ZONING COMMITTEE STAFF REPORT

1. **FILE NAME:** West Side Flats Phase 3A and 3B **FILE #** 15-031-255
2. **APPLICANT:** Sherman Associates **HEARING DATE:** October 22, 2015
3. **TYPE OF APPLICATION:** Conditional Use Permit
4. **LOCATION:** 59 Livingston Ave, NW corner of Livingston Ave and Fillmore Ave E
5. **PIN & LEGAL DESCRIPTION:** 06.28.22.14.0021, Riverview Office Addition Outlot B
6. **PLANNING DISTRICT:** 3 **PRESENT ZONING:** T3(M), RC4
7. **ZONING CODE REFERENCE:** §66.331, §61.501
8. **STAFF REPORT DATE:** October 13, 2015 **BY:** Lucy Thompson
9. **DATE RECEIVED:** April 23, 2015 **NEW 60-DAY DEADLINE FOR ACTION:** November 23, 2015 (process suspended on May 11, 2015 at request of applicant; restarted at request of applicant on September 24, 2015).

A. **PURPOSE:** Conditional use permit for additional 6 ft. 3 in. building height over 65' permitted

B. **PARCEL SIZE:** 237,759 square feet (5.45 acres)

C. **EXISTING LAND USE:** vacant

D. **SURROUNDING LAND USE:**

North: Mississippi River

East: US Bank office building

South: Fillmore Avenue, vacant land

West: railroad tracks, vacant land, West Side Flats Apartments Phase 1

E. **ZONING CODE CITATION:** The version of §66.331(l) in effect at the time this CUP application was originally filed stated that a maximum height of 65' is permitted without a conditional use permit in the West Side Flats T3(M) district, and a maximum height of 100' may be permitted with a conditional use permit ; §61.501 lists general conditions that must be met by all conditional uses.

F. **HISTORY/DISCUSSION:** The subject parcel is currently owned by the Saint Paul Housing and Redevelopment Authority (HRA). The HRA signed a development agreement with George Sherman (Sherman Associates) in November 2012 that allowed Mr. Sherman to do due diligence on the site, prepare a site plan and development program, and engage the West Side Community Organization (WSCO) in discussions about the project; this agreement expires on November 19, 2015. It is expected that the HRA will amend and extend the development agreement with Mr. Sherman. Mr. Sherman has been working with City staff, WSCO and the Saint Paul Design Center for most of those three years on putting together a project that meets the City, HRA and neighborhood goals for the site; is consistent with the *West Side Flats Master Plan and Development Guidelines* (2001); and is financially feasible.

Since filing for a conditional use permit for West Side Flats Phase 3A and 3B in April 2015, Mr. Sherman has continued to meet with City staff, WSCO and the Saint Paul Design Center to arrive at a site plan and project design that address concerns expressed by these groups. Out of these discussions came two alternative site plans (Options 2 and 3, discussed in more detail in Finding #6 below). The original application is Option 1.

G. **DISTRICT COUNCIL RECOMMENDATION:** The West Side Community Organization (District 3 Council) recommends approval of a conditional use permit for Option 2 (as described in Finding #6).

H. **FINDINGS:**

1. West Side Flats Phase 3A and 3B is the second phase of development being proposed by Sherman Associates on the Flats. The first phase, West Side Flats Apartments, was completed in

2014, with 178 housing units and 6,000 sq. ft. of commercial space at the northeast corner of Wabasha and Fillmore. Phase 2 will be a commercial building at the Wabasha Bridgehead just north of West Side Flats Apartments; this project will follow Phase 3A and 3B.

2. West Side Flats Phase 3A and 3B (**Option 1: Initial Proposal**) consists of two buildings totaling 265 housing units and 5,000 sq. ft. of commercial space. Building 3A faces the esplanade along the top of the floodwall levee, and consists of 183 market-rate rental units and 5,000 sq. ft. of first-floor commercial space that opens onto the esplanade. Building 3B sits at the corner of Fillmore and Livingston avenues, and consists of 82 affordable rental units. Off-street parking is provided both underground and in surface lots located in the building courtyard.
3. Under **Option 1**, Building 3A is 6 stories (5 at the rooftop deck on the north side) in height, totaling 71'3". Building 3B is 5 stories in height, totaling 60'5".
4. The parcel is zoned T3(M) and is covered by the *West Side Flats Master Plan and Development Guidelines.* At the time the CUP application was filed (April 2015), the updated *West Side Flats Master Plan and Development Guidelines*, which included new maximum building height limits, had not been adopted (it was adopted in June 2015). The 2001 *West Side Flats Master Plan and Development Guidelines* was still in effect, which permitted a maximum building height of 65' without a CUP and 100' with a CUP. Under **Option 1**, Building 3A is proposed to be 71'3" high, and thus requires a CUP for the additional 6'3" of building height.
5. The original application date (for **Option 1**) was April 23, 2015. On May 11, 2015, the applicant submitted a request for continuance, asking that the public hearing be postponed and that the 60-day period requirement for a City decision be waived. On September 24, 2015, the applicant submitted a letter asking that the CUP process resume.
6. From the time the CUP application was first submitted in April 2015 through August 2015, the applicant met several times with the Riverfront, Development and Land Use Committee of WSCO; twice with the Saint Paul Design Center and several times with City staff to arrive at a site plan and project design that address concerns expressed by these groups. These concerns included building height, impact on views to and from the river, the size of Building 3A's footprint, the amount of surface parking vs. green space in the courtyard, the total number of parking spaces being provided for both residential and commercial uses, the design of the public connection between the first-floor restaurant in Building 3A and the esplanade, and other site amenities. Over those four months, two alternative site plans, Options 2 and 3, were recommended by the applicant. The number of units and amount of commercial space remains the same for all three options.

   Option 2: Post-Meetings Result keeps Building 3A at 6 stories (5 stories at the rooftop deck) and Building 3B at 5 stories, but would "pop up" the corners of Building 3B to 6 stories so that the Fillmore building (3B) is taller than the river's edge building (3A). It provides less surface parking and more green space in the courtyard between the two buildings, but keeps the building footprints the same size as in the original proposal.

   Option 3: Revised Proposal lowers the height of Building 3A to 5 stories (4 at the rooftop deck), while Building 3B stays at 5 stories with the 6-story pop-ups at the corners of the building. In Option 3, in order to provide the same number of housing units and enough parking for a successful restaurant, the footprint for Building 3A gets larger, and the amount of green space on the westerly edge of the site gets smaller.
7. §61.501 lists five standards that all conditional uses must satisfy:

   (a) *The extent, location and intensity of the use will be in substantial compliance with the Saint Paul Comprehensive Plan and any applicable subarea plans which were approved by the city council.* This condition is met for all three options, but staff believes that **Option 3** better meets this standard. While the *West Side Flats Master Plan and Development Guidelines*, Saint Paul Comprehensive Plan and *Great River Passage Master Plan* all support a mix of

market-rate and affordable housing at urban densities on the West Side Flats with an active first-floor use that connects to the Mississippi River, staff believes that Option 3, with a shorter building at the river's edge and a taller building along Fillmore Avenue, is more consistent with the *West Side Flats Master Plan and Development Guidelines* than Options 1 or 2. It has been a fundamental design principle since 2001 that buildings be lower at the river's edge and rise in height as they move away from the river (to the south). In fact, the 2001 *West Side Flats Master Plan and Development Guidelines* states that buildings on this parcel should be 4 stories in height at the river's edge, 5 stories mid-block and 6 stories along Fillmore, which is exactly what is being proposed in Option 3.

(b) *The use will provide adequate ingress and egress to minimize traffic congestion in the public streets.* This condition is met for all three options. Vehicles will access the site off of Livingston Avenue, and then connect to the rest of the West Side Flats street network.

(c) *The use will not be detrimental to the existing character of the development in the immediate neighborhood or endanger the public health, safety and general welfare.* This condition is met for all three options. The proposed use will complement and enhance adjacent uses, diversify the residential market on the Flats and Greater West Side, provide new housing within walking distance of jobs, and strengthen the market for future commercial development. The proposed use will also enhance existing development by providing a public connection to the riverfront esplanade.

(d) *The use will not impede the normal and orderly development and improvement of the surrounding property for uses permitted in the district.* This condition is met for all three options. If anything, the use will accelerate and enhance the normal and orderly development and improvement of surrounding parcels per the T3(M) permitted uses.

(e) *The use shall, in all other respects, conform to the applicable regulations of the district in which it is located.* This condition is met for all three options.

I. **STAFF RECOMMENDATION:** Based on the above findings, staff recommends denial of the conditional use permit for an additional 6 ft. 3 in. building height over 65' permitted for Options 1 and/or 2, and recommends approval of **Option 3: Revised Proposal**, which does not require a conditional use permit but does require site plan review. The applicant's site plan review application should reflect the building heights and building configurations depicted in the Option 3 site plan.

CONDITIONAL USE PERMIT APPLICATION
Department of Planning and Economic Development
Zoning Section
1400 City Hall Annex
25 West Fourth Street
Saint Paul, MN 55102-1634
(651) 266-6589

Zoning Office Use Only
File #: 15-031255
Fee:
Tentative Hearing Date: 5-14-15

PD=3

062822410050 etal

APPLICANT

Name: Tony J. Kuechle
Email: tkuechle@sherman-associates.com
Address: 233 Park Ave. South, Suite 201
City: Minneapolis State: MN Zip: 55415 Daytime Phone: 612.604.0852
Name of Owner (if different): St. Paul HRA
Contact Person (if different): Jonathan Sage-Martinson Phone: 651.266.6628

PROPERTY LOCATION

Address/Location: Intersection of Fillmore Ave. E. and Livingston Ave.
Legal Description: Block: 3, Plat: Bazil and Robert's Addition to West St. Paul, County of Dakota, Territory of Minn.
Lot: Outlot Plat: Riverview Office Addition Current Zoning: T3M
(attach additional sheet if necessary)

TYPE OF PERMIT: Application is hereby made for a Conditional Use Permit under provisions of Chapter 61, Section 61.501, Paragraph 1, of the Zoning Code.

66.331 (L)

SUPPORTING INFORMATION: Explain how the use will meet all of the applicable standards and conditions. If you are requesting modification of any special conditions or standards for a conditional use, explain why the modification is needed and how it meets the requirements for modification of special conditions in Section 61.502 of the Zoning Code. Attach additional sheets if necessary.

The building height increased for the following reasons:
1. Due to below grade parking requirement for market rate housing.
2. To activate the first floor retail so as to communicate with the community as a whole.
3. The restaurant use will require taller ceilings for mechanical clearances.
4. Extraordinary efforts and care was taken during design on the fenestrations and stepping back the building to reduce the impact of the building height on the waterfront.

RECEIVED
APR 23 2015
BY:

☒ Required Site Plan is attached

Applicant's Signature _____ **Date** 4/23/2015 **City Agent** pdd 4/23/15

Rev 9/4/14

1. INITIAL PROPOSAL

IIIA 6 Stories (5 at rooftop deck)

IIIB 5 Stories

Parking				
West Side Flats IIIA	Below Grade	Covered	Surface	Total
Residential	126	21		147
Commercial		30	21	51
			Total	198

West Side Flats IIIB	Below Grade	Surface	Total
Residential	50	36	86
		Total	86

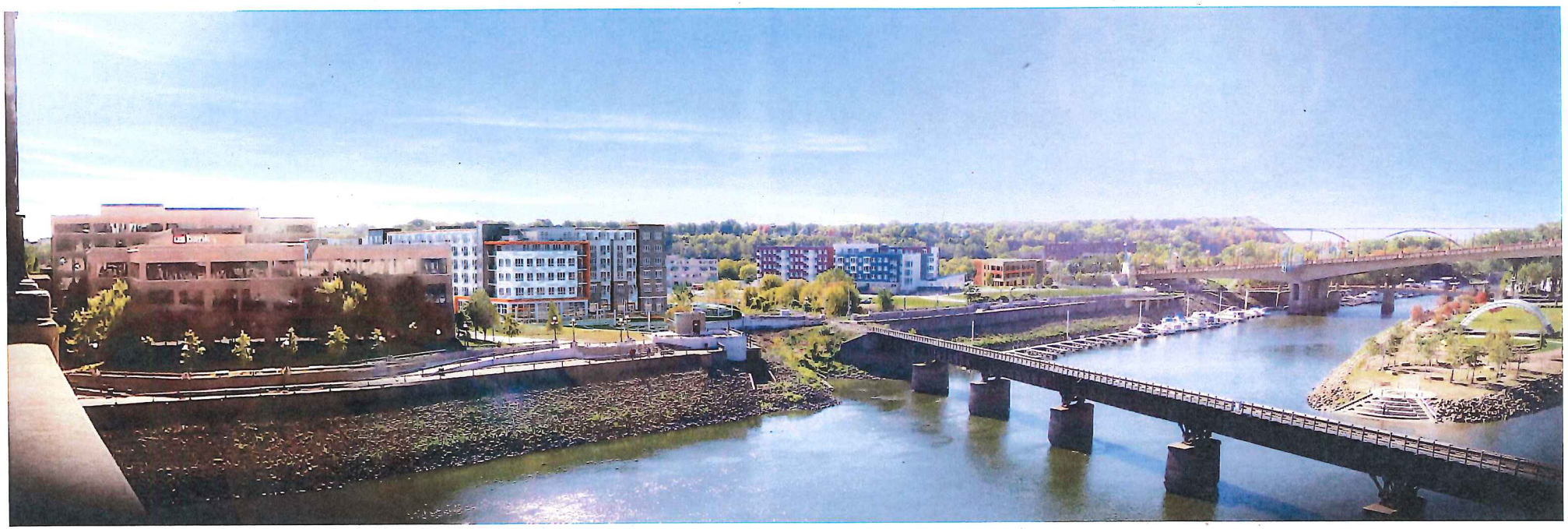
Unit Total/Parking	Units	Residential Parking	Ratio
West Side Flats IIIA	183	147	0.80
West Side Flats IIIB	82	86	1.05
Public Street Parking			35

April 2015

kaas wilson architects

West Side Flats Phase IIIA & IIIB

St. Paul, MN



option 1: Initial Proposal

kaas wilson architects

Westside Flats Phase II, IIIA & IIIB

St. Paul, MN

Riverfront Panoramic View

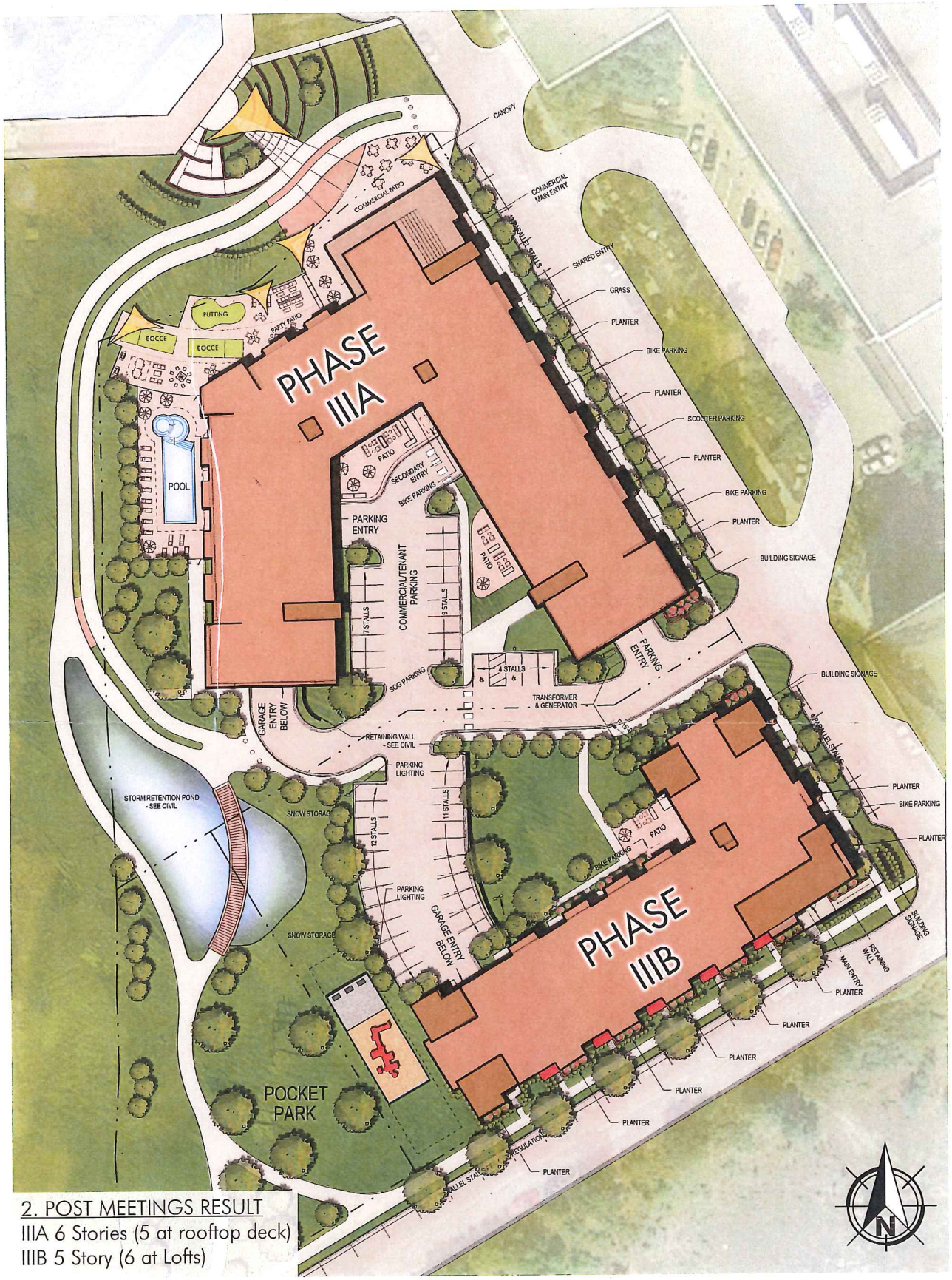
option 1: initial proposal

kaas wilson architects

Westside Flats Phase II, IIIA & IIIB

St. Paul, MN

Phase IIIA Conceptual Rendering



2. POST MEETINGS RESULT

IIIA 6 Stories (5 at rooftop deck)
IIIB 5 Story (6 at Lofts)

Parking

West Side Flats IIIA	Below Grade	Covered	Surface	Total
Residential	126	21		147
Commercial		30	20	50
			Total	197

West Side Flats IIIB	Below Grade	Surface	Total
Residential	76	23	99
		Total	99

Unit Total/Parking	Units	Residential Parking	Ratio
West Side Flats IIIA	183	147	0.80
West Side Flats IIIB	82	99	1.21
Public Street Parking			17

August 2015

kaas wilson architects

West Side Flats Phase IIIA & IIIB

St. Paul, MN

3. REVISED PROPOSAL

IIIA 5 Stories (4 at rooftop deck)

IIIB 5 Story (6 at Lofts)

Parking

West Side Flats IIIA	Below Grade	Covered	Surface	Total
Residential	170	45		215
Commercial		30	28	58
			Total	273

West Side Flats IIIB	Below Grade	Surface	Total
Residential	76	9	85
		Total	85

Unit Total/Parking	Units	Residential Parking	Ratio
West Side Flats IIIA	182	215	1.18
West Side Flats IIIB	82	85	1.04
Public Street Parking			17

August 2015

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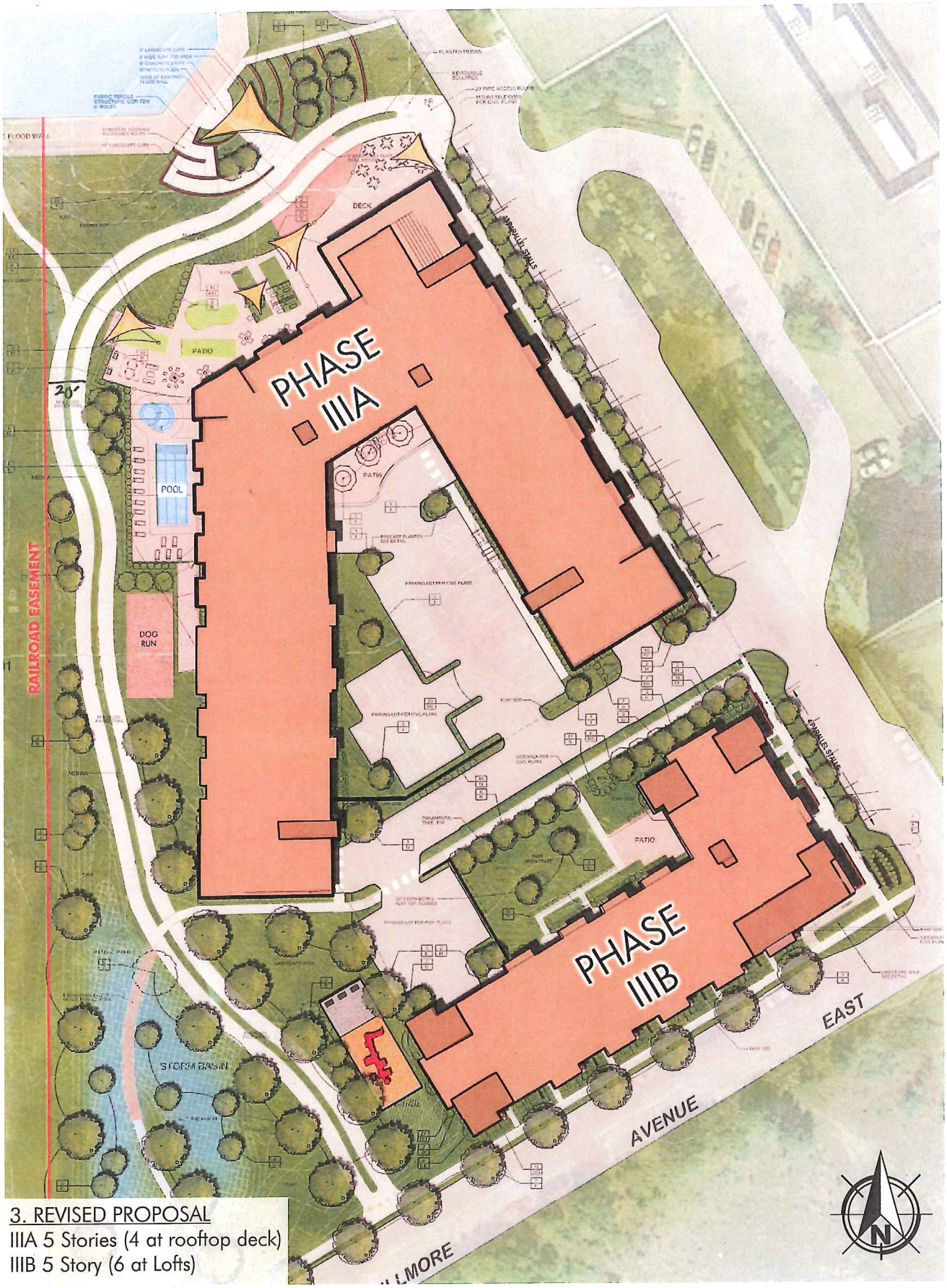
West Side Flats Phase IIIA & IIIB

St. Paul, MN



3. REVISED PROPOSAL

IIIA 5 Stories (4 at rooftop deck)

IIIB 5 Story (6 at Lofts)

Parking

West Side Flats IIIA	Below Grade	Covered	Surface	Total
Residential	170	45		215
Commercial		30	27	57
			Total	272

West Side Flats IIIB	Below Grade	Surface	Total
Residential	76	9	85
		Total	85

Unit Total/Parking	Units	Residential Parking	Ratio
West Side Flats IIIA	182	215	1.18
West Side Flats IIIB	82	85	1.04
Public Street Parking			17

August 2015

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West Side Flats Phase IIIA & IIIB

St. Paul, MN

Options 2 and 3

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Westside Flats Phase II, IIIA & IIIB

St. Paul, MN

Phase IIIB Conceptual Rendering: Option B

West Side Flats - Phase 3A and 3B

Livingstone Ave & Fillmore Ave.

