

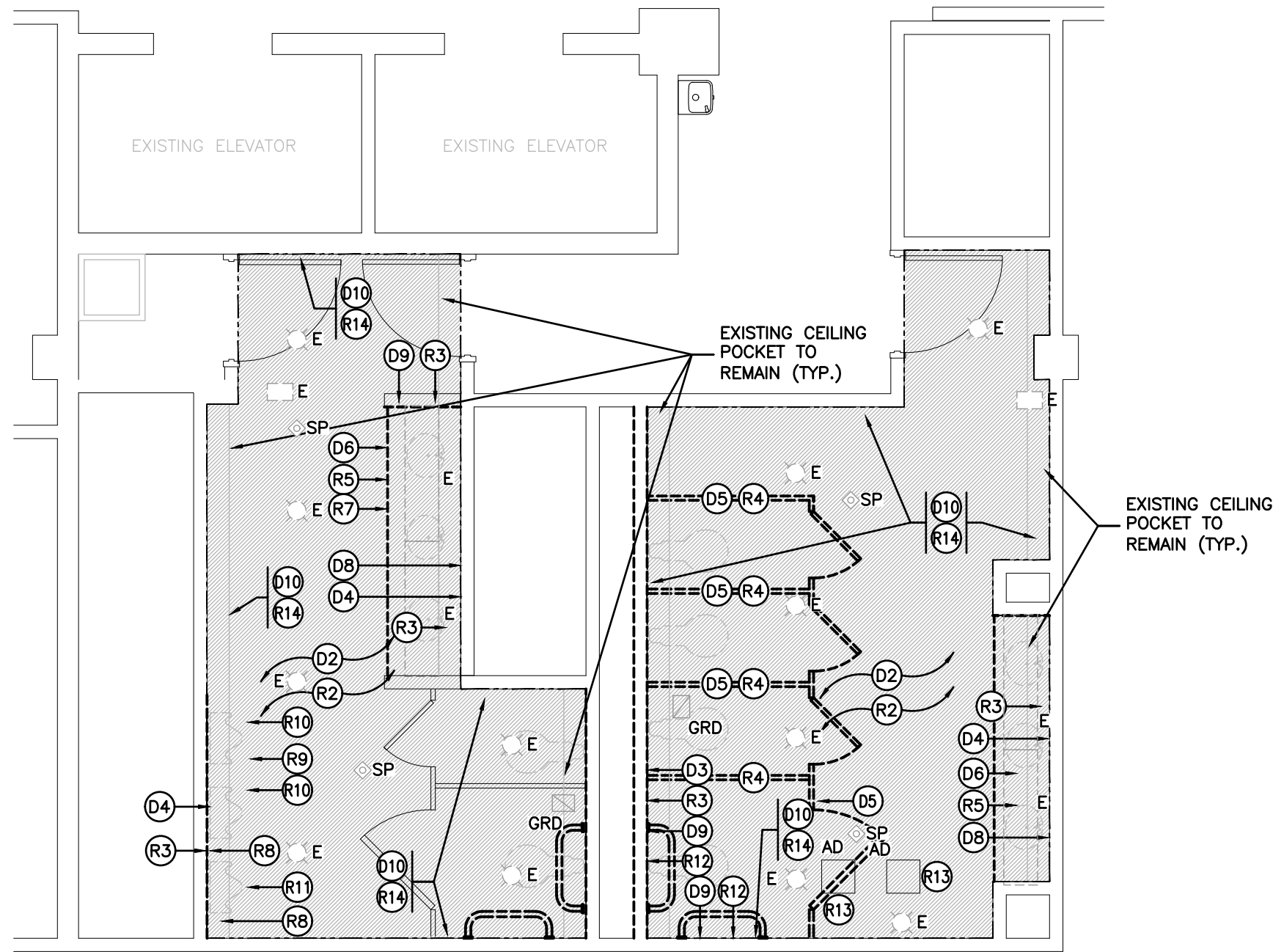
# CITY OF WATERLOO WCC WASHROOM RENOVATIONS PHASE 1 (RFT25-06-1)

100 REGINA ST S, WATERLOO, ON N2J 4P9

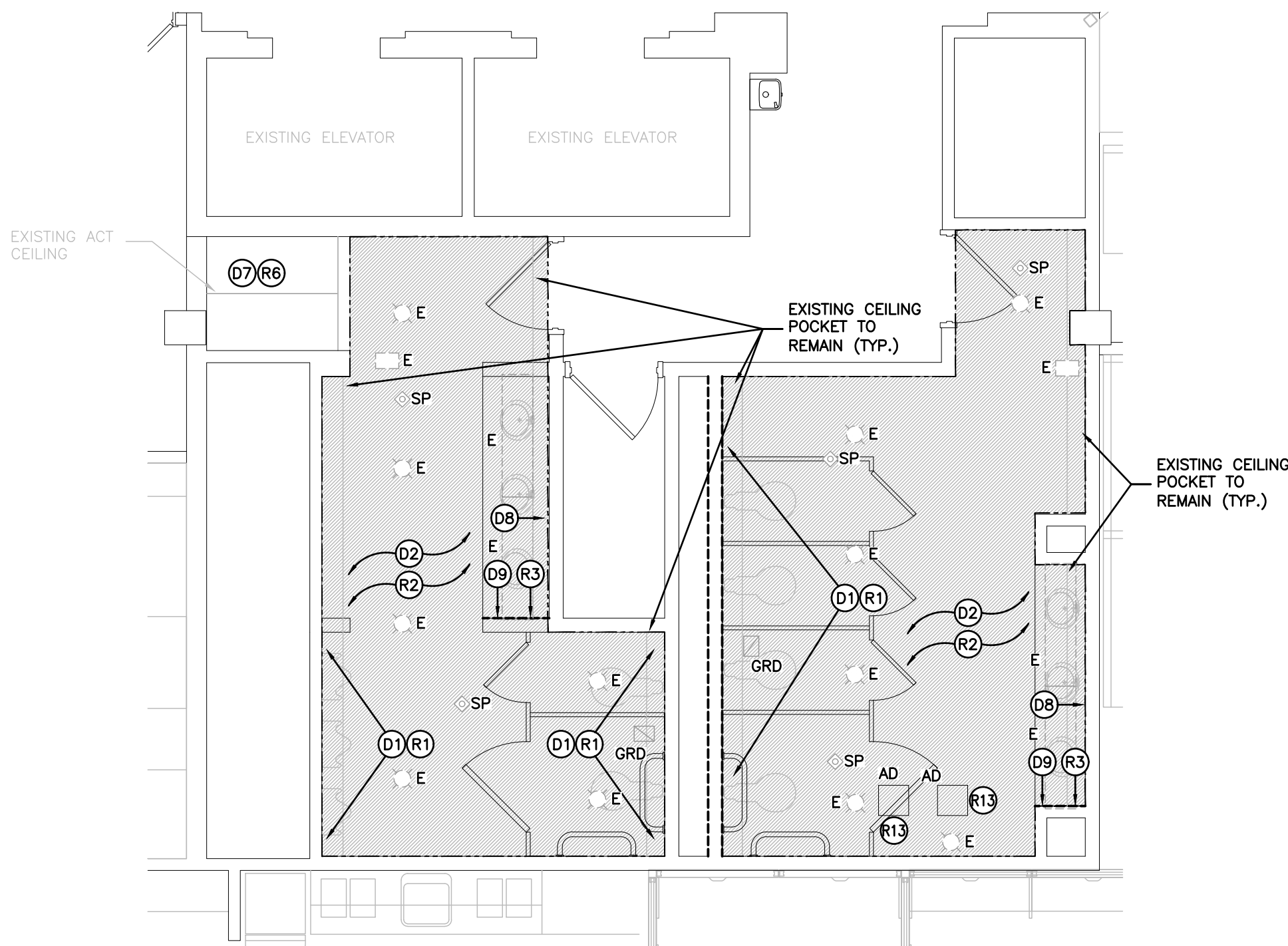
## WATERLOO CITY CENTER CENTRAL WASHROOM RENOVATIONS (2025)

ARCHITECTURAL LEGEND

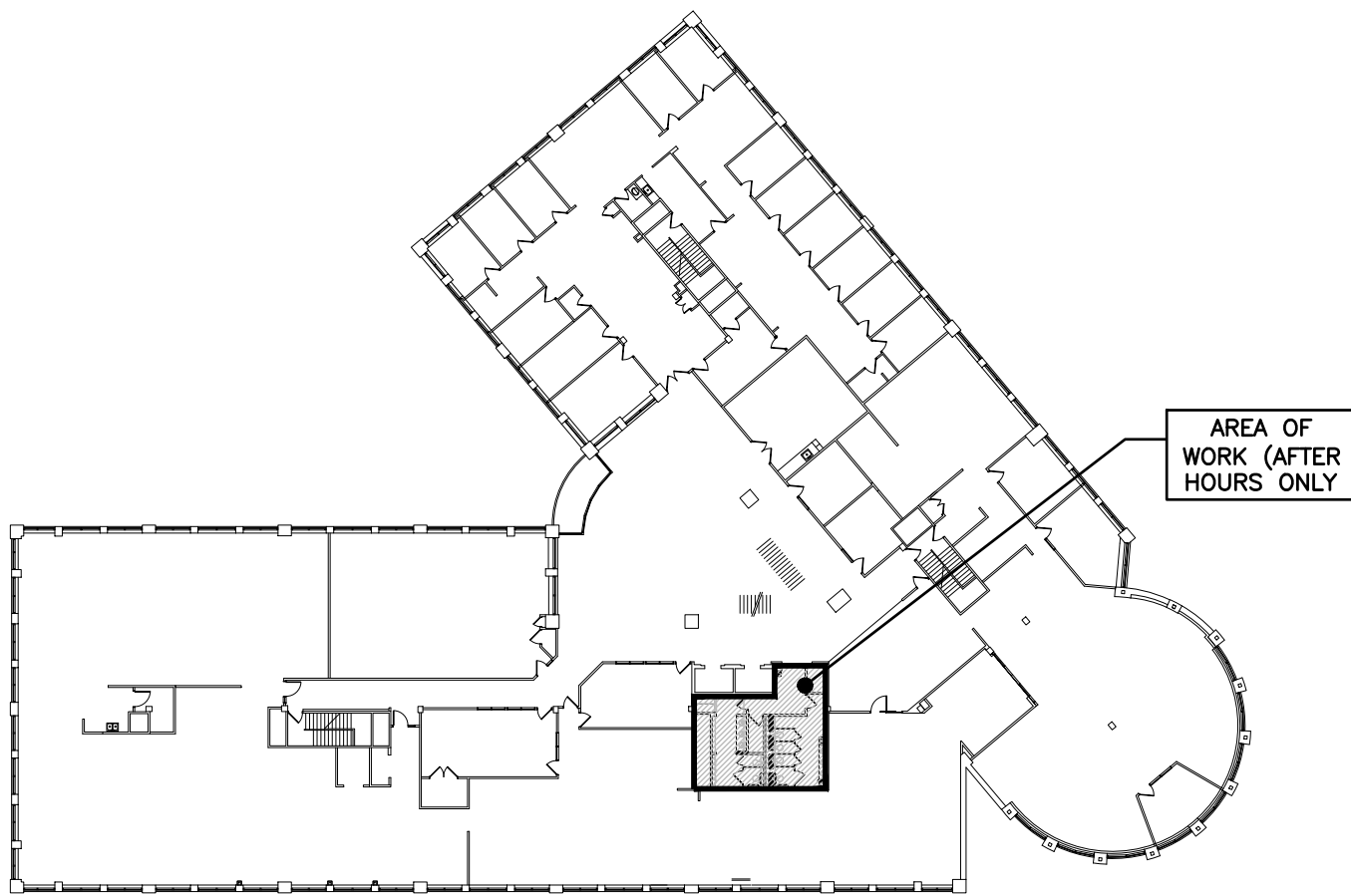
Item	Description
GB	GYPSUM BOARD
ACT	ACOUSTIC CEILING TILE
E	ELECTRICAL DEVICE OR LIGHTING FIXTURE. SEE ELEC.
SP	EXISTING SPRINKLER HEAD
AD	ACCESS DOOR
GRD	GRILLE/REGISTER/DIFFUSER. SEE HVAC DRAWINGS.



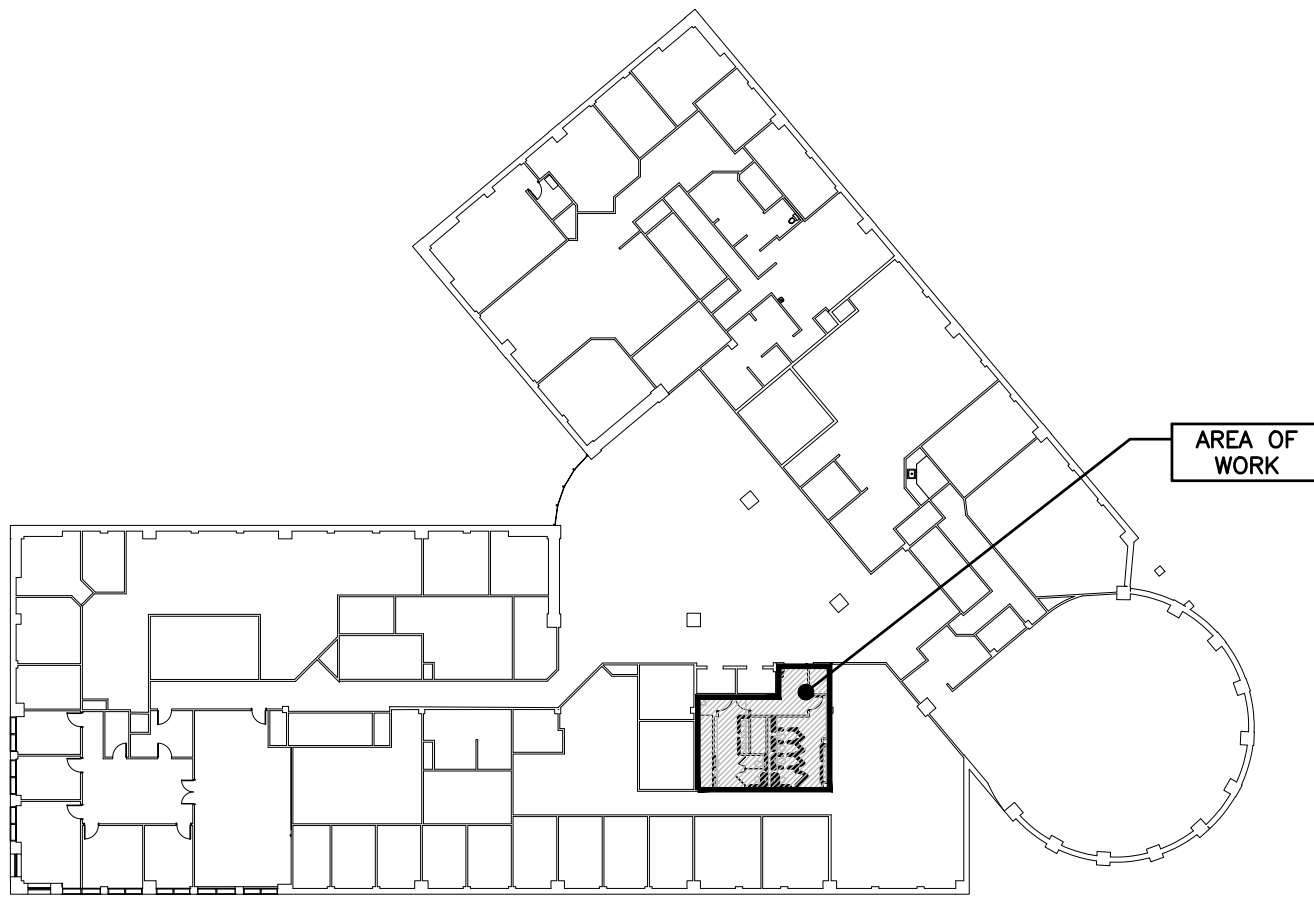
THIRD FLOOR WASHROOM – FLOOR PLAN & RCP DEMO & RENO  
SCALE: 1:50



SECOND FLOOR WASHROOM – FLOOR PLAN & RCP DEMO & RENO  
SCALE: 1:50



KEY PLAN – SECOND FLOOR  
SCALE: 1:500



KEY PLAN – THIRD FLOOR  
SCALE: 1:500

GENERAL ARCHITECTURAL NOTES

- VERIFY SITE DIMENSIONS AND DIMENSIONS OF NEW WORK BEFORE PROCEEDING WITH DEMOLITION OR REMOVAL OF EXISTING BUILDING MATERIALS.
- THE REPLACEMENT OF ANY DAMAGED CEILING TILES IS THE RESPONSIBILITY OF THE CONTRACTOR. MATCH EXISTING TILES TO THE SATISFACTION OF THE OWNER AND CONSULTANT.
- REPAIR ANY DAMAGE TO EXISTING SUSPENDED ACOUSTIC CEILING TILE AND GRID AND ALL OTHER CEILING ELEMENTS WHERE AFFECTED BY NEW STRUCTURAL, MECHANICAL AND ELECTRICAL WORK ABOVE. REFER TO MECHANICAL AND ELECTRICAL DRAWINGS FOR FULL EXTENT OF WORK. MATCH EXISTING MATERIALS AND FINISHES.
- EXISTING CEILINGS TO REMAIN UNLESS OTHERWISE NOTED. ACCESS AND REPLACEMENT TO EXISTING CEILINGS TO FACILITATE MECHANICAL/ELECTRICAL WORK IS THE RESPONSIBILITY OF THIS CONTRACTOR.
- CEILINGS BEING REMOVED AND RE-INSTALLED ARE TO BE RE-INSTALLED AT SAME HEIGHT UNLESS OTHERWISE NOTED.
- REFER TO ELECTRICAL PLANS FOR ALL LIGHTING THAT IS TO BE REMOVED/REPLACED. SHOWN ON THIS DRAWING FOR REFERENCE ONLY.
- SCHEDULING (2ND FLOOR): ALL WORK IN 2ND FLOOR SPACES IS FOR ACCESS TO CEILING AND PLUMBING SHAFT FOR PLUMBING WORK. ALL WORK IN THESE SPACES IS TO BE COMPLETED AFTER HOURS. SPACE IS TO BE RETURNED TO OCCUPIABLE CONDITION PRIOR BEFORE WORK HOURS EACH BUSINESS DAY. SEE SPECIFICATIONS FOR AFTER-HOURS WORK REQUIREMENTS. PROVIDE SIGNAGE AND BARRIERS TO RESTRICT ACCESS WHENEVER WORK IS IN PROGRESS.
- SCHEDULING (3RD FLOOR): 3RD FLOOR SPACES IN THIS SCOPE WILL BE CLOSED TO PUBLIC USE FOR THE DURATION OF THE PROJECT. PROVIDE SIGNAGE AND BARRIERS TO RESTRICT ACCESS.

SPECIFIC ARCHITECTURAL DEMOLITION NOTES

- REMOVE TOP 600mm OF GB FOR FULL LENGTH OF CHASE WALL FOR ACCESS TO PLUMBING CHASE. REMOVE ADDITIONAL GB WHERE REQUIRED TO FACILITATE PLUMBING REPLACEMENT WORK. STALL DIVIDERS TO REMAIN IN PLACE UNLESS PLUMBING PIPE LOCATION NECESSITATES REMOVAL.
- REMOVE EXISTING GB CEILING AS REQUIRED TO FACILITATE SANITARY AND PLUMBING REWORK. EXISTING CEILING HAS POCKET FEATURES. DECONSTRUCT TEMPORARILY AS REQUIRED & REINSTALL TO MATCH EXISTING. LIGHTS AND ELEC DEVICES: SEE ELEC DRAWINGS. DIFFUSERS: SEE MECH DRAWINGS. FIRE SPRINKLERS: REMOVE ESCUTCHEON AND PROTECT HEADS DURING DEMOLITION.
- REMOVE GB AND SHAFT WALL ON WOMEN'S WASHROOM SIDE TO GAIN ACCESS TO PLUMBING SHAFT FOR SANITARY & PLUMBING WORK. STEEL STUD STRUCTURE TO REMAIN IN EXCEPT WHERE SINGLE STUD REMOVAL AND REPLACEMENT IS REQUIRED FOR PLUMBING REVISIONS. REMOVE EXISTING WALL COVERING WHERE APPLICABLE.
- REMOVE GB AS REQUIRED TO ACCESS AND REPLACE SANITARY SEWER BRANCHES & PLUMBING IN WALL BEHIND FIXTURES. REMOVE EXISTING WALL COVERING WHERE APPLICABLE.
- REMOVE PARTITIONS AND RETAIN IN GOOD CONDITION FOR REINSTALLATION.
- REMOVE LAVATORY COUNTER, IN GOOD CONDITION. TURN OVER TO OWNER FOR RE-USE, OR DISPOSE OF IN APPROPRIATE MANNER, AS DIRECTED BY OWNER.
- REMOVE T-BAR CEILING TILES AND TEES AS REQUIRED FOR ACCESS TO PLUMBING DRAINS ABOVE.
- EXISTING MIRROR FULL HEIGHT ABOVE COUNTER TOP TO REMAIN IN PLACE AND BE PROTECTED TO PREVENT BREAKING.
- REMOVE EXISTING GRAB BARS FOR BARRIER FREE WATER CLOSET. RETAIN FOR REINSTALLATION.
- REMOVE EXISTING BASEBOARD FULL PERIMETER OF ROOM.

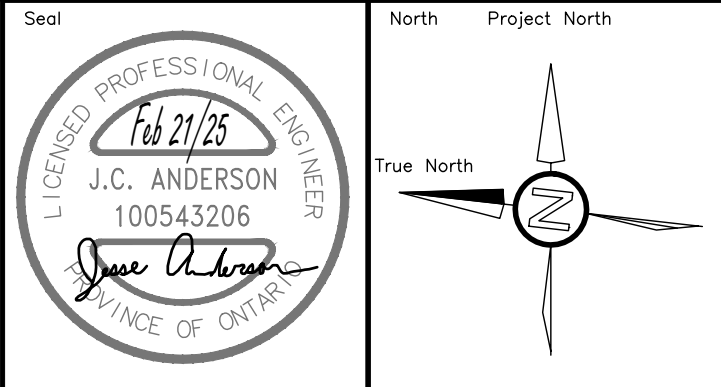
SPECIFIC ARCHITECTURAL RENOVATION NOTES

- INSTALL NEW GB TO MATCH EXISTING WALL CONSTRUCTION. FINISH AND PAINT. INSTALL NEW WALL COVERING ON LOWER HALF OF WALL TO MATCH EXISTING.
- REINSTALL AND PAINT EXISTING DRYWALL CEILING. PAINT COLOUR TO BE SELECTED BY OWNER. REINSTALL CEILING POCKETS WHERE THEY EXIST CURRENTLY. SEE ELEC/MECH DRAWINGS FOR ELEC/MECH ITEMS. REINSTALL ESCUTCHEONS AROUND SPRINKLER HEADS. ENSURE NO PAINT ON SPRINKLER HEADS. THIS CONTRACTOR TO PAY FOR SPRINKLER HEAD REPLACEMENT FOR ANY PAINTED/DAMAGED HEADS. INSTALL NEW WALL COVERING ON LOWER HALF OF WALL TO MATCH EXISTING.
- INSTALL NEW WALLS TO MATCH EXISTING.
- REINSTALL EXISTING PARTITIONS. TOUCH UP PAINT WITH MATCHING PRODUCT TO ELIMINATE SCUFFS.
- REINSTALL COUNTER-TOP. PROVIDE NEW COUNTER-TOP UNDER ALLOWANCE IF DIRECTED TO PROCEED THROUGH SUPPLEMENTAL INSTRUCTION.
- REINSTALL T-BAR GRID AND TEES.
- INSTALL NEW COUNTERTOP WITH TOP OF COUNTERTOP AT 865mm AFF. ENSURE HEIGHT OF COUNTERTOP BACKSPLASH REACHES UNDERSIDE OF WALL MIRROR TO MAINTAIN CURRENT VISUAL APPEARANCE.
- PROVIDE NEW GRAB RAILS FOR BARRIER FREE URINAL. PROVIDE APPROPRIATE BLOCKING FOR SUPPORT OF NEW GRAB RAILS.
- PROVIDE NEW PRIVACY SCREEN. SUPPLY OF SCREEN UNDER ALLOWANCE. INSTALLATION COST TO BE INCLUDED IN CONTRACT.
- MINIMUM 600mm CLEARANCE FOR NON-BARRIER FREE URINAL INSTALLATION.
- MINIMUM 800mm CLEARANCE FOR BARRIER FREE URINAL INSTALLATION. BARRIER FREE RIM SHALL BE NO MORE THAN 430mm A.F.F.
- REINSTALL EXISTING GRAB BARS FOR BARRIER FREE WATER CLOSET.
- PROVIDE NEW POWDER-COATED ALUMINUM ACCESS DOORS. COORDINATED LOCATION & SIZE WITH MECH. PAINT TO MATCH EXISTING CEILING. COORDINATE SUPPLY OF ACCESS DOORS WITH MECH TRADE. SEE MECH SPECS FOR DETAILS.
- CAULK BETWEEN GWB AND FLOOR TO IMPROVE WATER RESISTANCE OF PERIMETER OF ROOM. INSTALL NEW BASEBOARD MATCHING EXISTING THAT WAS REMOVED.

