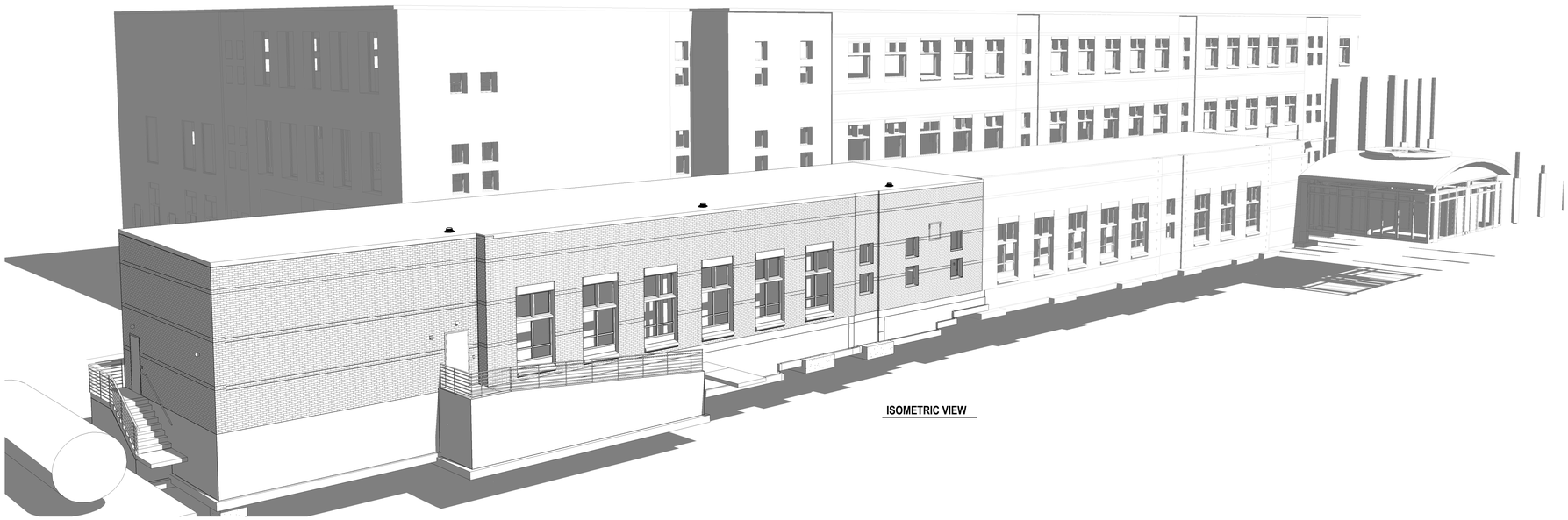
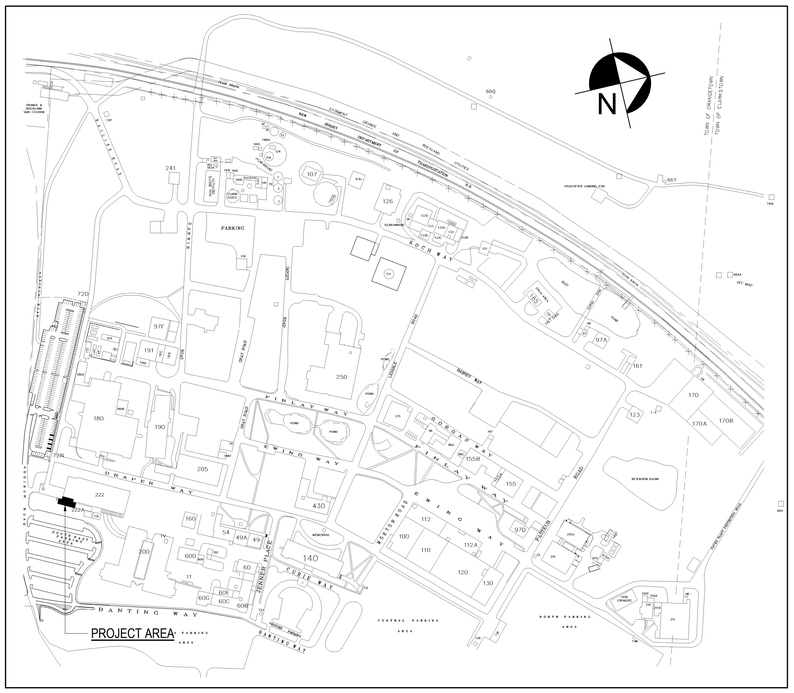
PEARL RIVER, NY
HAMILTON BiOS #2 ADDITION



ISOMETRIC VIEW



DRAWING LIST

NO.	DRAWING NAME	REV	DATE
GENERAL			
G-001	COVER SHEET/LOCATION MAP	0	2023.02.22
G-002	NEW YORK STATE BUILDING CODE COMPLIANCE ASSESSMENT	0	2023.02.22
CIVIL			
GI-001	GENERAL NOTES	0	2023.02.22
VT-01	TOPOGRAPHIC SURVEY BUILDING 222 EXISTING CONDITIONS PLAN	0	2023.02.22
CP-101	SITE PREPARATION AND SEDIMENT & EROSION CONTROL PLAN	0	2023.02.22
CS-101	SITE LAYOUT PLAN	0	2023.02.22
CU-101	SITE UTILITY PLAN	0	2023.02.22
CD-501	SITE DETAILS	0	2023.02.22
CD-502	SITE DETAILS	0	2023.02.22
CD-503	SITE DETAILS	0	2023.02.22
CD-504	SITE DETAILS	0	2023.02.22
CD-505	SITE DETAILS	0	2023.02.22
STRUCTURAL			
S-000	NOTES	0	2023.02.22
S-001	SPECIAL INSPECTION	0	2023.02.22
S-100	FOUNDATION PLAN	0	2023.02.22
S-200	ROOF FRAMING PLAN	0	2023.02.22
S-300	TYPICAL CONCRETE DETAILS	0	2023.02.22
S-301	TYPICAL CONCRETE DETAILS AND SECTIONS	0	2023.02.22
S-310	TYPICAL FRAMING DETAILS	0	2023.02.22
S-311	FRAMING SECTIONS	0	2023.02.22
ARCHITECTURE			
A-001	ARCHITECTURAL SYMBOLS AND ABBREVIATIONS	0	2023.02.22
A-002	PARTIAL FIRST FLOOR LIFE SAFETY PLAN	0	2023.02.22
A-003	MOUNTING HEIGHTS AND ACCESSIBILITY DRAWINGS	0	2023.02.22
AD-101	ARCHITECTURAL PARTIAL FIRST FLOOR DEMOLITION PLANS	0	2023.02.22
A-101	ARCHITECTURAL FIRST FLOOR PLAN KEY PLAN	0	2023.02.22
A-102	ARCHITECTRUAL PARTIAL ENLARGED PLANS	0	2023.02.22
A-103	ARCHITECTURAL PARTIAL ROOF PLAN	0	2023.02.22
A-104	ARCHITECTURAL PARTIAL GENERAL ARRANGEMENT PLAN	0	2023.02.22
A-200	ARCHITECTURAL ELEVATIONS AND SECTION	0	2023.02.22
A-300	ARCHITECTURAL WALL SECTIONS	0	2023.02.22
A-301	ARCHITECTURAL WALL SECTIONS	0	2023.02.22
A-600	PARTITION TYPES, SCHEDULES AND DETAILS	0	2023.02.22
A-601	DOOR TYPES, SCHEDULE AND DETAILS	0	2023.02.22

DRAWING LIST

NO.	DRAWING NAME	REV	DATE
MECHANICAL			
M000	MECHANICAL NOTES, SYMBOLS, AND ABBREVIATIONS	0	2023.02.22
M201	AHU-11 AND AHU-12 AIRFLOW DIAGRAMS	0	2023.02.22
M202	CHILLED WATER FLOW DIAGRAM	0	2023.02.22
M203	HEATING HOT WATER FLOW DIAGRAM	0	2023.02.22
M204	COMPRESSED AIR AND LIQUID NITROGREN FLOW DIAGRAM	0	2023.02.22
M500	MECHANICAL DETAILS	0	2023.02.22
M501	MECHANICAL DETAILS	0	2023.02.22
M600	MECHANICAL SCHEDULES	0	2023.02.22
MH100	MECHANICAL HVAC FIRST FLOOR INSTALLATION PLAN	0	2023.02.22
MP100	MECHANICAL PIPING FIRST FLOOR INSTALLATION PLAN	0	2023.02.22
PLUMBING			
P100A	PLUMBING FIRST FLOOR STORM AND SANITARY INSTALLATION PLAN	0	2023.02.22
P100B	PLUMBING FIRST FLOOR DOMESTIC AND PROCESS GAS PLAN	0	2023.02.22
P101	PLUMBING ROOF INSTALLATION PLAN	0	2023.02.22
P500	PLUMBING DETAILS, RISER DIAGRAMS, AND SCHEDULES	0	2023.02.22
FIRE PROTECTION			
FP-000	FIRE PROTECTION NOTES, SYMBOLS, AND ABBREVIATIONS	0	2023.02.22
FP-100	FIRST FLOOR FIRE PROTECTION ZONING PLAN	0	2023.02.22
FP-101	FIRST FLOOR FIRE PROTECTION INSTALLATION PLAN	0	2023.02.22
ELECTRICAL			
E001	ELECTRICAL LEAD SHEET	0	2023.02.22
E100	FIRST FLOOR CONDUIT ROUTING PLAN	0	2023.02.22
E101	PARTIAL FIRST FLOOR POWER PLAN	0	2023.02.22
E201	PARTIAL FIRST FLOOR LIGHTING PLAN	0	2023.02.22
E301	PARTIAL FIRST FLOOR SYSTEMS PLAN	0	2023.02.22
E601	ELECTRICAL ONE-LINE DIAGRAM	0	2023.02.22
E602	ELECTRICAL SCHEDULES	0	2023.02.22

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Notes

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	Issued/Revision	By	Appd	YYYY.MM.DD
File Name: N/A		KDE	RJW	WHD 2023.02.21
		Dwn.	Dsgn.	Chkd. YYYY.MM.DD

Permit/Seal

Client/Project Logo

Pfizer

Client/Project
Pfizer Global Research and Development

Hamilton BiOS #2 Addition

Pearl River, NY

Title
COVER SHEET/LOCATION MAP

Project No.	Scale
191501254	As indicated
Revision: 0	Drawing No.: G-001

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ORIGINAL SHEET - ARCH E1

CODE REFERENCES		
CODE REFERENCE	**YEAR**	**ABBREVIATION**
BUILDING CODE OF NEW YORK STATE	2020	BCNYS
EXISTING BUILDING CODE OF NEW YORK STATE	2020	EBCNYS
ENERGY CONSERVATION CONSTRUCTION CODE OF NEW YORK STATE	2020	ECCCNYS
FIRE CODE OF NEW YORK STATE	2020	FCNYS
MECHANICAL CODE OF NEW YORK STATE	2020	MCNYS
PLUMBING CODE OF NEW YORK STATE	2020	PCNYS
NATIONAL ELECTRICAL CODE / NFPA 70	2017	NEC
ICC / ANSI A117.1	2009	ANSI

BUILDING NAME	PFIZER BUILDING 222 HAMILTON BIO ADDITION		
ADDRESS	N. MIDDLETOWN ROAD		
CITY, STATE, ZIP	PEARL RIVER, NY	**SPRINKLERED**	FULLY SPRINKLERED (EXISTING)
COUNTY	ROCKLAND	**TYPE OF CONSTRUCTION**	IIA (EXISTING)
CLIMATE ZONE	5A	**USE & OCCUPANCY GROUP**	A-3 (ASSEMBLY) / B (BUSINESS)

THE EXISTING PFIZER BUILDING B222 AT THEIR PEARL RIVER, NEW YORK CAMPUS IS A FOUR STORY LABORTORY/OFFICE BUILDING WITH A ONE STORY VISITOR CENTER/SECURITY ADDITION AND A HAMILTON BIO ADDITION, TOTAL BUILDING FOOTPRINT IS 53,400 SQUARE FOOT OF MIXED USE, NON-SEPARATED OCCUPANCIES. EXISTING OCCUPANCIES ARE GROUP A-3 ASSEMBLY AND GROUP B BUSINESS .

THE ORIGINAL BUILDING 222 WAS INITIALLY CONSTRUCTED IN 1992 AND HAS UNDERGONE SEVERAL RENOVATIONS AND ADDITIONS, VISITOR/SECURITY ADDITION 2012 AND HAMILTON BIO ADDITION 2016 IT IS UNDERSTOOD THAT THE FACILITY IS IN COMPLIANCE WITH CODES THAT WHERE IN EFFECT AT THE TIME OF INITIAL CONSTRUCTION AND ALL RENOVATIONS AND ADDITIONS.

THIS ADDITION WILL ONLY EFFECT THE EXISTING AREAS AS IDENTIFIED ON G-002 AS THE "WORK AREA" PER EBCNYS AND ONLY THE NEW ADDITION IS SUBJECT TO THE CODES LISTED ABOVE.

EXISTING BUILDING CODE OF NEW YORK STATE 2020

CHAPTER 2 - DEFINITIONS

ADDITIONS: AN EXTENSION OR INCREASE IN FLOOR AREA, NUMBER OF STORIES OR HEIGHT OF A BUILDING OR STRUCTURE.

EXISTING BUILDING: A BUILDING THAT IS LEGALLY OCCUPIED AND FOR WHICH A CERTICATE OF OCCUPANCY AUTHORIZING ITS USE HAS BEEN ISSUED, WITHOUT REGARD TO THE DATE ON WHICH SUCH LEGAL OCCUPANCY BEGAN OR THE DATE ON WHICH SUCH CERTIFICATE OF OCCUPANCY WAS ISSUED.

WORK AREA: THAT PORTION OR PORTIONS OF A BUILDING CONSISTING OF ALL RECONFIGURED SPACES AS INDICATED ON THE CONSTRUCTION DOCUMENTS. WORK AREA EXCLUDES OTHER PORTIONS OF THE BUILDING WHERE INCIDENTAL WORK ENTAILED BY THE INTENDED WORK MUST BE PERFORMED AND PORTIONS OF THE BUILDING WHERE WORK NOT INITIALLY INTENDED BY THE OWNER IS SPECIFICALLY REQUIRED BY THIS CODE. WORK AREAS ARE INDICATED ON DRAWING G-002

PRIMARY FUNCTION: A PRIMARY FUNCTION IS A MAJOR ACTIVITY FOR WHICH THE FACILITY IS INTENDED. AREAS THAT CONTAIN A PRIMARY FUNCTION INCLUDE, BUT ARE NOT LIMITED TO, THE CUSTOMER SERVICES LOBBY OF A BANK, THE DINING AREA OF A CAFETERIA, THE MEETING ROOMS IN A CONFERENCE CENTER, AS WELL AS OFFICES AND OTHER WORK AREAS IN WHICH THE ACTIVITIES OF THE PUBLIC ACCOMMODATION OR OTHER PRIVATE ENTITY USING THE FACILITY ARE CARRIED OUT. MECHANICAL ROOMS, BOILER ROOMS, SUPPLY STORAGE ROOMS, EMPLOYEE LOUNGES OR LOCKER ROOMS, JANITORIAL CLOSETS, ENTRANCES, CORRIDORS AND RESTROOMS ARE NOT AREAS CONTAINING A PRIMARY FUNCTION.

ADDITION INDICATED ON G-002 IS ATTACHED TO THE EXISTING HAMILTON BIO BUILDING.

CHAPTER 3 - PROVISION FOR ALL COMPLIANCE METHODS

SECTION	DESCRIPTION
301.3.2	WORK AREA COMPLIANCE METHOD: ADDITIONS COMPLYING WITH THE APPLICABLE REQUIREMENTS OF CHAPTERS 6...
302.4	EXISTING MATERIALS: MATERIALS ALREADY IN USE IN A BUILDING IN COMPLIANCE WITH REQUIREMENTS OR APPROVALS IN EFFECT AT THE TIME OF THEIR ERECTION OR INSTALLATION SHALL BE PERMITTED TO REMAIN IN US...
304.5	NEW AND REPLACED MATERIALS: EXCEPT AS OTHERWISE REQUIRED OR PERMITTED BY THIS CODE, MATERIALS PERMITTED BY THE APPLICABLE CODE FOR NEW CONSTRUCTION SHALL BE USED. LIKE MATERIALS SHALL BE...
305	ACCESSIBILITY FOR EXISTING BUILDINGS
305.5	ADDITIONS: PROVISIONS FOR NEW CONSTRUCTION SHALL APPLY TO ADDITIONS. AN ADDITIONS THAT AFFECTS THE ACCESSABILITY TO, OR CONTAINS AN AREA OF, PRIMARY FUNCTION SHALL COMPLY WITH REQUIREMENTS IN SECTION 305.7.

CHAPTER 6 - CLASSIFICATION OF WORK

	CLASSIFICATION	DESCRIPTION
606	ADDITIONS	PROVISIONS FOR ADDITIONS SHALL APPLY WHERE WORK IS CLASSIFIED AS AN ADDITION AS DEFINED IN CHAPTER 2.
606.2	ADDITIONS TO EXISTING BUILDINGS SHALL COMPLY WITH THE PROVISIONS OF CHAPTER 11.	

CHAPTER 11 ADDITIONS

SECTION	DESCRIPTION
1101.3	OTHER WORK: ANY REPAIR OR ALTERATION WORK WITHIN AN EXISTING BUILDING TO WHICH AN ADDITION IS BEING MADE SHALL COMPLY WITH THE APPLICABLE REQUIREMENTS FOR THE WORK AS CLASSIFIED IN CHAPTER 6.
1102.2	AREA LIMITATIONS: AN ADDITION SHALL NOT INCREASE THE AREA OF AN EXISTING BUILDING BEYOND THAT PERMITTED UNDER THE APPLICABLE PROVISIONS OF CHAPTER 5 OF THE BUILDING CODE OF NEW YORK STATE FOR NEW BUILDINGS UNLESS FIRE SEPARATION AS REQUIRED BY THE BUILDING CODE OF NEW YORK STATE IS PROVIDED.
1107	ENERGY CONSERVATION
1107.1	MINIMUM REQUIREMENTS: ADDITIONS TO EXISTING BUILDINGS SHALL CONFORM TO THE ENERGY REQUIREMENTS OF THE ENERGY CONSERVATION CONSTRUCTION CODE OF NEW YORK STATE AS THEY RELATE TO NEW...

CHAPTER 8 - ALTERATIONS LEVEL 2

SECTION	DESCRIPTION	CODE REQUIREMENT	PROJECT COMPLIANCE
801	GENERAL		
801.2	IN ADDITION TO THE REQUIREMENTS OF THIS CHAPTER, ALL WORK SHALL COMPLY WITH THE REQUIREMENTS OF CHAPTER 7.		
801.3	COMPLIANCE: NEW CONSTRUCTION ELEMENTS, COMPONENTS, SYSTEMS AND SPACES SHALL COMPLY WITH THE REQUIREMENTS OF THE BCNYS. EXCEPT AS NOTED.		
801.3 EXCEPTION 4	MINIMUM CEILING HEIGHT IN NEWLY CREATED HABITABLE AND OCCUPIED SPACES AND CORRIDOR	7'-0" MIN	9'-0"
802	BUILDING ELEMENTS AND MATERIALS		
802.2.1	EXISTING INTERIOR VERTICAL OPENINGS CONNECTING TWO OR MORE FLOORS SHALL BE ENCLOSED WITH AN APPROVED ASSEMBLY HAVING A FIRE RESISTANCE...	NOT LESS THAN 1 HOUR	N/A
802.2.1 EXCEPTION 1	WHERE VERTICAL OPENING ENCLOSURE IS NOT REQUIRED BY THE BCNYS.		
802.2.1 EXCEPTION 2	INTERIOR VERTICAL OPENINGS OTHE THAN STAIRWAYS MAY BE BLOCKED AT THE FLOOR AND CEILING OF THE WORK AREA BY INSTALLTION OF NOT LESS THAN 2 INCHES OF SOLID WOOD OR EQUIVALENT CONSTRUCTION.		N/A
807	ELECTRICAL		
807.1	NEWLY INSTALLED ELECTRICAL EQUIPMENT AND WIRING	COMPLY WITH NFPA 70	COMPLIES
808	MECHANICAL		
808.1	RECONFIGURED OR CONVERTED SPACES	PROVIDE NATURAL OR MECHANICAL VENTILATION PER MCNYS	PROVIDED
808.2	ALTERED EXISTING SYSTEMS	>5 CFM PER PERSON OF OUTDOOR AIR / >15 CFM OF VENTILATION PER PERSON	PROVIDED
809	PLUMBING		
809.1	MINIMUM FIXTURES (OCCUPANT LOAD OF STORY INCREASED BY MORE THAN 20%)	NOT REQUIRED	NOT REQUIRED
810	ENERGY CONSERVATION		
810.1	MINIMUM REQUIREMENTS. ONLY ALTERATIONS WORK AREA TO COMPLY WITN ENERGY REQUIREMENTS OF...	REFER TO ECCCNYS	PROVIDED
REFER TO MECHANICAL, AND ELECTRICAL DRAWINGS FOR INFORMATION ON NEW SYSTEMS.			

BUILDING CODE OF NEW YORK STATE 2020

PER EBCNYS 801.3; NEW CONSTRUCTION ELEMENTS, COMPONENTS, SYSTEMS, AND SPACES SHALL COMPLY WITH REQUIREMENTS OF BUILDING CODE OF NEW YORK STATE.

CHAPTER 3 - USE AND OCCUPANCY CLASSIFICATION

OCCUPANCY CLASSIFICATION	A-3 (ASSEMBLY) / B (BUSINESS)	EXISTING, UNCHANGED

CHAPTER 5 - GENERAL BUILDING HEIGHTS AND AREAS

	OCCUPANCY CLASSIFICATION	SEE FOOTNOTES	TYPE OF CONSTRUCTION	REMARKS
BUILDING HEIGHT IN FEET			IIA (EXISTING)	
	A-3 (ASSEMBLY) / B (BUSINESS)	S	85 FEET	EXISTING, UNCHANGED
	OCCUPANCY CLASSIFICATION	**SEE FOOTNOTES**	**TYPE OF CONSTRUCTION**	**REMARKS**
NUMBER OF STORIES			IIA (EXISTING)	
	A-3 (ASSEMBLY) / B (BUSINESS)	S	A-3 (4), B (4)	EXISTING, UNCHANGED
	OCCUPANCY CLASSIFICATION	**SEE FOOTNOTES**	**TYPE OF CONSTRUCTION**	**REMARKS**
AREA FACTOR IN SQUARE FEET			IIA (EXISTING)	
	A-3 (ASSEMBLY) / B (BUSINESS)	SM	112,500 SF ALLOWABLE	56,952 SF ACTUAL

CHAPTER 6 - CONSTRUCTION TYPES

	BUILDING ELEMENT	TYPE OF CONSTRUCTION	
		IIA (EXISTING)	
		REQUIRED	PROVIDED
TABLE 601 FIRE RESISTANCE RATING REQUIREMENT FOR BUILDING ELEMENTS	PRIMARY STRUCTURAL FRAME	1	1
	NON-BEARING WALLS AND PARTITIONS: EXTERIOR	SEE BELOW	
	NON-BEARING WALLS AND PARTITIONS: INTERIOR	0	0
	FLOOR CONSTRUCTION AND ASSOCIATED SECONDARY MEMBERS	1	N/A
	ROOF CONSTRUCTION AND ASSOCIATED SECONDARY MEMBERS	1	1

CHAPTER 8 - INTERIOR FINISHES (REFERENCED FROM EBCNYS SECTION 702)

TABLE 803.13 INTERIOR WALL AND CEILING FINISH REQUIREMENTS BY OCCUPANCY	GROUP	INTERIOR EXIT STAIRWAYS AND RAMPS AND EXIT PASSAGEWAYS (SPRINKLERED)	CORRIDORS AND ENCLOSURE FOR EXIT ACCESS STAIRWAYS AND RAMPS (SPRINKLERED)	ROOMS AND ENCLOSED SPACES (SPRINKLERED)
REQUIRED	A-3 (ASSEMBLY)	B	B	C
PROVIDED	B (BUSINESS)	B	C	A

SECTION 804.4.2	INTERIOR FLOOR FINISH	REQUIRED	PROVIDED
		CLASS II	CLASS II

CHAPTER 9 - FIRE PROTECTION SYSTEMS (REFFERENCE FROM EBCNYS SECTION 703 / 804)

SECTION	FIRE PROTECTION SYSTEMS	CODE	EXISTING
BCNYS 903	AUTOMATIC SPRINKLER SYSTEM	REQUIRED	PROVIDED
BCNYS 904	ALT. FIRE-EXTINGUISHER SYSTEMS	NOT REQUIRED	N/A
BCNYS 905	STANDPIPE SYSTEM	NOT REQUIRED	N/A
BCNYS 906	PORTABLE FIRE EXTINGUISHERS	REQUIRED	PROVIDED (75' TRAVEL)
BCNYS 907	FIRE ALARM SYSTEM	REQUIRED	PROVIDED

CHAPTER 10 - MEANS OF EGRESS (REFERENCED FROM EBCNYS SECTION 704 / 805)

SECTION	MEANS OF EGRESS	FACTOR	AREA (SF)	OCCS.
TABLE 1004.5 MAXIMUM FLOOR AREA ALLOWANCES PER OCCUPANT	BUSINESS AREAS	150 GROSS NON CONCENTRATED AREAS	3,887	26
				0
			TOTAL:	26

SECTION		CODE	PROJECT
BCNYS 1005.3.1	STAIRWAYS	0.3	N/A
BCNYS 1005.3.2	OTHER EGRESS COMPONENTS	0.2 (3.8")	36" MIN
BCNYS T 1006.2.1	SPACES WITH ONE EXIT	MAX. OCCUP	MAX COMMON PATH OF TRAVEL
		29	SEE PLAN
BCNYS T 1006.3.1	MINIMUM NUMBER OF EXITS	2	2
BCNYS 1008	MEANS OF EGRESS ILLUMINATION	REQUIRED	PROVIDED IN ADDITION
BCNYS 1009.1	ACCESSIBLE MEANS OF EGRESS	REQUIRED	PROVIDED IN ADDITION
BCNYS 1010.1.10	PANIC AND FIRE EXIT HARDWARE	REQUIRED	PROVIDED IN ADDITION
BCNYS 1013	EXIT SIGNS	REQUIRED	PROVIDED IN ADDITION
BCNYS 1017.2	EXIT ACCESS TRAVEL DISTANCE	300' MAX	SEE PLAN
BCNYS T 1020.1	CORRIDOR FIRE-RESISTANCE RATING	NOT REQUIRED	N/A
BCNYS T 1020.2	MINIMUM CORRIDOR WIDTH	44"	N/A
BCNYS T 1020.4	DEAD END CORRIDOR	50' MAX	<50', SEE PLAN
BCNYS 1029	ASSEMBLY	N/A	N/A
BCNYS 1029.8	COMMON PATH OF EGRESS TRAVEL	100' MAX	<100', SEE PLAN

CHAPTER 11 - ACCESSIBILITY (REFERENCED FROM SECTION 705 / 806)

SECTION		CODE	PROJECT
BCNYS 1008	MEANS OF EGRESS ILLUMINATION	REQUIRED	PROVIDED IN ADDITION
BCNYS 1013	EXIT SIGNS	REQUIRED	PROVIDED IN ADDITION
BCNYS 1104.1	SITE ARRIVAL POINT	N/A	N/A
BCNYS 1104.3.1	EMPLOYEE WORK AREA	REQUIRED	PROVIDED IN ADDITION
BCNYS 1105.1	PUBLIC ENTRANCE	N/A	N/A
BCNYS 1109.2	TOILET AND BATHING FACILITIES	EXISTING	EXISTING
BCNYS 1109.5	DRINKING FOUNTAINS	EXISTING	EXISTING
BCNYS 1111	SIGNAGE	REQUIRED	PROVIDED IN ADDITION

CHAPTER 12 - INTERIOR ENVIRONMENT

SECTION		PROJECT
BCNYS 1202	PROVIDE NATURAL VENTILATION OR MECHANICAL VENTILATION	REFER TO MECHANICAL DRAWINGS
BCNYS 1203	ACTIVE OR PASSIVE SPACE HEATING SYSTEMS MAINTAINING INDOOR TEMPERATURE OF NOT LESS THAN 68 DEGREES	REFER TO MECHANICAL DRAWINGS
BCNYS 1204	NATURAL LIGHT MINIMUM NET GLAZED AREA SHALL BE NOT LESS THAN 8% OF FLOOR AREA OF THE ROOM SERVED	REFER TO ELECTRICAL DRAWINGS
BCNYS 1207.1	MINIMUM ROOM WIDTH	7'-0" MIN.	>7'-0", SEE PLAN
BCNYS 1207.2	MINIMUM CEILING HEIGHTS (HABITABLE SPACES AND CORRIDORS)	7'-6" MIN.	>7'-6", SEE PLAN

CHAPTER 15 - ROOF ASSEMBLIES AND ROOFTOP STRUCTURES

SECTION		CODE	PROJECT
BCNYS 1505	FIRE CLASSIFICATION - ROOF ASSEMBLY	CLASS B	PROVIDED
BCNYS 1507	ROOF COVERINGS	SINGLE-PLY ROOFING	PROVIDED

CHAPTER 16 - STRUCTURAL DESIGN

SECTION		CODE	PROJECT
BCNYS 1603	CONSTRUCTION DOCUMENTS	REQUIRED	REFER TO LOAD SUMMARY ON STRUCTURAL DRAWINGS

CHAPTER 27 - ELECTRICAL

SECTION		CODE	PROJECT
BCNYS 2702	EMERGENCY AND STANDBY POWER	N/A	EXISTING BUILDING HAS EMERGENCY GENERATOR
BCNYS 2702.2.6	EXIT SIGNS	REQUIRED	PROVIDED IN ADDITION
BCNYS 2702.2.13	MEANS OF EGRESS ILLUMINATION	REQUIRED	CONNECTED INTO EXISTING
REFER TO ELECTRICAL DRAWINGS FOR ADDITIONAL INFORMATION.			

MECHANICAL CODE OF NEW YORK STATE 2020

SECTION		CODE	PROJECT
BCNYS 2801.1	MECHANICAL SYSTEMS	REQUIRED	PROVIDED
BCNYS 717 AND 717.5	DUCTS AND AIR TRANSFER OPENINGS	REQUIRED	PROVIDED
MCNYS	FAN SHUTDOWN	N/A	NO FAN > 2,000 CFM
REFER TO MECHANICAL DRAWINGS FOR ADDITIONAL INFORMATION.			

ENERGY CONSERVATION CONSTRUCTION CODE OF NEW YORK STATE 2020

708.1 / 811.1 MINIMUM REQUIREMENTS...ADDITIONS TO EXIST-ING BUILDINGS OR STRUCTURES ARE PERMITTED WITHOUT REQUIRING THE ENTIRE BUILDING OR STRUCTURE TO COMPLY WITH THE ENERGY REQUIREMENTS OF THE INTERNATIONAL ENERGY CONSERVATION CODE OR INTERNATIONAL RESIDENTIAL CODE. THE ADDITION SHALL CONFORM TO THE ENERGY REQUIREMENTS OF THE INTERNATIONAL ENERGY CONSERVATION CODE OR INTERNATIONAL RESIDENTIAL CODE AS THEY RELATE TO NEW CONSTRUCTION ONLY.

CHAPTER 4 - COMMERCIAL ENERGY EFFICIENCY

	COMMERCIAL BUILDING COMPLIANCE		PRESCRIPTIVE	
	CLIMATE ZONE	5A	REQUIRED	PROVIDED
TABLE C402.1.3 OPAQUE THERMAL ENVELOPE INSULATION COMPONENT MINIMUM REQUIREMENTS, R-VALUE METHOD	ROOFS			
	INSULATION ENTIRELY ABOVE ROOF DECK		R-30ci	R-31.43 PROVIDED
	WALLS, ABOVE GRADE			
	METAL FRAMED		R-13 + R-7.5 ci	R-22.89 / R-13 ci
	SLAB-ON-GRADE FLOORS			
	UNHEATED SLABS		R-10 FOR 24" BELOW	R-10 FOR 24" BELOW
	OPAQUE DOORS			
	NONSWINGING		R-4.75	MIN. R-4.75 PROVIDED
TABLE C402.1.4 U-FACTOR METHOD	GARAGE DOORS <14% GALZING		U-0.31	
	SWINGING		U-0.37	
C-402.4 FENESTRATION AND TABLE 402.4	VERTICAL FENESTRATION			
	U-FACTORS			
	FIXED FENESTRATION		U-.038	
	OPERABLE FENESTRATION		U-0.45	
	ENTRANCE DOORS		U-0.77	
	SHGC			
	PF < 0.2		U-0.38	
C-402.5 AIR LEAKAGE - THERMAL ENVELOPE	LEAKAGE RATE		LESS THAN 0.40 cfm/sf	
	AIR BARRIERS		REQUIRED	PROVIDED
C-402.5.2 AND TABLE C402.5.2 AIR LEAKAGE OF FENESTRATION	FENESTRATION ASSEMBLY		MAXIMUM RATE (cfm/sf)	
	WINDOWS		0.20	
	SWINGING DOORS		0.20	
	GARAGE DOORS		0.40	
	ROLLING DOORS		1.00	

EBCNYS CHAPTER 15 / BCNYS CHAPTER 33 - SAFEGUARDS DURING CONSTRUCTION

THE EQUIPMENT REMOVAL AND PATCHING WILL BE COMPLETED IN ONE PHASE. THE EXISTING EGRESS PATHS IN ADJACENT OCCUPIED SPACES AND CONSTRUCTION EGRESS PATHS SHALL BE MAINTAINED CLEAR FOR EMERGENCY EGRESS AT ALL TIMES.

REQUIRED EXITS, MEANS OF EGRESS COMPONENTS, STRUCTURAL ELEMENTS, FIRE PROTECTION DEVICES AND SANITARY SAFE GUARDS SHALL BE MAINTAINED AT ALL TIMES DURING CONSTRUCTION. TEMPORARY EXIT REFER TO G-102-H

CONSTRUCTION WORK MUST BE FINISHED AND THE ADJACENT WORK AREAS MUST BE USABLE AT THE START OF THE NEXT BUSINESS DAY. INTERRUPTIONS IN DAILY OPERATIONS MUST BE COORDINATED IN ADVANCED WITH THE DIRECTOR'S REPRESENTATIVE. THIS SHALL INCLUDE THE SERVICE INTERRUPTIONS AND CONNECTIONS, RELOCATIONS, RELOCATIONS OF OCCUPANTS, REMOVAL OF EQUIPMENT, SHIFTS IN LOCATION OF WORK, MECHANICAL AND ELECTRICAL DISRUPTIONS, ETC. ALL OF THE ABOVE INTERRUPTIONS REQUIRE A MINIMUM OF THREE FULL WORKING DAYS NOTICE TO THE DIRECTOR'S REPRESENTATIVE. FRIDAY PM NOTICE FOR MONDAY AM INTERRUPTION.

COORDINATE PROPOSED METHODS AND OPERATIONS OF DEMOLITION AND INSTALLATION WITH DIRECTOR'S REPRESENTATIVE PRIOR TO START OF CONSTRUCTION WORK. INCLUDE SCHEDULE COORDINATION FOR SHUT-OFF, CAPPING AND CONTINUATION OF WORK.

REQUIRED EXITS, MEANS OF EGRESS COMPONENTS, STRUCTURAL ELEMENTS, FIRE PROTECTION DEVICES AND SANITARY SAFE GUARDS SHALL BE MAINTAINED AT ALL TIMES DURING CONSTRUCTION.