ABBREVIATIONS

AC AIR CONDITIONER
ACOUS/ACOUSTIC/ACOUSTICAL
ACT ACOUSTIC TILE
ADH ADHESIVE
ADJ ADJUSTABLE
AFF ABOVE FINISH FLOOR
AGGR AGGREGATE
ALT ALTERNATE
ALUM ALUMINUM
AP ACCESS PANEL
ARCH ARCHITECTURAL
ASPH ASPHALT
AVE AVENUE
BC/BSB BOARD/CANDARDS
BFE BOTTOM OF FOOTING
BITUM BITUMINOUS
BKT BRACKET
BLDG BUILDING
BLK BLOCK
BLKG BLOCKING
BLVD BOULEVARD
BM BEAM/BENCH MARK
BOT BOTTOM
BR BEDROOM
BRG BEARING
BRK BRICK
BSMT BASEMENT
BTWN BETWEEN
CAB CABINET
CAP CAPACITY
CEM CEMENT
CFB CEMENT FIBER BOARD
CG CORNER GUARD
CIP CAST IRON PIPE
CJ CONTROL JOINT
CL CENTER LINE
CLG CEILING
CLKG CALKING
CLO CLOSET
CMU CONCRETE MASONRY UNIT
CNTR COUNTER
CO COMPANY
COL COLUMN
COMB COMBINATION
CORP CORPORATION
CONC CONCRETE
CONST CONSTRUCTION
CONT CONTINUOUS
CONTR CONTRACTOR
CORP CORPORATION
CORR CORRIDOR
CPT CARPET
CR CURTAIN ROD
CSC COUNTERSINK
CT CERAMIC TILE
CUFT CUBIC FOOT
CU IN CUBIC INCH
CU YD CUBIC YARD
D DRYER
DBL DOUBLE
DEPT DEPARTMENT
DETERGENT
DF DRINKING FOUNTAIN
DIA DIAMETER
DIAG DIAGONAL
DIM DIMENSION
DIV DIVISION
DN DOWN
DPRF DAMPPROOF
DR DOWNS ROADDOOR
DS DOWNSPOUT
DT DRAFFERY TRACK
DW DISHWASHER
DWG DRAWING
DWR DRAWER
E EAST
EA EACH
EFS EXT. INSUL FIN SYSTEM
EL ELEVATION
ELEC ELECTRIC/ELECTRICAL
ELEV ELEVATOR
ENGR ENGINEER
ENT ENTRANCE
EQ EQUAL
EQIP EQUIPMENT
EST ESTIMATE
EW EACH WAY
EWC ELECTRIC WATER COOLER
EX EXISTING
EXC EXCAVATE
EXH EXHAUST
EXP JT EXPANSION JOINT
EXT EXTERIOR
F TO F FACE TO FACE
FAB FABRICATE
FA FLOOR ANCHOR
FDN FOUNDATION
FEP FACE ED END PANEL
FE FIRE EXTINGUISHER
FF FINISH FACE
FH FIRE HOSE
FM FOUND
FIN FINISH FINISHED
FIX FIXTURE
FL FLOOR
FLASH FLASHING
FLOOR FLOORSCENT
FU FACE OF MASONRY
FOE FACE STUD
FOW FACE OF WALL
FRRF FIBERPROOF
FR FRAME
FRT FRIGHT
FSH FACE OF SHEATHING
FT FOOTSECT
FTG FOOTING
FUR FURNING
FURR FURRING
F.V. FIELD VERIFIED
G GAS
GA GAUGE
GAL GALLON
GALV GALVANIZED
GAR GARAGE
GB GRAB BAR
GC GENERAL CONTRACTOR
GEN GENERAL
GI GALVANIZED IRON
GL GLASS/GLAZING
GOVT GOVERNMENT
GPBD GYPSUM WALLBOARD
GPM GALLON PER MINUTE
GR GRADE
GRTG GRATING
GS GREASE SHIELD
GYP GYPSUM
HB HOSE BIB
HC HOLLOW CORE
HD HEAD
HDRL HANDRAIL

GYP GYPSUM
HB HOSE BIB
HC HOLLOW CORE
HB HEADGIRL HARDRAIL
HDW HARDWARE
HGM HOLLOW METAL
HORZ HORIZONTAL
HR HOUR
HT HEIGHT
HWY HIGHWAY
ID IDENTIFICATION/INSIDE DIA
IN INCH
INCL INCLUDE
INC INCORPORATE
INFO INFORMATION
INSUL INSULATE/INSULATION
INT INTERIOR
JAN JANITOR
JCT JUNCTION
JT JOINT
JST JOIST
KD KNOCK DOWN
KITK KITCHEN
L LINEN
LAB LABORATORY
LAS LASCERLAM LAMINATE
LAT LATRINE
LAV LAVATORY
LBS/LNS POUNDS/LINGS
LBR LUMBER
LD LOAD
LDG LOADING
LG LENGTH
LH LEFT HAND
LIB LIBRARY
LIN LINOLEUM
LNDRY LAUNDRY
LOA LENGTH OVERALL
LOUV LOUVER/LOUVRE
LS LUMINOUS SOUND
LT LIGHT
MACH MACHINE
MAS MASONRY
MATL MATERIAL
MAX MAXIMUM
MC MEDICINE CABINET
MECH MECHANICAL
MEMB MEMBRANE
MEMO MEMORANDUM
METAL METAL
MFG MANUFACTURED
MFR MANUFACTURER
MH MANHOLE
MIN MINIMUM
MIR MIRROR
MISC MISCELLANEOUS
MLDG MOULDING
MO MASONRY OPENING
MOD MODULAR
MTL METAL
MTD MOUNTED
MULL MULLION
N NORTH
NIC NOT IN CONTRACT
NOM NUMBER
NOM NOMINAL
NTS NOT TO SCALE
OA OVERALL
OC ON CENTER
OD OUTSIDE DIA
OPNG OPENING
OPP OPPOSITE
ORIG ORIGINAL
OSB ORIENTED STRAND BOARD
OZ OUNCE
PAB PITCH & GRAVEL
PASS PASSENGER
PCF POUNDS PER CUBIC FOOT
PED PEDESTRIAN TRAFFIC COATING
PERI PERIMETER
PERF PERFORATE
PERP PERPENDICULAR
PL PLATE/PLASTIC
PLAM PLASTIC LAMINATE
PL PLATE
PLAS PLASTER
PLMB PLUMBING
PLYWD PLYWOOD
PNEU PNEUMATIC
POL POLISHED
PORC PORCELAIN
PSF POUNDS PER SQUARE FOOT
PSI POUNDS PER SQUARE INCH
PT POINT
PTD PAPER TOWEL DISPENSER
PTN PARTITION
PREFAB PREFABRICATED
PREFIN PREFINISHED
PROP PROPERTY
PUR PURLINS
QR QUARTER/QUARTER- ROUND
QT QUARRY TILE
QTY QUANTITY
R RISER
Ref. RUB & SHELF
RAD RADIUS/RADIUS
RB RESILIENT BASE
RC RESILIENT CHANNEL
RCT RUBBER COMPOSITION TILE
RD ROAD/DOWNSPOUT DRAIN
RECP RECEPTACLE
REC RECESSED
REF REFERENCE
REFRIG REFRIGERATOR
REG REGISTER/REGISTER
REINF REINFORCE/REINFORCING
REQD REQUIRED
REQL REQUIRE
RET RETURN
RH RUBBER HOOK/RIGHT HAND
RFG ROOFING
RM ROOM
RO ROUGH OPENING
RS RECLAIMED STUD
RWD REDWOOD
RWL RAIN WATER LEADER
SC SOLID CORE
SAN SANITARY
SB SPLASH BLOCK
SC SOLID CORE
SCHED SCHEDULE
SD SOAP DISH
S DISP SOAP DISPENSER
SEC SECOND
SECT SECTION
SH SHELF/SHINGLES

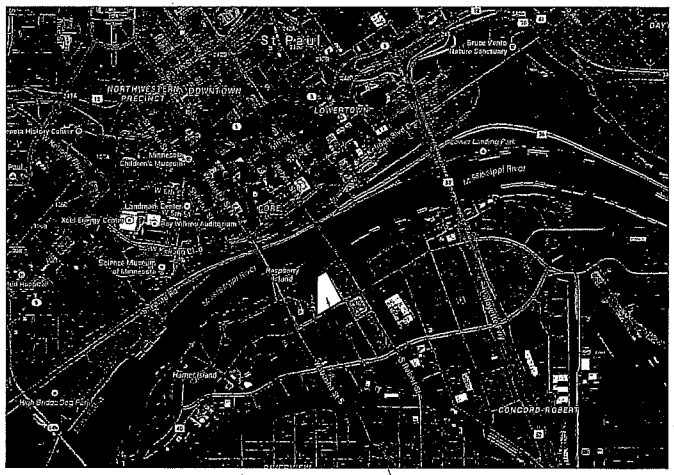
SHR SHOWER
SHT SHEET
SHTG SHEATHING/SIDING
SIM SIMILAR
SLD SLIDING
SNG SINGLE/SINGLE
SNR SANITARY NAPKIN DISPENSER
SNR SANITARY NAPKIN RECEPTACLE
SPEC SPECIFICATION
SQ SQUARE
SS SERVICE SINK
SSA SINGLE STRENGTH A
S STL STAINLESS STEEL
ST STREET
STD STANDARD
ST STEEL
STOR STORAGE
STR STRINGER
STXT SPRAY TEXTURE
SUB FL SUBFLOOR
SUSP SUSPENDED
SV SHEET VINYL
S4S SURFACED FOUR SIDES
T THRAD
T&G TONGUE & GROOVE
TB TOWEL BAR
TC TOP OF CURB
TECH TECHNICAL
TEL TELEPHONE
TEMP TEMPORED
TERR TERRACO
TEX TEXTURE
TFE TOP OF FOOTING ELEV
THRESH THRESHOLD
THRU THROUGH
TK BD TACKBOARD
T.O. TOP OF
TPH TOILET PAPER HOLDER
TV TELEVISION
TW TOP OF WALL
TYP TYPICAL
UL UNDERWRITERS LAB, INC
UNO UNLESS NOTED OTHERWISE
VAN VANITY
VB VAPOR BARRIER/VINYL BASE
VEN VENEER
VENT VENTILATOR
VERT VERTICAL
VEST VESTIBULE
VIN VINYL
VWC VINYL WALL COVERING
VCP VITRIFIED CLAY PIPE
VCT VINYL COMP TILE
W WEST/WASHER
W/ WITH
W/O WITHOUT
WC WATER CLOSET
WD WOOD
WDW WINDOW
WI WROUGHT IRON
WP WATERPROOF
WR WATER RESISTAN
WS WEATHERSTRIP
WSCT WAINSCOTING
WT WEIGHT
WWF WELDED WIRE FABRIC
YD YARD

HATCH KEY

EARTH
GRANULAR FILL
GYPSUM BOARD
SAND
CONCRETE
CONCRETE MASONRY UNIT
BRICK MANUFACTURED STONE
NATURAL STONE
SPRAY-ON FOAM INSULATION
STEEL
ROUGH WOOD
WOOD BLOCKING OR SHIM
PLYWOOD
BATT INSULATION (R-13/R-19)
WOOD
STUD WALL
QUARRY OR CERAMIC TILE
(These patterns are scaled for 1-1/2"= 1'-0"details)

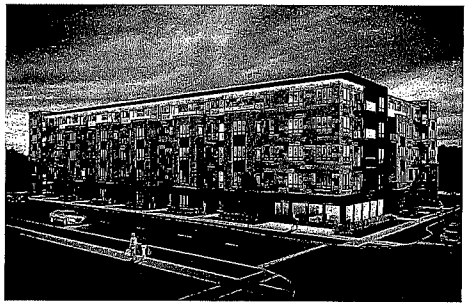
SYMBOLS KEY

ELEVATION
DETAIL
SECTION
INTERIOR ELEVATION
ADDENDUM, CHANGE ORDER, PROPOSAL REQUEST, ARCHITECTS SUPPLEMENTAL INSTRUCTIONS
KEYNOTES
INTERIOR/EXTERIOR WALL TYPE, FLOOR-CEILING TYPE
Room name
ROOM NAME / NUMBER
101 Name 1" = 1'-0"
UNIT NUMBER / NAME DETAIL NUMBER
DOOR NUMBER
ELEVATION / WORK POINT
NORTH ARROW
HOOP SYMBOL
BREAK LINE
DETAIL CALLOUT
REVISION CLOUD
W24X36
CASEWORK TAG
P
PARKING TAG
W
WINDOW TAG



SITE

ARTISTIC RENDERING - PHASE 3A



ARTISTIC RENDERING - PHASE 3B

Drawing Index			
Sheet Number	Sheet Name	Sheet Issue Date	Current Revision Date
A000	Cover Sheet	04/23/15	
C002	Survey	04/23/15	
C1.0	Grading, Drainage, and Erosion Control Plan	04/23/15	
C2.0	Utility Plan	04/23/15	
C3.0	Paving and Geometric Plan	04/23/15	
C4.0	Details	04/23/15	
C4.1	Details	04/23/15	
C5.0	Storm Water Pollution Prevention Plan	04/23/15	
L1.00	Preliminary Landscape Plan	04/23/15	
A101	Architectural Site Plan - 3A & 3B	04/23/15	
A200	Exterior Elevations - 3A	04/23/15	
A201	Exterior Elevations - 3A	04/23/15	
A202	Exterior Elevations - 3A	04/23/15	
A203	Exterior Elevations - 3B	04/23/15	

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SKBM Engineers
5630 Brooklyn Boulevard,
Minneapolis, MN 55429
P: 763-843-0420

Landscape:
Calyx Design Group
1585 W. Barkely Ave.
St. Paul, MN 55105
P: 651.324.5498

Structural:

MEP:

Project: West Side Flats - Phase 3A and 3B
Livingstone Ave & Fillmore Ave.

Owner:
Sherman Associates
333 Park Avenue South, Suite 501
Minneapolis, Minnesota 55415

Project Number 1519
Date Site Review 4.23.2015

NOT FOR CONSTRUCTION

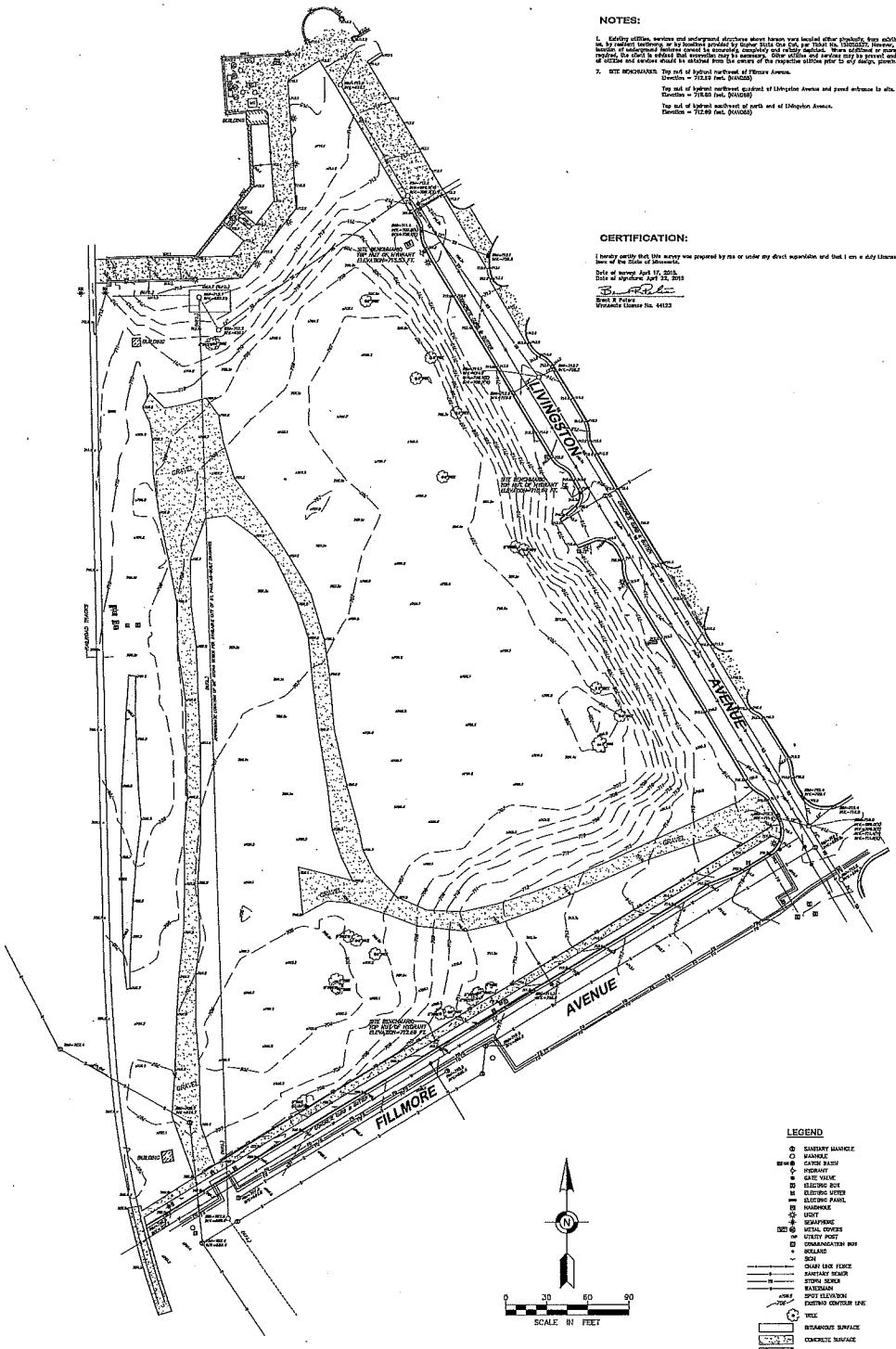
Date
Revision
Rev. No.

Cover Sheet

As indicated

A000

TOPOGRAPHIC SURVEY FOR:
SHERMAN ASSOCIATES



NOTES:

6. Existing utilities, services and underground structures shown hereon were located either physically from existing records made available to us, by contract locators, or by locates provided by Gopher State One Call, per Ticket No. 132032327. However, during acquisition, the exact location of underground features cannot be accurately, completely and reliably depicted. Where additional or more detailed information is required, the client is advised that excavation may be necessary. Either utilities and services may be present and verification and location of all utilities and services should be obtained from the owners of the respective utilities prior to any design, planning or excavation.

7. SITE BENCHMARKS: Top nut of hydrant northwest of Ellmore Avenue.
Elevation = 712.43 feet. (NAVD88)

Top nut of hydrant northeast quadrant of Livingston Avenue and paved entrance to site.
Elevation = 715.85 feet. (NAVD88)

Top nut of hydrant southwest of north end of Livingston Avenue.
Elevation = 712.80 feet. (NAVD88)

CERTIFICATION:

I hereby certify that this survey was prepared by me or under my direct supervision and that I am a duly Licensed Land Surveyor under the laws of the State of Minnesota.

Date of survey April 17, 2013.
Date of signature April 23, 2013

Brett R Peters
Minnesota License No. 44123

LEGEND

- SANITARY MANHOLE
- MANHOLE
- CATCH BASIN
- HYDRANT
- GATE VALVE
- ELECTRIC BOX
- ELECTRIC METER
- ELECTRIC PANEL
- HANDHOLE
- LIGHT
- SEMAPHORE
- METAL COVERS
- UTILITY POST
- COMMUNICATION BOX
- BOLLARD
- SIGN
- CHAIN LINK FENCE
- SANITARY SEWER
- STORM SEWER
- WATERMAIN
- SPOT ELEVATION
- EXISTING CONTOUR LINE
- WELL
- BITUMINOUS SURFACE
- CONCRETE SURFACE
- GRAVEL SURFACE
- RR SEMAPHORE
- RR LIGHT
- RR BOX

FIELD BOOK	PAGE	FIELDWORK CHIEF:
		DRAWN BY:
DRAWING NAME: 36569.dwg		
JOB NO.		CHECKED BY:
FILE NO.		

TOPOGRAPHIC SURVEY

SURVEY FOR:
SHERMAN ASSOCIATES

PROPERTY ADDRESS:
WEST SIDE FLATS
ST. PAUL, MINNESOTA 55107

EFN
Egan, Field & Nowak, Inc.
land surveyors since 1872
1229 Tyler Street NE, Suite 100
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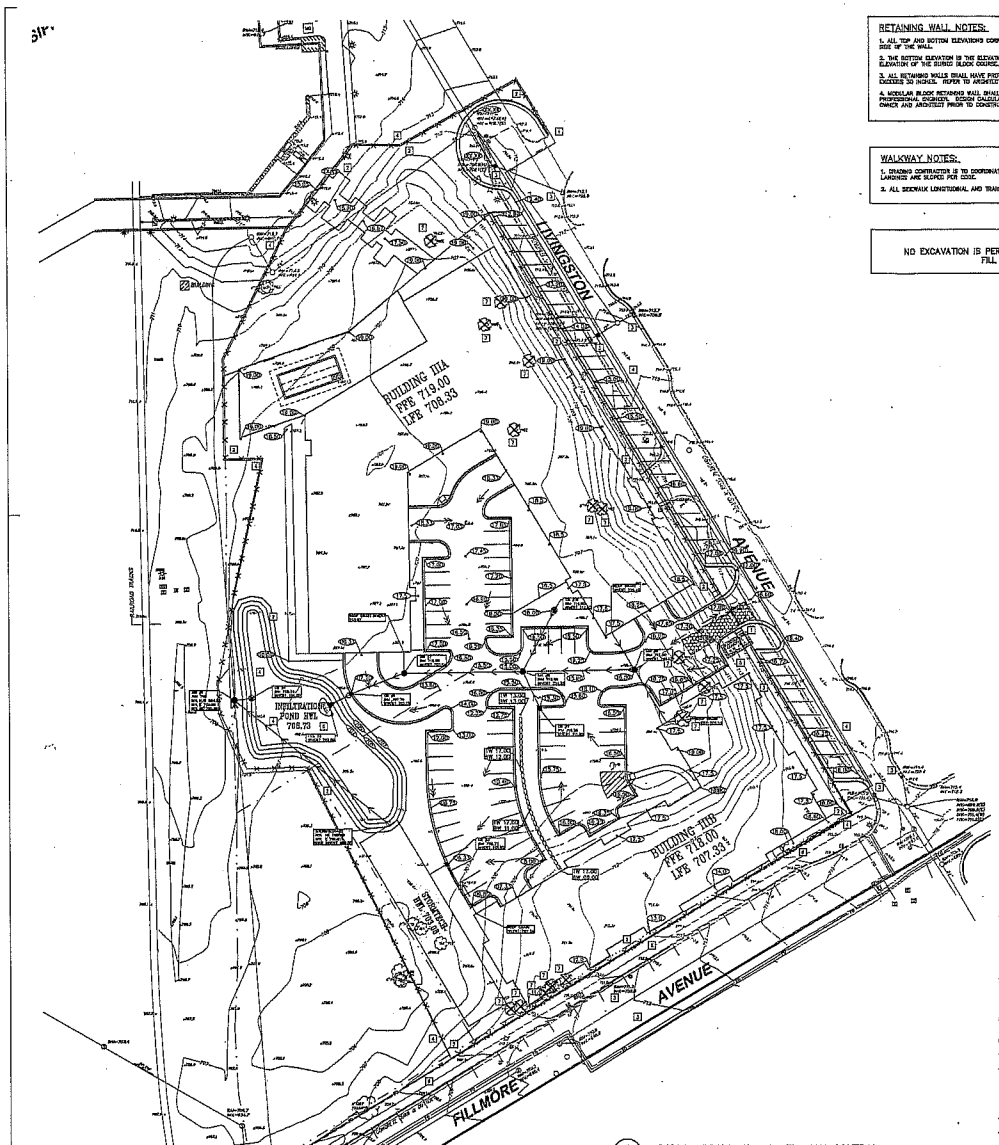

1 GRADING, DRAINAGE, AND EROSION CONTROL PLAN
C1.0 1" = 30'

RETAINING WALL NOTES:

1. ALL TOP AND BOTTOM ELEVATIONS CORRESPOND TO THE NEGATIVE GRADE ELEVATIONS ON EACH SIDE OF THE WALL.
2. THE BOTTOM ELEVATION IS THE ELEVATION OF THE LOW-GRADE SIDE OF THE WALL, NOT THE TOP ELEVATION OF THE BURIED BLOCK COURSE.
3. ALL RETAINING WALLS SHALL HAVE PROTECTIVE FENCING AT THE TOP WHERE THE VERTICAL HEIGHT EXCEEDS 30 INCHES. REFER TO ARCHITECTURAL AND LANDSCAPE PLANS AND SPECIFICATIONS.
4. MODULAR BLOCK RETAINING WALL SHALL BE DESIGNED AND CERTIFIED BY A LICENSED PROFESSIONAL ENGINEER. DESIGN CALCULATIONS AND SHOP DRAWINGS SHALL BE SUBMITTED TO THE OWNER AND ARCHITECT PRIOR TO CONSTRUCTION OF WALL.

WALKWAY NOTES:

1. GRADING CONTRACTOR IS TO COORDINATE WITH PAVING CONTRACTOR SO THAT ALL STEPS AND LANDINGS ARE SLOPED PER CODE.
2. ALL SIDEWALK LONGITUDINAL AND TRANSVERSE SLOPES ARE TO BE PER CODE.

NOTE:
NO EXCAVATION IS PERMITTED WITHIN LEVEE EASEMENT.
FILL IS PERMITTED.