The contractor shall verify all dimensions and report all errors and discrepancies to the Consultant before commencement of the work.  
The drawings show general arrangement of services. Follow as closely as actual building construction will permit. Obtain approval for relocation of service from Consultant before commencement of the work.  
The drawings do not indicate all offsets fitting and accessories which may be required. Provide the same to meet the required conditions.  
Drawings and specifications, etc., prepared and issued by the Consultant are the property of the Consultant and must be returned at the completion of the project. These documents are not to be duplicated or copied without the consent of the Consultant.  
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ISSUANCES

No	DATE YY.MM.DD	DESCRIPTION	BY
1	23.06.14	ISSUED FOR REVIEW	JA
2	23.08.23	ISSUED FOR TENDER REVIEW	JA
3	23.09.12	ISSUED FOR PERMIT	JA
4	23.09.28	ISSUED FOR PERMIT & TENDER	JA
5	23.10.20	ISSUED FOR PERMIT & TENDER	JA
6	23.11.22	REISSUED FOR PERMIT	JA
7	24.01.08	REISSUED FOR TENDER	JA
8	24.01.18	REISSUED FOR BUILDING PERMIT	JA
9	24.05.17	REISSUED FOR 100% REVIEW	JA
10	25.02.21	ISSUED FOR PERMIT & TENDER	JA



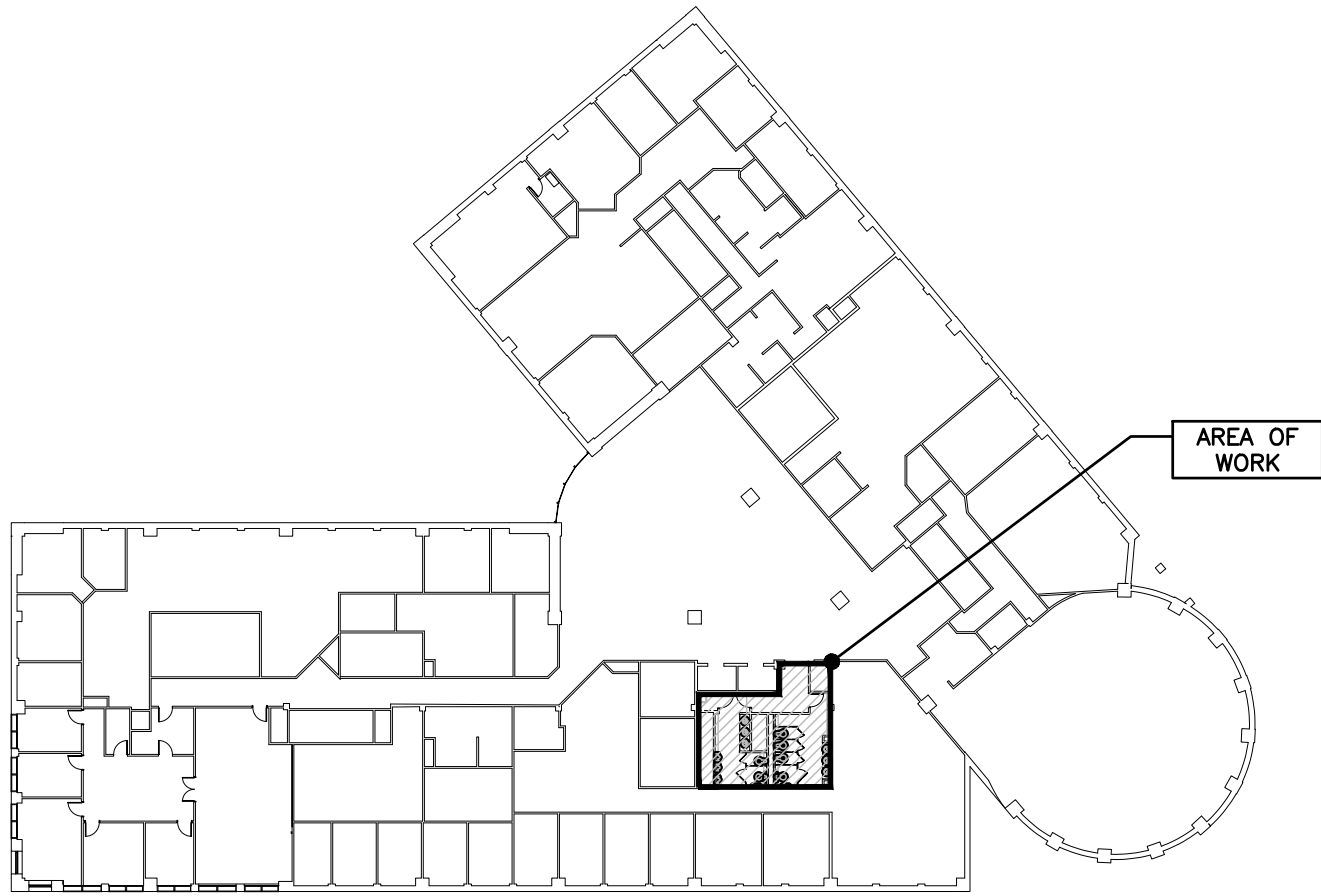
Project  
**WATERLOO CITY CENTRE  
CENTRAL WASHROOM  
RENOVATIONS PHASE 1**  
100 REGINA ST S, WATERLOO, ON N2J 4P9

Sheet Title  
**ARCHITECTURAL PLANS  
DEMO & RENO**

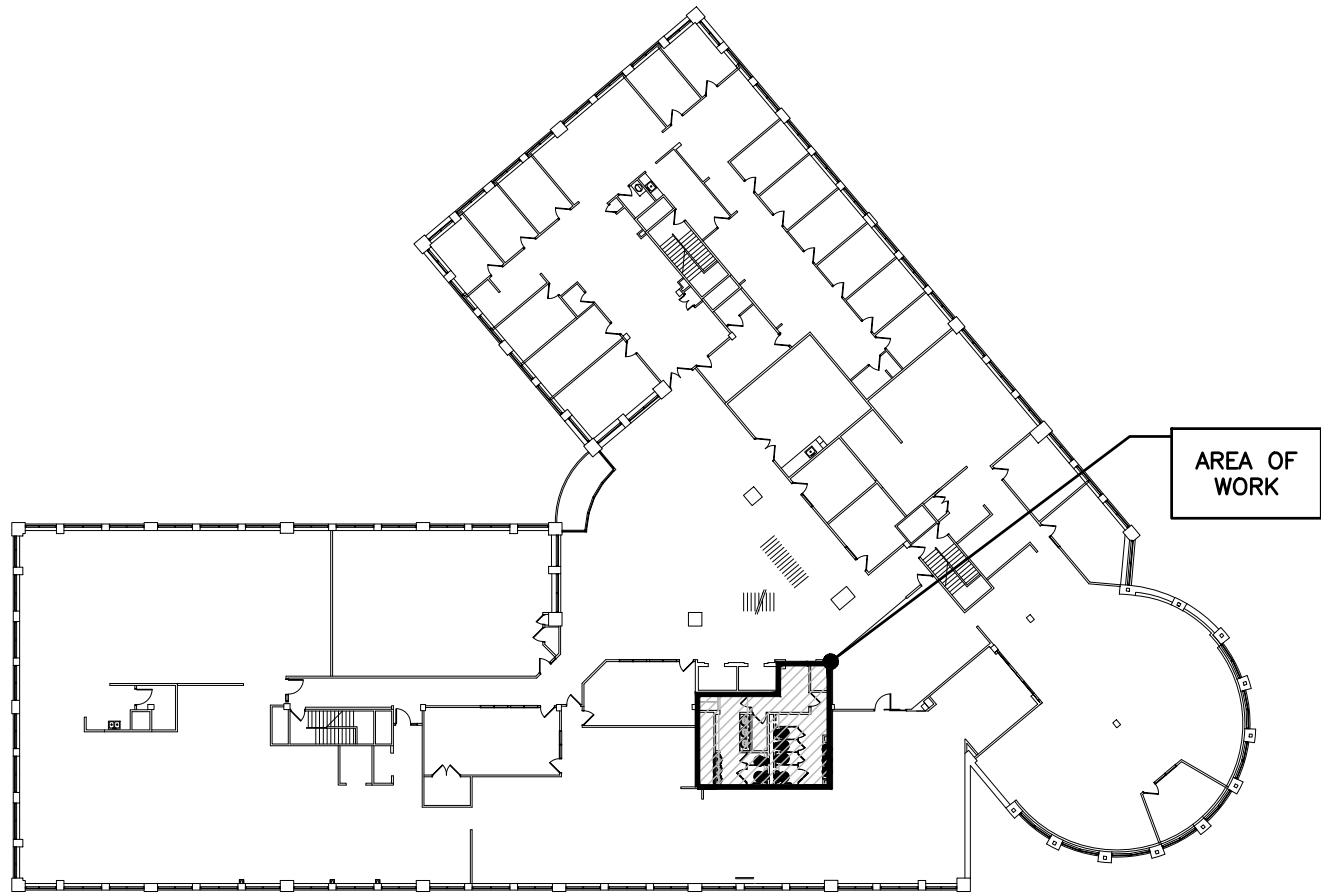
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**Consulting Engineers**  
**MECHANICAL | ELECTRICAL | AQUATIC**  
55 Northland Road, Waterloo, ON N2V 1Y8  
Phone: 519-725-3555  
Website: deiassociates.ca

Drawn by SVA	Checked by JA	Approved by JA
Scale AS NOTED	Project Date SEP 2023	Print Date FEB 2025

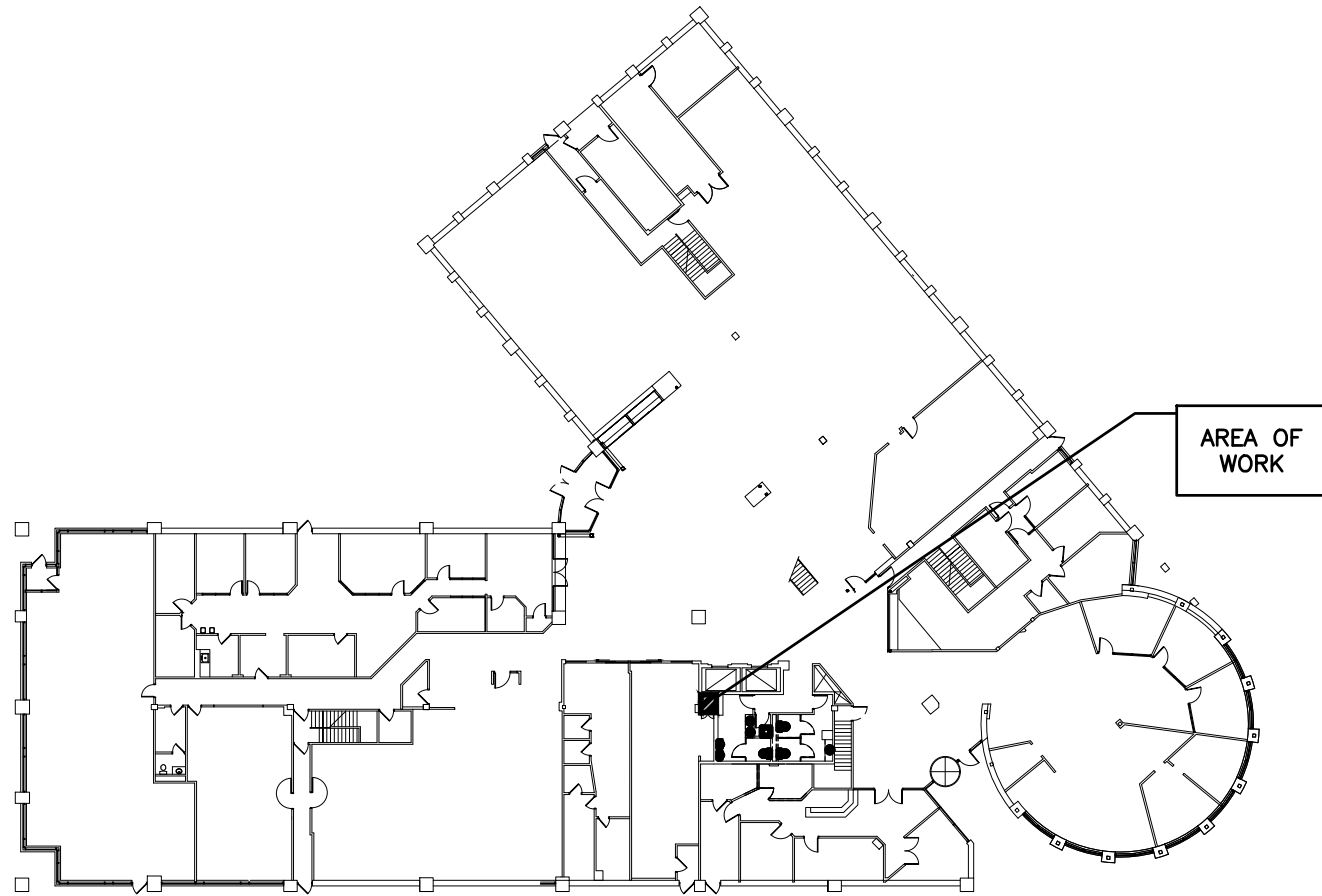
Project No. <b>23115</b>	Drawing No. <b>A101</b>
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KEY PLAN – THIRD FLOOR  
SCALE: 1:500



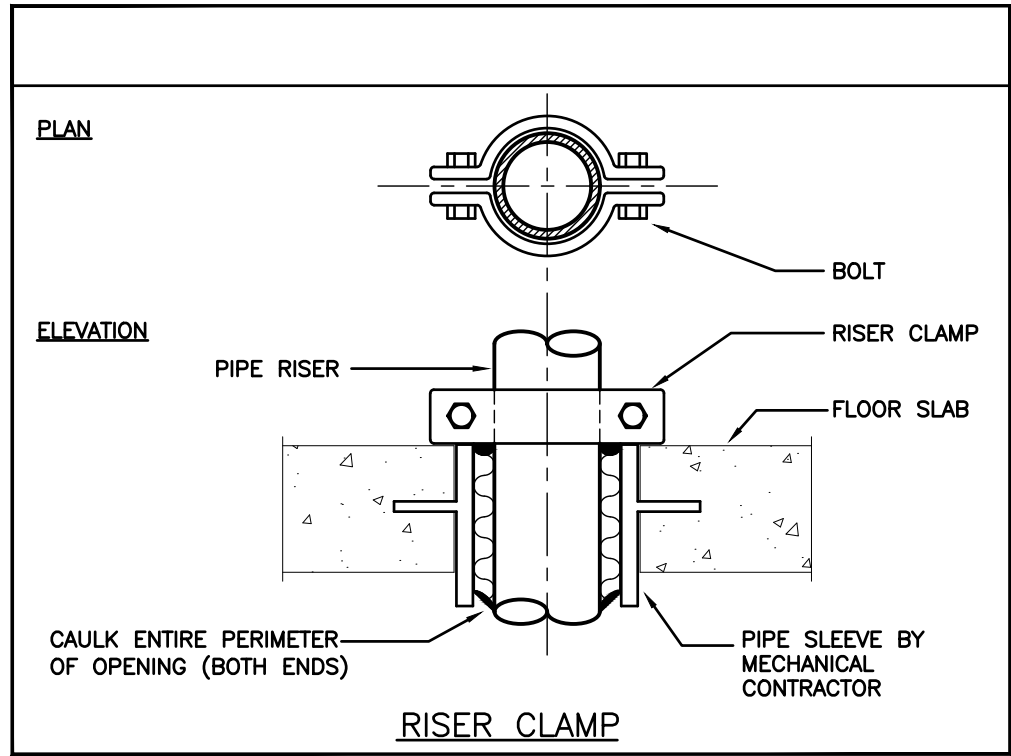
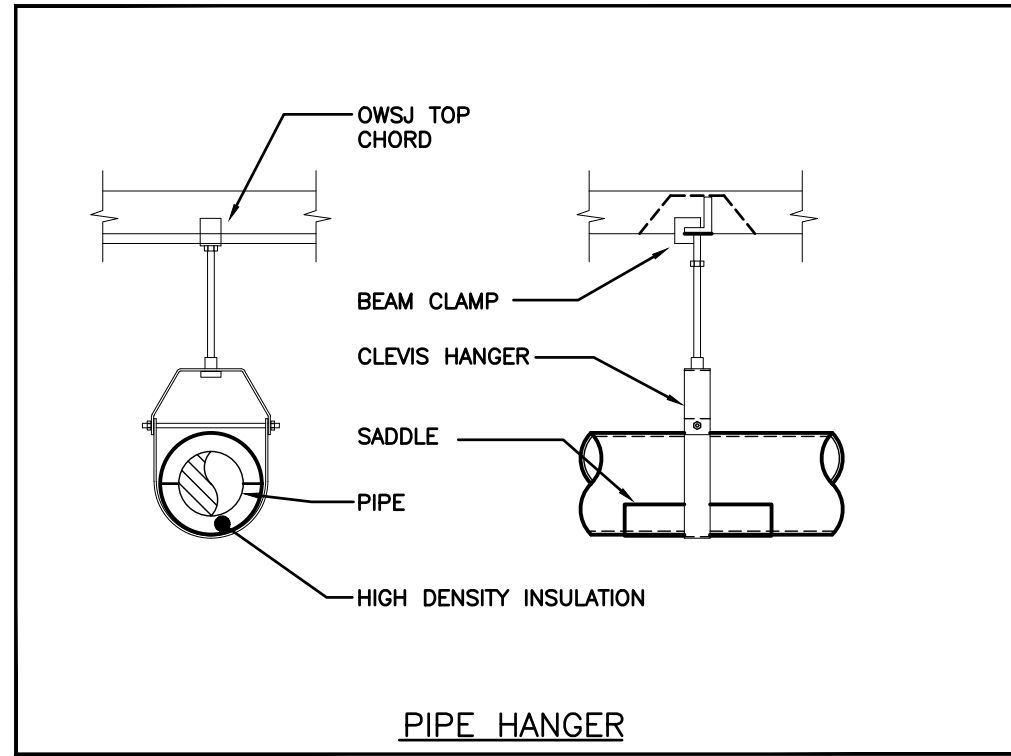
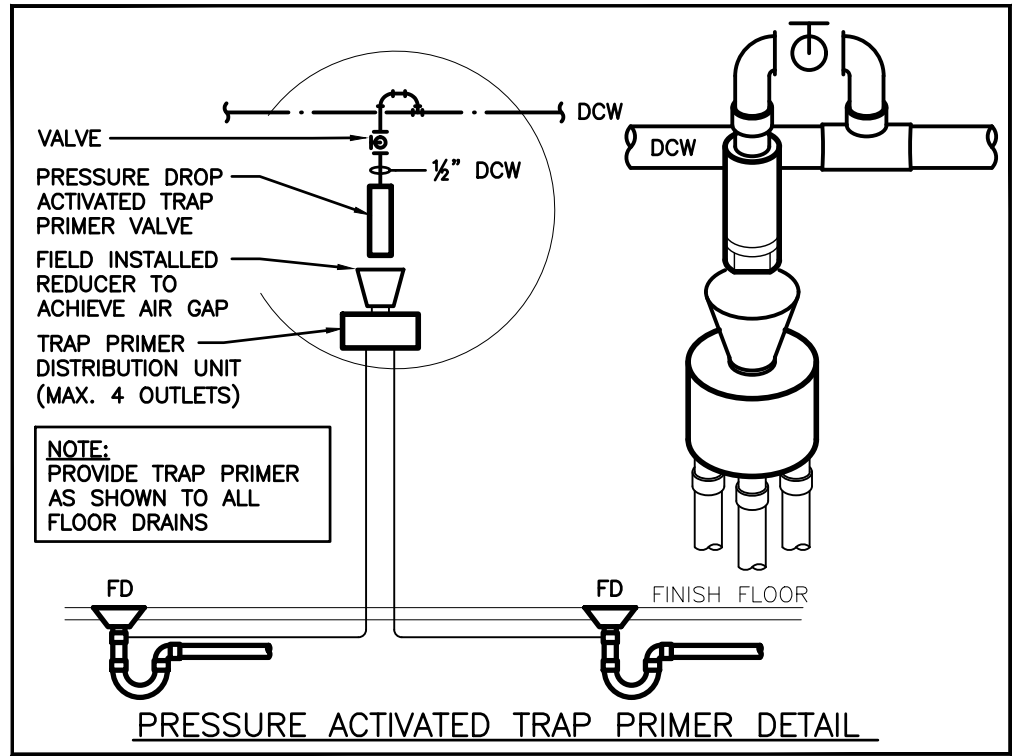
KEY PLAN – SECOND FLOOR  
SCALE: 1:500



KEY PLAN – FIRST FLOOR  
SCALE: 1:500

PLUMBING FIXTURE SCHEDULE (IDENTIFIED PRICES – SEE SPECIFICATIONS)

Item	Type	Connection Sizes					Fixture		Trim		Accessories	
		HW	CW	TW	Drain	Vent	Acceptable Manufacturer	Fixture Description	Acceptable Manufacturer	Trim Description	Acceptable Manufacturer	Accessory Description
WC-1	WATER CLOSET FLUSH VALVE		1		3	1 1/2	AMERICAN STANDARD MADERA 2234-001 KOHLER WELLCOMME K-4350 MANSFIELD BALTIC 1311NS ZURN Z5655-BWL	VITREOUS CHINA, SIPHON JET, ELONGATED RIM, TOP SPUD FOR FLUSH VALVE, BOLT CAP, BOTTOM OUTLET, FLOOR-MOUNTED, 10" OR 12" ROUGH-IN, MIN 2" TRAP WAY, MAXIMUM 6 litres (1.6 gal) PER FLUSH.	DELTA 81T201-5 ZURN Z6000AV-WS1 SLOAN 111-1.6	EXPOSED, POLISHED CHROME, EXTERNALLY ADJUSTABLE, DIAPHRAGM TYPE FLUSH VALVE WITH 25 mm (1") SCREWDRIVER ANGLE STOP, OSCILLATING HANDLE, FLUSH CONNECTION AND COUPLING FOR 40 mm (1 1/2") TOP SPUD, WALL AND SPUD ESCUTCHEONS, SEAT BUMPER AND VACUUM BREAKER. FLUSH CYCLE SET FOR 6 litres (1.5 gal) PER FLUSH	SEAT: BEMIS 2155SSCT CENTOCO AM500STSCSS	SEAT: WHITE, ELONGATED, OPEN FRONT, LESS COVER, MOLDED SOLID ANTIMICROBIAL PLASTIC, STAINLESS STEEL CHECK HINGES, STAINLESS STEEL OR SOLID BRASS INSERT POST.
WC-2	BARRIER FREE WATER CLOSET FLUSH VALVE, 16" HIGH		1		3	1 1/2	AMERICAN STANDARD MADERA 2234-001 KOHLER HIGHCREST K-4302 MANSFIELD ADRIATIC 1319 ZURN Z5655-BWL	BARRIER FREE, 16" TALL TO RIM, VITREOUS CHINA, SIPHON JET, ELONGATED RIM, TOP SPUD FOR FLUSH VALVE, BOLT CAP, BOTTOM OUTLET, FLOOR-MOUNTED, 10" OR 12" ROUGH-IN, MIN 2" TRAP WAY, MAXIMUM 6 litres (1.6 gal) PER FLUSH.	DELTA 81T201-5 ZURN Z6000AV-WS1 SLOAN 111-1.6	BARRIER FREE, EXPOSED, POLISHED CHROME, EXTERNALLY ADJUSTABLE, DIAPHRAGM TYPE FLUSH VALVE WITH 25 mm (1") SCREWDRIVER ANGLE STOP, OSCILLATING HANDLE, FLUSH CONNECTION AND COUPLING FOR 40 mm (1 1/2") TOP SPUD, WALL AND SPUD ESCUTCHEONS, SEAT BUMPER AND VACUUM BREAKER. FLUSH CYCLE SET FOR 6 litres (1.5 gal) PER FLUSH	SEAT: BEMIS 7850TDG CENTOCO AM820STS	SEAT: WHITE, ELONGATED, OPEN FRONT WITH COVER, MOLDED SOLID ANTIMICROBIAL PLASTIC, STAINLESS STEEL CHECK HINGES, STAINLESS STEEL OR SOLID BRASS INSERT POST.
L-1	COUNTER MOUNTED LAV ELECTRONIC FAUCET	1/2	1/2		1 1/4	1 1/4	AMERICAN STANDARD COLONY 0346-403 KOHLER PENNINGTON K-2196 ZURN Z5110	VITREOUS CHINA SINK, SELF-RIMMING, WITH FRONT OVERFLOW, SOAP DEPRESSIONS, GASKET, SWIVEL CLAMPS, SEMI-OVAL, SUPPLY OPENINGS ON 100 MM (4") CENTRES. SIZES: 521 MM X 440 MM (20 1/2" X 17 5/8") OUTSIDE.	DELTA 591T2030 MOEN COMMERCIAL 8301-AC ZURN Z6915-HW6-XL	HARDWIRED ELECTRONIC FAUCET. CAST BRASS ONE PIECE BODY WITH INTEGRAL WATER PROOF INFRA-RED SENSOR AND CONNECTOR. ADJUSTABLE SENSING RANGE 76mm to 381mm (3" TO 15") AND TIME OUT 15 TO 75 SECONDS CHROME FINISH. VANDAL RESISTANT AERATOR HAVING INTEGRAL FLOW CONTROL FOR 1.5gpm (5.7 L/MIN) @ 413 KPA (60 PSI) MAX. UNDER COUNTER PLASTIC SURFACE MOUNTED HOUSING FOR SOLENOID AND CONTROLLER. SENSOR ACTIVATES IN PRESENCE OF PERSON'S HANDS IN LAVATORY. C/W PLUG-IN TRANSFORMER.		WASTE FITTING: OPEN GRID STRAINER THERMOSTATIC MIXING VALVE UNDER LAV. DELTA R3070-MIXLF, POWERS LM490 OR EQUAL.
U-1	URINAL FLUSH VALVE, HANDS FREE		3/4		2	1 1/2	AMERICAN STANDARD WASHBROOK 6590.005 KOHLER BARDON K-4904-ET ZURN Z5750	VITREOUS CHINA, WASHOUT TYPE, INTEGRAL FLUSHING RIM, EXTENDED SHIELDS, INTEGRAL TRAP, BACK OUTLET, WALL-MOUNTED, TOP SUPPLY SPUD, MIN 2" TRAP WAY, MAXIMUM 1.9 litres (0.5 gal) PER FLUSH. C/W FLOOR MOUNTED CARRIER	DELTA 81T231-WMSHW ZURN ZEMS6003AV-EWS SLOAN 186 ES-S-0.5	POLISHED CHROME PLATED VANDAL RESISTANT METAL COVER WITH HARDWIRED WALLMOUNTED SENSOR, RIGHT OR LEFT-HAND SUPPLY INSTALLATION, AUTOMATIC OPERATION HARDWIRE POWERED SENSOR. INFRARED SENSOR TO HAVE A RANGE ADJUSTMENT OF 305MM - 711MM (12" - 28") AND ELECTRONIC MANUAL OVERRIDE BUTTON. FLUSH CYCLE SET .9 LITRE (0.50 GAL.)		
U-2	URINAL FLUSH VALVE, BARRIER FREE, HANDS FREE		3/4		2	1 1/2	AMERICAN STANDARD WASHBROOK 6590.005 KOHLER BARDON K-4904-ET ZURN Z5750	VITREOUS CHINA, WASHOUT TYPE, INTEGRAL FLUSHING RIM, EXTENDED SHIELDS, INTEGRAL TRAP, BACK OUTLET, WALL-MOUNTED, TOP SUPPLY SPUD, MIN 2" TRAP WAY, MAXIMUM 1.9 litres (0.5 gal) PER FLUSH. C/W FLOOR MOUNTED CARRIER. URINAL RIM SHALL BE MOUNTED NO MORE THAN 430mm A.F.F.	DELTA 81T231-WMSHW ZURN ZEMS6003AV-EWS SLOAN 186 ES-S-0.5	POLISHED CHROME PLATED VANDAL RESISTANT METAL COVER WITH HARDWIRED WALLMOUNTED SENSOR, RIGHT OR LEFT-HAND SUPPLY INSTALLATION, AUTOMATIC OPERATION HARDWIRE POWERED SENSOR. INFRARED SENSOR TO HAVE A RANGE ADJUSTMENT OF 305MM - 711MM (12" - 28") AND ELECTRONIC MANUAL OVERRIDE BUTTON. FLUSH CYCLE SET .9 LITRE (0.50 GAL.)		



