CHANGE ORDER NO.: 8

Owner:	Town of Bristol	Owner's Project No.:	WW22532001
Engineer:	Commonwealth Engineers, Inc.	Engineer's Project No.:	S22145
Contractor:	Crosby Construction	Contractor's Project No.:	24105-01
Project:	WWTP Improvement Project		
Contract Name:	WWTP Improvement Project		
Date Issued:		Effective Date of Change Order:	

The Contract is modified as follows upon execution of this Change Order:

Description: Tinted windows for new admin building, SBR undercut delay, Partial change in gravel to #53 Limestone, and Part 2 NIPSCO gas delay

Attachments: Change Order Breakdown Memo, WCD-12/RFI-47 pricing, Contractor SBR delay letter, RFI-73 pricing, Contractor Part II delay notification letter

Change in Contract Price	**Change in Contract Times [State Contract Times as either a specific date or a number of days]**
Original Contract Price: $ 24,293,749.00	Part 1 Original Contract Times: Calendar days Substantial Completion: 450 Ready for final payment: 30
[~~Increase~~] [**Decrease**] from previously approved Change Orders No. 1 to No. 7: $ 134,675.23	Part 1 [**Increase**] [~~Decrease~~] from previously approved Change Orders No. 1 to No. 7 Substantial Completion: 139 Ready for final payment: 0
Contract Price prior to this Change Order: $ 24,159,073.77	Part 1 Contract Times prior to this Change Order: Substantial Completion: 589 Ready for final payment: 30
[~~Increase~~] [~~Decrease~~] this Change Order: $ 0	Part 1 **[Increase]** [~~Decrease~~] this Change Order: Substantial Completion: 52 Ready for final payment: 0
Contract Price incorporating this Change Order: $ 24,159,073.77	Part 1 Contract Times with all approved Change Orders: Substantial Completion: 641 Ready for final payment: 30

Change in Contract Times
[State Contract Times as either a specific date or a number of days]

Part 2 Original Contract Times: Calendar days	
Substantial Completion:	180
Ready for final payment:	30
Part 2 ~~[Increase]~~ [~~Decrease~~] from previously approved Change Orders No. 1 to No. 7	
Substantial Completion:	0
Ready for final payment:	0
Part 2 Contract Times prior to this Change Order:	
Substantial Completion:	180
Ready for final payment:	30
Part 2 **[Increase]** ~~[Decrease]~~ this Change Order:	
Substantial Completion:	51
Ready for final payment:	0
Part 2 Contract Times with all approved Change Orders:	
Substantial Completion:	231
Ready for final payment:	30

Town of Bristol
WWTP Improvements Project
Change Order #8

Recommended by Engineer (if required)		Accepted by Contractor	
By:	Amy Mendoza	By:	Russell Jacobs
Title:	Project Engineer	Title:	Vice President
Date:	7/31/26	Date:	7/31/2026
Authorized by Owner		**Approved by Funding Agency (if applicable)**	
By:		By:	
Title:		Title:	
Date:		Date:	

COMMONWEALTH ENGINEERS, INC.

A wealth of resources to master a common goal.

July 31, 2026

Mike Yoder
Town of Bristol
303 E Vistula St
Bristol, IN 46507

RE: Job Number S22145
WWTP Improvement Project
Proposed Change Order No. 8

Dear Mr. Yoder:

Enclosed, please find the proposed Change Order No. 8 (CO #8) for the Town of Bristol's consideration and approval.

This CO #8 includes a contract cost increase of $0, 52 additional days in Part 1, and 51 additional days in Part 2, resulting in a new total contract price of $24,159,073.77, time to substantial completion of Part 1 at 589 days, and time to substantial completion of Part 2 at 231 days from substantial completion of Part 1.

Recommendation

We have reviewed the items of additional cost and determined them to be fairly priced. This proposed change order consists of the following items:

- Tinted Windows
- Compensation for delay caused by SBR Undercut (days and General Conditions costs)
- Partial Change in Gravel to #53 Limestone
- Additional time added to Part 2 due to NIPSCO gas delay

Further details can be found in the attached memorandum. The Town plans to pay for items of cost using the Owner Allowance. We recommend acceptance of this change order. The table below provides a summary of components included within this change order:

Description	Cost Change	Time Extension (Days)	Summary Notes
Tinted Windows	$1,052	0	The Town requested to change the 6 west facing windows to tinted windows rather than un-tinted.
SBR Undercut Delay	$30,000	52 (Part 1)	The SBR undercut caused 52 days delay and additional General Conditions supervision costs.
Partial Change in Gravel to #53 Limestone	$24,154	0	The Town requested 4-inches of crushed #53 limestone be used with 4-inches of crushed #53 gravel in lieu of full 8-inch depth crushed #53 gravel material to improve final appearance and longevity of gravel drives.
Part 2 NIPSCO Gas Delay	$0	51 (Part 2)	NIPSCO delay of capping of existing gas line to the existing admin building caused a delay of 51 days.
Total:	**$55,206 to be paid via Owner Allowance** *$0 change to established Contract Cost*	**Part 1: 52 Part 2: 51**	

The change orders and use of the Owner Allowance so far in this contract, including this change order, equate to a 0.03% decrease from the original contract price. Note, the Owner Allowance of $150,000 was established as part of Change Order 1 in exchange for 90 additional contract days. A summary of the available contingency and Owner Allowance on the project is included in the table below.

