LEGEND

ST	EXISTING STORM SEWER
ST	PROPOSED STORM SEWER W/ FLOW ARRO
S	EXISTING SANITARY SEWER
S	PROPOSED SANITARY SEWER W/ FLOW ARROW
W	EXISTING WATERMAIN
W	PROPOSED WATERMAIN
	SANITARY LATERAL
M	WATER METER
B	BACK FLOW PREVENTER
	ENTRANCE
	OVERHEAD DOOR ENTRANCE
R#	NUMBER OF RISERS
AD	AREA DRAIN
APP	APPROACH
CB	CATCH BASIN
CBMH	CATCH BASIN MANHOLE
CCRB	CONCRETE CURB
DAD	DOUBLE AREA DRAIN
DCB	DOUBLE CATCH BASIN
DCBMH	DOUBLE CATCH BASIN MANHOLE
EX	EXISTING
EB	ELECTRICAL BOX
FH	FIRE HYDRANT
HP	HYDRO POLE
HH	HAND HOLE
HMH	HYDRO MANHOLE
LS	LIGHT STANDARD
LP	LIGHT POST
LA	LANDSCAPING AREA
MH	MANHOLE
MW	MONITORING WELL
SAN	SANITARY
STM	STORM
S/W	SIDEWALK
T/G	TOP OF GRATE
TL	TRAFFIC LIGHT
VC	VALVE CHAMBER

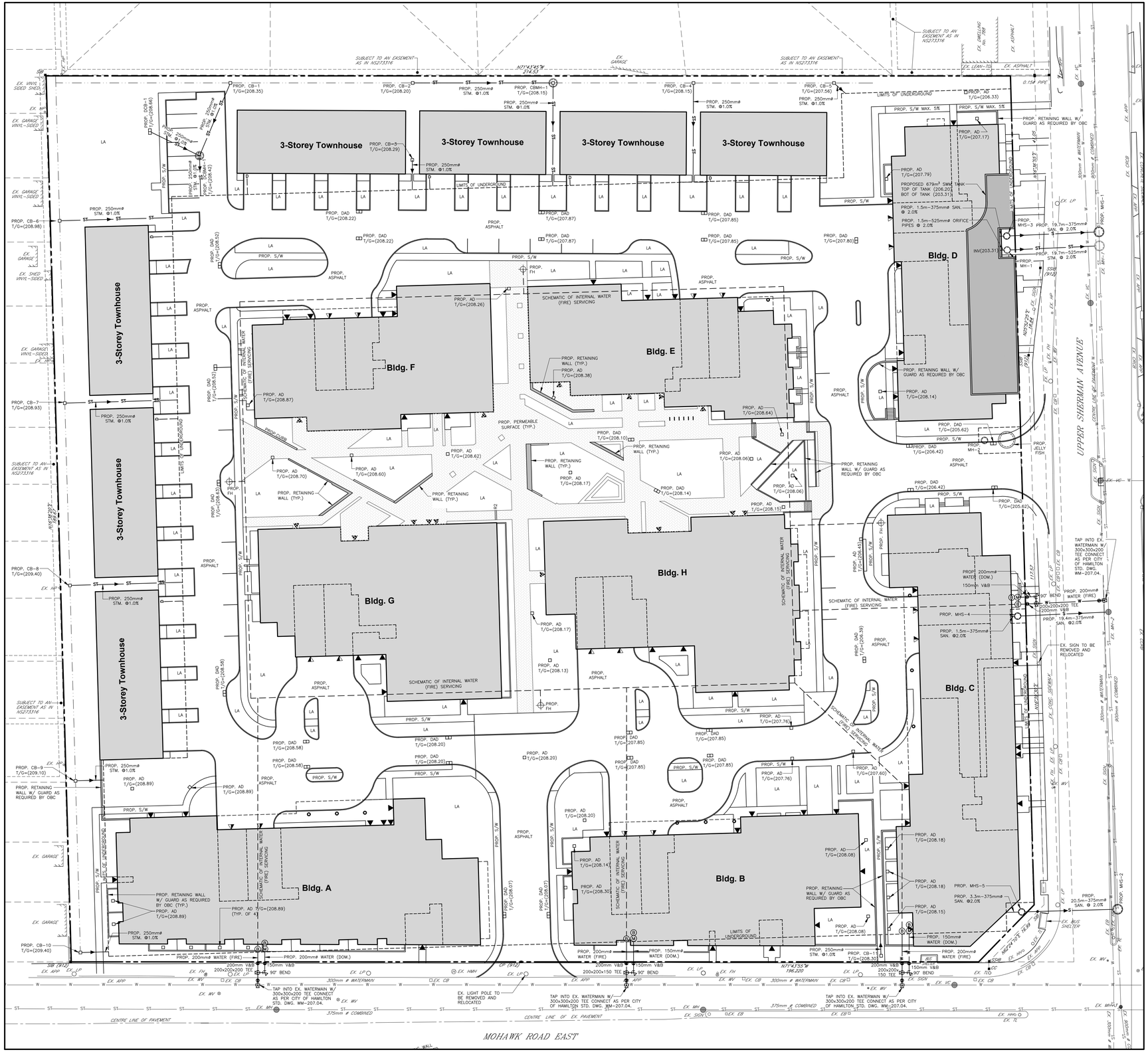
CONSTRUCTION NORTH

GENERAL SERVICING NOTES:

