CITY OF BETHLEHEM BUREAU OF PLANNING AND ZONING
10 East Church Street, Bethlehem, Pennsylvania 18018-6025
Phone: 610-865-7094
Fax: 610-865-7330
TDD: 610-865-7086

March 28, 2025

Adam Citrullo, PE
Bohler Engineering
74 West Broad Street, Suite 500
Bethlehem, PA 18018

RE: **(24-009 LD&S) – 24120007– 2141 COMMERCE CENTER BOULEVARD (LVIP VII) – LAND DEVELOPMENT PLAN – Ward 16, Zoned IR, plans dated December 13, 2024.**

Dear Mr. Citrullo,

The above-referenced plan has been reviewed by the appropriate City offices. We offer the following comments:

PUBLIC WORKS

Engineering

1. Add the following governing agencies to References & Contacts:
    a. Engineering Department: 10 E. Church St, Bethlehem PA 18018, Deputy Director of Public Works/Chief of Engineering, Basel Yandem, 610-865-7051.
    b. Northampton County Conservations District: 3158 Newberg Road, Nazareth PA 18064, Conservation Specialist, James Lawrence, 610-726-1039
2. The 100-year Flood Plain annotation is upside down on all pages, this shall be corrected.
3. Clearly differentiate existing conditions from proposed work. All existing background items shall be faint/lighter and all improvements shall be darker. This shall include labels and texts.
4. E&S Sheets: All filter socks shall be labelled as CFS or FS, this shall be reflected on the Legend.
5. The 48" RCP Stormwater Easement shall be recorded and clearly shown on Sheet C-310. No structures, trees, or any other utility shall be within this easement. Relocate the proposed 8" Fire line encroaching and crossing the stormwater easement at multiple locations. Private roads or driveways are exempted with an understanding that the City of Bethlehem will not be responsible/liable for any damages should a need arise for access to the stormwater pipe.
6. Increase the font size for all notes and guidelines on Sheet C-102.
7. Increase the font size of the Seeding Specifications on Sheet C-812.
8. On Sheet C-813, reduce the size of Inlet Information Chart and increase the sizes of the tables 4.1, 4.2 & CFS Worksheet. Add CFS work sheet to applicable sheets where CFS is installed.
9. Enlarge the Plant Schedule charts on Sheet C-816.

Stormwater Engineering

1. Sheet C-202, What is the purpose of the 30" HDPE pipe located north of the manhole with a rim elevation of 231.68'?
2. Sheet C-203, A pipe is shown from the CB in the exit access lane into the pipe prior to the manhole; is this to be removed as part of the scope of work?
3. Sheet C-204,

a. The manhole text information and labeling shall be of the same line weight.
b. The existing inlet shown in the grass area southeast of Commerce Center Blvd & Gilchrist Dr. is an OCS for the underground detention facility.
c. The abandoned manhole with a Rim Elevation of 300.34', is this to be removed as part of the scope of work? Is there any pipe associated with it and will the pipe also be removed as part of the scope of work?

4. Sheet C-205,
   a. The proposed 48" HDPE Perforated Underdrain isn't deemed to be Infiltration, and therefore is not permitted on an Act 2 Site. Perforation of the 48" HDPE pipe is not permitted.
   b. Is the 48" HDPE pipe and associated manholes planned to be removed as part of the scope of work?
5. Sheet C-301, What is the 513.2' dimension referring to?
6. Sheet C-503, Label the catch basin downstream of manhole B-61.
7. Sheet C-504, Move the label for C-90 at the intersection, so that it is readable.
8. Sheet C-602, Proposed Stormwater Profile (B-10 to B-20) is showing a 30" HDPE pipe into 500' +/- of 60" HDPE with 2 manholes and 30" HDPE out. The 100-year Flood Plain Elevations appear to be 237' – 240'; pipe inverts are well below these elevations. Provide justification for the 60" pipe and two 60" invert elevations into B-20.
9. Sheet C-604,
   a. Is manhole C-20 proposed to be of doghouse type?
   b. Proposed Storm profile (C-20 – C-21) is showing 8' of 18" HDPE pipe connection. Any pipe connecting directly into a City of Bethlehem system should be RCP not HDPE.
   c. Any elevation lifts to existing manholes shall be done in the major diameter of the structure with ladder connection and water tight seal.
   d. Permits are required for any work done on the City of Bethlehem's stormwater main.
10. Sheet C-809, Show E&S detail for wall construction area.

Traffic

1. Traffic Review Letter #2, dated March 10, 2025, prepared by Benchmark Civil Engineering Services, Inc., is attached for your review and response.

