# ROLLING HILLS SUBDIVISION-PHASE 3 CITY COUNCIL MEETING APRIL 21, 2016 PRELIMINARY PLAT ~450 SOUTH 400 EAST

**ZONING-** R-2 Residential Permitted

**UTILITIES-** Available on 400 East. A 12-inch sewer is being installed for future growth to the South & East.

**CURB AND SIDEWALKS-** In front of all lots.

**ROADS-** 68-foot ROW.

STORM WATER- Existing Storm Water Pond.

**FENCING-** None proposed.

**CANAL-** The Canal to the East will be piped as previous phase.

# **NOTES-**

This is a simple straightforward next phase for this subdivision. The City Staff and engineer have reviewed and recommend approval. The planning commission discussed the ditch piping, storm water pond, temporary turnout, etc. The ditch piping will continue up to the end of this phase. A turnout will be provided for emergency vehicles. The storm water pond is existing and will handle this phase. The planning commission unanimously recommends approval as proposed.



# Memorandum

To Ron Salvesen, Hyrum City Administrator
From Darin Hawkes, P.E.

Date April 14, 2016
CC

Subject Rolling Hills Phase 3 – Preliminary Plat Follow-up Review

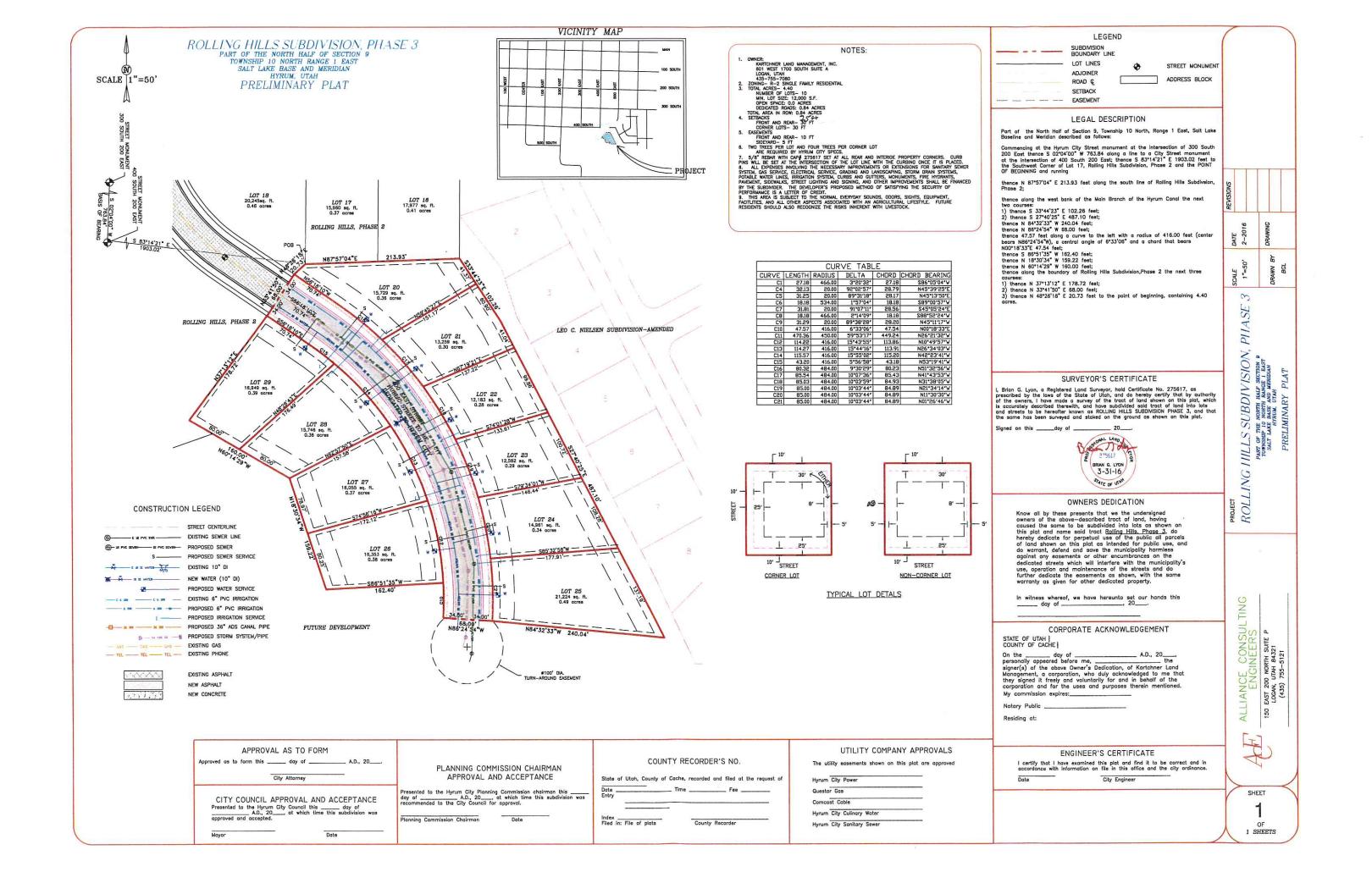
I've reviewed the following for compliance with City requirements, standard engineering practice and the previously issued review comments, dated March 31, 2016.