GENERAL NOTES

- ALL DRAWINGS ARE TO BE READ IN CONJUNCTION WITH THE PREPARED SPECIFICATION.
  - SUPPLY OF NEW PLUMBING FIXTURES INVOLVES AN IDENTIFIED PRICE. REFER TO SPECIFICATIONS.
  - WATER PIPING, DUCTWORK, SPRINKLER PIPING, AND SPRINKLER HEADS TO REMAIN EXCEPT WHERE INDICATED FOR REMOVAL OR REPLACEMENT.
  - SANITARY VENT PIPING IS NOT SHOWN. PROVIDE ALL NECESSARY VENT PIPING FROM ALL FIXTURES FOR A COMPLETE SYSTEM TO ALL LOCAL PLUMBING CODE & LOCAL AUTHORITY REQUIREMENTS, CONNECTED TO EXISTING VENTS OR NEW VENTS AS REQUIRED. CO-ORDINATE VENT LOCATION(S) WITH GENERAL CONTRACTOR. MAINTAIN MIN 14"-0" FROM ANY AIR INLET. INSTALL VENT PIPING HIGH IN JOIST SPACE.
  - CONTRACTOR TO LOCATE ISOLATION VALVES / FREEZE PIPING / OR OTHERWISE DRAIN SYSTEMS TO ALLOW PROPOSED WORK TO PROCEED. REFILL SYSTEMS AS INDICATED.
  - SCHEDULING (2ND FLOOR): ALL WORK IN 2ND FLOOR SPACES IS FOR ACCESS TO CEILING AND PLUMBING SHAFT FOR PLUMBING WORK. ALL WORK IN THESE SPACES IS TO BE COMPLETED AFTER HOURS. SPACE IS TO BE RETURNED TO OCCUPIABLE CONDITION PRIOR BEFORE WORK HOURS EACH BUSINESS DAY. SEE SPECIFICATIONS FOR AFTER-HOURS WORK REQUIREMENTS. PROVIDE SIGNAGE AND BARRIERS TO RESTRICT ACCESS WHENEVER WORK IS IN PROGRESS.
  - SCHEDULING (3RD FLOOR): 3RD FLOOR SPACES IN THIS SCOPE WILL BE CLOSED TO PUBLIC USE FOR THE DURATION OF THE PROJECT. PROVIDE SIGNAGE AND BARRIERS TO RESTRICT ACCESS.
  - UPON COMPLETION OF THE PROJECT OR UPON COMPLETION OF EACH INDIVIDUAL PHASE OF THE PROJECT THE CONTRACTORS SHALL PROVIDE THE FOLLOWING CERTIFICATES BEFORE CONFORMANCE LETTERS ARE ISSUED BY THE CONSULTANT:
    - POTABLE WATER TEST (SEE SPEC)
- ALL CERTIFICATES ARE TO BE SUBMITTED TOGETHER IN A SINGLE PACKAGE.

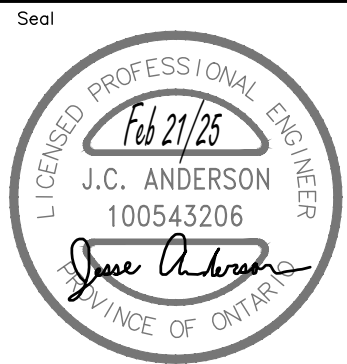
MECHANICAL LEGEND

Item	Description	Item	Description
-----	ITEM TO BE REMOVED	FD	FLOOR DRAIN
	CUT EXISTING & CONNECT NEW PIPING		TRAP PRIMER
	FLOW DIRECTION		TEE CONNECTION
	POTABLE COLD WATER		PIPE DOWN
	POTABLE HOT WATER		PIPE UP
	EXISTING SAN ABOVE FLOOR		REDUCER/INCRASER
	EXISTING SAN BELOW FLOOR		CHECK VALVE
	SANITARY ABOVE FLOOR		BALL VALVE
	SANITARY BELOW FLOOR		BUTTERFLY VALVE
	EXISTING STM ABOVE FLOOR		FLOOR CLEANOUT
	EXISTING STM BELOW FLOOR		LINE CLEANOUT
	STORM ABOVE FLOOR		VALVE ON RISER
	STORM BELOW FLOOR		
	VENT		

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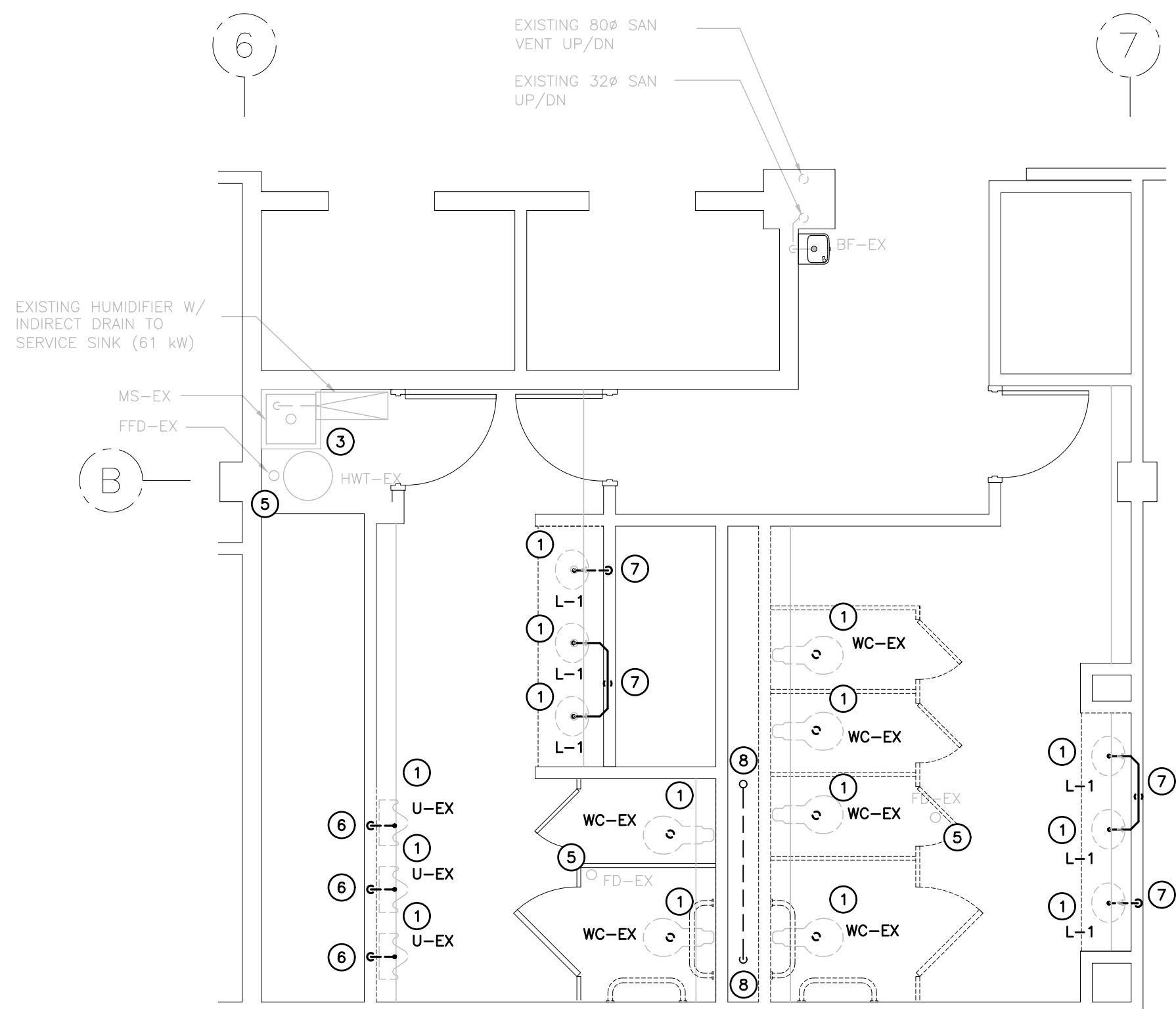
Project  
**WATERLOO CITY CENTRE  
CENTRAL WASHROOM  
RENOVATIONS PHASE 1**  
100 REGINA ST S, WATERLOO, ON N2J 4P9

Sheet Title  
**LEGEND, GENERAL NOTES  
KEY PLANS, DETAILS,  
& SCHEDULES**

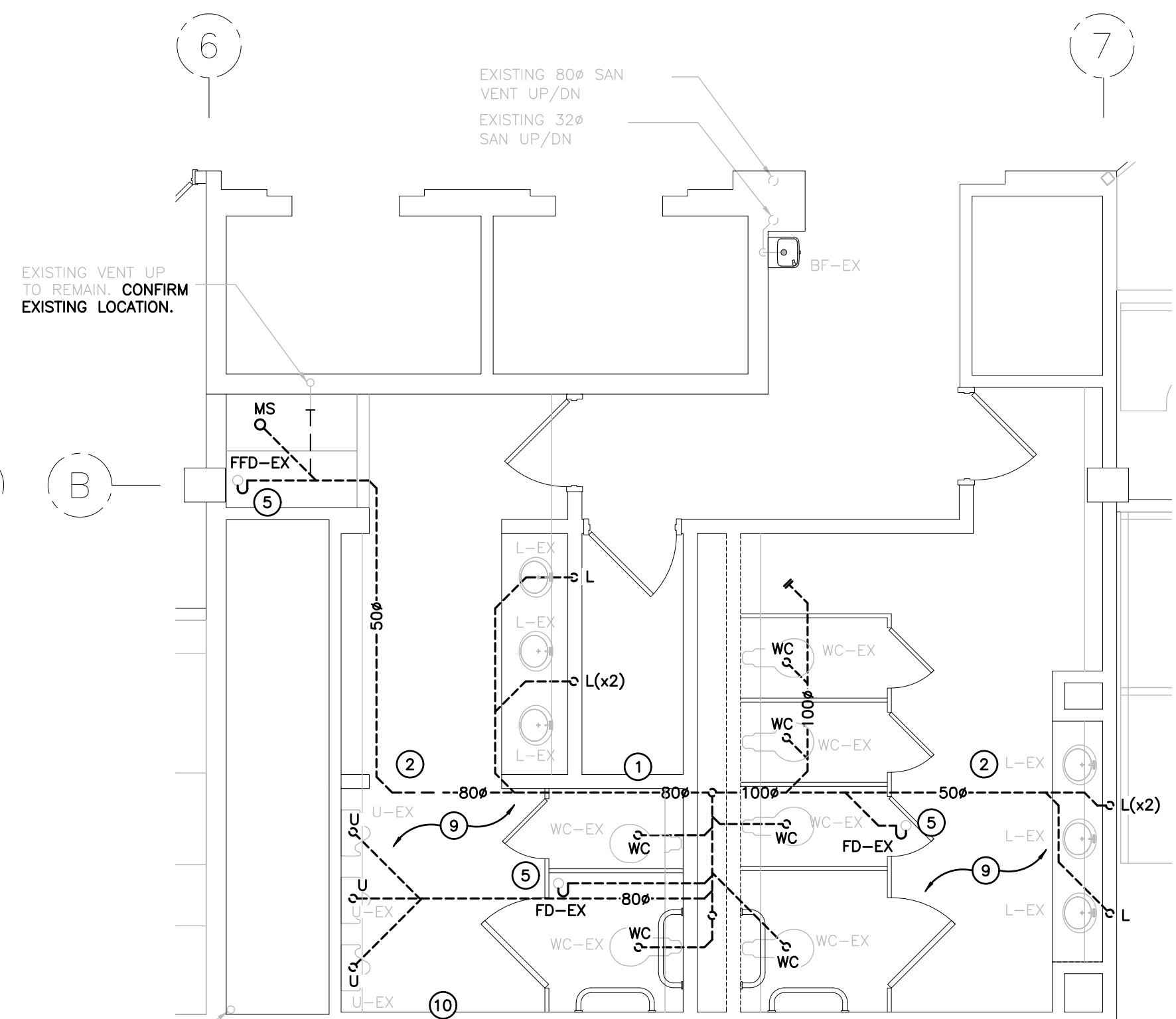
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55 Northland Road, Waterloo, ON N2V 1Y8  
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Drawn by SVA	Checked by JA	Approved by JA
Scale AS NOTED	Project Date SEP 2023	Print Date FEB 2025
Project No. <b>23115</b>		Drawing No. <b>M101</b>

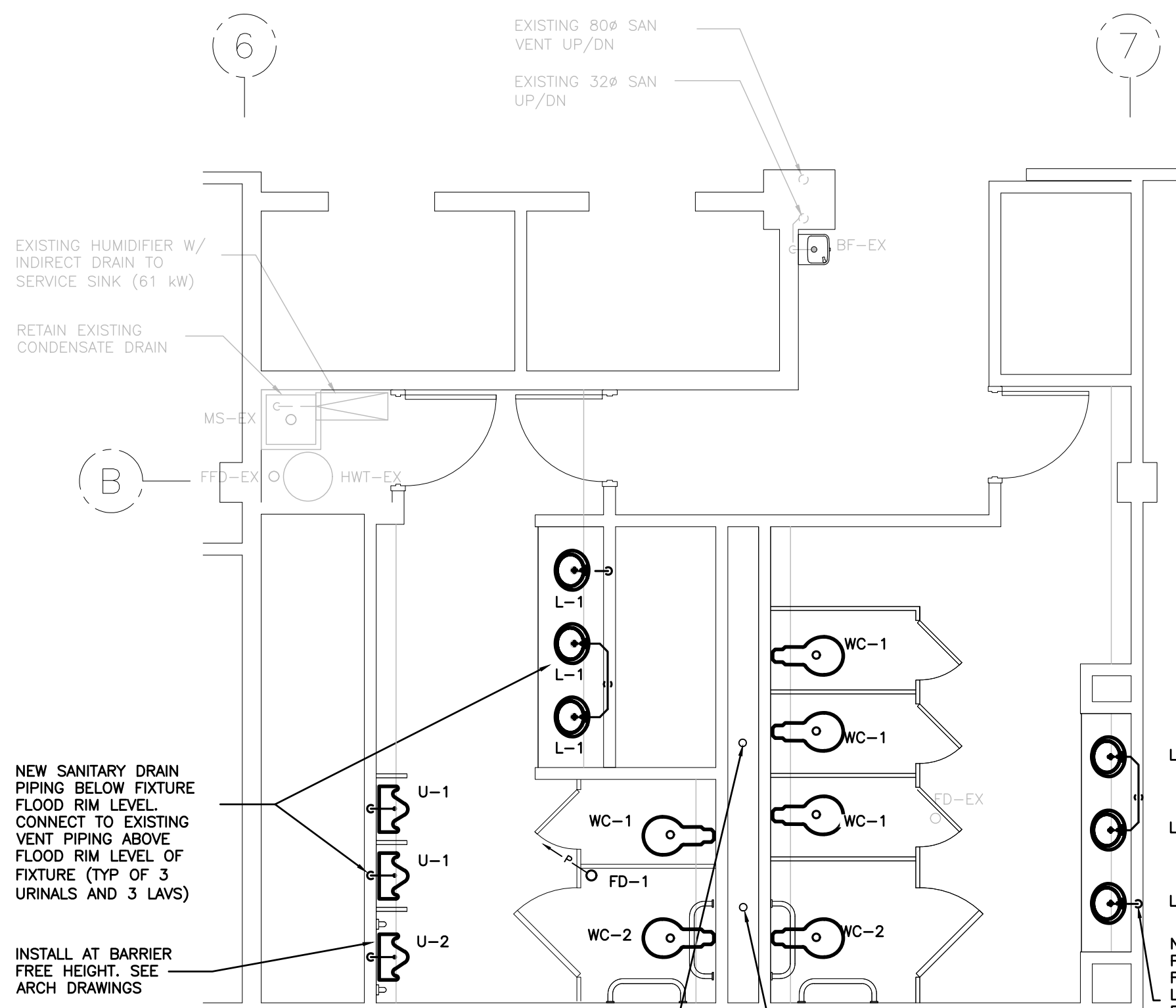




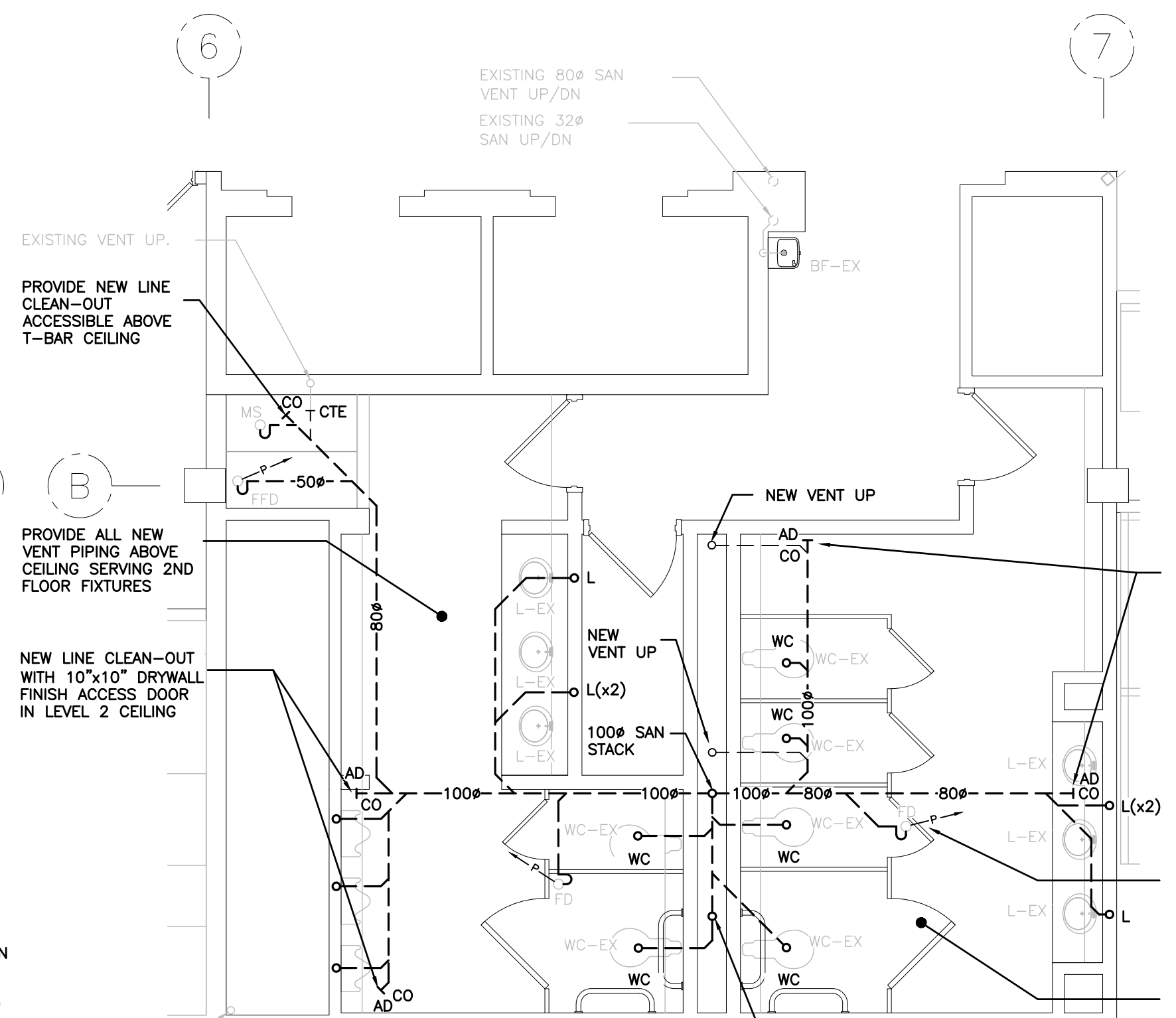
THIRD FLOOR WASHROOM – ABOVE GRADE SANITARY DEMO  
SCALE: 1:50



SECOND FLOOR WASHROOM – ABOVE GRADE SANITARY DEMO  
SCALE: 1:50



THIRD FLOOR WASHROOM – ABOVE GRADE SANITARY RENO  
SCALE: 1:50



SECOND FLOOR WASHROOM – ABOVE GRADE SANITARY RENO  
SCALE: 1:50

## GENERAL DEMOLITION NOTES

- EXISTING MECHANICAL ITEMS NOT SHOWN SHALL REMAIN UNLESS NOTED OTHERWISE.
- EXISTING MECHANICAL ITEMS SHOWN BUT NOT NOTED AS BEING REMOVED OR RENOVATED SHALL REMAIN AS PRESENTLY INSTALLED AND OPERATING.
- THIS CONTRACTOR SHALL BE RESPONSIBLE FOR VERIFYING ON SITE ALL LOCATIONS AND SIZES OF ALL SERVICES & EQUIPMENT PRIOR TO THE COMMENCEMENT OF WORK.
- ALL OPENINGS THAT RESULT FROM THE REMOVAL OF EQUIPMENT OR SERVICES SHALL BE NEATLY PATCHED WITH SUITABLE NEW MATERIALS TO SUIT EXISTING CONSTRUCTION.
- PLUMBING VENTS ARE NOT INDICATED OR IDENTIFIED. REMOVE ALL REDUNDANT VENTS WHILE MAINTAINING INTEGRITY OF EXISTING SYSTEMS TO REMAIN.
- REMOVAL OF EXISTING PIPING, OR DUCT SYSTEMS INCLUDES REMOVAL OF ALL HANGERS, INSULATION, FITTINGS, ETC.
- MAINTAIN INTEGRITY OF EXISTING SYSTEMS THAT ARE TO REMAIN OR BE MODIFIED.
- INSTALL NEW SYSTEM OR SERVICES WHERE REQUIRED TO MAINTAIN SYSTEM OPERATION PRIOR TO DEMOLITION OF EXISTING SERVICES.
- THIS CONTRACTOR IS TO REMOVE & REPLACE CEILINGS AS REQUIRED FOR REMOVAL/REPLACEMENT OF SERVICES.

