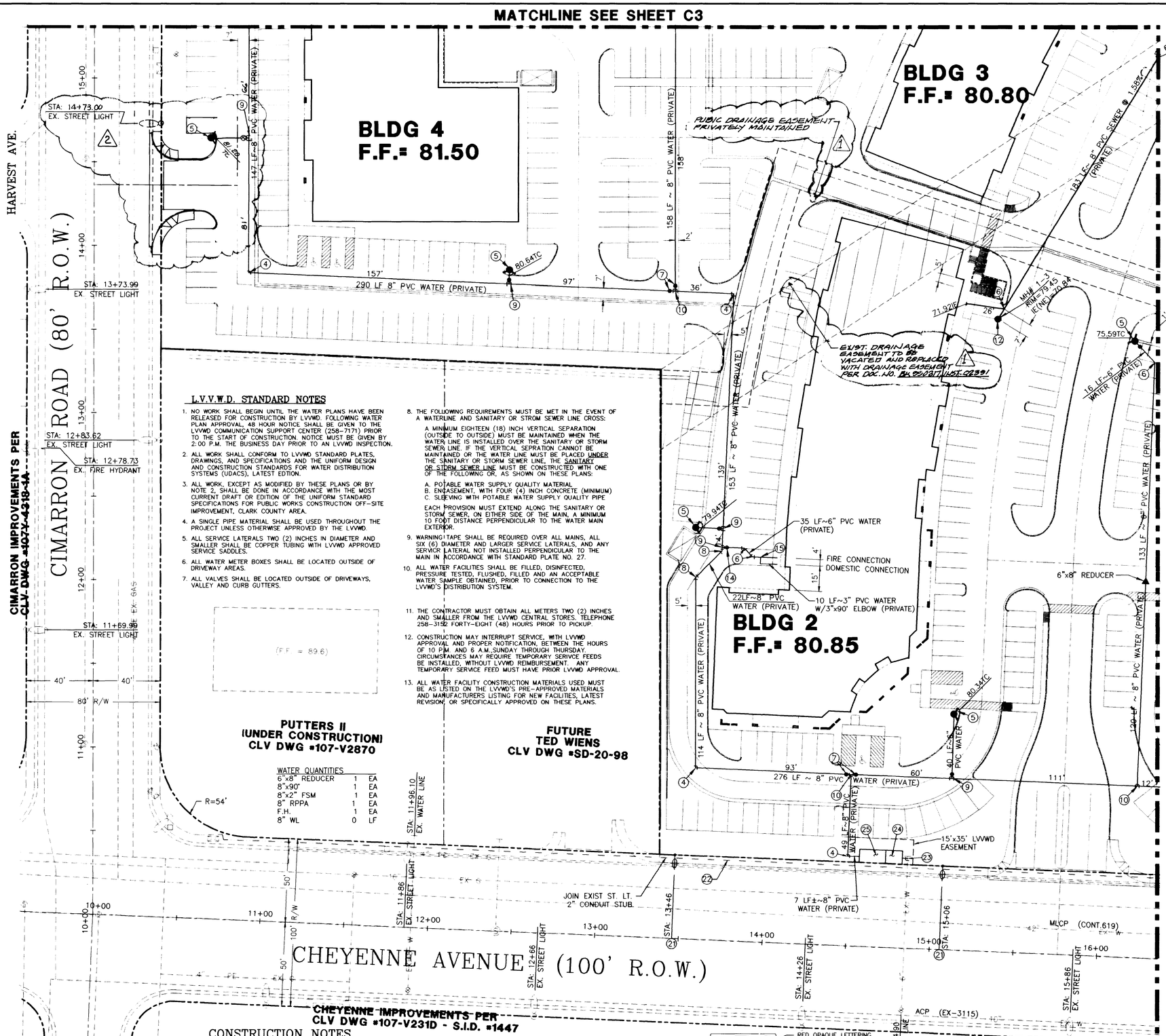


L.V.V.W.D. STANDARD NOTES

1. NO WORK SHALL BEGIN UNTIL THE WATER PLANS HAVE BEEN RELEASED FOR CONSTRUCTION BY LVVWD. FOLLOWING WATER PLAN APPROVAL, 48 HOUR NOTICE SHALL BE GIVEN TO THE LVVWD COMMUNICATION SUPPORT CENTER (258-7171) PRIOR TO THE START OF CONSTRUCTION. NOTICE MUST BE GIVEN BY 2:00 P.M. THE BUSINESS DAY PRIOR TO AN LVVWD INSPECTION.
2. ALL WORK SHALL CONFORM TO LVVWD STANDARD PLATES, DRAWINGS, AND SPECIFICATIONS AND THE UNIFORM DESIGN AND CONSTRUCTION STANDARDS FOR WATER DISTRIBUTION SYSTEMS (UDACS), LATEST EDITION.
3. ALL WORK, EXCEPT AS MODIFIED BY THESE PLANS OR BY NOTE 2, SHALL BE DONE IN ACCORDANCE WITH THE MOST CURRENT DRAFT OR EDITION OF THE UNIFORM STANDARD SPECIFICATIONS FOR PUBLIC WORKS CONSTRUCTION OFF-SITE IMPROVEMENT, CLARK COUNTY AREA.
4. A SINGLE PIPE MATERIAL SHALL BE USED THROUGHOUT THE PROJECT UNLESS OTHERWISE APPROVED BY THE LVVWD.
5. ALL SERVICE LATERALS TWO (2) INCHES IN DIAMETER AND SMALLER SHALL BE COPPER TUBING WITH LVVWD APPROVED SERVICE SADDLES.
6. ALL WATER METER BOXES SHALL BE LOCATED OUTSIDE OF DRIVEWAY AREAS.
7. ALL VALVES SHALL BE LOCATED OUTSIDE OF DRIVEWAYS, VALLEY AND CURB GUTTERS.
8. THE FOLLOWING REQUIREMENTS MUST BE MET IN THE EVENT OF A WATERLINE AND SANITARY OR STROM SEWER LINE CROSS:

   A MINIMUM EIGHTEEN (18) INCH VERTICAL SEPARATION (OUTSIDE TO OUTSIDE) MUST BE MAINTAINED WHEN THE WATER LINE IS INSTALLED OVER THE SANITARY OR STORM SEWER LINE. IF THE VERTICAL SEPRATION CANNOT BE MAINTAINED OR THE WATER LINE MUST BE PLACED UNDER THE SANITARY OR STORM SEWER LINE, THE SANITARY OR STORM SEWER LINE MUST BE CONSTRUCTED WITH ONE OF THE FOLLOWING OR, AS SHOWN ON THESE PLANS:

   A. POTABLE WATER SUPPLY QUALITY MATERIAL
   B. ENCASEMENT, WITH FOUR (4) INCH CONCRETE (MINIMUM)
   C. SLEEVING WITH POTABLE WATER SUPPLY QUALITY PIPE

   EACH PROVISION MUST EXTEND ALONG THE SANITARY OR STORM SEWER, ON EITHER SIDE OF THE MAIN, A MINIMUM 10 FOOT DISTANCE PERPENDICULAR TO THE WATER MAIN EXTERIOR.
9. WARNING! TAPE SHALL BE REQUIRED OVER ALL MAINS, ALL SIX (6) DIAMETER AND LARGER SERVICE LATERALS, AND ANY SERVICE LATERAL NOT INSTALLED PERPENDICULAR TO THE MAIN IN ACCORDANCE WITH STANDARD PLATE NO. 27.
10. ALL WATER FACILITIES SHALL BE FILLED, DISINFECTED, PRESSURE TESTED, FLUSHED, FILLED AND AN ACCEPTABLE WATER SAMPLE OBTAINED, PRIOR TO CONNECTION TO THE LVVWD'S DISTRIBUTION SYSTEM.
11. THE CONTRACTOR MUST OBTAIN ALL METERS TWO (2) INCHES AND SMALLER FROM THE LVVWD CENTRAL STORES. TELEPHONE 258-3192 FORTY-EIGHT (48) HOURS PRIOR TO PICKUP.
12. CONSTRUCTION MAY INTERRUPT SERVICE, WITH LVVWD APPROVAL AND PROPER NOTIFICATION, BETWEEN THE HOURS OF 10 P.M. AND 6 A.M. SUNDAY THROUGH THURSDAY. CIRCUMSTANCES MAY REQUIRE TEMPORARY SERVICE FEEDS BE INSTALLED, WITHOUT LVVWD REIMBURSEMENT. ANY TEMPORARY SERVICE FEED MUST HAVE PRIOR LVVWD APPROVAL.
13. ALL WATER FACILITY CONSTRUCTION MATERIALS USED MUST BE AS LISTED ON THE LVVWD'S PRE-APPROVED MATERIALS AND MANUFACTURERS LISTING FOR NEW FACILITES, LATEST REVISION, OR SPECIFICALLY APPROVED ON THESE PLANS.