Item	Amount, Original	Approved CO's, with Current CO (negative = credit)	Remaining Amount
Contingency	$1,214,687.45	-$134,675.23	$1,349,362.68
Owner Allowance	$150,000.00	$143,015.26	$6,984.74
Total	**$1,364,687.45**	**-$8,340.03**	**$1,356,347.42**

If you have any questions, please feel free to contact us.

Sincerely,

COMMONWEALTH ENGINEERS, INC.

Amy Mendoza, P.E.

COMMONWEALTH ENGINEERS, INC.
A wealth of resources to master a common goal.

100 East Wayne St., Suite 315
South Bend, IN 46601
PH: (574) 800-7177

CHANGE ORDER SUMMARY MEMORANDUM

DATE: July 31, 2026

SUBJECT: Wastewater Treatment Plant Improvements
Work Item Breakdown for Change Order No. 8

Change Order No. 8 for this project includes a cost increase and time extension for items further explained below. The Engineer has reviewed the costs submitted by the Contractor and considers them fair.

The attached request for change includes the resulting increase associated with the items described below.

1) **WCD-12 Tinted Windows**
   Work Change Directive No. 12 (WCD-12) was issued at the Town's request to provide insulated tinted glass windows for the 6 total west-facing windows. The change is intended to reduce solar heat gain and improve occupant comfort withing the Administration Building. This change results in an additional $1,052 in project costs and no additional contract time.

2) **RFI-9 SBR Undercut Delay**
   During excavation for the SBR structure, the Contractor identified unsuitable subgrade soils. Subsequent geotechnical evaluation determined that the upper 18 inches of foundation soils were loose and incapable of providing the required bearing capacity. The recommendation required undercutting 12 inches of existing soil, moisture conditioning and recompacting the exposed subgrade, and replacing the removed material with 12 inches of compacted No. 53 crushed limestone. The undercut and stabilization work created a critical path delay to the SBR foundation and concrete activities, shifting portions of the work into winter conditions and resulting in addition schedule impacts. The delay results in an additional 52 calendars of contract time. The Contractor experienced additional General Conditions costs for supervision and has requested compensation for 30 days worth of General Conditions costs, totaling $30,000. At the time of the SBR undercut, the Engineer had determined the need to wait until the end of Part 1 to see if these General Conditions costs were actually necessary. Now that Part 1 has been

completed, the Engineer feels that the adjustment to General Conditions costs is valid. The Town agrees that the additional cost is reasonable.

3) **Partial Change in Gravel to #53 Limestone**
   The Town requested the change in gravel material for the top 4-inches of finished gravel surfaces to use #53 crushed limestone material instead of #53 gravel material which was specified. The Contractor stated that additional cost is due to hauling costs for the crushed limestone material to obtain the material from the Fort Wayne area. The Engineer and Town have reviewed the additional cost provided by the Contractor and find it fair and acceptable. The total cost of this item is $24,154 and no additional contract time is associated with this item.

4) **Part 2 NIPSCO Gas Delay**
   The Contractor submitted a delay notification for Phase II stating that demolition activities were delayed due to utility disconnection issues beyond the Contractor's control. Following the permanent diversion of flow to the new treatment plan on April 8, 2026, electrical service to the existing facility was disconnected on April 22, 2026. However, the scheduled removal of the natural gas service by NIPSCO was not completed until May 15, 2026. This delayed the start of structural demolition by approximately six weeks and created additional schedule impacts affecting the sequencing and availability of the hazardous waste removal subcontractor. As a result, hazardous waste removal activities were rescheduled and extended, with completion anticipated on June 24, 2026. The Contractor has requested a contract time extension of 63 calendar days, less 12 days attributed to hazardous waste removal activities, resulting in a requested net contract time adjustment of 51 calendar days.

The table below provides a summary of components included within this change order. The Town has requested to cover the cost items using the "Owner Allowance" established in Change Order 1. The total available Owner Allowance, based on Town/Engineer-authorized items so far, is $62,190.74. The total cost of the items in this change order is $55,206. Therefore, there will be zero overall cost change on the project contract and after the Contractor bills for these items, there will be a balance of $6,984.74 remaining in the Owner Allowance.

Description	Cost Change	Adjustment in Contract Time (Calendar Days)
Tinted Windows	$1,052	0
SBR Undercut Delay	$30,000	Part 1: 52
Partial Change in Gravel to #53 Limestone	$24,154	0
Part 2 NIPSCO Gas Delay	$0	Part 2: 51
Total:	**$55,206 – Owner Allowance $0 change in overall Contract Cost**	**Part 1: 52 Part 2: 51**

WCD-12 / RFI-47
TINTED WINDOWS

Date: Description: RFI 47 Job #

Description	Qnty.	Change description	Crew	MH	UM	UPL	Labor	UCM	Materials	CC	Job Exp.	CC	subs	CC	Totals
		Crosby PM time	PM	2	HR	$ 225.00	$ 450.00								$450
			PS		HR	$ 125.00	$ -								$0
							$ -								$0
							$ -								$0
RFI #47	1	Tinted windows West Elevation					$ -						$500		$500
							$ -								$0
							$ -								$0
							$ -								$0
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Subtotal							$ 450.00		$ -		$ -		$500.00		$950.00
Subcontractor Bond												0	$0		$0
Tax - General Condition Items ONLY												7%	$0		$0
Project Insurance													$0		$0
Builders Risk												By Owner	$0		$0
Job Bond												1%	$9.50		$9.50
Architectural												0%	$0		$0
Sub Total							450		0		0		$509.50		$959.50
Overhead & Profit											L&M Columns	15%	$67.50		$67.50
Overhead & Profit											Subcontractor Column	5.0%	$25.00		$25.00
Total Job							450		0		0		$602.00		$1,052.00

COMMONWEALTH ENGINEERS, INC.
A wealth of resources to master a common goal.