- Revised Rolling Hills Phase 3 Preliminary Plat prepared by Alliance Engineering. dated February, 2016 and stamped 4-11-16
- Preliminary Construction Drawings dated January 2016 and stamped 4-11-16.

With the exception of providing a construction cost estimate, It appears the developer has addressed all previous comments generated by the initial preliminary plat review.

One minor item found was a reference in the title block on Sheet 2 of 4 to "Phase 2".

It is recommended that the referenced project continue to the final platting and construction document review phase if the developer desires.



# ROLLING HILLS SUBDIVISION, PHASE 3

PART OF THE NORTHWEST QUARTER SECTION 9
TOWNSHIP 10 NORTH RANGE 1 EAST SALT LAKE BASE AND MERIDIAN HYRUM, UTAH

# INDEX SHEET

# VICINITY MAP



1 NO.	SHEET DESCRIPTION INDEX SHEET			
2	400 EAST STREET			
3	DRAINAGE PLAN			
4	ELECTRICAL PLAN			

OWNER/DEVELOPER KARTCHNER HOMES 601 W 1700 SOUTH LOGAN, UT 755-7080

CIVIL ENGINEER

ALLIANCE CONSULTING ENGINEERS, INC. 150 EAST 200 NORTH SUITE P LOGAN, UTAH 84321 435-755-5121

CITY ENGINEER AQUA ENGINEERING, INC. 533 West 2600 South Bountiful, Utah 84010 (801) 299-1327

#### GENERAL NOTES (APPLICABLE TO ALL CIVIL SHEETS)

ALL CONSTRUCTION AND MATERIALS SHALL BE IN ACCORDANCE WITH THE PROJECT SPECIFICATIONS, CITY OF HYRAX STANDARDS, STATE OF UTAH AND ANY OTHER APPLICABLE STANDARDS ISSUED BY THE CONTROLLING AGENCY.

CONTRACTOR SHALL FIELD VERIFY ALL DIMENSIONS BEFORE CONSTRUCTION. ANY DISCREPANCIES BETWEEN CONSTRUCTION DOCUMENTS AND FIELD CONDITIONS SHALL IMMEDIATELY BE BROUGHT TO THE ATTENTION OF THE OWNER.

3. CONTRACTOR SHALL REPAIR AND/OR REPLACE ANY AREAS AND/OR MATERIALS DAMAGED DURING CONSTRUCTION.

4. CONTRACTOR SHALL MAINTAIN ALL ADJACENT PROPERTY (PUBLIC & PRIVATE) FROM ALL CONSTRUCTION DEBRIS.

5. CONTRACTOR SHALL PROVIDE SMOOTH TRANSITION FROM ALL NEW CONSTRUCTION TO EXISTING CONDITIONS.

CONTRACTOR SHALL REPLACE SURVEY MONUMENTS DAMAGED DURING CONSTRUCTION. SURVEY MONUMENTS TO BE REPLACED BY A REGISTERED, LICENSED LAND SURVEYOR.

8. CONTRACTOR TO LOCATE ALL EXISTING UTILITIES, INCLUDING FIBER OPTIC. ANY DAMAGES TO EXISTING UTILITIES WILL BE REPAIRED AT CONTRACTORS EXPENSE.