WATER QUANTITIES

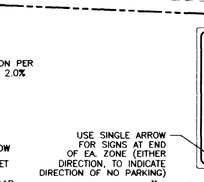
6"x8" REDUCER	1	EA
8"x90°	1	EA
8"x2" FSM	1	EA
8" RPPA	1	EA
F.H.	1	EA
8" WL	0	LF

NOTES:

1. ALL DIMENSIONS TO UTILITIES ARE TO CENTERLINE OF PIPE, BACK OF CURB, PROPERTY LINE, CENTERLINE, & BUILDING LINE, UNLESS NOTED OTHERWISE.
2. CONTRACTOR SHALL VERIFY HORIZONTAL AND VERTICAL ALIGNMENT OF EXISTING UTILITIES AND NOTIFY THE DESIGN ENGINEER IMMEDIATELY OF ANY DISCREPANCIES PRIOR TO CONSTRUCTION.
3. ALL SEWER AND WATER LATERALS ARE TO BE INSTALLED PER UPC STANDARDS FROM MAIN TO 5' FROM BUILDING.
4. ALL EXISTING UTILITY STRUCTURES WITHIN CONSTRUCTION AREA SHALL BE ADJUSTED TO MATCH FINISH GRADE (I.E. WV, BOX, WMH, ANNODE BOX, FH, TEL BOX, ETC.)
5. FOR EXACT BUILDING LATERAL CONNECTION POINTS, SEE PLUMBING PLANS.

CONSTRUCTION NOTES

4. 8" x 90° ELBOW
5. INSTALL 6" FIRE HYDRANT ASSEMBLY PER U.D.S. PLATE NO. 7
6. 6" x 45° BEND
7. 8" GATE VALVE
8. 8"x 45° BEND
9. 8"x 8" x6" TEE
10. 8" TEE
12. INSTALL 4' DIA. SMH PER CCSD STD DWG NO. SD-1
14. 6" GATE VALVE
15. 6"x6"x3" TEE
16. INSTALL 4" PVC SEWER LATERAL CONNECTION PER CCSD STD. DWG. NO. SD-17, LAY PIPE AT 2.0% MINIMUM SLOPE
21. INSTALL 250W STREET LIGHT
22. INSTALL 2" STREET LTIGHT CONDUIT
23. MAKE CONNECTION TO EXISTING 6" WATER LATERAL W/8"x6" REDUCER & 8"x90° ELBOW
24. INSTALL 8"x2" FSM, SEE DETAIL, THIS SHEET
25. INSTALL 8" RPPA PER UDACS PLATE NO. 11B



"FIRE LANE" SIGN DETAIL:

LEGEND:

CURB PAINTED RED
4" HIGH, WHITE PAINTED BLOCK LETTERS "NO PARKING FIRE LANE" ON CURB FACE OR BLOCK WALL & "FIRE LANE" NO PARKING SIGN (SEE DETAIL BELOW) @ 50' O.C. MAX

GRAPHIC SCALE

(IN FEET)
1 inch = 30 ft.

APPROVALS

CITY FIRE MARSHALL — DATE 1/27/98
LAS VEGAS VALLEY WATER DISTRICT — 1st Approval 1-28-99 — DATE 2-2-99

SEWER CONTRIBUTION

AVERAGE FLOW =17,840 GAL/DAY (178,400 SF @ 0.10 GAL/DAY/S.F.)
PEAK FLOW =58,872 GAL/DAY (3.3 PEAK FACTOR)

LAS VEGAS FIRE DEPARTMENT

FIRE FLOW IS: 3,125 GPM AT 20 PSI RESIDUAL PRESSURE

BASED ON:	LARGEST BLDG.
SQUARE FOOTAGE:	51,970 SQ. FT.
AREA BETWEEN 4-HR AREA	N/R
SEPARATION WALLS:	N/R
BUILDING HEIGHT:	35'
NUMBER OF STORIES:	1
OCCUPANCY:	V-N
FULL AUTOMATIC FIRE SYSTEM:	YES

NOTE:
ALL ON-SITE SEWERS ARE PRIVATELY OWNED AND MAINTAINED.

REDUCED PRESSURE PRINCIPLE ASSEMBLY (1) 8"

APPROVED REDUCED PRESSURE PRINCIPLE ASSEMBLY SHALL BE INSTALLED PER THE UDACS PLATE NO. 11B. NO WATER SHALL BE TAKEN FROM A SERVICE REQUIRING BACK FLOW PREVENTION UNTIL THE REDUCED PRESSURE PRINCIPLE ASSEMBLY HAS BEEN SUCCESSFULLY TESTED BY THE LVVWD.