Environmental Engineers & Consultants
7256 Company Drive
Indianapolis, IN 46237
PH : (317) 888-1177 FAX: (317) 887-8641

WORK CHANGE DIRECTIVE #12

TO: Russell Jacobs, Crosby Construction

FROM: Amy Mendoza, P.E., Commonwealth Engineers, Inc.

CC: Jeremy Hardy, P.E., Commonwealth Engineers, Inc.

DATE: August 14, 2025

SUBJECT: Town of Bristol, Indiana Wastewater Treatment Plant Improvements, Work Change Directive No. 12

Issue:

The Town has requested tinted windows for all windows on the west-facing side of the new admin building.

Work Directive:

1. Contractor shall adjust scope of work to provide insulated tinted glass windows on west facing windows meeting the attached specifications.

The Contractor shall review this Work Change Directive No.12 and notify the Engineer if any additional clarifications are necessary regarding this issue prior to submitting their proposal for the work.

Attachments:

- Revised building specification with tinted windows (highlighted)

SECTION 133400 - ENGINEERED POST FRAME STRUCTURES

PART 1 - GENERAL

1.01 SUMMARY

A. Section Includes:

1. Engineered wood-framed structures consisting of the following components:

a. Factory-engineered wall columns.
b. Factory-engineered roof truss.
c. Factory-engineered metal roof and wall panels.
d. Factory-engineered building system accessories including doors and windows.
e. Prefinished metal trim items.
f. Prefinished ridge vents and soffits.

1.02 REFERENCES

A. Reference Standards:

1. Preservative Treated Lumber:

a. American Wood Preservers Association (AWPA).

2. Lumber grading rules and wood species:

a. National Design Specifications for Wood Construction, current edition.
b. Northeastern Lumber Manufacturer's Association, Inc. (NELMA).
c. Southern Pine Inspection Bureau (SPIB): Southern Pine.
d. West Coast Lumber Inspection Bureau (WCLIB): Douglas Fir.
e. Western Wood Products Association (WWPA): Douglas Fir and Ponderosa Pine.

3. MSR Lumber Producers Council (MSR) for machine stress rated lumber.

4. National Design Specifications for Wood Construction.

5. National Design Standard for Metal Plate Connected Wood Truss Construction (TPI).

1.03 ACTION SUBMITTALS

A. Product Data: For each type of process and factory-engineered product. Indicate component materials, dimensions, profiles, and construction and installation details.

1. Include information for specialty accessory products specified for this Project.
2. Include data for wood-preservative treatment from chemical treatment manufacturer and certification by treating plant that treated materials comply with requirements. Indicate type of preservative used and net amount of preservative retained.
3. For products receiving waterborne treatment, include statement that moisture content of treated materials was reduced to levels specified before shipment to truss fabricator.

4. Include copies of warranties from chemical treatment manufacturers for each type of treatment.

B. Shop Drawings: Include plans, elevations, sections, details, and attachments to other work.

1. Sizes, stress grades, and species of lumber.
2. Anchor-bolt and embedded column bracket layout.
3. Structural Framing Drawings: Show complete fabrication of primary and secondary framing.Include provisions for openings and the following information:

a. Slope or depth, span, and spacing of truss.
b. Heel bearing height.
c. Design loading to include:

1) Top chord live load.
2) Top chord dead load.
3) Bottom chord dead load.
4) Concentrated loads and their points.

d. Adjustments to lumber and plate design values for conditions of use.
e. Plate type, thickness of gauge, and size.
f. Lumber size, species and grade for each member.

4. Metal Roof and Wall Panel Layout Drawings: Show layouts of metal panels including methods of support. Include details of edge conditions, joints, panel profiles, corners, anchorages, trim, flashings, closures, and special details. Indicate the following components:

a. Roof mounted items.
b. Wall mounted items.

5. Submit Shop Drawings that have been engineered and certified by professional engineer licensed in the State in which Project is located. Include seal and signature of professional engineer on Shop Drawings.

C. Delegated Design Data: Truss engineering calculations for loading and stresses, bearing seal and signature of professional engineer licensed in the State of Indiana. Include the following calculations:

1. Minimum design shall meet design standards of latest edition of the Indiana Building Codeunless other, more stringent requirements are in force in Project location.
2. Provide Truss bottom chord loading capacity of 10 psf superimposed dead load and a 100 lb. concentrated superimposed dead load, in addition to all other code required loads.
3. Bending moments and axial forces for each member.
4. Basic plate design values.
5. Design analysis for each joint indicating that proper plates have been used.
6. Provide design calculations for exterior walls, canopies, soffit systems, and lateral bracing walls. Design wind loads and lateral bracing loads are indicated on structural Drawings.
7. Submit design calculations that have been engineered and certified by a professional

engineer licensed in Indiana. Include seal and signature of professional engineer on calculations.

