1094 | Minimum 0.3m Horizontal clearance (edge to edge required) | Incorporated | | |
| 53 | 0 | 30-Mar-17 | 407016-00212-14-PL-DAG-0001 | 42057-P-200-100 (Fraser IP) | Show Sewers and confirm if conflict exists on profile from Van As-built info (0.3m min Clearance required) | We will incorporate for the IFC Drawings with a minimum Clearance of 0.3m | | |
| 54 | 0 | 30-Mar-17 | 407016-00212-14-PL-DAG-0001 | 42057-P-200-100 (Fraser IP) | Add waterline to the pipeline plan on the east side and show the offset. | We will incorporate for the IFC Drawings | | |
| 55 | 0 | 30-Mar-17 | 407016-00212-13-PL-DXG-0020 | 42090-P-600-1000 (VPD Parking Lot) | Show 200mm diameter waterline at 1.07m depth | This waterline is not within the window of this drawing (it appears that the profile extends out to it, but the profile **follows the centerline**, and as the centerline has a 90 degree bend, the profile doesn't actually cross this waterline). | | |