1. ALL SERVICES TO BE INSTALLED AS PER CITY OF HAMILTON CONSTRUCTION AND MATERIAL SPECIFICATIONS MANUAL (LATEST EDITION) AND MINISTRY OF THE ENVIRONMENT GUIDELINES (LATEST EDITION).
2. MINIMUM HORIZONTAL SEPARATION BETWEEN WATER SERVICES AND SEWERS SHALL BE 2.5m MEASURED FROM THE CLOSEST PIPE EDGE TO CLOSEST PIPE EDGE. VERTICAL SEPARATION BETWEEN WATERMAINS AND SEWERS WHICH CROSS MUST BE 0.5m BETWEEN THE OUTSIDE OF THE WATERMAIN AND THE OUTSIDE OF THE SEWER, WITH THE LENGTH OF THE WATER PIPE BEING CENTRED AT THE POINT OF CROSSING SUCH THAT JOINTS IN THE WATERMAIN WILL BE EQUIDISTANT AND AS FAR AS POSSIBLE FROM THE SEWER, CROSSING PERPENDICULAR IF POSSIBLE.
3. ALL WATER SERVICES TO BE INSTALLED WITH A MINIMUM OF 1.6m COVER. SEWERS TO BE INSTALLED WITH A MINIMUM COVER OF 2.20m AT THE PROPERTY LINE BELOW THE FINAL ROAD GRADE OR AT SUCH HIGHER ELEVATION ONLY AS MAY BE NECESSITATED BY THE LEVEL OF THE MAIN SEWER. ON PRIVATE PROPERTY THE MINIMUM COVER IS TO BE NO LESS THAN 1.2m.
4. RESTORATION OF ROAD OVER UTILITY CUTS IN HAMILTON TO BE AS PER STANDARD DRAWINGS RD-100.01 AND RD-100.02, WITH GRANULAR "A" BEDDING.
5. APPROVAL OF THIS DRAWING IS FOR MATERIAL ACCEPTABILITY AND COMPLIANCE WITH MUNICIPAL AND PROVINCIAL SPECIFICATIONS AND STANDARDS ONLY. APPROVAL AND INSPECTION BY THE CITY OF THE WORKS DOES NOT CERTIFY THE LINE AND GRADE OF THE WORKS AND IT IS THE OWNER'S RESPONSIBILITY TO HAVE THEIR ENGINEER CERTIFY THIS ACCORDINGLY.
6. ALL PROPOSED SERVICE ARE TO PASS BELOW EX. WATERMAINS, BY A MIN. OF 250mm, BASED ON THE TOP OF THE EX. WATERMAIN BEING 1.6m BELOW THE CENTERLINE OF ROAD.
7. ALL BUILDING SERVICE SIZES ARE TO BE CONFIRMED BY THE MECHANICAL ENGINEER AT BUILDING DESIGN PHASE.

BEFORE STARTING WORK

1. THE CONTRACTOR SHALL NOTIFY THE CITY OF HAMILTON AND LANHACK CONSULTANTS INC. AT LEAST 48 HOURS PRIOR TO COMMENCING CONSTRUCTION.
2. THE POSITION OF THE POLE LINES, CONDUITS, WATERMAINS, SEWERS, AND OTHER UTILITIES AND STRUCTURES ARE NOT NECESSARILY SHOWN ON THE CONTRACT DRAWINGS, AND WHERE SHOWN, THE ACCURACY OF THE POSITION OF SUCH UTILITIES AND STRUCTURES IS NOT GUARANTEED.
3. PRIOR TO THE COMMENCEMENT OF CONSTRUCTION, ALL BENCHMARKS, ELEVATIONS, DIMENSIONS, AND GRADES MUST BE CHECKED BY THE CONTRACTOR AND ANY DISCREPANCIES REPORTED TO THE ENGINEER.
4. ALL EXISTING UNDERGROUND UTILITIES WITHIN THE LIMITS OF CONSTRUCTION SHALL BE LOCATED, MARKED AND PROTECTED. ANY UTILITIES DAMAGED OR DISTURBED DURING CONSTRUCTION SHALL BE REPAIRED OR REPLACED TO THE SATISFACTION OF THE ENGINEER, AT THE CONTRACTOR'S EXPENSE.
5. AT LEAST TWO DIFFERENT BENCHMARKS MUST BE REFERRED TO AT ALL TIMES.