## SPECIFIC DEMOLITION NOTES

- EXISTING FIXTURE TO BE REMOVED COMPLETE.
- EXISTING SANITARY PIPING IN CENTRAL WASHROOM TO BE REMOVED COMPLETE.
- EXISTING MOP SINK TO REMAIN. DISCONNECT DRAIN BELOW FOR REPLACEMENT.
- EXISTING HUMIDIFIER DRAIN PAN AND CONDENSATE DRAIN TO REMAIN.
- EXISTING FLOOR DRAIN TO REMAIN. DISCONNECT DRAIN BELOW FOR REPLACEMENT OF SANITARY PIPING. REPLACE EXISTING TRAP PRIMER CONNECTION.
- VENT PIPING NOT SHOWN. REMOVE ALL EXISTING VENT PIPING COMPLETE. REPLACE.
- LAVATORY VENT PIPING LOCATED BEHIND EXISTING MIRROR MAY REMAIN FOR REUSE WHERE PIPE APPEARS TO BE IN GOOD CONDITION.
- CIRCUIT VENTING AND MAIN STACK VENT PIPING TO BE REMOVED FOR REPLACEMENT TO LOCATION WHERE VENT EXITS ROOF. RETAIN EXISTING ROOF PENETRATION.
- REMOVE FOR REPLACEMENT ALL SANITARY VENT PIPING IN 2ND FLOOR CEILING. REMOVE IN WALL TO 450mm BELOW CEILING HEIGHT.
- ENSURE VENT PIPING IN CEILING THAT SERVES ADJACENT SINK IS REPLACED.

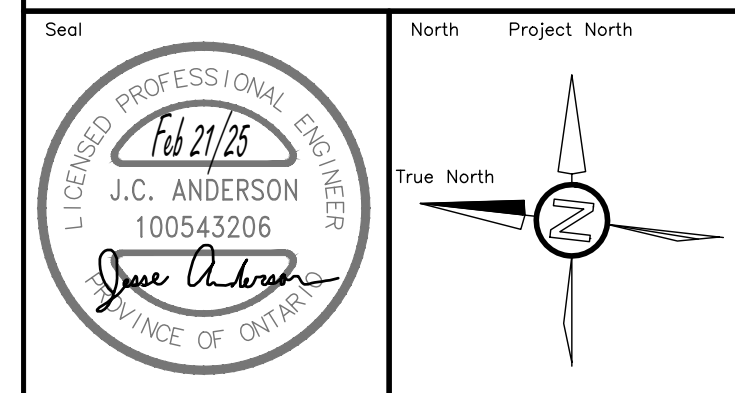
## GENERAL RENOVATION NOTES

- REPLACE ALL SANITARY PIPING WITH NEW AS SHOWN.
- REPLACE ALL 2ND FLOOR ABOVE-CEILING SANITARY VENT PIPING. REPLACE ALL SANITARY PIPING SERVING 3RD FLOOR FIXTURES TO FLOOD RIM LEVEL OF INDIVIDUAL FIXTURES.
- ALL NEW ABOVE GRADE SANITARY AND VENT PIPING TO BE PLENUM RATED PVC DWV. EXPOSED TRAPS AND TRAP ARMS TO BE CHROME PLATED CAST BRASS.
- ALL H&CW PIPING TO REMAIN. RECONNECT NEW FIXTURES TO EXISTING H&CW IN PLACE.
- REFER TO IDENTIFIED PRICE LINE ITEMS IN TENDER FORM. ALL FIXTURES TO BE PROVIDED NEW UNLESS OWNER CHOOSES TO REMOVE FIXTURES FROM SCOPE. IF NEW FIXTURES ARE REMOVED FROM SCOPE, THEN THIS CONTRACTOR IS TO RETAIN AND REINSTALL EXISTING FIXTURES.

The contractor shall verify all dimensions and report all errors and discrepancies to the Consultant before commencement of the work.  
The drawings show general arrangement of services. Follow as closely as actual building construction will permit. Obtain approval for relocation of service from Consultant before commencement of the work.  
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## ISSUANCES

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1	23.06.14	ISSUED FOR REVIEW	JA
2	23.08.23	ISSUED FOR TENDER REVIEW	JA
3	23.09.12	ISSUED FOR PERMIT	JA
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7	24.01.08	REISSUED FOR TENDER	JA
8	24.01.18	REISSUED FOR BUILDING PERMIT	JA
9	24.05.17	REISSUED FOR 100% REVIEW	JA
10	25.02.21	ISSUED FOR PERMIT & TENDER	JA



Project  
**WATERLOO CITY CENTRE  
CENTRAL WASHROOM  
RENOVATIONS PHASE 1**  
100 REGINA ST S, WATERLOO, ON N2J 4P9

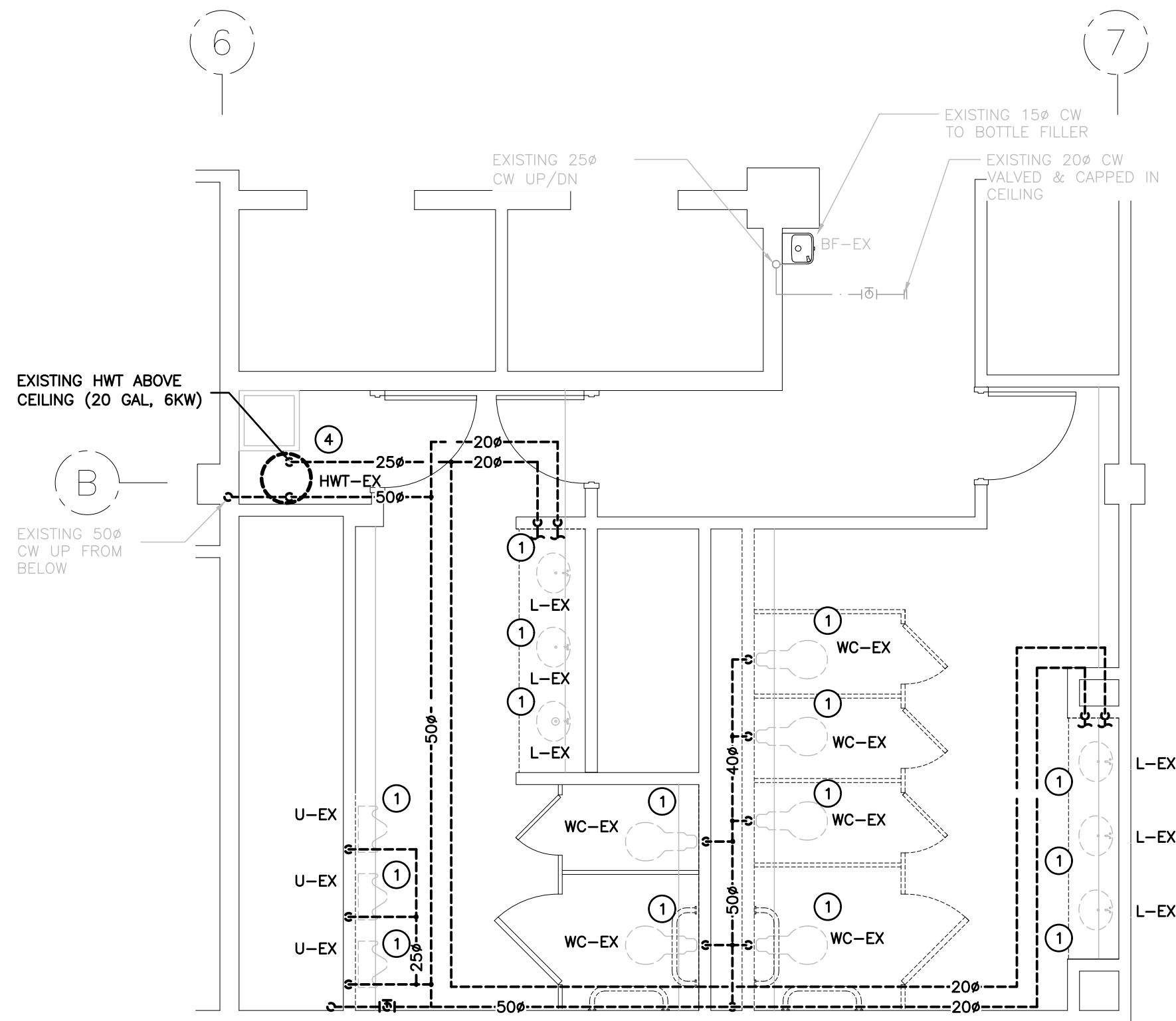
Sheet Title  
**WASHROOM SANITARY  
PLANS DEMOLITION  
AND RENOVATION**

**DEI**  
**Consulting Engineers**  
MECHANICAL | ELECTRICAL | AQUATIC  
55 Northland Road, Waterloo, ON N2V 1Y8  
Phone: 519-725-3555  
Website: deiassociates.ca

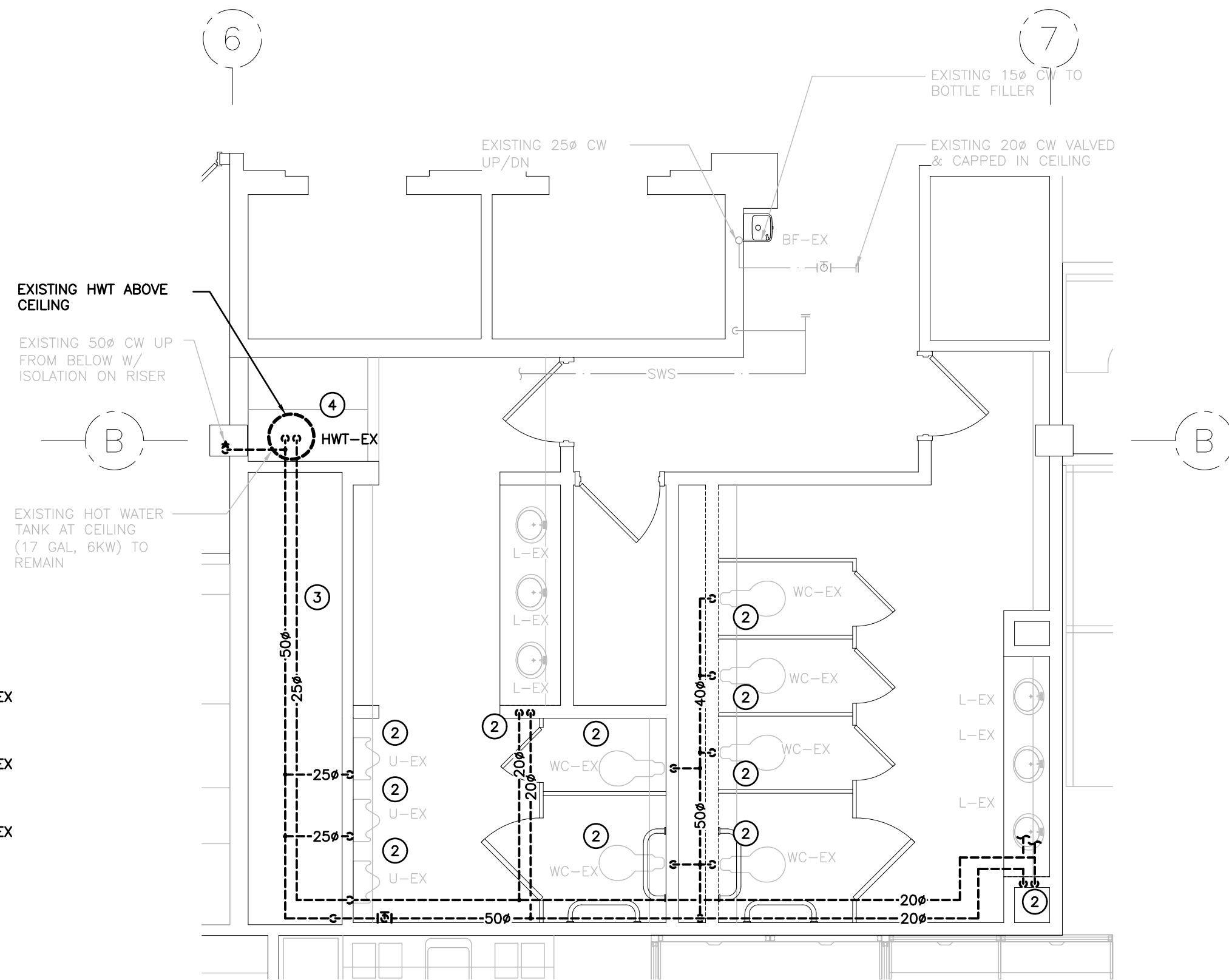
Drawn by SVA	Checked by JA	Approved by JA
Scale AS NOTED	Project Date SEP 2023	Print Date FEB 2025

Project No.  
**23115**

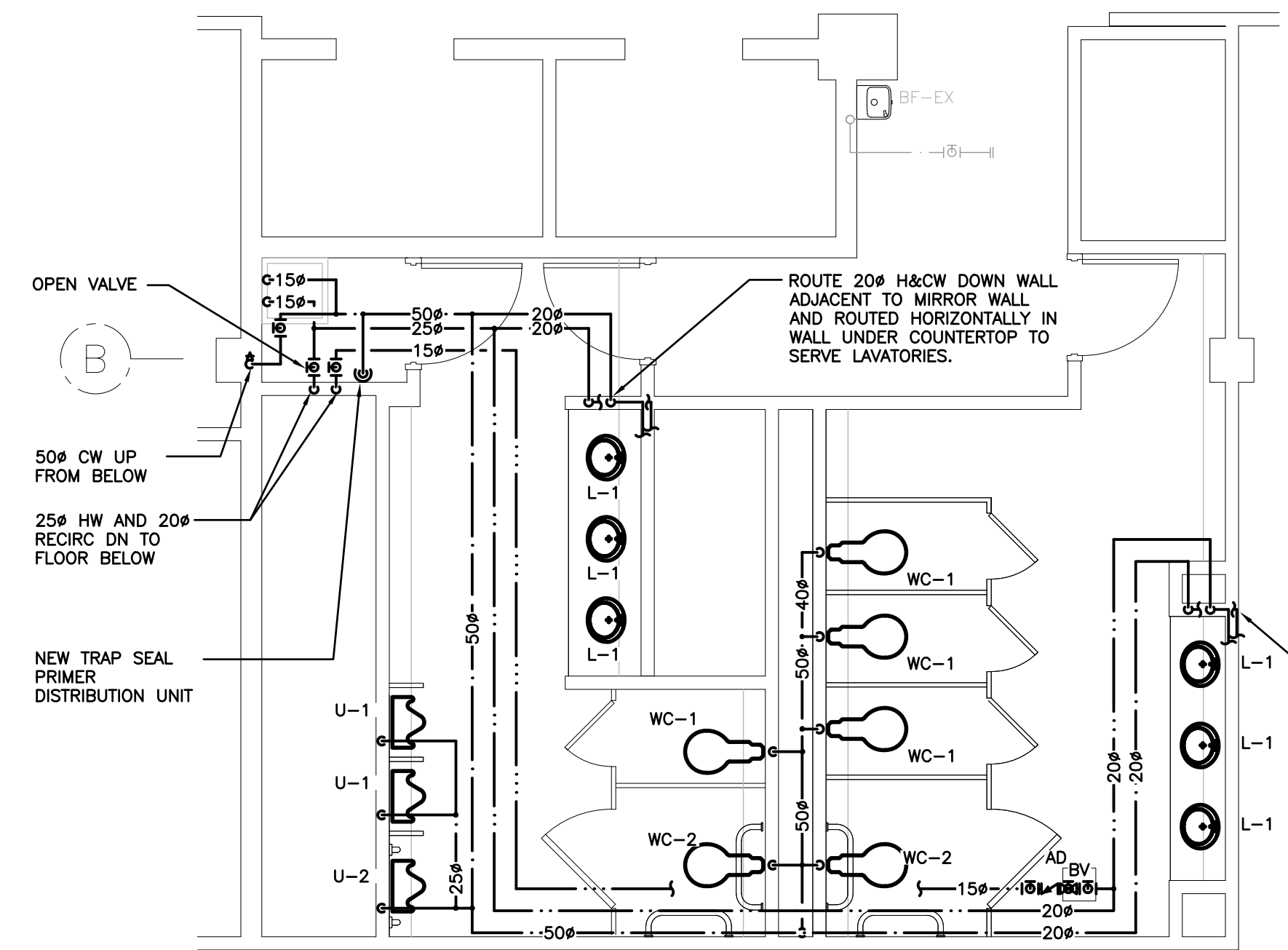
Drawing No.  
**M201**



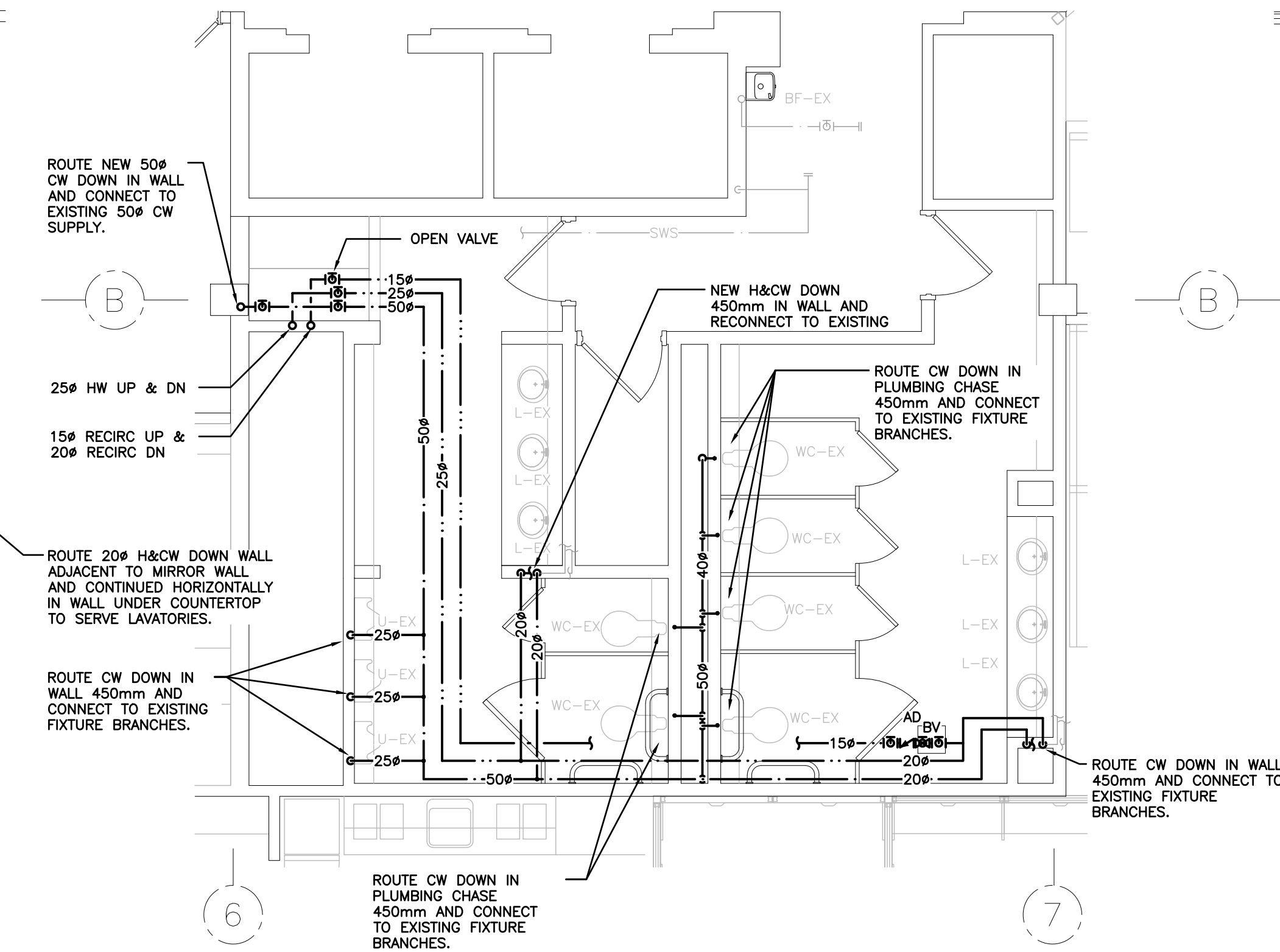
THIRD FLOOR WASHROOM – PLUMBING DEMO  
SCALE: 1:50



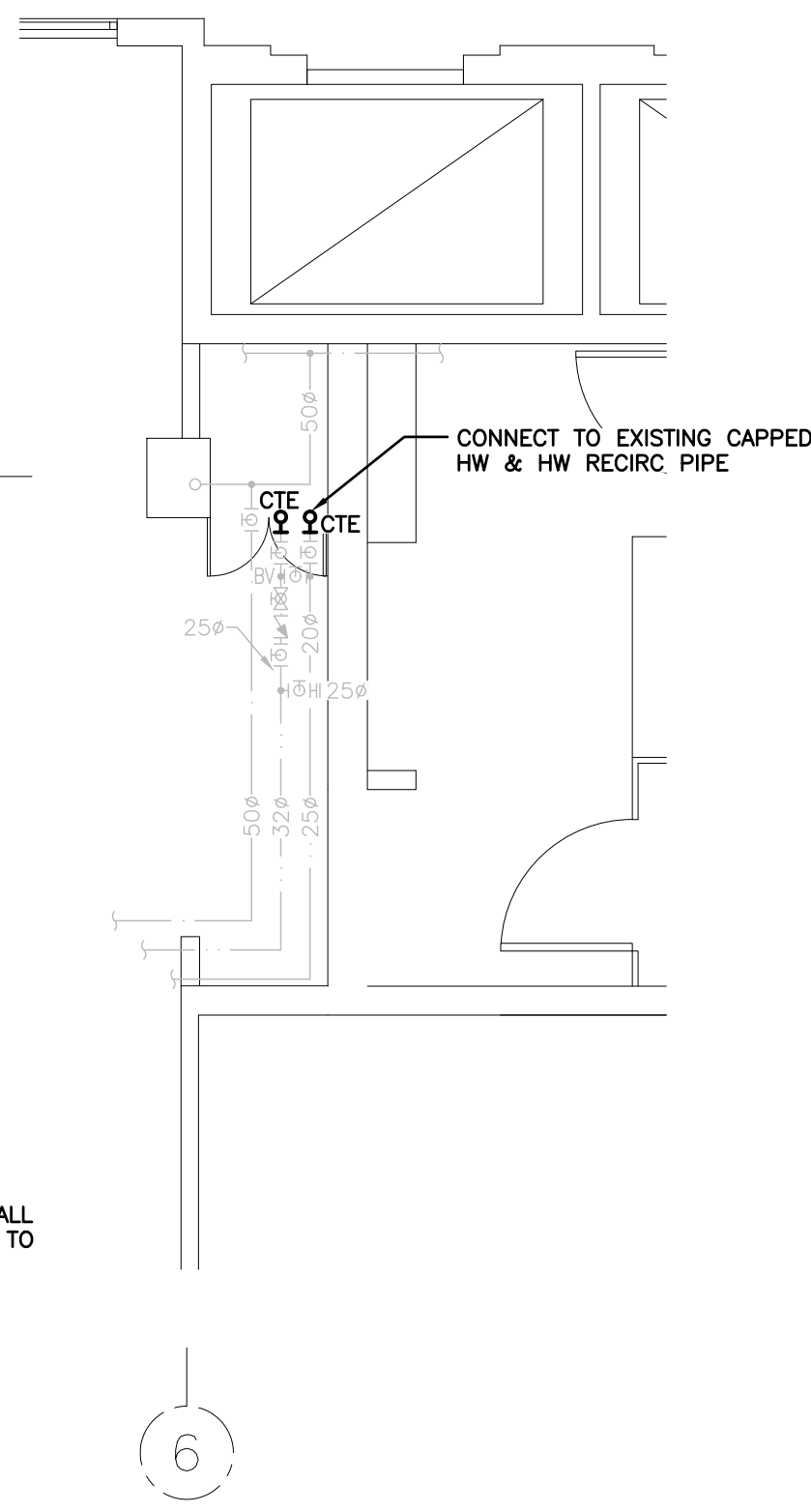
SECOND FLOOR WASHROOM – PLUMBING DEMO  
SCALE: 1:50



THIRD FLOOR WASHROOM – PLUMBING RENO  
SCALE: 1:50



SECOND FLOOR WASHROOM – PLUMBING RENO  
SCALE: 1:50



FIRST FLOOR WASHROOM – PLUMBING RENO  
SCALE: 1:50

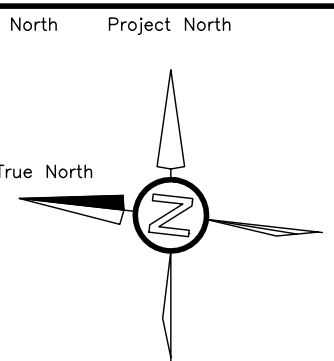
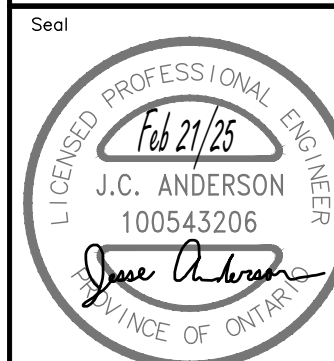
## SPECIFIC DEMOLITION NOTES

- EXISTING FIXTURE TO BE REMOVED COMPLETE. NEW PLUMBING FIXTURES TO BE INSTALLED IN SAME LOCATION, WITH SAME ROUGH-IN LOCATIONS. RETAIN EXISTING FIXTURES IN GOOD CONDITION FOR REUSE IF DIRECTED TO REINSTALL. DISPOSE OF IN AN APPROPRIATE MANNER IF DIRECTED TO REMOVE.
- EXISTING FIXTURES TO REMAIN. CUT EXISTING H&CW PIPE DROPS IN WALL / PLUMBING CHASE DOWN TO FIXTURES APPROX. 450mm BELOW CEILING / HEADER. RETAIN FOR RECONNECTION OF NEW PIPING.
- REMOVE EXISTING ABOVE CEILING H&CW PIPING COMPLETE.
- EXISTING HOT WATER TANK TO BE REMOVED COMPLETE.
- DELETED.