D. Deflection limits: design framing assemblies to withstand design loads with deflections no greater than the following:

a. Purlins, girts and rafters: vertical deflection of 1/240 of the span.
b. Metal roof and wall panels: vertical deflection of 1/180 of the span.
c. Design secondary-framing system to accommodate deflection of primary framing and construction tolerances, and to maintain clearances at openings.
d. Engineer building structure to withstand design loads with lateral drift limits of 1/400 of the building height.
e. Seismic performance: framing shall withstand the effects of earthquake motions determined according to ASCE/SEI 7.
f. Allow for thermal movements resulting from the following maximum change (range) in ambient and surface temperatures of 120 deg f ambient; 180 deg f, material surfaces.
g. Air leakage through metal panel assembly of not more than 0.06 cfm/sq. Ft. (0.3 l/s per sq. M) of roof area when tested according to astm e 1680 at negative test-pressure difference of 1.57 lbf/sq. Ft.
h. No water penetration through roof panels when tested according to astm e 1646 at test-pressure difference of 2.86 lbf/sq. Ft. (137 pa), and through wall panels when tested according to astm e 331 at a wind-load design pressure of not less than 2.86 lbf/sq. Ft.
i. Provide drainage to exterior for water entering or condensation occurring within wall or roof system.
j. Wind-uplift resistance: provide metal roof panel assemblies that comply with ul 580 for class 90.

E. Flashing and trim, gutters, downspouts, roof ventilators, and louvers.

F. Samples for Initial Selection: For units with factory-applied color finish, color chart of manufacturer's standard colors.

1.04 INFORMATIONAL SUBMITTALS

F. Evaluation Reports: For the following, from ICC-ES:
1. Wood-preservative-treated wood.
2. Engineered wood products.

G. Quality Control Submittals:
1. Test Reports: Certified test reports showing compliance with specified performance characteristics.
2. Certification: Manufacturer’s certification that Products furnished meet specified design andperformance criteria.

H. Submit written proof of third-party inspection program in force for truss manufacturer used on Project.

I. Certifications: Certify that specified roof and wind load requirements are met.

1.05 QUALITY ASSURANCE

F. Manufacturer Qualifications: Manufacturer with minimum 5 years' documented experience that participates in recognized quality-assurance program that complies with quality-control procedures

and that involves third-party inspection by an independent testing and inspecting agency acceptableto Architect and authorities having jurisdiction.

1. Manufacturer's responsibilities include providing professional engineering services needed toassume engineering responsibility.
2. Manufacturer shall have engineering department.
3. Engineering Responsibility: Preparation of Shop Drawings and comprehensive engineeringanalysis by qualified professional engineer.

G. Erector Qualifications: An experienced erector who specializes in erecting and installing work similar in material, design, and extent to that indicated for this Project and who is acceptable to manufacturer.

H. Source Limitations: Obtain engineered post frame building components, including primary and secondary framing and metal panel assemblies, from single source from single manufacturer.

1.06 DELIVERY, STORAGE, AND HANDLING

A. Handle and store materials per manufacturer's requirements.

B. Handle and store trusses to comply with recommendations in TPI BCSI**,** "Building Component Safety Information: Guide to Good Practice for Handling, Installing, Restraining, & Bracing Metal Plate Connected Wood Trusses."

1. Store trusses flat, off ground, and adequately supported to prevent lateral bending.
2. Protect trusses from weather by covering with waterproof sheeting, securely anchored.
3. Provide for air circulation around stacks and under coverings.
4. Store trusses to avoid contact with other materials that could create staining or discoloration.

C. Inspect trusses upon delivery to Project site and notify manufacturer immediately if members have damage from handling or show discoloration, corrosion, or other evidence of deterioration. Discard and replace trusses that are damaged or defective.

1.07 WARRANTY

A. Manufacturer's Special Warranty – Treated Material: Manufacturer agrees to repair, restore, or replace columns that fail in materials within specified warranty period.

1. Warranty Period: 50 years from date of Substantial Completion.
2. Manufacturer shall repair treated structural columns that fail because of insect damage or because of decay that occurs under normal conditions and proper use. If manufacturer is not able to repair structural posts to satisfaction of Architect and Owner, manufacturer shall replace damaged treated structural columns.

B. Special Warranty on Metal Panel Finishes: Manufacturer's standard form in which manufacturer agrees to repair finish or replace metal panels that show evidence of deterioration of factory-applied finishes within specified warranty period.

1. Exposed Panel Finish: Deterioration includes the following:

    a. Color fading more than 5 Hunter units when tested per ASTM D2244.
    b. Chalking in excess of a No. 8 rating when tested per ASTM D4214.
    c. Cracking, checking, peeling, or failure of paint to adhere to bare metal.
2. Finish Warranty Period: From date of Substantial Completion, 40 years on chalk; 30 years on color change:
3. Warranty Exclusions: Manufacturer will not warrant metal panel finishes damaged due to exposure to atmospheric pollutants including animal waste or other corrosive conditions. Manufacturer will not warrant labor by others.
4. Manufacturer shall repair painted steel roofing or siding panels if the paint peels, cracks, checks, flakes or blisters to an extent that is apparent by ordinary outdoor visual observation when exposed to normal weather and atmospheric conditions. If manufacturer is not able to repair steel panels to satisfaction of Architect and Owner, manufacturer shall replace damaged steel panels.

PART 2 - PRODUCTS

2.01 MANUFACTURERS

A. Subject to compliance with requirements, provide products from one of the following manufacturers:

1. Energy Panel Structures, Inc.
2. FBI Buildings, Inc.
3. Graber Post Buildings, Inc.
4. Lester Buildings
5. Morton Buildings
6. Wick Buildings
7. Cleary Building Corporation
8. Or Approved Equal

2.02 PERFORMANCE CRITERIA

A. Design Requirements:

1. Design wood members per formulas published in National Design Specifications (NDS) for Wood Construction.
2. Design light meta-toothed connector plates and joint design in compliance with Truss Plate Institute's (TPI) National Design Standard for Metal Plate Connected Wood Truss Construction.
3. Include unbalanced roof loads required by ASCE-7, current edition.