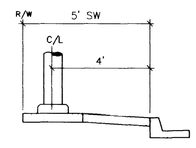
THE METER AND VAULT WITH NON-TRAFFIC BEARING COVER SHALL BE INSTALLED IN ACCORDANCE WITH UDACS PLATE NO. 21D DETAIL AND WITH UDACS STANDARD VAULT DRAWING C-475, LATEST REVISION.

GENERAL

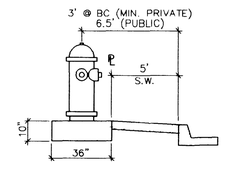
ANY BLOCK WALL OR OTHER FENCE MATERIAL SHALL BE DESIGNED AND CONSTRUCTED AROUND THE OUTSIDE OF THE EASEMENT TO ALLOW THE DISTRICT DIRECT ACCESS FROM THE ADJACENT RIGHT-OF-WAY.

NOTE: DO NOT OFFSET WALLSPOOL

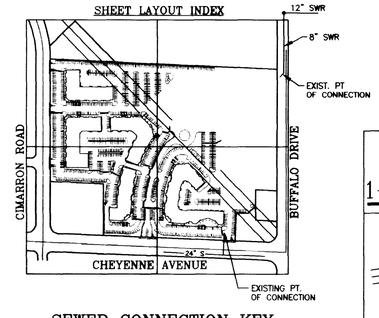
	QTY.
1. FLANGED SCHED 40 FABRICATED STEEL EPOXY COATED AND LINED WALL SPOOL, W/THRUST RING	2
2. FLANGED GATE VALVE	2
3. SENSUS 8" x 2" OR APPROVED EQUAL	1
4. FLANGED x PLAIN END SCHED 40 FABRICATED STEEL EPOXY COATED AND LINED SPOOL	2
5. SLEEVE TYPE COUPLING	1
6. INSTALL ADJUSTABLE PIPE SUPPORTS, GRINNEL NO. 264 OR APPROVED EQUAL	2



STREET LIGHT INSTALLATION
NTS



FIRE HYDRANT INSTALLATION
NTS



SEWER CONNECTION KEY

Call before you Dig. It's a Law.
1-800-227-2600

AVOID HITTING OVERHEAD POWER LINES. IT'S COSTLY
CALL BEFORE YOU DO OVERHEAD
CALL 1-702-593-6111

REV	DATE	BY	REVISION
1	12/22/98	PDS	PER LVVWD COMMENTS
2	3/4/99	PDS	ADD BBC INFO FOR FIRE & DRAINAGE EASEMENT

NORTHWEST PROPERTIES, L.L.C.
6900 WESTCLIFF DRIVE, #505
LAS VEGAS, NEVADA 89128
(702)256-3781

AGRA Infrastructure, Inc.
ENGINEERING GLOBAL SOLUTIONS
3016 W. CHARLESTON BOULEVARD, SUITE 180
LAS VEGAS, NEVADA 89102
PHONE: (702) 878-3617 FAX: (702) 878-3716

UTILITY PLAN

FLYNN GALLAGHER CORP. CENTER
NWC OF CHEYENNE AND BUFFALO
APN 138-09-801-018 & 019
CITY OF LAS VEGAS NEVADA

DRAWN BY: PAK	AUG'98
DESIGNED BY: MC/DG/MS/PAK	AUG'98
CHECKED BY: MC	AUG'98
PROJECT NO: 02-1998-067	SCALE: 1" = 30'

REGISTERED PROFESSIONAL ENGINEER MICHAEL J. GREHAN CIVIL No. 10084 STATE OF NEVADA
10/22/98

C5
5 OF 15 SHEETS
DRAWING NO. 107-V2965

J:\1998\050\98067\80067utc5.dwg Fri Oct 23 09:22:09 1998 PAK

13122 13414 15970 16646

MATCHLINE SEE SHEET C3

BLDG 4
F.F.= 81.50

BLDG 3
F.F.= 80.80

BLDG 2
F.F.= 80.85

CIMARRON ROAD (80' R.O.W.)

CHEYENNE AVENUE (100' R.O.W.)

MATCHLINE SEE SHEET C3

GRAPHIC SCALE

APPROVALS

FIRE CONNECTION

LAS VEGAS FIRE DEPARTMENT

NOTE:

UTILITY PLAN

NORTHWEST PROPERTIES, L.L.C.

AGRA Infrastructure Inc.

FLYNN GALLAGHER CORP. CENTER

CONSTRUCTION NOTES

LEGEND

FIRE LANE
ANYTIME

"FIRE LANE" SIGN DETAIL

STREET LIGHT INSTALLATION

FIRE HYDRANT INSTALLATION

FIRE CONNECTION KEY

1-800-227-2600

C5

5 x 15 sheet

97-V2966