9. DIMENSIONS SHOWN ARE TO THE CENTER OF THE PIPELINE UNLESS OTHERWISE NOTED.

10. DISTANCES SHOWN ALONG PIPELINES ARE HORIZONTAL DISTANCES AND NOT ACTUAL PIPE LENGTHS. MORE PIPE MAY BE REQUIRED TO COMPLETE CONSTRUCTION THAN IS DIMENSIONED IN THE PLANS.

12. CONTRACTOR IS REQUIRED TO HAVE A SET OF APPROVED PLANS ON THE SITE AT ALL TIMES. ANY WORK COMPLETED WITHOUT A SET PRESENT IS DONE SO AT THE CONTRACTORS RISK AND EXPENSE IF ERRORS OCCUR.

13. CONTRACTOR IS RESPONSIBLE FOR PROVIDING WATER NECESSARY FOR DUST ABATEMENT, COMPACTING, ETC.

14. THE CONTRACTOR SHALL BE RESPONSIBLE FOR SECURING SOURCES FOR GRANULAR MATERIALS, WATER, WASTE SITES, AND ANY OTHER MATERIALS SOURCES AS REQUIRED FOR PROJECT COMPLETION.

15. ANY WORK DONE WITHIN A PUBLIC RIGHT-OF-WAY SHALL BE COORDINATED WITH THE APPROPRIATE TRANSPORTATION AGENCY AND SHALL MEET THE REQUIREMENTS OF THAT AGENCY AND THE REQUIREMENTS OF ANY RIGHT-OF-WAY OR SPECIAL USE PERMITS.

17. ON SLOPING AREAS THE CONTRACTOR SHALL TAKE PRECAUTIONS TO MITIGATE ANY POSSIBLE EROSION PROBLEMS IN THE TRENCHES DUE TO STORM WATER THAT MIGHT. OCCUR DURING OR AFTER CONSTRUCTION AS DIRECTED OR APPROVED BY ENGINEET.

19. THE CONTRACTOR IS REQUIRED TO TAKE ALL PRECAUTIONS NECESSARY TO INSURE THAT NO STORM WATER AND/OR CONSTRUCTION DEBRIS ARE RELEASED FROM THE SITE. ANY RELEASES SHALL BE CLEANED AND MITIGATED AT THE CONTRACTOR'S EXPENSE.

20. CONTRACTOR SHALL COORDINATE ALL CONSTRUCTION ACCESS AND RELATED TRAFFIC CONTROL WITH THE COUNTY, CITY, AND STATE ROADWAY DEPARTMENTS. THE ENGINEER SHALL REVIEW ALL TRAFFIC CONTROL PLANS.

22. ALL GATE VALVES SHALL BE LOCATED NEAR TO TEES OR CROSSES AND THEIR ASSOCIATED REDUCERS AS SHOWN ON THE PROJECT PLANS.

23. CONTRACTOR SHALL PROVIDE ALL NECESSARY FITTINGS, HARDWARE, LABOR, ETC. TO CONSTRUCT VERTICAL AND HORIZONTAL BENDS IN PIPE AS NEEDED TO MEET THE REQUIRED GRADES, AUGMNENTS AND COVER REQUIRED REMEMS.

25. THE CONTRACTOR SHALL COORDINATE WITH THE CITY OF HYRAX FOR ALL UTILITY INSPECTIONS PRIOR TO BACK.

B X X

3 PHASE OF THE NORTHWEST QUARTER SECTIC TOWNSHIP 10 NORTH RANGE 1 EAST SALT LAKE BASE AND MERIDIAN HYRUM, UTAH HILLS SUBDIVISION, ROLLING