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Notes

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Permit/Seal

REGISTERED ARCHITECT WILLIAM H. DUNN 015857 STATE OF NEW YORK
02/22/2023

Client/Project Logo

Pfizer

Client/Project
Pfizer Global Research and Development

Hamilton BiOS #2 Addition

Pearl River, NY

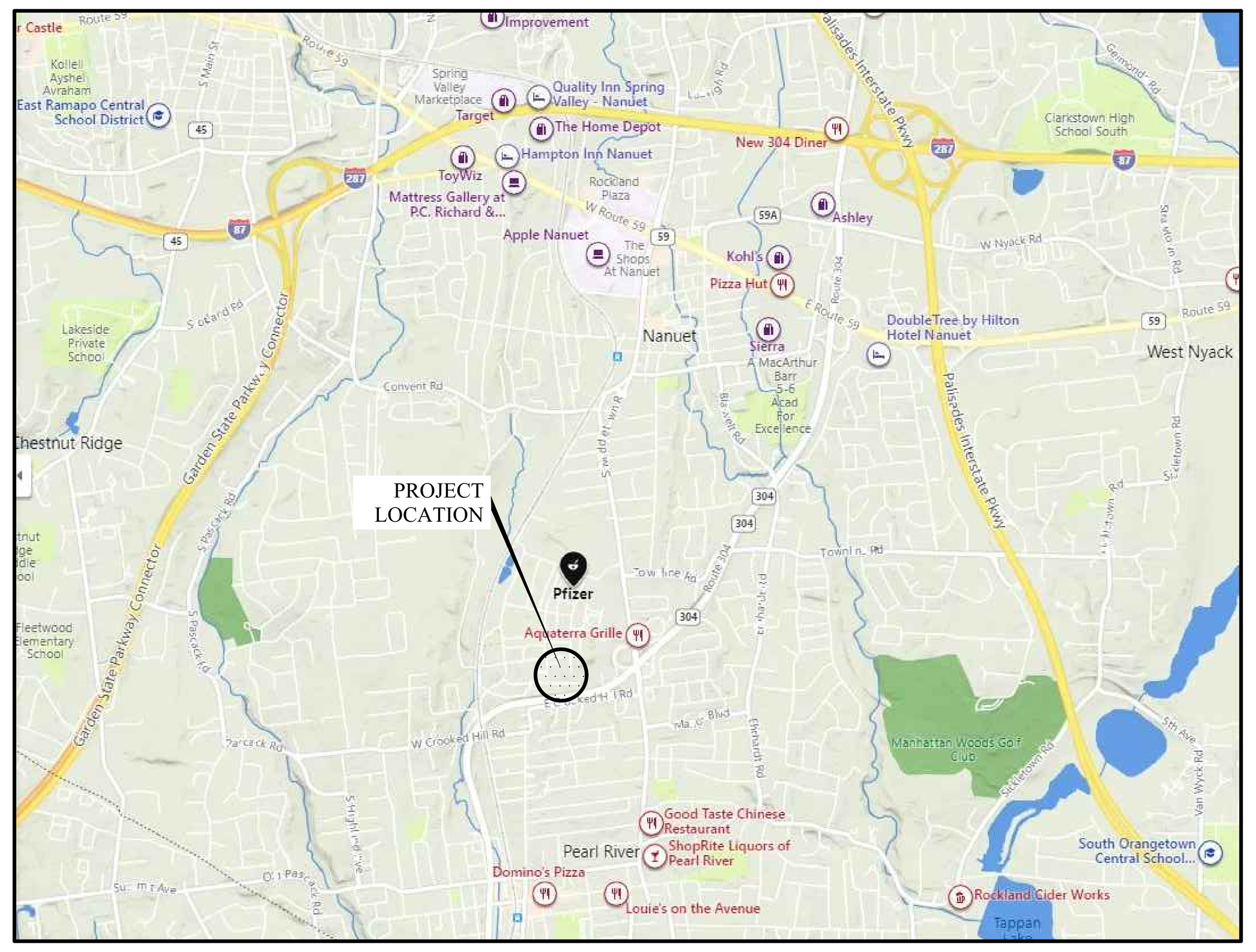
Title
NEW YORK STATE BUILDING CODE COMPLIANCE ASSESSMENT

Project No. 191501254 — Scale

Revision 0 — Drawing No. **G-002**

2/22/2023 4:33:33 PM

ORIGINAL SHEET - ARCH E1



KEY MAP - N.T.S.

LEGEND

——— – – ———	PROPERTY LINE
—— —— ——	EASEMENT LINE
═══	CURB
– – – – – –	EXISTING CONTOUR
—— —— 00 —— ——	INDEX CONTOUR
——o——o——	METAL FENCE
= = = = = =	STORM DRAINAGE PIPE
══ ══ ══	SANITARY SEWER PIPE
—— W ——	WATER MAIN
—— G ——	UNDERGROUND GAS
—— E ——	UNDERGROUND ELECTRIC

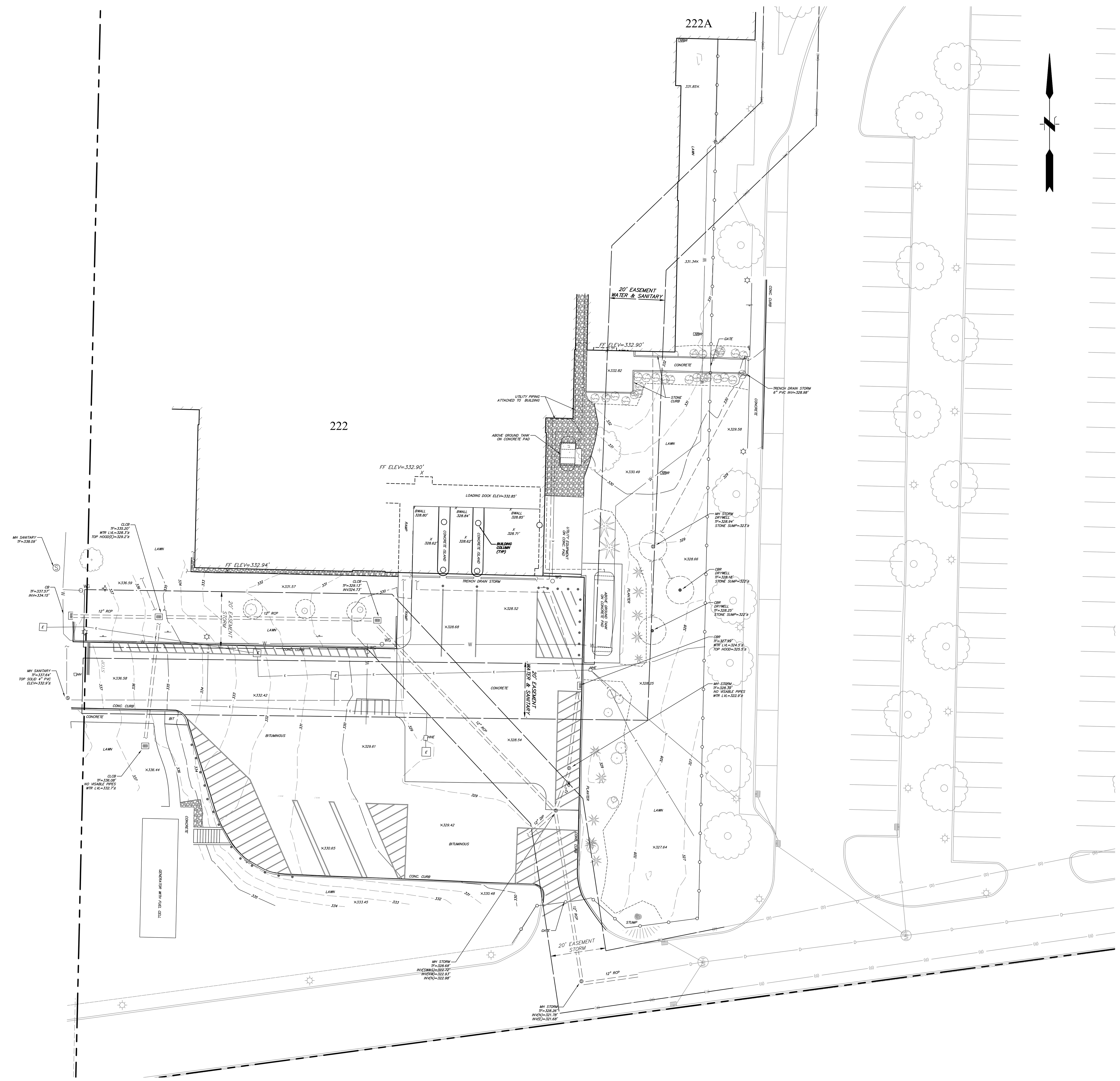
Symbol	Description	Symbol	Description
Ⓢ	SANITARY MANHOLE	o WG	WATER VALVE
Ⓓ	STORM MANHOLE		FIRE HYDRANT
Ⓔ	ELECTRIC MANHOLE		UTILITY POLE
Ⓣ	TELEPHONE MANHOLE	^	GUY WIRE
⊕	CATCH BASIN ROUND	⊗	BOLLARD
	CATCH BASIN		SIGN
	FLAT TOP CATCHBASIN	o GG	GAS GATE
	DOUBLE CATCHBASIN	Ⓦ	WELL
	FLARED END		BUSH
	FLOOD LIGHT		DECIDUOUS TREE
☼	LIGHT		PINE TREE

MAP REFERENCES:

1. "SURVEY OF PROPERTY PREPARED FOR PFIZER GLOBAL RESEARCH AND DEVELOPMENT TOWN OF ORANGETOWN, COUNTY OF ROCKLAND, STATE OF NEW YORK SCALE 1"=30' SURVEY DATE: 2016-04-29 BY EDWARD T. GANNON, P.L.S. CHERRY HILL ROAD ~ BLOOMING GROVE, NY 10914"
2. "PFIZER GLOBAL RESEARCH AND DEVELOPMENT PEARL RIVER BUILDING 223 HAMILTON BIOS PROJECT SITE/UTILITY PLAN SCALE: 1"=20' DATE: 02.21.16 BY STANTEC CONSULTING SERVICES INC."
3. "PFIZER GLOBAL RESEARCH AND DEVELOPMENT PEARL RIVER BUILDING 223 HAMILTON BIOS PROJECT EXISTING SANITARY SEWER SCALE: NONE DATE: 04.14.16 BY STANTEC CONSULTING SERVICES INC."

UNDERGROUND UTILITY NOTE

THE UNDERGROUND UTILITIES DEPICTED HEREON ARE BASED ON FIELD LOCATION OF VISIBLE FEATURES, MAPS AND PLANS OF RECORD, UTILITY MAPPING OR OTHER SOURCES OF INFORMATION. THE ENGINEER MAKES NO GUARANTEE THAT THE UNDERGROUND UTILITIES SHOWN COMPRISE ALL SUCH UTILITIES IN THE AREA, EITHER IN SERVICE OR ABANDONED. THE ENGINEER FURTHER DOES NOT WARRANT THAT THE UNDERGROUND UTILITIES SHOWN ARE IN THE EXACT LOCATION INDICATED ALTHOUGH HE DOES DECLARE THAT THEY ARE DEPICTED AS ACCURATELY AS POSSIBLE FROM INFORMATION AVAILABLE. THE ENGINEER HAS NOT PHYSICALLY LOCATED THE UNDERGROUND UTILITIES.



No.	DATE	DESCRIPTION	DESIGNER	REVIEWER

SEAL

SEAL

SCALE:
HORZ.: 1"=20'
VERT.:
DATUM:
HORZ.: NAD 83
VERT.: NAVD 88
20 10 0 20
GRAPHIC SCALE

FUSS & O'NEILL
146 HARTFORD ROAD
MANCHESTER, CONNECTICUT 06040
860.646.2469
www.fando.com

PFIZER GLOBAL RESEARCH AND DEVELOPMENT

TOPOGRAPHIC SURVEY

BUILDING 222 EXISTING CONDITIONS PLAN

PEARL RIVER NEW YORK

PROJ. No.: 20111246.S4N
DATE: 02/10/2023

VT-01

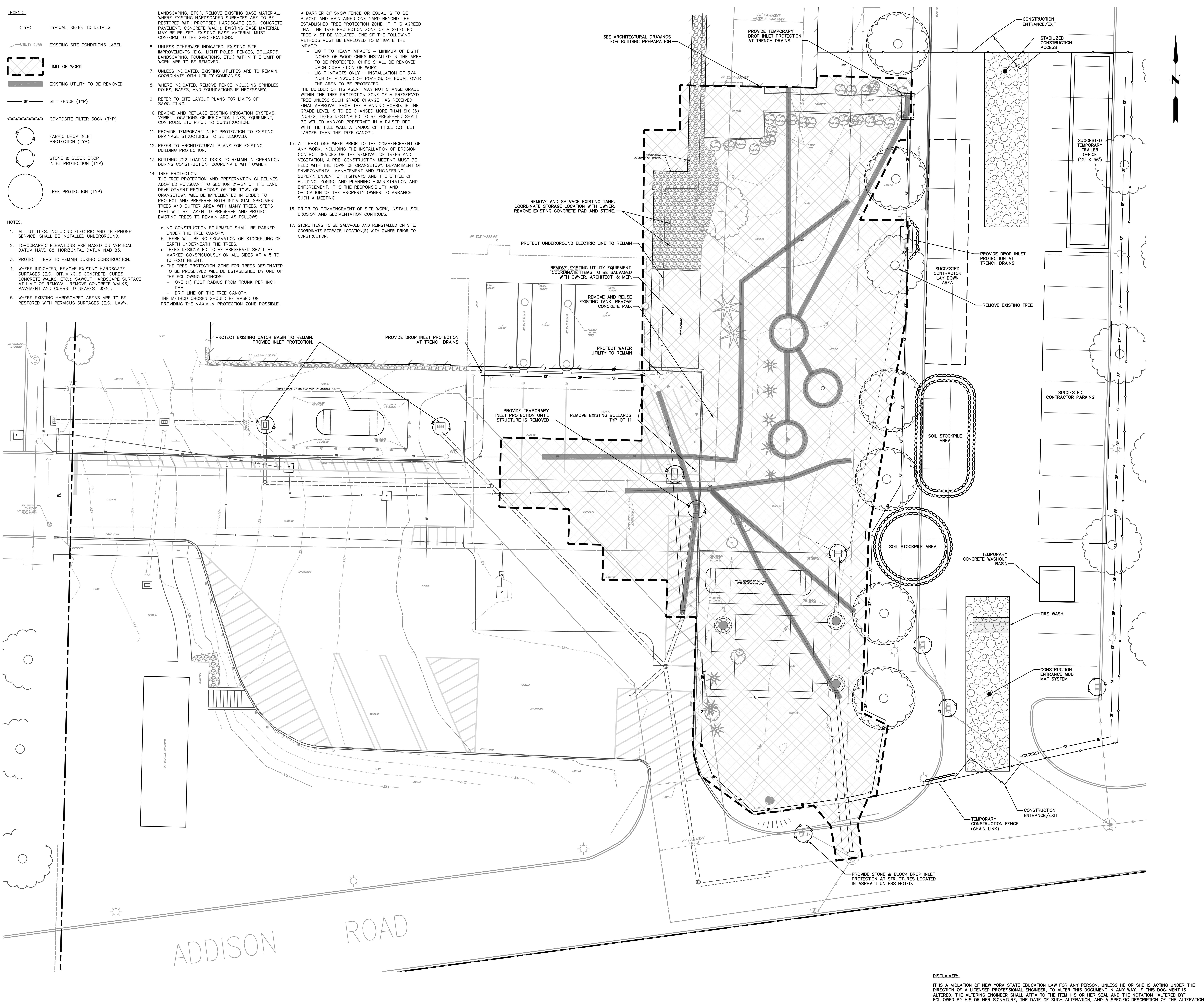
File: H:\DWG\P2011\1246\S4N\Survey\Plan\20111246S4N_SRV01.dwg Layout: VT-01_20 SCALE Plotted: 2023-02-09 4:51 PM Saved: 2023-02-09 11:25 AM User: ACarson
PC3: AUTOCAD PDF (GENERAL DOCUMENTATION).PC3 STB/CTB: FO.STB
LAYER STATE:
MS VIEW:

LEGEND:

(TYP)	TYPICAL, REFER TO DETAILS
UTILITY CURB	EXISTING SITE CONDITIONS LABEL
	LIMIT OF WORK
	EXISTING UTILITY TO BE REMOVED
SF	SILT FENCE (TYP)
	COMPOSITE FILTER SOCK (TYP)
	FABRIC DROP INLET PROTECTION (TYP)
	STONE & BLOCK DROP INLET PROTECTION (TYP)
	TREE PROTECTION (TYP)

NOTES:

1. ALL UTILITIES, INCLUDING ELECTRIC AND TELEPHONE SERVICE, SHALL BE INSTALLED UNDERGROUND.
2. TOPOGRAPHIC ELEVATIONS ARE BASED ON VERTICAL DATUM NAVD 88, HORIZONTAL DATUM NAD 83.
3. PROTECT ITEMS TO REMAIN DURING CONSTRUCTION.
4. WHERE INDICATED, REMOVE EXISTING HARDSCAPE SURFACES (E.G., BITUMINOUS CONCRETE, CURBS, CONCRETE WALKS, ETC.). SAWCUT HARDSCAPE SURFACE AT LIMIT OF REMOVAL. REMOVE CONCRETE WALKS, PAVEMENT AND CURBS TO NEAREST JOINT.
5. WHERE EXISTING HARDSCAPED AREAS ARE TO BE RESTORED WITH PERVIOUS SURFACES (E.G., LAWN, LANDSCAPING, ETC.), REMOVE EXISTING BASE MATERIAL. WHERE EXISTING HARDSCAPED SURFACES ARE TO BE RESTORED WITH PROPOSED HARDSCAPE (E.G., CONCRETE PAVEMENT, CONCRETE WALK), EXISTING BASE MATERIAL MAY BE REUSED. EXISTING BASE MATERIAL MUST CONFORM TO THE SPECIFICATIONS.
6. UNLESS OTHERWISE INDICATED, EXISTING SITE IMPROVEMENTS (E.G., LIGHT POLES, FENCES, BOLLARDS, LANDSCAPING, FOUNDATIONS, ETC.) WITHIN THE LIMIT OF WORK ARE TO BE REMOVED.
7. UNLESS INDICATED, EXISTING UTILITIES ARE TO REMAIN. COORDINATE WITH UTILITY COMPANIES.
8. WHERE INDICATED, REMOVE FENCE INCLUDING SPINDLES, POLES, BASES, AND FOUNDATIONS IF NECESSARY.
9. REFER TO SITE LAYOUT PLANS FOR LIMITS OF SAWCUTTING.
10. REMOVE AND REPLACE EXISTING IRRIGATION SYSTEMS. VERIFY LOCATIONS OF IRRIGATION LINES, EQUIPMENT, CONTROLS, ETC PRIOR TO CONSTRUCTION.
11. PROVIDE TEMPORARY INLET PROTECTION TO EXISTING DRAINAGE STRUCTURES TO BE REMOVED.
12. REFER TO ARCHITECTURAL PLANS FOR EXISTING BUILDING PROTECTION.
13. BUILDING 222 LOADING DOCK TO REMAIN IN OPERATION DURING CONSTRUCTION. COORDINATE WITH OWNER.
14. TREE PROTECTION:
    THE TREE PROTECTION AND PRESERVATION GUIDELINES ADOPTED PURSUANT TO SECTION 21–24 OF THE LAND DEVELOPMENT REGULATIONS OF THE TOWN OF ORANGETOWN WILL BE IMPLEMENTED IN ORDER TO PROTECT AND PRESERVE BOTH INDIVIDUAL SPECIMEN TREES AND BUFFER AREA WITH MANY TREES. STEPS THAT WILL BE TAKEN TO PRESERVE AND PROTECT EXISTING TREES TO REMAIN ARE AS FOLLOWS:
    a. NO CONSTRUCTION EQUIPMENT SHALL BE PARKED UNDER THE TREE CANOPY.
    b. THERE WILL BE NO EXCAVATION OR STOCKPILING OF EARTH UNDERNEATH THE TREES.
    c. TREES DESIGNATED TO BE PRESERVED SHALL BE MARKED CONSPICUOUSLY ON ALL SIDES AT A 5 TO 10 FOOT HEIGHT.
    d. THE TREE PROTECTION ZONE FOR TREES DESIGNATED TO BE PRESERVED WILL BE ESTABLISHED BY ONE OF THE FOLLOWING METHODS:
       – ONE (1) FOOT RADIUS FROM TRUNK PER INCH DBH
       – DRIP LINE OF THE TREE CANOPY.
    THE METHOD CHOSEN SHOULD BE BASED ON PROVIDING THE MAXIMUM PROTECTION ZONE POSSIBLE.
    A BARRIER OF SNOW FENCE OR EQUAL IS TO BE PLACED AND MAINTAINED ONE YARD BEYOND THE ESTABLISHED TREE PROTECTION ZONE. IF IT IS AGREED THAT THE TREE PROTECTION ZONE OF A SELECTED TREE MUST BE VIOLATED, ONE OF THE FOLLOWING METHODS MUST BE EMPLOYED TO MITIGATE THE IMPACT:
       – LIGHT TO HEAVY IMPACTS – MINIMUM OF EIGHT INCHES OF WOOD CHIPS INSTALLED IN THE AREA TO BE PROTECTED. CHIPS SHALL BE REMOVED UPON COMPLETION OF WORK.
       – LIGHT IMPACTS ONLY – INSTALLATION OF 3/4 INCH OF PLYWOOD OR BOARDS, OR EQUAL OVER THE AREA TO BE PROTECTED.
    THE BUILDER OR ITS AGENT MAY NOT CHANGE GRADE WITHIN THE TREE PROTECTION ZONE OF A PRESERVED TREE UNLESS SUCH GRADE CHANGE HAS RECEIVED FINAL APPROVAL FROM THE PLANNING BOARD. IF THE GRADE LEVEL IS TO BE CHANGED MORE THAN SIX (6) INCHES, TREES DESIGNATED TO BE PRESERVED SHALL BE WELLED AND/OR PRESERVED IN A RAISED BED, WITH THE TREE WALL A RADIUS OF THREE (3) FEET LARGER THAN THE TREE CANOPY.
15. AT LEAST ONE WEEK PRIOR TO THE COMMENCEMENT OF ANY WORK, INCLUDING THE INSTALLATION OF EROSION CONTROL DEVICES OR THE REMOVAL OF TREES AND VEGETATION, A PRE–CONSTRUCTION MEETING MUST BE HELD WITH THE TOWN OF ORANGETOWN DEPARTMENT OF ENVIRONMENTAL MANAGEMENT AND ENGINEERING, SUPERINTENDENT OF HIGHWAYS AND THE OFFICE OF BUILDING, ZONING AND PLANNING ADMINISTRATION AND ENFORCEMENT. IT IS THE RESPONSIBILITY AND OBLIGATION OF THE PROPERTY OWNER TO ARRANGE SUCH A MEETING.
16. PRIOR TO COMMENCEMENT OF SITE WORK, INSTALL SOIL EROSION AND SEDIMENTATION CONTROLS.
17. STORE ITEMS TO BE SALVAGED AND REINSTALLED ON SITE. COORDINATE STORAGE LOCATION(S) WITH OWNER PRIOR TO CONSTRUCTION.



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Stantec

Consultant

FUSS & O'NEILL

Notes

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	TD	LM	TG	02/17/23

Permit/Seal

Client/Project Logo

Client/Project
Pfizer Global Research and Development

Hamilton BiOS #2 Addition

Pearl River, NY

Title
SITE PREPARATION AND SEDIMENT & EROSION CONTROL PLAN

Project No. 20111246.S4N

Scale 1"=10'

Revision 0

Drawing No. **CP-101**

File Path: J:\DWG\P20111246\S4N\Civil\Plan\20111246S4N_ERO01.dwg Layout: CP-101 Plotted: Tuesday, February 21, 2023 - 10:50 AM User: TDAVIS
Plotter: NONE CTB File: FO 2008 MONO.CTB

ORIGINAL SHEET - ARCH E1

	REQUIRED	EXISTING	PROPOSED
FLOOR AREA RATIO (FAR)	0.50	0.53	0.53
MINIMUM LOT AREA	2 ACRES	22.9± ACRES	22.9± ACRES
MINIMUM LOT WIDTH	150 FT	269± FT	269± FT
MINIMUM LOT FRONTAGE	150 FT	269± FT	269± FT
MINIMUM FRONT YARD	50 FT	218± FT	218± FT
MINIMUM SIDE YARD	50 FT	5± FT	5± FT
TOTAL SIDE YARD	100 FT	230± FT	230± FT
MINIMUM REAR YARD	50 FT	5± FT	5± FT

A ZONING TABLE (LI)

NOT TO SCALE

SECTION:	68.08
BLOCK:	1
LOT:	5
AMBULANCE:	AM001
FIRE:	PEARL RIVER, FD004
POSTAL:	10965
SCHOOL:	NANUET UNION FREE, USFD 392008
SEWER:	ORANGETOWN SEWER DISTRICT
WATER:	UNITED WATER, WT003
LIGHTING:	PEARL RIVER
ZONING:	LI

B DISTRICTS SUMMARY

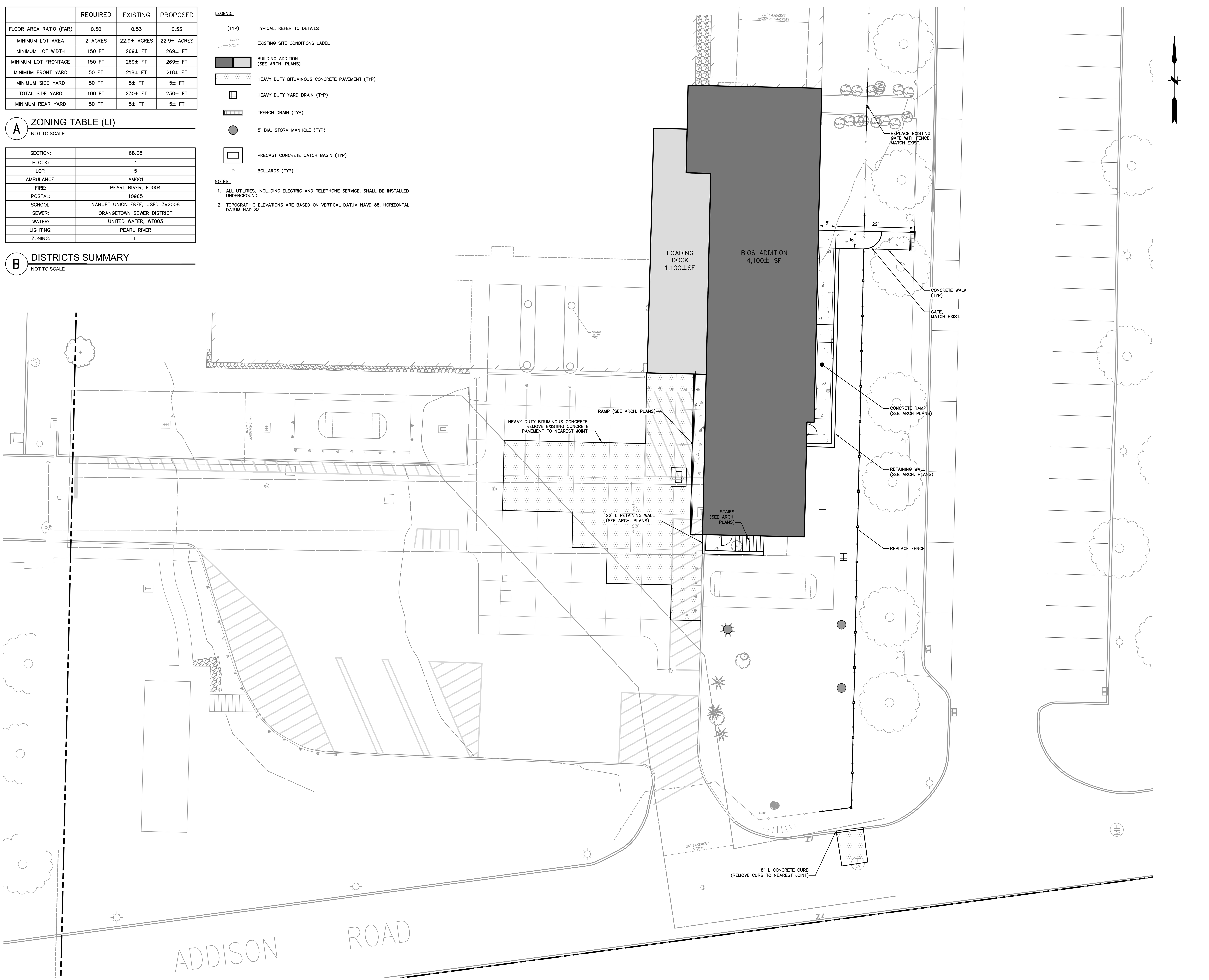
NOT TO SCALE

LEGEND:

(TYP)	TYPICAL, REFER TO DETAILS
CURB / UTILITY	EXISTING SITE CONDITIONS LABEL
	BUILDING ADDITION (SEE ARCH. PLANS)
	HEAVY DUTY BITUMINOUS CONCRETE PAVEMENT (TYP)
	HEAVY DUTY YARD DRAIN (TYP)
	TRENCH DRAIN (TYP)
	5' DIA. STORM MANHOLE (TYP)
	PRECAST CONCRETE CATCH BASIN (TYP)
	BOLLARDS (TYP)

NOTES:

1. ALL UTILITIES, INCLUDING ELECTRIC AND TELEPHONE SERVICE, SHALL BE INSTALLED UNDERGROUND.
2. TOPOGRAPHIC ELEVATIONS ARE BASED ON VERTICAL DATUM NAVD 88, HORIZONTAL DATUM NAD 83.



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Stantec

Consultant

FUSS & O'NEILL

Notes

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Permit/Seal

Client/Project Logo

Pfizer

Client/Project

Pfizer Global Research and Development

Hamilton BiOS #2 Addition

Pearl River, NY

Title

SITE LAYOUT PLAN

Project No. 20111246.S4N

Scale 1"=10'

Revision 0

Drawing No. **CS-101**

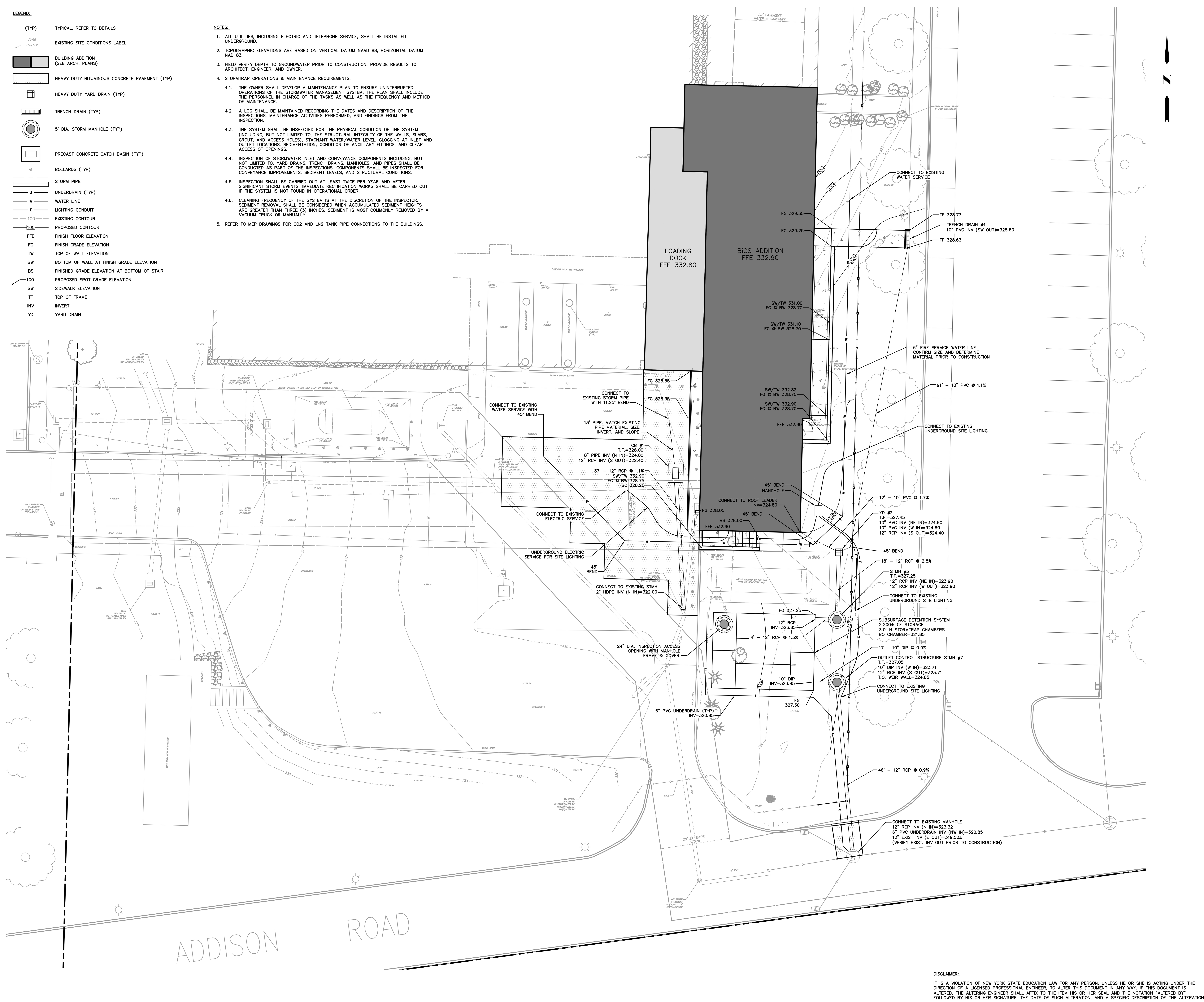
File Path: J:\DWG\P\2011\1246\S4N\Civil\Plan\20111246S4N_STP01.dwg Layout: CS-101 Plotted: Tuesday, February 21, 2023 - 10:50 AM User: TDAVIS
Plotter: NONE CTB File: FO 2008 MONO.CTB

LEGEND:

(TYP)	TYPICAL, REFER TO DETAILS
CURB / UTILITY	EXISTING SITE CONDITIONS LABEL
	BUILDING ADDITION (SEE ARCH. PLANS)
	HEAVY DUTY BITUMINOUS CONCRETE PAVEMENT (TYP)
	HEAVY DUTY YARD DRAIN (TYP)
	TRENCH DRAIN (TYP)
	5' DIA. STORM MANHOLE (TYP)
	PRECAST CONCRETE CATCH BASIN (TYP)
	BOLLARDS (TYP)
	STORM PIPE
U	UNDERDRAIN (TYP)
W	WATER LINE
E	LIGHTING CONDUIT
100	EXISTING CONTOUR
100	PROPOSED CONTOUR
FFE	FINISH FLOOR ELEVATION
FG	FINISH GRADE ELEVATION
TW	TOP OF WALL ELEVATION
BW	BOTTOM OF WALL AT FINISH GRADE ELEVATION
BS	FINISHED GRADE ELEVATION AT BOTTOM OF STAIR
100	PROPOSED SPOT GRADE ELEVATION
SW	SIDEWALK ELEVATION
TF	TOP OF FRAME
INV	INVERT
YD	YARD DRAIN

NOTES:

1. ALL UTILITIES, INCLUDING ELECTRIC AND TELEPHONE SERVICE, SHALL BE INSTALLED UNDERGROUND.
2. TOPOGRAPHIC ELEVATIONS ARE BASED ON VERTICAL DATUM NAVD 88, HORIZONTAL DATUM NAD 83.
3. FIELD VERIFY DEPTH TO GROUNDWATER PRIOR TO CONSTRUCTION. PROVIDE RESULTS TO ARCHITECT, ENGINEER, AND OWNER.
4. STORMTRAP OPERATIONS & MAINTENANCE REQUIREMENTS:
   - 4.1. THE OWNER SHALL DEVELOP A MAINTENANCE PLAN TO ENSURE UNINTERRUPTED OPERATIONS OF THE STORMWATER MANAGEMENT SYSTEM. THE PLAN SHALL INCLUDE THE PERSONNEL IN CHARGE OF THE TASKS AS WELL AS THE FREQUENCY AND METHOD OF MAINTENANCE.
   - 4.2. A LOG SHALL BE MAINTAINED RECORDING THE DATES AND DESCRIPTION OF THE INSPECTIONS, MAINTENANCE ACTIVITIES PERFORMED, AND FINDINGS FROM THE INSPECTION.
   - 4.3. THE SYSTEM SHALL BE INSPECTED FOR THE PHYSICAL CONDITION OF THE SYSTEM (INCLUDING, BUT NOT LIMITED TO, THE STRUCTURAL INTEGRITY OF THE WALLS, SLABS, GROUT, AND ACCESS HOLES), STAGNANT WATER/WATER LEVEL, CLOGGING AT INLET AND OUTLET LOCATIONS, SEDIMENTATION, CONDITION OF ANCILLARY FITTINGS, AND CLEAR ACCESS OF OPENINGS.
   - 4.4. INSPECTION OF STORMWATER INLET AND CONVEYANCE COMPONENTS INCLUDING, BUT NOT LIMITED TO, YARD DRAINS, TRENCH DRAINS, MANHOLES, AND PIPES SHALL BE CONDUCTED AS PART OF THE INSPECTIONS. COMPONENTS SHALL BE INSPECTED FOR CONVEYANCE IMPROVEMENTS, SEDIMENT LEVELS, AND STRUCTURAL CONDITIONS.
   - 4.5. INSPECTION SHALL BE CARRIED OUT AT LEAST TWICE PER YEAR AND AFTER SIGNIFICANT STORM EVENTS. IMMEDIATE RECTIFICATION WORKS SHALL BE CARRIED OUT IF THE SYSTEM IS NOT FOUND IN OPERATIONAL ORDER.
   - 4.6. CLEANING FREQUENCY OF THE SYSTEM IS AT THE DISCRETION OF THE INSPECTOR. SEDIMENT REMOVAL SHALL BE CONSIDERED WHEN ACCUMULATED SEDIMENT HEIGHTS ARE GREATER THAN THREE (3) INCHES. SEDIMENT IS MOST COMMONLY REMOVED BY A VACUUM TRUCK OR MANUALLY.
5. REFER TO MEP DRAWINGS FOR CO2 AND LN2 TANK PIPE CONNECTIONS TO THE BUILDINGS.