PROPOSED PLAN SYMBOLS

- CONSTRUCTION LIMITS
- SILTATION FENCE
- PROPERTY LINE
- EASEMENT LINE (APPROX.)
- PROPOSED CONTOUR
- DRAIN TILE
- STORM SEWER
- RETAINING WALL
- CATCH BASIN
- MANHOLE
- ROCK CONSTRUCTION ENTRANCE
- DRAINAGE FLOW ARROW
- RETAINING WALL SPOT ELEVATION — TOW 000.00 BOW 000.00
- SPOT ELEVATION
- SOIL BORING
- CONCRETE WASHOUT AREA — CONCRETE WASHOUT

ABBREVIATIONS

BLDG	Building
BM	Bench Mark
BW	Bottom of Wall
CB	Catch Basin
CONC	Concrete
ELEV	Elevation
EX	Existing
FFE	Finished Floor Elevation
HWL	High Water Level
INV	Invert
LFE	Lowest Floor Elevation
MAX	Maximum
MH	Manhole
MIN	Minimum
NIC	Not in Contract
NWL	Normal Water Level
PVC	Polyvinyl Chloride
RCP	Reinforced Concrete Pipe
TW	Top of Wall
W.O.	Walkout

N
30' 15' 0 30' 60'
SCALE 1" = 30'

APPROXIMATE DISTURBED AREA IS 3.74 ACRES

NOTE:
STORM SEWER INLETS NOT SHOWN ON PLAN MAY RECEIVE RUNOFF FROM CONSTRUCTION ACTIVITES. INSTALL SILT SEDIMENT PROTECTION PER DETAIL 3/D4.0 ON ALL STORM INLETS THAT MAY RECEIVE RUNOFF.

KEYED NOTES

KEYED NOTES ARE DENOTED BY [ ] ON PLAN.

1. INSTALL ROCK CONSTRUCTION ENTRANCE. REFER TO DETAIL 1/C4.0.
2. INSTALL SILT FENCE. REFER TO DETAIL 2/C4.0.
3. INSTALL INLET SEDIMENT PROTECTION. REFER TO DETAIL 3/4.0.
4. LIMITS OF CONSTRUCTION.
5. APPROXIMATE LOCATION OF TEMPORARY CONTAINED CONCRETE WASH OUT BIN. REFER TO THE UNIVERSITY APPLICABLE GENERAL STORMWATER PERMIT FOR CONSTRUCTION ACTIVITY FOR MORE DETAILS. SELF CONTAINED CONCRETE WASHOUTS ON CONCRETE DELIVERY TRUCKS IS AN ACCEPTABLE ALTERNATIVE TO ON-SITE CONTAINMENT.
6. FIBER OPTIC CABLE ARE NOT TO BE DISTURBED.
7. EXISTING TREE TO BE REMOVED.
8. INFILTRATION BASIN 2B TO BE CONSTRUCTED AND TO BE ROUGH GRADED AND SURROUNDED WITH SILT FENCE PER DETAIL 2/D4.0. REFER TO SHEAR 10/D4.0 FOR INFILTRATION BASIN CROSS SECTION. CONSTRUCTION TRAFFIC IN INFILTRATION AREAS IS NOT ALLOWED AFTER AREA HAS BEEN EXCAVATED. IF AREA BECOMES COMPACTED, LOOSEN SOIL WITH MECHANICAL TILLER PRIOR TO FINAL STABILIZATION. INFILTRATION AREAS ARE NOT APPROVED BORROW SITES AND ARE NOT TO BE USED FOR TEMPORARY SEDIMENT BASINS. CONTRACTOR SHALL ENSURE THAT BASINS INFILTRATE AT A MINIMUM RATE OF 0.45-INCH PER HOUR USING A PERCOLATION TEST ON BOTH BASINS BEFORE FINAL ACCEPTANCE. PERCOLATION TEST SHALL BE SIGNED BY A REGISTERED GEOTECHNICAL ENGINEER AND SUBMITTED TO THE CITY AND ENGINEER FOR REVIEW BEFORE FINAL APPROVAL.

ST. PAUL'S NOTES:

1. INSPECTION CONTACT: THE DEVELOPER SHALL CONTACT THE RIGHT OF WAY INSPECTOR SHARON HAULSTON AT (651) 266-9243 (ONE WEEK PRIOR TO BEGINNING WORK) TO ORDERS TRAFFIC CONTROL, PEDESTRIAN SAFETY AND COORDINATION OF ALL WORK IN THE PUBLIC RIGHT OF WAY.
2. SAFE WORK SITE REQUIREMENTS: THE CONTRACTOR SHALL PROVIDE A CONTINUOUS, ACCESSIBLE AND SAFE PEDESTRIAN WALKWAY THAT MEETS ADA AND SAY MUTED STANDARDS IF WORKING IN A SIDEWALK AREA, AND TRAFFIC CONTROL PER SAY MUTED REQUIREMENTS FOR WORK IN THE PUBLIC RIGHT OF WAY.
3. NO PRIVATE FACILITIES IN THE RIGHT OF WAY: THE DEVELOPER IS STRICTLY PROHIBITED FROM INSTALLING PRIVATE ELECTRICAL WIRING, CONDUIT, RECEPTACLES AND/OR LIGHTING IN THE CITY'S RIGHT OF WAY. THE CONTRACTOR REQUIRES STORMWATER CONSENT ON SHALE WITH THE PUBLIC WORKS DESIGN SERVICES DIVISION (651-266-6116) PRIOR TO ISSUANCE OF A PERMIT. THE CONTRACTOR MUST OBTAIN AN INSTALLATION PERMIT IF PROVIDED THE PROPERTY OWNER AND THE PROPERTY UTILITIES ARE RESPONSIBLE FOR SECURING EXCAVATION PERMITS TO RUN THEIR SERVICE INTO A SITE, AND MAKE REQUIRED SUBMITTING PLANS FOR REVIEW BY THE PUBLIC WORKS UTILITY REVIEW COMMITTEE.
4. CITY OF ST. PAUL PERMIT REQUIREMENTS:
   4.1. GRADING DESTINATION AND EXCAVATION PERMITS: CONTACT PUBLIC WORKS RIGHT OF WAY SERVICE DESK AT (651) 266-6116. IT IS STRONGLY RECOMMENDED THAT CONTRACTORS CALL FOR COST ESTIMATES PRIOR TO BEGINNING TO OBTAIN ACCURATE COST ESTIMATES.
   4.2. OBSTRUCTION PERMITS: THE CONTRACTOR MUST OBTAIN AN OBSTRUCTION PERMIT IF CONSTRUCTION (INCLUDING SILT FENCES) WILL BLOCK CITY STREETS, SIDEWALKS OR ALLEYS, OR IF DRIVING OVER CURBS.
   4.3. EXCAVATION PERMITS: ALL GROUND IN THE PUBLIC RIGHT OF WAY REQUIRES AN EXCAVATION PERMIT. IF THE PROPOSED BUILDING IS CLOSE TO THE RIGHT OF WAY, AND EXCAVATING INTO THE RIGHT OF WAY IS NEEDED TO FACILITATE CONSTRUCTION, CONTACT THE UTILITY INSPECTOR.
   4.4. FAILURE TO SECURE PERMITS: FAILURE TO SECURE OBSTRUCTION PERMITS OR EXCAVATION PERMITS, OR FAILURE TO PAY CLEC-PERMIT FEE AND OTHER FEES REQUIRED UNDER CITY OF ST. PAUL LEGISLATIVE CODES.
   4.5. REQUIREMENTS TO WORK IN THE PUBLIC RIGHT OF WAY:
   ALL UTILITIES AND CONTRACTORS WORKING IN THE PUBLIC RIGHT OF WAY MUST BE CE-REGISTERED, BONDED AND INSURED, AS RECOGNIZED BY THE PUBLIC WORKS SERVICE DESK, (651-266-6116).
5. ALL WORK ON CURBS, DRIVEWAYS, AND SIDEWALKS WITHIN THE PUBLIC RIGHT OF WAY MUST BE DONE BY A LICENSED AND BONDED CONTRACTOR UNDER A PERMIT FROM PUBLIC WORKS SIDEWALK SECTION (651-266-6116). SIDEWALK GRADES MUST BE CHANGED ACROSS DRIVEWAYS.
6. RESTORATION OF ASPHALT AND CONCRETE PAVEMENTS ARE PERFORMED BY THE PUBLIC WORKS STREET MAINTENANCE DIVISION. THE CONTRACTOR IS RESPONSIBLE FOR PAYMENT TO THE CITY FOR ALL LABOR, EQUIPMENT AND MATERIALS FOR THE RESTORATION. THE CONTRACTOR MUST CONTACT THE CITY'S STREET MAINTENANCE DIVISION TO SET UP A WORK ORDER PRIOR TO BEGINNING ANY REMOVALS IN THE STREET AT 651-266-9600 (REFERENCE AND SAY CODES FOUND IN STREET MAINTENANCE "GENERAL REQUIREMENTS – ALL RESTORATIONS" AND ARE AVAILABLE AT THE PERMIT OFFICE.
7. SIGNS REGULATING PARKING AND/OR TRAFFIC ON PRIVATE PROPERTY SHALL BE INSTALLED BY THE PROPERTY OWNER OR CONTRACTOR OUTSIDE OF THE PUBLIC RIGHT-OF-WAY. SIGNS APPROVED BY PUBLIC WORKS TRAFFIC ENGINEERING REGULATING PARKING AND/OR TRAFFIC IN THE PUBLIC RIGHT-OF-WAY FOR THIS DEVELOPMENT SHALL BE INSTALLED BY CITY FORCES AT THE EXPENSE OF THE DEVELOPMENT. CONTACT TRAFFIC ENGINEERING 651-266-6200 SIX WEEKS IN ADVANCE OF NEEDED SIGNS.
8. ABANDONED EXISTING SEWER SERVICE OR MAKING NEW CONNECTIONS TO CITY SEWER MUST BE DONE TO CITY STANDARDS BY A LICENSED PLUMBER OR CONTRACTOR UNDER A PERMIT FROM PUBLIC WORKS SEWER SECTION (651-266-6234).
9. ALL WATER MAIN WORK SERVICES MUST BE INSTALLED ACCORDING TO "SPWW STANDARDS FOR INSTALLATION OF WATER MAINS", AND "SPWW WATER CODE".
10. ALL EXISTING WATER SERVICES NOT BEING REUSED MUST BE CUT-OFF AND ABANDONED PER SPWW WATER CODE.
11. THE CONTRACTOR SHALL CONTACT JOHN MCNAMARA, GENERAL FOREMAN, LIGHTING – SIGNAL MAINTENANCE (651-266-9760), IF REMOVAL OR RELOCATION OF EXISTING FACILITIES IS REQUIRED OR IN THE EVENT OF DAMAGE TO THE LIGHTING OR SIGNAL UTILITIES. THE CONTRACTOR SHALL ASSUME RESPONSIBILITY (AND RELATED COSTS) FOR ANY DAMAGE OR RELOCATIONS.
   11.1. THE INSTALLATION OF PRIVATE ELECTRICAL WIRING, CONDUIT, RECEPTACLES AND/OR LIGHTING IS STRICTLY PROHIBITED IN THE CITY'S ROW (RIGHT OF WAY).
12. CONTRACTOR IS TO CONTACT JOHN MEEKER, CITY FORESTER (651-632-2436) PRIOR TO REPAIRING ANY BOULEVARD TREES.
13. BUSINESS SIGNS WILL REQUIRE A SEPARATE REVIEW AND SIGN PERMIT FROM THE DEPARTMENT OF SAFETY AND INSPECTIONS. SITE PLAN APPROVAL DOES NOT CONSTITUTE APPROVAL OF BUSINESS SIGNS SHOWN ON THE SITE PLAN. CONTACT TONA SMITH OF THE ZONING (651-266-9037) IF YOU HAVE ANY QUESTIONS ABOUT SIGNS.
14. CARE MUST BE TAKEN DURING CONSTRUCTION AND EXCAVATION TO PROTECT ANY SURVEY MONUMENTS AND/OR PROPERTY MARKS. CALL DAN GIBSON OF PUBLIC WORKS SURVEYING (651-266-6072) IF YOU HAVE ANY QUESTIONS.
15. AS PER THE CITY'S STANDARD SPECIFICATIONS FOR STREET OPENINGS POLICY, RESTORATION ON ROADWAY SURFACES LESS THAN 5 YEARS OLD WILL REQUIRE FULL WIDTH MILL AND OVERLAY OR ADDITIONAL SEDIMENTATION FEES. PAVEMENT RESTORATION SHALL BE COMPLETED BY THE ST. PAUL PUBLIC WORKS STREET MAINTENANCE DIVISION. ALL RELATED COSTS ARE THE RESPONSIBILITY OF THE DEVELOPER/CONTRACTOR. CONTACT MARK NELSON AT 651-266-9700 FOR ESTIMATE OF COSTS FOR PAVEMENT RESTORATION.

GRADING NOTES:

1. THE CONTRACTOR SHALL VISIT THE SITE, REVIEW ALL CONSTRUCTION DOCUMENTS AND FIELD VERIFY THE EXISTING CONDITIONS PRIOR TO BIDDING. NO ADDITIONAL COMPENSATION WILL BE GIVEN FOR WORK THAT COULD HAVE BEEN IDENTIFIED BY A SITE VISIT OR CONSTRUCTION DOCUMENT REVIEW.
2. THE BACKGROUND INFORMATION WAS PREPARED BY XXXXXX, CONTACT XXXXXX AT (XXX) XXX-XXXX.
3. IT IS THE CONTRACTOR'S RESPONSIBILITY TO ASCERTAIN THE LOCATION OF ALL EXISTING UTILITIES. THE CONTRACTOR SHALL VERIFY THE LOCATION, ELEVATION AND MARK ALL EXISTING UTILITIES AS FOUND BEFORE CONSTRUCTION STARTS. THE ENGINEER, ARCHITECT OR OWNER DOES NOT GUARANTEE THAT ALL THE UTILITIES ARE MAPPED, OR IF MAPPED, ARE SHOWN CORRECTLY. CONTACT GOPHER ONE AT 651-454-0002 FOR FIELD LOCATING EXISTING UTILITIES. CONTACT UTILITY OWNER IF DAMAGE OCCURS DUE TO CONSTRUCTION.
4. PROTECT ALL EXISTING STRUCTURES AND UTILITIES WHICH ARE NOT SCHEDULED FOR REMOVAL.
5. NOTIFY CITY BUILDING INSPECTOR BEFORE TRENCHING AND EXCAVATION WORK COMMENCES. THE CONTRACTOR SHALL OBTAIN ALL APPLICABLE PERMITS PRIOR TO START OF CONSTRUCTION.
6. ALL SPOT ELEVATIONS SHOWN AS 14.00, FOR EXAMPLE, ARE TO BE UNDERSTOOD TO MEAN 714.00.
7. ALL SPOT ELEVATIONS ALONG THE CURB-LINE INDICATE THE ELEVATION OF THE GUTTER, UNLESS NOTED OTHERWISE.
8. NO LANDSCAPED SLOPES ARE TO EXCEED 3:1 (3 FEET HORIZONTAL TO 1 FOOT VERTICAL) UNLESS NOTED OTHERWISE.
9. ACCESSIBLE PARKING AREAS SHALL NOT HAVE SLOPES IN ANY DIRECTION THAT EXCEED 2%.
10. PROVIDE POSITIVE DRAINAGE FROM BUILDINGS AT ALL TIMES.
11. UPON COMPLETION OF THE GRADING AND UTILITY WORK, THE DEVELOPER SHALL CERTIFY THAT ALL GRADING AND UTILITY WORK WAS PERFORMED IN ACCORDANCE WITH THE APPROVED GRADING AND UTILITY PERMITS. AN AS-BUILT GRADING AND UTILITY PLAN SHALL BE SUBMITTED TO THE CITY FOR REVIEW AND DISTRIBUTION.
12. PRIOR TO ISSUANCE OF BUILDING PERMITS, ALL NECESSARY EROSION CONTROL DEVICES MUST BE IN PLACE AND FUNCTIONING. THE CITY LOWER MISSISSIPPI RIVER WATERSHED MANAGEMENT ORGANIZATIONAL INSPECT THE SITE TO DETERMINE ITS SUITABILITY FOR BUILDING ACTIVITIES. IF THE PUBLIC UTILITIES HAVE NOT BEEN INSTALLED AT THIS POINT, IT MAY BE NECESSARY TO WITHHOLD BUILDING PERMITS FOR VARIOUS LOTS TO ALLOW THE CONTRACTOR ADEQUATE SPACE TO PERFORM THIS WORK.
13. ALL DEBRIS CREATED IN THE PROCESS OF CLEARING AND GRADING THE SITE SHALL BE REMOVED FROM THE SITE. THIS INCLUDES TREES AND SHRUBS. UNDER NO CIRCUMSTANCES SHALL THIS TYPE OF MATERIAL BE BURIED OR BURNED ON THE SITE.
14. THE INTENT IS TO STRIP AND SALVAGE TOPSOIL FOR POTENTIAL RE-SPREADING ON THE SITE, IF APPROVED BY THE LANDSCAPE ARCHITECT AND/OR SPECIFICATIONS. SIX INCHES OF TOPSOIL – AFTER COMPACTING – SHALL BE RE-SPREAD PRIOR TO SEEDING AND MULCHING. EXCESS TOPSOIL MAY BE REMOVED FROM THE SITE PROVIDING THERE IS ADEQUATE TOPSOIL REMAINING TO PROPERLY FINISH THE SITE AS NOTED ABOVE. THE TOPSOIL STRIPPING, STOCKPILING AND RE-SPREADING SHALL BE DONE IN ACCORDANCE TO AND NOTED ON THE APPROVED GRADING PLAN AND SPECIFICATIONS. THE CONTRACTOR SHALL REFER TO THE LANDSCAPE DRAWINGS AND SPECIFICATIONS FOR ANY SPECIAL TOPSOIL OR PLANTING REQUIREMENTS.
15. ALL GRADING OPERATIONS SHALL BE CONDUCTED IN A MANNER TO MINIMIZE THE POTENTIAL FOR SITE EROSION. EROSION CONTROL MEASURES SHALL BE INSTALLED TO PREVENT SEDIMENT FROM RUNNING OFF ONTO ADJACENT PROPERTIES. ANY SEDIMENT TO ADJACENT PROPERTIES MUST BE REMOVED AND REPAIRED AS SOON AS PERMISSION IS GRANTED FROM THE ADJACENT PROPERTY OWNER(S).
16. IF CONSTRUCTION OF THE SITE WORK PROCEEDS THROUGH THE WINTER MONTHS, ANY DISTURBED AREAS OUTSIDE THE BUILDING FOOTPRINTS ARE TO BE MINIMALLY STABILIZED PRIOR TO MARCH 1, AS FOLLOWS: AREAS PLANNED TO RECEIVE PAVEMENTS ARE TO HAVE CLASS 5 BASE INSTALLED; ALL OTHER DISTURBED AREAS ARE TO BE SEEDED, STRAW MULCH PLACED, AND DISC-ANCHORED.
17. WINTER MULCHING:
   17.A. SNOW MULCHING SHALL BE DEFINED AS MULCH MATERIAL SPREAD OVER THE TOP OF SNOW SO THAT THE MULCH HELPS SURVIVE THE SNOW AND SPRING TO THE EXPOSED SOIL.
   17.B. FROZEN GROUND MULCHING SHALL BE DEFINED AS MULCH MATERIAL SPREAD OVER FROZEN GROUND. MULCH MATERIALS THAT WILL BE BLOWN OR DISPLACED INTO THE SOIL MAY BE PLACED WITHOUT MECHANICAL MULCH MATERIALS THAT WILL BE BLOWN OR DISPLACED INTO THE SOIL MAY BE PLACED WITHOUT MECHANICAL MULCH ANCHORING. FROZEN GROUND MULCHING MATERIALS MUST BE ANCHORED WITH HYDRAULIC SEAL STABILIZER OR MAY BE FROZEN TO THE SOIL BY APPLYING WATER AT A RATE OF 500 GALLONS PER ACRE, OVER THE MULCH AS A SUBSTITUTION FOR DISC-ANCHORING.
18. RETAINING WALLS AND APPROPRIATE SAFETY FENCING ALONG THE TOP OF WALLS ARE TO BE DESIGNED AND CERTIFIED BY A REGISTERED PROFESSIONAL ENGINEER. SUBMIT RETAINING WALL SHOP DRAWINGS TO PROJECT TEAM PRIOR TO CONSTRUCTION.
19. THE CONTRACTOR SHALL LIMIT THE DISTURBED AREA AS MUCH AS POSSIBLE.

EROSION CONTROL NOTES:

1. ALL EROSION CONTROL FACILITIES SHALL BE INSTALLED PRIOR TO ANY SITE GRADING OPERATIONS. THE ST PAUL ENGINEERING DEPARTMENT AND LOWER MISSISSIPPI RIVER WATERSHED MANAGEMENT ORGANIZATION MUST BE NOTIFIED UPON COMPLETION OF THE INSTALLATION OF THE EROSION CONTROL FACILITIES AND PRIOR TO ANY GRADING OPERATIONS BEING COMMENCED. THE CONTRACTOR IS RESPONSIBLE TO SCHEDULE A PRE-CONSTRUCTION GRADING MEETING WITH THE CITY OF ST PAUL ENGINEERING DEPARTMENT AND LOWER MISSISSIPPI WATERSHED MANAGEMENT ORGANIZATION. ALL EROSION CONTROL FACILITIES SHALL BE RESTORED AND IN PLACE AT THE END OF EACH DAY.
2. ANY EROSION CONTROL FACILITIES DEEMED NECESSARY BY THE CITY OF ST PAUL ENGINEERING DEPARTMENT AND LOWER MISSISSIPPI RIVER WATERSHED MANAGEMENT ORGANIZATION BEYOND DURING OR AFTER THE GRADING ACTIVITIES SHALL BE INSTALLED AT THEIR REQUEST.
3. NO DEVIATIONS SHALL BE MADE FROM THE ELEVATIONS SHOWN ON THE APPROVED GRADING PLAN, WITHOUT PRIOR APPROVAL FROM THE CITY OF ST PAUL.
4. FOR SITES GREATER THAN 1.0 ACRE, AS REQUIRED BY THE NPDES PERMIT REQUIREMENTS, THE PERMIT APPLICANT MUST KEEP AN EROSION CONTROL INSPECTION LOG. INSPECTION MUST BE MADE ONCE EVERY SEVEN DAYS AND WITHIN 24 HOURS AFTER EVERY RAIN EVENT. THE INSPECTION RECORDS MUST BE MADE AVAILABLE TO THE CITY OF ST PAUL ENGINEERING DEPARTMENT AND LOWER MISSISSIPPI RIVER WATERSHED MANAGEMENT ORGANIZATION WITHIN 24 HOURS OF REQUEST.
5. FLOWS FROM EROSION CHANNELS OR PIPES (TEMPORARY OR PERMANENT) SHALL BE ROUTED TO SEDIMENTATION BASINS OR OTHER EROSION CONTROL DEVICES TO PREVENT THE MOVEMENT OF SEDIMENT TO OUTFLOWS TO LATERAL CONVEYANCE AND TO PREVENT EROSION AND SEDIMENTATION WITH RUNOFF FLOWS INTO THESE CONVEYANCES.
6. SITE ACCESS ROADS SHALL BE GROUND OR OTHERWISE MADE WITH SILT FENCES, EROSION CHANNELS, OR DIKES AND PIPES TO PREVENT SEDIMENT FROM LEAVING THE SITE VIA THE ACCESS ROADS. SITE-ACCESS ROADS/DRIVEWAYS SHALL BE SURFACED WITH CRUSHED ROCK WHERE THEY ADJOIN EXISTING PAVED ROADWAYS.
7. SOILS TRACKED FROM THE SITE BY MOTOR VEHICLES OR EQUIPMENT SHALL BE CLEANED DAILY FROM PAVED ROADWAY SURFACES OR MORE FREQUENTLY IF REQUIRED BY CITY OF ST PAUL ENGINEERING DEPARTMENT OR LOWER MISSISSIPPI RIVER WATERSHED MANAGEMENT ORGANIZATION, THROUGHOUT THE DURATION OF CONSTRUCTION.
8. EROSION CONTROL MEASURES SHALL BE PERFORMED PERIODICALLY WHEN CONDITIONS REQUIRE AND/OR AS DIRECTED BY THE CITY OF ST PAUL ENGINEERING DEPARTMENT OR LOWER MISSISSIPPI RIVER WATERSHED MANAGEMENT ORGANIZATION.
9. ALL EROSION CONTROL MEASURES SHALL BE MAINTAINED AND REPAIRED THE DURATION OF SITE CONSTRUCTION. IF CONSTRUCTION OPERATIONS OR NATURAL EVENTS DAMAGE OR INTERFERE WITH THESE EROSION CONTROL MEASURES, THEY SHALL BE RESTORED TO SERVE THEIR INTENDED FUNCTION AT THE END OF EACH DAY OR AS SOON AS FIELD CONDITIONS ALLOW ACCESS.
10. ALL EROSION AREAS DISTURBED DURING CONSTRUCTION SHALL BE RESTORED AS SOON AS POSSIBLE. ANY AREAS WHICH HAVE BEEN FINISHED GRADED OR AREAS THAT HAVE BEEN DISTURBED AND FOR WHICH GRADING OR SITE BUILDING CONSTRUCTION OPERATIONS ARE NOT ACTIVELY UNDERWAY SHALL BE SEEDED AND MULCHED AS SET FORTH IN THE FOLLOWING PARAGRAPHS WITHIN 14 DAYS:
   A. ALL DISTURBED AREAS SHALL BE STRAW MULCHED AND DISC-ANCHORED OR COVERED BY FIBROUS BLANKETS TO PROTECT SEEDS AND UNIT GROWTH. TEMPORARY STRAW MULCH SHALL BE DISC-ANCHORED AND APPLIED AT A UNIFORM RATE OF NOT LESS THAN TWO TONS PER ACRE AND NOT LESS THAN 200 POUNDS.
   B. IF THE GRADED AREA IS ANTICIPATED TO BE RE-DISTURBED/DEVELOPED WITHIN SIX MONTHS, PROVIDE A TEMPORARY VEGETATIVE COVER CONSISTING OF MINNESOTA DEPARTMENT OF TRANSPORTATION (MNDOT) SEED MIXTURE 21-111 (DATE), OR 21-112 (WINTER WHEAT), AT A RATE OF 100 POUNDS PER ACRE.
   C. IF GRADED AREA WILL NOT BE DEVELOPED FOR A PERIOD GREATER THAN SIX MONTHS PROVIDE A SEMI-PERMANENT VEGETATIVE COVER OF SEED MIXTURE MNDOT 22-112 AT A RATE OF 40 POUNDS PER ACRE.
   D. DRAINAGE DITCHES OR THE EQUIVALENT DEBRETRICS SHALL BE RETAINED UNTIL THEY HAS DEVELOPED AND SURVIVED A 60-DAY GROWING PERIOD.
   E. ALL AREAS THAT WILL NOT BE MOWED OR MAINTAINED AS PART OF THE ULTIMATE DESIGN WILL BE PERMANENTLY REINFORCED USING SEED MIXTURE MNDOT 25-141 AT A RATE OF 30 POUNDS PER ACRE.
   F. UNLESS SPECIFIED ELSEWHERE WITHIN THE CONSTRUCTION DOCUMENTS (I.E. ARCHITECTURAL SITE PLAN OR LANDSCAPE PLAN), PERMANENT TURF RESTORATION SHALL CONSIST OF MN/DOT SEED MIXTURE 25-131 (COMMERCIAL TURF GRASS) AT A RATE OF 220 POUNDS PER ACRE.
   G. WHERE SOIL OR OTHER EROSION AND SEDIMENTATION CONTROL MEASURES ARE INADEQUATE, TEMPORARY ON-SITE SEDIMENT BASINS THAT CONFORM TO THE DNR/EPA FOR ON-SITE DETENTION BASINS SHALL BE PROVIDED.
11. RUNOFF SHALL BE PREVENTED FROM ENTERING ALL STORM SEWER INLETS BASINS PROVIDING THEY ARE NOT NEEDED DURING CONSTRUCTION. WHERE STORM SEWER INLETS BASINS ARE NECESSARY FOR SITE DRAINAGE DURING CONSTRUCTION, A SILT FENCE OR SEDIMENT BARRIER SHALL BE INSTALLED AND MAINTAINED AROUND ALL INLETS BASINS UNTIL THE TRIBUTARY AREA TO THE INLETS BASIN IS RESTORED.
12. GRADING OPERATIONS ARE PROHIBITED TO BEGIN AFTER OCTOBER 15 WILL REQUIRE AN APPROVED PHASING SCHEDULE. THE AREA OF LAND THAT THE CITY WILL ALLOW TO BE DISTURBED AT THIS TIME OF YEAR WILL BE DEVELOPED LIMITED. THE CITY WILL ALSO REQUIRE ADDITIONAL EROSION CONTROL DEVICES, I.E., TEMPORARY SEDIMENT BASINS, DURABLE SEEDING AND HIGH RATES OF APPLICATION OF DORM SEED AND MULCH.
13. EROSION CONTROL FACILITIES SHALL BE INSTALLED AND MAINTAINED AROUND THE PERIMETER OF ALL LAKES, PONDS AND WETLANDS WITHIN OR ADJACENT TO THE AREA TO BE GRADED UNTIL THE TRIBUTARY AREA TO THE LAKE, POND OR WETLAND IS RESTORED.
14. TO HAMMER EROSION, ALL 3:1 SLOPES SHALL BE COVERED WITH A MN/DOT 3885 CATEGORY 3 STRAW EROSION CONTROL BLANKETS OR STAKED SOD.
15. ACCUMULATION OF ALL SEDIMENT OCCURRING IN STORM SEWERS, DITCHES, LAKES, PONDS AND WETLANDS SHALL BE REMOVED PRIOR TO, DURING AND AFTER COMPLETION OF GRADING ACTIVITIES.
16. EROSION CONTROL ITEMS AND DEVICES SHALL BE REMOVED ONLY AFTER THE AREA HAS RECEIVED FINAL STABILIZATION OR AS DIRECTED BY THE CITY AND/OR LOWER MISSISSIPPI RIVER WATERSHED MANAGEMENT ORGANIZATION.