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Project  
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CENTRAL WASHROOM  
RENOVATIONS PHASE 1**  
100 REGINA ST S, WATERLOO, ON N2J 4P9

Sheet Title  
**WASHROOM PLUMBING  
PLANS DEMO  
AND RENO**

**DEI**  
**Consulting Engineers**  
**MECHANICAL | ELECTRICAL | AQUATIC**  
55 Northland Road, Waterloo, ON N2V 1Y8  
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Drawn by SVA	Checked by JA	Approved by JA
Scale AS NOTED	Project Date SEP 2023	Print Date FEB 2025

Project No. <b>23115</b>	Drawing No. <b>M202</b>
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SPECIFIC DEMOLITION NOTES

- 1 REMOVE EXISTING EXHAUST GRILLE FOR REINSTALLATION IN RENOVATED CEILING.

MECHANICAL SPECIFICATION

PART A GENERAL NOTES

- PROVIDE LABOUR, MATERIAL AND EQUIPMENT REQUIRED TO PROVIDE A COMPLETE INSTALLATION WITH QUALITY WORKMANSHIP ACCEPTABLE TO OWNER AND CONSULTANT.
- OBTAIN ALL PERMITS AND PAY ALL TAXES, FEES, AND OTHER COSTS INCURRED WITH THIS WORK. FILE ALL PLANS. OBTAIN ALL NECESSARY APPROVALS, CERTIFICATES. SUBMIT ALL FINAL CERTIFICATES TO THE CONSULTANT. COMPLY WITH RULES AND RECOMMENDATIONS OF THE BOARD OF FIRE UNDERWRITERS, THE CANADIAN GAS ASSOCIATION, THE LOCAL BUILDING CODE, AND ALL REQUIREMENTS OF THE LOCAL UTILITY COMPANY AND BY-LAWS. POST BUILDING PERMIT AT SITE IN ACCORDANCE WITH O.B.C. REQUIREMENTS.
- VISIT THE SITE BEFORE SUBMITTING TENDERS TO EVALUATE ANY SITE CONDITIONS THAT MIGHT ARISE. INCLUDE ALL SITE CONDITIONS IN TENDER, EXTRAS WILL NOT BE ACCEPTED UNLESS BELIEVED TO BE REASONABLE BY THE OWNER AND CONSULTANT.
- COORDINATE WITH OTHER CONTRACTORS INSTALLING EQUIPMENT OR MATERIAL AND ARRANGE EQUIPMENT IN PROPER RELATION WITH ALL OTHER TRADES. ENSURE SYSTEMS ARE SERVICEABLE.
- CUTTING AND PATCHING SHALL BE BY THE CONTRACTOR REQUIRED TO INSTALL THE SERVICE.
- THE DRAWINGS ARE DIAGRAMMATIC. THE SERVICES SHALL BE INSTALLED TO CONSERVE HEADROOM AND INTERFERE AS LITTLE AS POSSIBLE WITH THE FREE USE OF THE SPACES THROUGH WHICH THEY PASS.
- PROVIDE TWO MARKED COPIES OF "AS-BUILT DRAWINGS" SHOWING THE SYSTEM AS INSTALLED. AS-BUILT DRAWINGS TO INCLUDE CONTRACTOR "AS-BUILT" STAMP WITH DATE AND SIGNATURE.
- THE MECHANICAL SYSTEMS OF THIS BUILDING MUST ACHIEVE THE ENERGY EFFICIENCY LEVELS BY CONFORMING TO ANSI/ASHRAE/IESNA 90.1 "ENERGY STANDARD FOR BUILDINGS EXCEPT LOW-RISE RESIDENTIAL BUILDINGS" AND CHAPTER 3 OF DIVISION 3 OF SB-10 PRESCRIPTIVE METHOD FROM THE ONTARIO BUILDING CODE.
- ALL EQUIPMENT AND MATERIAL SHALL BE NEW. REPLACE ALL DAMAGED EQUIPMENT.
- MATERIAL AND EQUIPMENT ARE NAMED IN THE SPECIFICATION TO ESTABLISH AN ACCEPTABLE STANDARD OF MATERIALS AND THE QUALITY OF WORKMANSHIP BY WHICH TO ADHERE.
- SUBMIT SHOP DRAWINGS AS INDICATED IN DIVISION 01 SPECIFICATIONS. RESUBMIT AS OFTEN AS MAY BE FOUND NECESSARY. SUBMIT ONE COMPLETE SUBMISSION INDEXED AND LABELED FOR THIS PROJECT.
- PROVIDE ALL NECESSARY PROTECTION FOR FINISHED OR UNFINISHED WORK. ALL OPENINGS IN PIPES, DUCTS AND EQUIPMENT SHALL BE CAPPED TO ENSURE SERVICES ARE KEPT CLEAN WHEN NOT IN USE.
- MAINTAIN INSURANCE TO FULLY PROTECT THE CONTRACTOR, OWNER AND CONSULTANT FROM ANY AND ALL CLAIMS SUCH AS UNDER THE WORKERS' COMPENSATION ACT, ETC. POST PROJECT NOTIFICATION AT THE SITE IN ACCORDANCE WITH THE MINISTRY OF LABOUR REQUIREMENTS.
- EXCAVATION AND BACK FILLING SHALL BE BY THE TRADE INSTALLING THE SERVICE. PROVIDE COMPACTED 'A' GRAVEL FOR BEDDING AND BACKFILLING AS INDICATED. REMOVE SURPLUS MATERIAL FROM SITE.
- PROVIDE STRUCTURAL SUPPORTS, PLATFORMS, SUPPORTING RODS, HANGERS, INSERTS AND BRACKETS FOR EQUIPMENT AND SERVICES. DO NOT SUPPORT SERVICES FROM STEEL DECK.
- INSTRUCT THE OWNER'S STAFF IN THE CARE, MAINTENANCE AND OPERATION OF THE SYSTEMS.
- SUBMIT OPERATING AND MAINTENANCE MANUALS AS INDICATED IN DIVISION 01 SPECIFICATIONS.
- REMOVE ALL PROTECTIVE COVERINGS, CLEAN AND POLISH ALL EQUIPMENT, FREE ALL OBSTRUCTIONS, CLEAN AND REPLACE ALL FILTERS WITH NEW, AND LEAVE ALL KEYS AND WRENCHES WITH THE OWNER.
- ALL SURPLUS AND WASTE MATERIALS SHALL BE PROMPTLY REMOVED FROM THE PREMISES.
- ALL AREAS NOT AFFECTED BY RENOVATION OR DEMOLITION SHALL REMAIN AS PRESENTLY INSTALLED UNLESS NOTED OTHERWISE.
- THE OWNER WILL DECIDE WHICH ITEMS OR EQUIPMENT SLATED FOR REMOVAL THAT THEY WISH TO RETAIN AS THEIR PROPERTY AND THIS CONTRACTOR SHALL REMOVE ALL OTHER MATERIALS FROM THE PREMISES.
- PROVIDE LAMICOID TAGS FOR IDENTIFICATION OF NEW EQUIPMENT ADDED. THIS DOES NOT APPLY TO PLUMBING FIXTURES.
- ALL ELECTRICAL LINE AND LOW VOLTAGE WIRING WHICH IS TO BE PROVIDED BY THE MECHANICAL CONTRACTOR AS SPECIFIED ELSEWHERE HEREIN SHALL BE RUN IN EMT CONDUIT TO STANDARDS OF ELECTRICAL DIVISION.
- WARRANTY ALL MATERIAL AND EQUIPMENT FOR A PERIOD OF ONE (1) YEAR AFTER FINAL ACCEPTANCE OF SYSTEM.
- EXISTING CONCRETE SLAB X-RAY/SCANNING  
THIS CONTRACTOR SHALL RETAIN THE SERVICES OF A QUALIFIED COMPANY TO PROVIDE AND X-RAY AND/OR SCAN OF THE EXISTING BURIED SERVICES IN WALL AND/OR FLOORS PRIOR TO STARTING ANY WORK IN THE AFFECTED AREA. FAILURE TO LOCATE EXISTING PIPING, CONDUIT REBAR ETC., SHALL NOT RELIEVE THIS CONTRACTOR OF REPAIR OF SAME PRIOR TO INSTALLING HIS SERVICE. THIS CONTRACTOR SHALL BE RESPONSIBLE FOR ALL REPAIRS AND/OR REPLACEMENT OF EXISTING SERVICES CAUSED BY CUTTING THE EXISTING CONCRETE SLABS AND/OR WALLS.
- PIPE SLEEVES  
PROVIDE SCHEDULE 40 STEEL PIPE SLEEVES AT POINTS WHERE PIPES PASS THROUGH MASONRY, CONCRETE OR FIRE RATED ASSEMBLIES AND AS INDICATED. GROUT SLEEVES IN PLACE. MINIMUM 6 MM (1/4") CLEARANCE ALL AROUND, BETWEEN SLEEVE AND UNINSULATED PIPE OR BETWEEN SLEEVE AND INSULATION. CAULK BETWEEN SLEEVE AND PIPE IN FOUNDATION WALLS AND BELOW GRADE FLOORS WITH WATERPROOF FIRE RETARDANT NON-HARDENING MASTIC. WHERE SLEEVES PASS THROUGH WALLS OR FLOORS, PROVIDE SPACE FOR FIRESTOPPING. WHERE PIPES PASS THROUGH FIRE RATED WALLS, FLOORS AND PARTITIONS, MAINTAIN FIRE RATING INTEGRITY. ENSURE NO CONTACT BETWEEN COPPER TUBE OR PIPE AND FERROUS SLEEVE. FILL FUTURE-USE SLEEVES WITH LIME PLASTER OR OTHER EASILY REMOVABLE FILLER. COAT EXPOSED EXTERIOR SURFACES OF FERROUS SLEEVES WITH HEAVY APPLICATION OF ZINC RICH PAINT TO CGSB 1-GP-181M+AMDT-MAR-78.
- ACCESS DOORS  
PROVIDE 300 X 300 MM (12" X 12") ACCESS DOOR FOR HAND ENTRY UNLESS OTHERWISE NOTED. DOORS TO OPEN 180°, HAVE ROUNDED SAFETY CORNERS, CONCEALED HINGES, SCREWDRIVER LATCHES AND ANCHOR STRAPS. MATERIAL TO BE CONSTRUCTED OUT OF ALUMINUM WITH POWDER-COATED MILL FINISH SUITABLE FOR PAINTING. LOCATE SO THAT CONCEALED ITEMS ARE ACCESSIBLE.

PART B DEMOLITION NOTES

- THIS PROJECT IS ONE OF A RETROFIT NATURE IN PART, AND WHICH WILL REQUIRE SOME DEMOLITION. ALLOW FOR ALL REMEDIAL WORK IN AREAS INDICATED ON THE DRAWINGS AND AS GENERALLY DEFINED IN THE RELEVANT SECTIONS OF THE SPECIFICATIONS.
- DEMOLITION REQUIREMENTS OF DIVISION 01 APPLY TO THIS DIVISION.
- THIS DIVISION IS TO LIAISE WITH THE OWNERS OR CONSULTANT FOR EQUIPMENT BEING REMOVED THAT MAY BE SUITABLE FOR REUSE TO THAT SPECIFIED OR HANDED OVER TO THE OWNER.
- THIS DIVISION TO TAKE FULL RESPONSIBILITY FOR ANY SPECIAL TOOLS OR EQUIPMENT REQUIRED TO DISASSEMBLE OR REMOVE MATERIAL FROM BUILDING.
- THE GENERAL EXECUTION OF THE DEMOLITION IS TO BE CARRIED OUT IN A CLEAN AND EFFICIENT MANNER.
- DEMOLITION OF EXISTING CEILING, WALLS ETC., TO FACILITATE REMOVAL OF EXISTING SERVICES OR EQUIPMENT OR INSTALLATION OF NEW TO BE KEPT TO A MINIMUM AND THEN RESTORED TO MATCH EXISTING.
- ALL OPENINGS OR HOLES CREATED BY REMOVAL OF EXISTING MECHANICAL SYSTEMS WHICH ARE NOT BEING REUSED ARE TO BE PATCHED WITH THE SAME MATERIAL SURROUNDING SURFACES.

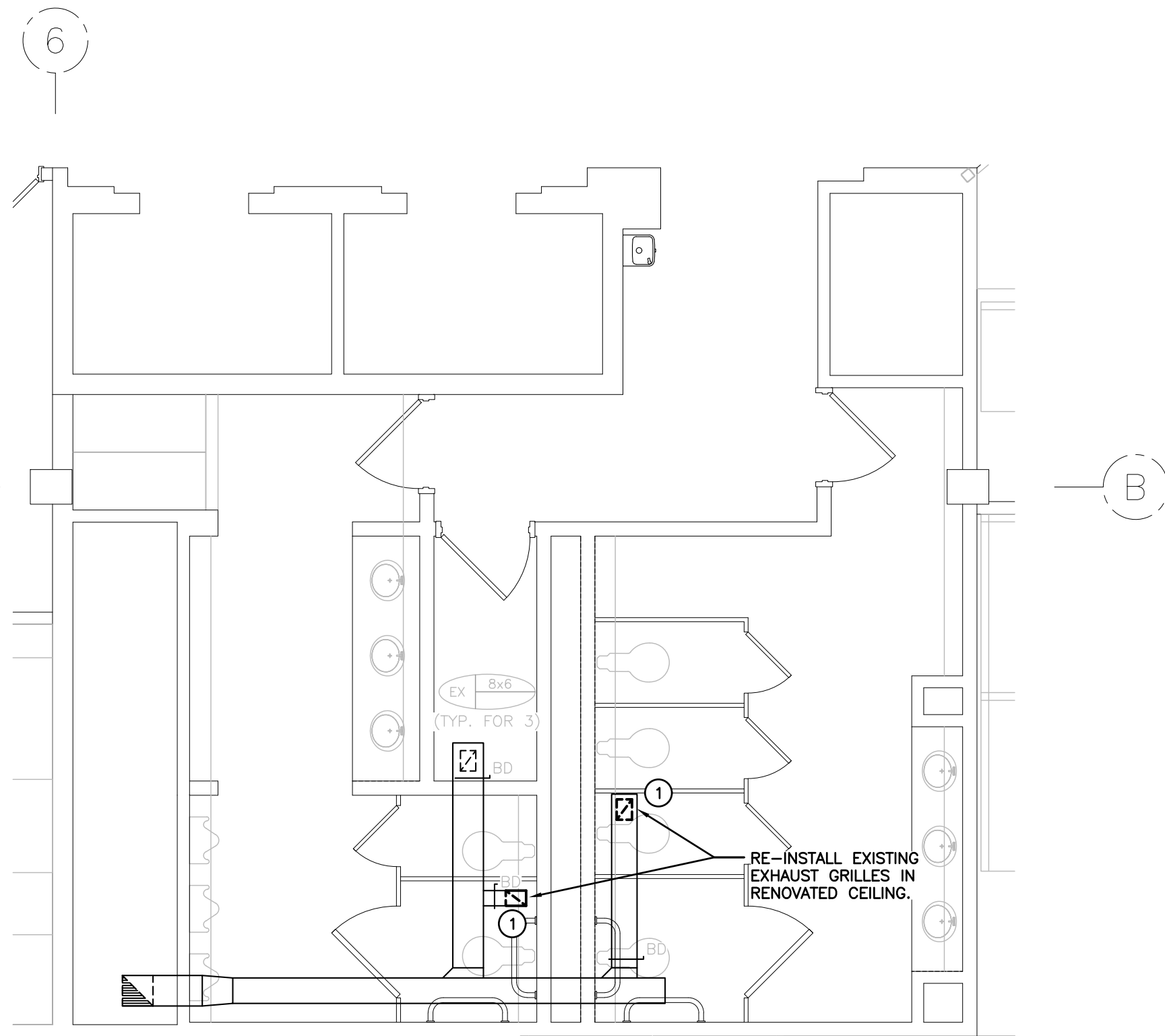
- PROTECT ALL EXISTING FURNISHINGS MATERIALS AND EQUIPMENT. ANY DAMAGE OCCURRING AS A RESULT OF THE WORK OF THIS DIVISION SHALL BE REPAIRED OR REPLACED AT THE EXPENSE OF THIS DIVISION.
- WHERE WORK INVOLVES BREAKING INTO OR CONNECTING TO EXISTING SERVICES, CARRY OUT WORK AT TIMES DIRECTED BY THE OWNERS IN AN EXPEDIENT MANNER WITH MINIMUM DISRUPTION TO THE FACILITY AND SYSTEMS DOWNTIME.
- WHERE UNKNOWN SERVICES ARE ENCOUNTERED, IMMEDIATELY ADVISE CONSULTANT AND CONFIRM FINDINGS IN WRITING.
- WHERE THE LOCATION OF ANY SERVICES HAS BEEN SHOWN ON THE PLANS, SUCH INFORMATION IS NOT GUARANTEED. IT IS THIS DIVISION'S RESPONSIBILITY TO VERIFY LOCATIONS, INVERT ELEVATIONS, ETC., IMMEDIATELY AFTER MOVING ON SITE. SHOULD FOR ANY REASON THE INFORMATION OBTAINED NECESSITATES CHANGES IN PROCEDURE OR DESIGN, ADVISE THE CONSULTANT AT ONCE. IF VERIFICATION OF EXISTING CONDITIONS IS NOT DONE AT THE OUTSET AND ANY PROBLEMS ARISE, THE RESPONSIBILITY FOR SAME IS ENTIRELY THIS DIVISION'S.
- DISCONNECT AND/OR REMOVE EQUIPMENT PIPING, DUCTWORK, ETC. AS INDICATED.
- CAP AND CONCEAL ALL REDUNDANT AND OBSOLETE CONNECTIONS.
- PROVIDE A LIST OF EQUIPMENT TO BE REMOVED TO THE OWNER, FOR HIS ACCEPTANCE OF SAME. REMOVE ALL EQUIPMENT FROM SITE WHICH THE OWNER DOES NOT RETAIN. MAINTAIN EQUIPMENT TO BE RETAINED BY OWNER ON SITE WHERE DIRECTED BY CONSULTANT.
- DEMOLITION OF ALL PARTS OF THE WORK MUST BE COMPLETED WITHIN THE CONFINES OF THE WORK AREA AND IN SUCH A WAY AS THE DUST PRODUCED AND RISK TO INJURY OF WILL NOT ADVERSELY AFFECT THE BUILDING USERS.
- DEMOLISHED AREAS OF THE EXISTING BUILDING WILL REMAIN IN THEIR CURRENT USE IN SOME CASES. DEMOLITION IN THESE AREAS MUST BE KEPT TO THE MINIMUM REQUIRED TO COMPLETE THE WORK.
- DEMOLITION SHALL TAKE PLACE WITHIN AREAS ISOLATED FROM ALL OTHER AREAS WITH APPROPRIATE HOARDING, SCAFFOLDING, NETTING, FENCING OR OTHER MEANS OF SECURITY BETWEEN BUILDING USERS AND THE WORK.
- CO-ORDINATE MAKING SAFE ELECTRICAL DEVICES, CAPPING PLUMBING AND REMOVAL OF FIXTURES PRIOR TO COMMENCEMENT OF DEMOLITION.
- ALL PIPING AND EQUIPMENT TO BE REMOVED AND/OR ABANDONED SHALL BE DRAINED PRIOR TO CAPPING AND/OR ABANDONING. DISPOSAL OF ALL LIQUIDS SHALL BE TO THE APPROVAL OF AUTHORITY OF HAVING JURISDICTION AND/OR PROVINCIAL REGULATIONS.
- DRAIN ALL EXISTING PIPING AND DRAINAGE SYSTEMS INCLUDING ALL RELATED EQUIPMENT AS REQUIRED TO FACILITATE SYSTEM RENOVATIONS.
- DISPOSAL OF EXISTING SYSTEM SHALL BE TO THE REQUIREMENTS OF THE LOCAL AND/OR PROVINCIAL REGULATIONS.

PART C PLUMBING NOTES

- CONTRACTOR TO PROVIDE POTABLE WATER CERTIFICATE FOR E. COLI AND COLIFORM FROM A RECOGNIZED TESTING LABORATORY UPON COMPLETION OF THE PROJECT. WATER IS TO BE TAKEN FROM A NEW FIXTURE TO TEST THE NEW PIPING INSTALLED.
- SERVICES  
CONNECT TO EXISTING SERVICES WHERE SHOWN ON DRAWINGS.
- CODES AND REGULATIONS  
SANITARY, SOIL, WASTE, VENT, AND ALL WATER PIPING SHALL CONFORM AND BE INSTALLED TO THE ONTARIO PLUMBING CODE AND THE CANADIAN PLUMBING CODE, LATEST EDITION.
- TESTING  
SANITARY PIPING: ALL SANITARY PIPING SHALL BE TESTED WITH WATER UNDER THE GUIDANCE OF THE LOCAL PLUMBING INSPECTOR. SMOKE TESTS OR ANY OTHER TEST REQUIRED BY THE PLUMBING INSPECTOR SHALL ALSO BE MADE. WATER PIPING: ALL WATER PIPING SHALL BE TESTED TO 150 PSI. PRESSURE FOR NOT LESS THAN FOUR HOURS WITHOUT A LOSS IN PRESSURE.
- PIPE AND FITTINGS  
STORM, SANITARY AND VENT DRAINS: (ABOVE GRADE), PLENUM RATED PVC DWV PIPE (YFR PVC DWV), CSA LISTED, MAX 25 FLAME SPREAD, MAX 50 SMOKE DEVELOPED, SOLVENT-WELDED JOINTS, COMPATIBLE PRIME & GLUE. STORM, SANITARY AND VENT PIPING: (BELOW GRADE) PVC DRAINAGE PIPE TO SDR 35 WITH SOLVENT WELDED JOINTS. WATER PIPING: TYPE L COPPER WITH LEAD FREE SOLDER JOINTS.
- VALVES  
ISOLATION VALVES: HOT AND COLD WATER BRONZE BODY, CLASS 150, STAINLESS STEEL BALL, FULL PORT, PTFE SEAT AND PACKING, STEEL LEVER HANDLE. MILWAUKEE BA-455, CRANE, TOYO CHECK VALVES: HOT AND COLD WATER SIZES 1/2" DIAMETER TO 2" DIAMETER CRANE FIG. 1342, OR EQUAL JENKINS, BRONZE SWING CHECK, SOLDER ENDS, CRANE FIG. 29 OR EQUAL JENKINS VERTICAL LIFT CHECK VALVE, SCREWED ENDS ON VERTICAL PIPING. GAS VALVES: SHALL BE CSA APPROVED LUBRICATED PLUG TYPE.
- CLEAN OUTS  
CLEAN OUTS: PROVIDE AND SET CLEAN OUT PLUGS IN ALL DRAINS AND SOIL PIPE LINES WHERE OBSTRUCTIONS MAY BE FOUND, AT CHANGES OF DIRECTION, AT THE BASE OF ALL SANITARY STACKS AND AT INTERVALS. LENGTHS TO THE ONTARIO PLUMBING CODE. CLEAN OUTS SHALL BE FULL SIZES OF PIPES UP TO 4" DIAMETER AND NOT LESS THAN 4" DIAMETER FOR LARGER PIPES. ANCON CO-100-R OR EQUAL.
- TRAP PRIMERS  
TRAP PRIMERS: ALL TRAPS WHERE REQUIRED BY THE CODE AND WHERE SHOWN ON THE DRAWINGS TO BE PRIMED. INSTALL MIFAB MR-500 OR EQUAL PRESSURE DROP ACTIVATED TRAP SEAL PRIMER CONNECTED TO THE NEAREST APPLICABLE COLD WATER SUPPLY LINE. PROVIDE AIR GAP WITH REDUCER FITTING DOWNSTREAM OF PRIMER UNIT. SEE DETAILS. PROVIDE TRAP SEAL PRIMER DISTRIBUTION UNIT WHERE MULTIPLE PRIMERS ARE SERVED FROM SINGLE PRIMER. INSTALL EXPOSED ON WALL IN SUITABLE WET LOCATION (CUSTODIAN CLOSET).
- PLUMBING FIXTURES  
FIXTURES AS LISTED ON THE DRAWINGS. PROVIDE NEW WHERE APPLICABLE. ALL FIXTURES MUST BE CLEAN WHEN THE WORK IS TAKEN OVER BY THE OWNER. ALL PLUMBING FIXTURES SHALL BE EQUIPPED WITH SUPPLY VALVES, FAUCETS, TRAPS, SUPPORTS, WATER CONNECTIONS, ESCUTCHEONS, HANGERS, BOLTS, ETC. TRAPS: 2" DIAMETER AND SMALLER, SHALL BE CAST BRASS AND CHROME PLATED IN EXPOSED AREAS. ALL SINK TRAPS SHALL BE TWO PIECE CONSTRUCTION. ALL TRIM MUST BE CAMBRIDGE BRASS OR EQUAL. ON COMPLETION ALL FIXTURES, ACCESSORIES AND EXPOSED PIPING SHALL BE THOROUGHLY CLEANED AND LEFT READY FOR USE. AFTER FINAL INSPECTION BY THE PLUMBING INSPECTOR CAULK AROUND BASE OF ALL FIXTURES TO THE WALL OR FLOOR WITH SILICONE CAULKING.
- EXPANSION COMPENSATION  
PIPING SUBJECTED TO THERMAL EXPANSION SHALL BE INSTALLED USING PIPE LOOPS AND/OR EXPANSION COMPENSATORS TO PERMIT FREE EXPANSION AND CONTRACTION WITHOUT CAUSING DAMAGE TO OR STRESSES AT JOINTS AND HANGER AND TO REDUCE STRAIN ON CONNECTED EQUIPMENT TO A MINIMUM.
- PIPE INSULATION  
INSULATE ALL DOMESTIC HOT AND COLD WATER PIPING AND STORM PIPING ABOVE GRADE, WITH 1" (FOR PIPING UNDER 1 1/2" DIAMETER) OR 1 1/2" (FOR PIPING 1 1/2" DIAMETER AND HIGHER) FIBERGLASS INSULATION WITH VAPOUR BARRIER. INSTALL AS PER MANUFACTURERS RECOMMENDATIONS. RECOVER EXPOSED PIPING WITH 6 OZ. CANVAS JACKET AND TWO COATS LAGGING ADHESIVE.
- WATER HAMMER ARRESTORS  
WATER HAMMER ARRESTORS: CSA CERTIFIED AND INSTALLED IN ACCORDANCE WITH MANUFACTURERS RECOMMENDATIONS.