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ORIGINAL SHEET - ARCH E1

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Notes

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Issued/Revision		By	Appd	YYYY.MM.DD

File Name: UTL01.dwg	TD	LM	TG	02/17/23
	Dwn.	Dsgn.	Chkd.	YYYY.MM.DD

Permit/Seal

Client/Project Logo

Pfizer

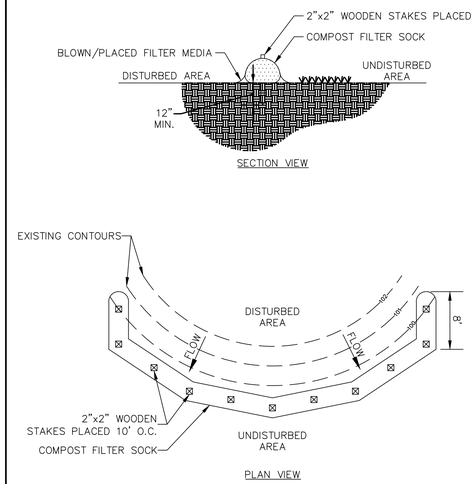
Client/Project
Pfizer Global Research and Development

Hamilton BiOS #2 Addition

Pearl River, NY

Title
SITE UTILITY PLAN

Project No. 20111246.S4N
Scale 1"=10'
Revision 0
Drawing No. CU-101



ADAPTED FROM DETAILS PROVIDED BY: FILTREXX

COMPOST FILTER SOCK

1. SOCK FABRIC SHALL MEET STANDARDS OF TABLE 5.1. COMPOST SHALL MEET THE STANDARDS LISTED ON OF TABLE 5.2.
2. COMPOST FILTER SOCK SHALL BE PLACED AT EXISTING LEVEL GRADE. BOTH ENDS OF THE SOCK SHALL BE EXTENDED AT LEAST 8 FEET UP SLOPE AT 45 DEGREES TO THE MAIN SOCK ALIGNMENT (FIGURE 5.2). MAXIMUM SLOPE LENGTH ABOVE ANY SOCK SHALL NOT EXCEED THAT SHOWN ON FIGURE X.X. STAKES MAY BE INSTALLED IMMEDIATELY DOWNSLOPE OF THE SOCK IF SO SPECIFIED BY THE MANUFACTURER.
3. TRAFFIC SHALL NOT BE PERMITTED TO CROSS FILTER SOCKS.
4. ACCUMULATED SEDIMENT SHALL BE REMOVED WHEN IT REACHES HALF THE ABOVEGROUND HEIGHT OF THE SOCK AND DISPOSED IN THE MANNER DESCRIBED ELSEWHERE IN THE PLAN.
5. SOCKS SHALL BE INSPECTED WEEKLY AND AFTER EACH RUNOFF EVENT. DAMAGED SOCKS SHALL BE REPAIRED ACCORDING TO MANUFACTURER'S SPECIFICATIONS OR REPLACED WITHIN 24 HOURS OF INSPECTION.
6. BIODEGRADABLE FILTER SOCKS SHALL BE REPLACED AFTER 6 MONTHS; PHOTODEGRADABLE SOCKS AFTER 1 YEAR. POLYPROPYLENE SOCKS SHALL BE REPLACED ACCORDING TO MANUFACTURER'S RECOMMENDATIONS.
7. UPON STABILIZATION OF THE AREA TRIBUTART TO THE SOCKS, STAKES SHALL BE REMOVED. THE SOCK MAY BE LEFT IN PLACE AND VEGETATED OR REMOVED. IN THE LATTER CASE, THE MESH SHALL BE CUT OPEN AND THE MULCH SPREAD AS A SOIL SUPPLEMENT.

FODS TRACKOUT CONTROL SYSTEM INSTALLATION

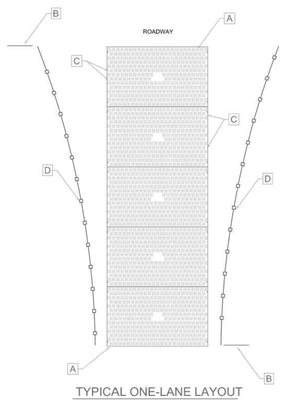
THE PURPOSE AND DESIGN OF THE FODS TRACKOUT CONTROL SYSTEM IS TO EFFECTIVELY REMOVE MOST SEDIMENT FROM VEHICLE TIRES AS THEY EXIT A DISTURBED LAND AREA ONTO A PAVED STREET. THIS MANUAL IS A PLATFORM FROM WHICH TO INSTALL A FODS TRACKOUT CONTROL SYSTEM. (NOTE: THIS IS NOT A ONE SIZE FITS ALL GUIDE.) THE INSTALLATION MAY NEED TO BE MODIFIED TO MEET THE EXISTING CONDITIONS, EXPECTATIONS, OR DEMANDS OF A PARTICULAR SITE. THIS IS A GUIDELINE. ULTIMATELY THE FODS TRACKOUT CONTROL SYSTEM SHOULD BE INSTALLED SAFELY WITH PROPER ANCHORING AND SIGNS PLACED AT THE ENTRANCE AND EXIT TO CAUTION USERS AND OTHERS.

KEY NOTES:
A. FODS TRACKOUT CONTROL SYSTEM MAT.
B. FODS SAFETY SIGN.
C. ANCHOR POINT.
D. SILT OR ORANGE CONSTRUCTION FENCE.

INSTALLATION:
1. THE SITE WHERE THE FODS TRACKOUT CONTROL SYSTEM IS TO BE PLACED SHOULD CORRESPOND TO BEST MANAGEMENT PRACTICES AS MUCH AS POSSIBLE. THE SITE WHERE FODS TRACKOUT CONTROL SYSTEM IS PLACED SHOULD ALSO MEET OR EXCEED THE LOCAL JURISDICTION OR STORM WATER POLLUTION PREVENTION PLAN (SWPPP) REQUIREMENTS.
2. CALL FOR UTILITY LOCATES 3 BUSINESS DAYS IN ADVANCE OF THE OF FODS TRACKOUT CONTROL SYSTEM INSTALLATION FOR THE MARKING OF UNDERGROUND UTILITIES. CALL THE UTILITY NOTIFICATION CENTER AT 811.
3. ONCE THE SITE IS ESTABLISHED WHERE FODS TRACKOUT CONTROL SYSTEM IS TO BE PLACED, ANY EXCESSIVE UNEVEN TERRAIN SHOULD BE LEVELED OUT OR REMOVED SUCH AS LARGE ROCKS, LANDSCAPING MATERIALS, OR SUDDEN ABRUPT CHANGES IN ELEVATION.
4. THE INDIVIDUAL MATS CAN START TO BE PLACED INTO POSITION. THE FIRST MAT SHOULD BE PLACED NEXT TO THE CLOSEST POINT OF EGRESS. THIS WILL ENSURE THAT THE VEHICLE WILL EXIT STRAIGHT FROM THE SITE ONTO THE PAVED SURFACE.
5. AFTER THE FIRST MAT IS PLACED DOWN IN THE PROPER LOCATION, MATS SHOULD BE ANCHORED TO PREVENT THE POTENTIAL MOVEMENT WHILE THE ADJOINING MATS ARE INSTALLED. ANCHORS SHOULD BE PLACED AT EVERY ANCHOR POINT (IF FEASIBLE) TO HELP MAINTAIN THE MAT IN ITS CURRENT POSITION.
9. AFTER THE FIRST MAT IS ANCHORED IN ITS PROPER PLACE, AN H BRACKET SHOULD BE PLACED AT THE END OF THE FIRST MAT BEFORE ANOTHER MAT IS PLACED ADJACENT TO THE FIRST MAT.
10. ONCE THE SECOND MAT IS PLACED ADJACENT TO THE FIRST MAT, MAKE SURE THE H BRACKET IS CORRECTLY SITUATED BETWEEN THE TWO MATS, AND SLIDE MATS TOGETHER.
11. NEXT THE CONNECTOR STRAPS SHOULD BE INSTALLED TO CONNECT THE TWO MATS TOGETHER.
12. UPON PLACEMENT OF EACH NEW MAT IN THE SYSTEM, THAT MAT SHOULD BE ANCHORED AT EVERY ANCHOR POINT TO HELP STABILIZE THE MAT AND ENSURE THE SYSTEM IS CONTINUOUS WITH NO GAPS IN BETWEEN THE MATS.
13. SUCCESSIVE MATS CAN THEN BE PLACED TO CREATE THE FODS TRACKOUT CONTROL SYSTEM REPEATING THE ABOVE STEPS.

USE AND MAINTENANCE
1. VEHICLES SHOULD TRAVEL DOWN THE LENGTH OF THE TRACKOUT CONTROL SYSTEM AND NOT CUT ACROSS THE MATS.
2. DRIVERS SHOULD TURN THE WHEEL OF THEIR VEHICLES SUCH THAT THE VEHICLE WILL MAKE A SHALLOW S-TURN ROUTE DOWN THE LENGTH OF THE FODS TRACKOUT CONTROL SYSTEM.
3. MATS SHOULD BE CLEANED ONCE THE VOIDS BETWEEN THE PYRAMIDS BECOME FULL OF SEDIMENT. TYPICALLY THIS WILL NEED TO BE PERFORMED WITHIN TWO WEEKS AFTER A STORM EVENT. BRUSHING IS THE PREFERRED METHOD OF CLEANING, EITHER MANUALLY OR MECHANICALLY.
4. THE USE OF ICE MELT, ROCK SALT, SNOW MELT, DE-ICER, ETC. SHOULD BE UTILIZED AS NECESSARY DURING THE WINTER MONTHS AND AFTER A SNOW EVENT TO PREVENT ICE BUILDUP.

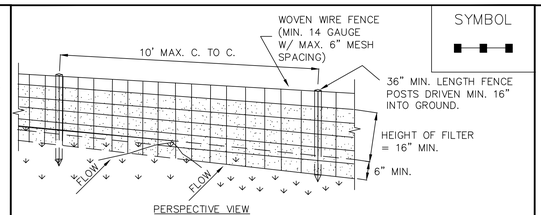
REMOVAL
1. REMOVAL OF FODS TRACKOUT CONTROL SYSTEM IS REVERSE ORDER OF INSTALLATION.
2. STARTING WITH THE LAST MAT, THE MAT THAT IS PLACED AT THE INNERMOST POINT OF THE SITE OR THE MAT FURTHEST FROM THE EXIT OR PAVED SURFACE SHOULD BE REMOVED FIRST.
3. THE ANCHORS SHOULD BE REMOVED.
4. THE CONNECTOR STRAPS SHOULD BE UNBOLTED AT ALL LOCATIONS IN THE FODS TRACKOUT CONTROL SYSTEM.
5. STARTING WITH THE LAST MAT IN THE SYSTEM, EACH SUCCESSIVE MAT SHOULD THEN BE MOVED AND STACKED FOR LOADING BY FORKLIFT OR EXCAVATOR ONTO A TRUCK FOR REMOVAL FROM THE SITE.



CONSTRUCTION ENTRANCE MUD MATS

NOT TO SCALE

SYMBOL



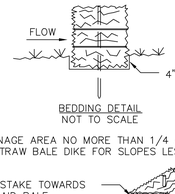
CONSTRUCTION SPECIFICATIONS

1. WOVEN WIRE FENCE TO BE FASTENED SECURELY TO FENCE POSTS WITH WIRE TIES OR STAPLES. POSTS SHALL BE STEEL EITHER "T" OR "U" TYPE OR HARDWOOD.
2. FILTER CLOTH TO BE TO BE FASTENED SECURELY TO WOVEN WIRE FENCE WITH TIES SPACED EVERY 24" AT TOP AND MID SECTION. FENCE SHALL BE WOVEN WIRE, 6" MAXIMUM MESH OPENING.
3. WHEN TWO SECTIONS OF FILTER CLOTH ADJOIN EACH OTHER THEY SHALL BE OVER-LAPPED BY SIX INCHES AND FOLDED. FILTER CLOTH SHALL BE EITHER FILTER X, MIRAFI 100X, STABILINKA T140N, OR APPROVED EQUIVALENT.
4. PREFABRICATED UNITS SHALL BE GEOFAB, ENVIROFENCE, OR APPROVED EQUIVALENT.
5. MAINTENANCE SHALL BE PERFORMED AS NEEDED AND MATERIAL REMOVED WHEN "BULGES" DEVELOP IN THE SILT FENCE.

ADAPTED FROM DETAILS PROVIDED BY: USDA – NRCS, NEW YORK STATE DEPARTMENT OF TRANSPORTATION, NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION, NEW YORK STATE SOIL & WATER CONSERVATION COMMITTEE

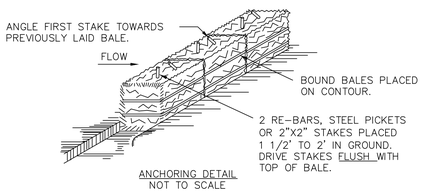
SILT FENCE

SYMBOL



BEDDING DETAIL
NOT TO SCALE

DRAINAGE AREA NO MORE THAN 1/4 ACRE PER 100 FEET OF STRAW BALE DIKE FOR SLOPES LESS THAN 25%.



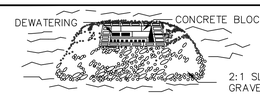
CONSTRUCTION SPECIFICATIONS

1. BALES SHALL BE PLACED AT THE TOE OF A SLOPE OR ON THE CONTOUR AND IN A ROW WITH ENDS TIGHTLY ABUTTING THE ADJACENT BALES.
2. EACH BALE SHALL BE EMBEDDED IN THE SOIL A MINIMUM OF (4) INCHES, AND PLACED SO THE BINDINGS ARE HORIZONTAL.
3. BALES SHALL BE SECURELY ANCHORED IN PLACE BY EITHER TWO STAKES OR RE-BARS DRIVEN THROUGH THE BALE. THE FIRST STAKE IN EACH BALE SHALL BE DRIVEN TOWARD THE PREVIOUSLY LAID BALE AT AN ANGLE TO FORCE THE BALES TOGETHER. STAKES SHALL BE DRIVEN FLUSH WITH THE BALE.
4. INSPECTION SHALL BE FREQUENT AND REPAIR REPLACEMENT SHALL BE MADE PROMPTLY AS NEEDED.
5. BALES SHALL BE REMOVED WHEN THEY HAVE SERVED THEIR USEFULLNESS SO AS NOT TO BLOCK OR IMPEDE STORM FLOW OR DRAINAGE.

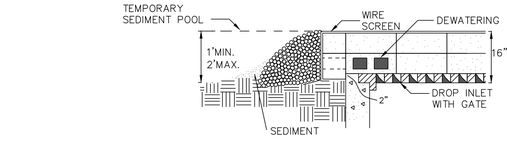
ADAPTED FROM DETAILS PROVIDED BY: USDA – NRCS, NEW YORK STATE DEPARTMENT OF TRANSPORTATION, NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION, NEW YORK STATE SOIL & WATER CONSERVATION COMMITTEE

STRAW BALE DIKE

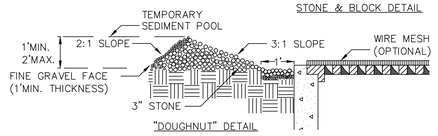
SYMBOL



STONE & BLOCK PLAN VIEW



STONE & BLOCK DETAIL



"DOUGHNUT" DETAIL

CONSTRUCTION SPECIFICATIONS

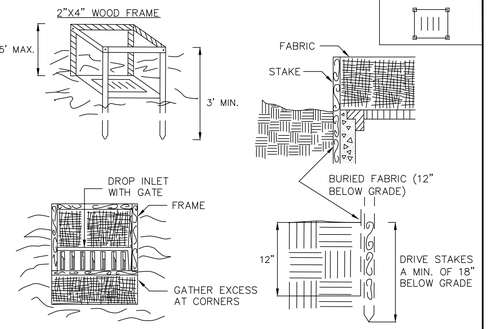
1. LAY ONE BLOCK ON EACH SIDE OF THE STRUCTURE ON ITS SIDE FOR DEWATERING. FOUNDATION SHALL BE 2 INCHES MINIMUM BELOW REST OF INLET AND BLOCKS SHALL BE PLACED AGAINST INLET FOR SUPPORT.
2. HARDWARE CLOTH OR 1/2" WIRE MESH SHALL BE PLACED OVER BLOCK OPENINGS TO SUPPORT STONE.
3. USE CLEAN STONE OR GRAVEL 1/2-3/4 INCH IN DIAMETER PLACED 2 INCHES BELOW TOP OF THE BLOCK ON A 2:1 SLOPE OR FLATTER.
4. FOR STONE STRUCTURES ONLY, A 1 FOOT THICK LAYER OF THE FILTER STONE WILL BE PLACED AGAINST THE 3 INCH STONE AS SHOWN ON THE DRAWINGS.

MAXIMUM DRAINAGE AREA 1 ACRE

ADAPTED FROM DETAILS PROVIDED BY: USDA – NRCS, NEW YORK STATE DEPARTMENT OF TRANSPORTATION, NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION, NEW YORK STATE SOIL & WATER CONSERVATION COMMITTEE

STONE & BLOCK DROP INLET PROTECTION

SYMBOL



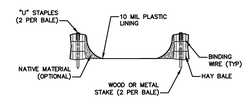
CONSTRUCTION SPECIFICATIONS

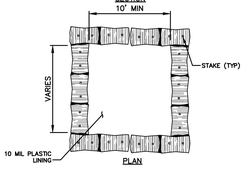
1. FABRIC SHALL HAVE AN EOS OF 40-85. BURLAP MAY BE USED FOR SHORT TERM APPLICATIONS.
2. CUT FABRIC FROM A CONTINUOUS ROLL TO ELIMINATE JOINTS. IF JOINTS ARE NEEDED THEY WILL BE OVERLAPPED TO THE NEXT STAKE.
3. STAKE MATERIALS WILL BE STANDARD 2" x 4" WOOD OR EQUIVALENT. METAL WITH A MINIMUM LENGTH OF 3 FEET.
4. SPACE STAKES EVENLY AROUND INLET 3 FEET APART AND DRIVE A MINIMUM 18 INCHES DEEP. SPANS GREATER THAN 3 FEET MAY BE BRIDGED WITH THE USE OF WIRE MESH BEHIND THE FILTER FABRIC FOR SUPPORT.
5. FABRIC SHALL BE EMBEDDED 1 FOOT MINIMUM BELOW GROUND AND BACKFILLED. IT SHALL BE SECURELY FASTENED TO THE STAKES AND FRAME.
6. A 2" x 4" WOOD FRAME SHALL BE COMPLETED AROUND THE CREST OF THE FABRIC FOR OVER FLOW STABILITY.

MAXIMUM DRAINAGE AREA 1 ACRE

ADAPTED FROM DETAILS PROVIDED BY: USDA – NRCS, NEW YORK STATE DEPARTMENT OF TRANSPORTATION, NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION, NEW YORK STATE SOIL & WATER CONSERVATION COMMITTEE

FABRIC DROP INLET PROTECTION





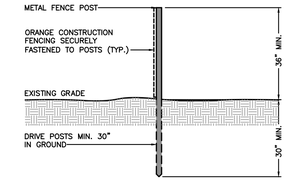
NOTES:
1. REMOVE HARDEN CONCRETE WHEN WITHIN 4" FROM TOP OF STRUCTURE.
2. CONSTRUCT NEW FACILITIES ONCE CURRENT FACILITIES ARE TWO-THIRDS FULL.
3. LINERS, HAYBALES, ETC. SHALL BE INSPECTED FOR DAMAGE ANY DAMAGE SHALL BE REPAIR PROMPTLY.

TEMPORARY CONCRETE WASHOUT FACILITY

NOT TO SCALE

EROSION & SEDIMENT CONTROL NOTES

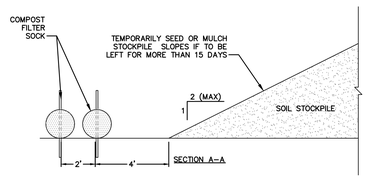
1. CONSTRUCTION STANDARDS – CONSTRUCT ALL EROSION AND SEDIMENT CONTROL MEASURES IN ACCORDANCE WITH THE STANDARDS AND SPECIFICATIONS OF THE MOST RECENT EDITION OF THE "NEW YORK STATE STANDARDS FOR EROSION AND SEDIMENT CONTROL (BLUE BOOK)" DATED NOVEMBER, 2016. ALL MEASURES SHALL BE MAINTAINED AND UPGRADED TO ACHIEVE PROPER SEDIMENT CONTROL DURING CONSTRUCTION.
2. PLAN IMPLEMENTATION – IMPLEMENT THIS EROSION AND SEDIMENT CONTROL PLAN. THIS IMPLEMENTATION INCLUDES THE INSTALLATION AND MAINTENANCE OF CONTROL MEASURES UNTIL PERMANENT STABILIZATION IS ACHIEVED, INFORMING ALL SUBCONTRACTORS OF THE REQUIREMENTS AND OBJECTIVES OF THE PLAN, AND NOTIFYING THE PROPER MUNICIPAL AGENCY OF ANY TRANSFER OF THIS RESPONSIBILITY. THE OWNER SHALL BE RESPONSIBLE FOR CONVEYING A COPY OF THE EROSION AND SEDIMENT CONTROL PLAN TO THE NEW OWNER IF THE TITLE OF THE LAND IS TRANSFERRED PRIOR TO ACHIEVING PERMANENT STABILIZATION.
3. INSTALLATION SCHEDULE – INSTALL THE CONSTRUCTION ENTRANCE BEFORE CONSTRUCTION TRAFFIC INTO AND OUT OF THE PROJECT AREA BEGINS. INSTALL EROSION AND SEDIMENT CONTROL MEASURES PRIOR TO STUMP REMOVAL AND CONSTRUCTION. INSTALL ADDITIONAL CONTROL MEASURES DURING THE CONSTRUCTION PERIOD, IF DEEMED NECESSARY BY THE OWNER, HIS AGENTS OR AGENTS OF THE MUNICIPALITY.
4. FUGITIVE DUST – CONTROL FUGITIVE DUST USING WATER SPRAYS OR CALCIUM CHLORIDE ON SOIL SURFACES, SWEEPING PAVED AREAS, TEMPORARY WINDBREAKS OR NON-ASPHALTIC SOIL TACKIFIERS.
5. STRAW BALE LIFE SPAN – INSTALL STRAW BALES WHERE PROTECTION AND EFFECTIVENESS IS REQUIRED FOR LESS THAN 90 DAYS. OTHERWISE, INSTALL SILT FENCE.
6. CATCH BASINS – PROTECT CATCH BASINS WITH PROPER CONTROLS THROUGHOUT THE CONSTRUCTION PERIOD UNTIL ALL DISTURBED AREAS ARE PERMANENTLY STABILIZED.
7. STOCKPILES – ENCIRCLE STOCKPILES OF ERODIBLE SOIL WITH A STRAW BALE OR SILT FENCE BARRIER. THE SIDE SLOPES OF ERODIBLE STOCKPILED MATERIAL SHALL BE NO STEEPER THAN 2:1. STOCKPILES THAT ARE NOT TO BE USED WITHIN 30 DAYS SHALL BE SEEDED AND MULCHED IMMEDIATELY AFTER THEY ARE FORMED.
8. TOE OF SLOPE – ESTABLISH AN EROSION CONTROL BARRIER (SILT FENCE OR COMPOST FILTER SOCK) APPROXIMATELY 5 TO 10 FEET FROM THE PROPOSED TOE OF THE CUT OR FILL AREA PRIOR TO BEGINNING EARTHWORK.
9. SEDIMENT REMOVAL – SEDIMENT REACHING ½ THE HEIGHT OF THE EROSION CONTROL BARRIER SHALL BE REMOVED. REMOVE AND DISPOSE OF SEDIMENT IN A MANNER CONSISTENT WITH THE INTENT OF THE PLAN.
10. SOIL STABILIZATION SCHEDULE – APPLY PERMANENT SOIL STABILIZATION MEASURES TO ALL GRADED AREAS WITHIN 7 DAYS OF ESTABLISHING FINAL GRADE. APPLY TEMPORARY SOIL STABILIZATION MEASURES IF FINAL GRADING IS TO BE DELAYED MORE THAN 30 DAYS.
11. TEMPORARY SEEDING – TEMPORARILY SEED ERODIBLE SOILS THAT WILL BE EXPOSED GREATER THAN 1 BUT LESS THAN 12 MONTHS WITHIN THE FIRST 7 DAYS OF SUSPENDING GRADING OPERATIONS. APPLY LIME AT A RATE OF 90 LBS/1000 SQ. FT. APPLY 10-10-10 FERTILIZER AT A RATE OF 7 ½ LBS/1000 SQ. FT. APPLY PERENNIAL RYE GRASS AT A RATE OF 2 LBS/1000 SQ. FT. TO A DEPTH OF ½ INCH. OPTIMUM SEEDING DATES ARE MARCH 15 TO JULY 1 AND AUGUST 1 TO OCTOBER 15. MULCH FOR SEED APPLIED WITHIN THE OPTIMUM SEEDING DATES SHALL BE APPLIED EVENLY SUCH THAT IT PROVIDES 80%-85% SOIL COVERAGE. MULCH FOR SEED APPLIED OUTSIDE OF THE OPTIMUM SEEDING DATES SHALL BE APPLIED EVENLY SUCH THAT IT PROVIDES 95%-100% COVERAGE.
12. PERMANENT SEEDING – SEED PERMANENT LAWN AREAS IN ACCORDANCE WITH THE SPECIFICATIONS.
13. INSPECTION – THE OWNER SHALL SECURE THE SERVICES OF A SOIL SCIENTIST OR PROFESSIONAL ENGINEER TO VERIFY IN THE FIELD THAT THE CONTROLS REQUIRED BY THIS PLAN ARE PROPERLY INSTALLED AND MAINTAINED. THESE INSPECTIONS SHALL BE NOT LESS FREQUENTLY THAN WEEKLY AND WITHIN 24 HOURS OF THE END OF A STORM HAVING A RAINFALL AMOUNT OF 0.1 INCH OR GREATER. FOLLOWING THESE INSPECTIONS, A WRITTEN REPORT SHALL BE PREPARED, INFORMING THE OWNER OR HIS AGENT NOT LESS FREQUENTLY THAN WEEKLY AND THE MUNICIPALITY NOT LESS FREQUENTLY THAN MONTHLY OF OBSERVATIONS, MAINTENANCE, AND CORRECTIVE ACTIVITIES UNDERTAKEN.

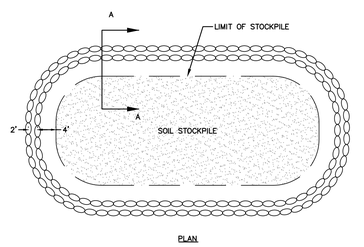


NOTES:
SEE LANDSCAPING PLAN FOR ADDITIONAL TREE PROTECTION NOTES.

TREE PROTECTION FENCING

NOT TO SCALE





SOIL STOCKPILE AREA

NOT TO SCALE

Consultant

FUSS & O'NEILL

Notes

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Issued/Revision		By	Appd	YYYY.MM.DD
File Name: DET01.dwg		TD	LM	02/17/23
		Dwn.	Dsgn.	Chkd. YYYY.MM.DD

Permit/Seal

Client/Project Logo

Pfizer

Client/Project
Pfizer Global Research and Development

Hamilton BiOS #2 Addition

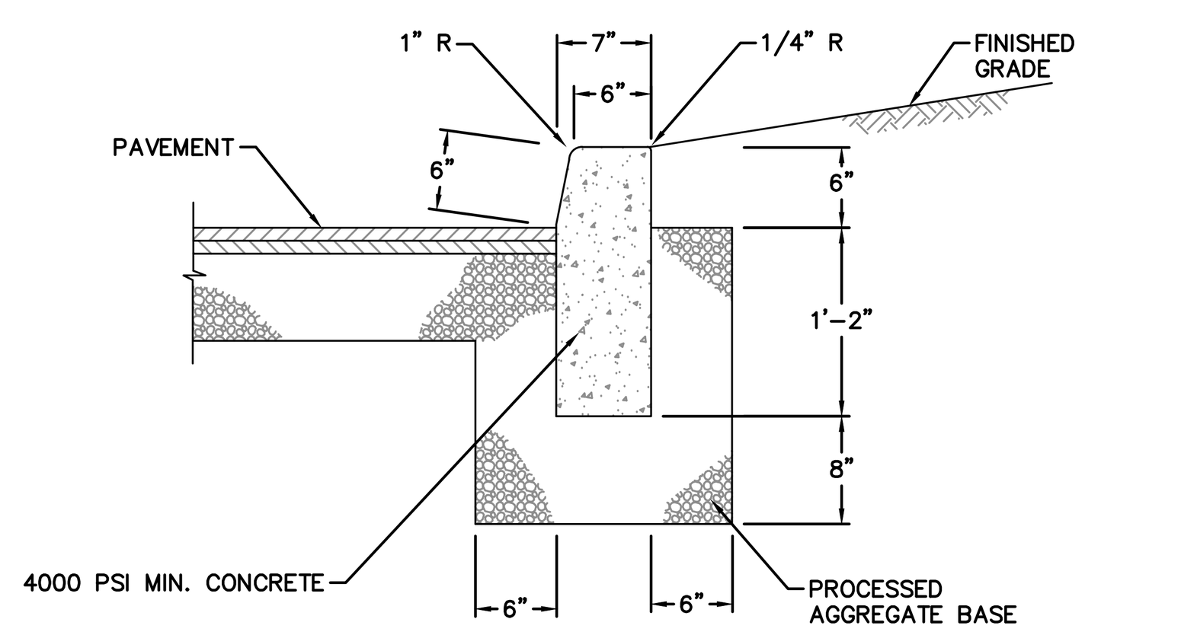
Pearl River, NY

Title
SITE DETAILS

Project No. 20111246.S4N
Scale NOT TO SCALE
Revision 0
Drawing No. CD-501

File Path: J:\DNV\P2011\12465\4N\Civil\Plan\20111246S4N_DET01.dwg Layout: CD-501 Plotted: Tuesday, February 21, 2023 - 10:50 AM User: TDAVIS
Plotter: NONE CTB File: FO 2008 MONO.CTB

ORIGINAL SHEET - ARCH E1

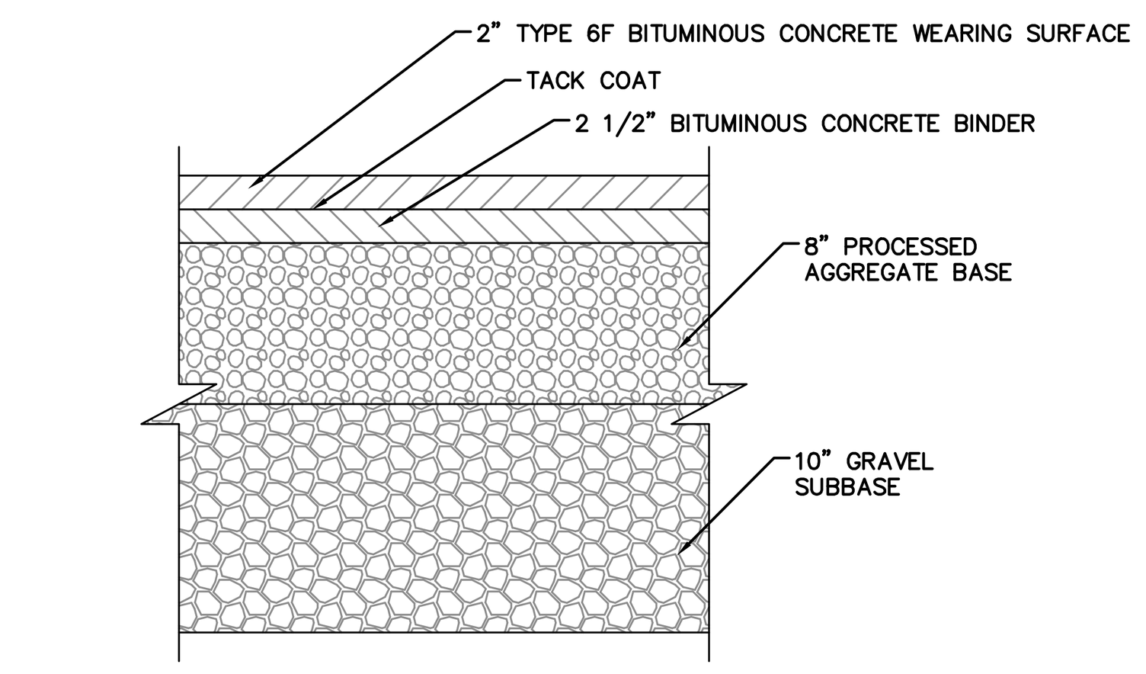


NOTES

1. 1 INCH DEEP BEVELED JOINT AT TOP AND FACE OF CURB EVERY 10 FEET.
2. 1/2 INCH EXPANSION JOINT AND FILLER EVERY 30 FEET.
3. 1/2 INCH EXPANSION JOINT AND FILLER WHEN CURB IS ADJACENT TO CONCRETE SIDEWALK.