FIRE

1. The architect/engineer must confirm Fire Department vehicles have the required turning space to access all areas. Submit a turning plan drawing using the attached Turn Performance Analysis
   - Re-submit turn plans using provided spec sheets (BFD Ladder 2 Main Print and BFD Ladder 2 Turning Performance). The data used to create the submitted turn plans do not appear to contain the correct data. Include turning plans for both Lot A and B.
2. Install a Fire Hydrant connected directly to the City Water main within 100' of each Fire Department Connection.
   - A fire hydrant meeting these requirements was not visible on the submitted plan for Lot A. Ensure this hydrant is supplied by the city water main not the fire loop/fire pump.
3. Fire Hydrants provided on the "Private Fire Service Main" or "Fire Loop" shall be installed per IFC 2018 ed. 507.5.1. Distance between hydrants shall not exceed 500'.
   - Satisfying comment #2 above will also satisfy this comment.

Please contact the City of Bethlehem Fire Department office at 610-865-7143, or email Fire Marshal and Deputy Fire Chief Craig Baer (cbaer@bethlehem-pa.gov), or Chief Michael Reich (mreich@bethlehem-pa.gov) with any questions, referenced Fire Code requirements, or to obtain any documents required to complete the submittal for review.

GENERAL

1. Recreation Fees of $17,000 for Building Lot A, and $11,250 for Building Lot B, shall be paid prior to finalizing the developer's agreement.
2. Sheet L-102, The reasoning for the gap in street trees along Hellertown Road stated, "to avoid potential future utility conflicts." Unknown future occurrences are not justification for the gap. Revise the plan to provide trees in this location; unless otherwise approved by the City Forester.
3. A revised Sheet S-1 was not provided as part of this submission; therefore, the comment remains part of this letter. Sheet S-1, Signature Block, Recorded Plan Certification, shift this block so as to not overlap with the Planning Commission Approval block below.
4. Consider comments from the Planning Commission Members during the October 10, 2024 Sketch Plan Review, including:
    a. Consideration should be given to reducing the amount of parking located between both building's western facades and Hellertown Road, or provide for additional plantings to ostensibly screen the view of parked vehicles from the right-of-way.
    b. Provide more detailed façade information, particularly for Building B, and preferably as rendered perspectives with façade material labels. Indicate how the two buildings design will correlate with one another.

When these comments are addressed, please submit one (1) full set of revised plans, one (1) partial set of revised plans for Fire, an electronic plan, and a comment/response letter for further review.

This item will be placed on the April 10, 2025 Planning Commission Meeting Agenda

Sincerely,

Craig D Peiffer, AICP
Assistant Director of Planning and Zoning

C.

Basel Yandem	David Taylor	Greg Cryder	Joe Petrucci,
Geoffrey Karanja	Olivia Teel	Ryan Knause	JERC Partners XCII, LLC
Craig Baer	Robert Taylor	Mike Halbfoerster	Kerry Wrobel, LVIP VII

Enclosures

Benchmark
CIVIL ENGINEERING SERVICES, INC.

1727 Jonathan Street • Allentown, PA 18104
Phone: (610) 776-6700 • Fax: (610) 776-1190 • www.bencivil.com

March 10, 2025

Craig Peiffer
City of Bethlehem
10 E. Church Street
Bethlehem, PA 18018
cpeiffer@bethlehem-pa.gov

RE: Traffic Review #2
Transportation Impact Assessment
2141 Commerce Center Blvd. Development
City of Bethlehem
Benchmark Project No. 038095

Dear Craig:

Benchmark Civil Engineering Services, Inc., has reviewed the Transportation Impact Assessment for the 2141 Commerce Center Boulevard Development prepared by Bowman Consulting Group , LTD dated Revised February 2025 and the Preliminary/Final Land Development plans prepared by Bohler dated 02/19/2025.

We offer the following comments.

1. The City should be copied on all PennDOT correspondence concerning the Highway Occupancy permits associated with this project.

2. The report text has been revised to indicate that the driveway access onto Commerce Center Boulevard will be designed to accommodate the path for tractor-trailers. See comment 5 for further discussion of the Commerce Center Boulevard/Gilcrest Drive intersection geometry.

3. Appendix L has been added to the study indicating that there are no significant initial queues at the study intersections. This addresses the previous comment.

4. Appendix K has been added to the study indicating the lane utilization factors for each of the multilane approaches at the study intersections. These factors were utilized in the revised calculations and this comment has been addressed.

5. The traffic impact study has been revised and no longer indicates that the Gilcrest Drive northbound left turn movement level of service at the intersection with Commerce Center Boulevard is at a LOS F. The report now indicates that it operates at a LOS C or D in both the no build and build conditions. The analysis now utilizes the calculated lane utilization factors, the analysis considers that the vehicles on eastbound and westbound Commerce Center Boulevard will arrive in platoons (as opposed to randomly) and the

calculations are based on an assumption that exiting left turn vehicles from Gilcrest Drive will enter Commerce Center Boulevard with a two stage movement. The first stage will cross eastbound Commerce Center Boulevard and in the second they will merge with the westbound Commerce Center Boulevard traffic. The report should include discussion and justification of these assumptions and a geometric plan of the intersection indicating that the two stage movement is feasible.