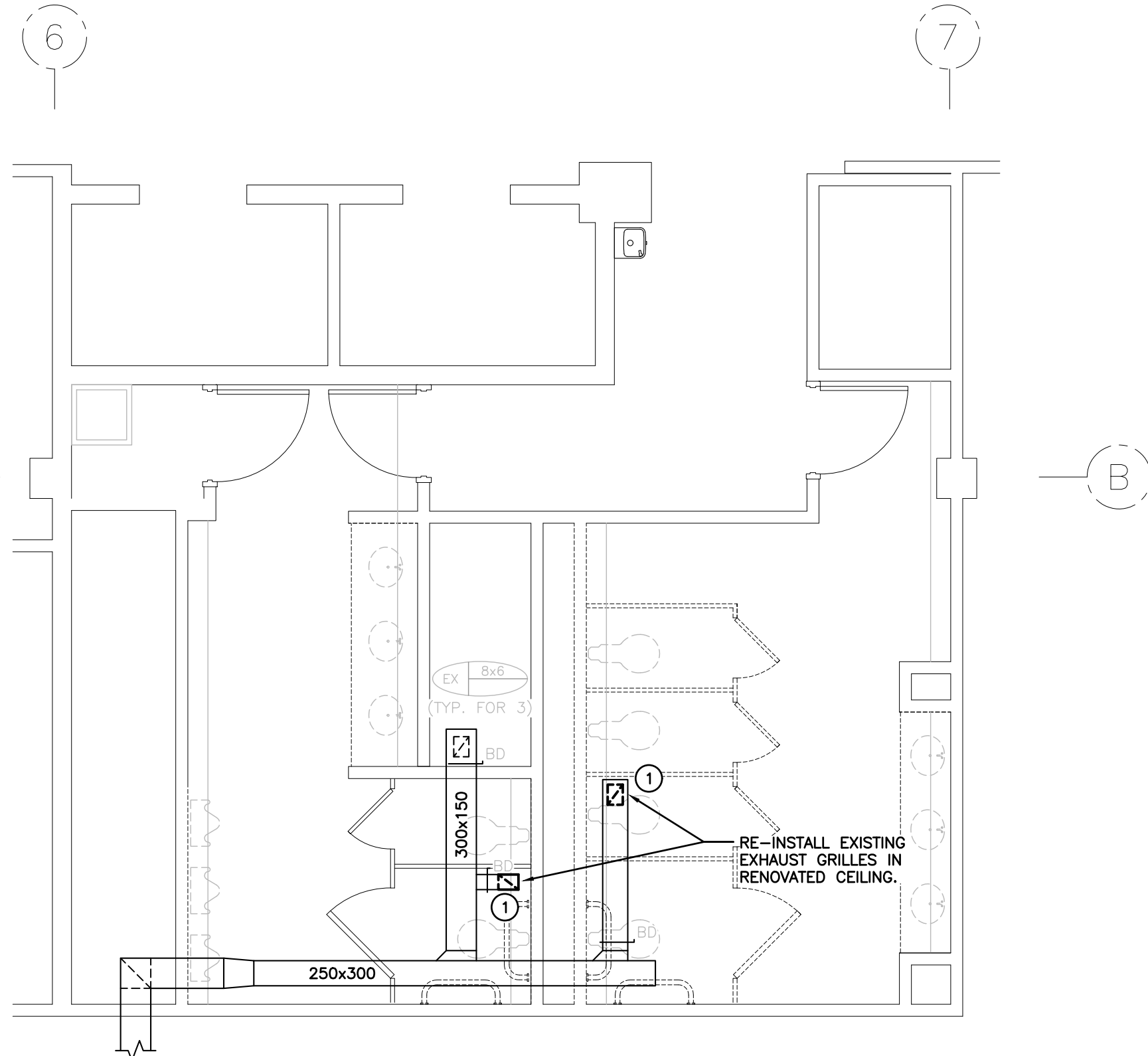
PART D IDENTIFIED PRICES

- SUPPLY OF NEW PLUMBING FIXTURES ARE TO BE LISTED IN THE IDENTIFIED PRICE FORM AS PART OF THE TENDER QUOTE. REFER TO DIVISION 01 BOOK SPECIFICATIONS. ENSURE THAT IDENTIFIED PRICE FORM IS SUBMITTED WITH TENDER PRICING.



SECOND FLOOR WASHROOM – HVAC DEMO/RENO

SCALE: 1:50



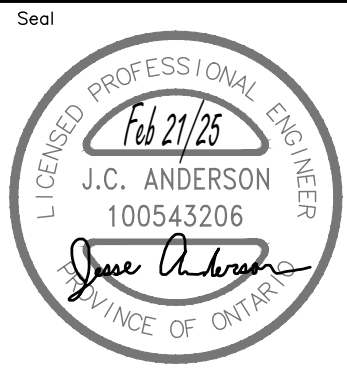
THIRD FLOOR WASHROOM – HVAC DEMO/RENO

SCALE: 1:50

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8	24.01.18	REISSUED FOR BUILDING PERMIT	JA
9	24.05.17	REISSUED FOR 100% REVIEW	JA
10	25.02.21	ISSUED FOR PERMIT & TENDER	JA



Project  
**WATERLOO CITY CENTRE  
CENTRAL WASHROOM  
RENOVATIONS PHASE 1**  
100 REGINA ST S, WATERLOO, ON N2J 4P9

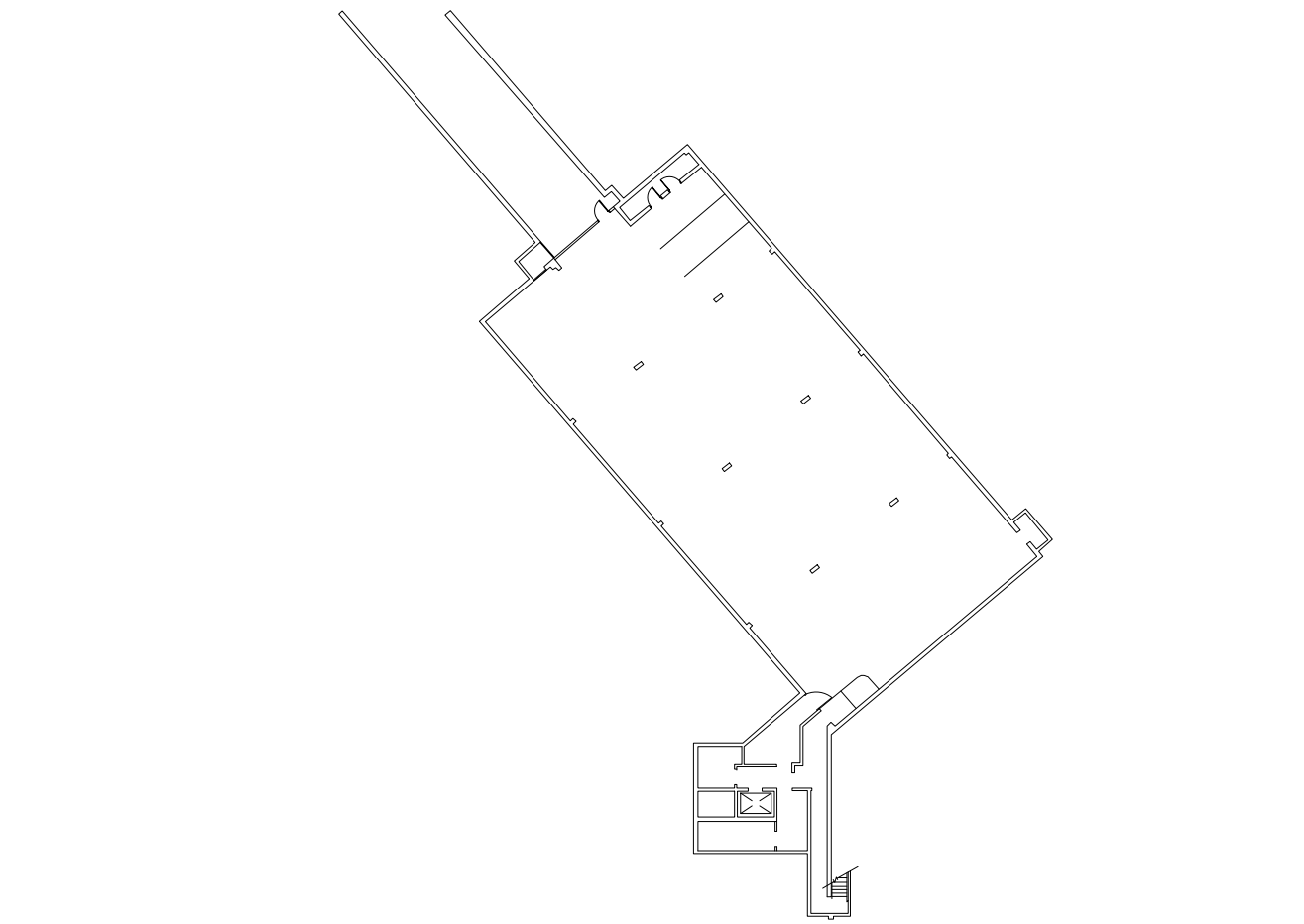
Sheet Title  
**WASHROOM HVAC PLANS  
DEMO & RENO &  
MECHANICAL SPECS**

**DEI**  
**Consulting Engineers**  
**MECHANICAL | ELECTRICAL | AQUATIC**  
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Phone: 519-725-3555  
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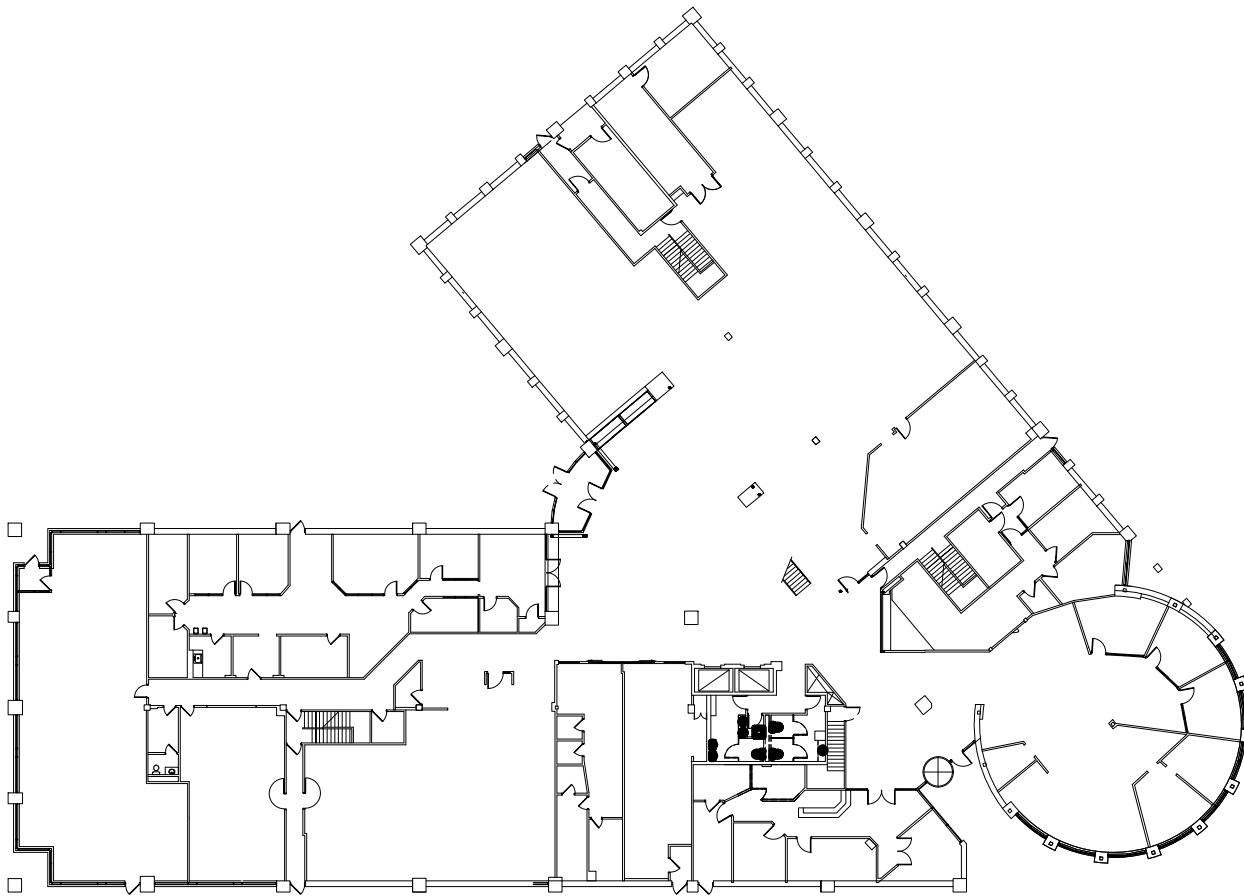
Drawn by SVA	Checked by JA	Approved by JA
Scale AS NOTED	Project Date SEP 2023	Print Date FEB 2025

Project No. <b>23115</b>	Drawing No. <b>M301</b>
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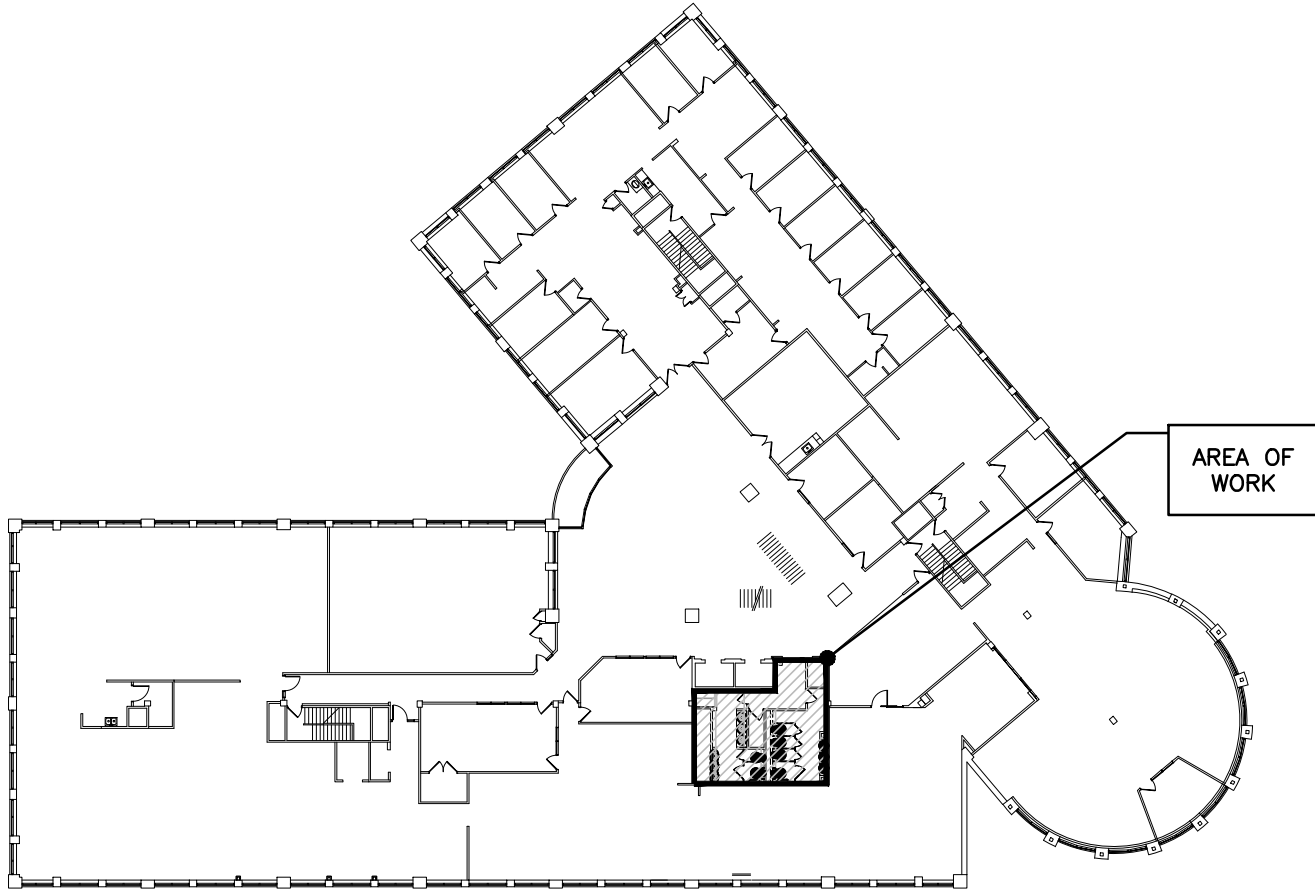




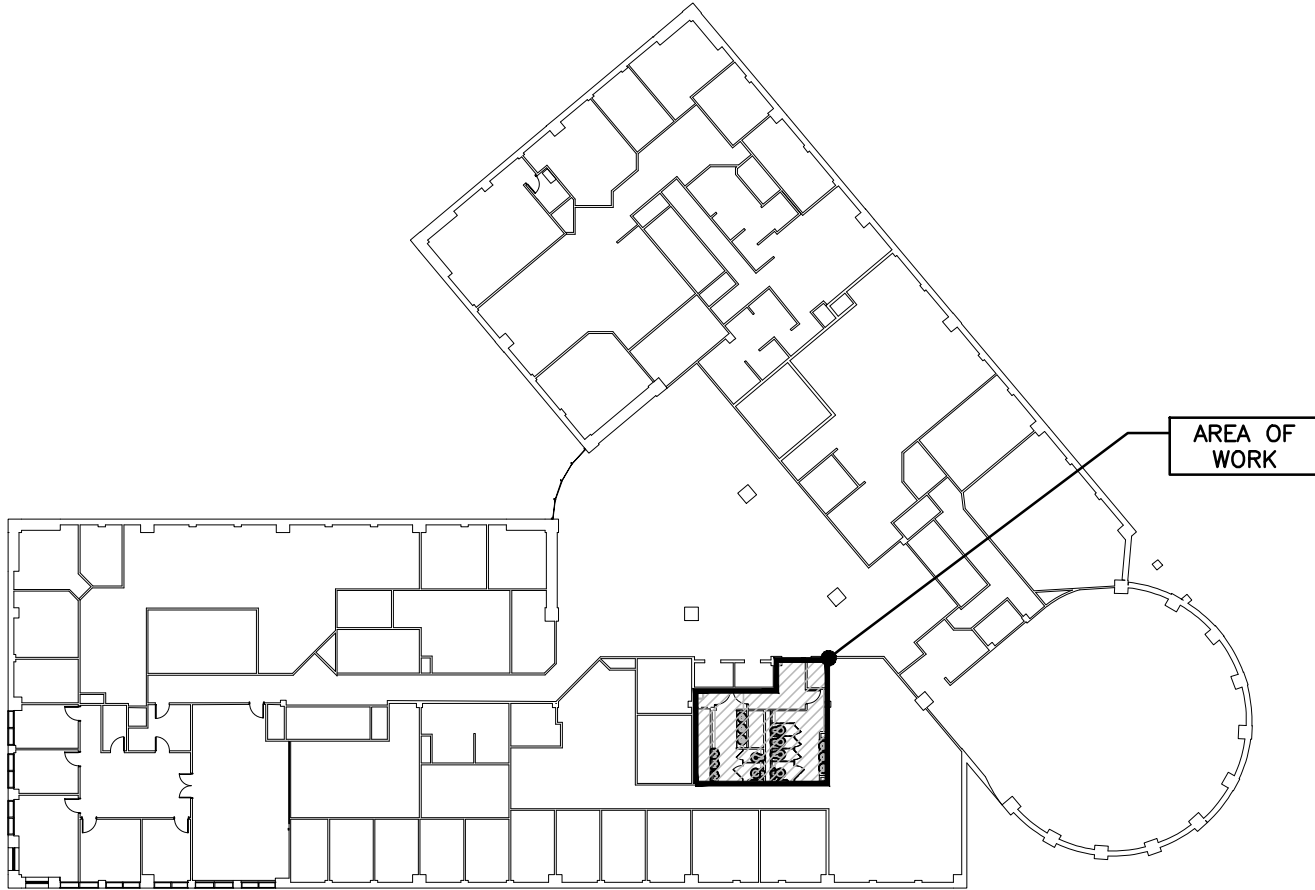
KEY PLAN — PARKING LEVEL  
SCALE: 1:500



KEY PLAN — FIRST FLOOR  
SCALE: 1:500



KEY PLAN — SECOND FLOOR  
SCALE: 1:500



KEY PLAN — THIRD FLOOR  
SCALE: 1:500

GENERAL NOTES

- A. ALL DRAWINGS ARE TO BE READ IN CONJUNCTION WITH THE PREPARED SPECIFICATION.
- B. PHASING: THIS PROJECT WILL BE COMPLETED IN MULTIPLE PHASES. AREAS OF WORK FOR EACH PHASE ARE INDICATED ON SMALL SCALE KEY-PLANS. COORDINATE WITH OWNER FOR ACCESS TO ALL APPLICABLE SPACES PRIOR TO STARTING WORK ON THAT PHASE OF WORK. TURN SPACE BACK TO OWNER IN OCCUPIABLE CONDITION BEFORE PROCEEDING TO NEXT PHASE.  
PHASE 1: 3RD FLR MEN'S/WOMEN'S WASH, CUSTODIAN CLOSET  
PHASE 2: 2ND FLR MEN'S/WOMEN'S WASH, CUSTODIAN CLOSET, ADJACENT SINK  
PHASE 3: 1ST FLR MEN'S/WOMEN'S WASH, CUSTODIAN ROOM  
EACH PHASE REQUIRES ACCESS TO THE CEILING OF THE FLOOR BELOW. ALL ABOVE CEILING WORK IS TO BE COMPLETED AFTER HOURS TO MINIMIZE DISRUPTION TO OFFICE OPERATIONS. ROOM IS TO BE MADE OCCUPIABLE PRIOR TO WORK HOURS THE FOLLOWING DAY.
- C. AFTER HOURS WORK: AFTER HOURS WORK WILL BE REQUIRED AS INDICATED IN PHASING. AFTER HOURS WORK IS BE COMPLETED AFTER 6PM ON WEEKDAYS. THE OCCUPIABLE SPACES ARE TO BE RETURNED TO OCCUPIABLE STATE BY 5AM ON THE NEXT BUSINESS DAY. SATURDAY AND SUNDAY WORK IS PERMITTED AT ANY TIME IN THE DAY. SIGNAGE IS TO BE PROVIDED INDICATING NO ENTRY AS REQUIRED DURING TIMES OF WORK.
- D. UPON COMPLETION OF THE PROJECT OR UPON COMPLETION OF EACH INDIVIDUAL PHASE OF THE PROJECT THE CONTRACTORS SHALL PROVIDE THE FOLLOWING CERTIFICATES BEFORE CONFORMANCE LETTERS ARE ISSUED BY THE CONSULTANT:  
– FIRE ALARM VERIFICATION (SEE SPEC)  
ALL CERTIFICATES ARE TO BE SUBMITTED TOGETHER IN A SINGLE PACKAGE.

ELECTRICAL SYMBOLS

NOTE: ALL SYMBOLS MAY NOT BE USED

LIGHTING		POWER	
	LIGHT FIXTURE TYPE AS INDICATED		WALL MOUNTED RECEPTACLE (15A–120V)
	CEILING OR WALL MOUNTED LIGHT FIXTURE TYPE AS INDICATED		WALL MOUNTED T–SLOT RECEPTACLE (20A–120V)
	SINGLE OR TWIN EMERGENCY LIGHTING FIXTURE		T–SLOT RECEPTACLE MTD. ABOVE COUNTER (20A–120V)
	BATTERY UNIT WITH INTEGRAL EMERGENCY FIXTURE (EM–X INDICATES BATTERY UNIT TYPE, DC–X INDICATES DC CIRCUIT, AND X–X INDICATES AC SOURCE CIRCUIT)		DIRECT CONNECTION
	SINGLE POLE SWITCH (3=3 WAY, 4=4 WAY, P=PILOT LIGHT, K=KEYED, DM=DIMMER, M=MOTOR RATED)		HAND DRYER
	CEILING MOUNTED MOTION SENSOR		PUSH–BUTTON STATION (QUANTITY OF BUTTONS AS PER PLANS)
FIRE ALARM		ACCESS CONTROL	
	ALARM STROBE		CARD/FOB READER ROUGH–IN AS A SINGLE GANG BOX AT 1100mm AFF C/W 13mmC TO ELECTRIC STRIKE IN ADJACENT DOOR FRAME. CONFIRM ROUGH–IN WITH DOOR HARDWARE.
			MOTION DETECTOR
			WAVE TO EXIT DETECTOR
			ELECTRIC STRIKE. CONFIRM ROUGHIN WITH DOOR HARDWARE.