CONCRETE CURB

NOT TO SCALE

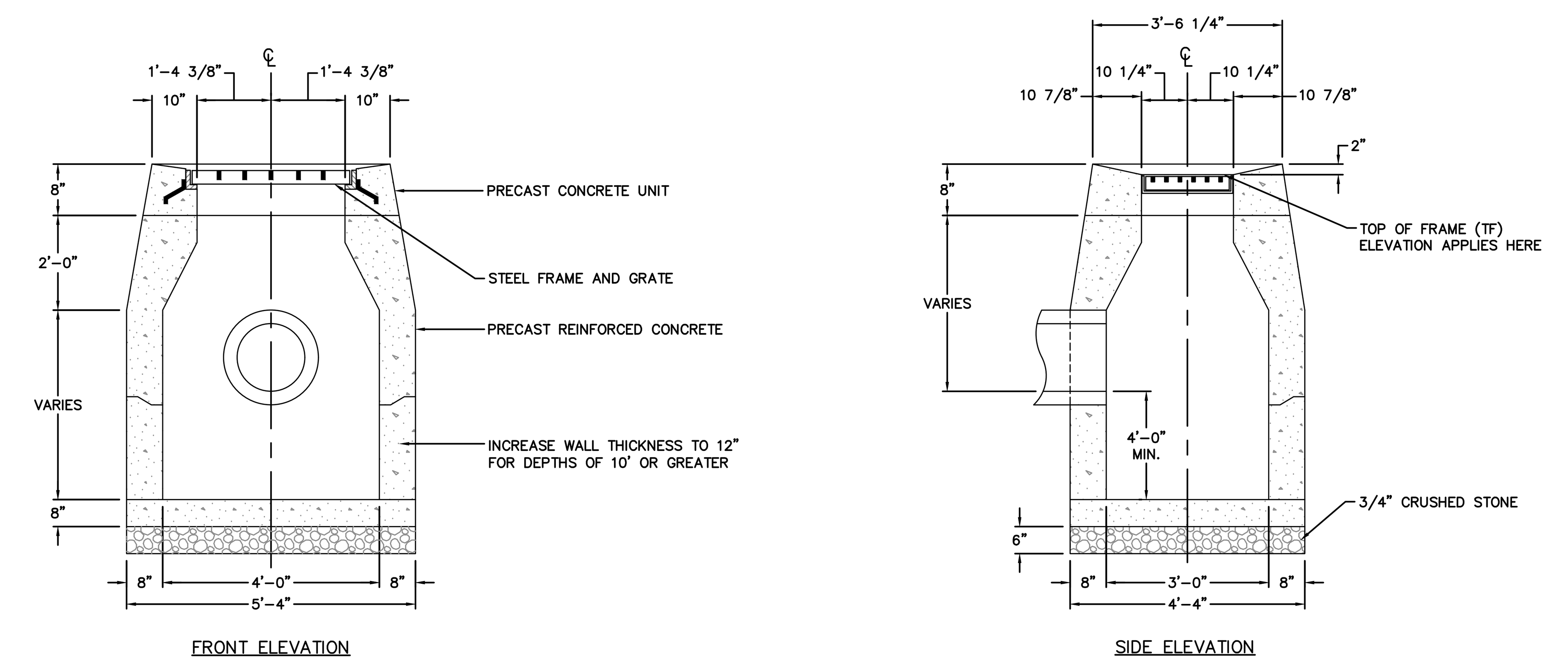


NOTES

1. SEAL JOINTS BETWEEN NEW AND EXISTING ASPHALT WITH LIQUID TACK-COAT.

BITUMINOUS CONCRETE PAVEMENT (HEAVY DUTY)

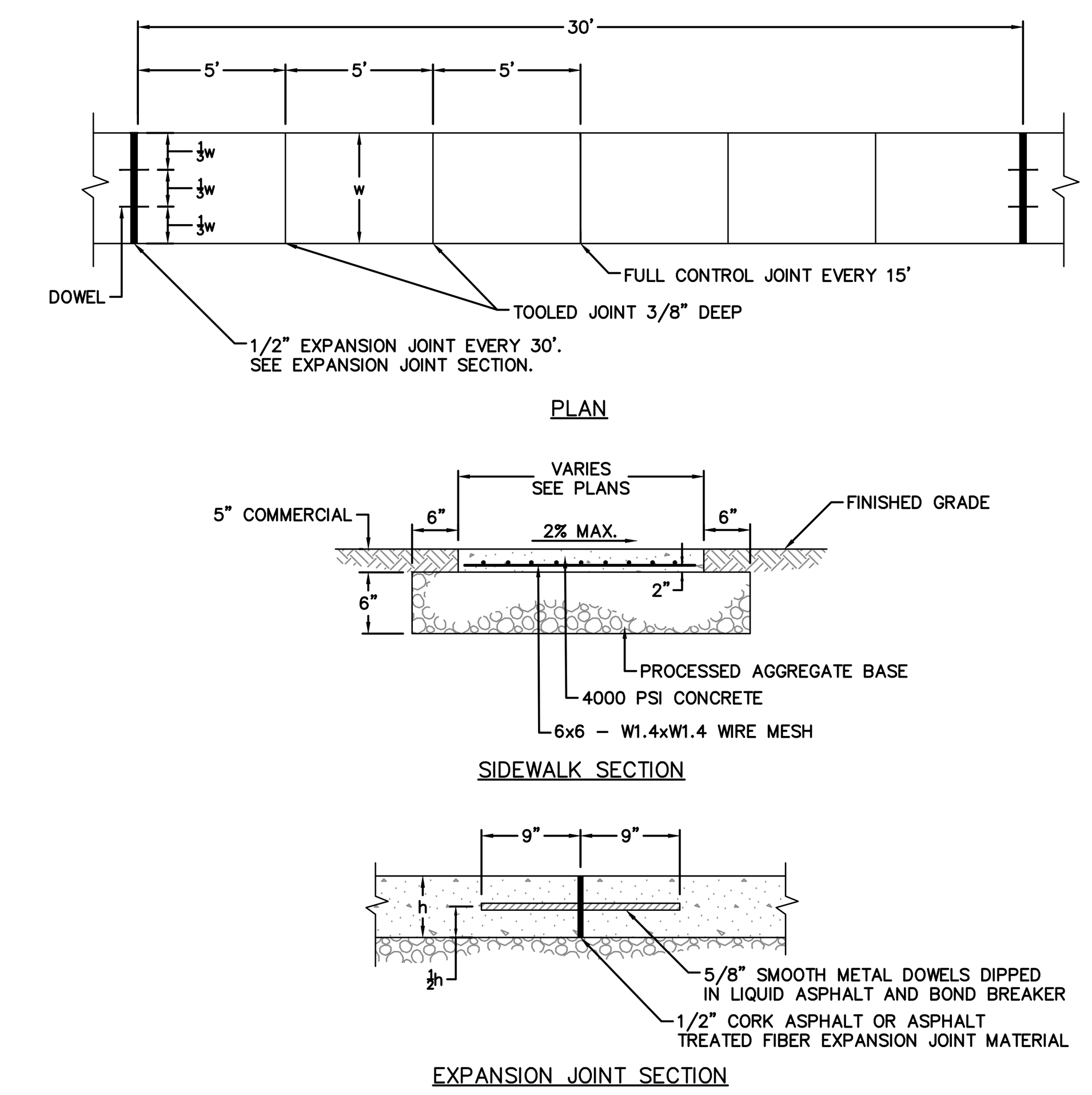
NOT TO SCALE



1'-4 3/8"
1'-4 3/8"
10"
10"
8"
2'-0"
VARIES
8"
PRECAST CONCRETE UNIT
STEEL FRAME AND GRATE
PRECAST REINFORCED CONCRETE
INCREASE WALL THICKNESS TO 12" FOR DEPTHS OF 10' OR GREATER
8"
4'-0"
8"
5'-4"
FRONT ELEVATION
3'-6 1/4"
10 1/4"
10 1/4"
10 7/8"
10 7/8"
2"
TOP OF FRAME (TF) ELEVATION APPLIES HERE
VARIES
4'-0" MIN.
3/4" CRUSHED STONE
6"
8"
3'-0"
8"
SIDE ELEVATION

PRECAST CONCRETE CATCH BASIN

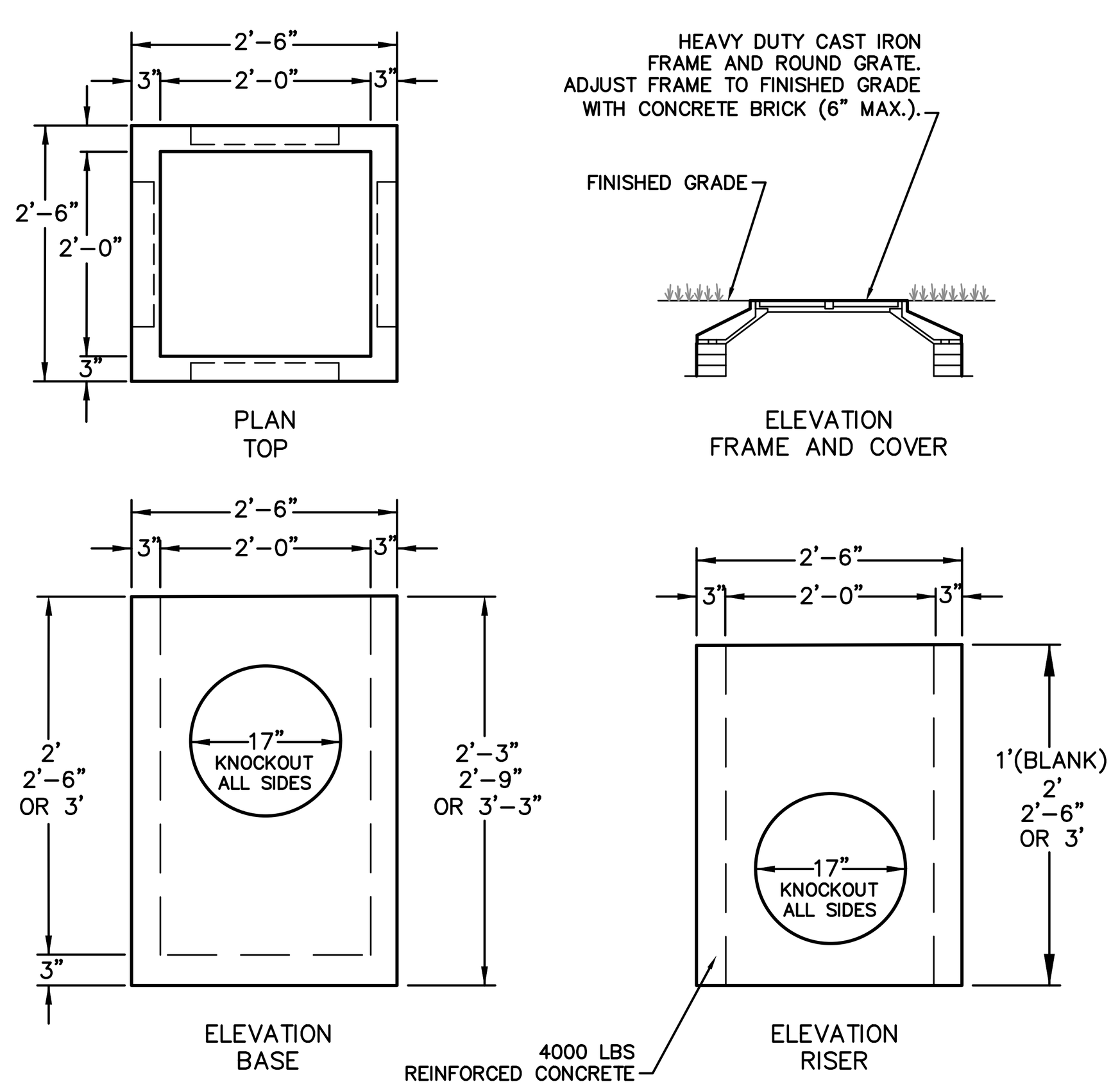
NOT TO SCALE



30'
5'
5'
5'
DOWEL
FULL CONTROL JOINT EVERY 15'
TOOLED JOINT 3/8" DEEP
1/2" EXPANSION JOINT EVERY 30'. SEE EXPANSION JOINT SECTION.
PLAN
VARIES SEE PLANS
5" COMMERCIAL
6"
2% MAX.
6"
FINISHED GRADE
2"
6"
PROCESSED AGGREGATE BASE
4000 PSI CONCRETE
6x6 – W1.4xW1.4 WIRE MESH
SIDEWALK SECTION
9"
9"
5/8" SMOOTH METAL DOWELS DIPPED IN LIQUID ASPHALT AND BOND BREAKER
1/2" CORK ASPHALT OR ASPHALT TREATED FIBER EXPANSION JOINT MATERIAL
EXPANSION JOINT SECTION

CONCRETE SIDEWALK

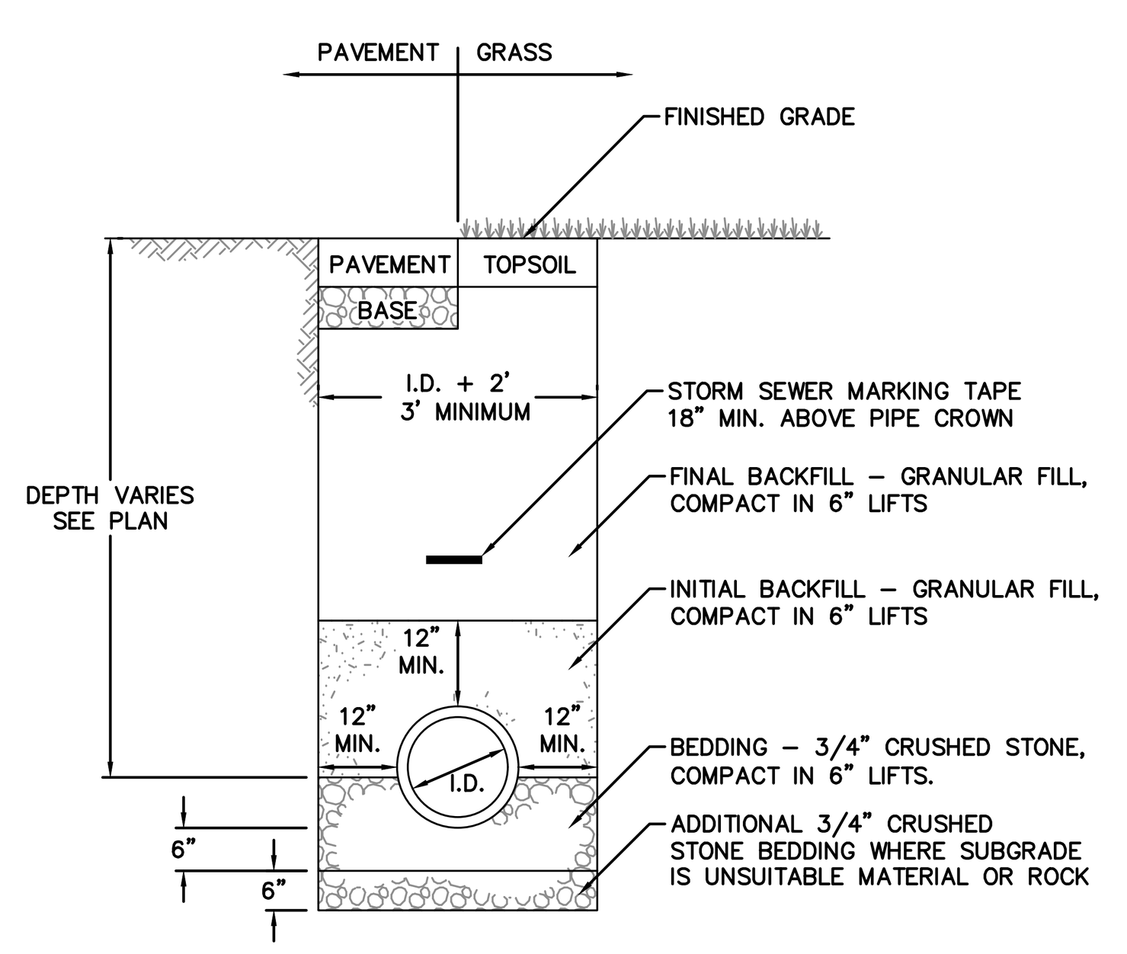
NOT TO SCALE



2'-6"
3"
2'-0"
3"
2'-6"
2'-0"
3"
PLAN TOP
HEAVY DUTY CAST IRON FRAME AND ROUND GRATE. ADJUST FRAME TO FINISHED GRADE WITH CONCRETE BRICK (6" MAX.).
FINISHED GRADE
ELEVATION FRAME AND COVER
17" KNOCKOUT ALL SIDES
2' 2'-6" OR 3'
2'-3" 2'-9" OR 3'-3"
3"
ELEVATION BASE
4000 LBS REINFORCED CONCRETE
1"(BLANK) 2' 2'-6" OR 3'
17" KNOCKOUT ALL SIDES
ELEVATION RISER

YARD DRAIN (HEAVY DUTY)

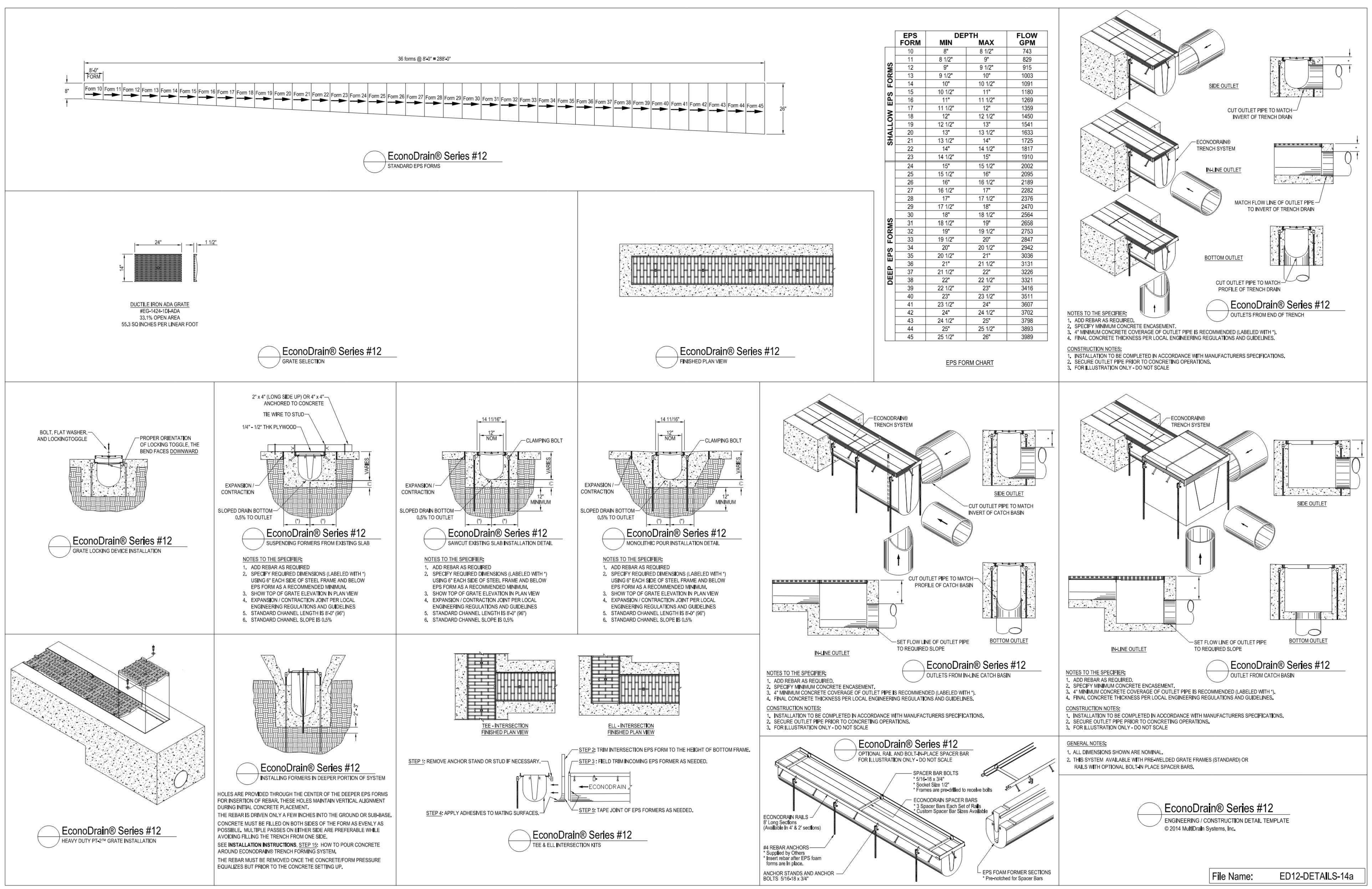
NOT TO SCALE



PAVEMENT
GRASS
FINISHED GRADE
PAVEMENT
TOPSOIL
BASE
I.D. + 2' 3' MINIMUM
STORM SEWER MARKING TAPE 18" MIN. ABOVE PIPE CROWN
FINAL BACKFILL – GRANULAR FILL, COMPACT IN 6" LIFTS
DEPTH VARIES SEE PLAN
INITIAL BACKFILL – GRANULAR FILL, COMPACT IN 6" LIFTS
12" MIN.
12" MIN.
12" MIN.
I.D.
BEDDING – 3/4" CRUSHED STONE, COMPACT IN 6" LIFTS.
ADDITIONAL 3/4" CRUSHED STONE BEDDING WHERE SUBGRADE IS UNSUITABLE MATERIAL OR ROCK
6"
6"

STORM SEWER TRENCH

NOT TO SCALE



EconoDrain® Series #12
STANDARD EPS FORMS
EconoDrain® Series #12
GRATE SELECTION
DUCTILE IRON ADA GRATE
EconoDrain® Series #12
FINISHED PLAN VIEW
EPS FORM CHART
EconoDrain® Series #12
OUTLETS FROM END OF TRENCH
SIDE OUTLET
IN-LINE OUTLET
BOTTOM OUTLET
EconoDrain® Series #12
GRATE LOCKING DEVICE INSTALLATION
EconoDrain® Series #12
SUSPENDING FORMERS FROM EXISTING SLAB
EconoDrain® Series #12
SAWCUT EXISTING SLAB INSTALLATION DETAIL
EconoDrain® Series #12
MONOLITHIC POUR INSTALLATION DETAIL
EconoDrain® Series #12
OUTLETS FROM IN-LINE CATCH BASIN
EconoDrain® Series #12
OUTLET FROM CATCH BASIN
EconoDrain® Series #12
HEAVY DUTY PT-2™ GRATE INSTALLATION
EconoDrain® Series #12
INSTALLING FORMERS IN DEEPER PORTION OF SYSTEM
EconoDrain® Series #12
TEE & ELL INTERSECTION KITS
EconoDrain® Series #12
OPTIONAL RAIL AND BOLT-IN-PLACE SPACER BAR
EconoDrain® Series #12
ENGINEERING / CONSTRUCTION DETAIL TEMPLATE
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File Name: ED12-DETAILS-14a

	EPS FORM	DEPTH MIN	DEPTH MAX	FLOW GPM
SHALLOW EPS FORMS	10	8"	8 1/2"	743
	11	8 1/2"	9"	829
	12	9"	9 1/2"	915
	13	9 1/2"	10"	1003
	14	10"	10 1/2"	1091
	15	10 1/2"	11"	1180
	16	11"	11 1/2"	1269
	17	11 1/2"	12"	1359
	18	12"	12 1/2"	1450
	19	12 1/2"	13"	1541
	20	13"	13 1/2"	1633
	21	13 1/2"	14"	1725
	22	14"	14 1/2"	1817
	23	14 1/2"	15"	1910
DEEP EPS FORMS	24	15"	15 1/2"	2002
	25	15 1/2"	16"	2095
	26	16"	16 1/2"	2189
	27	16 1/2"	17"	2282
	28	17"	17 1/2"	2376
	29	17 1/2"	18"	2470
	30	18"	18 1/2"	2564
	31	18 1/2"	19"	2658
	32	19"	19 1/2"	2753
	33	19 1/2"	20"	2847
	34	20"	20 1/2"	2942
	35	20 1/2"	21"	3036
	36	21"	21 1/2"	3131
	37	21 1/2"	22"	3226
	38	22"	22 1/2"	3321
	39	22 1/2"	23"	3416
	40	23"	23 1/2"	3511
	41	23 1/2"	24"	3607
	42	24"	24 1/2"	3702
	43	24 1/2"	25"	3798
	44	25"	25 1/2"	3893
	45	25 1/2"	26"	3989

EPS FORM CHART

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Notes

		By	Appd	YYYY.MM.DD
0	ISSUED FOR PERMIT	LM	CL	2023.02.22

Issued/Revision

File Name: DET01.dwg	Dwn.	Dsgn.	Chkd.	YYYY.MM.DD
	TD	LM	TG	02/17/23

Permit/Seal

Client/Project Logo

Client/Project

Pfizer Global Research and Development

Hamilton BiOS #2 Addition

Pearl River, NY

Title

SITE DETAILS

Project No. 20111246.S4N

Scale NOT TO SCALE

Revision 0

Drawing No. CD-502

File Path: J:\DWG\P\20111246\S4N\Civil\Plan\20111246S4N_DET01.dwgLayout: CD-502 Plotted: Tuesday, February 21, 2023 - 10:50 AM User: TDAVIS
Plotter: NONE CTB File: FO 2008 MONO.CTB

ORIGINAL SHEET - ARCH E1

STRUCTURAL DESIGN LOADING CRITERIA	
LIVE LOADING:	AASHTO HS-20 HIGHWAY LOADING
GROUND WATER TABLE:	BELOW INVERT OF SYSTEM
SOIL BEARING PRESSURE:	4000PSF
SOIL DENSITY:	120 PCF
EQUIVALENT UNSATURATED LATERAL ACTIVE EARTH PRESSURE:	35 PSF / FT.
EQUIVALENT SATURATED LATERAL ACTIVE EARTH PRESSURE:	80 PSF/FT. (IF WATER TABLE PRESENT)
APPLICABLE CODES:	ASTM C857 ACI-318
BACKFILL TYPE:	SEE SHEET 4.0 FOR BACKFILL OPTIONS

STORMTRAP SYSTEM INFORMATION		
WATER STORAGE PROV:	1,610.49	CUBIC FEET
WATER STORAGE PROV IN 12" BASE STONE AND 24" PERIMETER STONE:	599.18	CUBIC FEET
TOTAL WATER STORAGE PROV:	2,209.67	CUBIC FEET
UNIT HEADROOM:	3'-0" SINGLETRAP	

SITE SPECIFIC DESIGN CRITERIA

1. STORMTRAP UNITS SHALL BE MANUFACTURED AND INSTALLED ACCORDING TO SHOP DRAWINGS APPROVED BY THE INSTALLING CONTRACTOR AND ENGINEER OF RECORD. THE SHOP DRAWINGS SHALL INDICATE SIZE AND LOCATION OF ROOF OPENINGS AND INLET/ OUTLET PIPE TYPES, SIZES, INVERT ELEVATIONS AND SIZE OF OPENINGS.
2. COVER RANGE: MIN. 1.75' MAX. 3.00' CONSULT STORMTRAP FOR ADDITIONAL COVER OPTIONS.
3. ALL DIMENSIONS AND SOIL CONDITIONS, INCLUDING BUT NOT LIMITED TO GROUNDWATER AND SOIL BEARING CAPACITY ARE REQUIRED TO BE VERIFIED IN THE FIELD BY OTHERS PRIOR TO STORMTRAP INSTALLATION.
4. FOR STRUCTURAL CALCULATIONS THE GROUND WATER TABLE IS ASSUMED TO BE BELOW INVERT OF SYSTEM IF WATER TABLE IS DIFFERENT THAN ASSUMED, CONTACT STORMTRAP.

BILL OF MATERIALS			
QTY.	UNIT TYPE	DESCRIPTION	WEIGHT
0	I	3'-0" SINGLETRAP	0
1	II	3'-0" SINGLETRAP	14886
0	III	3'-0" SINGLETRAP	0
2	IV	3'-0" SINGLETRAP	13188
0	VII	3'-0" SINGLETRAP	0
4	SPIV	3'-0" SINGLETRAP	VARIES
0	T2 PANEL	6" THICK PANEL	0
4	T4 PANEL	6" THICK PANEL	1740
0	T7 PANEL	6" THICK PANEL	0
1	JOINTWRAP	150' PER ROLL	
0	JOINTTAPE	14.5' PER ROLL	
TOTAL PIECES = 7			
TOTAL PANELS = 4			
HEAVIEST PICK WEIGHT = 14,886			

LOADING DISCLAIMER:

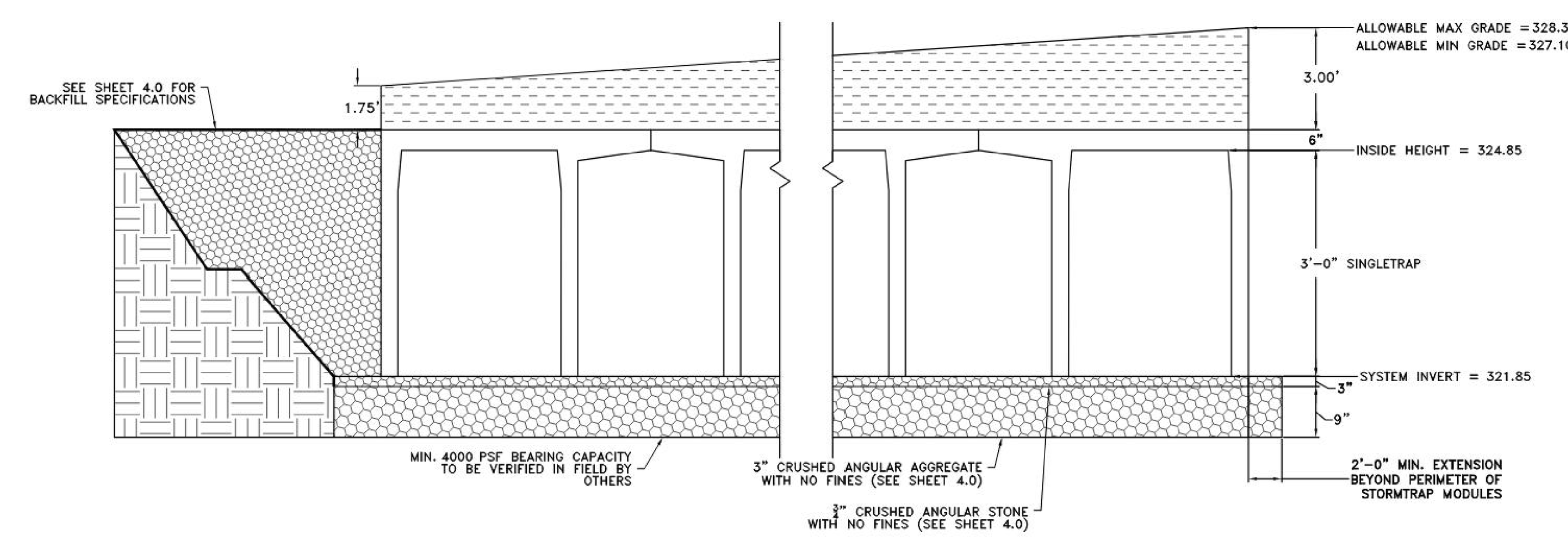
STORMTRAP IS NOT DESIGNED TO ACCEPT ANY ADDITIONAL LOADINGS FROM NEARBY STRUCTURES NEXT TO OR OVER THE TOP OF STORMTRAP. IF ADDITIONAL LOADING CONSIDERATIONS ARE REQUIRED FOR STRUCTURAL DESIGN OF STORMTRAP, PLEASE CONTACT STORMTRAP IMMEDIATELY.

TREE LOADING DISCLAIMER:

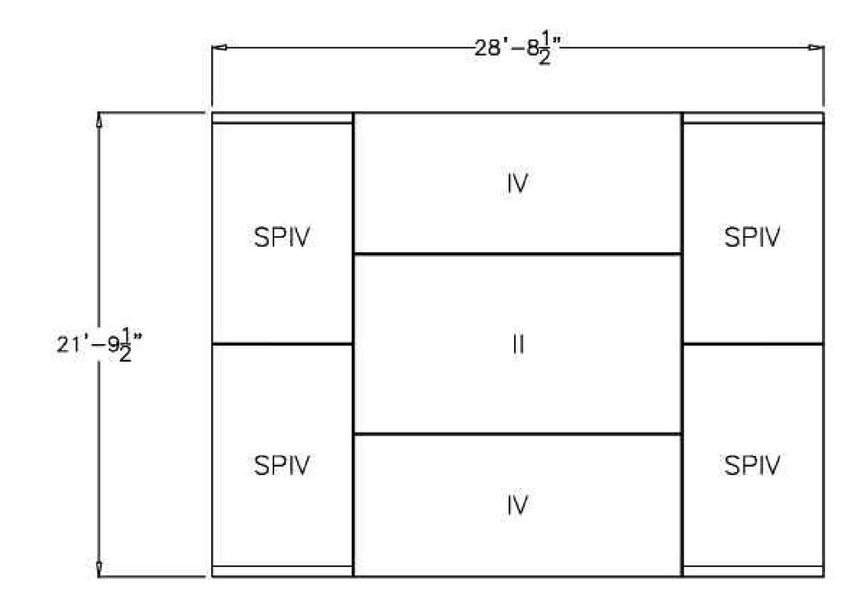
THE STORMTRAP SYSTEM HAS NOT BEEN DESIGNED TO SUPPORT THE ADDITIONAL WEIGHT OF ANY TREES. FURTHERMORE, THE ROOTS OF THE TREES MUST BE CONTAINED TO PREVENT FUTURE DAMAGE TO THE STORMTRAP SYSTEM. STORMTRAP ACCEPTS NO LIABILITY FOR DAMAGES CAUSED BY TREES OR OTHER VEGETATION PLACE AROUND OR ON TOP OF THE SYSTEM.

DESIGN CRITERIA
ALLOWABLE MAX GRADE =328.35
ALLOWABLE MIN GRADE =327.10
INSIDE HEIGHT ELEVATION =324.85
SYSTEM INVERT =321.85

NOTES:
1. DIMENSIONING OF STORMTRAP SYSTEM SHOWN BELOW ALLOW FOR A 3/4" GAP BETWEEN EACH MODULE.
2. ALL DIMENSIONS TO BE VERIFIED IN THE FIELD BY OTHERS.
3. SEE SHEET 3.0 FOR INSTALLATION SPECIFICATIONS.
4. SEE SHEETS 6.0 & 6.1 FOR SPLASH PAD DETAILS AND LAYOUT.
5. SP – INDICATES A MODULE WITH MODIFICATIONS.
6. P – INDICATES A MODULE WITH A PANEL ATTACHMENT.
7. CONTRACTORS RESPONSIBILITY TO ENSURE CONSISTENCY/ACCURACY TO FINAL ENGINEER OF RECORD PLAN SET.