6. The queue storage indicated in Table 1 at the Commerce Center Boulevard/Gilcrest Drive/Proposed Site Access intersection appears reasonable given the assumptions described in comment 5.

7. The study text has been revised to address the queue length calculation as reported in Table 2. This is acceptable.

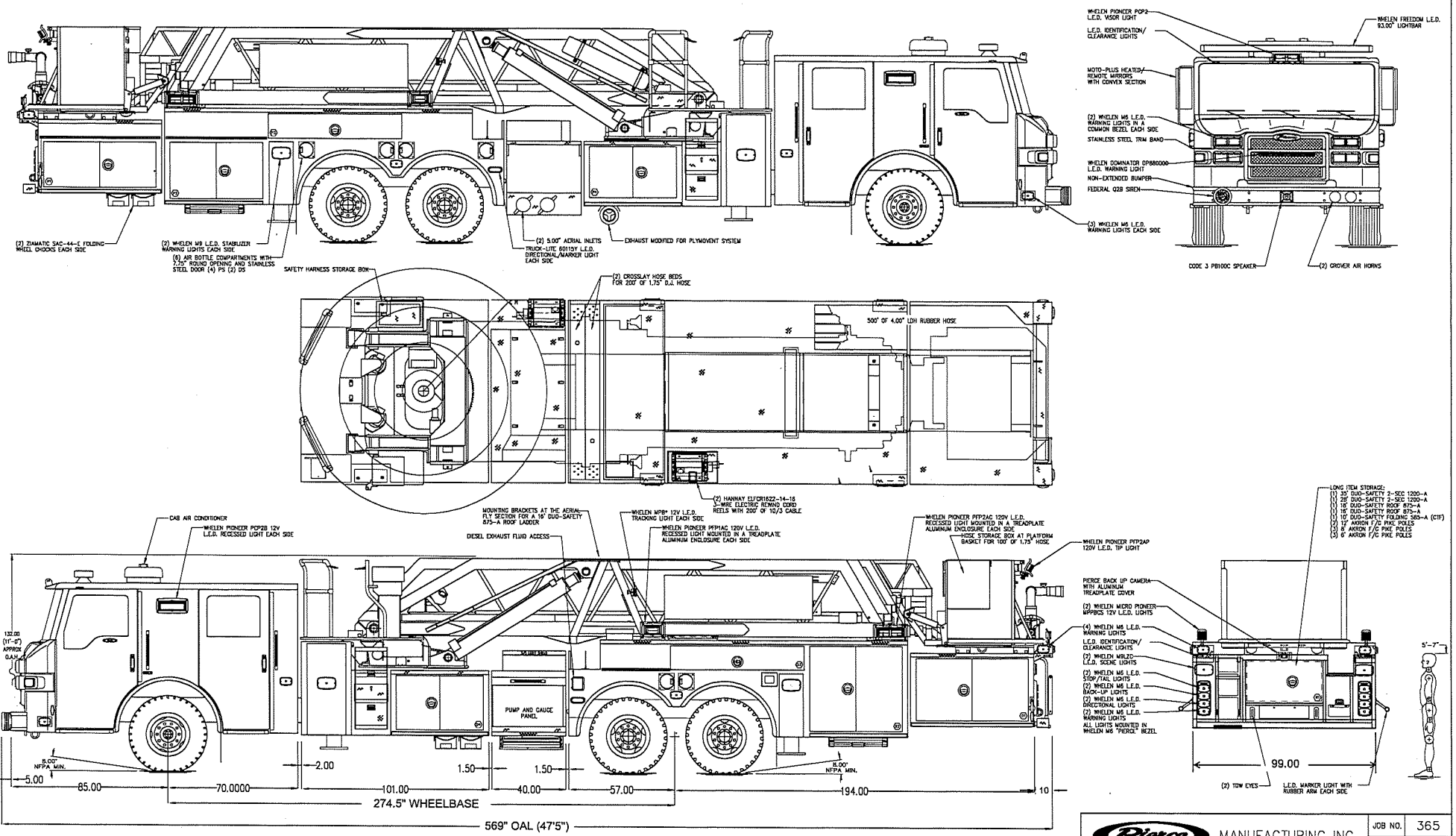
If you have any questions please do not hesitate to contact me.