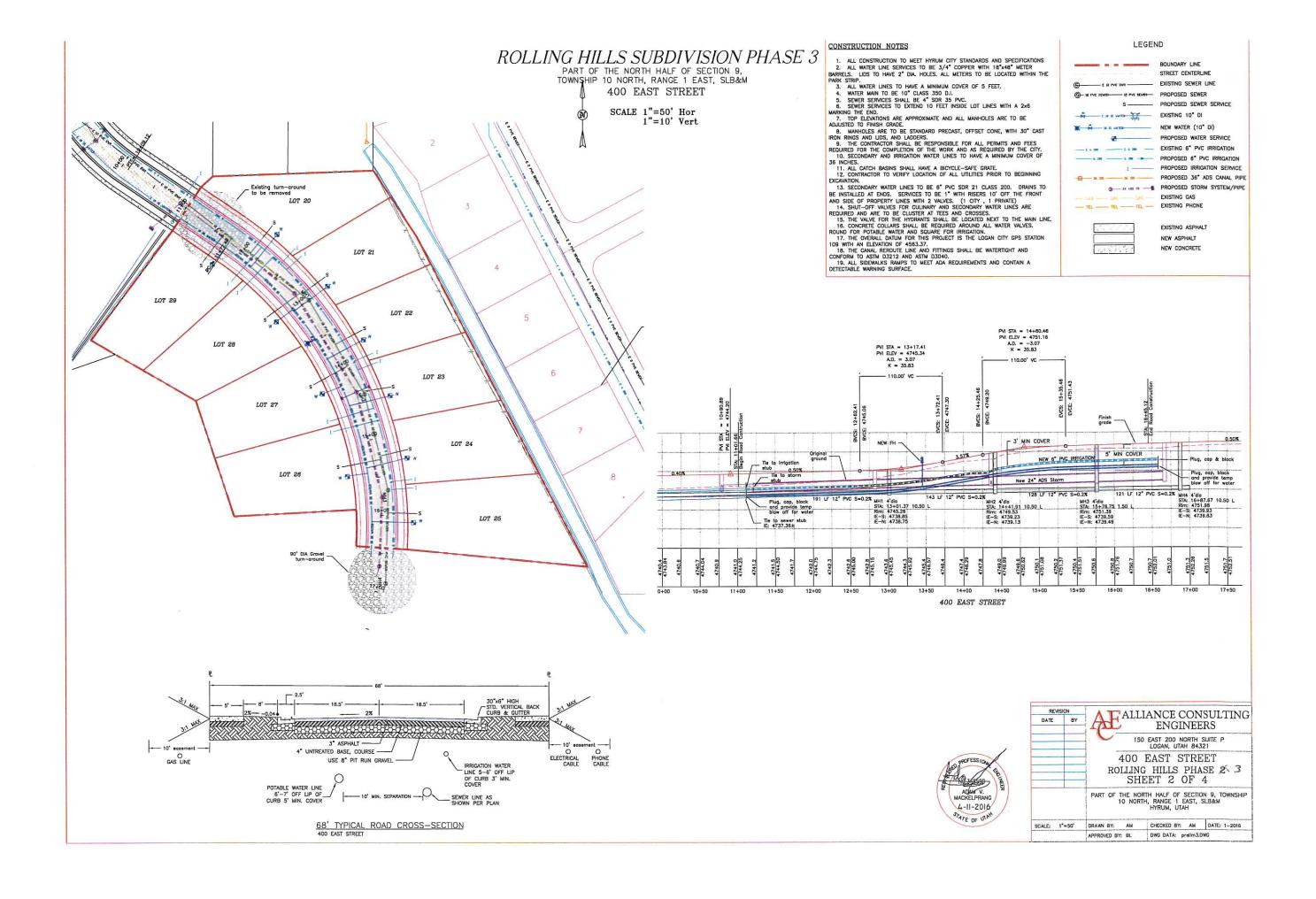
ALLIANCE CONSULTING ENGINEERS, INC. 150 EAST 200 NORTH SUITE P LOGAN, UTH 84321 (435) 755-5121