The contractor shall verify all dimensions and report all errors and discrepancies to the Consultant before commencement of the work.  
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ISSUANCES

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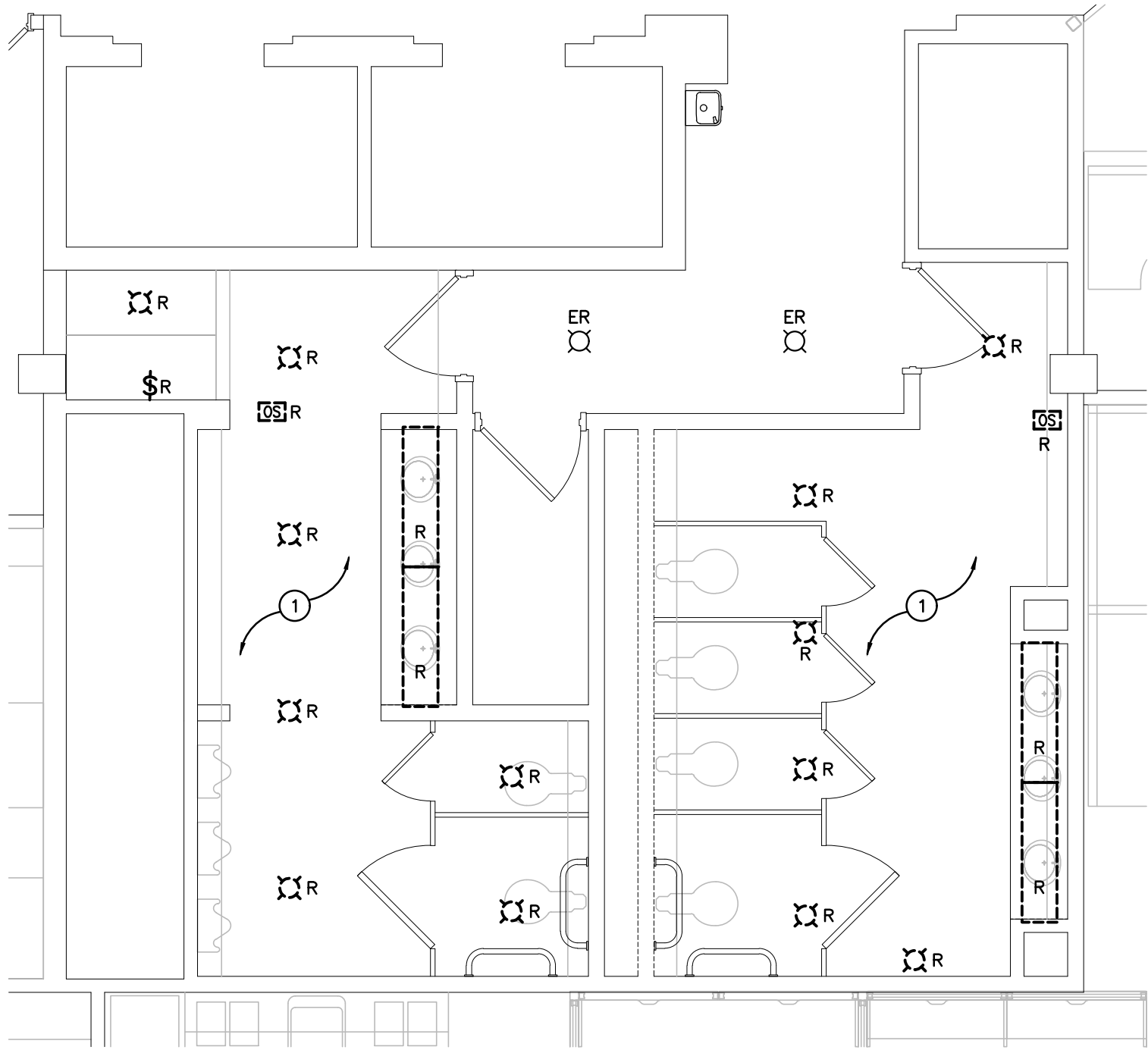


Project  
**WATERLOO CITY CENTRE  
CENTRAL WASHROOM  
RENOVATIONS PHASE 1**  
100 REGINA ST S, WATERLOO, ON N2J 4P9

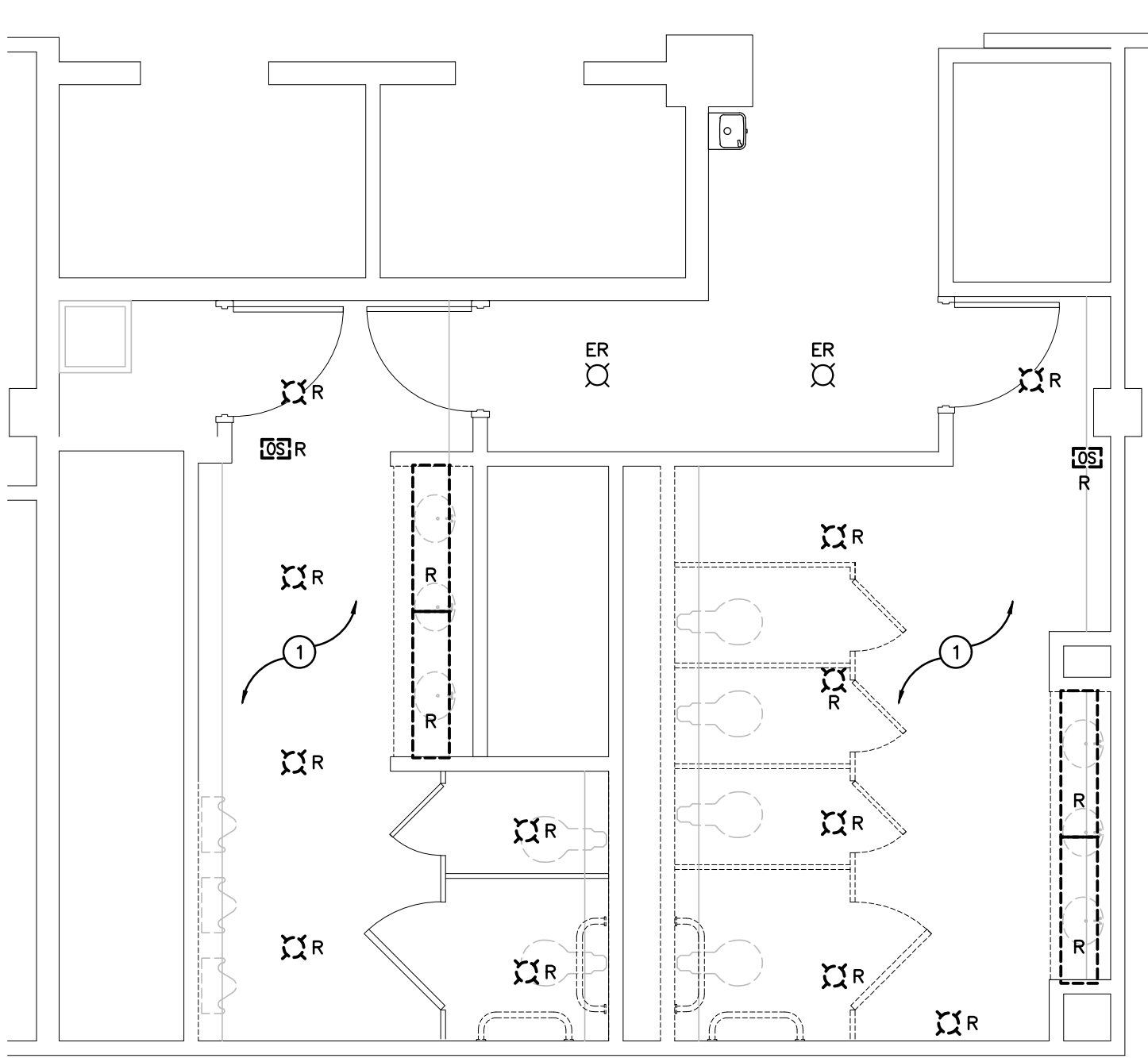
Sheet Title  
**LEGEND, GENERAL NOTES  
AND KEY PLANS**

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Drawn by JH	Checked by DM	Approved by DM
Scale AS NOTED	Project Date SEP 2023	Print Date FEB 2025
Project No. <b>23115</b>	Drawing No. <b>E101</b>	



A—SECOND FLOOR WASHROOM LIGHTING DEMOLITION PLAN  
SCALE: 1:50



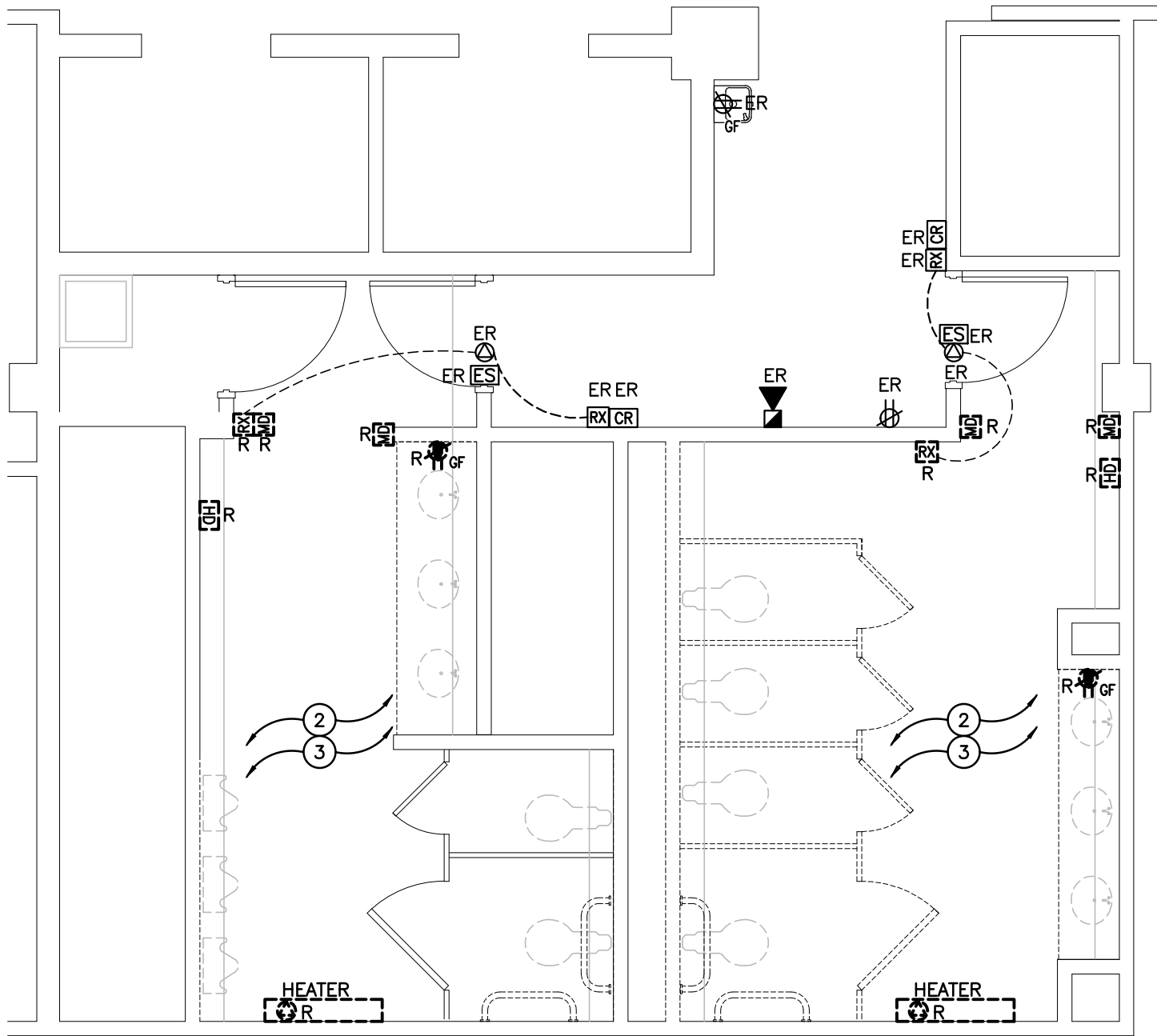
B—THIRD FLOOR WASHROOM LIGHTING DEMOLITION PLAN  
SCALE: 1:50

#### GENERAL DEMOLITION NOTES

- 'ER' DENOTES EXISTING ITEM TO REMAIN.
- EXISTING ELECTRICAL EQUIPMENT NOT SHOWN SHALL REMAIN UNLESS NOTED OTHERWISE.
- 'R' INDICATES EXISTING ITEM TO BE RELOCATED. REFER TO RENOVATION DRAWINGS AND RELOCATE DEVICE AND WIRING TO SUIT. UNLESS OTHERWISE NOTED.
- 'D' INDICATES EXISTING ITEM TO BE DELETED. UNLESS OTHERWISE NOTED DISCONNECT AND REMOVE NOTED DEVICE AND WIRING BACK TO SOURCE.
- ALL LIGHTING FIXTURES BEING RELOCATED SHALL BE CLEANED AND CHECKED PRIOR TO BEING REINSTALLED.

#### SPECIFIC DEMOLITION NOTES

- ALL LIGHTING FIXTURES AND DEVICES WITHIN EXISTING WASHROOM TO BE REMOVED TO ALLOW FOR CEILING REPLACEMENT. MAINTAIN EXISTING CIRCUITS AS REQUIRED AND CONTROL WIRING TO ALLOW FOR RE-CONNECTION. EXTEND CIRCUITS AS REQUIRED.
- IN THIS AREA DISCONNECT AND REMOVE ALL EXISTING ELECTRICAL DEVICES. CONFIRM ON SITE. IN ORDER TO MAINTAIN THE INTEGRITY OF CIRCUITS (POWER AND SYSTEM) PASSING THROUGH THIS AREA PROVIDE JUNCTION BOXES AND EXTENSION OF CIRCUITS TO SUIT THE DEMOLITION.
- THIS CONTRACTOR IS TO DISCONNECT AND RE-CONNECT EXISTING FEEDER(S) TO NEW DEVICE FOR ALL MECHANICAL EQUIPMENT BEING REPLACED BY MECHANICAL TRADE. REFER TO RENOVATION PLANS FOR CONTINUATION.

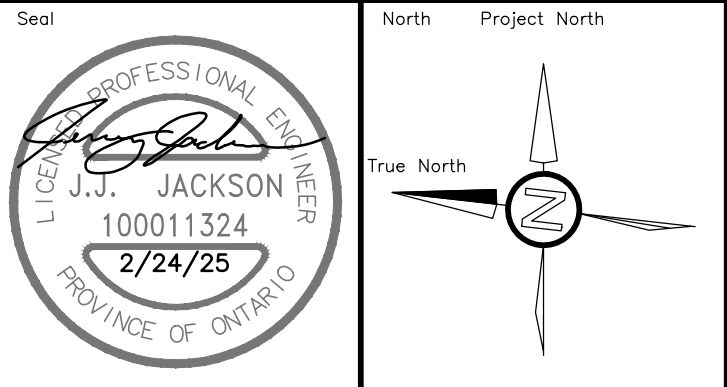


C—THIRD FLOOR WASHROOM POWER DEMOLITION PLAN  
SCALE: 1:50

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Project  
**WATERLOO CITY CENTRE  
CENTRAL WASHROOM  
RENOVATIONS PHASE 1**  
100 REGINA ST S, WATERLOO, ON N2J 4P9

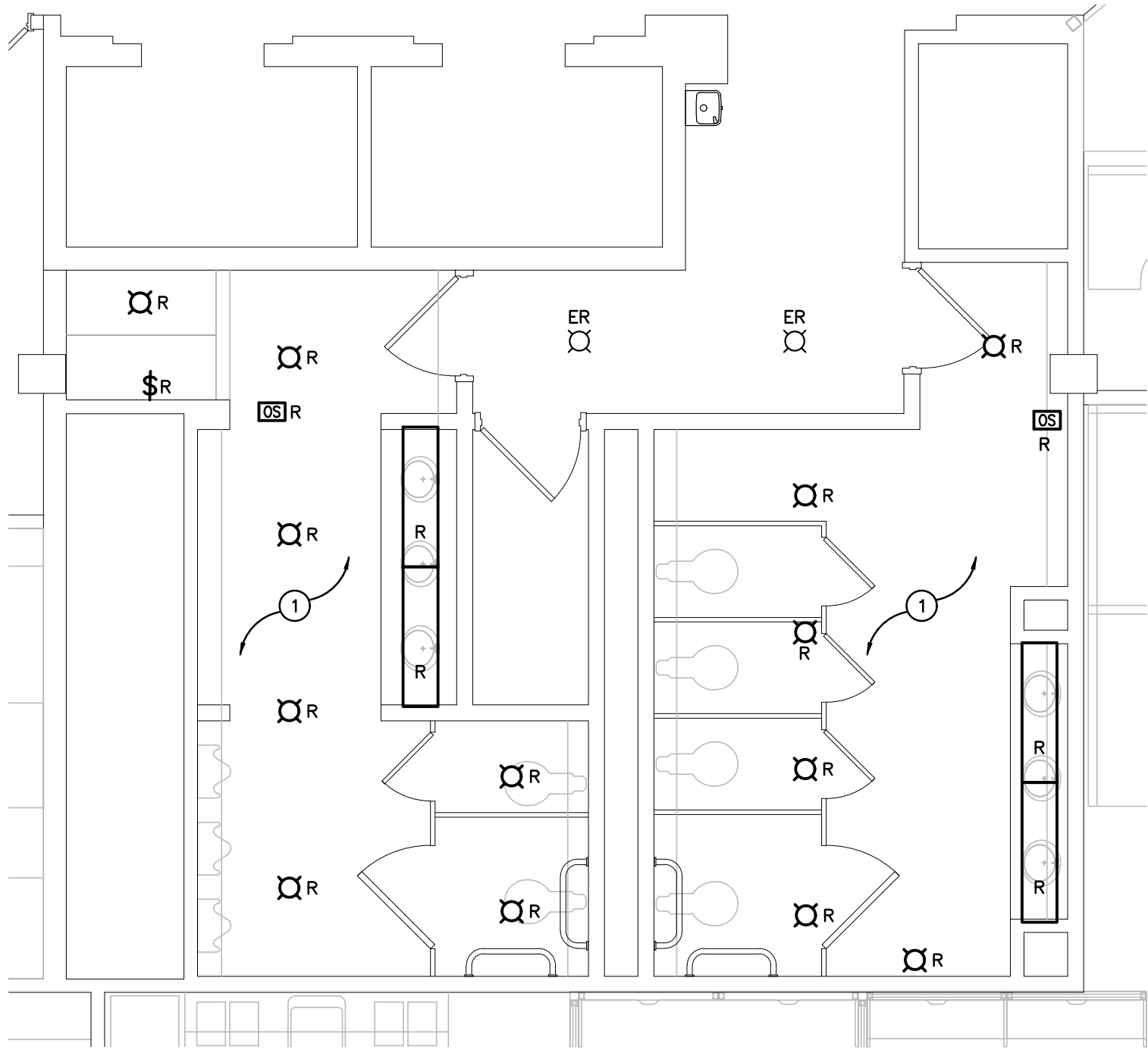
Sheet Title  
**WASHROOM ELECTRICAL  
DEMOLITION PLANS**

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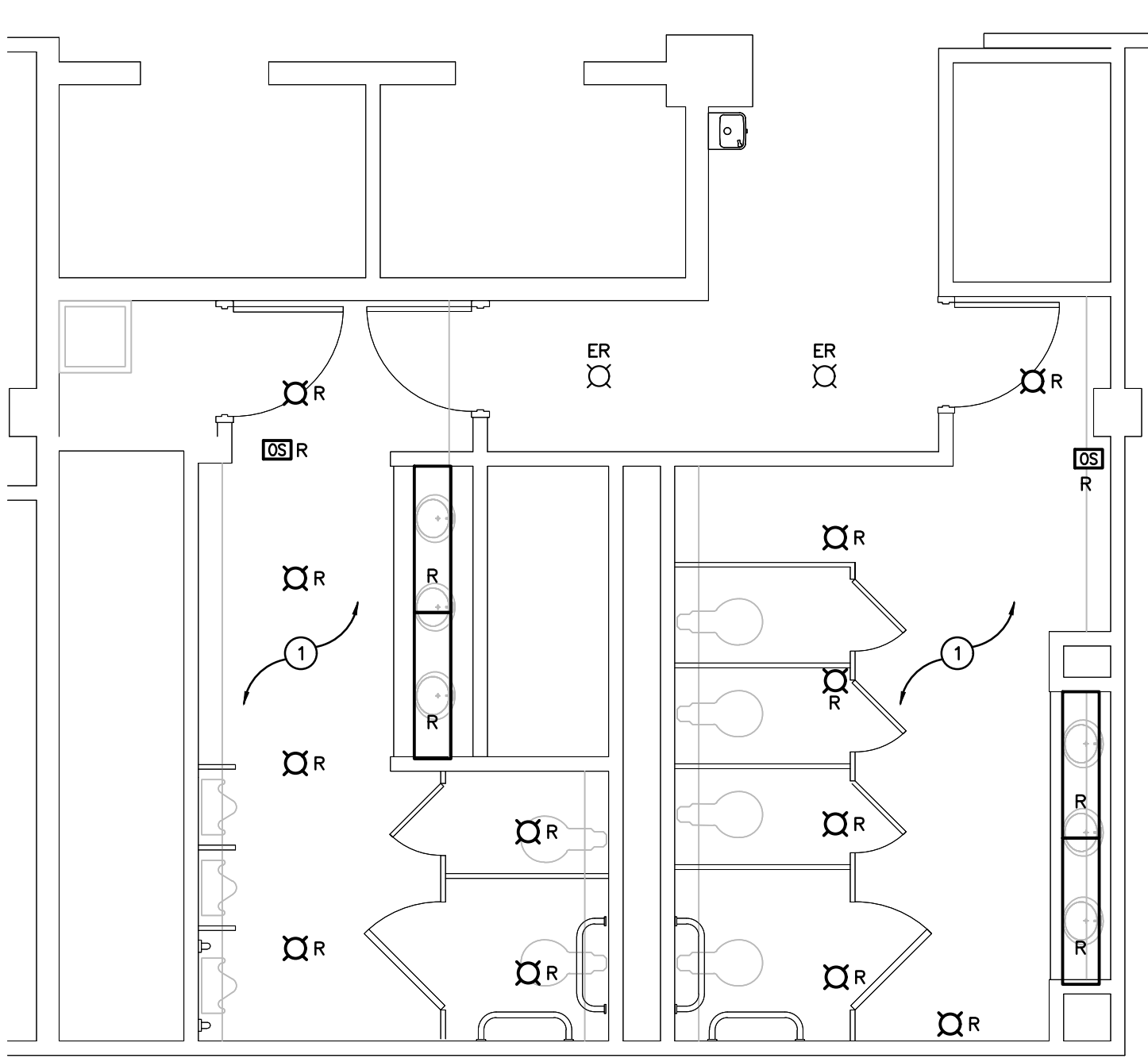
Drawn by JH	Checked by DM	Approved by DM
Scale AS NOTED	Project Date SEP 2023	Print Date FEB 2025

Project No. <b>23115</b>	Drawing No. <b>E201</b>
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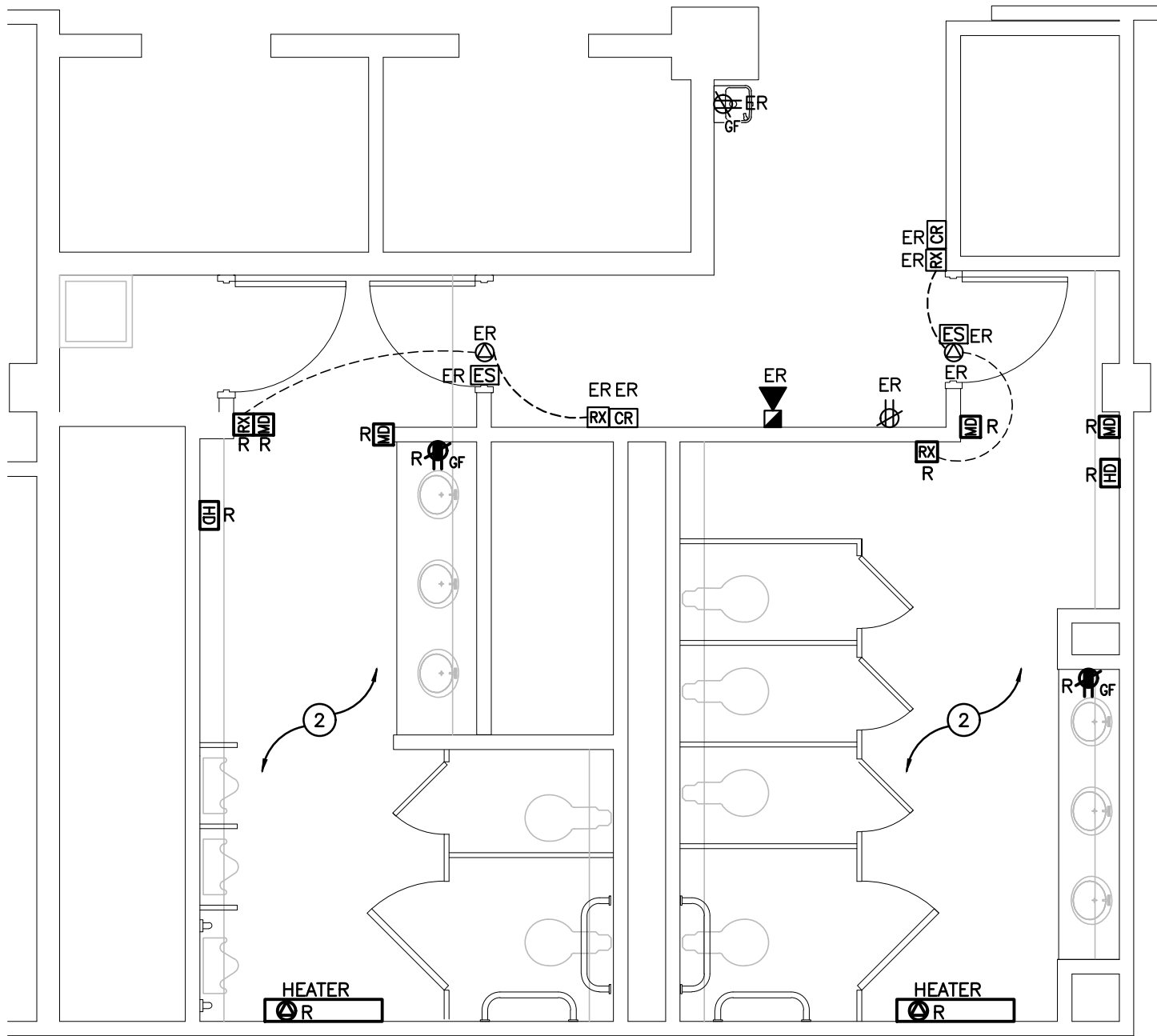




A—SECOND FLOOR WASHROOM LIGHTING RENOVATION PLAN  
SCALE: 1:50



B—THIRD FLOOR WASHROOM LIGHTING RENOVATION PLAN  
SCALE: 1:50



C—THIRD FLOOR WASHROOM POWER RENOVATION PLAN  
SCALE: 1:50

#### GENERAL RENOVATION NOTES

- 'ER' INDICATES EXISTING ITEM TO REMAIN.
- 'R' INDICATES EXISTING ITEM IN RELOCATED POSITION.
- ALL DEVICES SHOWN ARE NEW UNLESS OTHERWISE NOTED.
- EXISTING ELECTRICAL EQUIPMENT NOT SHOWN SHALL REMAIN UNLESS OTHERWISE NOTED.
- MAINTAIN SERVICE TO ALL EXISTING DEVICES TO REMAIN.
- REVISE PANEL DIRECTORIES TO SUIT CHANGES (TYPED).