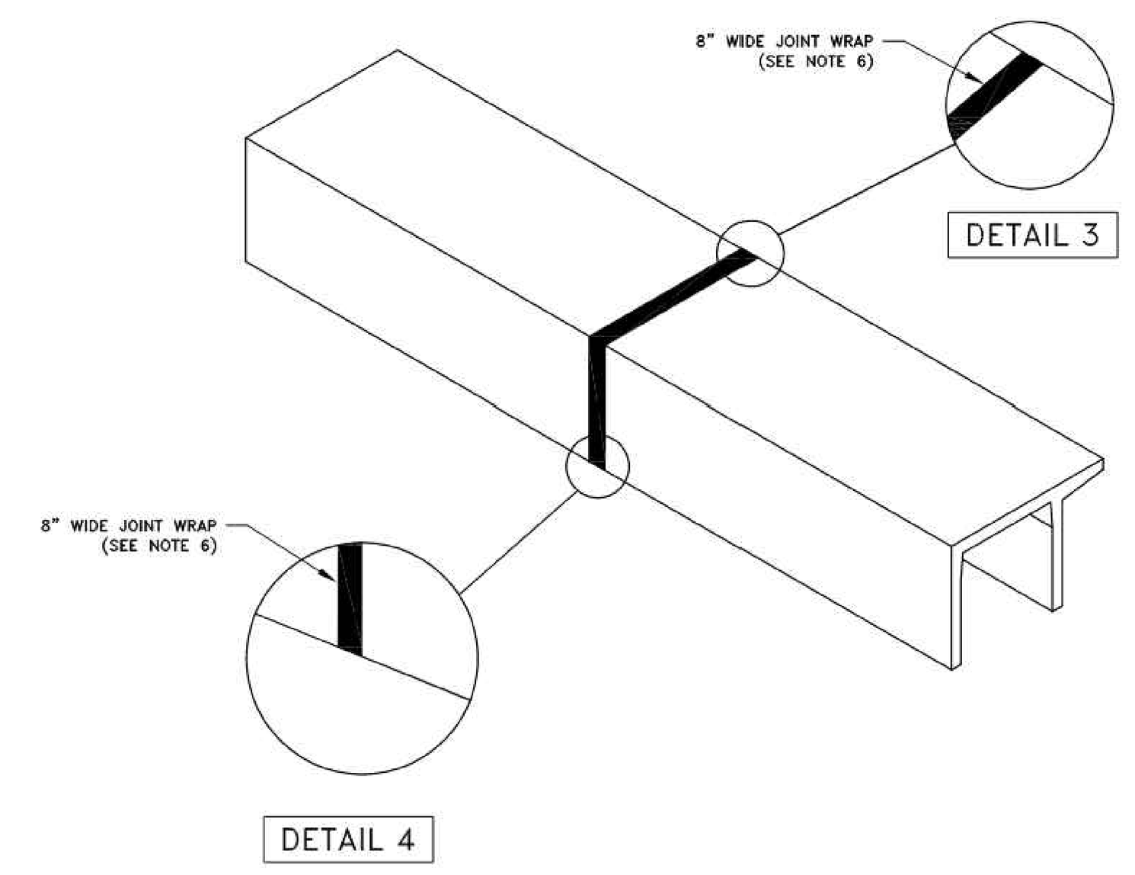


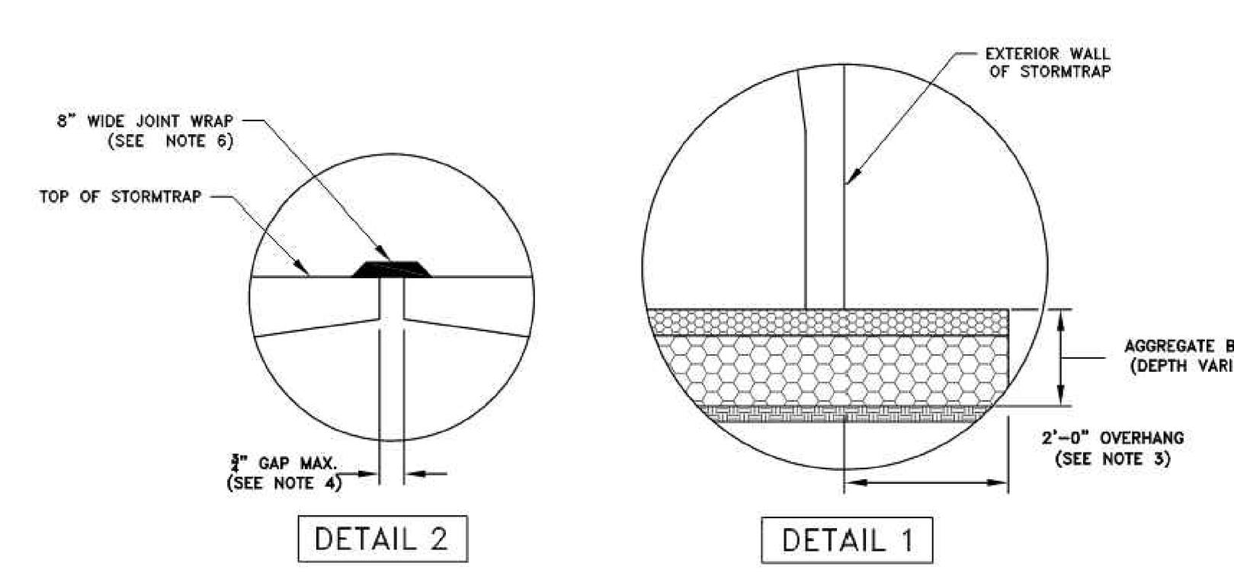
3'-0" SINGLETRAP



STORMTRAP INSTALLATION SPECIFICATIONS

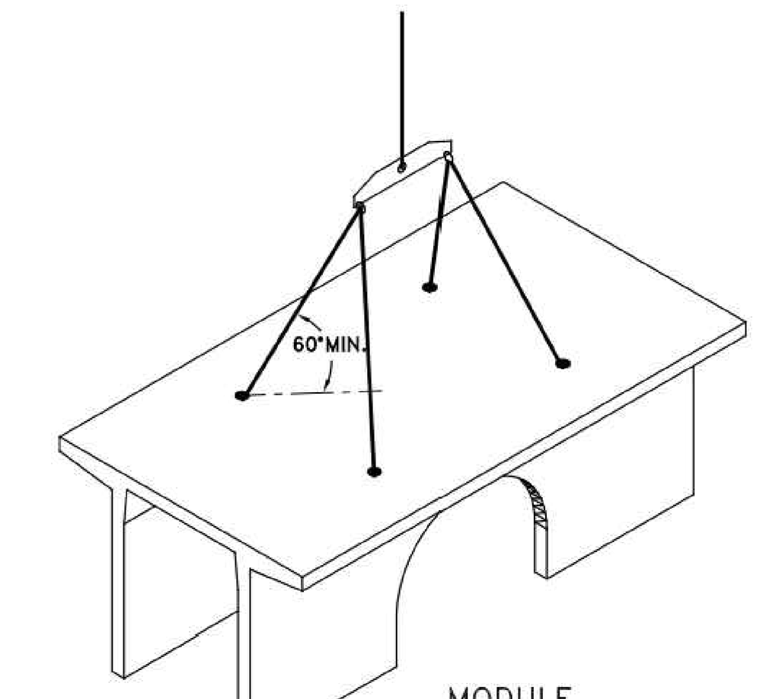
1. STORMTRAP SHALL BE INSTALLED IN ACCORDANCE WITH ASTM C891 STANDARD PRACTICE FOR INSTALLATION OF UNDERGROUND PRE-CAST CONCRETE UTILITY STRUCTURES. THE FOLLOWING ADDITIONS AND/OR EXCEPTIONS SHALL APPLY:
2. IT IS THE RESPONSIBILITY OF THE INSTALLING CONTRACTOR TO ENSURE THAT PROPER/ADEQUATE EQUIPMENT IS USED TO SET/INSTALL THE MODULES.
3. THE AGGREGATE FOUNDATION HAS BEEN DESIGNED BASED ON THE FOLLOWING ASSUMPTIONS. THESE ASSUMPTIONS WILL NEED TO BE VERIFIED BY A GEOTECHNICAL ENGINEER WHICH WILL NEED TO BE EMPLOYED BY THE OWNER.
   - 3.1. A QUALIFIED GEOTECHNICAL ENGINEER WILL BE EMPLOYED, BY OWNER, TO PROVIDE ASSISTANCE IN EVALUATING THE EXISTING SOIL CONDITIONS BELOW THE PROPOSED ENGINEERED STONE FOUNDATION. IF A STONE FOUNDATION DESIGN IS TO BE USED, THE BEARING PRESSURE OF THE SOILS BELOW THE STONE WILL NEED TO MEET OR EXCEED ALLOWABLE CAPACITY. IF THIS IS NOT POSSIBLE, THE STONE FOUNDATION MAY NOT BE AN OPTION FOR THIS LOCATION.
   - 3.2. A QUALIFIED GEOTECHNICAL ENGINEER WILL BE EMPLOYED, BY OWNER, TO EVALUATE A SOURCE OF STONE AGGREGATES THAT WILL BE PLACED ON PROPERLY COMPACTED SOILS (SEE SHEET 1.0 FOR SOIL BEARING CAPACITY REQUIREMENTS). THE AGGREGATE BASE COURSE FOR WHICH THE STORMTRAP SYSTEM WILL BEAR DIRECTLY ON SHALL CONSIST OF A 3" THICK BED OF ¾" DIAMETER ANGULAR STONE, WELL COMPACTED AND SEATED, WITH NO FINES. AND A 9" THICK BED OF 3" ANGULAR AGGREGATE (SEE SHEET 4.0 FOR FURTHER DESCRIPTION/EXPLANATION). PLEASE NOTE THAT THESE ARE ONLY MINIMUM RECOMMENDATIONS AND A QUALIFIED GEOTECHNICAL ENGINEER SHALL BE USED TO DETERMINE THE EXACT REQUIREMENTS FOR THE LOCATIONS THAT THE STORMTRAP SYSTEM IS TO BE LOCATED.
   - 3.3. THE CONTRACTOR SHALL REMOVE ANY AND ALL EXPANDABLE OR COLLAPSIBLE SOILS AT THE DIRECTION OF A QUALIFIED GEOTECHNICAL ENGINEER.
   - 3.4. THE AGGREGATE FOUNDATION SHALL BE INSTALLED SUCH THAT THE AGGREGATE EXTENDS A MINIMUM OF 2'-0" PAST THE OUTSIDE OF THE SYSTEM (SEE DETAIL 1).
   - 3.5. THE ¾" AGGREGATE SHALL BE COMPACTED USING A VIBRATING ROLLER WITH ITS' FULL DYNAMIC FORCE APPLIED TO ACHIEVE A FLAT SURFACE.
   - 3.6. DISK, DRY AND COMPACT THE TOP 8" OF THE SUBGRADE SOILS TO 95% OF THE STANDARD DRY DENSITY AND 110% OPTIMUM MOISTURE CONTENT.
   - 3.7. AGGREGATE SHALL BE GRADED WITHIN +/- ¼" OF THE GRADE SHOWN ON THE PLANS.
   - 3.8. MINIMUM SOIL BEARING CAPACITY LISTED ON SHEET 1.0 SHALL BE VERIFIED IN FIELD BY OTHERS.
4. THE STORMTRAP MODULES SHALL BE PLACED SUCH THAT THE MAXIMUM SPACE BETWEEN ADJACENT MODULES DOES NOT EXCEED ¾" (SEE DETAIL 2). IF THE SPACE EXCEEDS ¾", THE MODULES SHALL BE RESET WITH APPROPRIATE ADJUSTMENT MADE TO LINE AND GRADE TO BRING THE SPACE INTO SPECIFICATION.
5. STORMTRAP MODULES ARE NOT WATERTIGHT. IF A WATERTIGHT SOLUTION IS REQUIRED, CONTACT STORMTRAP FOR RECOMMENDATIONS. THE WATERTIGHT APPLICATION IS TO BE PROVIDED AND IMPLEMENTED BY THE CONTRACTOR. THE CONTRACTOR IS RESPONSIBLE TO ENSURE THAT THE SELECTED WATERTIGHT SOLUTION PERFORMS AS SPECIFIED BY THE MANUFACTURER.
6. ALL EXTERIOR ROOF AND EXTERIOR VERTICAL WALL JOINTS BETWEEN ADJACENT STORMTRAP MODULES SHALL BE SEALED WITH 8" WIDE PRE-FORMED, COLD-APPLIED, SELF-ADHERING ELASTOMERIC RESIN, BONDED TO A WOVEN , HIGHLY PUNCTURE RESISTANT POLYMER WRAP, CONFORMING TO ASTM C891 AND SHALL BE INTEGRATED WITH PRIMER SEALANT AS APPROVED BY STORMTRAP (SEE DETAILS 2, 3, & 4). THE JOINT WRAP DOES NOT PROVIDE A WATERTIGHT SEAL. THE SOLE PURPOSE OF THE JOINT WRAP IS TO PROVIDE A SILT AND SOIL TIGHT SYSTEM. THE ADHESIVE EXTERIOR JOINT WRAP SHALL BE INSTALLED ACCORDING TO THE FOLLOWING INSTALLATION INSTRUCTIONS:
   - 6.1. USE A BRUSH OR WET CLOTH TO THOROUGHLY CLEAN THE OUTSIDE SURFACE AT THE POINT WHERE THE JOINT WRAP IS TO BE APPLIED.
   - 6.2. A RELEASE PAPER PROTECTS THE ADHESIVE SIDE OF THE JOINT WRAP. PLACE THE ADHESIVE TAPE (ADHESIVE SIDE DOWN) AROUND THE STRUCTURE, REMOVING THE RELEASE PAPER AS YOU GO. PRESS THE JOINT WRAP FIRMLY AGAINST THE STORMTRAP MODULE SURFACE WHEN APPLYING.
7. IF THE CONTRACTOR NEEDS TO CANCEL ANY SHIPMENTS, THEY MUST DO SO 48 HOURS PRIOR TO THEIR SCHEDULED ARRIVAL AT THE JOB SITE. IF CANCELED AFTER THAT TIME, PLEASE CONTACT THE PROJECT MANAGER.
8. IF THE STORMTRAP MODULE(S) IS DAMAGED IN ANY WAY PRIOR, DURING, OR AFTER INSTALL, STORMTRAP, MUST BE CONTACTED IMMEDIATELY TO ASSESS THE DAMAGE AND TO DETERMINE WHETHER OR NOT THE MODULE(S) WILL NEED TO BE REPLACED. IF ANY MODULE ARRIVES AT THE JOBSITE DAMAGED DO NOT UNLOAD IT; CONTACT STORMTRAP, IMMEDIATELY. ANY DAMAGE NOT REPORTED BEFORE THE TRUCK IS UNLOADED WILL BE THE CONTRACTOR'S RESPONSIBILITY.
9. STORMTRAP MODULES CANNOT BE ALTERED IN ANY WAY AFTER MANUFACTURING WITHOUT WRITTEN CONSENT FROM STORMTRAP.



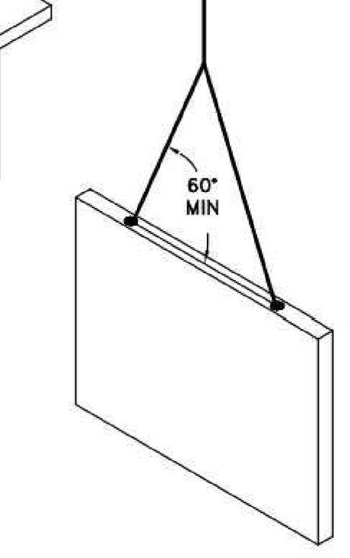


STORMTRAP MODULE LIFTING INSTALLATION NOTES

1. IT IS THE CONTRACTOR'S RESPONSIBILITY TO ENSURE THAT ALL (4) CHAINS/CABLES ARE SECURED PROPERLY TO THE LIFTING ANCHORS AND IN EQUAL TENSION WHEN LIFTING THE STORMTRAP MODULE (SEE RECOMMENDATIONS 2 & 3).
2. MINIMUM 7'-0" CHAIN/CABLE LENGTH TO BE USED TO LIFT STORMTRAP MODULES (SUPPLIED BY CONTRACTOR).
3. CONTRACTOR TO ENSURE MINIMUM LIFTING ANGLE IS 60° FROM TOP SURFACE OF STORMTRAP MODULE. SEE DETAIL.
4. IT IS UNDERSTOOD AND AGREED THAT AT ALL TIMES DURING WHICH HOISTING AND RIGGING EQUIPMENT IS BEING SUPPLIED TO THE PURCHASER, OPERATOR OF SUCH EQUIPMENT SHALL BE IN CHARGE OF HIS ENTIRE EQUIPMENT AND SHALL AT ALL TIMES BE THE JUDGE OF THE SAFETY AND PROPERTY OF ANY SUGGESTION TO HIM FROM THE SELLER, ITS AGENTS OR EMPLOYEES. PURCHASER AGREES TO SAVE, INDEMNIFY AND HOLD HARMLESS SELLER FROM ALL LOSS, CLAIMS, DEMANDS OR CAUSES OF ACTION, WHICH MAY ARISE FROM THE EXISTENCE OR OPERATION OF SAID EQUIPMENT.



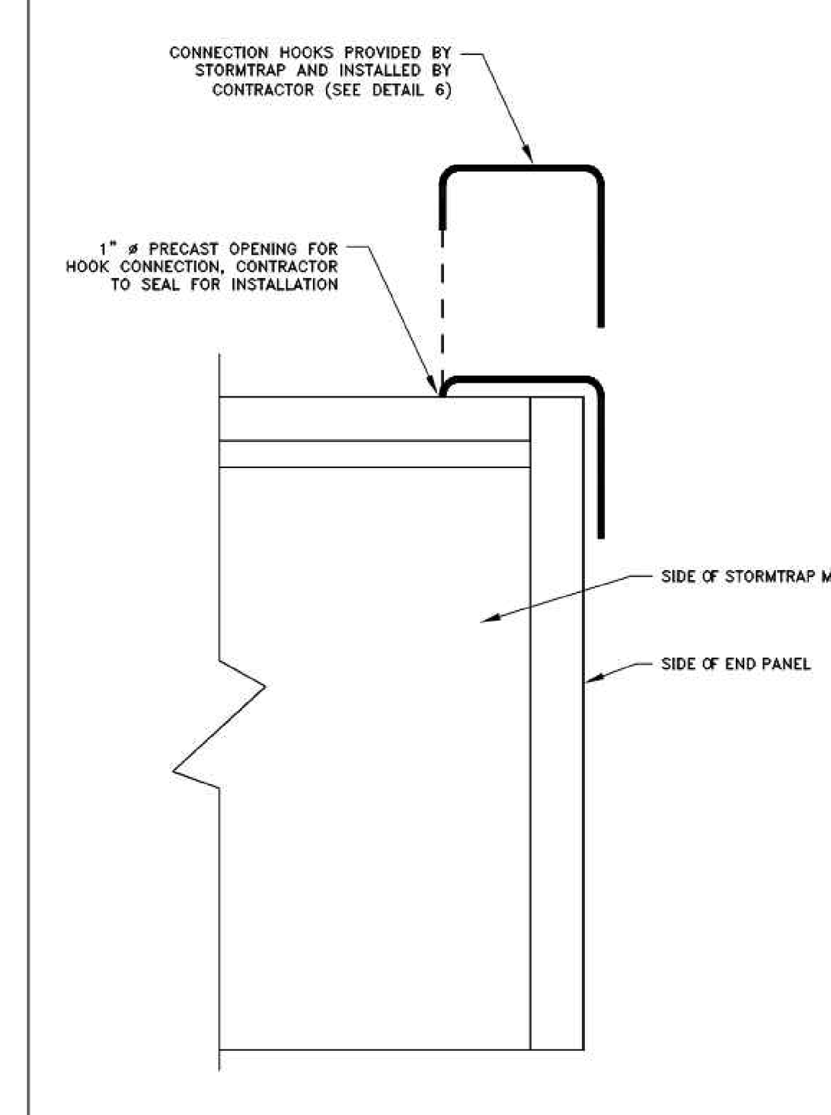
MODULE LIFTING DETAIL



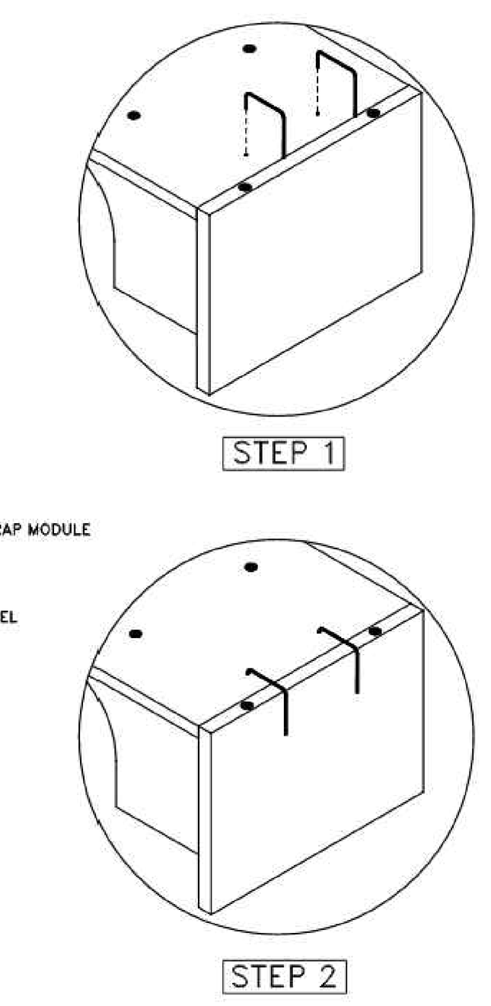
END PANEL LIFTING DETAIL

END PANEL ERECTION/INSTALLATION NOTES

1. END PANELS WILL BE SUPPLIED TO CLOSE OFF OPEN ENDS OF ROWS.
2. PANELS SHALL BE INSTALLED IN A TILT UP FASHION DIRECTLY ADJACENT TO OPEN END OF MODULE (REFER TO SHEET 2.0 FOR END PANEL LOCATIONS).
3. CONNECTION HOOKS WILL BE SUPPLIED WITH END PANELS TO SECURELY CONNECT PANEL TO ADJACENT STORMTRAP MODULE (SEE PANEL CONNECTION ELEVATION VIEW).
4. ONCE CONNECTION HOOK IS ATTACHED, LIFTING CLUTCHES MAY BE REMOVED.
5. JOINT WRAP SHALL BE PLACED AROUND PERIMETER JOINT PANEL (SEE SHEET 3.0).



PANEL CONNECTION ELEVATION VIEW



DETAIL 6

ZONE CHART		
ZONES	ZONE DESCRIPTIONS	REMARKS
ZONE 1 A	FOUNDATION AGGREGATE	#5 (¾") STONE AGGREGATE (SEE NOTE 4)
ZONE 1 B	FOUNDATION AGGREGATE (INFILTRATION NOT ALLOWED)	3" RECYCLED CRUSHED CONCRETE (SEE NOTES 5 & 6)
	FOUNDATION AGGREGATE (INFILTRATION ALLOWED)	3" STONE AGGREGATE (SEE NOTE 5)
ZONE 2	BACKFILL	UNIFIED SOILS CLASSIFICATION (GW, GP, SW, SP) OR SEE BELOW FOR APPROVED BACKFILL OPTIONS
ZONE 3	FINAL COVER OVERTOP	MATERIALS NOT TO EXCEED 120 PCF

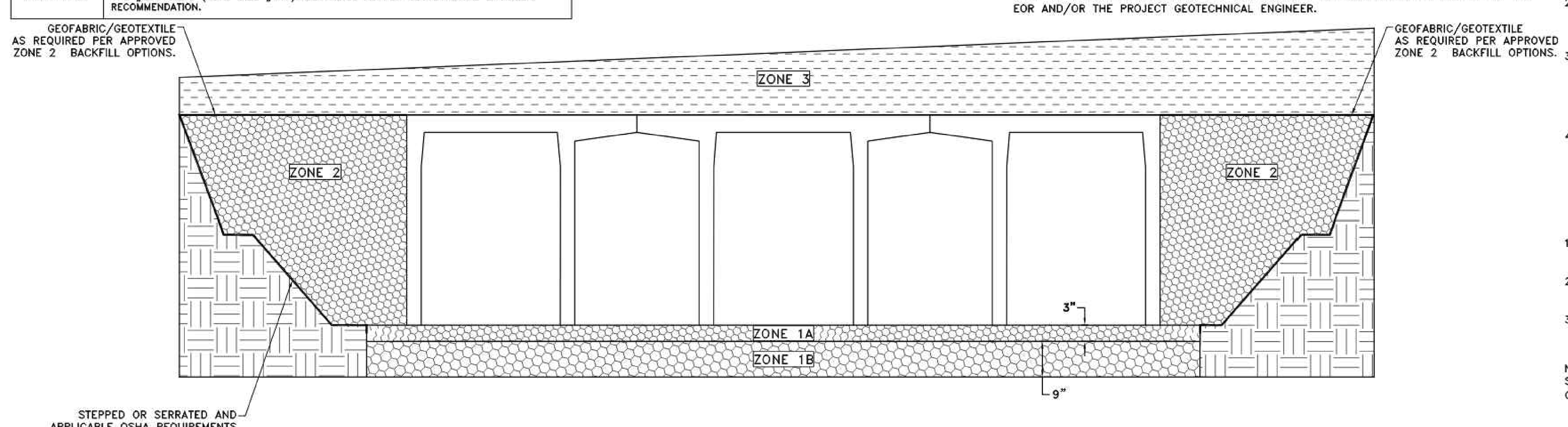
APPROVED ZONE 2 BACKFILL OPTIONS	
OPTION	REMARKS
¾" STONE AGGREGATE	THE STONE AGGREGATE SHALL CONSIST OF CLEAN AND FREE DRAINING ANGULAR MATERIAL. THE SIZE OF THIS MATERIAL SHALL HAVE 100% PASSING THE 1" SIEVE WITH 0% TO 5% PASSING THE #8 SIEVE. THIS MATERIAL SHALL BE SEPARATED FROM NATIVE MATERIAL USING GEOFABRIC AROUND THE PERIMETER OF THE BACKFILL (ASTM SIZE #57) AS DETERMINED BY THE GEOTECHNICAL ENGINEER.
SAND	IMPORTED PURE SAND IS PERMITTED TO BE USED AS BACKFILL IF IT IS CLEAN AND FREE DRAINING. THE SAND USED FOR BACKFILLING SHALL HAVE LESS THAN 40% PASSING #40 SIEVE AND LESS THAN 5% PASSING #200 SIEVE. THIS MATERIAL SHALL BE SEPARATED FROM NATIVE MATERIAL USING GEOFABRIC AROUND THE PERIMETER OF THE SAND BACKFILL.
CRUSHED CONCRETE AGGREGATE	CLEAN, FREE DRAINING CRUSHED CONCRETE AGGREGATE MATERIAL CAN BE USED AS BACKFILL FOR STORMTRAP'S MODULES. THE SIZE OF THIS MATERIAL SHALL HAVE 100% PASSING THE 1" SIEVE WITH 0% TO 5% PASSING THE #8 SIEVE. THIS MATERIAL SHALL BE SEPARATED FROM NATIVE MATERIAL USING GEOFABRIC AROUND THE PERIMETER OF THE BACKFILL.
ROAD PACK	STONE AGGREGATE 100% PASSING THE 1-1/2" SIEVE WITH LESS THAN 12% PASSING THE #200 SIEVE (ASTM SIZE #467). GEOFABRIC AS PER GEOTECHNICAL ENGINEER RECOMMENDATION.

FILL DEPTH	TRACK WIDTH	MAX VEHICLE WEIGHT (KIPS)	MAX GROUND PRESSURE
12"	12"	51.8	1690 psf
	18"	56.1	1219 psf
	24"	68.1	1111 psf
	30"	76.7	1000 psf
	36"	85.0	924 psf

NOTE:
TRACK LENGTH NOT TO EXCEED 15'-4".
ONLY TWO TRACKS PER VEHICLE.

STORMTRAP ZONE INSTALLATION SPECIFICATIONS/PROCEDURES

1. THE FILL PLACED AROUND THE STORMTRAP MODULES MUST DEPOSITED ON BOTH SIDES AT THE SAME TIME AND TO APPROXIMATELY THE SAME ELEVATION. AT NO TIME SHALL THE FILL BEHIND ONE SIDE WALL BE MORE THAN 2'-0" HIGHER THAN THE FILL ON THE OPPOSITE SIDE. BACKFILL SHALL EITHER BE COMPACTED AND/OR VIBRATED TO ENSURE THAT BACKFILL AGGREGATE/STONE MATERIAL IS WELL SEATED AND PROPERLY INTER LOCKED. CARE SHALL BE TAKEN TO PREVENT ANY WEDGING ACTION AGAINST THE STRUCTURE, AND ALL SLOPES WITHIN THE AREA TO BE BACKFILLED MUST BE STEPPED OR SERRATED TO PREVENT WEDGING ACTION. CARE SHALL ALSO BE TAKEN AS NOT TO DISRUPT THE JOINT WRAP FROM THE JOINT DURING THE BACKFILL PROCESS. BACKFILL MUST BE FREE-DRAINING MATERIAL. SEE ZONE 2 BACKFILL CHART ON THIS PAGE FOR APPROVED BACKFILL OPTIONS. IF NATIVE EARTH IS SUSCEPTIBLE TO MIGRATION, CONFIRM WITH GEOTECHNICAL ENGINEER AND PROVIDE PROTECTION AS REQUIRED (PROVIDED BY OTHERS).
2. DURING PLACEMENT OF MATERIAL OVERTOP THE SYSTEM, AT NO TIME SHALL MACHINERY BE USED OVERTOP THAT EXCEEDS THE DESIGN LIMITATIONS OF THE SYSTEM. WHEN PLACEMENT OF MATERIAL OVERTOP, MATERIAL SHALL BE PLACED SUCH THAT THE DIRECTION OF PLACEMENT IS PARALLEL WITH THE OVERALL LONGITUDINAL DIRECTION OF THE SYSTEM WHENEVER POSSIBLE.
3. THE FILL PLACED OVERTOP THE SYSTEM SHALL BE PLACED AT A MINIMUM OF 6" LIFTS. AT NO TIME SHALL MACHINERY OR VEHICLES GREATER THAN THE DESIGN HS-20 LOADING CRITERIA TRAVEL OVERTOP THE SYSTEM WITHOUT THE MINIMUM DESIGN COVERAGE. IF TRAVEL IS NECESSARY OVERTOP THE SYSTEM PRIOR TO ACHIEVING THE MINIMUM DESIGN COVER, IT MAY BE NECESSARY TO REDUCE THE ULTIMATE LOAD/BURDEN OF THE OPERATING MACHINERY SO AS TO NOT EXCEED THE DESIGN CAPACITY OF THE SYSTEM. IN SOME CASES, IN ORDER TO ACHIEVE REQUIRED COMPACTION, HAND COMPACTION MAY BE NECESSARY IN ORDER NOT TO EXCEED THE ALLOTTED DESIGN LOADING. SEE CHART FOR TRACKED VEHICLE WIDTH AND ALLOWABLE MAXIMUM PRESSURE PER TRACK.
4. FREE DRAINING AGGREGATE – 80% AGGREGATE RETAINED ON ½" SIEVE MAJORITY OF AGGREGATE SIZE BETWEEN ½" AND 1" ONLY 5% OF MATERIAL PASSING #⅜ SIEVE.
5. FREE DRAINING, NO FINES, 3" AGGREGATE – MAJORITY OF STONE SIZE IN BETWEEN 1½" AND 3" – VERY SIMILAR TO AASHTO (#1, #2, #3, & #24) STONE AGGREGATE GRADATION.
6. CRUSHED CONCRETE AGGREGATE IS KNOWN TO REACT WITH WATER AND CAN INCREASE THE PH VALUE OF THE GROUND WATER. PRIOR TO USING CRUSHED CONCRETE AGGREGATE IN ZONE 1B IT IS IMPERATIVE THAT THE USE OF SUCH MATERIAL SHALL BE VERIFIED BY THE EOR AND/OR THE PROJECT GEOTECHNICAL ENGINEER.



BACKFILL DETAIL

RECOMMENDED ACCESS OPENING SPECIFICATION

1. A TYPICAL ACCESS OPENING FOR THE STORMTRAP SYSTEM ARE 2'-0" IN DIAMETER. ACCESS OPENINGS LARGER THAN 3'-0" IN DIAMETER NEED TO BE APPROVED BY STORMTRAP. ALL OPENINGS MUST RETAIN AT LEAST 1'-0" OF CLEARANCE FROM THE END OF THE STORMTRAP MODULE UNLESS NOTED OTHERWISE. ALL ACCESS OPENINGS TO BE LOCATED ON INSIDE LEG UNLESS OTHERWISE SPECIFIED.
2. PLASTIC COATED STEEL STEPS PRODUCED BY M.A. INDUSTRIES PART #PS3-PFC OR APPROVED EQUAL (SEE STEP DETAIL) ARE PROVIDED INSIDE ANY MODULE WHERE DEEMED NECESSARY. THE HIGHEST STEP IN THE MODULE IS TO BE PLACED A DISTANCE OF 1'-0" FROM THE INSIDE EDGE OF THE STORMTRAP MODULES. ALL ENSUING STEPS SHALL BE PLACED AT A DISTANCE BETWEEN 10" MIN AND 14" MAX BETWEEN THEM. STEPS MAY BE MOVED OR ALTERED TO AVOID OPENINGS OR OTHER IRREGULARITIES IN THE MODULE.
3. STORMTRAP LIFTING INSERTS MAY BE RELOCATED TO AVOID INTERFERENCE WITH ACCESS OPENINGS OR THE CENTER OF GRAVITY OF THE MODULE AS NEEDED.
4. STORMTRAP ACCESS OPENINGS MAY BE RELOCATED TO AVOID INTERFERENCE WITH INLET AND/OR OUTLET PIPE OPENINGS SO PLACEMENT OF STEPS IS ATTAINABLE.
5. ACCESS OPENINGS SHOULD BE LOCATED IN ORDER TO MEET THE APPROPRIATE MUNICIPAL REQUIREMENTS. STORMTRAP RECOMMENDS AT LEAST TWO ACCESS OPENINGS PER SYSTEM FOR ACCESS AND INSPECTION.
6. USE PRECAST ADJUSTING RINGS AS NEEDED TO MEET GRADE. STORMTRAP RECOMMENDS FOR COVER OVER 2' TO USE PRECAST BARREL OR CONE SECTIONS. (PROVIDED BY OTHERS)

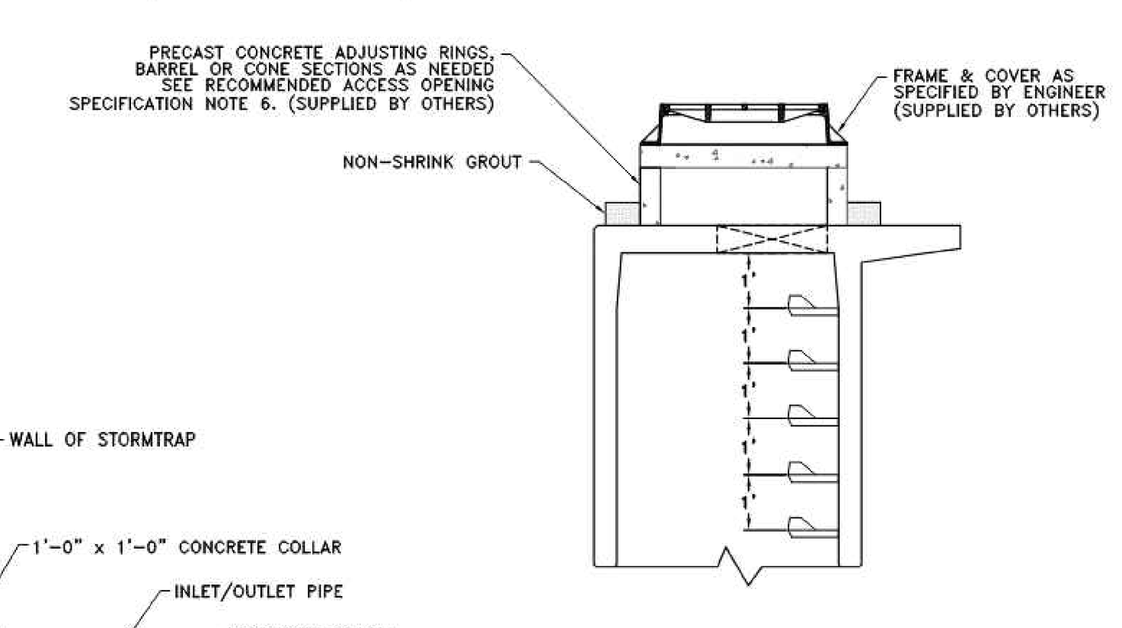
RECOMMENDED PIPE OPENING SPECIFICATION

1. MINIMUM EDGE DISTANCE FOR AN OPENING ON THE OUTSIDE WALL SHALL BE NO LESS THAN 1'-0".
2. MAXIMUM OPENING SIZE TO BE DETERMINED BY THE MODULE HEIGHT. PREFERRED OPENING SIZE IS ø 36" OR LESS. ANY OPENING NEEDED THAT DOES NOT FIT THIS CRITERIA SHALL BE BROUGHT TO THE ATTENTION OF STORMTRAP FOR REVIEW.
3. CONNECTING PIPES SHALL BE INSTALLED WITH A 1'-0" CONCRETE COLLAR, AND AN AGGREGATE CRADLE FOR AT LEAST ONE PIPE LENGTH (SEE PIPE CONNECTION DETAIL). A STRUCTURAL GRADE CONCRETE OR HIGH STRENGTH, NON-SHRINK GROUT WITH A MINIMUM 28 DAY COMPRESSIVE STRENGTH OF 3000 PSI SHALL BE USED.
4. THE ANNULAR SPACE BETWEEN THE PIPE AND THE HOLE SHALL BE FILLED WITH HIGH STRENGTH NON-SHRINK GROUT.

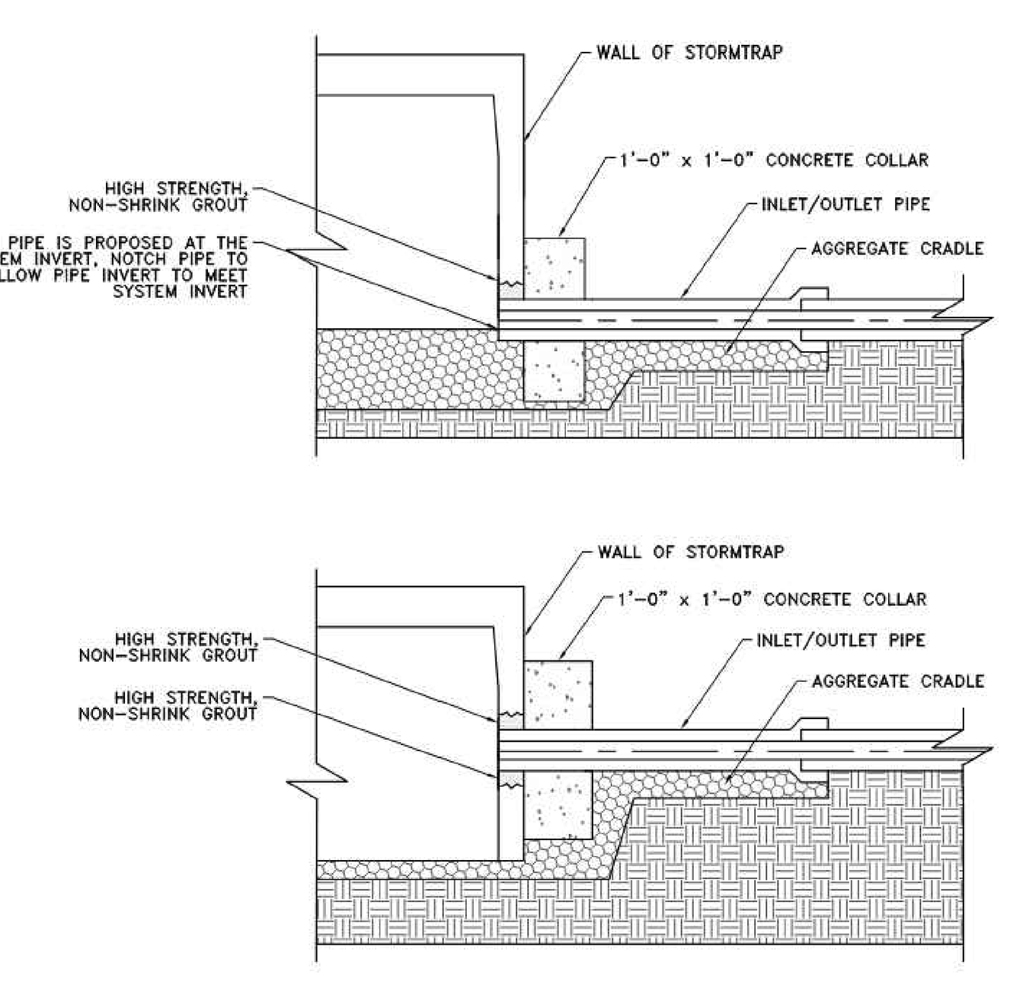
RECOMMENDED PIPE INSTALLATION INSTRUCTIONS

1. CLEAN AND LIGHTLY LUBRICATE ALL OF THE PIPE TO BE INSERTED INTO STORMTRAP.
2. IF PIPE IS CUT, CARE SHOULD BE TAKEN TO ALLOW NO SHARP EDGES. BEVEL AND LUBRICATE LEAD END OF PIPE.
3. ALIGN CENTER OF PIPE TO CORRECT ELEVATION AND INSERT INTO OPENING.