2.03 WOOD-PRESERVATIVE-TREATED LUMBER

A. Preservative Treatment by Pressure Process: AWPA U1; Use Category UC3b for exterior construction not in contact with ground, and Use Category UC4a for items in contact with ground.

1. Preservative Chemicals: Acceptable to authorities having jurisdiction and containing no arsenic or chromium. Do not use inorganic boron (SBX) for sill plates.

2. For exposed items indicated to receive stained or natural finish, use chemical formulations that do not require incising, contain colorants, bleed through, or otherwise adversely affect finishes.

B. Maximum moisture content of 19 percent or per appropriate grading rules. Do not use material thatis warped or does not comply with requirements for untreated material.

C. Mark lumber with treatment quality mark of inspection agency approved by ALSC Board of Review.

D. Application: Treat items indicated on Drawings, and the following:

1. Laminated columns.
2. Baseboards.
3. Hold down blocks.

2.04 MATERIALS - WOOD

A. Laminated Columns: Factory-fabricated from minimum 3 ply 2 inch by 6 inch #1 or better southernyellow pine.

1. Columns to 20 Feet Lengths: Full-length (unspliced) nail laminated plys. Provide middle plywith short truss support block.
2. Columns over 20 Feet Lengths: Spliced laminated plies per approved Shop Drawings andmanufacturer's design.
3. Preservative-Treatment: Treat portions of columns designed to be in contact with ground tonet retention of 0.60 pounds per cubic foot of CCA per AWPA U1 requirements.
4. Provide column brackets to be embedded into concrete work, by Simpson Strong Tie Co., Inc., or approved equal.

B. Wood Trusses: Factory-fabricated of surfaced lumber.

1. Lumber:

a. Top and Bottoms Chords: No. 1 or better Southern yellow pine or comparable Spruce-pine-fir.

b. Webs: No. 2 or better Southern yellow pine or SPF.

2. Metal Connector Plates: Fabricated from ASTM A653; Structural Steel (SS), high-strengthlow-alloy steel Type A (HSLAS Type A); G60 hot-dip galvanizing coating designation.

a. Plate Thicknesses: 0.036 inch and 0.0556 inch thick.

C. Baseboards: 2 inch by 8 inch No. 2 or better Southern yellow pine, tongue-and-groove.

1. Preservative-Treatment: Treat baseboards for ground contact conditions. per AWPA U1requirements. Preservative shall penetrate 100 percent of sapwood.

D. Wall Girts: 2 inch by 6 inch girts, No. 1 or better Southern yellow pine.

E. Purlins and Truss Ties: 2 inch by 4 inch laid on edge, MSR SPF 1650.

1. Purlins may be installed over top chord of truss, flat, or in purling hangers. Where purlins and truss ties are set in hangers, provide 2 inch by 6 inch laid on edge, MSR SPF 1650 or No. 1 orbetter Southern yellow pine.

F. Overhang Framing: Fabricated rafter frames.

1. Provide factory beveled facia boards, 2 inch by 6 inch Spruce-pine-fir, No. 2.

G. Wind Bracing:

1. 2 inch by 6 inch, No. 2 or better Spruce-pine-fir from end wall column to first truss back.
2. 2 inch by 4 inch diagonal in roofline bracing as required by design.

H. Framing Around Openings:

1. Provide 2 inch by 6 inch/2 inch by 4-inch No. 2 around door, window, and overhead sectional door openings.

I. Headers: Provide built-up No. 1 or better Southern yellow pine headers as required to meet loading designs.

J. Incidental Framing: No.2 or better 2 inch by 4 inch.

2.05 MATERIALS – PREFINISHED MATERIALS

A. General: Factory-formed metal panels, roll-formed in manufacturer's facility, designed to be field assembled by lapping side edges of adjacent panels and mechanically attaching panels to supports using exposed fasteners in side laps. Include accessories required for weathertight installation.

B. Metal Panels: Exposed-fastener metal roof and wall panels, formed with raised ribs andrecesses.

1. Material: Zinc-coated (galvanized) steel sheet, 0.0125 inch nominal thickness.

a. Exterior Finish: Siliconized polyester.
b. Color: Selected by Architect from manufacturer's full range.

2. Rib Spacing: 2 major ribs at 9 inches on center. 2 minor ribs at 3 inches on center between major ribs.
3. Panel Coverage: 36 inches.
4. Panel Height: 3/4 inch.

C. Wainscoting: 32 inch high accent feature from at base of building, consisting of the following material:
1. Concrete Siding Units: Provide concrete wainscot manufacturer's recommended materials fora complete wainscot system.
a. Basis-of-Design Product:
1) Alliance Concrete Concepts: Moderra Block Wainscot.

D. Metal Trim: Match material and color of metal panels. Provide trim for corners, ridge lines, rakes,eaves, and panel bases.

1. Lengths: Minimum 10 feet .
2. Trim, overhang facias, track covers, and slide door jambs available in building panel covers.
3. Overhead Sectional Door and Slide Door Jamb Trim: Fabricated from 1 piece up to 10 feet inlength.

E. Soffits: Aluminum or steel, vented as required. Colors shall match roof and wall panel colors.

F. Ridge Vent: Manufacturer's standard pre-engineered ridge cap or ridgelite, flashings, and eave andgable trim. Field-fabricate minor flashings as indicated on approved Shop Drawings.