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Structural:

MEP:

Owner:
Sherman Associates
233 Park Avenue South, Suite 301
Minneapolis, Minnesota 55415

Project: West Side Flats - Phase 3A

Project Number: 1319

Date: Site Review 4.22.2015

NOT FOR CONSTRUCTION

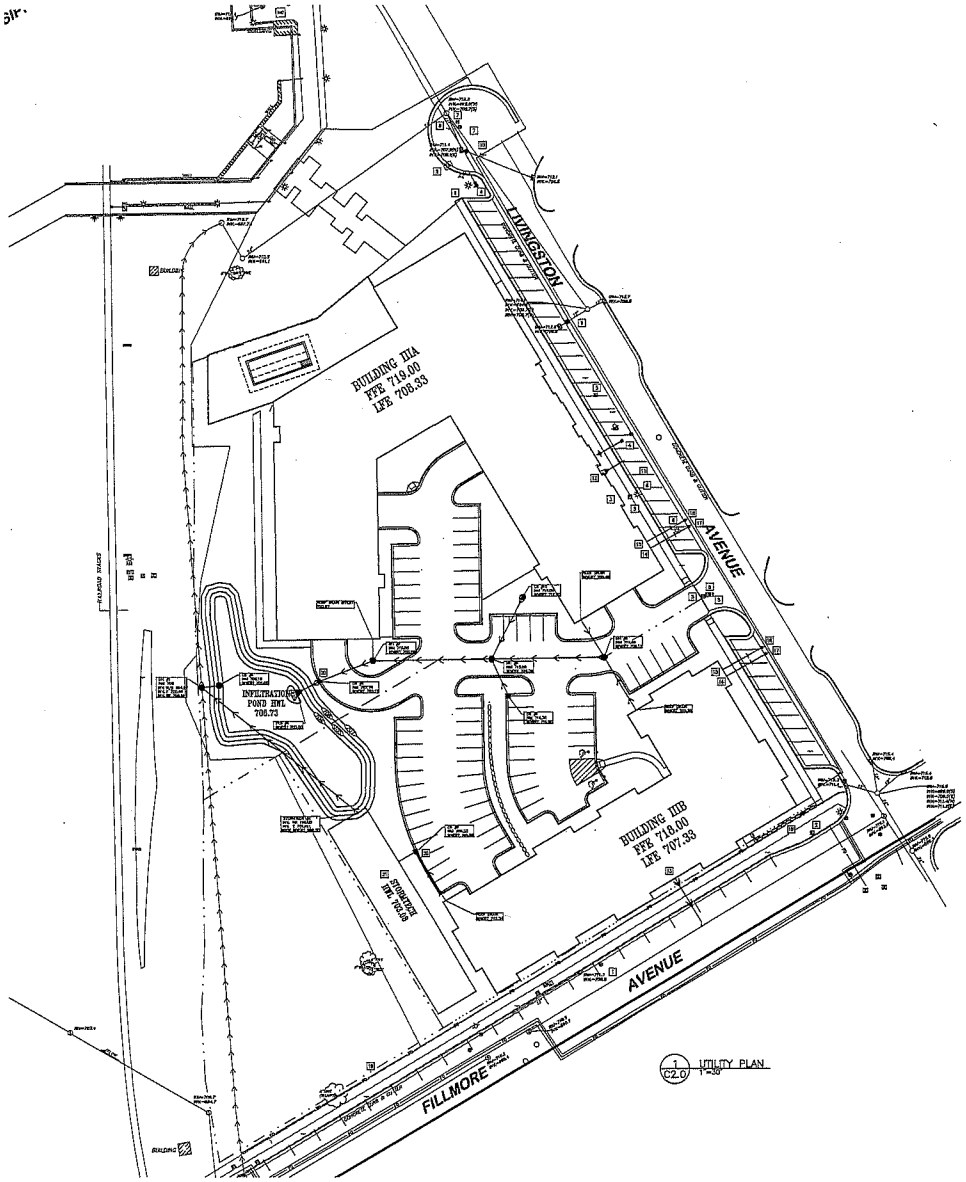
Date

Revision

Rev. No.

GRADING, DRAINAGE, AND EROSION CONTROL PLAN

C1.0



1 C2.0 UTILITY PLAN
1"=30'

PROPOSED PLAN SYMBOLS
CONSTRUCTION LIMITS
PROPERTY LINE
SANITARY SEWER
WATER PIPE
DRAIN TILE
STORM SEWER
RETAINING WALL
FIRE HYDRANT
POST-INDICATOR VALVE
GATE VALVE
CLEANOUT
CATCH BASIN
MANHOLE
FLARED END SECTION WITH RIPRAP
SEWER INVERT ELEVATION INV 710.00

ABBREVIATIONS	
BLDG	Building
BM	Bench Mark
CB	Catch Basin
CONC	Concrete
DIP	Ductile Iron Pipe
ELEV	Elevation
FF	Finishing Floor Elevation
FFE	Finishing Floor Elevation
HDPE	High Density Polyethylene
INV	Invert
MAX	Maximum
MH	Manhole
MIN	Minimum
PIV	Post Indicator Valve
PVC	Polyvinyl Chloride
RCP	Reinforced Concrete Pipe
RED	Reducer
RD	Roof Drain

N

50' 15' 0 30' 60'
SCALE 1" = 30'

KEYED NOTES

KEYED NOTES ARE DENOTED BY [#] ON PLAN.

1. EXISTING SANITARY SEWER STUBS FROM FILLMORE AVENUE ARE TO BE ABANDONED/REMOVED PER CITY OF SAINT PAUL STANDARDS AND SPECIFICATIONS.
2. HANDICAP IS NOT TO BE DISTURBED.
3. DISTRICT ENERGY WATERMAIN. PRIOR TO START OF CONSTRUCTION THE CONTRACTOR IS TO DETERMINE THE EXACT LOCATION OF THE WATER LINES AND IF THEY CONFLICT WITH THE PROPOSED BUILDING CONSTRUCTION, IF IN CONFLICT, CONTRACTOR IS TO COORDINATE RELOCATION OF THE WATERLINES WITH DISTRICT ENERGY.
4. FIRE HYDRANT AND VALVE ARE TO BE REMOVED, SALVAGED, AND REINSTALLED PER PLAN. COORDINATE ALL WORK WITH THE CITY OF SAINT PAUL AND FOLLOW ALL CITY OF SAINT PAUL STANDARDS AND SPECIFICATIONS.
5. MANHOLE CASTINGS ARE TO BE ADJUSTED TO MATCH FINISHED GRADE ELEVATION. COORDINATE CASTING ADJUSTMENTS WITH THE UTILITY OWNER AND VERIFY CASTINGS ARE TRAFFIC RATED FOR VEHICLE LOADS.
6. COORDINATE REMOVAL OF LIGHT POLES WITH THE CITY OF SAINT PAUL.
7. ADJUST WATER VALVE COVER TO MATCH PROPOSED FINISHED GRADE ELEVATION. FOLLOW ALL CITY OF SAINT PAUL STANDARDS AND SPECIFICATIONS.
8. ADJUST STORM SEWER MANHOLE COVER TO MATCH FINISHED GRADE ELEVATION. FOLLOW ALL CITY OF SAINT PAUL STANDARDS AND SPECIFICATIONS.
9. REMOVE EXISTING DUPLA INLET CASTING AND INSTALL MEDIAN CASTING R-3051. CASTING ELEVATION IS TO BE INSTALLED SO THAT THE GUTTER SEAMS BETWEEN THE CASTINGS WITH NO PONDING OF WATER. FOLLOW ALL CITY OF SAINT PAUL STANDARDS AND SPECIFICATIONS.
10. REMOVE EXISTING CURB INLET CASTING AND INSTALL MEDIAN CASTING R-3051. CASTING ELEVATION IS TO BE INSTALLED SO THAT THE GUTTER POINT AROUND CASTING. FOLLOW ALL CITY OF SAINT PAUL STANDARDS AND SPECIFICATIONS.
11. PRIOR TO START OF CONSTRUCTION, THE CONTRACTOR IS TO POTHOLE AND DETERMINE EXACT LOCATION, DEPTH, SIZE, AND THE SIZE OF ANTICIPATED SANITARY SEWER STUB FROM MAIN, AND TO DETERMINE SIZE OF AN 8-INCH PVC AT INVERT ELEVATION 694.65. FOLLOW ALL CITY OF SAINT PAUL STANDARDS AND SPECIFICATIONS.
12. CONNECT NEW 8-INCH SCHEDULE 40 PVC TO EXISTING STUB. INSTALL APPROXIMATELY 15 LINEAL FEET OF 8-INCH SCHEDULE 40 PVC TO WITHIN 5-FEET OF PROPOSED BUILDING WALL. STUB INVERT ELEVATION IS TO BE 696.00. FOLLOW ALL CITY OF SAINT PAUL STANDARDS AND SPECIFICATIONS.
13. CONNECT NEW 8-INCH SCHEDULE 40 PVC TO EXISTING SANITARY SEWER WITH WYE CONNECTION. INSTALL APPROXIMATELY 37 LINEAL FEET OF 8-INCH SCHEDULE 40 PVC TO WITHIN 5-FEET OF PROPOSED BUILDING WALL. STUB INVERT ELEVATION IS TO BE 696.00. FOLLOW ALL CITY OF SAINT PAUL STANDARDS AND SPECIFICATIONS.
14. STUB 6-INCH FIRE PROTECTION WATER SERVICE TO WITHIN 5-FEET OF PROPOSED BUILDING. FOLLOW ALL CITY OF ST PAUL STANDARDS AND SPECIFICATIONS.
15. STUB 4-INCH DOMESTIC WATER SERVICE TO WITHIN 5-FEET OF PROPOSED BUILDING. FOLLOW ALL CITY OF ST PAUL STANDARDS AND SPECIFICATIONS.
16. INSTALL FIRE HYDRANT AND GATE VALVE. FOLLOW ALL CITY OF ST PAUL STANDARDS AND SPECIFICATIONS.
17. INSTALL 8-INCH WET TAP. FOLLOW ALL CITY OF SAINT PAUL STANDARDS AND SPECIFICATIONS.
18. INSTALL 4-INCH WET TAP. FOLLOW ALL CITY OF SAINT PAUL STANDARDS AND SPECIFICATIONS.
19. FIBER OPTIC CABLE ARE NOT TO BE DISTURBED.
20. INSTALL BARR CATCH BASIN PER DETAIL S/D4A3.
21. INSTALL PRE-TREATMENT DEVICE PER DETAIL S/D4A3. INFILTRATION SYSTEM SHALL HAVE AN INITIAL RAIN WATER DEPTH OF 1.5 FEET, A TOTAL VOLUME OF 15,870 CUBIC FEET, AND MEET THE RATE CONTROL REQUIREMENTS INDICATED IN SHEET C3.0. ANY ALTERNATE DESIGNS MUST BE APPROVED BY CIVIL ENGINEER PRIOR TO CONSTRUCTION.

UTILITY NOTES FOR WORK IN PUBLIC RIGHT-OF-WAY:

1. FOLLOW ALL CITY OF ST PAUL AND RAMSEY COUNTY STANDARDS AND SPECIFICATIONS.
2. PRIOR TO CONSTRUCTION, CONTRACTORS ARE TO COORDINATE ALL WORK WITHIN RIGHT OF WAY AND OBTAIN ALL APPLICABLE PERMITS.

ST. PAUL'S NOTES:

1. INSPECTION CONTACT: THE DEVELOPER SHALL CONTACT THE RIGHT OF WAY INSPECTOR SHARON HAMILTON AT (651) 266-9118 (SIDE WORK PRIOR TO DESIGNING WORK) TO DISCUSS TRAFFIC CONTROL, PEDESTRIAN SAFETY AND COORDINATION OF ALL WORK IN THE PUBLIC RIGHT OF WAY.
2. SAFE WORK SITE REQUIREMENTS: THE CONTRACTOR SHALL PROVIDE A CONTINUOUS, ACCESSIBLE, AND SAFE PEDESTRIAN WALKWAY THAT MEETS ADA AND MN MUTCD STANDARDS IF WORKING IN A SIDEWALK AREA, AND TRAFFIC CONTROL PER MN MUTCD REQUIREMENTS FOR WORK IN THE PUBLIC RIGHT OF WAY.
3. NO PRIVATE FACILITIES IN THE RIGHT OF WAY: THE DEVELOPER IS STRICTLY PROHIBITED FROM INSTALLING PRIVATE ELECTRICAL WIRING, CONDUIT, RECEPTACLES AND/OR LIGHTING IN THE CITY'S RIGHT OF WAY. THIS INCLUDES STRUCTURES CONSTRUCTED ON EACH SIDE THE RIGHT OF WAY. THE DEVELOPER SHALL REMOVE ANY AND ALL ELECTRICAL WIRING, CONDUIT, RECEPTACLES AND/OR LIGHTING IN THE RIGHT OF WAY TO THE SITE. CONTRACTOR IS RESPONSIBLE FOR SECURING EXCAVATION PERMITS TO RUN "SIGN SERVICE" INTO A SITE, AND (WHERE REQUIRED) SUBMITTING PLANS FOR REVIEW BY THE PUBLIC WORKS UTILITY REVIEW COMMITTEE.
4. CITY OF ST. PAUL PERMIT REQUIREMENTS:
   4.1. OBTAINING CONSTRUCTION AND EXCAVATION PERMITS: CONTACT PUBLIC WORKS RIGHT OF WAY SERVICE DESK AT (651) 266-9700. IT IS STRONGLY RECOMMENDED THAT CONTRACTORS CALL FOR COST ESTIMATES PRIOR TO BIDDING TO OBTAIN ACCURATE COST ESTIMATES.
   4.2. CONSTRUCTION PERMITS: THE CONTRACTOR MUST OBTAIN AN CONSTRUCTION PERMIT IF CONSTRUCTION (INCLUDING SILT FENCES) WILL BLOCK CITY STREETS, SIDEWALKS OR ALLEYS, OR IF DRIVING OVER CURBS.
   4.3. EXCAVATION PERMITS: ALL DIGGING IN THE PUBLIC RIGHT OF WAY REQUIRES AN EXCAVATION PERMIT. IF THE PROPOSED BUILDING IS CLOSE TO THE RIGHT OF WAY, AND EXCAVATING INTO THE RIGHT OF WAY IS NEEDED TO FACILITATE CONSTRUCTION, CONTACT THE UTILITY INSPECTOR.
   4.4. FAILURE TO SECURE PERMITS: FAILURE TO SECURE CONSTRUCTION PERMITS OR EXCAVATION PERMITS WILL RESULT IN A DOUBLE-PERMIT FEE AND OTHER FEES REQUIRED UNDER CITY OF ST. PAUL LEGISLATIVE CODES.
   4.5. REQUIREMENTS TO WORK IN THE PUBLIC RIGHT OF WAY: ALL UTILITIES AND CONTRACTORS WORKING IN THE PUBLIC RIGHT OF WAY MUST TO BE REGISTERED, INSURED AND BONDED, AS RECOGNIZED BY THE PUBLIC WORKS SERVICE DESK. (651-266-9700).
5. ALL WORK ON STREETS, ALLEYS, AND SIDEWALKS WITHIN THE PUBLIC RIGHT OF WAY MUST BE DONE BY A LICENSED AND BONDED CONTRACTOR UNDER A PERMIT FROM PUBLIC WORKS SIDEWALK SECTION (651-266-9700). SIDEWALK GRADES MUST BE CHECKED ASPHALT DRIVEWAYS.
6. RESTORATION OF ASPHALT AND CONCRETE PAVEMENTS ARE PERFORMED BY THE PUBLIC WORKS STREET MAINTENANCE DIVISION. THE CONTRACTOR IS RESPONSIBLE FOR PAYMENT TO THE CITY FOR THE COST OF THESE RESTORATIONS. THE CONTRACTOR SHALL CONTACT PUBLIC WORKS STREET MAINTENANCE TO SET UP A WORK ORDER PRIOR TO BEGINNING ANY REGRADES IN THE STREET AT 651-352-8100. PROCEDURES AND UNIT COSTS ARE FOUND IN STREET MAINTENANCE'S "GENERAL REQUIREMENTS – ALL RESTORATIONS" AND ARE AVAILABLE AT THE PERMIT OFFICE.
7. SIGNS REGULATING PARKING AND/OR TRAFFIC ON PRIVATE PROPERTY SHALL BE INSTALLED BY THE PROPERTY OWNER OR CONTRACTOR OUTSIDE OF THE PUBLIC RIGHT-OF-WAY. SIGN APPROVED BY PUBLIC WORKS TRAFFIC ENGINEERING REGULATING PARKING AND/OR TRAFFIC IN THE PUBLIC RIGHT-OF-WAY FOR THIS DEVELOPMENT SHALL BE INSTALLED BY THE CITY AT THE EXPENSE OF THE DEVELOPER. CONTACT TRAFFIC ENGINEERING 651-266-9700 SIX WEEKS IN ADVANCE OF NEEDED SERVICE.
8. ABANDONING EXISTING SEWER SERVICE OR MAKING NEW CONNECTIONS TO CITY SEWER MUST BE DONE TO CITY STANDARDS BY A LICENSED HOUSE DRAIN CONTRACTOR UNDER A PERMIT FROM PUBLIC WORKS SEWER SECTION (651-266-9234).
9. ALL WATER MAIN AND SERVICES TO BE INSTALLED ACCORDING TO "SPING STANDARDS FOR INSTALLATION OF WATER MAINS", AND "SPING WATER CODE".
10. ALL EXISTING WATER SERVICES NOT BEING REUSED MUST BE CUT-OFF AND ABANDONED PER SPING'S WATER CODE.
11. THE CONTRACTOR SHALL CONTACT JOHN MCNAMARA, GENERAL FOREMAN, LIGHTING – SIGNAL MAINTENANCE, (651-266-9700), IF REMOVAL OR RELOCATION OF EXISTING FACILITIES IS REQUIRED OR IN THE EVENT OF DAMAGE TO THE LIGHTING OR SIGNAL SYSTEMS. THE CONTRACTOR SHALL ASSUME RESPONSIBILITY (AND RELATED COSTS) FOR ANY DAMAGE OR RELOCATIONS.
   11.1. THE INSTALLATION OF PRIVATE ELECTRICAL WIRING, CONDUIT, RECEPTACLES AND/OR LIGHTING IS STRICTLY PROHIBITED IN THE CITY'S ROW (RIGHT OF WAY).
12. CONTRACTOR IS TO CONTACT GREG REESE, CITY FORESTER (651-632-5436) PRIOR TO DAMAGING ANY BOULEVARD TREES.
13. BUSINESS SIGNS WILL REQUIRE A SEPARATE REVIEW AND SIGN PERMIT FROM THE DEPARTMENT OF SAFETY AND INSPECTIONS. SITE PLAN APPROVAL DOES NOT CONSTITUTE APPROVAL OF BUSINESS SIGNS SHOWN ON THE SITE PLAN. CONTACT TARA SMITH OF DSI ZONING (651-266-9080) IF YOU HAVE ANY QUESTIONS ABOUT SIGNS.
14. CARE MUST BE TAKEN DURING CONSTRUCTION AND EXCAVATION TO PROTECT ANY SURVEY MONUMENTS AND/OR PROPERTY SIGNS. CALL SAM GREEN OF PUBLIC WORKS SURVEYING (651-266-9078) IF YOU HAVE ANY QUESTIONS.
15. AS PER THE CITY'S STANDARD SPECIFICATION FOR STREET OPENINGS POLICY, RESTORATION ON ROADWAY SURFACES USED THAT 5 YEARS OLD WILL REQUIRE FULL MILL AND OVERLAY OR ADDITIONAL RESTORATION FEES. PAVEMENT RESTORATION SHALL BE COMPLETED BY THE ST. PAUL PUBLIC WORKS STREET MAINTENANCE DIVISION. ALL RELATED COSTS ARE THE RESPONSIBILITY OF THE DEVELOPER/CONTRACTOR. CONTACT MARK NELSON AT 651-266-9700 FOR ESTIMATE OF COSTS FOR PAVEMENT RESTORATION.