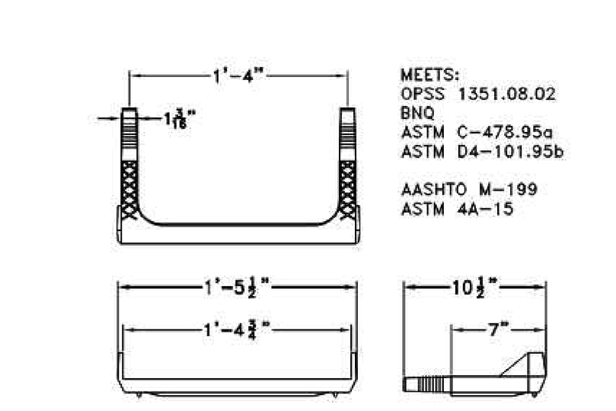
NOTE: ALL ANCILLARY PRODUCTS/SPECIFICATIONS RECOMMENDED AND SHOWN ON THIS SHEET ARE RECOMMENDATIONS ONLY AND SUBJECT TO CHANGE PER THE INSTALLING CONTRACTOR AND/OR PER LOCAL MUNICIPAL CODE/REQUIREMENTS.



RISER / STAIR DETAIL



PIPE CONNECTION DETAIL



STEP DETAIL

*** NOTICE *** 03-25-2022

DUE TO CURRENT INCONSISTENCIES IN THE 16" STEP SUPPLY, STORMTRAP MAY SUBSTITUTE THE 16" STEP WITH THE CLOSEST ALTERNATIVE LENGTH STEP UNTIL THE SUPPLY CHAIN ISSUE IS RESOLVED.

STORMTRAP STORMWATER MANAGEMENT SYSTEM

NOT TO SCALE

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Notes

0	ISSUED FOR PERMIT	LM	CL	2023.02.22
Issued/Revision		By	Appd	YYYY.MM.DD
File Name: DET01.dwg	TD	LM	TG	02/17/23
	Dwn.	Dsgn.	Chkd.	YYYY.MM.DD

Permit/Seal

Client/Project Logo

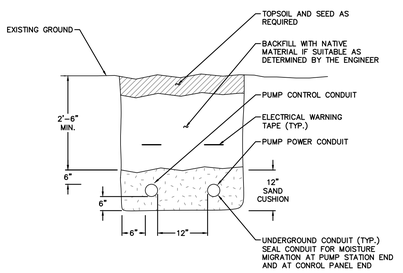
Client/Project
Pfizer Global Research and Development

Hamilton BiOS #2 Addition

Pearl River, NY

Title
SITE DETAILS

Project No. 20111246.S4N
Scale NOT TO SCALE
Revision 0
Drawing No. CD-503

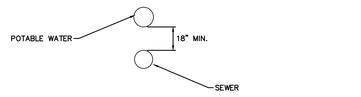


UNDERGROUND CONDUIT TRENCH NOTES

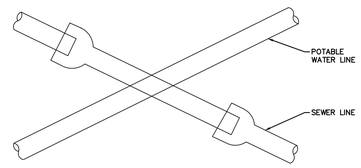
1. INSTALL ELECTRICAL MARKING TAPE ABOVE THE ELECTRIC CONDUIT AND BURIED ELECTRIC WIRING.

UNDERGROUND CONDUIT TRENCH DETAIL

NOT TO SCALE



SECTION VIEW



PLAN VIEW

SEWER AND WATER CROSSING NOTES

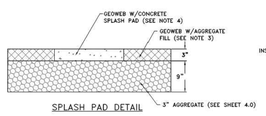
1. SEWER JOINTS SHALL BE EQUIDISTANT FROM AND LOCATED AS FAR AS POSSIBLE AWAY FROM THE WATER LINE
2. IF THE VERTICAL SEPARATION BETWEEN THE BOTTOM OF THE WATER MAIN AND THE TOP OF THE SEWER IS LESS THAN 18 INCHES (WATER MAIN IS ABOVE SEWER), USE ONE OF THE FOLLOWING PROCEDURES: A) THE WATER MAIN SHALL BE RECONSTRUCTED FOR A DISTANCE OF 10 FEET ON EACH SIDE OF SEWER WITH RUBBER-GASKETED MECHANICAL JOINT PIPE ONE FULL LENGTH WATER MAIN SHOULD BE CENTERED OVER SEWER, B) CONSTRUCT BOTH THE WATER & SEWER PIPE OF RUBBER-GASKETED, CEMENT-LINED DUCTILE IRON PIPE OR EQUIVALENT AND PRESSURE TEST BOTH PIPES, OR C) ENCASE BOTH PIPES IN CONCRETE.

CROSSING OF SEWER & POTABLE WATER LINES

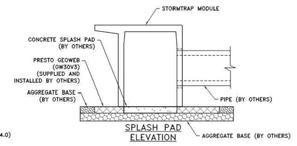
NOT TO SCALE

NOTES:

1. THE APPROVED GEOWEB SHALL BE PRESTO GEOWEB (GW30V3). THE GEOWEB NOMINAL DIMENSIONS SHALL BE 8-FT x 25-FT.
2. THE CONCRETE SPLASH PAD AND GEOWEB SHALL BE INSTALLED PRIOR TO INSTALLATION OF THE STORMTRAP MODULES.
3. THE GEOWEB INFILL MATERIAL SHALL BE #5 AGGREGATE.
4. THE CONCRETE SPLASH PAD SHALL BE INSTALLED WITHIN THE GEOWEB AND IS REQUIRED AT ALL PIPE ENTRY LOCATIONS.
5. THE GEOWEB EDGE SHALL BE INSTALLED 1-FT BEYOND THE OUTER PERIMETER OF THE STORMTRAP SYSTEM.
6. THE GEOWEB LONGITUDINAL DIMENSION (25-FT) SHALL BE INSTALLED PARALLEL TO THE STORMTRAP LEGS.
7. THE CONCRETE SPLASH PAD AND GEOWEB SHALL BE CENTERED AT THE PIPE PENETRATION.
8. REFER TO SPLASH PAD LAYOUT FOR CONCRETE SPLASH PAD DIMENSIONS.
9. IF ANY PRODUCT OTHER THAN PRESTO GEOWEB IS TO BE INSTALLED, THE PRODUCT MANUFACTURER IS REQUIRED TO SUBMIT A LETTER STATING THAT THE PRODUCT IS EQUAL OR BETTER THEN PRESTO GEOWEB, BOTH IN PERFORMANCE AND IN STRUCTURAL CAPACITY.
10. ALL GEOWEB AND SPLASH PADS TO BE SUPPLIED AND INSTALLED BY CONTRACTOR.
11. A CONCRETE SPLASH PAD IS REQUIRED AT ANY ACCESS OPENING THAT HAS AN OPEN GRATE FOR DRAINAGE. THE CONCRETE SPLASH PAD SHALL EXTEND BETWEEN THE UNIT LEG WALLS AND 3'-0" FROM THE CENTERLINE OF THE OPENING ON BOTH SIDES UNLESS SPECIFIED OTHERWISE ON THE SPLASH PAD LAYOUT. GEOWEB IS NOT REQUIRED UNDER ACCESS OPENINGS.

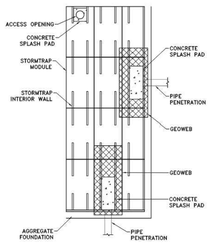


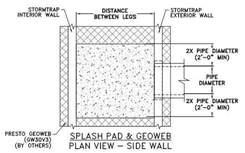
SPLASH PAD DETAIL



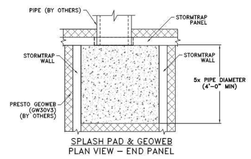
SPLASH PAD ELEVATION

SPLASH PAD CONFIGURATION



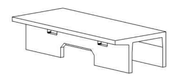


SPLASH PAD & GEOWEB PLAN VIEW – SIDE WALL



SPLASH PAD & GEOWEB PLAN VIEW – END PANEL

TYPE II



TYPE IV

TYPE IV END PANEL

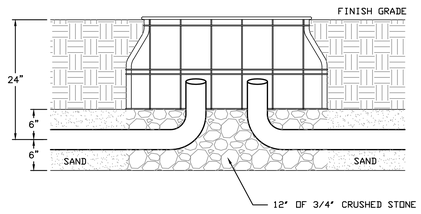
NOTES:

1. OPENING LOCATIONS AND SHAPES MAY VARY.
2. SP – INDICATES A MODULE WITH MODIFICATIONS.
3. P – INDICATES A MODULE WITH A PANEL ATTACHMENT.
4. POCKET WINDOW OPENINGS ARE OPTIONAL.

STORMTRAP STORMWATER MANAGEMENT SYSTEM (CONT.)

NOT TO SCALE

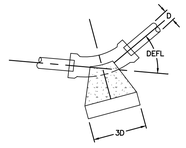
PROVIDE IN-GROUND HANDHOLE BOX:
- HIGH DENSITY REINFORCED CONCRETE
- H-20 RATING
- STEEL CHECKER COVER, BOLT DOWN
- 'ELECTRIC' OR 'TELCOM' ENGRAVED IN COVER



HANDHOLE

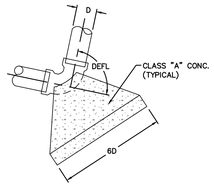
NOT TO SCALE

PIPE DIA. (INCHES)	MINIMUM THRUST BLOCK VOLUME (CUBIC YARDS)
4	0.2
6	0.25
8	0.3
10	0.35
12	0.4
16	0.7

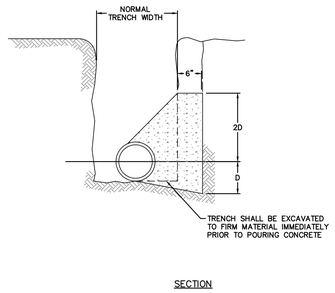


PLAN ELBOW – DEFL. LESS THAN 50

PIPE DIA. (INCHES)	MINIMUM THRUST BLOCK VOLUME (CUBIC YARDS)
4	0.25
6	0.3
8	0.5
10	0.7
12	1.0
16	1.6



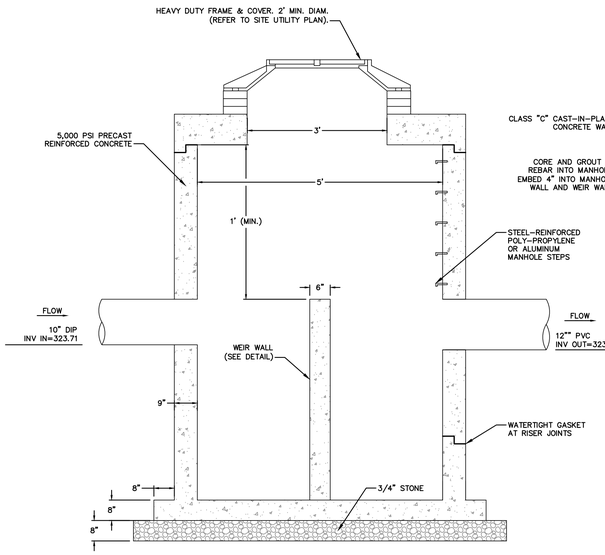
PLAN ELBOW – DEFL. MORE THAN 50



SECTION

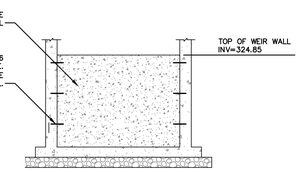
CONCRETE THRUST BLOCKS

NOT TO SCALE

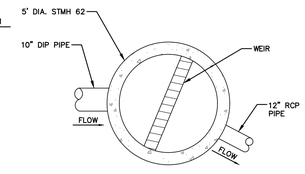


OUTLET CONTROL STRUCTURE STMH 7

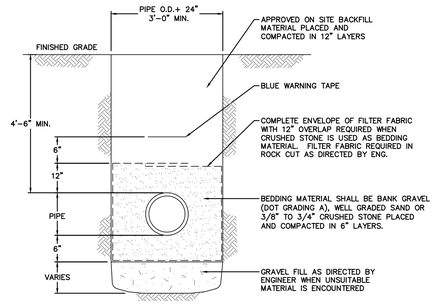
NOT TO SCALE



WEIR DETAIL



PLAN



WATER TRENCH SECTION

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Notes

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Issued/Revision		By	Appd	YYYY.MM.DD
File Name: DET01.dwg		TD	LM	TG	02/17/23
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SITE DETAILS

Project No. 20111246.S4N

Scale NOT TO SCALE

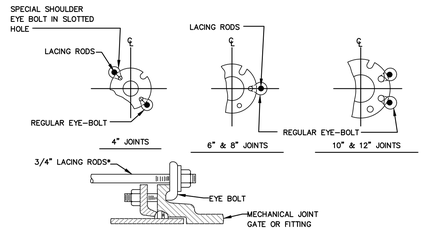
Revision 0

Drawing No. CD-504

File Path: J:\DWG\P2011\12465\S4N\Civil\Plan\20111246S4N_DET01.dwgLayout: CD-504 Plotted: Tuesday, February 21, 2023 - 10:50 AM User: TDAVIS
Plotter: NONE CTB File: FO 2008 MONO.CTB

ORIGINAL SHEET - ARCH E1

THRUST RESTRAINT – LACING METHOD



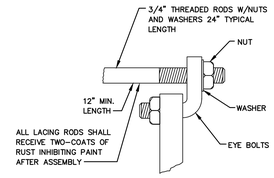
PIPE SIZE	No. LACING RODS
4",6" & 8"	2 – 3/4"ø
10" & 12"	4 – 3/4"ø

* STANDARD LENGTHS ARE 6' & 10'. COUPLINGS MAY BE USED FOR LONGER LENGTHS.

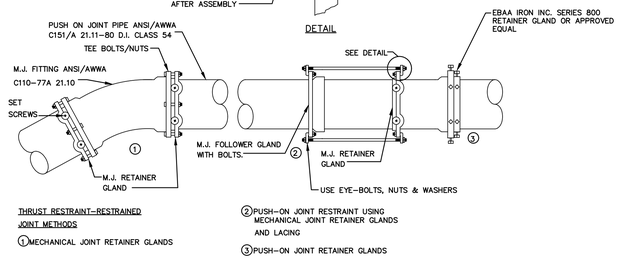
NOTES:

1. NUMBER OF LACING RODS IS BASED ON MAXIMUM PRESSURE OF 150 P.S.I. IN MAIN.
2. EYE–BOLTS AND LACING RODS ARE TO BE FABRICATED FROM A–36 STEEL.
3. STEEL LACING RODS SHALL HAVE A YIELD STRESS OF NOT LESS THAN 36,000 P.S.I.
4. EYE–BOLTS SHALL HAVE A MINIMUM TENSILE STRENGTH OF 7,000 LBS. EACH.
5. 3/4" LACING RODS AND EYEBOLTS ARE UNSUITABLE FOR PIPELINES 16 INCHES IN DIAMETER AND LARGER. RESTRAINT FOR 16 INCHES AND LARGER PIPES MUST BE DESIGNED ON A CASE–BY–CASE BASIS AND APPROVED BY THE UTILITY.

MECHANICAL JOINT LACING DETAIL



DETAIL



THRUST RESTRAINT–RESTRAINED JOINT METHODS

(1) MECHANICAL JOINT RETAINER GLANDS

(2) PUSH–ON JOINT RESTRAINT USING MECHANICAL JOINT RETAINER GLANDS AND LACING

(3) PUSH–ON JOINT RETAINER GLANDS

TYPICAL RESTRAINED JOINTS

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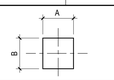
SITE DETAILS

Project No.	Scale
20111246.S4N	NOT TO SCALE
Revision 0	Drawing No. CD-505

FOOTING SCHEDULE (ALLOWABLE SOIL BEARING PRESSURE = 4,000 PSF)				
MARK	SIZE	DEPTH	REINFORCING EACH WAY	REMARKS
F3	3'-0" x 3'-0"	12"	(4) #5	
F4	4'-0" x 4'-0"	12"	(5) #5	
F5	5'-0" x 5'-0"	12"	(6) #5	
F11A	11'-0" x 31'-0"	18"	BTM: #6@12" O.C. TOP: #5@12" O.C.	

PIER SCHEDULE					
MARK	SIZE		VERTICAL REINFORCING	TIES	REMARKS
	A	B			
P1	2'-0"	2'-0"	(4) #8	(3) #4 @ 3" O.C. TOP; REMAINDER ARE #4 @ 12" O.C.	
P2	2'-0"	15'-0"	#8@12" O.C.	(3) #4 @ 3" O.C. TOP; REMAINDER ARE #4 @ 12" O.C.	

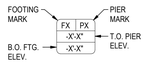


1 S-100 FOUNDATION/ SLAB PLAN

1/8" = 1'-0"

FOUNDATION PLAN NOTES:

1. FLOOR SLAB TO BE 6" NORMAL WEIGHT CONCRETE SLAB-ON-GRADE REINFORCED WITH 6x6-W2.9xW2.9 WWF. TOP OF SLAB ELEVATION = 0'-0" (USGS 332.90') TO MATCH EXISTING.
2. FLOOR SLAB TO BE 12" NORMAL WEIGHT CONCRETE SLAB-ON-GRADE REINFORCED WITH #5@12" O.C. TOP AND BOTTOM, TOP OF SLAB ELEVATION = 0'-0" (USGS 332.90') TO MATCH EXISTING.
3. -X'-X" INDICATES BOTTOM OF FOOTING ELEVATION.
4. SEE DRAWING S-400 FOR TYPICAL CONCRETE DETAILS.
5. INDICATES TOP OF FOUNDATION WALL IS 0'-8" BELOW TOP OF SLAB AT DOOR OPENINGS.
6. NEW FOOTINGS TO MATCH THE BOTTOM OF EXISTING FOOTINGS.
7. "BL ELEV" INDICATES THE TOP OF BRICK LEDGE ELEVATION.
8. -X'-X" INDICATES PRESUMED BOTTOM OF EXISTING FOOTING.



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STATE OF NEW YORK
MICHAEL JOSEPH SIGNORELLI
074808
LICENSED PROFESSIONAL ENGINEER

Client/Project Logo

Pfizer

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Pearl River, NY

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FOUNDATION PLAN

Project No. 191501254 | Scale As indicated
Revision 0 | Drawing No. S-100

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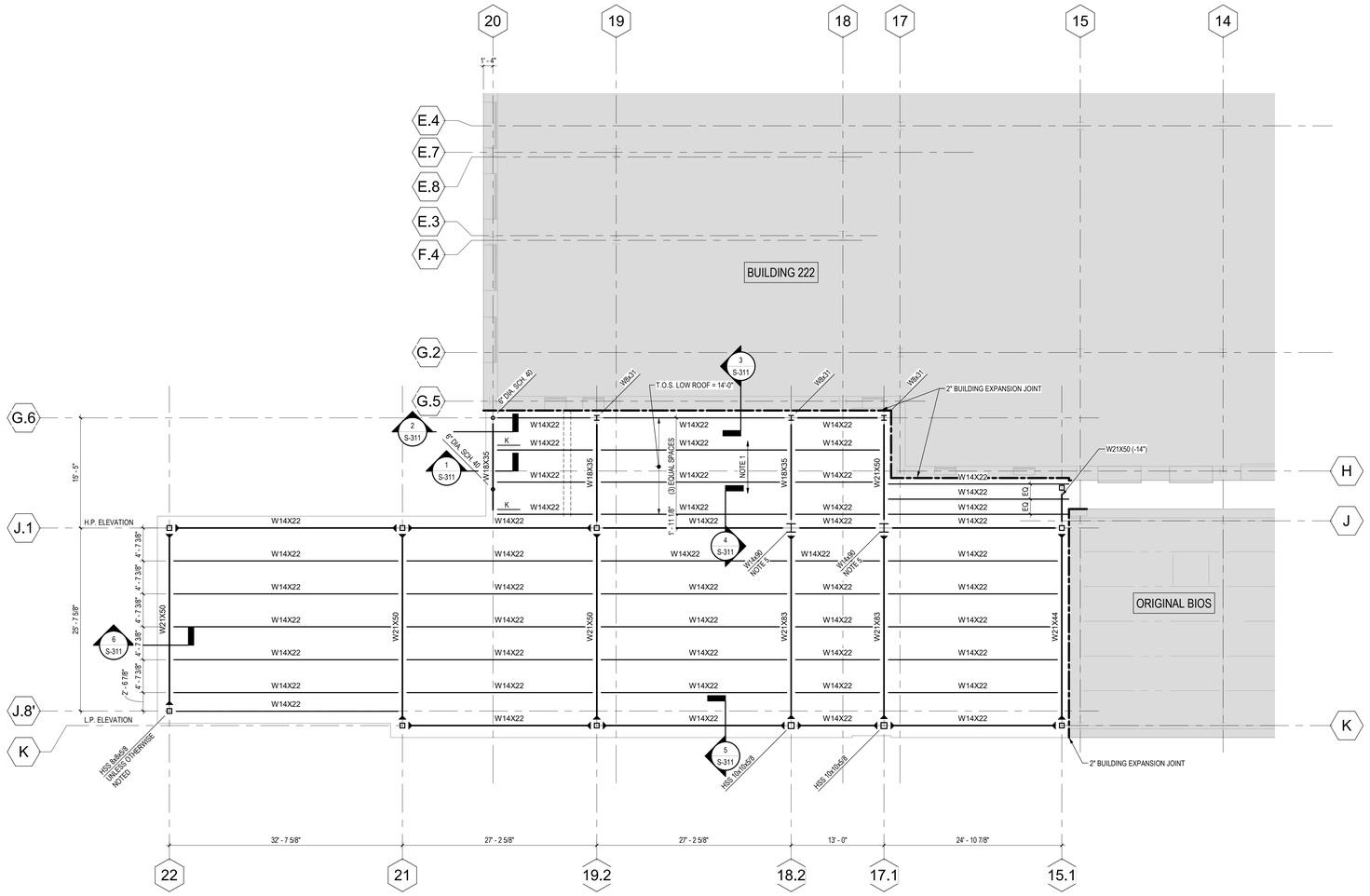
ORIGINAL SHEET - ARCH E1



1 S-200 ROOF FRAMING PLAN

1/8" = 1'-0"

ROOF FRAMING NOTES:

1. ROOF CONSTRUCTION SHALL BE 1 1/2" x 18 GA. WIDE RIB GALVANIZED METAL ROOF DECK.
2. TOP OF STEEL ELEVATION NOTED ON PLAN REFERENCED FROM FINISHED FIRST FLOOR ELEVATION 0'-0" (USGS ELEVATION 332.90')
3. BEAMS ARE EVENLY SPACED BETWEEN COLUMNS UNLESS OTHERWISE NOTED.
4. MC-X INDICATES MOMENT CONNECTION.
5. TOP OF W14x90 COLUMNS ARE 20' -2". PROVIDE 22"x22"x1" 1/2". CAP PLATE TO RECEIVE PEDESTRIAN BRIDGE COLUMNS.
6. INDICATES VERTICAL BRACE.
7. SEE DRAWING SXXX FOR TYPICAL STEEL DETAILS.
8. "K" INDICATES HUNG LINTEL KICKER LOCATION ALONG COLUMNN LINE 20.

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			02/01/23
			YYYY.MM.DD

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STATE OF NEW YORK
MICHAEL JOSEPH SHANNON
074508
LICENSED PROFESSIONAL ENGINEER

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Pfizer Global Research and Development

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Pearl River, NY

Title
ROOF FRAMING PLAN

Project No. 191501254
Scale 1/8" = 1'-0"
Revision 0
Drawing No. S-200

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ORIGINAL SHEET - ARCH E1

LIFE SAFETY LEGEND

Symbol	Description
(red dash-dot line)	ONE HOUR RATED PARTITION
(red dash-double-dot line)	TWO HOUR RATED PARTITION
EXIT PATH 1 (dashed arrow)	TRAVEL DISTANCE
CPT	COMMON PATH OF TRAVEL
(filled circle)	EGRESS SYMBOL
FE	FIRE EXTINGUISHER
FEC	FIRE EXTINGUISHER CABINET
(exit light symbols)	SINGLE OR DOUBLE FACE EXIT LIGHT (DIRECTIONAL ARROWS AS INDICATED ON DRAWINGS IF REQUIRED)

EXIT CAPACITY:

EXIT 1	
36	0.2
180	

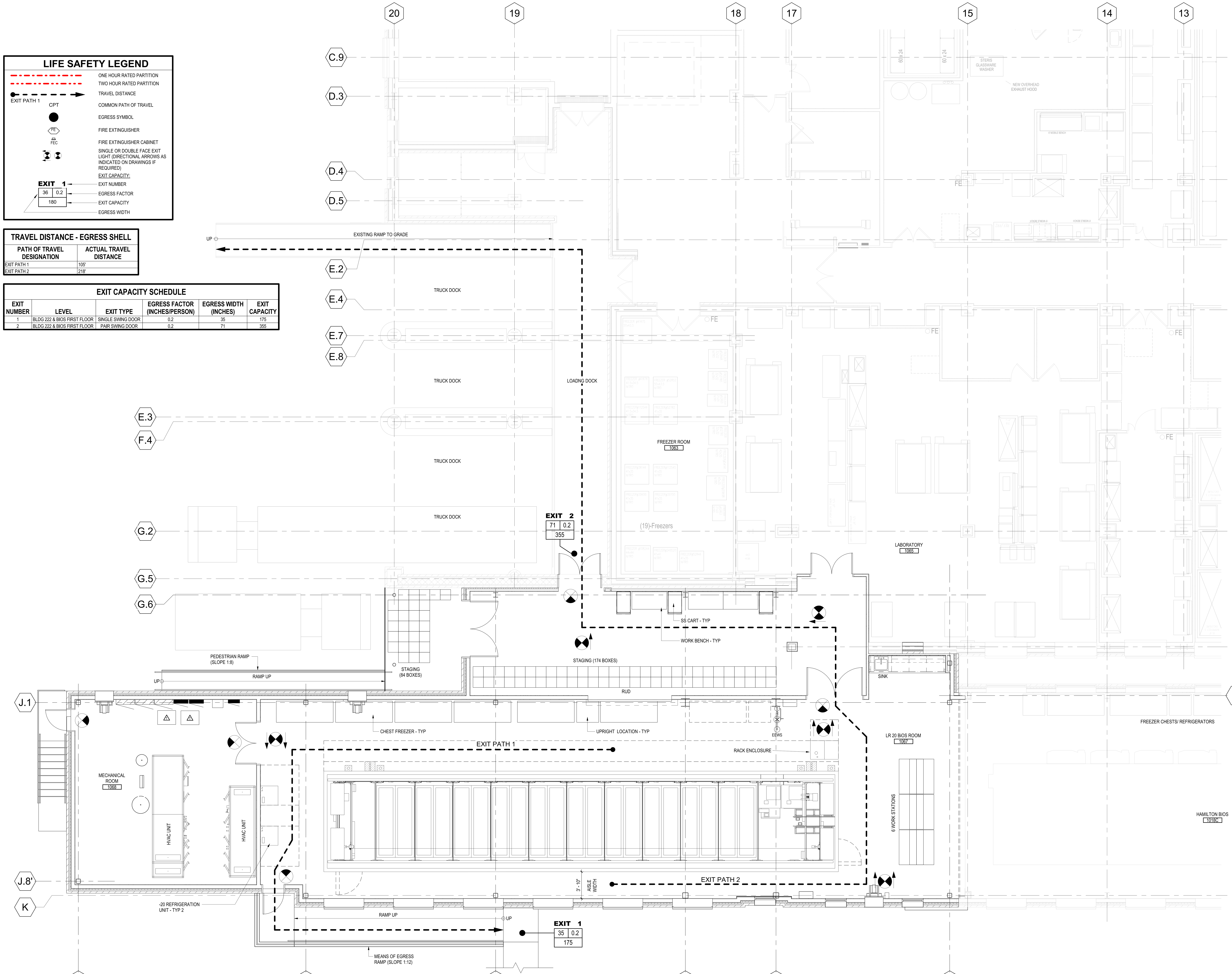
- EXIT 1 — EXIT NUMBER
- 0.2 — EGRESS FACTOR
- 180 — EXIT CAPACITY
- 36 — EGRESS WIDTH

TRAVEL DISTANCE - EGRESS SHELL

PATH OF TRAVEL DESIGNATION	ACTUAL TRAVEL DISTANCE
EXIT PATH 1	105'
EXIT PATH 2	218'

EXIT CAPACITY SCHEDULE

EXIT NUMBER	LEVEL	EXIT TYPE	EGRESS FACTOR (INCHES/PERSON)	EGRESS WIDTH (INCHES)	EXIT CAPACITY
1	BLDG 222 & BIOS FIRST FLOOR	SINGLE SWING DOOR	0.2	35	175
2	BLDG 222 & BIOS FIRST FLOOR	PAIR SWING DOOR	0.2	71	355



1 A-002 **ARCHITECTURAL PARTIAL FIRST FLOOR LIFE SAFETY PLAN**
SCALE: 3/16" = 1'-0"

N

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REGISTERED ARCHITECT WILLIAM H. DEVLIN STATE OF NEW YORK
02/22/2023

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Pfizer

Client/Project
Pfizer Global Research and Development

Hamilton BiOS #2 Addition

Pearl River, NY

Title
PARTIAL FIRST FLOOR LIFE SAFETY PLAN

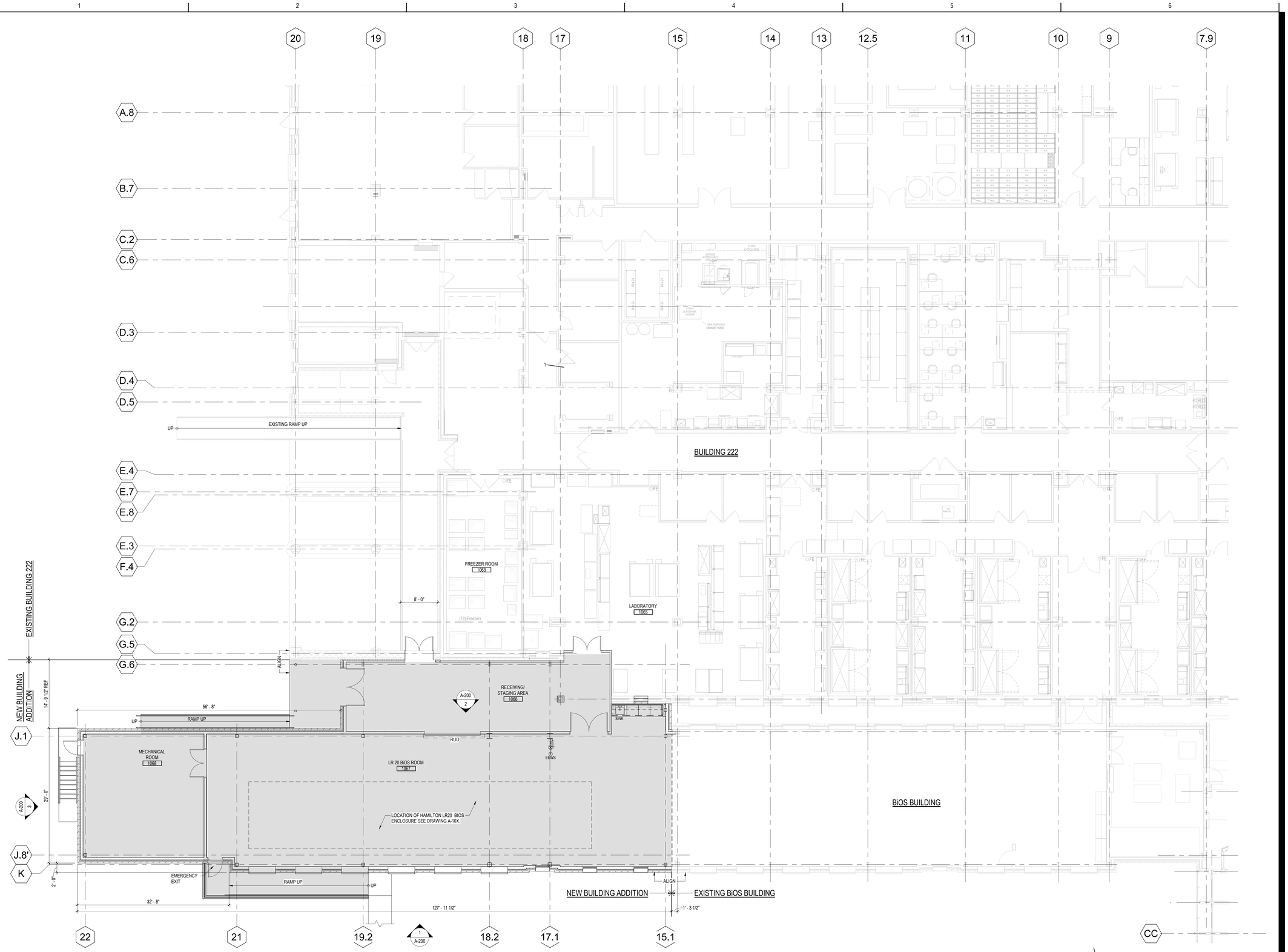
Project No.
191501254

Scale
As indicated

Revision
0

Drawing No.
A-002

ORIGINAL SHEET - ARCH E1



2 ARCHITECTURAL PARTIAL FIRST FLOOR KEY PLAN

A-101 SCALE: 1/8" = 1'-0"

LEGEND

AREA OF WORK

N

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REGISTERED ARCHITECT
WILLIAM H. DIFFEN
No. 018857
STATE OF NEW YORK
02/22/2023

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Pfizer

Client/Project
Pfizer Global Research and Development

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Pearl River, NY

Title
ARCHITECTURAL FIRST FLOOR PLAN KEY PLAN

Project No.	Scale
191501254	As indicated
Revision	Drawing No.
0	A-101

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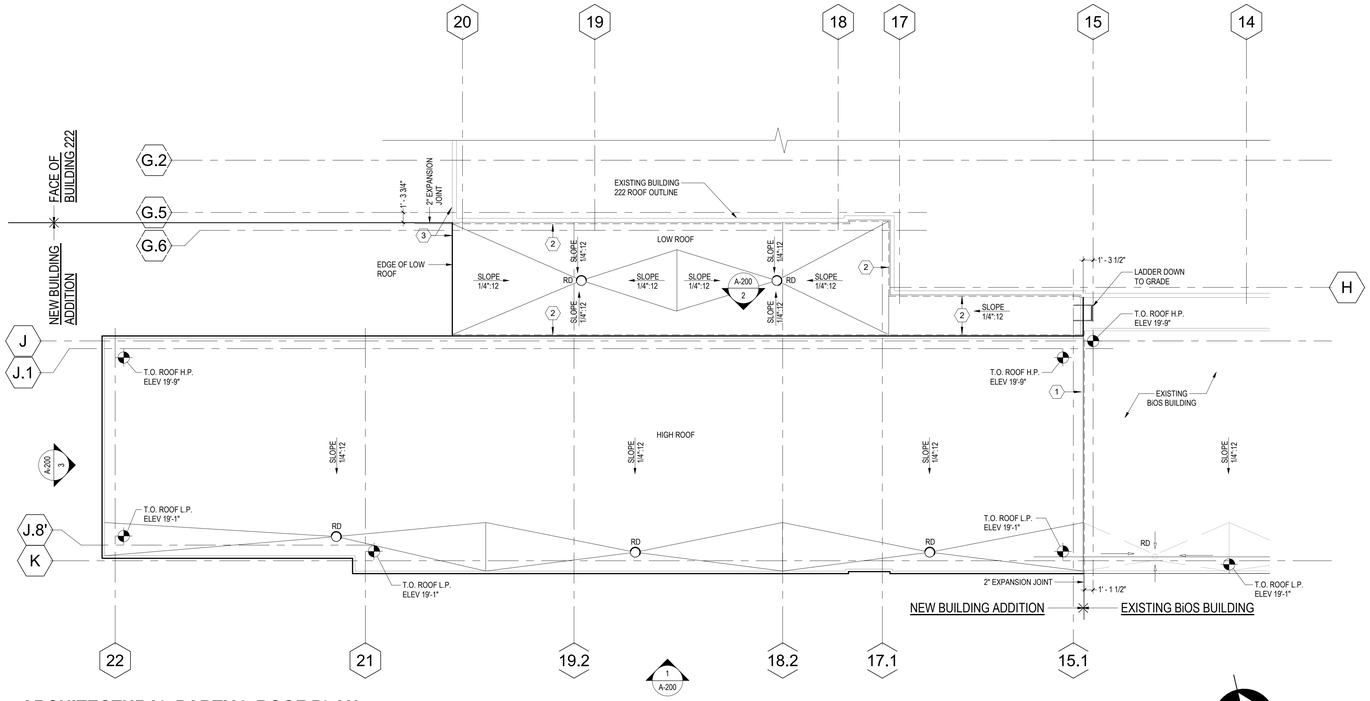
ORIGINAL SHEET - ARCH E1