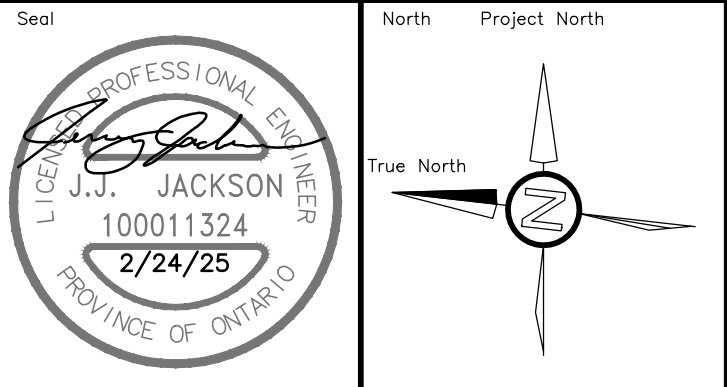
#### SPECIFIC RENOVATION NOTES

- 1 RE—INSTALL ALL REMOVED LIGHTING DEVICES AND FIXTURES WITHIN WASHROOMS. CONNECT TO EXISTING CIRCUITS AND CONTROLS.
- 2 RE—INSTALL ALL REMOVED ELECTRICAL AND MECHANICAL DEVICES WITHIN WASHROOMS. CONNECT TO EXISTING CIRCUITS.

The contractor shall verify all dimensions and report all errors and discrepancies to the Consultant before commencement of the work.  
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Project  
**WATERLOO CITY CENTRE  
CENTRAL WASHROOM  
RENOVATIONS PHASE 1**  
100 REGINA ST S, WATERLOO, ON N2J 4P9

Sheet Title  
**WASHROOM ELECTRICAL  
RENOVATION PLANS**

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Scale AS NOTED	Project Date SEP 2023	Print Date FEB 2025

Project No. <b>23115</b>	Drawing No. <b>E301</b>
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ELECTRICAL SPECIFICATION

GENERAL NOTES

- .1

PROVIDE LABOUR MATERIAL AND EQUIPMENT REQUIRED TO PROVIDE A COMPLETE INSTALLATION WITH QUALITY WORKMANSHIP ACCEPTABLE TO THE OWNER, ARCHITECT AND CONSULTANT.
- .2

OBTAIN ALL PERMITS AND PAY ALL TAXES, FEES AND OTHER COSTS INCURRED WITH THIS WORK. FILE ALL PLANS. OBTAIN NECESSARY APPROVALS, CERTIFICATES AND INSPECTIONS. SUBMIT ALL FINAL CERTIFICATES TO THE CONSULTANT.
- .3

COMPLY WITH RULES AND RECOMMENDATIONS OF THE BOARD OF UNDERWRITERS, ELECTRICAL SAFETY AUTHORITY, THE CANADIAN STANDARDS ASSOCIATION AND ALL REQUIREMENTS OF THE LOCAL UTILITY.
- .4

VISIT THE SITE BEFORE SUBMITTING TENDERS TO EVALUATE ANY SITE CONDITIONS THAT MIGHT ARISE. INCLUDE ALL SITE CONDITIONS IN TENDER, EXTRAS WILL NOT BE ACCEPTED UNLESS BELIEVED TO BE REASONABLE BY THE OWNER AND CONSULTANT.
- .5

CUTTING AND PATCHING SHALL BE BY THE CONTRACTOR REQUIRING TO INSTALL THE SERVICE.
- .6

THE DRAWINGS ARE DIAGRAMMATIC, THE SERVICES SHALL BE INSTALLED TO CONSERVE HEADROOM AND INTERFERE AS LITTLE AS POSSIBLE WITH THE FREE USE OF THE SPACES THROUGH WHICH THEY PASS.
- .7

SUBMIT COPIES OF SHOP DRAWINGS AS PDF FILES VIA EMAIL FOR ALL MAJOR EQUIPMENT. THESE WILL BE REVIEWED BY THE CONSULTANT. RESUBMIT AS OFTEN AS MAY BE FOUND NECESSARY.
- .8

PROVIDE ALL NECESSARY PROTECTION FOR FINISHED OR UNFINISHED WORK, ALL OPENINGS IN CONDUITS, DUCTS AND EQUIPMENT SHALL BE CAPPED TO ENSURE SERVICES ARE KEPT CLEAN WHEN NOT IN USE.
- .9

MAINTAIN INSURANCE TO FULLY PROTECT THE CONTRACTOR, OWNER AND CONSULTANT FROM ANY AND ALL CLAIMS SUCH AS UNDER THE WORKMEN'S COMPENSATION ACT, ETC. POST PROJECT NOTIFICATION AT THE SITE IN ACCORDANCE WITH THE MINISTRY OF LABOUR REQUIREMENTS.
- .10

PROVIDE STRUCTURAL SUPPORTS, PLATFORMS, SUPPORTING RODS, HANGERS, INSERTS AND BRACKETS FOR EQUIPMENT AND SERVICES. DO NOT SUPPORT SERVICES FROM STEEL DECK.
- .11

INSTRUCT THE OWNER'S STAFF IN THE CARE, MAINTENANCE AND OPERATION OF THE SYSTEMS.
- .12

WARRANTY ALL LABOUR, MATERIAL AND EQUIPMENT FOR A PERIOD OF ONE (1) YEAR AFTER FINAL ACCEPTANCE OF SYSTEM.
- .13

COORDINATE WITH OTHER CONTRACTORS INSTALLING EQUIPMENT OR MATERIAL AND ARRANGE EQUIPMENT IN PROPER RELATION WITH APPARATUS OF ALL OTHER TRADES.
- .14

ALL AREAS NOT AFFECTED BY RENOVATION OR DEMOLITION SHALL REMAIN AS PRESENTLY INSTALLED UNLESS OTHERWISE NOTED.
- .15

ALL EXISTING ELECTRICAL DEVICES, OUTLET BOXES, ETC., NOT SHOWN ON DRAWINGS OR MENTIONED IN THE FOLLOWING NOTES AND INSTALLED IN WALLS SLATED FOR DEMOLITION, SHALL BE DISCONNECTED AND REMOVED COMPLETELY IN ALL RESPECTS.
- .16

SUBMIT ONE COPY OF OPERATING AND MAINTENANCE INSTRUCTIONS IN A THREE RING BINDER LABELED FOR THE PROJECT COMPLETE WITH ITEMIZED SECTIONS CONTAINING PROJECT DATA, SHOP DRAWINGS, ETC. UPON ACCEPTANCE OF THE OPERATION AND MAINTENANCE MANUAL BY THE CONSULTANT PROVIDE TWO ADDITIONAL COPIES BOUND IN SEPARATE THREE RING BINDERS. A PDF FILE OF THE ENTIRE MANUAL IS TO BE PROVIDED ON A USB STICK. ONLY ONE USB STICK IS TO BE PROVIDED CONTAINING BOTH THE APPROVED MANUALS AND RECORD DRAWINGS.
- .17

CONTRACTOR SHALL PROVIDE 2 SETS OF REPRODUCIBLE ELECTRICAL DRAWINGS. MARK THEREON ALL CHANGES AS WORK PROGRESSES AND AS CHANGES OCCUR. THIS SHALL INCLUDE FIELD AND CONTRACT CHANGES TO ELECTRICAL SYSTEMS. IDENTIFY EACH DRAWING IN LOWER RIGHT HAND CORNER IN LETTERS AT LEAST 3mm (1/8") HIGH AS FOLLOWS: – "RECORD DRAWINGS: THIS DRAWING HAS BEEN REVISED TO SHOW ELECTRICAL SYSTEMS AS INSTALLED. (SIGNATURE OF CONTRACTOR)(DATE)". SUBMIT HARD COPY TO CONSULTANT FOR APPROVAL. WHEN RETURNED, MAKE CORRECTIONS (IF ANY) AS DIRECTED. ONCE APPROVED, SUBMIT COMPLETED REPRODUCIBLE PAPER RECORD DRAWINGS AS WELL AS A SCANNED PDF COPY FILE ON USB STICK WITH OPERATING AND MAINTENANCE MANUALS.
- .18

CONTRACTOR SHALL PROVIDE RED LINE RECORD DRAWINGS OF EACH AND EVERY ELECTRICAL DRAWING FOR DEI & ASSOCIATES INC. TO CAD THE RECORD DRAWINGS. THE CAD DRAWING FILES WILL BE PROVIDED TO THE OWNER AS PART OF THE MAINTENANCE MANUALS.
- .19

THE CONTRACTOR IS TO DETERMINE GENERAL INSPECTION FEES WITH THE ELECTRICAL SAFETY AUTHORITY AND INCLUDE AS PART OF TENDER.

BASIC MATERIALS

- .1

JUNCTION, OUTLET AND PULL BOXES MUST BE APPROVED TO SUIT INSTALLATION METHODS AND ENVIRONMENT.
- .2

CONDUIT MUST BE CONCEALED UNLESS INSTALLED IN SERVICE OR STORAGE ROOMS.
- .3

CONDUIT MUST BE INSTALLED PARALLEL AND PERPENDICULAR TO BUILDING LINES IN A NEAT AND WORKMANLIKE MANNER.
- .4

ALL FEEDER AND BRANCH CIRCUIT WIRING MUST BE COPPER, T90 RATING/STYLE RUN IN EMT CONDUIT WITH INTERNAL INSULATED GREEN GROUND WIRE UNLESS NOTED OTHERWISE. MINIMUM WIRE SIZE SHALL BE #12 AND MINIMUM CONDUIT SIZE SHALL BE 3/4" (19mm).
- .5

AC90 CABLE MAY BE USED FOR BRANCH CIRCUIT WIRING IN STEEL STUD WALLS AND "DROPS" IN T-BAR CEILING AREAS TO LIGHT FIXTURES AND FIRE ALARM DEVICES. LENGTH OF DROP MUST BE LIMITED TO 8'-0" (2400mm).
- .6

COLOUR CODE CONDUITS, BOXES AND METALLIC SHEATHED CABLES.
- .7

CODE WITH PLASTIC TAPE OR PAINT AT POINTS WHERE CONDUIT OR CABLE ENTERS WALL, CEILING, OR FLOOR, AND AT 15m(45') INTERVALS.
- .10

COLOUR BANDS MUST BE 25mm(1") WIDE AND CODED AS FOLLOWS FOR NOTED SYSTEMS. (WRITER TO EDIT)

SYSTEM

UP TO 208V

209 TO 600V

VOICE SYSTEM

DATA SYSTEM

SECURITY

PUBLIC ADDRESS

FIRE ALARM

EMERGENCY VOICE

EMERGENCY LIGHTING

EMERGENCY UP TO 208V

EMERGENCY 209V TO 600V

COLOUR

YELLOW

WHITE

GREEN

ORANGE

BROWN

BLACK

RED

PINK

YELLOW/RED/YELLOW (STRIPED)

WHITE/RED/WHITE (STRIPED)

.10

THIS CONTRACTOR MUST PAINT ALL SYSTEM JUNCTION BOXES AND COVERS IN CONFORMANCE WITH THE ABOVE SCHEDULE.
- DRAW BREAKDOWN
- .1

THIS CONTRACTOR MUST SUBMIT A BREAKDOWN OF THE TENDER PRICE INTO CLASSIFICATIONS TO THE SATISFACTION OF THE CONSULTANT, WITH THE AGGREGATE OF THE BREAKDOWN TOTALING THE TOTAL CONTRACT AMOUNT. EACH ITEM MUST BE BROKEN OUT INTO MATERIAL AND LABOUR COSTS. PROGRESS CLAIMS, WHEN SUBMITTED ARE TO BE ITEMIZED AGAINST EACH ITEM OF THE DRAW BREAKDOWN. THIS SHALL BE DONE IN TABLE FORM SHOWING CONTRACT AMOUNT, AMOUNT THIS DRAW, TOTAL TO DATE, % COMPLETE AND BALANCE.

.2

BREAKDOWN SHALL BE AS FOLLOWS:

.1

PERMITS AND FEES

.2

MOBILIZATION (MAXIMUM 1%)

.3

DEMOLITION

.4

RENOVATION

.5

COMMISSIONING (MINIMUM 3%)

.3

THE BREAKDOWN MUST BE APPROVED BY THE CONSULTANT PRIOR TO SUBMISSION OF THE FIRST DRAW.

.4

BREAKDOWNS NOT COMPLYING TO THE ABOVE WILL NOT BE APPROVED.

.5

BREAKDOWN MUST INDICATE TOTAL CONTRACT AMOUNT.

.6

MOBILIZATION AMOUNT MAY ONLY BE DRAWN WHEN ALL REQUIRED SHOP DRAWINGS HAVE BEEN REVIEWED BY THE CONSULTANT.
- SHOP DRAWINGS AND PRODUCT DATA
- .1

FURNISH COMPLETE CATALOG DATA FOR MANUFACTURED ITEMS OF EQUIPMENT TO BE USED IN THE WORK TO CONSULTANT FOR REVIEW WITHIN 30 DAYS AFTER AWARD OF CONTRACT.

.2

IF MATERIAL OR EQUIPMENT IS NOT AS SPECIFIED OR SUBMITTAL IS NOT COMPLETE, IT WILL BE REJECTED BY CONSULTANT.

.3

ADDITIONAL SHOP DRAWINGS REQUIRED BY THE CONTRACTOR FOR MAINTENANCE MANUALS, SITE COPIES ETC., SHALL BE PHOTOCOPIES OF THE 'REVIEWED' SHOP DRAWINGS. ALL COSTS TO PROVIDE ADDITIONAL COPIES OF SHOP DRAWINGS SHALL BE BORNE BY THE CONTRACTOR.

.4

PARTIAL SUBMITTALS WILL NOT BE ACCEPTED.

.5

CATALOG DATA OR SHOP DRAWINGS FOR EQUIPMENT, WHICH ARE NOTED AS BEING REVIEWED BY CONSULTANT OR HIS ENGINEER SHALL NOT SUPERSEDE CONTRACT DOCUMENTS.

.6

REVIEW COMMENTS OF CONSULTANT SHALL NOT RELIEVE THIS DIVISION FROM RESPONSIBILITY FOR DEVIATIONS FROM CONTRACT DOCUMENTS UNLESS CONSULTANT'S ATTENTION HAS BEEN CALLED TO SUCH DEVIATIONS IN WRITING AT TIME OF SUBMISSION, NOR SHALL THEY RELIEVE THIS DIVISION FROM RESPONSIBILITY FOR ERRORS IN ITEMS SUBMITTED.

.7

CHECK WORK DESCRIBED BY CATALOG DATA WITH CONTRACT DOCUMENTS FOR DEVIATIONS AND ERRORS.

.8

SHOP DRAWINGS AND PRODUCT DATA SHALL SHOW:

.1

MOUNTING ARRANGEMENTS.

.2

OPERATING AND MAINTENANCE CLEARANCES. E.G. ACCESS DOOR SWING SPACES.

.9

SHOP DRAWINGS AND PRODUCT DATA SHALL BE ACCOMPANIED BY:

.1

DETAILED DRAWINGS OF BASES, SUPPORTS, AND ANCHOR BOLTS.

.2

MANUFACTURER TEST DATA WHERE REQUESTED.

.3

MANUFACTURER TO CERTIFY AS TO CURRENT MODEL PRODUCTION.

.4

CERTIFICATION OF COMPLIANCE TO APPLICABLE CODES.

.10

STATE SIZES, CAPACITIES, BRAND NAMES, MOTOR HP, ACCESSORIES, MATERIALS, GAUGES, DIMENSIONS, AND OTHER PERTINENT INFORMATION. LIST ON CATALOG COVERS PAGE NUMBERS OF SUBMITTED ITEMS. UNDERLINE APPLICABLE DATA.

.11

ONCE THESE SHOP DRAWINGS ARE RETURNED 'REVIEWED' OR 'REVIEWED AS NOTED' FABRICATION, PRODUCTION, AND INSTALLATION MAY COMMENCE. NOTE: IF A SHOP DRAWING IS RETURNED 'REVIEWED AS NOTED' THIS CONTRACTOR MUST PROVIDE WRITTEN INDICATION THAT THE COMMENTS HAVE BEEN COMPLIED WITH.

.12

A PARTIAL LIST OF SHOP DRAWINGS INCLUDES:

.1

FIRESTOPPING MATERIALS

.2

WIRING DEVICES
- FIRESTOPPING
- .1

FIRESTOPPING MATERIAL AND INSTALLATION WITHIN ANNULAR SPACE BETWEEN CONDUITS, DUCTS, AND ADJACENT FIRE SEPARATION.

.2

PROVIDE MATERIALS AND SYSTEMS CAPABLE OF MAINTAINING EFFECTIVE BARRIER AGAINST FLAME, SMOKE, AND GASES.

.3

COMPLY WITH THE REQUIREMENTS OF CAN4-S115-M35, AND DO NOT EXCEED OPENING SIZED FOR WHICH THEY HAVE BEEN TESTED.

.4

SYSTEMS TO HAVE AN F OR FT RATING (AS APPLICABLE) NOT LESS THAN THE FIRE PROTECTION RATING REQUIRED FOR CLOSURES IN A FIRE SEPARATION. PROVIDE 'FIREWRAP' BLANKET AROUND SERVICES PENETRATING FIREWALLS.

.5

EXTENT OF BLANKET MUST CORRESPOND TO ULC RECOMMENDATIONS. IN GENERAL WRAP INDIVIDUAL CONDUITS WITH APPROVED FIREWRAP MATERIALS ON EACH SIDE OF FIREWALL. REFER TO ARCHITECTURAL DRAWINGS FOR FT RATINGS. PROVIDE 1 AND/OR 2 LAYERS OF FIREWRAP WITH TRANSVERSE AND LONGITUDINAL SEAMS OVERLAPPED AND/OR BUTTED (SECOND LAYER OFFSET FROM FIRST LAYER). CUT EDGES ARE TO BE SEALED WITH ALUMINUM FOIL TAPE. PROVIDE 50 MM STAINLESS STEEL BANDING AT 200 MM INTERVALS. INSTALL FIREWRAP TO MANUFACTURERS' RECOMMENDATIONS FOR PROPER FT RATING. ACCEPTABLE MANUFACTURERS ARE 3M FIREMASTER DUCTWRAP OR APPROVED EQUAL.

.6

THE FIRESTOPPING MATERIALS ARE NOT TO SHRINK, SLUMP OR SAG AND BE FREE OF ASBESTOS, HALOGENS AND VOLATILE SOLVENTS.

.7

FIRESTOPPING MATERIALS ARE TO CONSIST OF A COMPONENT SEALANT APPLIED WITH A CONVENTIONAL CAULKING GUN AND TROWEL.

.8

FIRESTOP MATERIALS ARE TO BE CAPABLE OF RECEIVING FINISH MATERIALS IN THOSE AREAS, WHICH ARE EXPOSED AND SCHEDULED TO RECEIVE FINISHES.

.9

FIRESTOPPING SHALL BE INSPECTED AND APPROVED BY LOCAL AUTHORITY PRIOR TO CONCEALMENT OR ENCLOSURE.

.10

INSTALL MATERIAL AND COMPONENTS IN ACCORDANCE WITH ULC CERTIFICATION, MANUFACTURERS INSTRUCTIONS AND LOCAL AUTHORITY.

.11

SUBMIT PRODUCT LITERATURE AND INSTALLATION MATERIAL ON FIRESTOPPING IN SHOP DRAWING AND PRODUCT DATA MANUAL.

.12

ACCEPTABLE MANUFACTURERS:

RECTORSEAL CORPORATION (METACAULK)

PROSET SYSTEMS

3M

HILTI

STI FIRESTOP

NOTE: FIRE STOP MATERIAL MUST CONFORM TO REQUIREMENTS OF LOCAL AUTHORITIES HAVING JURISDICTION. CONTRACTOR TO CONFIRM PRIOR TO APPLICATION AND ENSURE MATERIAL USED IS COMPATIBLE WITH THAT USED BY OTHER TRADES ON SITE.

.13

ENSURE FIRESTOP MANUFACTURER REPRESENTATIVE PERFORMS ON SITE INSPECTIONS AND CERTIFIES INSTALLATION. SUBMIT INSPECTION REPORTS/CERTIFICATION AT TIME OF SUBSTANTIAL COMPLETION.
- The contractor shall verify all dimensions and report all errors and discrepancies to the Consultant before commencement of the work.  
The drawings show general arrangement of services. Follow as closely as actual building construction will permit. Obtain approval for relocation of service from Consultant before commencement of the work.  
The drawings do not indicate all offsets fitting and accessories which may be required. Provide the same to meet the required conditions.  
Drawings and specifications, etc., prepared and issued by the Consultant are the property of the Consultant and must be returned at the completion of the project. These documents are not to be duplicated or copied without the consent of the Consultant.  
Do not scale this drawing.  
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- | ISSUANCES |                  |                              |    |
|-----------|------------------|------------------------------|----|
| No        | DATE<br>YY.MM.DD | DESCRIPTION                  | BY |
| 1         | 23.06.14         | ISSUED FOR REVIEW            | DM |
| 2         | 23.08.23         | ISSUED FOR TENDER REVIEW     | DM |
| 3         | 23.09.12         | ISSUED FOR PERMIT            | DM |
| 4         | 23.09.28         | ISSUED FOR PERMIT & TENDER   | DM |
| 5         | 23.10.20         | ISSUED FOR PERMIT & TENDER   | DM |
| 6         | 23.11.22         | REISSUED FOR PERMIT          | DM |
| 7         | 24.01.08         | REISSUED FOR TENDER          | DM |
| 8         | 24.01.18         | REISSUED FOR BUILDING PERMIT | DM |
| 9         | 24.05.17         | REISSUED FOR 100% REVIEW     | DM |
| 10        | 25.02.24         | ISSUED FOR PERMIT & TENDER   | DM |
- Seal
- 
- Project
- WATERLOO CITY CENTRE  
CENTRAL WASHROOM  
RENOVATIONS PHASE 1**  
100 REGINA ST S, WATERLOO, ON N2J 4P9
- Sheet Title
- SPECIFICATIONS**
- Consulting Engineers**

**MECHANICAL | ELECTRICAL | AQUATIC**

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- |                             |                            |                        |
|-----------------------------|----------------------------|------------------------|
| Drawn by<br>JH              | Checked by<br>DM           | Approved by<br>DM      |
| Scale<br>AS NOTED           | Project Date<br>SEP 2023   | Print Date<br>FEB 2025 |
| Project No.<br><b>23115</b> | Drawing No.<br><b>E401</b> |                        |