UTILITY NOTES:

1. COORDINATE SERVICE CONNECTION LOCATIONS AT THE BUILDING WITH THE MECHANICAL CONTRACTOR PRIOR TO CONSTRUCTION. NO ADDITIONAL COMPENSATION WILL BE ALLOWED FOR UNCOORDINATED WORK.
2. ALL SERVICE CONNECTIONS WITH LESS THAN 8 FEET OF COVER OVER THE TOP OF PIPE ARE TO BE INSULATED. INSULATION SHALL BE INSTALLED FROM THE CONNECTION OF THE SERVICE AT THE BUILDING TO THE POINT WHERE THE SERVICE ATTAINS 8 FEET OF COVER. CONTRACTOR SHALL OBTAIN WRITTEN PERMISSION FROM ARCHITECT OR ENGINEER PRIOR TO INSTALLATION OF INSULATION.
3. PROTECT ALL EXISTING STRUCTURES AND UTILITIES WHICH ARE NOT SCHEDULED TO BE REMOVED.
4. ALL SEWER AND WATER CROSSINGS SHALL HAVE A MINIMUM VERTICAL SEPARATION OF 1.5 FEET AND HORIZONTAL SEPARATION OF 10 FEET. FOLLOW ALL HEALTH DEPARTMENT AND CITY OF ST PAUL AND RAMSEY COUNTY STANDARDS.
5. ALL WATER MAIN SHALL BE DUCTILE IRON PIPE, CLASS 52, UNLESS NOTED OTHERWISE.
6. ALL WATER MAIN SHALL HAVE A MINIMUM DEPTH OF COVER OF 7.5 FEET OVER TOP OF WATER MAIN.
7. PROVIDE THRUST BLOCKING ON ALL WATER MAIN PER CITY OF ST PAUL. PROVIDE MECHANICAL JOINT RESTRAINTS ON ALL BENDS, VALVES, TEES, PLUGS AND HYDRANT LEADS.
8. SANITARY SEWER PIPING SHALL BE PVC SDR 26 UNLESS NOTED OTHERWISE.
9. STORM SEWER PIPING SHALL BE REINFORCED CONCRETE PIPE (RCP), UNLESS NOTED OTHERWISE. ALL STORM SEWER PIPING SHALL BE SMOOTH INTERIOR AND ANNULAR EXTERIOR CORRUGATED HIGH DENSITY POLYETHYLENE (HDPE), UNLESS NOTED OTHERWISE. HDPE PIPE SHALL CONFORM TO ASTM F2306.
10. CONTRACTORS ARE TO COORDINATE ALL WORK WITH GAS, ELECTRIC, TELEVISION AND TELEPHONE COMPANIES PRIOR TO START OF CONSTRUCTION.
11. ALL PORTIONS OF THE STORM SEWER SYSTEM LOCATED WITHIN 10-FEET OF THE BUILDING OR WATER SERVICE LINE SHALL BE TESTED IN ACCORDANCE WITH MN PLUMBING CODE.
12. ALL JOINTS AND CONNECTIONS IN THE STORM SEWER SYSTEM SHALL BE GAS TIGHT OR WATER TIGHT IN ACCORDANCE TO MN PLUMBING CODE. APPROVED RESILIENT RUBBER JOINTS MUST BE USED TO MAKE WATER TIGHT CONNECTIONS TO MANHOLES, CATCH BASINS, AND OTHER STRUCTURES. GROUT RINGS ARE AN ACCEPTABLE ALTERNATIVE. CEMENT MORTAR JOINTS ARE PERMITTED ONLY FOR REPAIRS AND CONNECTIONS OF EXISTING LINES UNCONTRACTED WITH RUBBER JOINTS.

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Structural:

MEP:

Project: West Side Flats - Phase 3A

Owner: Sherman Associates
233 Park Avenue South, Suite 201
Minneapolis, Minnesota 55415

Project Number 1510

Date Site Review 4.23.2015

NOT FOR CONSTRUCTION

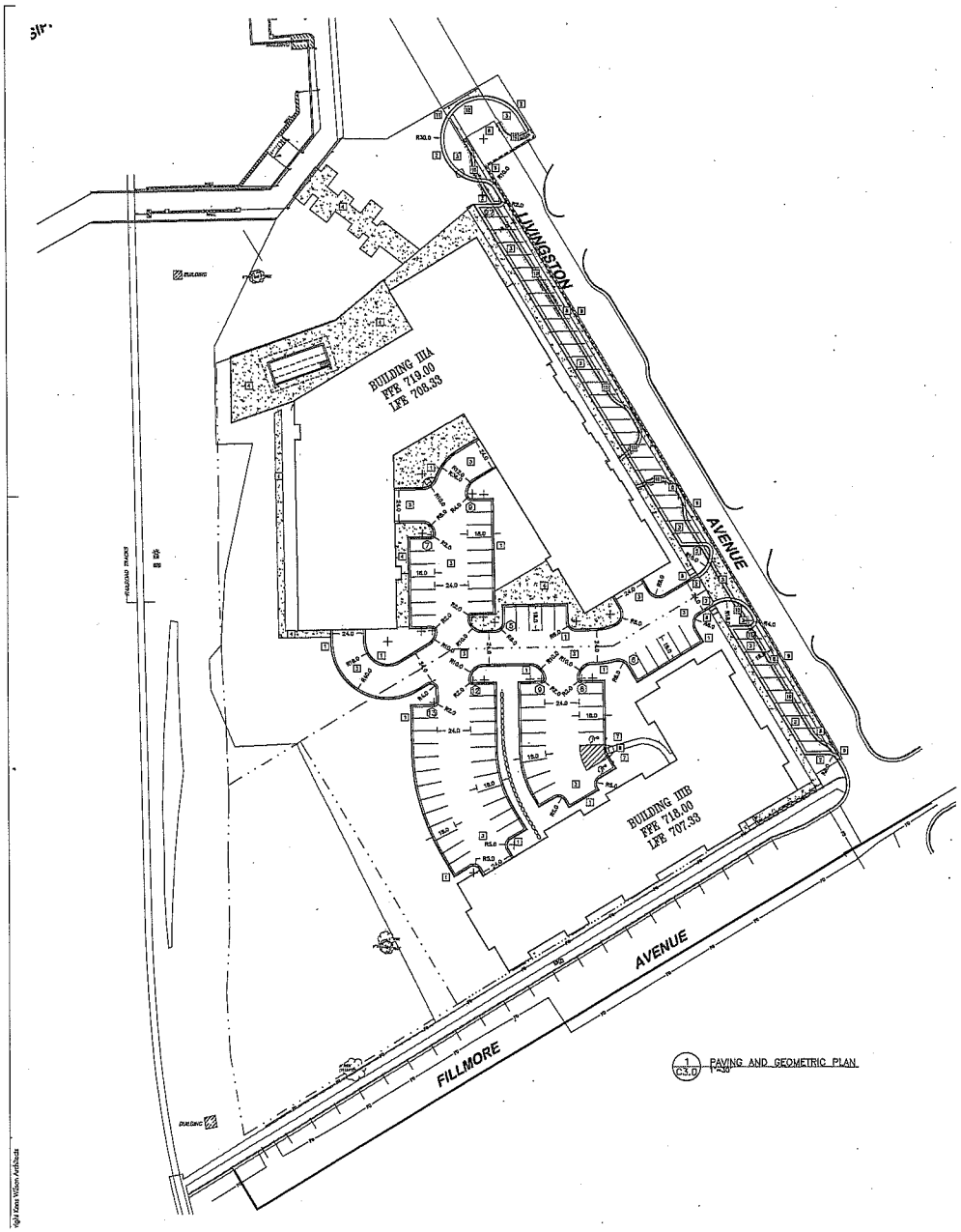
Date:

Revision:

Rev. No.:

UTILITY PLAN

C2.0



1 C3.0 PAVING AND GEOMETRIC PLAN

ABBREVIATIONS	
BLDG	BUILDING
DM	Detail Mark
BW	Bottom of Wall
CONC	Concrete
ELEV	Elevation
EX	Existing
FFE	Finished Floor Elevation
LFE	Lower Floor Elevation
MAX	Maximum
MIN	Minimum
NTS	Not to Scale
TW	TOP OF WALL
TYP.	Typical
MMUTCD	Minnesota Manual on Uniform Traffic Control Devices

PROPOSED PLAN SYMBOLS
CONSTRUCTION LIMITS
PROPERTY LINE
SAWCUT LINE (APPROX)
RETAINING WALL
BITUMINOUS PAVEMENT
CONCRETE PAVEMENT/SIDEWALK
EXISTING CURB AND GUTTER TO BE REMOVED
PEDESTRIAN CURB RAMP
ACCESSIBLE PARKING STALL
SIGN
PARKING STALL COUNT

N

30' 15' 0 30' 60'
SCALE 1" = 30'

KEYED NOTES:

KEYED NOTES ARE DENOTED BY [X] ON PLAN.

1. INSTALL B612 CONCRETE CURB AND GUTTER. REFER TO DETAIL 2/C4.1.
2. INSTALL B624 CONCRETE CURB AND GUTTER. REFER TO DETAIL 3/C4.1.
3. INSTALL BITUMINOUS PAVEMENT. REFER TO DETAIL 7/C4.1.
4. INSTALL CONCRETE WALK. REFER TO DETAIL 8/C4.1. REFER TO LANDSCAPE PLANS FOR CONCRETE FINISH AND JOINTING.
5. INSTALL CONCRETE DRIVE ENTRANCE. REFER TO DETAIL 4/C4.1.
6. INSTALL PEDESTRIAN CURB RAMP. REFER TO DETAIL 1/C4.1. REFER TO MN/DOT STANDARD PLAN S-397/352 AND MN/DOT STANDARD PLATE 7036.
7. INSTALL ACCESSIBLE PARKING SIGN. REFER TO DETAIL 6/C4.1.
8. INSTALL VALLEY GUTTER. REFER TO DETAIL 5/C4.1.
9. SAWCUT EXISTING PAVEMENT AND REMOVE EXISTING BITUMINOUS PAVEMENT. REPLACE INKIND.
10. REMOVE EXISTING B624 CONCRETE CURB AND GUTTER.
11. SAWCUT EXISTING CONCRETE ROAD AND REMOVE EXISTING CONCRETE ROAD. REPLACE INKIND.
12. INSTALL SUMMOUNTABLE CURB AND GUTTER. REFER TO DETAIL 9/C4.1.

GENERAL NOTES:

1. ALL DIMENSIONS ARE TO FACE OF CURB UNLESS NOTED OTHERWISE.
2. ALL CURB AND GUTTER IS TO BE B612 CONCRETE CURB AND GUTTER UNLESS NOTED OTHERWISE.
3. NO SIDEWALK IS TO HAVE MORE THAN A 2% CROSS SLOPE OR MORE THAN A 5% LONGITUDINAL SLOPE.
4. REFER TO ARCHITECTURAL PLANS FOR PROPOSED BUILDING LAYOUT.
5. FOLLOW ALL CITY OF ST PAUL AND RAMSEY COUNTY RULES, REGULATIONS AND SPECIFICATIONS WHEN WORKING IN PUBLIC RIGHT OF WAY.
6. NO PONDING OF WATER ON ASPHALT TRANSITIONS WILL BE ALLOWED WHERE NEW PAVEMENT/CURB/SIDEWALK MATCHES INTO EXISTING PAVEMENT/CURB/SIDEWALK.
7. ALL PARKING STALLS, EXCEPT ACCESSIBLE STALLS, ARE TO BE 9 FEET WIDE BY 20 FEET LONG.
8. THE COORDINATION IS TO CONTACT THE CITY OF ST PAUL FIRE MARSHALL FOR THE EXACT PLACEMENT OF FIRE LANES, YELLOW-PAINTED CURBING AND NO PARKING AREAS FOR FIRE PROTECTION PURPOSES.

PAVING NOTES:

1. REFER TO STRUCTURAL PLANS FOR STOOP DETAILS. ALL WALKS ARE TO BE CENTERED ON THE DOORS.
2. INSTALL APPROPRIATE EXPANSION MATERIAL WHERE CONCRETE IS ADJACENT TO BUILDING FACE.
3. SAWCUT AND MATCH NEW BITUMINOUS PAVEMENT INTO EXISTING PAVEMENT. NO ABRUPT GRADE TRANSITIONS OR PONDING OF WATER WILL BE ALLOWED.
4. MATCH NEW CONCRETE CURB AND GUTTER INTO EXISTING. FOLLOW ALL CITY OF ST PAUL STANDARDS AND SPECIFICATIONS FOR CURB TYPE, MATERIAL AND INSTALLATION METHODS.
5. SAWCUT EXISTING BITUMINOUS PAVEMENT AND CURB AND GUTTER TO NEAREST JOINT. COORDINATE REGIONAL SALTS WITH SITE RESIDENT CONTRACTOR AND CONSTRUCTION MANAGER. INSTALL DRIVE ENTRANCE PER CITY OF ST PAUL STANDARDS AND SPECIFICATIONS. FOLLOW ALL CITY OF ST PAUL AND RAMSEY COUNTY REQUIREMENTS FOR TRAFFIC CONTROL.

ST. PAUL'S NOTES:

1. INSPECTION CONTACT: THE DEVELOPER SHALL CONTACT THE RIGHT OF WAY INSPECTOR SHARON HAMILTON AT (651) 266-9115 (24HR) WEEK PRIOR TO BEGINNING WORK TO DISCUSS TRAFFIC CONTROL, PEDESTRIAN SAFETY AND COORDINATION OF ALL WORK IN THE PUBLIC RIGHT OF WAY.
2. SAFE WORK SITE RECONFIGURE: THE COORDINATOR SHALL PROVIDE A CONTINUOUS, ACCESSIBLE AND SAFE PEDESTRIAN WALKWAY THAT MEETS ADA AND MN MUTCD STANDARDS IF WORKING IN A SIDEWALK AREA, AND TRAFFIC CONTROL PER MN MUTCD REQUIREMENTS FOR WORK IN THE PUBLIC RIGHT OF WAY.
3. NO PRIVATE FACILITIES IN THE RIGHT OF WAY: THE DEVELOPER IS STRICTLY PROHIBITED FROM INSTALLING PRIVATE ELECTRICAL WIRING, CONDUIT, RECEPTACLES AND/OR LIGHTING IN THE CITY'S RIGHT OF WAY. THIS INCLUDES EXISTING CONDUIT OR CABLE INTO THE PUBLIC RIGHT OF WAY TO ACCOMMODATE UTILITY FEEDS TO THE PROPERTY. THE DEVELOPER MUST CONTACT THE CITY'S ELECTRICAL INSPECTION TO DETERMINE FEEDS INTO THE PROPERTY. CONSULTING ENGINEERS MUST PROVIDE ELECTRICAL PLANS TO THE CITY'S ELECTRICAL SERVICE PER A SITE, AND (WHERE REQUIRED) SUBMITTING PLANS FOR REVIEW BY THE PUBLIC WORKS UTILITY REVIEW COMMITTEE.
4. CITY OF ST. PAUL PERMIT REQUIREMENTS
   - 4.1. SIDEWALK CONSTRUCTION AND EXCAVATION PERMITS: CONTACT PUBLIC WORKS RIGHT OF WAY SERVICE DESK AT (651) 266-9151. ITEM MINIMALLY RECOMMENDED THAT CONTRACTORS CALL PER DESIGN DETAILS PRIOR TO BIDDING TO OBTAIN ACCURATE COST ESTIMATION.
   - 4.2. OBSTRUCTION PERMITS: THE CONTRACTOR MUST OBTAIN AN OBSTRUCTION PERMIT IF CONSTRUCTION (BUILDING SITE FENCES) WILL BLOCK CITY STREETS, SIDEWALKS OR ALLEYS, OR IF DRIVING OVER CURBS.
   - 4.3. EXCAVATION PERMITS: ALL DIGGING IN THE PUBLIC RIGHT OF WAY REQUIRES AN EXCAVATION PERMIT. IF THE PROPOSED BUILDING IS CLOSE TO THE RIGHT OF WAY, AND EXCAVATING INTO THE RIGHT OF WAY IS NEEDED TO FACILITATE CONSTRUCTION, CONTACT THE UTILITY INSPECTOR.
   - 4.4. FAILURE TO SECURE PERMITS: FAILURE TO SECURE OBSTRUCTION PERMITS OR EXCAVATION PERMITS WILL RESULT IN A DOUBLE-FOUND FEE AND OTHER FEES REQUIRED UNDER CITY OF ST. PAUL LEGISLATIVE CODES.
   - 4.5. REQUIREMENTS TO WORK IN THE PUBLIC RIGHT OF WAY: ALL UTILITIES AND CONTRACTORS WORKING IN THE PUBLIC RIGHT OF WAY MUST TO BE REGISTERED, INSURED AND BONDED, AS REQUIRED BY THE PUBLIC WORKS SERVICE DESK, (651-266-9151).
6. ALL WORK ON CURBS, DRIVEWAYS, AND SIDEWALKS WITHIN THE PUBLIC RIGHT OF WAY MUST BE DONE BY A LICENSED AND BONDED CONTRACTOR UNDER A PERMIT FROM PUBLIC WORKS SIDEWALK SECTION (651-266-9130). SIDEWALK GRADES MUST BE CHECKED ACROSS DRIVEWAYS.
7. MAINTENANCE OF ASPHALT AND CONCRETE PAVEMENT ARE PERFORMED BY THE CITY PUBLIC WORKS STREET MAINTENANCE DIVISION. THE CONTRACTOR IS RESPONSIBLE FOR PAYMENT TO THE CITY FOR THE COST OF THESE REPAIRSMENTS. THE CONTRACTOR SHALL CONTACT PUBLIC WORKS STREET MAINTENANCE TO SET UP A WORK ORDER PRIOR TO BEGINNING ANY REMOVALS IN THE STREET AT 651-292-6900. PROCEDURES AND UNIT COSTS ARE FOUND IN STREET MAINTENANCE'S GENERAL REQUIREMENTS – ALL RESTORATION AND ARE AVAILABLE AT THE PERMIT OFFICE.
8. SIGNS REGULATING PARKING AND/OR TRAFFIC ON PRIVATE PROPERTY SHALL BE INSTALLED BY THE PROPERTY OWNER OR CONTRACTOR OUTSIDE OF THE PUBLIC RIGHT-OF-WAY. SIGNS APPROVED BY PUBLIC WORKS TRAFFIC ENGINEERING REGULATING PARKING AND/OR TRAFFIC IN THE PUBLIC RIGHT-OF-WAY FOR THIS DEVELOPMENT SHALL BE INSTALLED BY CITY FORCES AT THE EXPENSE OF THE DEVELOPER/OWNER. CONTACT TRAFFIC ENGINEERING 651-266-9300 (48 HOURS IN ADVANCE OF NEEDED SIGNS).
9. ABANDONING EXISTING SEWER SERVICE OR MAKING NEW CONNECTIONS TO CITY SEWER MUST BE DONE TO CITY STANDARDS BY A LICENSED HOUSE DRAIN CONTRACTOR UNDER A PERMIT FROM PUBLIC WORKS SEWER SECTION (651-266-9235).
10. ALL WATER MAIN AND SERVICES TO BE INSTALLED ACCORDING TO "SPWWA STANDARDS FOR INSTALLATION OF WATER MAINS", AND "SPWWA WATER CODE".
11. ALL EXISTING WATER SERVICES NOT BEING REUSED MUST BE CUT-OFF AND ABANDONED PER SPWW WATER CODE.
12. THE CONTRACTOR SHALL CONTACT JOHN MCNAMARA, GENERAL FOREMAN, LIGHTING – SIGNAL MAINTENANCE, (651-266-6700), IF REMOVAL OR RELOCATION OF EXISTING FACILITIES IS REQUIRED OR IN THE EVENT OF DAMAGE TO THE LIGHTING OR SIGNAL UTILITIES. THE CONTRACTOR SHALL ASSUME RESPONSIBILITY (AND RELATED COSTS) FOR ANY DAMAGE OR RELOCATIONS.
   - 12.1. THE INSTALLATION OF PRIVATE ELECTRICAL WIRING, CONDUIT, RECEPTACLES AND/OR LIGHTING IS STRICTLY PROHIBITED IN THE CITY'S ROW (RIGHT OF WAY).
13. CONTRACTOR IS TO CONTACT GREG BUDIG, CITY FORESTER (651-632-5420) PRIOR TO REPAIRING ANY BOULEVARD TREES.
14. BUSINESS SIGNS WILL REQUIRE A SEPARATE REVIEW AND SIGN PERMIT FROM THE DEPARTMENT OF SAFETY AND INSPECTIONS. SITE PLAN APPROVAL DOES NOT CONSTITUTE APPROVAL OF BUSINESS SIGNS SHOWN ON THE SITE PLAN. CONTACT YVA OWITI OF SIS ZONING (651-266-9086) IF YOU HAVE ANY QUESTIONS ABOUT SIGNS.
15. CARE MUST BE TAKEN DURING CONSTRUCTION AND EXCAVATION TO PROTECT ANY SURVEY MONUMENTS AND/OR PROPERTY CORNERS. CALL SAM GIBSON OF PUBLIC WORKS SURVEYING (651-266-9072) IF YOU HAVE ANY QUESTIONS.
16. AS PER THE CITY'S STANDARD SPECIFICATION FOR STREET EXCAVATION POLICY, RESTORATION ON ROADWAY SURFACES LESS THAN 5 YEARS OLD WILL REQUIRE FULL WIDTH MILL AND OVERLAY OR ADDITIONAL EXCAVATION FEES. PAVEMENT RESTORATION SHALL BE COMPLETED BY THE ST. PAUL PUBLIC WORKS STREET MAINTENANCE DIVISION. ALL RELATED COSTS ARE THE RESPONSIBILITY OF THE DEVELOPER/CONTRACTOR. CONTACT KEVIN NELSON AT 651-266-9700 FOR ESTIMATE OF COSTS FOR PAVEMENT RESTORATION.

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Landscape:
Calyx Design Group
1593 W. Berkely Ave.
St. Paul, MN 55105
P: 651.334.5486

Structural:

MEP:

Project: West Side Flats - Phase 3A

Owner: Sherman Associates
233 Park Avenue South, Suite 201
Minneapolis, Minnesota 55415

Project Number 1519

Date Site Review 4.23.2015

NOT FOR CONSTRUCTION

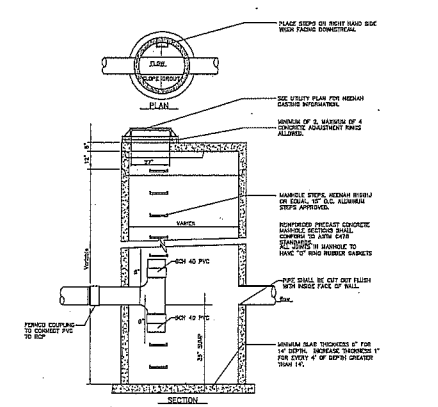
Date

Revision

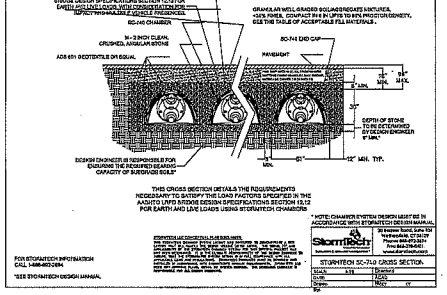
Rev. No.

PAVING AND GEOMETRIC PLAN

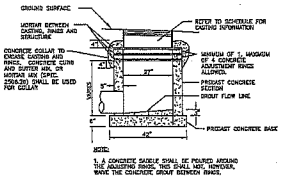
C3.0



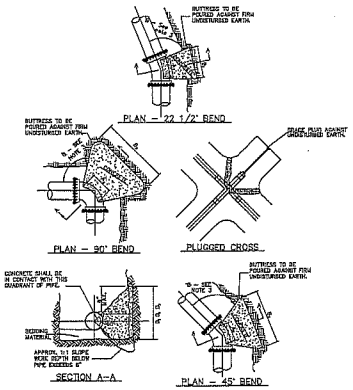
8 C4.0 SUMP CATCH BASIN MANHOLE
NOT TO SCALE



9 C4.0 FILTRATION TANK SYSTEM
NOT TO SCALE



10 C4.0 27-INCH CATCH BASIN
NOT TO SCALE

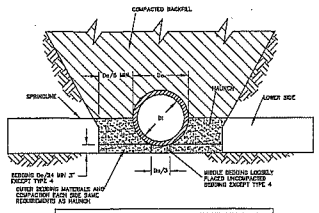


NOTES:
1. BENDWORK IN TABLE ARE BASED ON A WATER PRESSURE OF 150 P.S.I. AND A 100% EXCESS PRESSURE FOR FIELD TEST.
2. CONCRETE CLASS B SHOULD BE LARGE ENOUGH TO ADD ANGLE C EQUAL TO OR LARGER THAN 45°.
3. BENDWORK PLACED SHOULD BE AS LARGE AS POSSIBLE WITHOUT INTERFERING WITH M.J. BOLTS.
4. SHAPE OF BACK OF BUTTRESS MAY VARY AS LONG AS POUR IS AGAINST FIRM UNDISTURBED EARTH.