1 ARCHITECTURAL PARTIAL ROOF PLAN
A-103 SCALE: 1/8" = 1'-0"

KEYED INSTALLATION NOTES

1. ROOF TO ROOF EXPANSION JOINT (1 INCH WIDTH)
2. ROOF TO WALL EXPANSION JOINT (2 INCH WIDTH)
3. EDGE OF ROOF TO ALIGN FLUSH WITH FACE OF BUILDING 222

LEGEND

- SLOPE OF ROOF
- ELEVATION MARKER
- ROOF DRAIN
- INTERSECTION OF ROOF SLOPE AND RIDGE

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REGISTERED ARCHITECT
WILLIAM H. DAVIS
No. 015657
STATE OF NEW YORK
02/22/2023

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Client/Project
Pfizer Global Research and Development

Hamilton BiOS #2 Addition

Pearl River, NY

Title
ARCHITECTURAL PARTIAL ROOF PLAN

Project No.	Scale
191501254	As indicated
Revision 0	Drawing No. A-103

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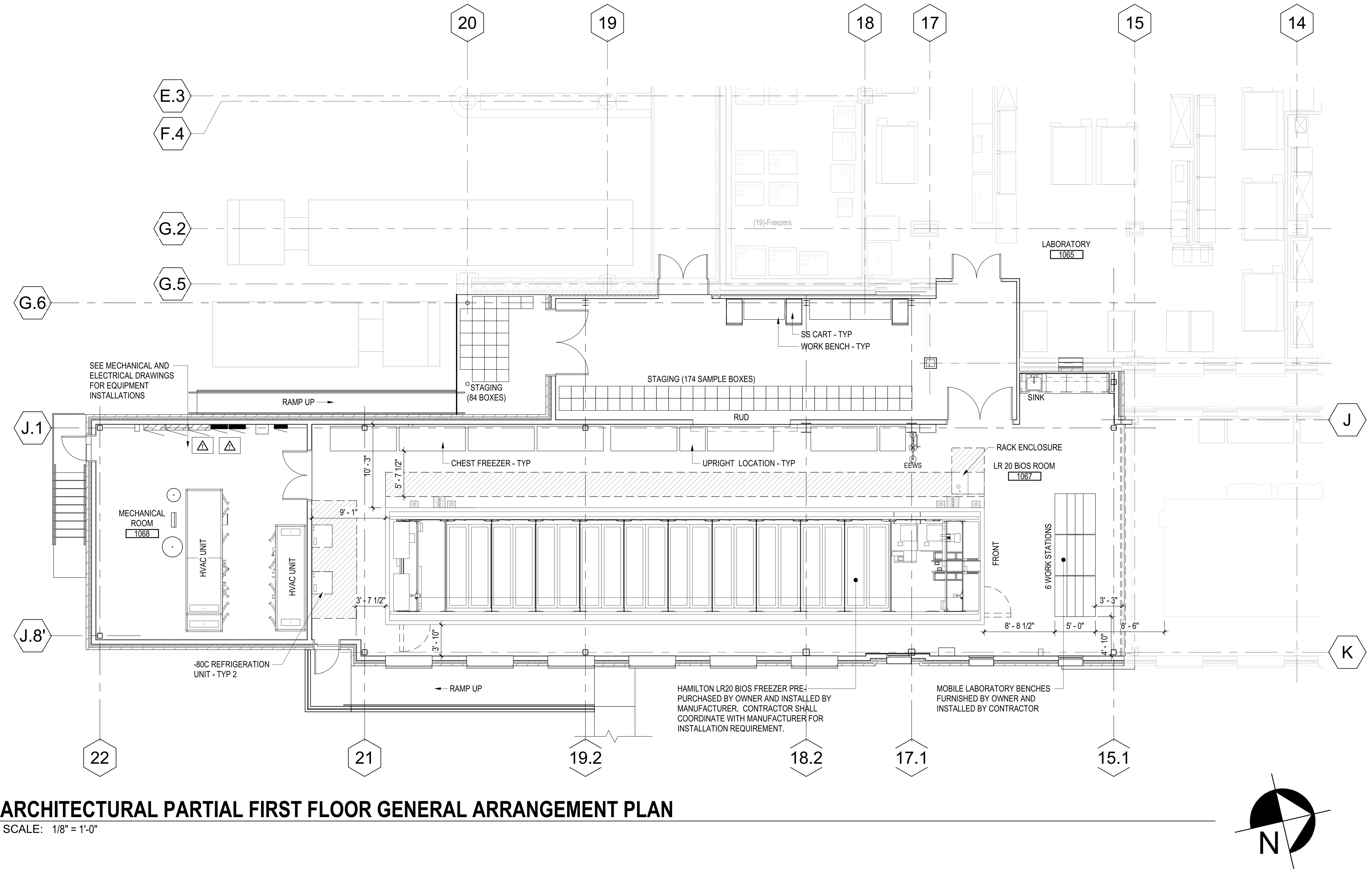
ORIGINAL SHEET - ARCH E1



1 A-104 ARCHITECTURAL PARTIAL FIRST FLOOR GENERAL ARRANGEMENT PLAN

SCALE: 1/8" = 1'-0"

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Pearl River, NY

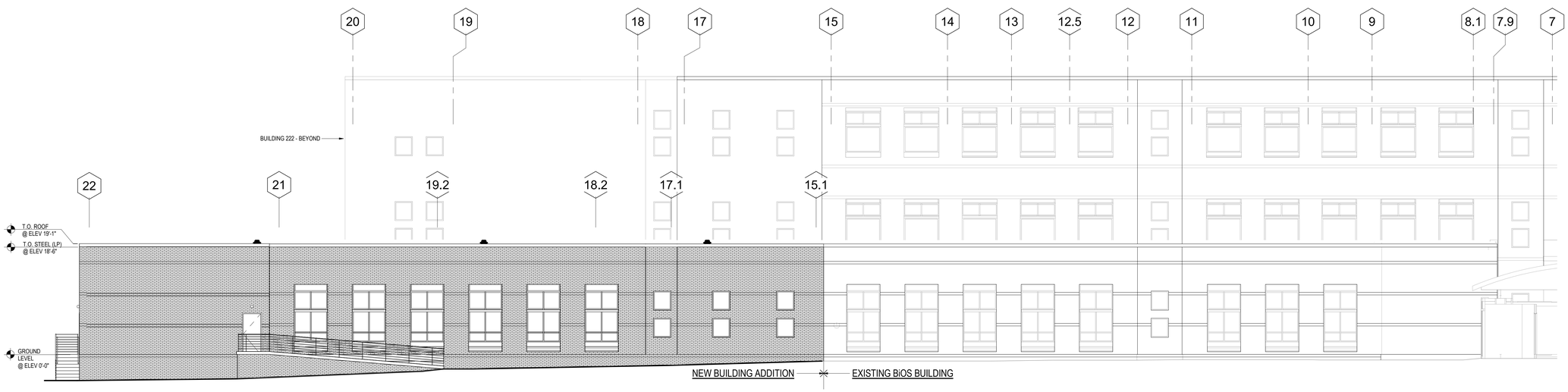
Title
ARCHITECTURAL PARTIAL GENERAL ARRANGEMENT PLAN

Project No. 191501254

Scale As indicated

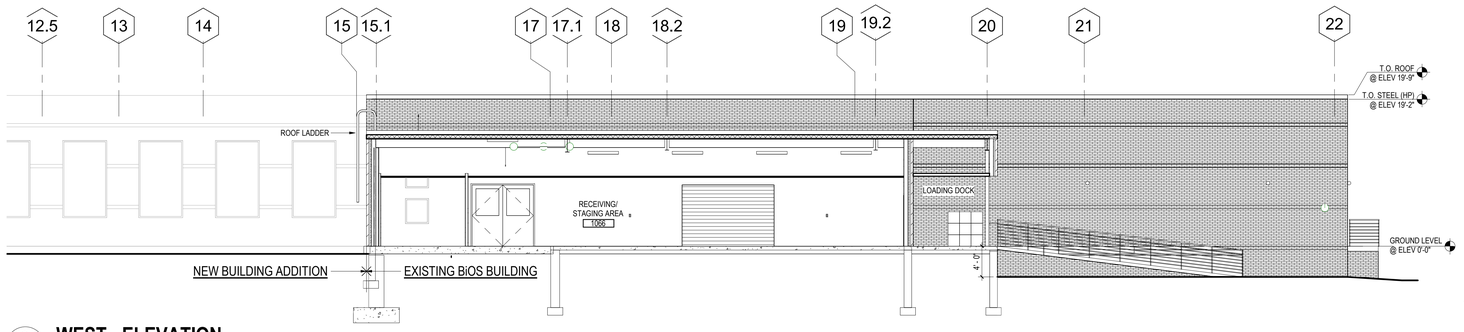
Revision 0

Drawing No. A-104



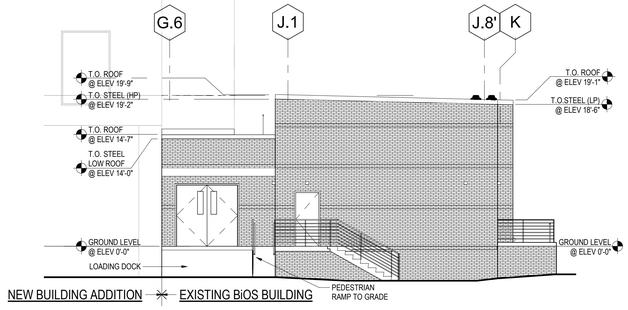
1 EAST - ELEVATION

A-200 SCALE: 1/8" = 1'-0"



2 WEST - ELEVATION

A-200 SCALE: 1/8" = 1'-0"



3 SOUTH - ELEVATION

A-200 SCALE: 1/8" = 1'-0"

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Title
ARCHITECTURAL ELEVATIONS AND SECTION

Project No. 191501254	Scale 1/8" = 1'-0"
Revision 0	Drawing No. A-200

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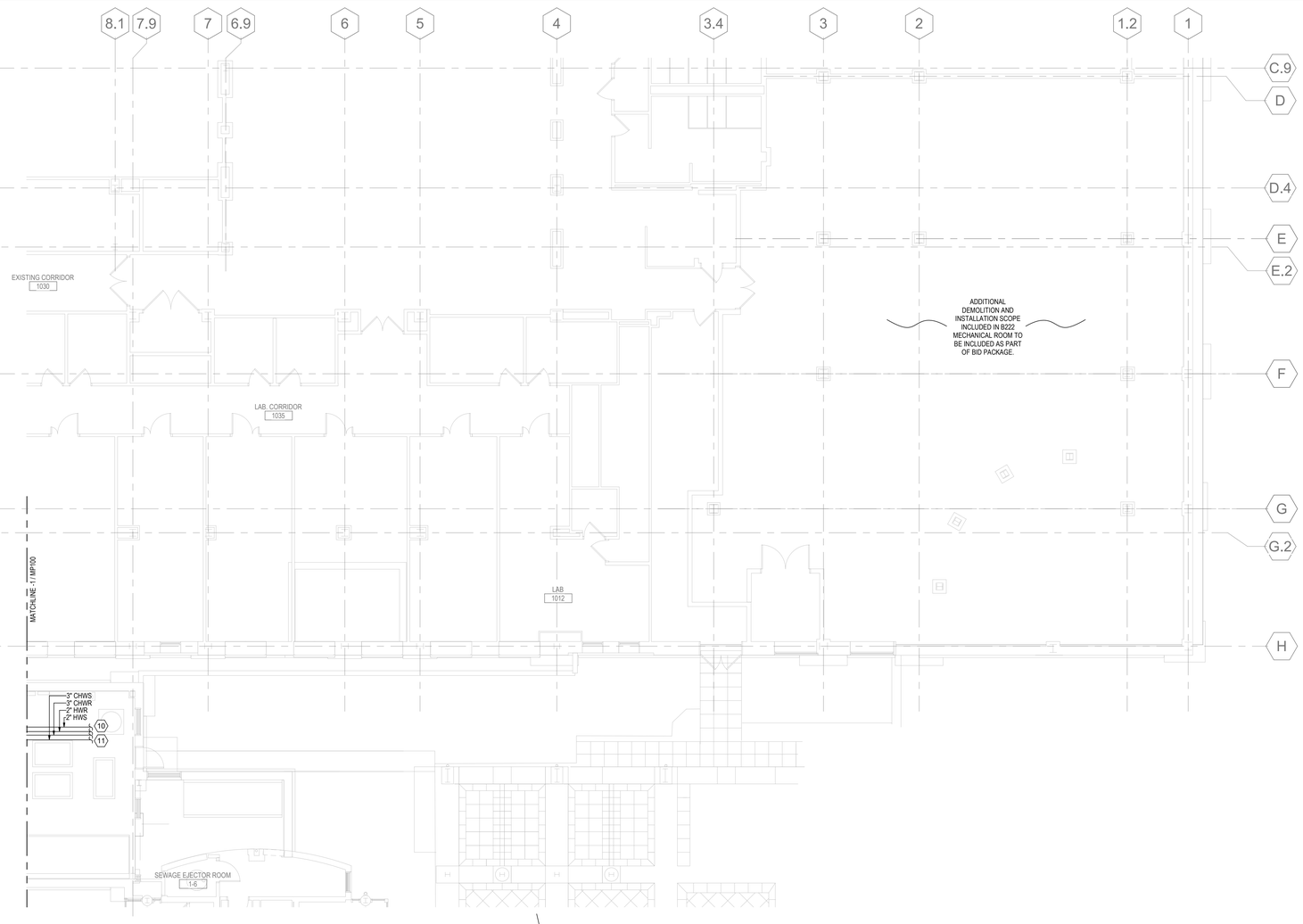
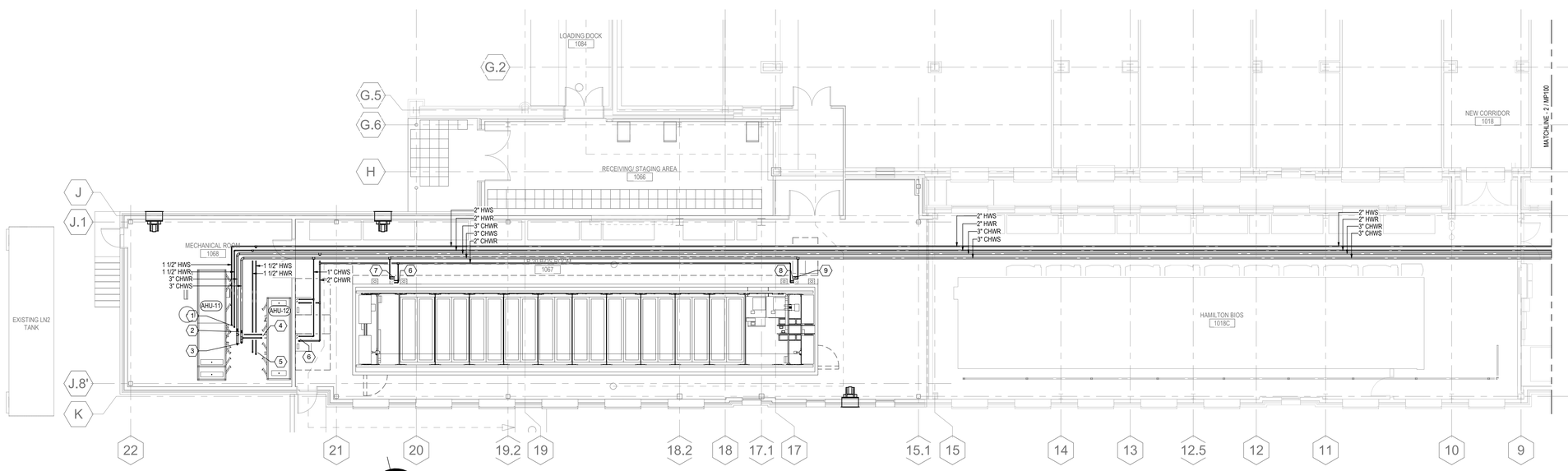
ORIGINAL SHEET - ARCH E1



2 MP100 MECHANICAL PIPING FIRST FLOOR PLAN CONTINUED

1/8" = 1'-0"



1 MP100 MECHANICAL PIPING FIRST FLOOR PLAN

1/8" = 1'-0"

KEYED INSTALLATION NOTES

1. 1 1/2" HWS/R DOWN TO AHU-11 HEATING COIL.
2. 2" CHWS/R DOWN TO AHU-11 COOLING COIL.
3. 2" CHWS/R DOWN TO AHU-11 POST-COOLCOIL.
4. 1 1/2" CHWS/R DOWN TO AHU-12 COOLING COIL.
5. 1 1/2" HWS/R DOWN TO AHU-12 HEATING COIL.
6. 1" CHWS TO HAMILTON BIOS SYSTEM "A" AND SYSTEM "B" INLETS SERVING BAYS 11-20.
7. 1" CHWR FROM HAMILTON BIOS SYSTEM "A" AND SYSTEM "B" OUTLETS SERVING BAYS 11-20.
8. 1" CHWS TO HAMILTON BIOS SYSTEM "A" AND SYSTEM "B" INLETS SERVING BAYS 1-10.
9. 1" CHWR FROM HAMILTON BIOS SYSTEM "A" AND SYSTEM "B" OUTLETS SERVING BAYS 1-10.
10. PROVIDE 2" HWS/R LINES TO SERVE NEW BIOS ADDITION HHW LOADS FROM EXISTING 2-1/2" LINES IN MECHANICAL ROOM 1018E. REFER TO M203 FOR DETAILS OF HHW TIE-IN.
11. PROVIDE 3" CHWS/R LINES FOR SERVICE OF NEW BIOS ADDITION CHW LOADS. CHWS/R WILL BE UPSIZED TO 4" FROM TIE-IN TO EXISTING BIOS SUITE, ALONG EXISTING EXTERIOR PIPE RACK WITH HEAT TRACE, AND BACK TO NEW TIE-IN POINT IN THE B222 MECHANICAL ROOM OFF OF EXISTING CHWS/R MAINS. PROVIDE DUT/STANDBY CHWS BOOSTER PUMPS IN THE B222 MECHANICAL ROOM ON THE 4" CHWS LINE SERVING THE BIOS BUILDING AND BUILDING ADDITION. REFER TO M202 FOR DETAILS ON NEW CHWS/R TIE-INS. EXISTING CHWS/R LINES AND ASSOCIATED EQUIPMENT IN THE B222 MECHANICAL ROOM TO BE DEMOLISHED AND REROUTED. DETAILS ON THE CHWS BOOSTER PUMPS TO BE PROVIDED, AND OTHER CHWS/R SCOPE INCLUDED AS PART OF THIS PROJECT.

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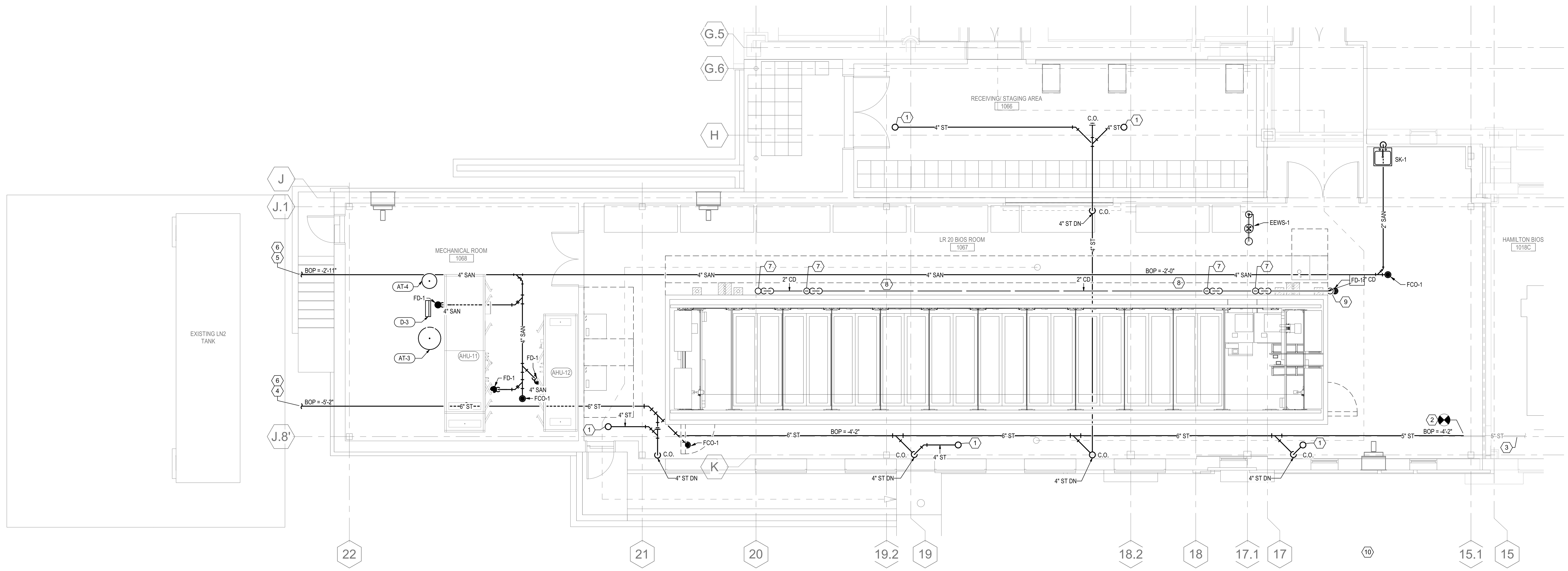
Pearl River, NY

Title
MECHANICAL PIPING FIRST FLOOR INSTALLATION PLAN

Project No. 191501254		Scale As indicated
Revision 0	Drawing No.	MP100

KEYED INSTALLATION NOTES

1. 4" ST DOWN FROM ROOF DRAIN RD-1.
2. CONNECT NEW 5" ST MAIN FROM EXISTING 5" ST MAIN BELOW NEW BIOS BUILDING ADDITION IN LOCATION SHOWN.
3. EXISTING 5" STORM FROM EXISTING BIOS BUILDING. APPROXIMATELY 4,015 SQ. FT. (125.1 GPM).
4. NEW 6" ST TO SITE. APPROX. 10,505 SQ. FT. (327.4 GPM)
5. NEW 4" SANITARY TO REMOTE BELOW GROUND SUMP PUMP. LOCATION OF SUMP PUMP TO BE DETERMINED.
6. REFER TO CIVIL DRAWINGS FOR CONTINUATION OF PIPING.
7. 1-1/2" CONDENSATE RECEPTOR FROM BIOS FREEZER.
8. 2" SANITARY PIPING FROM FREEZER DRAINS. HUG WALL OF FREEZER WITH PIPING, AND PITCH 1/4" PER FOOT DOWNWARDS TOWARDS DRAIN SPILL TERMINATION AT FLOOR DRAIN FD-1.
9. 2" DRAIN SPILL TO FLOOR DRAIN FD-1 WITH AIR GAP.
10. REMOVE EXISTING TRENCH DRAIN IN THIS LOCATION, OR PIPE TO NEW STORM SYSTEM.



1 P100A **PLUMBING STORM AND SANITARY FIRST FLOOR PLAN**

3/16" = 1'-0"

N

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PLUMBING FIRST FLOOR STORM AND SANITARY INSTALLATION PLAN

Project No. 191501254

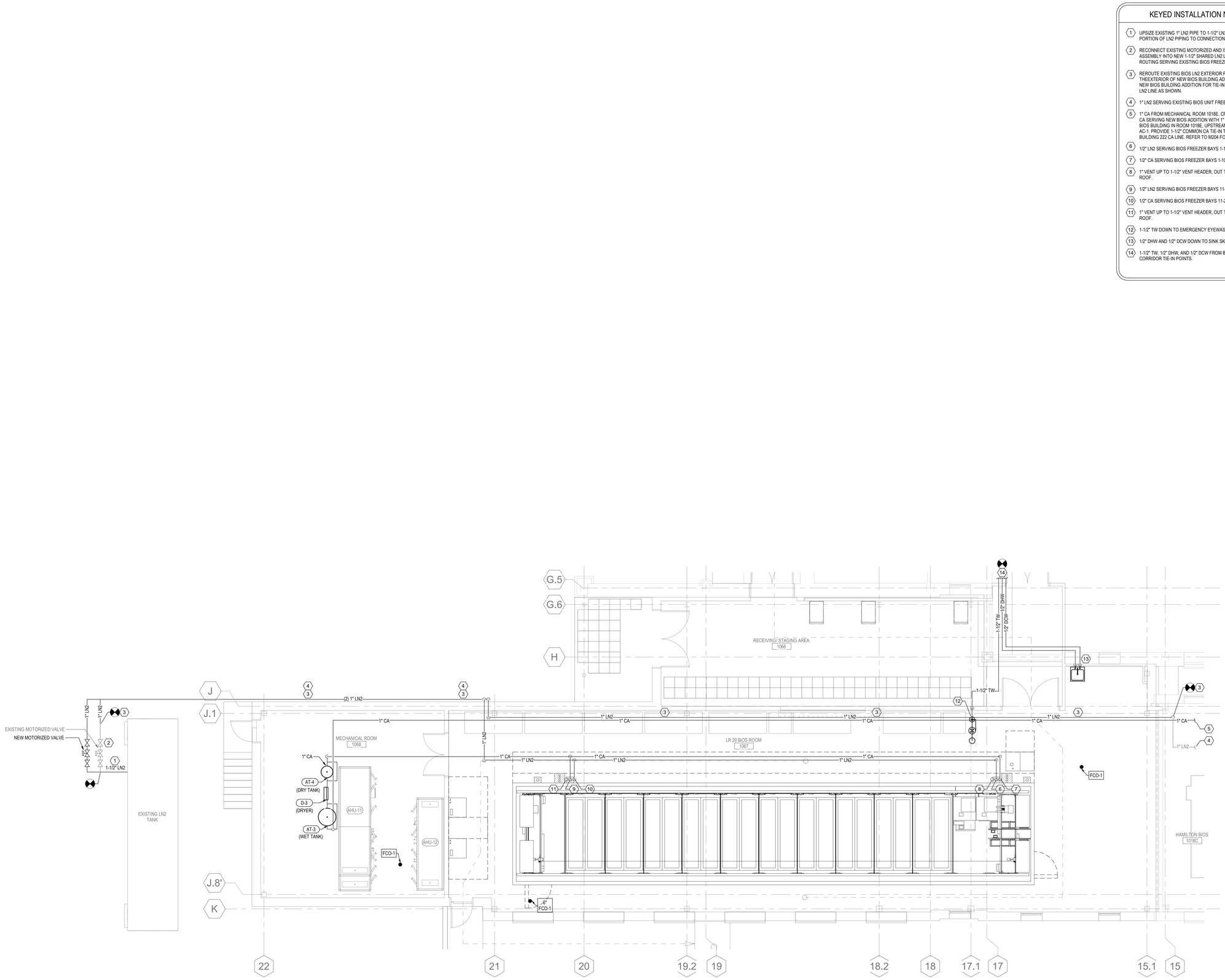
Scale As indicated

Revision 0

Drawing No. **P100A**

KEYED INSTALLATION NOTES

1. UPSIZE EXISTING 1" LN2 PIPE TO 1-1/2" LN2 PIPE FOR SHARED PORTION OF LN2 PIPING TO CONNECTION TO LN2 TANK.
2. RECONNECT EXISTING MOTORIZED AND ISOLATION VALVE ASSEMBLY INTO NEW 1-1/2" SHARED LN2 LINE, AND TO NEW LN2 ROUTING SERVING EXISTING BIOS FREEZERS.
3. REROUTE EXISTING BIOS LN2 EXTERIOR PIPING AROUND THEEXTERIOR OF NEW BIOS BUILDING ADDITION AND THROUGH NEW BIOS BUILDING ADDITION FOR TIE-IN BACK INTO EXISTING LN2 LINE AS SHOWN.
4. 1" LN2 SERVING EXISTING BIOS UNIT FREEZERS.
5. 1" CA FROM MECHANICAL ROOM 1018E. CROSS TIE EXISTING 1" CA SERVING NEW BIOS ADDITION WITH 1" CA SERVING EXISTING BIOS BUILDING IN ROOM 1018E. UPSTREAM OF COMPRESSOR AC-1. PROVIDE 1-1/2" COMMON CA TIE-IN TO EXISTING 1-1/2" BUILDING 222 CA LINE. REFER TO M204 FOR TIE-IN DETAILS.
6. 1/2" LN2 SERVING BIOS FREEZER BAYS 1-10.
7. 1/2" CA SERVING BIOS FREEZER BAYS 1-10.
8. 1" VENT UP TO 1-1/2" VENT HEADER, OUT TO 4" VENT THROUGH ROOF.
9. 1/2" LN2 SERVING BIOS FREEZER BAYS 11-20.
10. 1/2" CA SERVING BIOS FREEZER BAYS 11-20.
11. 1" VENT UP TO 1-1/2" VENT HEADER, OUT TO 4" VENT THROUGH ROOF.
12. 1-1/2" TW DOWN TO EMERGENCY EYEWASH/SHOWER EEWS-1.
13. 1/2" DHW AND 1/2" DCW DOWN TO SINK SK-1.
14. 1-1/2" TW, 1/2" DHW, AND 1/2" DCW FROM BUILDING 222 CORRIDOR TIE-IN POINTS.



1 P100B **PLUMBING DOMESTIC AND PROCESS GAS FIRST FLOOR PLAN**
3/16" = 1'-0"

N

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HAMILTON BIOS
1018C

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Hamilton BiOS #2 Addition

Pearl River, NY

Title
PLUMBING FIRST FLOOR DOMESTIC AND PROCESS GAS PLAN

Project No. 191501254
Scale As indicated
Revision 0
Drawing No. **P100B**

*Plot location in Project Information
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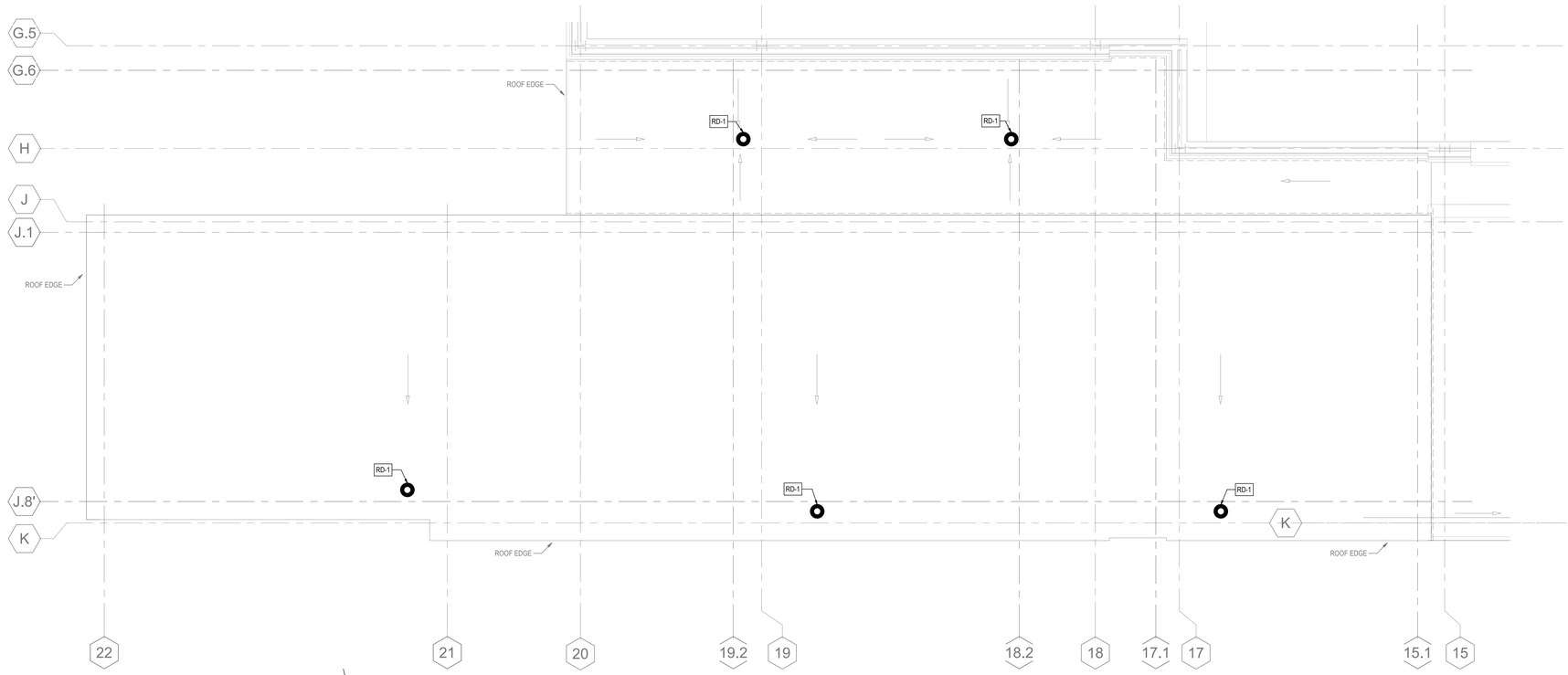
ORIGINAL SHEET - ARCH E1



1 P101 **PLUMBING ROOF PLAN**

3/16" = 1'-0"

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Pearl River, NY

Title
PLUMBING ROOF INSTALLATION PLAN

Project No.
191501254

Scale
As indicated

Revision
0

Drawing No.
P101

FIRE PROTECTION PIPING SYSTEM APPLICATION SCHEDULE

PIPING SYSTEM	PIPING SERVICE DESIGNATION	PIPING LOCATION	PIPE SIZE	PIPING MATERIAL: BLACK STEEL - SCH. 40	PIPING MATERIAL: GALVANIZED STEEL - SCH. 40	FITTINGS / JOINTS: CUT GROOVED - 300 PSI FITTINGS	FITTINGS / JOINTS: ROLL GROOVED - 300 PSI FITTINGS	FITTINGS / JOINTS: SCREWED - CLASS 150 FITTINGS	CONSTRUCTION: OPERATING TEMPERATURE (°F)	CONSTRUCTION: MINIMUM WORKING PRESSURE (PSI)	CONSTRUCTION: TEST PRESSURE (PSI) (NOTE 1)	CONSTRUCTION: TEST DURATION (HRS)	CONSTRUCTION: ACCEPTANCE LEVEL
WET-PIPE SPRINKLER SYSTEM, STANDARD PRESSURE	FP	ABOVE GROUND	NPS 2 AND SMALLER	X				X	40-100	175	225	2	ZERO LOSS / LEAKS
			NPS 2 1/2 AND LARGER	X			X						
DRAIN	DR	ABOVE GROUND	NPS 4 AND SMALLER		X	X		X	40-100	250	250	2	ZERO LOSS / LEAKS

NOTE 1: TEST PRESSURE FOR SPRINKLER SHALL BE 200 PSI MINIMUM OR 50 PSI IN EXCESS OF WORKING PRESSURE, WHICHEVER IS GREATER.