1. Provide manufacturer's standard ridge vents as indicated on Drawings,

   Continuous Vented Ridge 12 square inches per lineal foot

2.06 RELATED MATERIALS

A. Insulation: Where indicated on Drawings, provide one or more of the following insulation types.

B. Unfaced, Glass-Fiber Blanket Insulation: ASTM C665, Type I; passing ASTM E136 for combustioncharacteristics.

1. Surface Burning Characteristics per ASTM E84:

   a. Flame Spread: 25.
   b. Smoke Developed: <50.

2. Thermal Resistance and Thickness: R-25, 9 inch.

C. Polypropylene-Scrim-Kraft-Faced, Glass-Fiber Blanket Insulation: ASTM C665, Type II, Class A;Category 1, with 4 mil white, high density polyethylene facing.

1. Surface Burning Characteristics per ASTM E84:

   a. Flame Spread: 25.
   b. Smoke Developed: <50.

2. Thermal Resistance and Thickness: R-25, 9 inch.
3. Physical Properties:

   a. Water Vapor Transmission, ASTM E96: 0.015 perms.
   b. Light Reflectivity, ASTM C 523, Illuminant D-6500: 90 percent.

D. Spray Polyurethane Foam insulation: ASTM C1029, Type II for pneumatic application.

1. Surface Burning Characteristics per ASTM E84:

   a. Flame Spread: 7 5.

b. Smoke Developed: 4 50.

2. Thermal Resistance: R-20
3. Manufacturers:

a. BASF Corporation.
b. BaySystems NorthAmerica, LLC.
c. Dow Chemical Company (The).
d. ERSystems, Inc.
e. Gaco Western Inc.
f. Henry Company.
g. Or Approved Equal

E. Anti-Condensation Felt: Manufacturer's shop-applied, proprietary, self-adhered felt designed to trapcondensation moisture and release moisture as humidity.

F. Walk Doors: Where indicated on Drawings, provide the following type of doors and frames:

1. Insulated Steel frame and sash with electrostatically coated enamel paint finish and locking options based on Section 087100 – Door Hardware of the project manual.
2. R-value of not less than 8.0
3. Fire-Rated Door Assemblies: Assemblies complying with NFPA 80 that are listed and labeled by a qualified testing agency, for fire-protection ratings indicated, based on testing at positive pressure according to NFPA 252 or UL 10C.
4. Temperature-Rise Limit: Where indicated, provide doors that have a maximum transmitted temperature end point of not more than 450 deg F (250 deg C) above ambient after 30 minutes of standard fire-test exposure.
5. Acceptable Manufacturers::

a. Amweld Building Products, LLC.
b. Benchmark; a division of Therma-Tru Corporation.
c. Ceco Door Products; an Assa Abloy Group company.
d. Curries Company; an Assa Abloy Group company.
e. Deansteel Manufacturing Company, Inc.
f. Firedoor Corporation.
g. Fleming Door Products Ltd.; an Assa Abloy Group company.
h. Habersham Metal Products Company.
i. Kewanee Corporation (The).
j. Mesker Door Inc.
k. Pioneer Industries, Inc.
l. Security Metal Products Corp.
m. Steelcraft; an Ingersoll-Rand company.
n. Or approved Equal

G. Windows: Where indicated on Drawings, provide the following type of windows:

1. Thermally broken insulated extruded aluminum frame and sash with electrostatically coated enamelpaint finish and window manufacturer's standard insulated tinted glass units.
2. Provide with the following minimum performance:

a. Product Standard: AAMA/WDMA/CSA 101/I.S.2/A440.

1) Minimum Performance Class: LC.
2) Minimum Performance Grade: 30.

b. Thermal Transmittance: NFRC 100 maximum whole-window U-factor of 0.294 Btu/sq.
c. Solar Heat-Gain Coefficient (SHGC): NFRC 200 maximum whole-window SHGC of 0.25.
d. Condensation-Resistance Factor (CRF): Provide aluminum windows tested for thermal performance according to AAMA 1503, showing a CRF of 45.
e. West-facing windows shall be Tinted Annealed Float Glass: ASTM C1036, Type I, Class 2 (tinted), Quality-Q3.
1) Color: Gray
2) Visible Light Transmittance: 50%

3.

a. Acceptable Manufacturers
:
1) All Seasons Window & Door Mfg., Inc.; All Seasons Commercial Division, Inc.
2) Custom Window Company.
3) DeSCo Architectural Inc.
4) Kawneer North America; an Alcoa company.
5) Peerless Products Inc.
6) Thermal Windows, Inc.
7) TRACO.
8) Or approved Equal

H. Sectional Overhead Doors – as specified in Section 083610 – SECTIONAL OVERHEAD DOORS.

I. Closure Strips: Closed cell, 2 psf density polyethylene foam, premolded to match configuration of panels.

2.07 FASTENERS

A. General: Provide fasteners of size and type indicated that comply with requirements specified in thisArticle for material and manufacture.

1. Where trusses are exposed to weather, in ground contact, made from pressure-preservative treated wood, or in area of high relative humidity, provide fasteners with hot-dip zinc coating complying with ASTM A153.
2. Exposed Fastener Heads: Match color of steel panel.
3. Where steel panels or trim is attached to preservative-treated lumber, provide fasteners of unpainted Type 304 stainless steel.

B. Nails, Brads, and Staples: ASTM F1667.

1. Framing Lumber: 10d, 16d and 60d ring shank nails.
2. Machine Bolts: Minimum grade 1, A307.
3. Metal Panels: Minimum 1-1/2 inch No. 10 screw fasteners with EPDM sealing washersbearing on weather side of metal panels.

a. Match color of metal panels.