SHEET

4 SHEETS



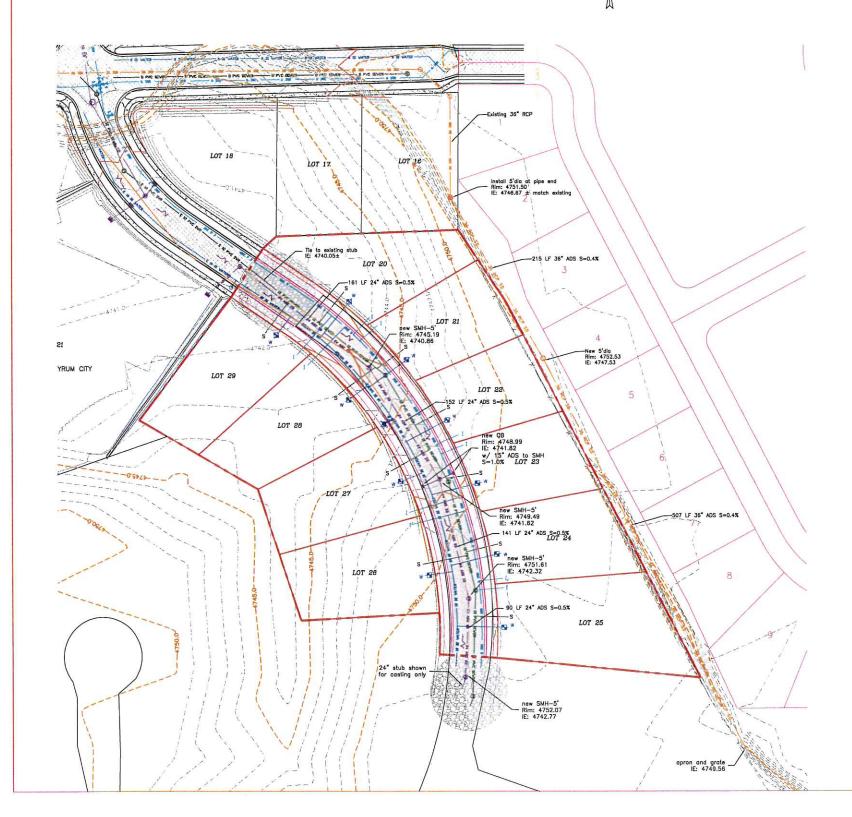


# ROLLING HILLS SUBDIVISION PHASE 3

PART OF THE NORTH HALF OF SECTION 9, TOWNSHIP 10 NORTH, RANGE 1 EAST, SLB&M

DRAINAGE PLAN

SCALE 1"=50' Hor 1"=10' Vert



# CONSTRUCTION NOTES

- ALL CONSTRUCTION TO MEET HYRUM CITY STANDARDS AND SPECIFICATIONS
   ALL WATER LINE SERVICES TO BE 3/4" COPPER WITH 18"x48"

- SPECIFICATIONS

  2. ALL WATER LINE SERVICES TO BE 3/4" COPPER WITH 18"x48"
  METER BARRELS. LIDS TO HAVE 2" DIA. HOLES. ALL METERS TO BE
  LOCATED WITHIN THE PARK STRIP.

  3. ALL WATER LINES TO HAVE A MINIMUM COVER OF 5 FEET.

  4. WATER MAIN TO BE 10" CLASS 350 D.I.

  5. SEWER SERVICES SHALL BE 4" SDR 35 PVC.

  6. SEWER SERVICES SHALL BE 4" SDR 35 PVC.

  7. TOP ELEVATIONS ARE APPROXIMATE AND ALL MANHOLES ARE TO BE
  ADJUSTED TO FINISH GRADE.

  8. MANHOLES ARE TO BE STANDARD PRECAST, OFFSET CONE, WITH
  30" CAST IRON RINGS AND LIDS, AND LADDERS.

  9. THE CONTRACTOR SHALL BE RESPONSIBLE FOR ALL PERMITS AND
  FEES REQUIRED FOR THE COMPLETION OF THE WORK AND AS REQUIRED
  BY THE CITY.

  10. SECONDARY AND IRRIGATION WATER LINES TO HAVE A MINIMUM
  COVER OF 36 INCHES.

  11. ALL CATCH BASINS SHALL HAVE A BICYCLE—SAFE GRATE.

  12. CONTRACTOR TO VERIFY LOCATION OF ALL UTILITIES PRIOR TO
  BEGINNING EXCANATION.

  13. SECONDARY WATER LINES TO BE 5" PVC SDR 21 CLASS 200.

- BEGINNING EXCANATION.

  13. SECONDARY WATER LINES TO BE 6" PVC SDR 21 CLASS 200.
  DRAINS TO BE INSTALLED AT ENDS. SERVICES TO BE 1" WITH RISERS
  10" OFF THE FRONT AND SIDE OF PROPERTY LINES WITH 2 VALVES. (1
  CITY, 1 PRIVATE)

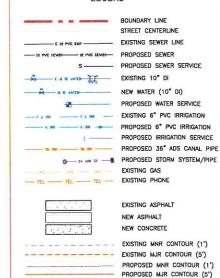
  14. SHUT-OFF VALVES FOR CULINARY AND SECONDARY WATER LINES
  ARE REQUIRED AND ARE TO BE CLUSTER AT TEES AND CROSSES.