3-Storey Townhouse
Bldg. D
Bldg. E
Bldg. F
Bldg. G
Bldg. H
Bldg. A
Bldg. B
Bldg. C
UPPER SHERMAN AVENUE
MOHAWK ROAD EAST
SUBJECT TO AN EASEMENT AS IN NS273316
EX. GARAGE
EX. SHED
PROP. AD T/G=(208.26)
PROP. AD T/G=(208.87)
PROP. AD T/G=(208.38)
PROP. AD T/G=(208.64)
PROP. AD T/G=(208.14)
PROP. AD T/G=(208.62)
PROP. AD T/G=(208.60)
PROP. AD T/G=(208.70)
PROP. AD T/G=(208.17)
PROP. AD T/G=(208.13)
PROP. AD T/G=(208.89)
PROP. AD T/G=(208.18)
PROP. AD T/G=(208.15)
PROP. AD T/G=(208.08)
PROP. AD T/G=(208.06)
PROP. AD T/G=(207.76)
PROP. AD T/G=(207.60)
PROP. AD T/G=(207.17)
PROP. AD T/G=(207.79)
PROP. AD T/G=(206.33)
PROP. DAD T/G=(208.22)
PROP. DAD T/G=(207.87)
PROP. DAD T/G=(207.85)
PROP. DAD T/G=(207.80)
PROP. DAD T/G=(208.52)
PROP. DAD T/G=(208.43)
PROP. DAD T/G=(208.58)
PROP. DAD T/G=(208.20)
PROP. DAD T/G=(208.10)
PROP. DAD T/G=(208.07)
PROP. DAD T/G=(206.42)
PROP. DAD T/G=(206.52)
PROP. DAD T/G=(205.62)
PROP. DAD T/G=(206.45)
PROP. CB-1 T/G=(208.66)
PROP. CB-2 T/G=(208.20)
PROP. CB-3 T/G=(208.29)
PROP. CB-4 T/G=(208.15)
PROP. CB-5 T/G=(207.56)
PROP. CB-6 T/G=(208.98)
PROP. CB-7 T/G=(208.93)
PROP. CB-8 T/G=(209.40)
PROP. CB-9 T/G=(209.10)
PROP. CB-10 T/G=(209.40)
PROP. CB-11 T/G=(208.35)
PROP. CBMH-1 T/G=(208.15)
PROP. 250mmø STM. @1.0%
PROP. 200mmø WATER (DOM.)
PROP. 200mmø WATER (FIRE)
PROP. 150mmø WATER (DOM.)
PROP. 150mmø WATER (FIRE)
PROP. 200mmø STM. @1.0%
PROP. 375mmø STM. @1.0%
PROP. 525mmø STM. @1.0%
PROP. 1.5m-375mmø SAN. @ 2.0%
PROP. 1.5m-525mmø ORIFICE PIPES @ 2.0%
PROP. 19.7m-375mmø SAN. @ 2.0%
PROP. 19.7m-525mmø STM. @ 2.0%
PROP. 20.5m-375mmø SAN. @ 2.0%
PROP. MHS-1
PROP. MHS-2
PROP. MHS-3
PROP. MHS-4
PROP. MHS-5
PROP. MH-1
PROP. MH-2
PROP. 5/W MAX. 5%
PROP. RETAINING WALL W/ GUARD AS REQUIRED BY OBC
PROP. RETAINING WALL (TYP.)
PROP. RETAINING WALL W/ GUARD AS REQUIRED BY OBC (TYP.)
PROP. PERMEABLE SURFACE (TYP.)
PROP. 5/W
PROP. ASPHALT
PROP. FH
PROP. JELLY FISH
SCHEMATIC OF INTERNAL WATER (FIRE) SERVICING
LIMITS OF UNDERGROUND
EX. GARAGE VINYL-SIDED
EX. SHED VINYL-SIDED
EX. HP
EX. HMH
EX. LP
EX. SIGN TO BE REMOVED AND RELOCATED
EX. LIGHT POLE TO BE REMOVED AND RELOCATED
EX. BUS SHELTER
TAP INTO EX. WATERMAIN W/ 300x300x200 TEE CONNECT AS PER CITY OF HAMILTON STD. DWG. WM-207.04.
200mm V&B
200x200x150 TEE
90° BEND
150mm V&B
200x200x200 TEE
375mm ø COMBINED
300mm ø WATERMAIN
CENTRE LINE OF EX. PAVEMENT
CENTRE LINE OF EX. ROAD
N17°43'55"W 196.320
N17°43'55"W 214.53
N17°43'55"W 212.52
N17°43'55"W 212.52
N17°43'55"W 212.52