2.08 FABRICATION

A. Shop-fabricate wood trusses in TPI inspected plant.

B. Cut truss members to accurate lengths, angles, and sizes to produce close-fitting joints.

C. Fabricate metal connector plates to sizes, configurations, thicknesses, and anchorage details required to withstand design loads for types of joint designs indicated.

D. Assemble truss members in design configuration indicated; use jigs or other means to ensure uniformity and accuracy of assembly with joints closely fitted to comply with tolerances in TPI 1. Position members to produce design camber indicated.

1. Fabricate wood trusses within manufacturing tolerances in TPI 1.

E. Connect truss members by metal connector plates located and securely embedded simultaneouslyin both sides of wood members by air or hydraulic press.

PART 3 - EXECUTION

3.01 EXAMINATION

A. Examine substrates, areas, and conditions, with erector present, for compliance with requirements for installation tolerances and other conditions affecting performance of work.

B. Before erection proceeds, survey elevations and locations of concrete- and masonry-bearing surfaces and locations of anchor rods, bearing plates, and other embedments to receive structural framing, with erector present, for compliance with requirements and metal building system manufacturer's tolerances.

1. Engage land surveyor to perform surveying.

C. Verify that mechanical and electrical utilities are in correct position. Proceed with erection only after unsatisfactory conditions have been corrected.

3.02 PREPARATION

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A. Provide temporary shores, guys, braces, and other supports during erection to keep framing secure, plumb, and in alignment against temporary construction loads and loads equal in intensity to design loads. Remove temporary supports when permanent framing, connections, and bracing are in place unless indicated otherwise.

3.03 ERECTION OF FRAMING

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A. General: Do not use materials that are unsound, warped, improperly finished, or with defective surfaces, sizes, or patterns.

1. Comply with frame manufacturer's approved Shop Drawings for details and

building erection.
2. Comply with NFBA document “Accepted Practices for Post-frame Construction Framing Tolerances.”

B. Columns:

1. Coordinate with concrete contractor to place column brackets into foundations.
2. Erect columns into column brackets.
3. If needed, install hold down blocks at bottom of each column per approved Shop Drawings.
4. Accurately position column in hole.
5. Install fibrous expansion joint material around column and infill slab leave-outs with grout.

C. Baseboards: Install 1 run of 2 inch by 8-inch tongue-and-groove plank, at grade, using manufacturer recommended fasteners.

D. Wall Girts: Install at centers indicated on Drawings.

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1. If required, install overhang framing at top of wall girts.

E. Trusses:

1. Set trusses in place in center of column using lifting methods as approved by manufacturer.
2. When trusses are properly positioned, install 1/2 inch by 5-1/2 inch machine bolt and manufacturer recommended 20d ring shank nails through 2 of column laminates and truss heel.
3. Brace trusses per WTCA guidelines and BCSI Manual

F. Purlins: Install purlins with fasteners and at spacings per approved Shop Drawings.

G. Truss Ties: Install truss ties at locations recommended by structure manufacture and per approved Shop Drawings

1. Run truss ties from end wall to end wall.

H. Incidental Framing: Install 2 inch by 4 inch or 2 inch by 6 inch blocking as required per structure manufacturers recommendations.

3.04 METAL PANEL INSTALLATION, GENERAL

A. Install metal panels per manufacturer’s established construction procedures.
B. Install metal panels and components plumb, square, straight, and true to lines, and to assure freedom from rattles.
C. Take care when cutting prefinished materials to ensure cuttings do not remain on finished surface.
D. Properly install fasteners taking care to not under- or overdrive.

3.05 METAL PANEL INSTALLATION

A. Roofing Panels: Install panels perpendicular to supports aligned straight with end fascias and fasten to purlins. Anchor with fasteners at spacings recommended by manufacturer and design loads.

B. Wall Panels: Install metal panels perpendicular to wall girt and purlin supports, aligned level andplumb. Anchor with fasteners at spacings recommended by manufacturer and design loads.

C. Vented Ridges: Fasten vented ridges to structure as indicated on Drawings, maintainingmanufacturer's minimum clear throat opening.

D. Soffits: Install soffits to interlock with trim items at top of steel siding and at facias.

1. Solid or optional vented soffit shall be used at end overhang.
2. A combination of solid and perforated soffits shall be provided for balanced ventilation at sideoverhangs.

E. Trim Items: Install trim items at base, wainscot transitions, corners, top of steel siding, facia, gables,and ridges using no less than 1 inch screw fasteners.

1. Trim items shall be installed at the base, at any wainscot transition, corners, top of steelsiding, fascias, gables and ridge using appropriate 1" screw fasteners.

F. Closure Strips: Provide closure strips at top and bottom of roofing panels.

END OF SECTION

CONTRACTOR SBR UNDERCUT DELAY LETTER

CROSBY
CONSTRUCTION

February 11, 2025

Ms. Amy Mendoza
Commonwealth Engineers, Inc.
7256 Company Drive
Indianapolis, IN 46237

Re: Town of Bristol Wastewater Treatment Plant Improvement SBR Subgrade Remediation/Contract Period Adjustment

Dear Ms. Mendoza:

We wanted to formally address RFI # 9, and your letter dated January 15th, 2025, titled Winter Concrete Compensation and particularly the comments pertaining to "winter compensation period" total number of days (30). Below is a summary of the work undertaken and our formal request for an adjustment to the contract period and contract price.