  15. THE VALVE FOR THE HYDRANTS SHALL BE LOCATED NEXT TO THE
  MAIN LINE
- 15. THE VALVE FOR THE HYDRANTS SHALL BE LOUGHED MEAN UNE.

  16. CONCRETE COLLARS SHALL BE REQUIRED AROUND ALL WATER VALVES. ROUND FOR POTABLE WATER AND SQUARE FOR IRRIGATION, 17. THE OVERALL DATUM FOR THIS PROJECT IS THE LOGAN CITY GPS STATION 109 WITH AN ELEVATION OF 4563.37.

  18. THE CANAL REPOLITE LINE AND FITTINGS SHALL BE WATERTIGHT AND CONFORM TO ASTIM DATE AND SATIM DATE AND CONFORM TO ASTIM DATE AND THE AND THE

### LEGEND



PROPOSED FLOW DIRECTION

### STORM CALCULATION

			ns calculation fo		olling Hills		
	Area - distu	rbed					
Determination of	Weighted 'C' Value	: North of pond (ft^2)	South of pond (ft^2)	Area (ft^2)	'C' Value	A*C	
Road Area (roads, s	idewalks, driveways, etc	89785	268730	358515	0.95	340589.25	
Roof Area:		42000	270000	312000	0.95	296400.00	
Landscaped Area:		377486	1728925	2106411	0.15	315961.65	
Total Area:		509271	2267655	2776926 -			63.75 Ac
C value		0.36	0.34	0.34			
Peakflow Detern	nination:						
'C' Value:		0.36	0.34				
Rainfall Intensity:	30min-10yr Pipes	1.18	1.18				
Area:		509271	2267655				
Peakflow:	30min-10yr Pipes	4.93	20.89				

Drainage Area to Pond: 63.75 acres

Weighted 'C' value for Pond Drainage Area:

0.34

1.0 inches/hr = 0.0014 ft/min

Allowable Infiltration Rate: Pond Bottom Area:

265 ft x 284 ft =

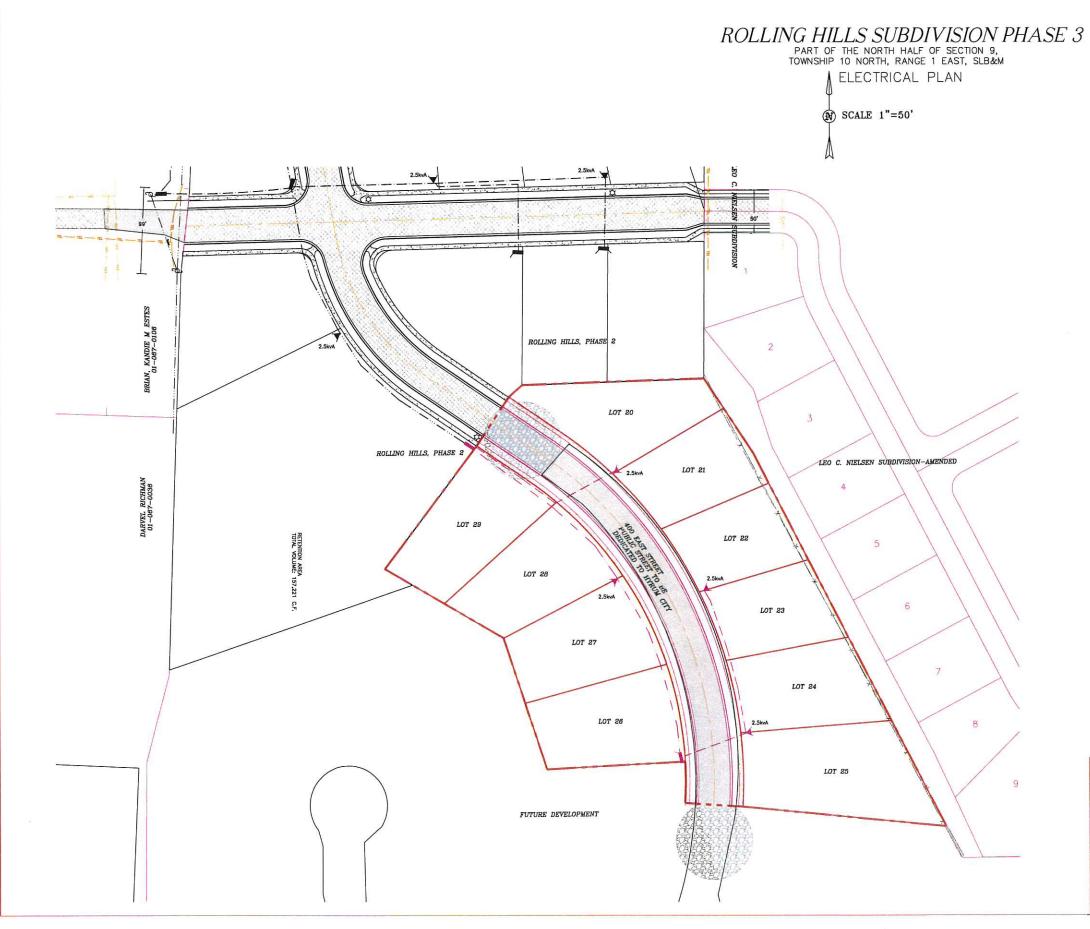
75260 sq. ft.