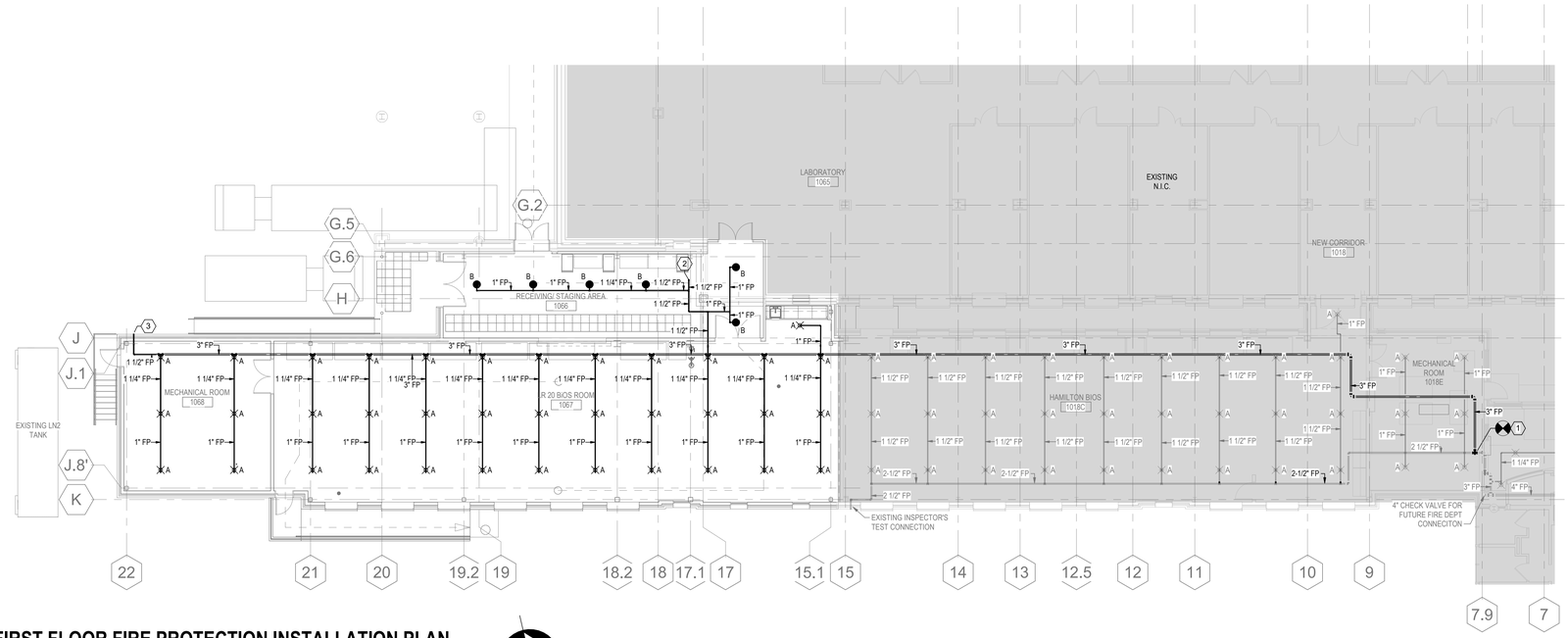
SPRINKLER HEAD SCHEDULE

DESIGNATION	TYPE	FINISH	MAKE	MODEL	SIN	NOMINAL TEMPERATURE RATING (°F)	NOMINAL K-FACTOR	MAXIMUM COVERAGE AREA (SQ.FT.)	RESPONSE	SIZE	REMARKS
A	UPRIGHT	BRASS	RELIABLE	F1FR56	RA1425	155	5.6	130	QUICK	1/2"	SEE NOTES 1,2,3
B	CONCEALED PENDANT	WHITE	RELIABLE	G5-56	RA3415	165	5.6	130	QUICK	1/2"	SEE NOTE 1,4

NOTES:
1. INSTALL ALL SPRINKLER HEADS PER THE MANUFACTURER'S RECOMMENDATIONS AND UL/FM APPROVAL CONDITIONS.
2. SPRINKLERS IN AREAS WITH LOW CLEARANCE, UNDER 8'-0", SHALL BE PROTECTED WITH LISTED GUARDS.
3. USE INTERMEDIATE TEMPERATURE RATING FOR MECHANICAL ROOMS AND WHERE REQUIRED PER NFPA 13.
4. PROVIDE GASKETED COVER PLATE.

KEYED INSTALLATION NOTES

1. PROVIDE NEW 3" FP LINE FROM EXISTING 3" LINE IN LOCATION SHOWN.
2. PROVIDE CAPPED LOW POINT DRAIN IN LOCATION SHOWN.
3. PIPE 3" FP LINE TO EXTERIOR, AND PROVIDE 1-1/2" INSPECTORS TEST CONNECTION AS SHOWN. REFER TO INSPECTORS TEST CONNECTION DETAIL 1 / FP100.



1 / FP-101 FIRST FLOOR FIRE PROTECTION INSTALLATION PLAN
3/32" = 1'-0"

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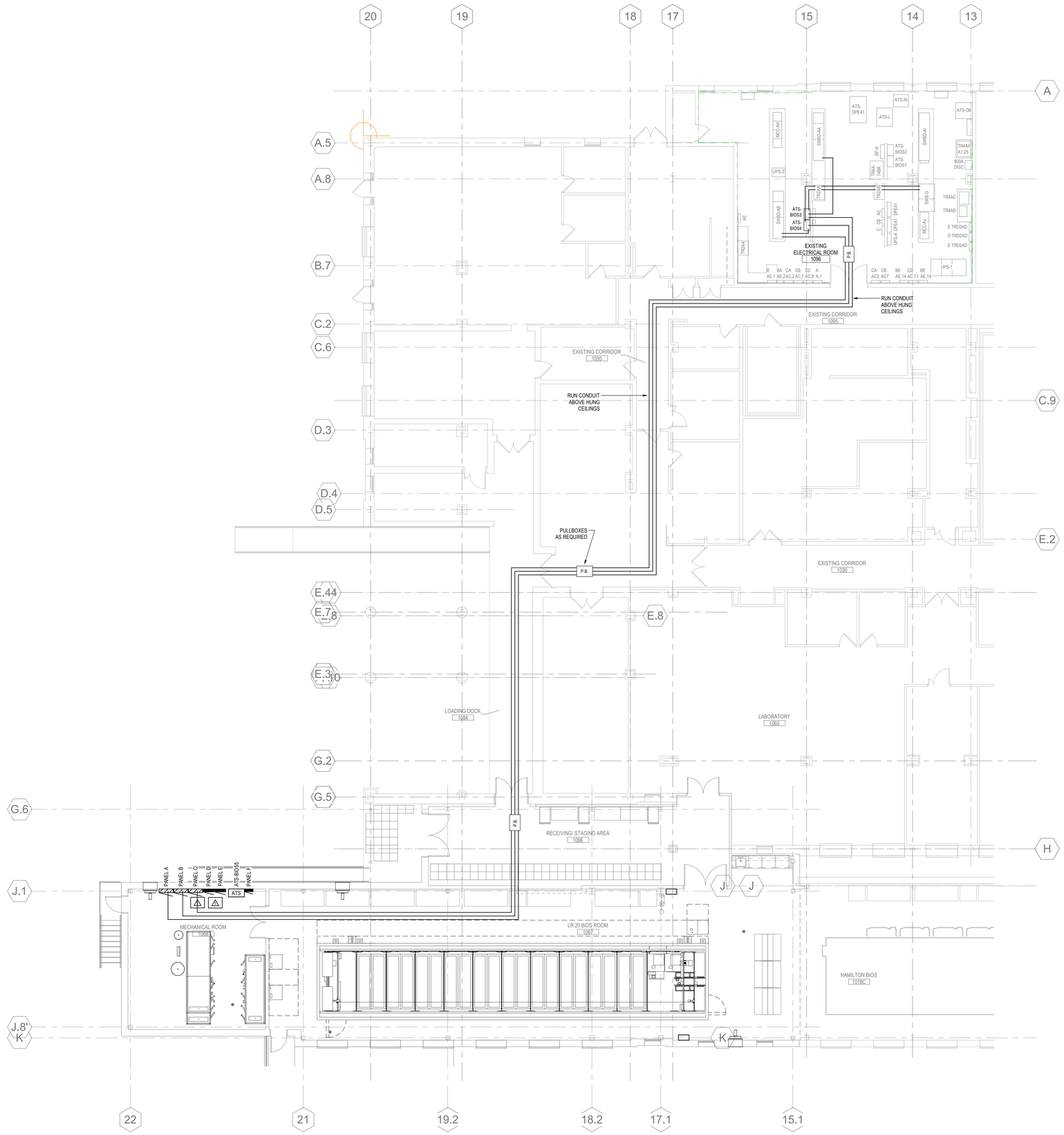
Pearl River, NY

Title
FIRST FLOOR FIRE PROTECTION INSTALLATION PLAN

Project No. 191501254
Scale As indicated
Revision 0
Drawing No. FP-101



1 E-100 **FIRST FLOOR CONDUIT ROUTING PLAN**
1/8" = 1'-0"

GENERAL NOTES:

1. THE SERVICE FOR THIS SYSTEM IS 480 VOLT, 3ϕ, 4 WIRE, 60HZ AND 208Y/120V, 3ϕ, 4 WIRE, 60HZ.
2. REFER TO MECHANICAL DRAWINGS FOR EXACT LOCATION OF MECHANICAL EQUIPMENT.
3. REFER TO POWER PLAN ON DRAWING E-101 FOR DETAILED INFORMATION WITHIN THE AREA OF WORK.
4. REFER TO RISER DIAGRAM ON DRAWING E-601 FOR WIRE & CONDUIT SIZES OF MAJOR FEEDERS.
5. ALL WIRE AND CABLE SHALL BE COPPER, N.E. CODE TYPE THHN/THWN, 600 VOLT INSULATION, NOT SMALLER THAN #12 AWG UNLESS OTHERWISE NOTED. (OR EXCEPT CONTROL WIRES). #10 AND SMALLER SHALL BE SOLID. #8 AND LARGER SHALL BE STRANDED.
6. CONDUITS CONCEALED IN WALLS, CHASES AND ABOVE CEILING SHALL BE EMT. IN MER, AND WAREHOUSE SHALL BE EMT. OUTDOOR CONDUITS SHALL BE RIGID STEEL GALVANIZED CONDUITS.
7. CONDUIT FITTINGS INSTALLED IN WET AREAS SHALL HAVE NEOPRENE GASKET AND BE RATED FOR THE ENVIRONMENT.
8. ON SHARED PIPE RACKS, ALL ELECTRICAL CONDUITS SHALL BE RUN ABOVE PIPING.
9. GROUNDING INSTALLATIONS SHALL BE DONE IN ACCORDANCE WITH REQUIREMENTS OF NATIONAL ELECTRICAL CODE, AND OTHER APPLICABLE CODES AND REGULATIONS. ALL EQUIPMENT SHALL BE GROUNDED TO THE EQUIPMENT GROUNDING SYSTEM.
10. SEAL TIGHT FLEXIBLE CONDUIT COUPLINGS SHALL BE USED FOR ALL CONNECTIONS TO MOTORS, TRANSFORMERS, SOLENOID VALVES AND OTHER ELECTRICAL DEVICES EXCLUSIVE OF PUSH BUTTONS UNLESS OTHERWISE NOTED.
11. SEAL ALL WALL AND FLOOR PENETRATIONS WITH APPROVED CAULKING OR FIRESTOPPING. FOLLOW MANUFACTURER'S INSTALLATION INSTRUCTIONS.
12. COORDINATE ALL ELECTRICAL INSTALLATIONS WITH OTHER TRADES WORK. DETERMINE EXACT ROUTING OF CONDUITS IN THE FIELD, SO AS TO AVOID INTERFERENCE'S WITH DUCTWORK, PIPING AND BUILDING STRUCTURE.
13. CONTRACTOR SHALL PROVIDE ALONG PIPE RACK PULL BOXES FOR ELECTRICAL CONDUITS AS REQUIRED BY CODE.
14. PROVIDE EXPANSION/DEFLECTION FITTINGS FOR ALL RACEWAYS CROSSING BUILDING EXPANSION JOINTS.
15. COORDINATE WORK WITH ALL OTHER TRADES TO ENSURE PIPING, DUCTWORK AND ALL OTHER FOREIGN SYSTEMS TO NOT PASS OVER TOP OF ELECTRICAL DISTRIBUTION EQUIPMENT. MAINTAIN ALL WORKING, EQUIPMENT AND CLEAR SPACE REQUIREMENTS AS IDENTIFIED IN NEC ARTICLE 110.
16. PROVIDE PULLBOXES AS REQUIRED ON CONDUIT RUNS WITH MORE THAN (4) 90° BENDS. SIZE AS PER NEC REQUIREMENTS BASED ON CONDUIT SIZE, QUANTITY AND ORIENTATIONS USED.

TRUE NORTH

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Hamilton BiOS #2 Addition

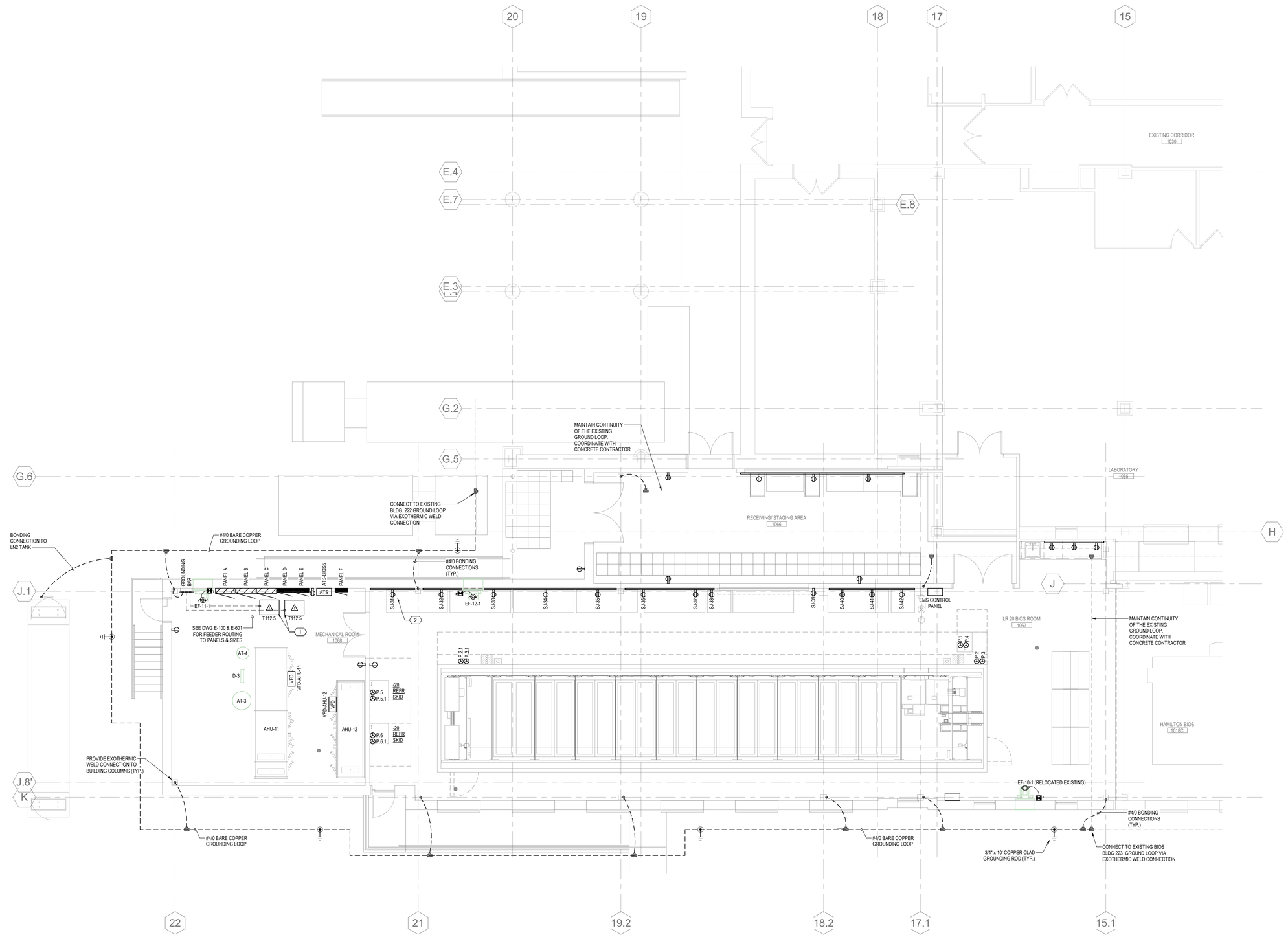
Pearl River, NY

Title
FIRST FLOOR CONDUIT ROUTING PLAN

Project No. 191501254
Scale 1/8" = 1'-0"
Revision 0
Drawing No. **E-100**

*Plot location in Project Information
2/22/2023 5:43:39 PM

ORIGINAL SHEET - ARCH E1



1 E-101 PARTIAL FIRST FLOOR POWER PLAN

3/16" = 1'-0"

GENERAL NOTES:

1. THE SERVICE FOR THIS SYSTEM IS 480 VOLT, 3ϕ, 4 WIRE, 60HZ AND 208V, 3ϕ, 4 WIRE, 60HZ.
2. REFER TO MECHANICAL DRAWINGS FOR EXACT LOCATION OF MECHANICAL EQUIPMENT.
3. NO CONDUIT SMALLER THAN 3/4" SHALL BE USED UNLESS OTHERWISE NOTED.
4. ALL WIRE AND CABLE SHALL BE COPPER, N.E. CODE TYPE THHN/THWN, 600 VOLT INSULATION, NOT SMALLER THAN #12 AWG UNLESS OTHERWISE NOTED. (OR EXCEPT CONTROL WIRES), #10 AND SMALLER SHALL BE SOLID. #8 AND LARGER SHALL BE STRANDED.
5. ALL ELECTRICAL EQUIPMENT INSTRUMENTS AND ASSOCIATED CONTROL DEVICES SHALL BE MARKED FOR IDENTIFICATION WITH PLASTIC NAMEPLATES WITH BLACK LETTERS ON WHITE BACKGROUND. NAME PLATES SHALL BE FASTENED WITH EITHER EPOXY CEMENT OR SCREWS SHALL BE ACCEPTABLE. COORDINATE WITH THE OWNER.
6. ALL MOTORS SHALL BE CHECKED FOR DIRECTION OF ROTATION WITH RESPECT TO THE DRIVEN MACHINE, AND CORRECTIONS MUST BE MADE ON THE MOTORS IF REQUIRED.
7. CONDUITS CONCEALED IN WALLS, CHASES AND ABOVE CEILING SHALL BE EMT, IN MER, AND WAREHOUSE SHALL BE EMT, OUTDOOR CONDUITS SHALL BE RIGID STEEL GALVANIZED CONDUITS.
8. CONDUIT FITTINGS INSTALLED IN WET AREAS SHALL HAVE NEOPRENE GASKET AND BE RATED FOR THE ENVIRONMENT.
9. ON SHARED PIPE RACKS, ALL ELECTRICAL CONDUITS SHALL BE RUN ABOVE PIPING.
10. GROUNDING INSTALLATIONS SHALL BE DONE IN ACCORDANCE WITH REQUIREMENTS OF NATIONAL ELECTRICAL CODE, AND OTHER APPLICABLE CODES AND REGULATIONS. ALL EQUIPMENT SHALL BE GROUNDED TO THE EQUIPMENT GROUNDING SYSTEM.
11. SEAL TIGHT FLEXIBLE CONDUIT COUPLINGS SHALL BE USED FOR ALL CONNECTIONS TO MOTORS, TRANSFORMERS, SOLENOID VALVES AND OTHER ELECTRICAL DEVICES EXCLUSIVE OF PUSH BUTTONS UNLESS OTHERWISE NOTED.
12. SEAL ALL WALL AND FLOOR PENETRATIONS WITH APPROVED CAULKING OR FIRESTOPPING. FOLLOW MANUFACTURER'S INSTALLATION I NSTRUCTIONS.
13. COORDINATE ALL ELECTRICAL INSTALLATIONS WITH OTHER TRADES WORK. DETERMINE EXACT ROUTING OF CONDUITS IN THE FIELD, SO AS TO AVOID INTERFERENCE'S WITH DUCTWORK, PIPING AND BUILDING STRUCTURE.
14. ALL WIRES IN PANEL TO BE BUNDLED AND TAPED IN A WORKMANLIKE MANNER.
15. ALL WIRES SHALL BE NUMBERED IN THE FIELD IN ACCORDANCE WITH WIRING DIAGRAMS WITH ADHESIVE NUMBERING TAPE.
16. CONTRACTOR SHALL PROVIDE ALONG PIPE RACK PULL BOXES FOR ELECTRICAL CONDUITS AS REQUIRED BY CODE.
17. RECEPTACLES ARE NEMA TYPE 5-20R UNLESS NOTED OTHERWISE. REFER TO DRAWING E-001 FOR TYPCAL MOUNTING HEIGHTS, UNLESS MOUNTING HEIGHTS ARE OTHERWISE INDICATED ON PLAN.
18. PROVIDE EXPANSION/DEFLECTION FITTINGS FOR ALL RACEWAYS CROSSING BUILDING EXPANSION JOINTS.
19. COORDINATE WORK WITH ALL OTHER TRADES TO ENSURE PIPING, DUCTWORK AND ALL OTHER FOREIGN SYSTEMS TO NOT PASS OVER TOP OF ELECTRICAL DISTRIBUTION EQUIPMENT. MAINTAIN ALL WORKING, EQUIPMENT AND CLEAR SPACE REQUIREMENTS AS IDENTIFIED IN NEC ARTICLE 110.
20. (V) INDICATES ITEM PROVIDED BY VENDOR.

KEYNOTES

1 PROVIDE & INSTALL WALL OR TRAPEZE MOUNTED TRANSFORMER SUSPENDED ABOVE ASSOCIATED PANELBOARD, WITH A MINIMUM OF 8'-0" CLEAR HEAD SPACE. COORDINATE THE EXACT LOCATION IN THE FIELD WITH ALL OTHER TRADES WORK TO ENSURE ADEQUATE CLEARANCES AROUND ELECTRICAL EQUIPMENT IS MAINTAINED PER NEC ARTICLE 110.

2 FREEZER RECEPTACLES SHALL BE CIRCUITED TO EXISTING PANEL "SJ" LOCATED IN BIOSH1 MECHANICAL ROOM.

OWNER SUPPLIED EQUIPMENT CONNECTION SCHEDULE

TAG	DESCRIPTION	FULL LOAD AMPS	CIRCUIT BREAKER SIZE	VOLTAGE	NUMBER OF POLES
P.1	AUTOMATION & CONTROLS	45 A	45 A	208 V	2
P.2	-80C REFRIGERATION (A) PRIMARY BAYS 1-10	60 A	60 A	208 V	3
P.2.1	-80C REFRIGERATION (A) PRIMARY BAYS 11-20	60 A	60 A	208 V	3
P.3	-80C REFRIGERATION (B) SECONDARY BAYS 1-10	60 A	60 A	208 V	3
P.3.1	-80C REFRIGERATION (B) SECONDARY BAYS 11-20	60 A	60 A	208 V	3
P.4	REFRIGERATION EXECUTIVE CONTROLLER	70 A	70 A	208 V	2
P.5	-20C ROOM REFRIGERATION BAYS 1-10	7 A	15 A	480 V	3
P.5.1	-20C ROOM REFRIGERATION BAYS 11-20	7 A	15 A	480 V	3
P.6	-20C REDUNDANT ROOM REFRIGERATION BAYS 1-10	7 A	15 A	480 V	3
P.6.1	-20C REDUNDANT ROOM REFRIGERATION BAYS 11-20	7 A	15 A	480 V	3

TRUE NORTH

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STATE OF NEW YORK ROBERT S BOCCINO LICENSED PROFESSIONAL ENGINEER 101221

Client/Project Logo

Pfizer

Client/Project
Pfizer Global Research and Development

Hamilton BiOS #2 Addition

Pearl River, NY

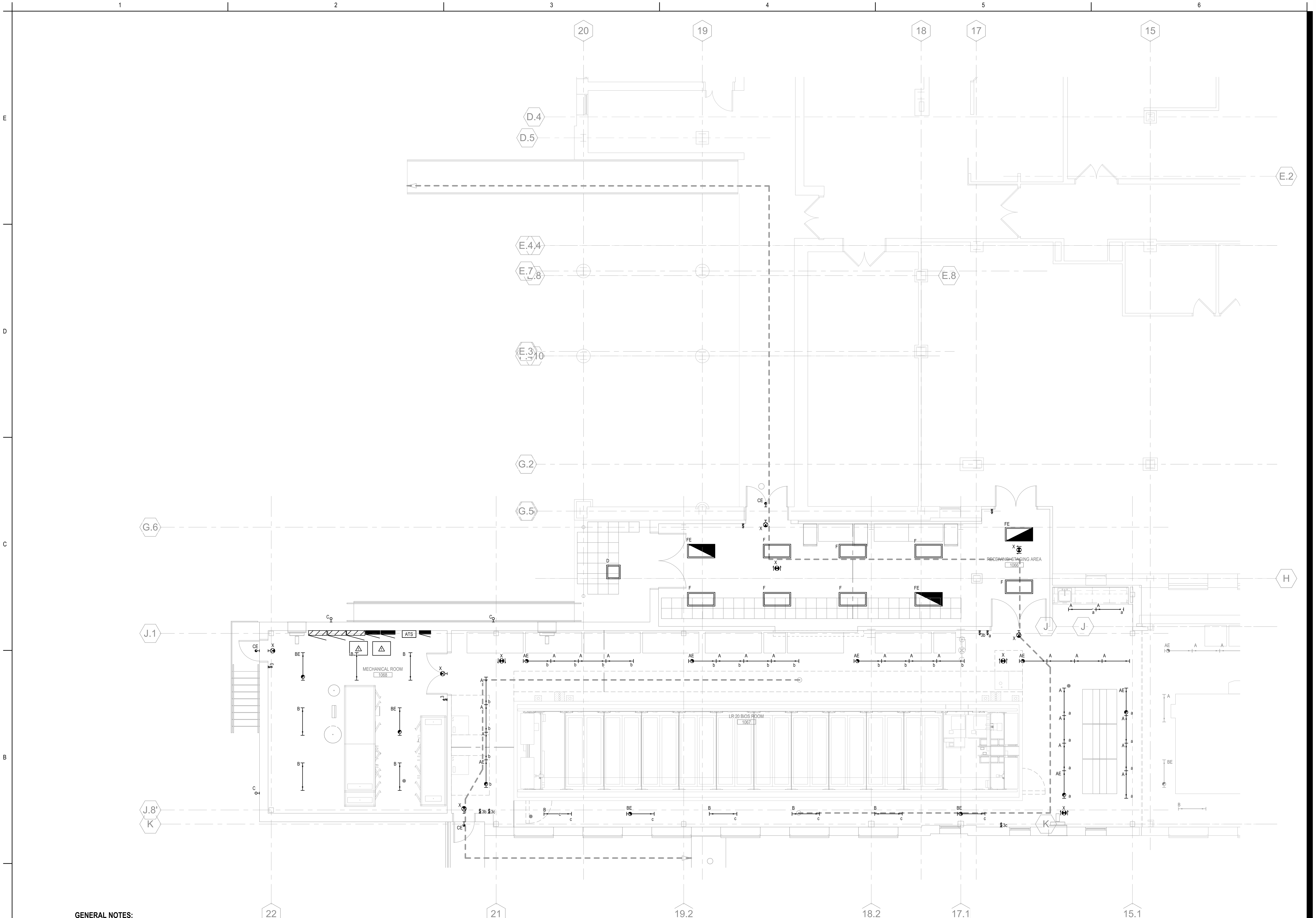
Title
PARTIAL FIRST FLOOR POWER PLAN

Project No.
191501254

Scale
3/16" = 1'-0"

Revision
0

Drawing No.
E-101



GENERAL NOTES:

1. THE LIGHTING SYSTEM SHOWN ON THIS DRAWING IS 208Y/120 VOLT, 3 PHASE 4 WIRE GROUNDED NEUTRAL.
2. CONDUIT SHALL BE GALVANIZED ELECTRICAL METALLIC TUBING (EMT) EXCEPT WHERE OTHERWISE NOTED. COUPLINGS AND CONNECTORS TO BE COMPRESSION TYPE. MINIMUM CONDUIT SIZE SHALL BE 3/4" UNLESS OTHERWISE NOTED.
3. ALL WIRE AND CABLE SHALL BE COPPER, N.E. CODE TYPE THHN/THWN, 600 VOLT INSULATION, NOT SMALLER THAN #12 AWG UNLESS OTHERWISE NOTED. (OR EXCEPT CONTROL WIRES). #10 AND SMALLER SHALL BE SOLID. #8 AND LARGER SHALL BE STRANDED.
5. GROUNDING INSTALLATIONS SHALL BE DONE IN ACCORDANCE WITH REQUIREMENTS OF THE NATIONAL ELECTRIC CODE AND ALL OTHER APPLICABLE CODES AND REGULATIONS. ALL EQUIPMENT SHALL BE GROUNDED TO THE EQUIPMENT GROUNDING SYSTEM.
6. ELECTRICAL CONTRACTOR SHALL FURNISH CONDUIT, WIRING AND EQUIPMENT AS SHOWN ON THIS DRAWING. CONTRACTOR SHALL PERFORM ALL ELECTRICAL INSTALLATION AND CONNECTIONS.
7. SWITCHES AND RECEPTACLES SHALL BE MOUNTED 4'-0", ABOVE FLOOR EXCEPT WHERE OTHERWISE NOTED.
8. ALL MOUNTING HEIGHTS ARE GIVEN TO BOTTOM OF FIXTURES. COORDINATE EXACT MOUNTING HEIGHTS IN THE FIELD WITH OTHER TRADES WORK, OBSTRUCTIONS ETC.
9. ALL WIRES IN LIGHTING PANELS TO BE BUNDLED AND TAPED IN A WORKMANLIKE MANNER.
10. ALL BRANCH CONDUITS TO FIXTURES AND DEVICES SHALL BE 1/2" UNLESS OTHERWISE SPECIFIED.
11. PANEL SCHEDULES SHALL BE MARKED TO INDICATE CHANGES OR NEW PANEL SCHEDULE SHALL BE INSTALLED WHEN PROVIDED WITH OTHER DRAWINGS CONTRACTOR TO TYPE SCHEDULE AND PUT IT IN THE DOOR SLOT OF PANEL.
12. PROVIDE EXPANSION/DEFLECTION FITTINGS FOR ALL RACEWAYS CROSSING BUILDING EXPANSION JOINTS.
13. SEAL ALL WALL AND FLOOR PENETRATIONS WITH APPROVED CAULKING OR FIRESTOPPING. FOLLOW MANUFACTURER'S INSTALLATION INSTRUCTIONS.
14. ALL FIXTURES SHALL BE CONNECTED TO EXISTING PANEL "k", CIRCUIT #40 FOR ALL NEW INTERIOR FIXTURES, CIRCUIT #42 FOR ALL NEW EXIT AND EXTERIOR LIGHTS UNLESS NOTED OTHERWISE. PROVIDE AND INSTALL (2) 20A/1P BREAKERS IN PANEL AS REQ'D.
15. FIXTURES DESIGNATED AS EMERGENCY TYPE SHALL BE PROVIDED WITH AN ADDITIONAL UN-SWITCHED HOT LEG CONNECTED AHEAD OF ALL LOCAL SWITCHES AND CONTROLS FOR CONNECTION TO THE FIXTURS INTEGRAL EMERGENCY BATTERY PACK.

1
E-201
PARTIAL FIRST FLOOR LIGHTING PLAN
3/16" = 1'-0"

ORIGINAL SHEET - ARCH E1

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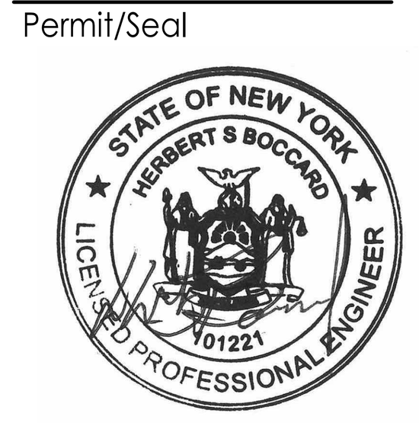


Client/Project Logo

Pfizer

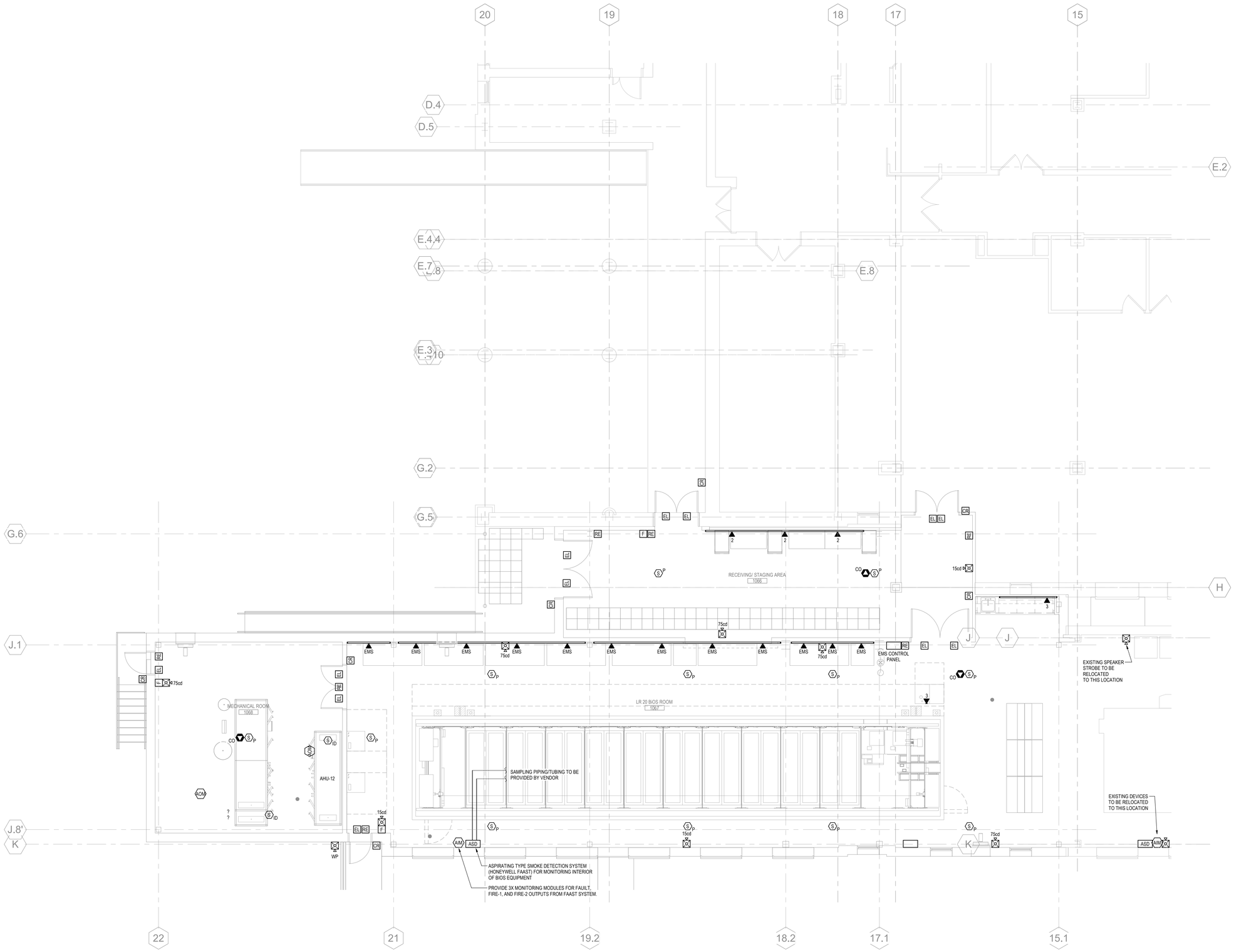
Client/Project
Pfizer Global Research and Development

Hamilton BiOS #2 Addition

Pearl River, NY

Title
PARTIAL FIRST FLOOR LIGHTING PLAN

Project No. 191501254
Scale 3/16" = 1'-0"
Revision 0
Drawing No. **E-201**



GENERAL NOTES:

1. UNLESS OTHERWISE DIRECTED BY THE FIRE ALARM VENDOR, WIRING SHALL BE TEFLON INSULATED AND JACKETED FIRE ALARM RATED CABLES # 14 AWG MINIMUM IN 3/4" EMT.
2. PROVIDE ALL NECESSARY EQUIPMENT, DEVICES, WIRING, ETC. REQUIRED TO MAKE THE INSTALLATION COMPLETE AND IN CONFORMANCE WITH ALL CODES.
3. ALL FIRE ALARM DEVICES SHALL BE TESTED & ADJUSTED TO WORK PROPERLY AND LEFT IN PERFECT OPERATING CONDITION.
4. ACTIVATION OF DUCT DETECTOR OR ANY OTHER DETECTOR SHALL SHALL IMMEDIATELY AND COMPLETELY SHUT DOWN THE VENTILATION SYSTEM. MANUAL OPERATION REQUIRED FOR RESTARTING UNIT.
5. MAXIMUM OF TWO DUCT DETECTORS PERMITTED TO BE PROGRAMMED IN EACH ZONE.
6. FIRE ALARM CONTRACTOR SHALL PROVIDE AND INSTALL FAULT ISOLATOR MODULES BETWEEN GROUPS OF ADDRESSABLE DEVICES AS REQUIRED.
7. MAGLOCKS SHALL DEENERGIZE UPON BUILDING FIRE ALARM CONDITION.

1 E-301 **PARTIAL FIRST FLOOR SYSTEMS PLAN**
3/16" = 1'-0"

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Pearl River, NY

Title
PARTIAL FIRST FLOOR SYSTEMS PLAN

Project No. 191501254 — Scale 3/16" = 1'-0"

Revision 0 — Drawing No. **E-301**