Notification of the unsuitable soils associated with the SBR structure was submitted on October 9th, 2024, we received approval to proceed with the undercutting/stone placement and water conditioning October 29th, 2024. Our Subcontractor remobilized manpower/equipment and commenced the balance of undercutting/stone placement and compaction on November 4th, 2025, with final completion of the undercut on November 13th, 2024 (which included the undercutting of the three sump pits)

Number of days from our notice Oct 9th, 2024, to completion Nov 13th, 2024, 35 days

Furthermore, we acknowledge that we had a delayed start of the sludge removal due to IDEM permitting issues that were outside of our control. However, and as discussed, we were able to complete the demolition, earth retention and the excavation slightly ahead of our scheduled dates. Notwithstanding this, the undercutting/stone compaction and water conditioning delayed us from commencing the work on the SBR slab reinforcing steel. The scheduled start date was October 14th, 2024, the actual start date for the SBR reinforcement steel was November 14th, 2024. The late start of the slab reinforcing steel delayed our pour sequencing which in turn delayed the wall forming from the scheduled start date of November 25th, 2024, to the actual start date January 16th, 2025.

The number of days delayed November 25th, 2024, to January 16th, 2025, 52 days

Based on the aforementioned delays beyond the control of the Contractor we are requesting an equitable adjustment to the contract period of 52 calendar days. We also request an adjustment to the contract price to cover 30 days of General Conditions $30,000.00

Please let us know if you have any further questions or need additional information.

Sincerely,

CROSBY CONSTRUCTION, INC.

Russell Jacobs
Vice President

RFI-73 PRICING
PARTIAL GRAVEL MATERIAL CHANGE TO #53 LIMESTONE

Date: Description: RFI 73 Job #

Description	Qnty.	Change description	Crew	MH	UM	UPL	Labor	UCM	Materials	CC	Job Exp.	CC	subs	CC	Totals
		Crosby PM time	PM	2	HR	$ 225.00	$ 450.00								$450
		supervison	PS	8	HR	$ 125.00	$ 1,000.00								$1,000
							$ -								$0
		Additional testing					$ -						$1,200		$1,200
RFI 73		Option 2					$ -								$0
		Install 4" of #53 gravel in all areas and cap with an					$ -								$0
		additional 4" of #53 Limestone					$ -								$0
							$ -						$20,000		$20,000
							$ -								$0
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							$ -								$0
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Subtotal							$ 1,450.00		$ -		$ -		$21,200.00		$22,650.00
Subcontractor Bond												0	$0		$0
Tax - General Condition Items ONLY												7%	$0		$0
Project Insurance													$0		$0
Builders Risk												By Owner	$0		$0
Job Bond												1%	$226.50		$226.50
Architectural												0%	$0		$0
Sub Total							1450		0		0		$21,426.50		$22,876.50
Overhead & Profit											L&M Columns	15%	$217.50		$217.50
Overhead & Profit											Subcontractor Column	5.0%	$1,060.00		$1,060.00
Total Job							1450		0		0		$22,704.00		$24,154.00

RFI #73 Response

Material costs are very similar for both materials. The additional cost comes from trucking. The closest limestone source from Bristol is Fort Wayne. The round-trip travel from Fort Wayne is 4.25 (Load in quarry, drive, dump, drive back) hours. The current trucking rate is $165/hr. For an average load of 21 tons, that equates to $33.40/ton.

Option #1 roughly 950 Tons of Limestone = $31,730.00 (rounded to $32,000 in my quote)

Option #2 roughly 590 Tons of Limestone = $19,706.00 (rounded to 20,000 in my quote)

CONTRACTOR PART 2 DELAY NOTIFICATION LETTER

CROSBY
CONSTRUCTION

June 23, 2026

Amy Mendoza
Commonwealth Engineers, Inc.
7256 Company Drive
Indianapolis, IN 46237

Re: Town of Bristol
Phase II WWTP
Improvements Delay
notification

Dear Ms. Mendoza,

We are formally notifying the Engineer of Record that the General Contractor has experienced a project delay, through no fault of its own, which has impacted the commencement of Phase II of the above-referenced project.

On April 8, 2026, sanitary sewer flow from the existing Bristol Wastewater Treatment Plant was permanently diverted into the newly completed WWTP (Phase I). On April 22, 2026, Northern Indiana Public Service Company (NIPSCO) discontinued electrical service to the existing treatment facility, rendering the plant inoperable. In addition, NIPSCO had scheduled the capping and removal of the natural gas service line serving the existing WWTP office. However, this work was not completed until May 15, 2026.

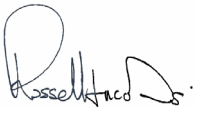
This delay in utility disconnection activities resulted in an approximate six-week delay in commencing structural demolition of the existing facilities.

Furthermore, this delay created a cascading impact on the project schedule, particularly affecting the availability and sequencing of the specialized hazardous waste removal contractor. As a result, Merrell Brothers, Inc., were only able to perform work on an intermittent and rescheduled basis due to coordination constraints. The final hazardous waste removal activities are now anticipated to be completed by June 24, 2026.

Based on the above circumstances, which are beyond the control of the Contractor, we respectfully request a contract period adjustment (63 calendar days). After accounting for twelve (12) calendar days allocated for hazardous waste removal activities, we request a net equitable adjustment of fifty-one (51) calendar days to the contract time.

We appreciate your review of this matter and request confirmation of the appropriate contract time adjustment.

Sincerely,
R. E. Crosby, Inc.



Russell L Jacobs
Vice President