BUTTRESS DIMENSIONS

PIPE SIZE	22.5° Bend B1	22.5° Bend D1	45° Bend B2	45° Bend D2	90° Bend B3	90° Bend D3
8"	1'-0"	1'-0"	1'-0"	1'-0"	2'-0"	1'-0"
12"	1'-0"	1'-0"	1'-0"	1'-0"	2'-0"	2'-0"
16"	1'-0"	1'-0"	1'-0"	1'-0"	2'-0"	2'-0"
20"	1'-0"	1'-0"	1'-0"	1'-0"	2'-0"	2'-0"
24"	1'-0"	1'-0"	1'-0"	1'-0"	2'-0"	2'-0"
30"	1'-0"	1'-0"	1'-0"	1'-0"	2'-0"	2'-0"

6 C4.0 THRUST BLOCK DETAIL FOR MECHANICAL PIPE BENDS
NOT TO SCALE

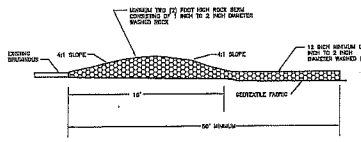


STANDARD TRENCH INSTALLATION SOIL AND MINIMUM STANDARD PROCTOR COMPACTION REQUIREMENTS		
INSTALLATION TYPE	HAUNCH AND OUTER BEDDING	LOWER SIDE
TYPE 1	90% CATEGORY I	90% CATEGORY I 85% CATEGORY II 100% CATEGORY III
TYPE 2	85% CATEGORY I 85% CATEGORY II	85% CATEGORY I 90% CATEGORY II 95% CATEGORY III
TYPE 3	90% CATEGORY I 90% CATEGORY II 95% CATEGORY III	85% CATEGORY I 90% CATEGORY II 95% CATEGORY III
TYPE 4	NO COMPACTION REQUIRED, EXCEPT IF CATEGORY III USE 95% CATEGORY III	NO COMPACTION REQUIRED, EXCEPT IF CATEGORY III USE 95% CATEGORY III

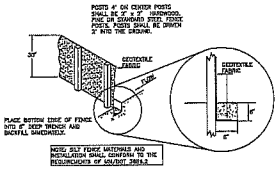
EQUIVALENT SOIL CLASSIFICATIONS FOR SOIL DESIGNATIONS		
SOIL	UNIFIED SOIL CLASSIFICATION SYSTEM (USCS)	MN/DOT SPECIFICATION
CATEGORY I	CLEAN COARSE GRAINED SOILS: GW, GP, SW, SP, OR ANY SOIL BEGINNING WITH ONE OF THOSE SYMBOLS WITH 12% OR LESS PASSING A #200 SIEVE	COARSE FILTER AGGREGATE MN/DOT 3149.211
CATEGORY II	COARSE GRAINED SOILS WITH FINES: GM, GC, SM, SC, OR ANY SOIL BEGINNING WITH ONE OF THOSE SYMBOLS CONTAINING MORE THAN 12% PASSING A #200 SIEVE	AGGREGATE BEDDING MN/DOT 3149.22
CATEGORY III	FINE GRAINED SOILS: CL, ML, OR CL-ML, CLML, ML/CL) WITH LESS THAN 30% RETAINED ON A #200 SIEVE.	NOT APPLICABLE

NOTES:
1. COMPACTION AND SOIL SYMBOLS-I.E. "95% CATEGORY I" REFERS TO CATEGORY I SOIL MATERIAL WITH MINIMUM STANDARD PROCTOR COMPACTION OF 95%.
2. SOIL IN BEDDING AND HAUNCH ZONES SHALL BE COMPACTED TO AT LEAST THE SAME COMPACTION AS SPECIFIED FOR THE MAJORITY OF SOIL IN THE BACKFILL ZONE.
3. THE TRENCH WIDTH SHALL BE WIDER THAN SHOWN IF NECESSARY TO PROVIDE ADEQUATE SPACE TO ATTAIN SPECIFIED COMPACTION. SEE TRENCH DETAILS.
4. IF THE TRENCH WALLS ARE GREATER THAN 10 DEGREE SLOPES THAT CONSIST OF EMBANKMENT, THE LOWER SIDE SHALL BE COMPACTED TO AT LEAST THE SAME COMPACTION AS SPECIFIED FOR THE SOIL IN THE BACKFILL ZONE.
5. NO BEDDING IS REQUIRED FOR TYPE 4 STANDARD INSTALLATION.
6. REFER TO ASTM D2321-07 FOR DETAILS.
7. TYPE 3 BEDDING SHALL BE USED UNLESS NOTED OTHERWISE.

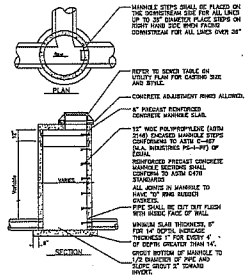
4 C4.0 TYPICAL PIPE BEDDING FOR RCP AND DIP
NOT TO SCALE



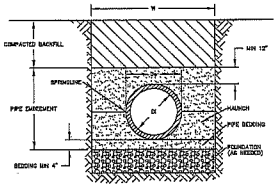
1 C4.0 BERMED ROCK CONSTRUCTION ENTRANCE
NOT TO SCALE



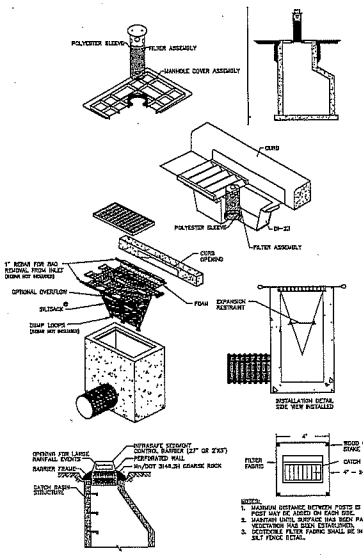
2 C4.0 SILTATION FENCE
NOT TO SCALE



7 C4.0 STORM SEWER MANHOLE/CATCH BASIN
NOT TO SCALE



5 C4.0 TYPICAL PIPE BEDDING FOR PVC
NOT TO SCALE



3 C4.0 INLETS SEDIMENTATION PROTECTION OPTIONS
NOT TO SCALE

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Landscape:
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Structural:

MEP:

Project: West Side Flats - Phase 3A

Owner: Sherman Associates
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Minneapolis, Minnesota 55415

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Date Site Review 4.23.2015

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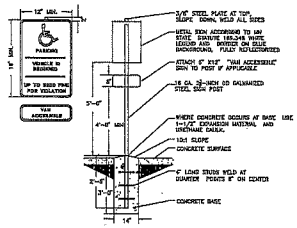
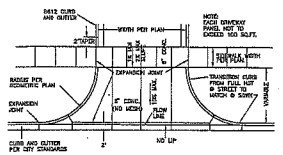
DETAILS

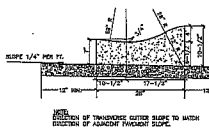
C4.0



8 C4.1 ACCESSIBLE SIGN AND POST – CONCRETE PLACEMENT
NOT TO SCALE

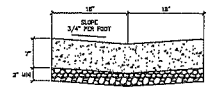


4 C4.1 CONCRETE DRIVE ENTRANCE
NOT TO SCALE



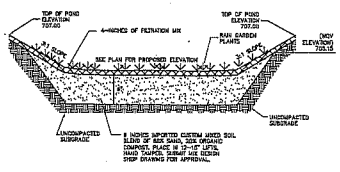
NOTE:
DIRECTION OF TRANSVERSE GUTTER SLOPE TO MATCH DIRECTION OF ADJACENT PAVEMENT SLOPE.

9 C4.1 SURMOUNTABLE CURB SECTION
NOT TO SCALE



NOTES:
1. CONSTRUCT VALLEY GUTTER IN ACCORDANCE WITH MNDOT SPECIFICATION 2531.
2. CONTRACTOR SHALL EXTEND AGGREGATE BASE BELOW CONCRETE VALLEY GUTTER A MINIMUM OF 3" OR TO BOTTOM OF ADJACENT PAVEMENT AGGREGATE BASE, WIDTH EVEN IS GREATER.

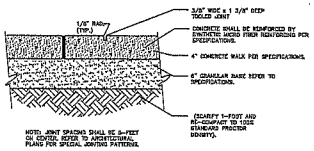
5 C4.1 CONCRETE VALLEY GUTTER
NOT TO SCALE



NOTE:
REFER TO ARCHITECTURAL SITE PLAN FOR RAIN GARDEN PLANTINGS.

EXTENSIVE MIX: USE WITH SEED IMPORTED
50-70% SAND
20-30% ORGANIC ASTM – 1533
20-30% TOPSOIL
20-30% COMPOST

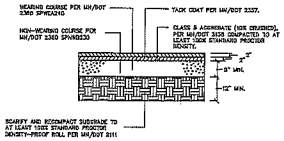
10 C4.1 RAIN GARDEN CROSS SECTION
NOT TO SCALE



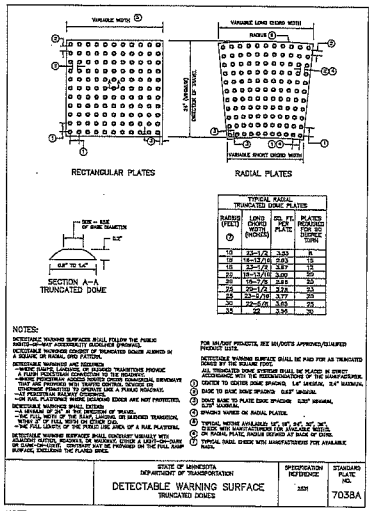
NOTE: JOINT SPACING SHALL BE 6-FEET ON CENTER. REFER TO ARCHITECTURAL PLANS FOR SPECIAL JOINTING PATTERNS.

6 C4.1 CONCRETE SIDEWALK CONSTRUCTION (TYP.)
NOT TO SCALE

NOTE:
ONLY USED WITHIN PROPERTY LINE. NOT TO BE USED IN PUBLIC RIGHT-OF-WAY.



7 C4.1 BITUMINOUS PAVEMENT
NOT TO SCALE



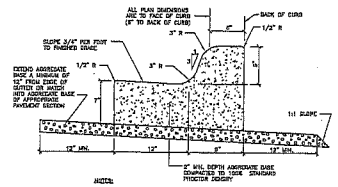
NOTES:
DETECTABLE WARNING SURFACES SHALL FOLLOW THE PUBLIC SIDEWALK OR MAY ACCOMPANY ACCESSIBLE GROUNDS.
DETECTABLE WARNING SURFACE TO INCLUDE DOMES ALIGNED IN A SQUARE OR RADIAL GRID PATTERN.
DETECTABLE WARNINGS ARE REQUIRED:
—WHERE RAISED LANDINGS, OR ENGINEER TRANSITIONS PROVIDE A FLUSH PEDESTRIAN CONNECTION OF THE PROGRESS.
—AT PEDESTRIAN ACCESS TO STREETS AND ROADWAYS, DRIVEWAYS THAT ARE PROVIDED WITH SURFACE DRAINAGE CONDITIONS, DRIVEWAYS OTHERWISE PROVIDED TO OPERATE LIKE A PUBLIC ROADWAY.
—AT PEDESTRIAN RAILWAY CROSSINGS.
—AT PEDESTRIAN RAMPS WHERE EDGES ARE NOT PROTECTED.
DETECTABLE WARNINGS SHALL DEFINE:
—A MINIMUM OF 24" AT THE DIRECTION OF TRAVEL.
—THE FULL WIDTH OF THE RAMP, LANDING OR DEDICATED TRANSITION.
—WIDTH OF THE FULL WIDTH OR DEPTH OF THE RAMP.
—THE FULL LENGTH OF THE PEDESTRIAN RAMP, OR A PORTION OF THE RAMP, PLATFORM.
DETECTABLE WARNING SURFACE SHALL CONTRAST VISUALLY WITH ADJACENT WALKING SURFACES, EITHER LIGHTER OR DARKER, USE OF COLOR ALONE OR COLOR-ON-COLOR CONTRAST MAY NOT BE PERMITTED ON THE FULL RAMP SURFACE, EXCLUDING THE FLARED SIDES.
FOR MN/DOT PROJECTS, SEE MN/DOT'S APPROVED/QUALIFIED PRODUCT LISTS.
DETECTABLE WARNING SURFACE SHALL BE PAID FOR AS TRUNCATED DOMES BY THE SQUARE FOOT.
ALL TRUNCATED DOME SYSTEMS SHALL BE PLACED IN DIRECT ACCORDANCE WITH THE SPECIFICATIONS OF THE MANUFACTURER.
① CENTER TO CENTER DOME SPACING: 1.6" MINIMUM, 2.4" MAXIMUM.
② EDGE TO EDGE DOME SPACING: 0.65" MINIMUM.
③ DOME BASE TO PLATE EDGE SPACING: 0.200" MINIMUM, 0.29" MAXIMUM.
④ SPACING VARIES ON RADIAL PLATES.
⑤ TYPICAL WIDTHS AVAILABLES 10", 11", 12", 24", 36".
⑥ 24" (VARIABLE) DIRECTIONAL DIMENSION OF RADIAL PLATE.
⑦ ON RADIAL PLATE, PLACE DOMES AT BASE OF CURVE.
⑧ TYPICAL RADIAL SHEET WITH MANUFACTURERS FOR AVAILABLE SIZES.

STATE OF MINNESOTA DEPARTMENT OF TRANSPORTATION	SPECIFICATION REFERENCE	STANDARD PLATE NO.
DETECTABLE WARNING SURFACE TRUNCATED DOMES	3231	7038A

NOTE:
FOR ADA COMPLIANT PEDESTRIAN RAMPS, REFER TO MN/DOT STANDARD PLAN 5-297.250 PEDESTRIAN CURB RAMP DETAILS AT THE FOLLOWING WEB ADDRESS:
HTTP://STANDARDPLATES.DOT.STATE.MN.US/STDPLATE.ASPX

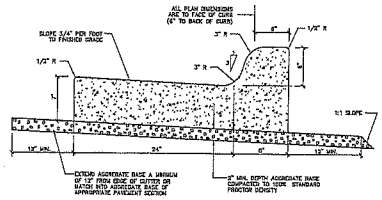
CONTRACTOR SHALL COORDINATE FINAL CURB RAMP LOCATION AND PEDESTRIAN CURB RAMP DETAIL WITH THE CITY AND OWNER PRIOR TO INSTALLATION.

1 C4.1 PEDESTRIAN CURB RAMP – DETECTABLE WARNING
NOT TO SCALE



NOTES:
1. DIRECTION OF TRANSVERSE GUTTER SLOPE TO MATCH DIRECTION OF ADJACENT PAVEMENT SLOPE.
2. CONSTRUCT CURB AND GUTTER IN ACCORDANCE WITH MNDOT SPECIFICATION 2531.

2 C4.1 B612 CONCRETE CURB AND GUTTER
NOT TO SCALE



NOTES:
1. DIRECTION OF TRANSVERSE GUTTER SLOPE TO MATCH DIRECTION OF ADJACENT PAVEMENT SLOPE.
2. CONSTRUCT CURB AND GUTTER IN ACCORDANCE WITH MNDOT SPECIFICATION 2531.

3 C4.1 B624 CONCRETE CURB AND GUTTER
NOT TO SCALE

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Minneapolis, MN 55429
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St. Paul, MN 55105
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Structural:

MEP:

Owner:
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233 Park Avenue South, Suite 201
Minneapolis, Minnesota 55415

Project: West Side Flats - Phase 3A

Project Number 1519

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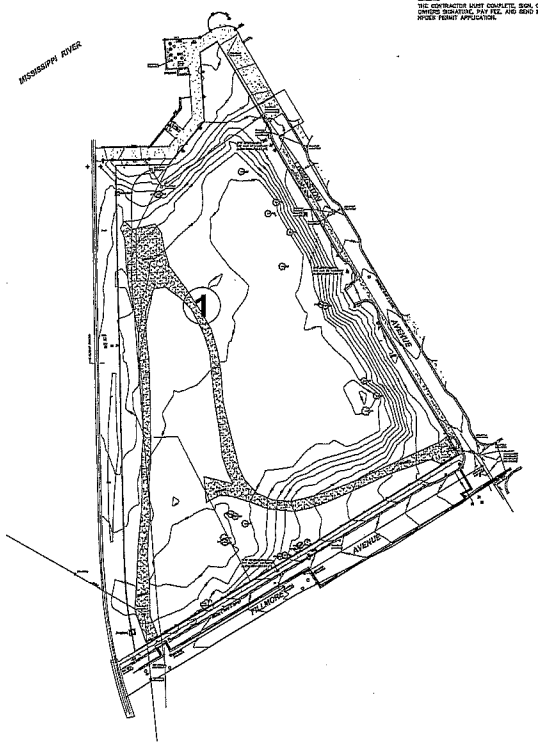
DETAILS

C4.1

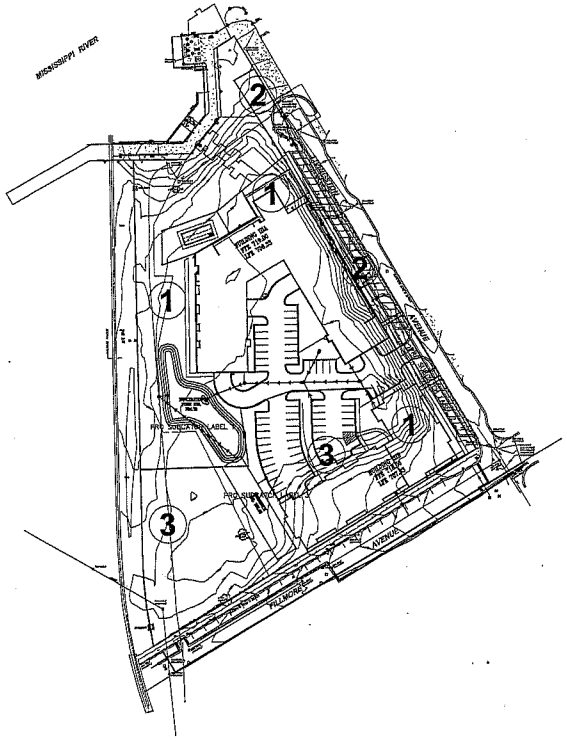
NOTE:
THE CONTRACTOR MUST COMPLETE, SIGN, OBTAIN OWNERS SIGNATURE, PAY FEE, AND SEND IN THE NPDES PERMIT APPLICATION.



1 C5.0 EXISTING CONDITIONS 1"=60'

EXISTING DRAINAGE AREAS								
DRAINAGE AREA	IMPERVIOUS AREA (ACRES)	PERVIOUS AREA (ACRES)	TOTAL AREA (ACRES)	Q OUT (CFS) STORM EVENT 2-YEAR (2.75")	10-YEAR (4.18")	100-YEAR (9.93")	RUNOFF	
1	0.40	4.34	4.82	6.41	16.03	32.66		
TOTAL	0.40	4.34	4.82	6.41	16.03	32.66		

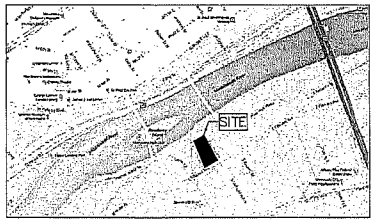
Owner:
SHERMAN ASSOCIATES
333 PARK AVENUE SOUTH, SUITE 201
MINNEAPOLIS, MINNESOTA 55415
PHONE: (612)-338-3000



2 C5.0 PROPOSED CONDITIONS 1"=60'

PROPOSED DRAINAGE AREAS								
DRAINAGE AREA	IMPERVIOUS AREA (ACRES)	PERVIOUS AREA (ACRES)	TOTAL AREA (ACRES)	Q OUT (CFS) STORM EVENT 2-YEAR (2.75")	10-YEAR (4.18")	100-YEAR (9.93")	RUNOFF	
1	1.59	1.31	2.90	1.38	4.05	5.57		
2	0.08	0.30	0.38	0.19	0.77	1.81		
3	0.83	0.26	1.09	0.80	0.06	0.76		
TOTAL	2.50	1.87	4.37	1.97	4.90	7.80		

STORMWATER RUNOFF SUMMARY			
	2-YR STORM (2.75") RUNOFF (CFS)	10-YR STORM (4.18") RUNOFF (CFS)	100-YR STORM (9.93") RUNOFF (CFS)
EXISTING SITE	6.41	16.03	32.66
PROPOSED SITE	1.97	4.90	7.80
SAINT PAUL REQUIREMENT	1.54 CFS PER ACRE x 4.82 ACRES =		7.40



VICINITY MAP
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ABBREVIATIONS	
REBAR	REBAR
BMP	Best Management Practice
DW	Bottom of Wall
CB	Catch Basin
CONC	Concrete
ELEV	Elevation
EX	Existing
FFE	Finished Floor Elevation
HWL	High Water Level
INV	Invert
MAX	Maximum
MH	Manhole
MIN	Minimum
MPCA	Minnesota Pollution Control Agency
NPDES	National Pollutant Discharge Elimination System
OHL	Normal Water Level
PVC	Polyvinyl Chloride
RCP	Reinforced Concrete Pipe
TW	Top of Wall
W.O.	Washout

N
60' 30' 0 60' 120'
SCALE 1" = 60'

CONSTRUCTION ACTIVITY EROSION PREVENTION PRACTICES

PROVIDE TEMPORARY PROTECTION OR PERMANENT COVER FOR EXPOSED SOIL AREAS WITH A CONTINUOUS POSITIVE SLOPE WITHIN 200 FEET OF A SURFACE WATER, DURING AND BEFORE CATCH BASIN, OR ANY STORM WATER CONVEYANCE SYSTEM. STABILIZATION MUST BE THE ACTIVE WITHIN THE FOLLOWING TIME FRAME:

THE TIME ON AREA CAN REMAIN OPEN WHEN NOT ACTIVELY BEING WORKED ON:
SLOPES STEEPER THAN 3:1 — 7 DAYS
SLOPES 10:1 TO 3:1 — 14 DAYS
SLOPES FLATTER THAN 10:1 — 14 DAYS

DITCHES THAT CONNECT TO A SURFACE WATER MUST BE STABILIZED WITHIN 200-FEET FROM THE EDGE OF PROPERTY OR WITHIN 200-FEET TO ANY SURFACE WATER WITHIN 24-HOURS.

PIPE OUTLETS MUST BE PROVIDED WITH TEMPORARY OR PERMANENT ENERGY DISSIPATION WITHIN 24-HOURS AFTER CONNECTION TO A SURFACE WATER.

SEDIMENT CONTROL MEASURES MUST BE INSTALLED ON ALL DOWN GRADIENT PERIMETERS BEFORE ANY UPGRADIENT LAND DISTURBING ACTIVITIES BEGIN.

SEDIMENT AND EROSION CONTROL MAINTENANCE

PERIMETER SEDIMENT CONTROL PRACTICES: WHEN SEDIMENT REACHES 1/2 THE HEIGHT OF THE BMP, THE SEDIMENT MUST BE REMOVED WITHIN 24 HOURS. IF PERIMETER SEDIMENT CONTROL HAS BEEN DAMAGED OR IS NOT FUNCTIONING PROPERLY, IT MUST BE REPAIRED AND/OR REPLACED WITHIN 24 HOURS. PERIMETER BMP MEASURES MAY INCLUDE SILT FENCING.

CONSTRUCTION SITE VEHICLE EXIT LOCATIONS: ALL TRACKED SEDIMENT ONTO PAVED SURFACES MUST BE REMOVED WITHIN 24 HOURS OF DEPOSITION OR MORE FREQUENTLY IF REQUIRED BY CITY OR WATERSHED.

CONSTRUCTION SITE DEWATERING: SITE WATER DISCHARGE DUE TO CONSTRUCTION DEWATERING OPERATIONS SHALL BE MONITORED FOR SEDIMENTATION AND TREATED PRIOR TO DISCHARGE. TREATMENT OF DEWATERING DISCHARGE MAY BE ACCOMPLISHED BY TEMPORARY SEDIMENTATION BASINS OR OTHER APPROPRIATE BMPS.

NOTE:
THE STORM WATER POLLUTION PREVENTION PLAN FOR THIS PROJECT INCLUDES THE CIVIL ENGINEERING PLANS AND THE PROJECT MANUAL.

CONTRACTOR TO SUPPLY CONSTRUCTION PHASING NARRATIVE, ESTIMATED PRELIMINARY QUANTITIES OF ALL EROSION PREVENTION AND SEDIMENT CONTROL BMP'S ANTICIPATED AT THE START OF THE PROJECT, AND THE LOCATION OF THE BMP'S. THE LOCATION OF AREAS WHERE CONSTRUCTION WILL BE PHASED TO MINIMIZE DURATION OF EXPOSED SOIL AREAS. CONTRACTOR IS TO REVIEW MINNESOTA POLLUTION CONTROL AGENCY'S INSTRUCTIONS FOR THE APPLICATION FOR MINNESOTA'S NPDES/SDS GENERAL STORMWATER PERMIT FOR CONSTRUCTION ACTIVITY PRIOR TO SUBMITTING APPLICATION.

INSPECTIONS

EXPOSED SOIL AREAS: ONCE EVERY 7 DAYS AND WITHIN 24 HOURS FOLLOWING A 1/2 INCH OVER 24 HOURS RAIN EVENT.

STABILIZED AREAS: ONCE EVERY 30 DAYS.

FROZEN GROUND: AS SOON AS RUNOFF OCCURS OR PRIOR TO RESUMING CONSTRUCTION.