# 100-Year Return Period

Interval	Precip.* Intensity	Precip. Depth	Area	С	CxAx3600	Accum. Inflow	Allowable Discharge	Accum. Discharge	Requi Stora	
(min)	(in/hr)	(in)	(ac)	Value	(ft^3/in)	(ft3/min)	(ft^3/min)	(ft^3)	(ft^3)	(ac-ft)
5	5.28	0.44	63.75	0.34	78030	34333	105	523	33811	0.78
10	4.08	0.68	63.75	0.34	78030	53060	105	1045	52015	1.19
15	3.36	0.84	63.75	0.34	78030	65545	105	1568	63977	1.47
30	2.26	1.13	63.75	0.34	78030	88174	105	3136	85038	1.95
60	1.40	1.40	63.75	0.34	78030	109242	105	6272	102970	2.36
120	0.81	1.61	63.75	0.34	78030	125628	105	12543	113085	2.60
180	0.57	1.72	63.75	0.34	78030	134204	105	18815	115389	2.65
360	0.35	2.08	63.75	0.34	78030	162299	105	37630	124669	2.86
720	0.22	2.58	63.75	0.34	78030	201317	105	75260	126057	2.89
1440	0.13	3.14	63.75	0.34	78030	245014	105	150520	94494	2.17



REVISION		A TO ATT	IANCE CON	JSI II TING
DATE	BY	ALA	ENGINE	
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		DRA	AINAGE PL	AN
			G HILLS PHA EET 3 OF	Property Comments
			RTH HALF OF SECTI TH, RANGE 1 EAST, HYRUM, UTAH	
SCALE:	1"=50"	DRAWN BY: AM	CHECKED BY: AM	DATE:
		APPROVED BY: BL	DWG DATA: prelim3.	.DWG



# BOUNDARY LINE 3 \$ FEED THROUGH TRANSFORMER PRIMARY WIRE 3 \$ 4/0 SECONDARY WIRE 1 \$ PRIMARY J BOX 3 \$ SECONDARY J BOX CONDUIT PVC 2-1/2" PRIMARY CONDUIT PVC 3" SECONDARY SECONDARY WIRE \$350 URD CONDUIT PVC 3" SECONDARY SECONDARY WIRE \$350 URD COLUMN PVC 2-1/2" PRIMARY CONDUIT PVC 3" SECONDARY SECONDARY JBOX CONDUIT PVC 2-1/2" PRIMARY CONDUIT PVC 3-1 SECONDARY SECONDARY JBOX PVC 3-1/2" PRIMARY CONDUIT PVC 3-1 SECONDARY SECONDARY JBOX PVC 3-1/2" PRIMARY CONDUIT PVC 3-1 SECONDARY SECONDARY JBOX PVC 3-1/2" PVC 3-1/2" SECONDARY JBOX PVC 3-1/2" PVC

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