Sincerely,

Peter A. Terry, P.E., PTOE, PMP, RSP2I

PAT/slc

c: Ryan Krause rknause@bethlehem-pa.gov



NOTE

DIMENSIONS SHOWN ARE APPROXIMATE AND ARE SUBJECT TO MINOR DEVIATIONS AS MAY OCCUR OR BE NECESSARY IN CONSTRUCTION.
MINOR DETAILS NOT SHOWN.

REV	DATE	BY	CH

CHASSIS DATA
MAKE: PIERCE
MODEL: VELOCITY

Pierce MANUFACTURING INC.

TITLE	95' MMSP AERIAL LADDER AND BODY ASSEMBLY 300 GALLON WATER TANK
FOR	CITY OF BETHLEHEM FIRE DEPARTMENT BETHLEHEM, PA
DWG NO.	29396AD

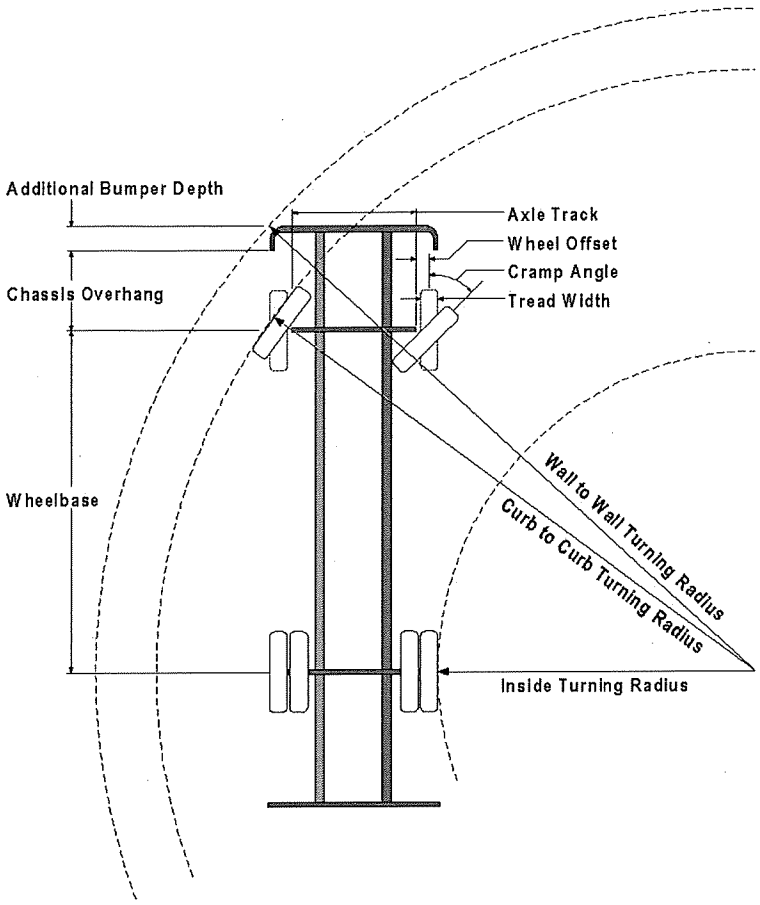
JOB NO.	365
SCALE	1:24
DATE	
DRAWN BY	RWR
DATE	6/1/2014
CHECKED BY	N/A
DATE	N/A
SHEET SIZE	D
SHEET NO.	1 OF 1

Turning Performance Analysis

02/01/2016

Bid Number: 365
Department: Bethlehem City Fire Dept

Chassis: Velocity Chassis, PAP/Midmount (Big Block), 2010
Body: Aerial, Platform, 95', Mid-Mount, Alum Body



Parameters:

Inside Cramp Angle:	45°
Axle Track:	82.92 in.
Wheel Offset:	5.25 in.
Tread Width:	17.7 in.
Chassis Overhang:	78 in.
Additional Bumper Depth:	7 in.
Front Overhang:	85 in.
Wheelbase:	274.5 in.

Calculated Turning Radii:

Inside Turn:	21 ft. 8 in.
Curb to curb:	38 ft. 9 in.
Wall to wall:	43 ft. 1 in.

Comments:

Category Description:	OptionID:	Option Description:
Axle, Front, Custom	0637059	Axle, Front, Oshkosh TAK-4, Non Drive, 24,000 lb, Velocity (425 Tires)
Wheels, Front	0001656	Wheels, Front, 22.50" x 12.25", Steel, Hub Pilot
Tires, Front	0677684	Tires, Front, Michelin, XFE (wb), 425/65R22.50, 20 ply, Fire Service Load Rating
Bumpers	0633464	Bumper, Non-Extended, Steel, Painted, Imp/Vel
Aerial Devices	0592911	Aerial, 95' Pierce PAP, Mid Mount

Notes:

Actual Inside cramp angle may be less due to highly specialized options.

Curb to Curb turning radius calculated for 9.00 inch curb.