RECORDS: A COPY OF THE GRADING, DRAINAGE, EROSION CONTROL PLAN, INSPECTION DATA & SWPPP PLAN AT BUILD AT THE INSPECTIONS/MAINTENANCE LOGS ARE TO BE KEPT EITHER IN THE FIELD OFFICE, INSPECTOR'S VEHICLE OR CONTRACTOR'S VEHICLE.

OTHER NOTES:

1. LONG TERM MAINTENANCE OF THE SITE WILL BE PERFORMED BY THE OWNER, XXXXX. INCLUDED MAINTENANCE FOR STORMWATER DRAINS SHALL BE:
   1.1. INSPECT SUMP CATCH BASINS ON A MONTHLY BASIS, ONCE IN THE SPRING AND ONCE IN THE FALL.
   1.2. REMOVE SILT AND DEBRIS OF SEDIMENT AND DEBRIS ANNUALLY OR WHEN SEDIMENTS FILL 1/ OF THE STORAGE DEPTH.
   1.3. ADDITIONAL LONG TERM MAINTENANCE MEASURES.
2. THIS SWPPP DOCUMENT HAS BEEN PREPARED BY SKBM ENGINEERS. A COPY OF THIS EROSION AND SEDIMENT CONTROL PROGRAM DOCUMENTATION IS AVAILABLE UPON REQUEST.
3. THIS SWPPP DOCUMENT MUST BE AMENDED AS NECESSARY DURING CONSTRUCTION IN ORDER TO KEEP IT CURRENT WITH THE POLLUTANT CONTROL MEASURES UTILIZED AS THE SITE. THE SITE MAP SHOWING LOCATIONS OF ALL STORM WATER CONTROLS MUST BE POSTED ON THE SITE AND UPDATED TO REFLECT THE PROGRESS OF CONSTRUCTION.

POLLUTION PREVENTION MANAGEMENT MEASURES

SOLID WASTE DISPOSED PROPERLY: COMPLY WITH MPCA REQUIREMENTS.

HAZARDOUS WASTE STORED SECONDARY CONTAINMENT, RESTRICTED ACCESS AND DISPOSED IN COMPLIANCE WITH MPCA REQUIREMENTS.

EXTERNAL WASHING OF TRUCKS AND OTHER CONSTRUCTION VEHICLES MUST BE LIMITED TO A DEFINED AREA OF THE SITE. RUNOFF MUST BE CONTAINED AND WASTE PROPERLY DISPOSED.

NO ENGINE DEGREASING ALLOWED ON-SITE.

CONCRETE WASHOUT ON-SITE: ALL LIQUID AND SOLID WASTES GENERATED BY CONCRETE WASHOUT OPERATIONS MUST BE CONTAINED IN A LEAK-PROOF CONTAINMENT FACILITY OR IMPERVIOUS LINER. A COMPACTED CLAY LINER THAT DOES NOT ALLOW LEACHES TO ENTER GROUND WATER IS CONSIDERED AN IMPERVIOUS LINER. THE LIQUID AND SOLID WASTES MUST BE KEPT IN THE CONCRETE WASHOUT FACILITY UNTIL THEY ARE DISPOSED. THE CONCRETE WASHOUT OPERATIONS OF AREAS, LIQUID AND SOLID WASTES MUST BE DISPOSED OF PROPERLY AND IN COMPLIANCE WITH MPCA REGULATIONS. A SIGN MUST BE INSTALLED ADJACENT TO EACH WASHOUT FACILITY TO INFORM CONCRETE EQUIPMENT OPERATORS TO UTILIZE THE PROPER FACILITIES. THE CONCRETE WASHOUT AREA INDICATED ON THE PLANS IS SHOWN AS AN APPROXIMATE LOCATION. PRIOR TO THE START OF CONSTRUCTION, THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION IN ACCORDANCE WITH MPCA REQUIREMENTS.

FINAL STABILIZATION

STABILIZATION BY UNIFORM PERENNIAL VEGETATIVE COVER (70% DENSITY)

DRAINAGE DITCHES STABILIZED.

ALL TEMPORARY SYNTHETIC AND STRUCTURAL BMP'S REMOVED.

CLEAN OUT SEDIMENT FROM CONVEYANCES AND SEDIMENTATION BASINS (RETURN TO DESIGN CAPACITY).

GRADING & SOILS

BASED ON SOIL BORING PROVIDED BY XXXXX: THE FOLLOWING SOILS ARE ANTICIPATED TO BE ONSITE AT THE DEPTH SPECIFIED BELOW GRADE:

0-5 FEET – FILL WITH SOME CLAYEY EARTH
5-7 FEET – SP SAND WITH SOME SILT CLAYS

REFER TO THE GEOTECHNICAL REPORT FOR ADDITIONAL INFORMATION.

AGENCY CONTACTS

CITY OF ST PAUL
ENGINEERING DEPARTMENT
1900 RICE STREET
ST PAUL, MINNESOTA 55113
PHONE: (651) 266-6070

MINNESOTA POLLUTION CONTROL AGENCY
520 LAFAYETTE ROAD
SAINT PAUL, MN 55155
PHONE: (651) 296-6300

LOWER MISSISSIPPI RIVER WATERSHED MANAGEMENT ORGANIZATION
JOE BANITT
4198 210TH ST. W. #102
FARMINGTON, MN 55024

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Minneapolis, MN 55429
P: 763-843-0420

Landscape:
Calyx Design Group
1053 W. Berkely Ave.
St. Paul, MN 55105
P: 651.334.5495

Structural:

MEP:

Project: West Side Flats - Phase 3A

Owner: Sherman Associates
333 Park Avenue South, Suite 201
Minneapolis, Minnesota 55415

Project Number 1519

Date Site Review 4.23.2015

NOT FOR CONSTRUCTION

Rev. No. | Revision | Date

STORM WATER POLLUTION PREVENTION PLAN

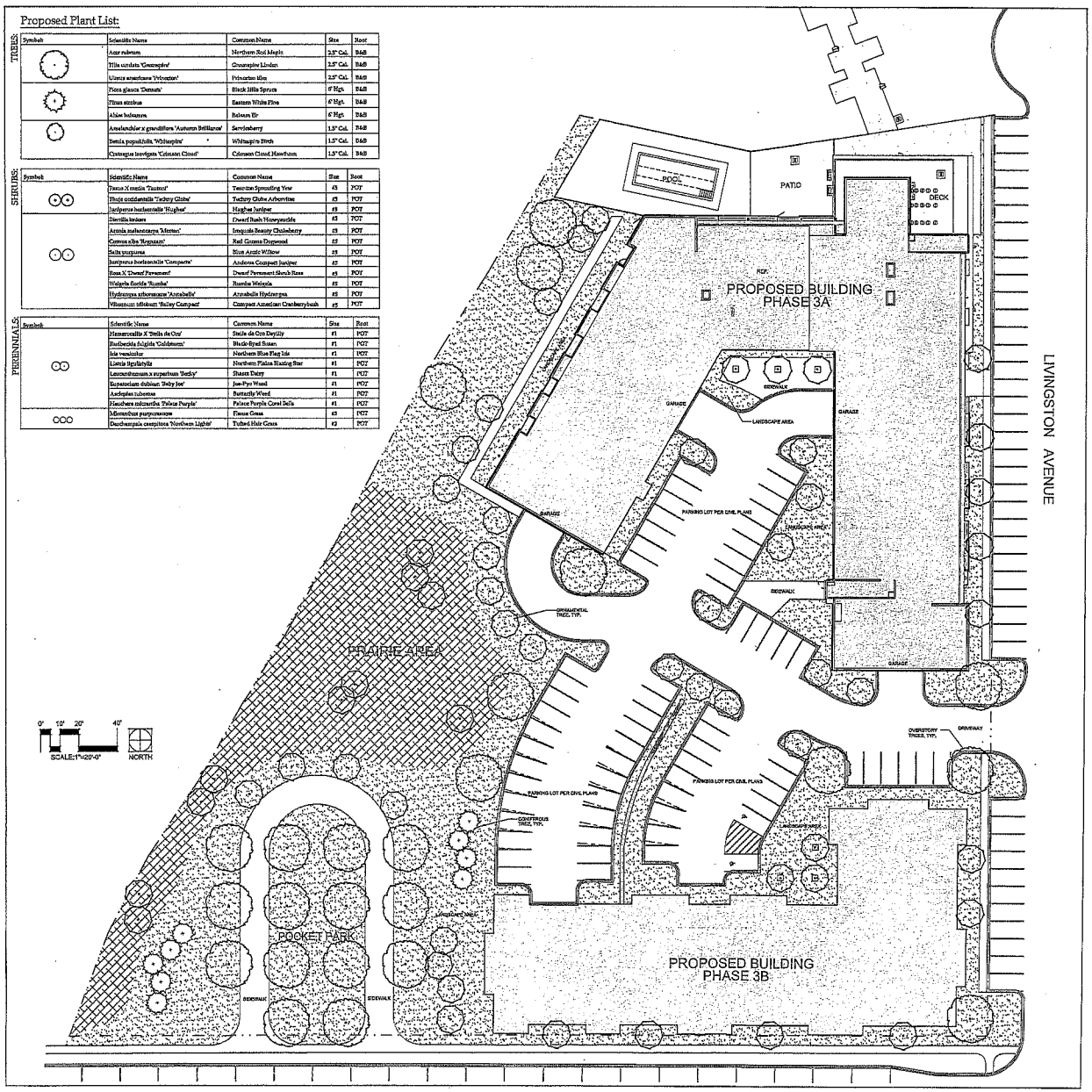
C5.0

Proposed Plant List:

	Symbol	Scientific Name	Common Name	Size	Root
TREES		Acer rubrum	Northern Red Maple	2.5" Cal.	B&B
		Tilia cordata 'Greenspire'	Greenspire Linden	2.5" Cal.	B&B
		Ulmus americana 'Princeton'	Princeton Elm	2.5" Cal.	B&B
		Picea glauca 'Densata'	Black Hills Spruce	6' Hgt.	B&B
		Pinus strobus	Eastern White Pine	6' Hgt.	B&B
		Abies balsamea	Balsam Fir	6' Hgt.	B&B
		Amelanchier x grandiflora 'Autumn Brilliance'	Serviceberry	1.5" Cal.	B&B
		Betula papyrifera 'Whitespire'	Whitespire Birch	1.5" Cal.	B&B
		Crataegus lavallei 'Crimson Cloud'	Crimson Cloud Hawthorn	1.5" Cal.	B&B

	Symbol	Scientific Name	Common Name	Size	Root
SHRUBS		Taxus X media 'Tauntoni'	Taunton Spreading Yew	#5	POT
		Thuja occidentalis 'Techny Globe'	Techny Globe Arborvitae	#5	POT
		Juniperus horizontalis 'Hughes'	Hughes Juniper	#5	POT
		Diervilla lonicera	Dwarf Bush Honeysuckle	#3	POT
		Aronia melanocarpa 'Morton'	Iroquois Beauty Chokeberry	#3	POT
		Cornus alba 'Kesselringii'	Red Osier Dogwood	#3	POT
		Salix purpurea	Blue Arctic Willow	#3	POT
		Juniperus horizontalis 'Compacta'	Andorra Compact Juniper	#5	POT
		Rosa X 'Dwarf Pavement'	Dwarf Pavement Shrub Rose	#5	POT
		Weigela florida 'Rumba'	Rumba Weigela	#5	POT
		Hydrangea arborescens 'Annabelle'	Annabelle Hydrangea	#5	POT
		Viburnum trilobum 'Bailey Compact'	Compact American Cranberrybush	#5	POT

	Symbol	Scientific Name	Common Name	Size	Root
PERENNIALS		Hemerocallis X 'Stella de Oro'	Stella de Oro Daylily	#1	POT
		Rudbeckia fulgida 'Goldsturm'	Black-Eyed Susan	#1	POT
		Iris versicolor	Northern Blue Flag Iris	#1	POT
		Liatris ligulistylis	Northern Plains Blazing Star	#1	POT
		Leucanthemum x superbum 'Becky'	Shasta Daisy	#1	POT
		Eupatorium dubium 'Baby Joe'	Joe-Pye Weed	#1	POT
		Asclepias tuberosa	Butterfly Weed	#1	POT
		Heuchera micrantha 'Palace Purple'	Palace Purple Coral Bells	#1	POT
		Miscanthus purpurascens	Fawn Grass	#2	POT
		Deschampsia cespitosa 'Northern Lights'	Tufted Hair Grass	#2	POT



PRELIMINARY LANDSCAPE MASTER PLAN

Landscape Plan Notes:

1. Tree saucer mulch to be four inches (4") depth natural single-shred hardwood mulch for trees outside of a plant bed. Install per tree planting detail.
2. By submitting a bid, the contractor attests that they personally walked the site and understand the existing conditions as they relate to the new improvements shown. No change orders will be considered for claims of 'unknown existing conditions' or similar, above grade.
3. All plant material shall comply with the latest edition of the American Standard for Nursery, American Association of Nurserymen. Unless noted otherwise, deciduous shrubs shall have at least 5 canes at the specified shrub height. Plant material shall be delivered as specified.
4. Plan takes precedence over plant schedule if discrepancies in quantities exist.
5. All proposed plants shall be tended and mulched as shown.
6. Adjustment in location of proposed plant material may be required in field. Should an adjustment be required, the client will provide field approval. Significant changes may require city review and approval.
7. The project landscape contractor shall be held responsible for watering and properly handling all plant materials brought on the site both before and after installation. Schedule plant deliveries to minimize with expected installation time within 24 hours.
8. All plant materials shall be fertilized upon installation as specified.
9. The landscape contractor shall provide the owner with a watering schedule appropriate to the project site conditions and to plant material growth requirements.
10. If the landscape contractor is uncertain or perceives any deficiencies in the plant selections, soil conditions, drainage or any other site condition that might negatively affect plant establishment, survival or guarantee, they must bring these deficiencies to the attention of the landscape architect & client prior to bid submittal.
11. Contractor shall establish to his/her satisfaction that soil and composition conditions are adequate to allow for proper drainage at and around the building site.
12. Contractor is responsible for ongoing maintenance of all newly installed material until time of owner acceptance. Any made of vandalism or damage which may occur prior to owner acceptance shall be the responsibility of the installation. Contractor shall provide the owner with a maintenance program including, but not limited to, pruning, fertilizing and disease/pest control.
13. The contractor shall guarantee newly planted material through one calendar year from the date of written owner acceptance. Plants that exhibit more than 10% die-back damage shall be replaced at no additional cost to the owner. The contractor shall also provide adequate tree wrap and deer/rodent protection measures to the plantings during the warranty period.
14. This layout plan constitutes our understanding of the existing conditions. Contractor shall inspect the site prior to bid submittal and verify existing conditions to their own satisfaction. Submittal of a bid constitutes acceptance of existing conditions.
15. The landscape contractor shall be responsible for obtaining any permits and coordinating inspections as required throughout the work process.
16. Plant size & species substitutions must be approved in writing prior to acceptance in the field.
17. All edger shall be professional grade black steel edger, 1/8" thick, Ryerson or Equal. Anchor every 18" on center (minimum). Install straight.
18. Landscape Contractor is responsible for coordination with the Owner to protect the new and existing improvements on and off-site during landscape work activities. Repair any damage to the Owner immediately.
19. Install 2" depth bed/tree/shrub mulch (1" dia) with weed mat in all plant beds. Do not install weed mat under perennial plantings.
20. Protect existing conditions to remain and repair any damage outside the construction limits to the general contractor immediately.
21. All sod areas shall be prepared prior to planting with a hard rake to provide a fine planting bed free of stones, sticks, construction debris, etc. Any alternate seed mixtures, mins, & application method other shall be submitted to the landscape architect for approval. Sod areas outside plant bed limits disturbed by work within the scope of this project phase.
22. Remove all excavation materials from the site the same day removal occurs. Stockpiling is not allowed.
23. The Landscape Contractor shall furnish samples of all landscape materials for approval prior to installation.
24. The Landscape Contractor shall indicate the cost to provide a new, complete irrigation system.
25. The landscape contractor shall contact Gopher State One Call no less than 48 hours before digging, for field utility locations.
26. The landscape contractor shall be responsible for coordinating site staging location with Owner to minimize impact on parking and circulation.
27. Trees noted as existing shall remain unless noted as being removed.

Design Development Landscape Planting Legend:

- Proposed 2.5" Cal. Deciduous Overstory Tree
- Proposed 8' Hgt. Coniferous Tree
- Proposed 1.5" Cal. Deciduous Ornamental Tree
- Proposed 5 gal. Coniferous Shrub
- Proposed 5 gal. Deciduous Shrub
- Proposed 3 gal. Perennial Grass
- Proposed 1 gal. Perennial Plant

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Landscape Architecture:
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Phone: (651) 334-5488

Project: West Side Flats Phase 3A

Owner: Sherman Associates
2233 Park Avenue South, Suite 201
Minneapolis, Minnesota 55404

Project Number 1519

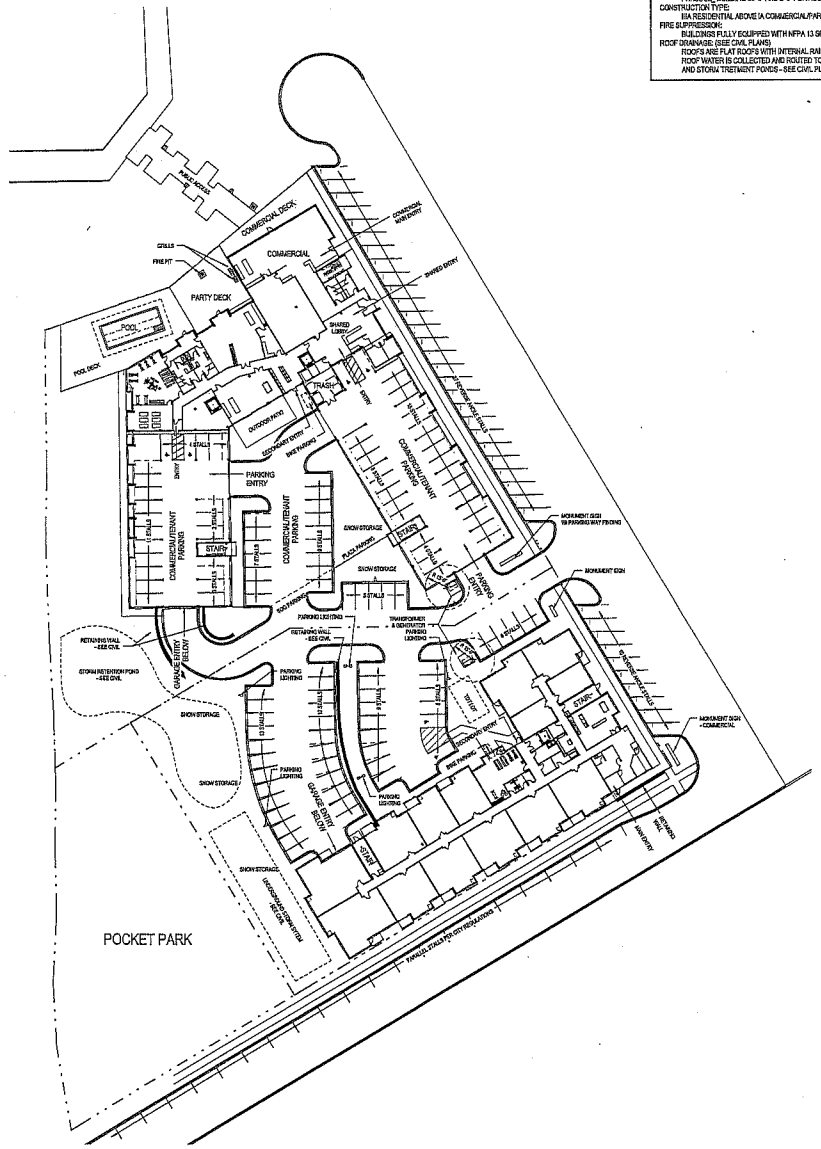
Date Site Review 4.23.2015

Rev. No.	Revision	Date
-		

PRELIMINARY LANDSCAPE PLAN

L100

GENERAL NOTES:
BUILDING HEIGHTS: (SEE BUILDING ELEVATIONS)
PHASE 3A, BUILDING 69'-4" AND 4'-4" FOR ACCENT LOCATIONS
PHASE 3B, BUILDING 86'-4" AND 2'-4" FOR ACCENT LOCATIONS
CONSTRUCTION TYPE:
IIIA RESIDENTIAL ABOVE IA COMMERCIAL/PARKING
FIRE SUPPRESSION:
BUILDINGS FULLY EQUIPPED WITH NFPA 13 SPRINKLERS
ROOF DRAINAGE: (SEE CIVIL PLANS)
ROOFS ARE FLAT ROOFS WITH INTERNAL RAIN WATER LEADERS.
ROOF WATER IS COLLECTED AND ROUTED TO STROM RETENTION AND STORM TRETMENT POINTS - SEE CIVIL PLANS



1 Site Plan
1" = 30'-0"

N

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Structural:

MEP:

Project: West Side Flats - Phase 3A and 3B
Livingston Ave & Fillmore Ave.

Owner: Sherman Associates
333 Park Avenue South, Suite 201
Minneapolis, Minnesota 55415

Project Number 1518
Date Site Review 4.23.2015

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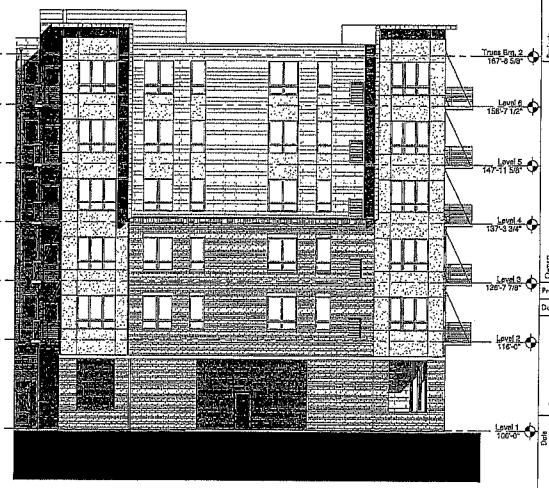
Rev. No. | Revision | Date

Architectural Site Plan - 3A & 3B
1" = 30'-0"
A120

1 Exterior Elevation - East
1/8" = 1'-0"

2 Exterior Elevation - North
1/8" = 1'-0"



3 Exterior Elevation - South 3
1/8" = 1'-0"

Exterior Material Key

- = CONCRETE FIBER BOARD PANEL RAINSCREEN SIDING 1 (COLOR: TBD)
- = CONCRETE FIBER BOARD PANEL RAINSCREEN SIDING 2 (COLOR: TBD)
- = METAL PANEL SIDING 1 (COLOR: TBD)
- = METAL PANEL SIDING 2 (COLOR: TBD)
- = ROOFFACE BLOCK (COLOR: TBD)
- = ARCHITECTURAL CONCRETE BLOCK (COLOR: TBD)
- = BRICK (COLOR: TBD)
- = BRICK SOLDIER COURSE (COLOR: TBD)
- = PRECAST STONE SILL/LINTEL (COLOR: TBD)

EXTERIOR ELEVATION NOTES

1. SEE DRAWING SHEETS A641 FOR WINDOW HEAD, JAMB AND SILL DETAILS.
2. SEE A620-A630 FOR EXTERIOR WALL DETAILS.
3. ALL DIMENSIONS AT EXTERIOR WALLS ARE TAKEN TO EXTERIOR FACE OF MASONRY AT CMU WALLS OR CENTER OF STUD AT FRAMED WALLS UNLESS NOTED OTHERWISE.
4. SEE SHEETS A620-A630 FOR INTERIOR AND EXTERIOR WALL TYPES.
5. EXPANSION JOINTS REQUIRED AT MASONRY WALLS EVERY 30'-0" (REGARDLESS IF SHOWN ON ELEVATION OR NOT SHOWN ON ELEVATION, SEE SHEET A633.
6. PROVIDE BRICK EXPANSION JOINTS AT ALL MASONRY INSIDE CORNERS, SEE SHEET A633.
7. ALL WINDOWS IN BRICK TO HAVE STONE SILLS.
8. FOR VERTICAL JOINTS OF DISSIMILAR MATERIALS CONTACT ARCHITECT.
9. COMPLY WITH FLASHING DETAILS ON SHEETS A630-A633, A634-A639 FOR ROOF.

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Calyx Design Group
1583 W. Berkely Ave.
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Structural:

MEP:

Project: West Side Flats - Phase 3A and 3B
Livingstone Ave & Fillmore Ave.

Owner: Sherman Associates
233 Park Avenue South, Suite 201
Minneapolis, Minnesota 55415

Project Number 1519

Date Site Review 4.23.2015

NOT FOR CONSTRUCTION

Date

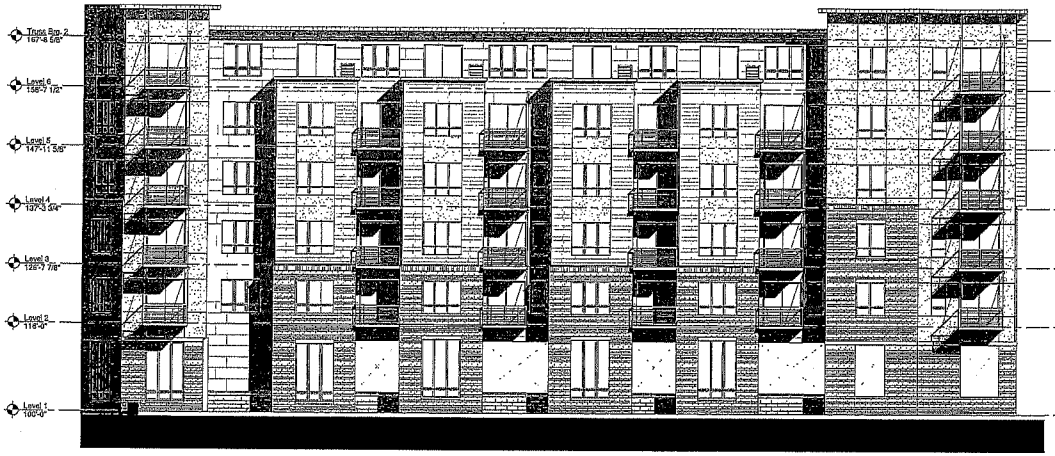
Revision

Rev. No.

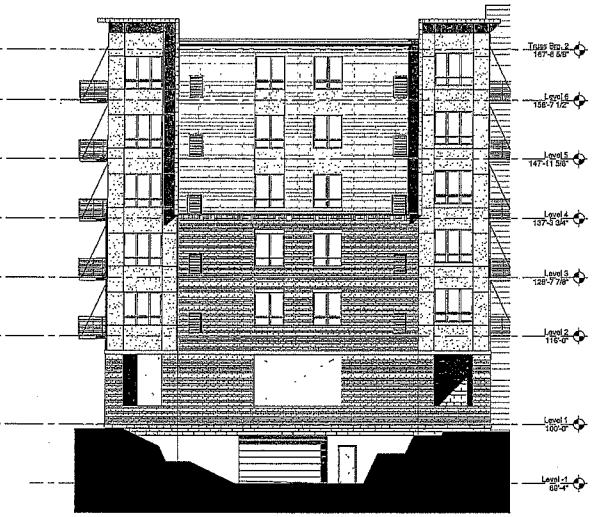
Exterior Elevations - 3A

As indicated

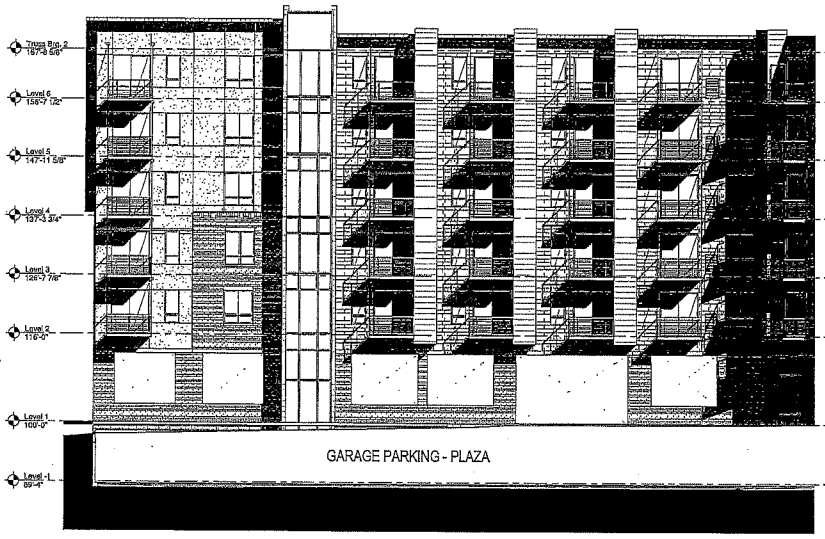
A500



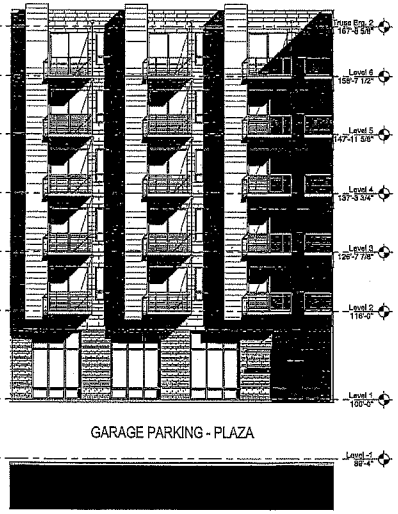
1 Exterior Elevation - West
1/8" = 1'-0"



2 Exterior Elevation - South 1
1/8" = 1'-0"



4 Exterior Elevation - Courtyard East
1/8" = 1'-0"



3 Exterior Elevation - South 2
1/8" = 1'-0"

Exterior Material Key

- = CONCRETE FIBER BOARD PANEL RAINSCREEN SIDING 1 (COLOR: TBD)
- = CONCRETE FIBER BOARD PANEL RAINSCREEN SIDING 2 (COLOR: TBD)
- = METAL PANEL SIDING 1 (COLOR: TBD)
- = METAL PANEL SIDING 2 (COLOR: TBD)
- = RDSPACE BLOCK (COLOR: TBD)
- = ARCHITECTURAL CONCRETE BLOCK (COLOR: TBD)
- = BRICK (COLOR: TBD)
- = BRICK SOLDIER COURSE (COLOR: TBD)
- = PRECAST STONE SILL/LINTEL (COLOR: TBD)

EXTERIOR ELEVATION NOTES

1. SEE DRAWING SHEETS A941 FOR WINDOW HEAD, JAMB AND SILL DETAILS.
2. SEE A530-A533 FOR EXTERIOR WALL DETAILS.
3. ALL DIMENSIONS AT EXTERIOR WALLS ARE MADE TO EXTERIOR FACE OF STUDS AT STUD WALLS OR CENTER OF STUD AT FRAMED WALLS UNLESS NOTED OTHERWISE.
4. SEE SHEETS A500-A503 FOR INTERIOR AND EXTERIOR WALL TYPES.
5. EXPANSION JOINTS REQUIRED AT MASONRY WALLS EVERY 30'-0" (REGARDLESS IF SHOWN ON ELEVATION OR NOT SHOWN ON ELEVATION, SEE SHEET A503.
6. PROVIDE BRICK EXPANSION JOINTS AT ALL MASONRY INSIDE CORNERS, SEE SHEET A503.
7. ALL WINDOWS IN BRICK TO HAVE STONE SILLS.
8. FOR VERTICAL JOINTS OF DISSIMILAR MATERIALS CONTACT ARCHITECT.
9. COMPLY WITH FLASHING DETAILS ON SHEETS A531-A535, A534-A536 FOR ROOF.
10. GEODETIC ELEVATION (MSL) FROM CIVIL PLANS = 100'-0" BY ARCHITECTURAL PLANS

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Structural:

MEP:

Project:
West Side Flats - Phase 3A and 3B
Livingstone Ave & Filmore Ave.

Owner:
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500 Park Avenue South, Suite 501
Minneapolis, Minnesota 55415

Project Number 1519

Date	Revision	Rev. No.
Site Review 4.23.2015		

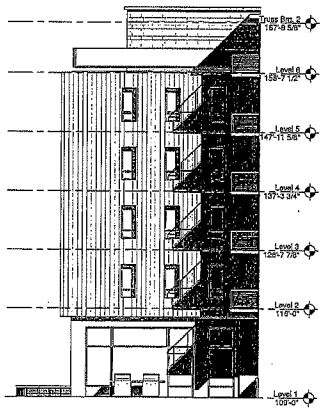
NOT FOR CONSTRUCTION

Exterior Elevations - 3A

As indicated

A501

3 Exterior Elevation - Courtyard West
1/8" = 1'-0"



1 Exterior Elevation - West 2
1/8" = 1'-0"

Exterior Material Key

- = CONCRETE FIBER BOARD PANEL, RAINSCREEN SIDING 1 (COLOR: TBD)
- = CONCRETE FIBER BOARD PANEL, RAINSCREEN SIDING 2 (COLOR: TBD)
- = METAL PANEL SIDING 1 (COLOR: TBD)
- = METAL PANEL SIDING 2 (COLOR: TBD)
- = ROCKFACE BLOCK (COLOR: TBD)
- = ARCHITECTURAL CONCRETE BLOCK (COLOR: TBD)
- = BRICK (COLOR: TBD)
- = BRICK SOLDIER COURSE (COLOR: TBD)
- = PRECAST STONE SILL/LINTEL (COLOR: TBD)

EXTERIOR ELEVATION NOTES

1. SEE DRAWING SHEETS A641 FOR WINDOW HEAD, JAMB AND SILL DETAILS.
2. SEE A630-A633 FOR EXTERIOR WALL DETAILS.
3. ALL DIMENSIONS AT EXTERIOR WALLS ARE TAKEN TO EXTERIOR FACE OF MASONRY AT CMU WALLS OR CENTER OF STUD AT FRAMED WALLS UNLESS NOTED OTHERWISE.
4. SEE S-SERIES A600-A633 FOR INTERIOR AND EXTERIOR WALL TYPES.
5. EXPANSION JOINTS REQUIRED AT MASONRY WALLS EVERY 30'-0" (REGARDLESS IF SHOWN ON ELEVATION OR NOT SHOWN ON ELEVATION), SEE SHEET A633.
6. TRIM OVER BRICK EXPANSION JOINTS AT ALL MASONRY INSIDE CORNERS, SEE SHEET A633.
7. ALL WINDOWS IN BRICK TO HAVE STONE SILLS.
8. FOR VERTICAL JOINTS OF DIS-SIMILAR MATERIALS CONTACT ARCHITECT.
9. COMPLY WITH FLASHING DETAILS ON S-SERIES A650-A633, A634-A633 FOR ROOF.

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Structural:

MEP:

Project: West Side Flats - Phase 3A and 3B
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Minneapolis, Minnesota 55415

Project Number 1516

Date Site Review 4.23.2015

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Date

Revision

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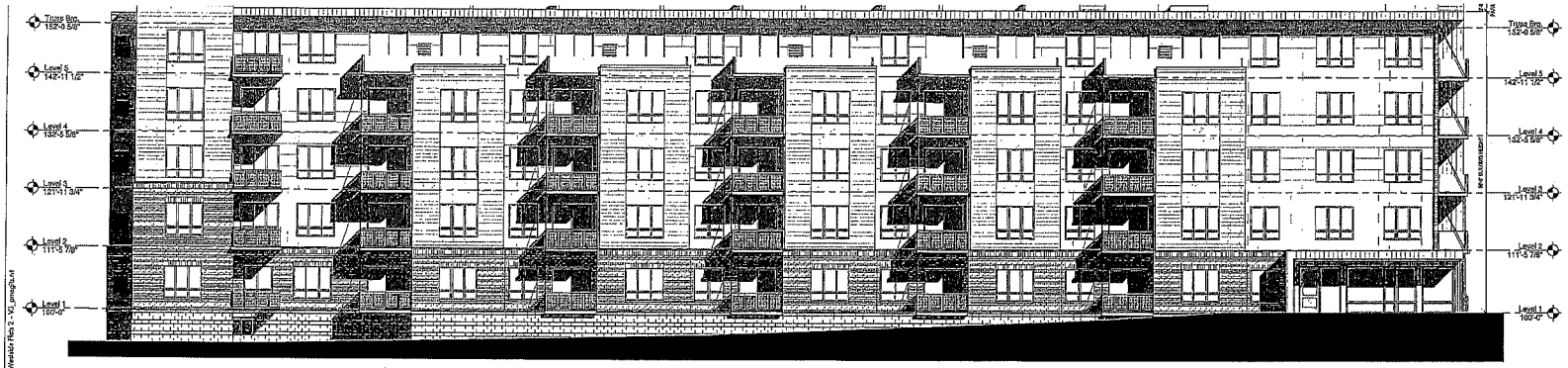
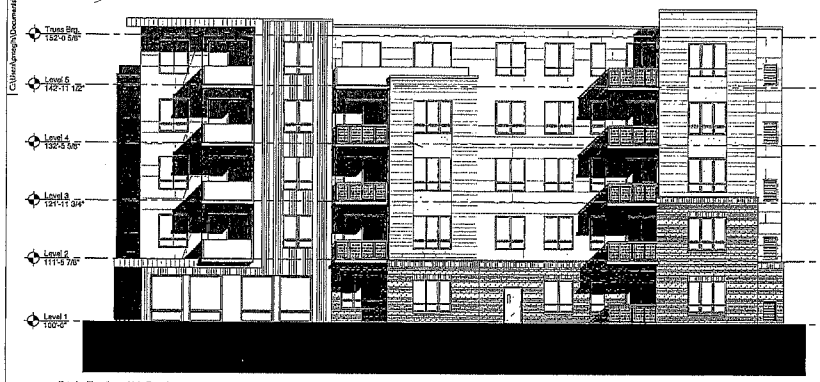
Exterior Elevations - 3A

As Indicated

A502



1 Exterior Elevations - Main Entry 1
1/8" = 1'-0"



2 Exterior Elevations - Main Entry 2
1/8" = 1'-0"

3 Exterior Elevations - Courtyard 1
1/8" = 1'-0"

4 Exterior Elevations - Courtyard 2
1/8" = 1'-0"

Exterior Material Key

- = CONCRETE FIBER BOARD PANEL RAINSCREEN SIDING 1 (COLOR: TBD)
- = CONCRETE FIBER BOARD PANEL RAINSCREEN SIDING 2 (COLOR: TBD)
- = METAL PANEL SIDING 1 (COLOR: TBD)
- = METAL PANEL SIDING 2 (COLOR: TBD)
- = ROCKFACE BLOCK (COLOR: TBD)
- = ARCHITECTURAL CONCRETE BLOCK (COLOR: TBD)
- = BRICK (COLOR: TBD)
- = BRICK SOLDIER COURSE (COLOR: TBD)
- = PRECAST STONE SILL/LINTEL (COLOR: TBD)

EXTERIOR ELEVATION NOTES

1. SEE DRAWING SHEETS A541 FOR WINDOW HEAD, JAMB AND SILL DETAILS.
2. SEE A500-A533 FOR EXTERIOR WALL DETAILS.
3. ALL DIMENSIONS AT EXTERIOR WALLS ARE TAKEN TO EXTERIOR FACE OF MASONRY AT CMU WALLS OR CENTER OF STUD AT FRAMED WALLS UNLESS NOTED OTHERWISE.
4. SEE SHEETS A600-A653 FOR INTERIOR AND EXTERIOR WALL TYPES.
5. EXPANSION JOINTS REQUIRED AT MASONRY WALLS EVERY ONE PRECAST BLOCK IF SHOWN ON ELEVATION OR NOT SHOWN ON ELEVATION, SEE SHEET A653.
6. PROVIDE BRICK EXPANSION JOINTS AT ALL MASONRY INSIDE CORNERS, SEE SHEET A653.
7. ALL WINDOWS IN BRICK TO HAVE STONE SILLS.
8. FOR VERTICAL JOINTS OF DISSIMILAR MATERIALS CONTACT ARCHITECT.
9. COMPLY WITH FLASHING DETAILS ON SHEETS A530-A532, A534-A535 FOR ROOF.
10. GEODETIC ELEVATION (MILS FROM CIVIL PLANS = 100'-0" IN ARCHITECTURAL PLANS)

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Minneapolis, MN 55429
P: 763-943-0420

Landscape:
Coler Design Group
1583 W. Berkely Ave.
St. Paul, MN 55105
P: 651.334.5498

Project:
West Side Flats - Phase 3B
Fillmore Ave. and Bonaparte Ave. St. Paul, MN

Owner:
Sherman Associates

Project Number

Date

NOT FOR CONSTRUCTION

Rev. No.	Revision	Date

Exterior Elevations - 3B

As Indicated

A503

0 82.5 165 330 495 660 Feet

FILE NAME: West Side Flats Phase 3A and 3B

Aerial

Subject Parcels

APPLICATION TYPE: CUP

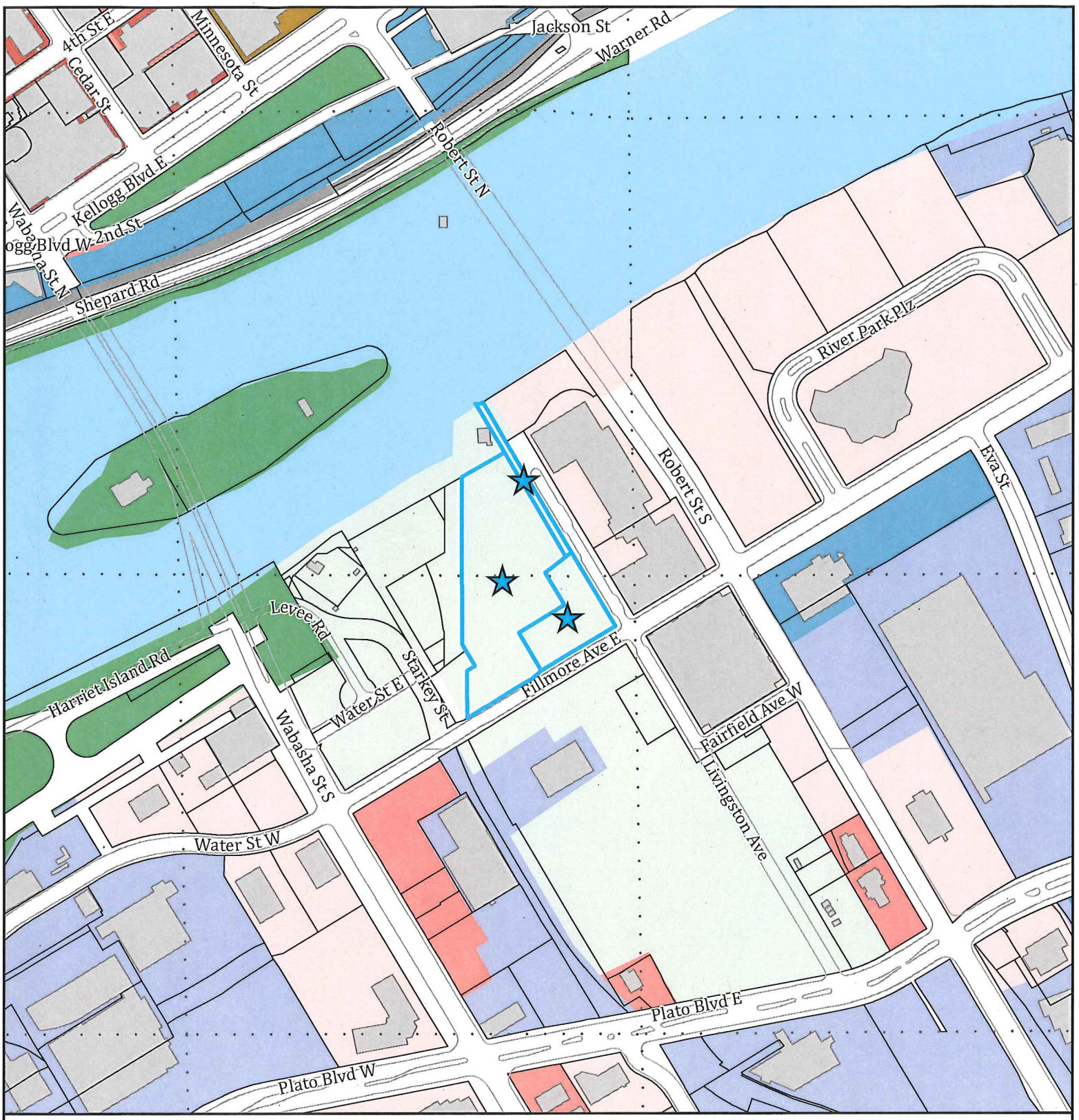
FILE #: 15-031255 DATE: 4/30/2015

PLANNING DISTRICT: 3

ZONING PANEL: 16

Saint Paul Department of Planning and Economic Development and Ramsey County

N W E S



0 82.5 165 330 495 660 Feet

FILE NAME: West Side Flats Phase 3A and 3B

APPLICATION TYPE: CUP

FILE #: 15-031255 DATE: 4/30/2015

PLANNING DISTRICT: 3

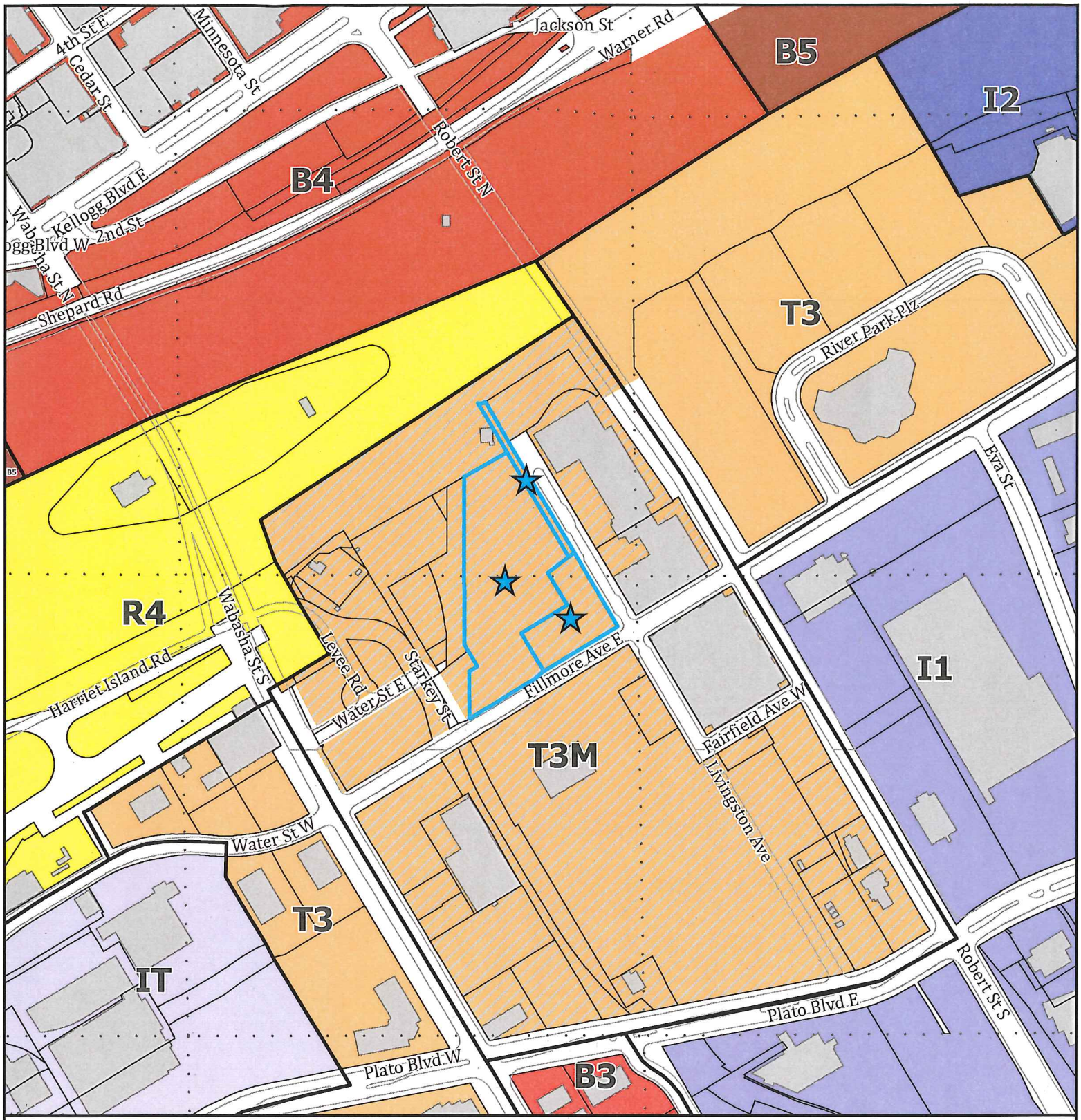
ZONING PANEL: 16

Land Use

- Office
- Retail and Other Commercial
- Mixed Use Residential
- Mixed Use Commercial and Other
- Industrial and Utility
- Institutional
- Park, Recreational or Preserve
- Railway
- Undeveloped
- Water
- Subject Parcels
- Section Lines

N W E S

Saint Paul Department of Planning and Economic Development and Ramsey County



0 82.5 165 330 495 660 Feet

FILE NAME: West Side Flats Phase 3A and 3B

APPLICATION TYPE: CUP

FILE #: 15-031255 DATE: 4/30/2015

PLANNING DISTRICT: 3

ZONING PANEL: 16

Zoning

- R4 One-Family
- T3 Traditional Neighborhood
- T3M T3 with Master Plan
- B3 General Business
- B4 Central Business
- B5 Central Business Service
- IT Transitional Industrial
- I1 Light Industrial
- I2 General Industrial
- Subject Parcels
- Section Lines

N W E S

Saint Paul Department of Planning and Economic Development and Ramsey County