ADDENDUM #1 TO THE TECHNICAL DRAINAGE STUDY FOR SUNSTONE PARCEL G AKA ASHER @ SUNSTONE

Prepared for:

Lennar Communities Nevada LLC
9275 West Russell Road 4th Floor
Las Vegas, NV 89148
Phone: (702) 736-9100
Fax: (702) 736-9200

APRIL 2022

PROJECT 3040.0059

RCI Engineering
500 South Rancho Drive, Suite 17
Las Vegas, NV 89106
www.rcinevada.com

RCI Engineering

April 11, 2022

City of Las Vegas
Flood Control
495 S Main Street
1st Floor
Las Vegas, NV 89106

RE: Certification Letter for Paper and Digital Plans for Addendum #1 to the Technical Drainage Study for Sunstone Parcel G aka Asher @ Sunstone

Mr. Sung,

This letter has been provided as certification that the paper version of the plans match the digital PDF plans on the CD submitted with the drainage study.

Sincerely,

RCI Engineering

Andrew E. Whittaker, P.E.

500 S Rancho Drive, Suite 17 - Las Vegas, NV 89106 - Main 702.453.0800
www.RCINEVADA.com

HYDROLOGIC CRITERIA AND DRAINAGE MANUAL

DRAINAGE STUDY INFORMATION FORM

Name of Development: Sunstone Parcel G aka Asher at Sunstone Date: March 2022

Location of Development: a) Descriptive (Cross Streets) North/South: O'Hare Road

East/West: Sunstone Parkway

b) Section: 6 Township: 19 South Range: 60 East

c) APN : 125-06-710-001

Name of Owner: Lennar Homes of Nevada

Telephone No.: 702-736-9100 Fax No.: E-Mail Address:

Address: 9275 West Russell Rd, 4th Floor, Las Vegas, NV 89148

Contact Person-Name: Andrew E. Whittaker, P.E. **Telephone No.:** 702-453-0800

* **E-Mail Address:** awhittaker@rcinevada.com **Fax No.:** 702-453-0801

Firm: RCI Engineering

Address: 500 South Rancho Drive, Suite 17 Las Vegas, Nevada 89106

Type of Land Development/Land Disturbance Process:

☐	Rezoning	☐	Subdivision Map	☐	Clearing and Grading Only
☐	Parcel Map	☒	Planned Unit Development	☐	Other (Please specify below)
☐	Large Parcel Map	☐	Building Permit		

1. Total Owned Land Area: At Site: 16.97acres Being Developed/Disturbed: 16.97acres
2. Is a portion or all of the subject property located in a designated FEMA Flood Hazard Area? ☐ Yes** ☒ No
3. Is the property bordered or crossed by an existing or proposed Clark County Regional Flood Control District Master Planned Facility? ☐ Yes** ☒ No
4. Proposed type of development (Residential, Commercial, Etc.): Residential
5. Approximate upstream land area which drains to the subject site: 0 acres
6. Has the site drainage been evaluated in the past? ☒ YES ☐ NO If yes, please identify documentation: TDS for Sunstone Phase 1 Infrastructure (DS 5135)
7. If known, please briefly identify the proposed discharge point(s) of runoff from the site: Surface flow onto O'Hare Road
8. Briefly describe your proposed schedule for the subject project: ASAP

Engineer's Seal

Submit this form as part of the required drainage study to the local entity which has jurisdiction over the subject property. This form may provide sufficient information to serve as the Conceptual Drainage Study.

***New Required Field**

****Review and concurrence of the Clark County Regional Flood Control District is required.**

Local Entity File No.

Revision	Date
Addm 1	04/2022

REFERENCE:

STANDARD FORM 1

Updated 05/01/2008

RCI ENGINEERING

April 11, 2022

City of Las Vegas
333 N. Rancho Drive
Las Vegas, NV 89106

RE: Parcel G aka Asher at Sunstone DS5552A – Response to Comments

Mr. Albert Sung,

The purpose of this letter is to address the comment letter dated March 27, 2022 regarding the above-referenced project. The comments are individually addressed. Each comment has been re-typed with the response to each comment.

Comment 1: It is unclear how and who will be responsible for the maintenance of existing/proposed swale along the western boundary of the proposed project. If the existing/proposed swales along the western boundary has existing maintenance bond, please provide a copy of the bond. If the existing/proposed swales do not have bond, please post a bond prior to final approval of the improvement plan.

Response: **A copy of the "Off-site Improvements Agreement Performance Bond" for Log Cabin Way (Sunstone Parkway) is provided in Appendix B of this Addendum.**

Comment 2: The project proposes to build a temporary drainage facility at southwest corner. Prior to final plan approval the developer must complete a maintenance and liability agreement for the interim drainage improvements (off-site berms or channels) and post a minimum maintenance bond of $50,000 or 50-percent of the construction cost for the improvements, whichever is greater. The engineer must submit an estimate of the quantities for constructing the facility and an exhibit that adequately shows the location and limits of the drainage facility to *City of Las Vegas Flood Control* for approval. Once the drainage study is conditionally approved, the engineer should contact the City's Land Development Section (229-6371) to begin the agreement process.

In order for the maintenance bond to be released in the future, a drainage update / letter will be required to justify that the offsite berms / channels are

no longer necessary and can be removed.

~~Land Development: Upon conditional approval, this project is required to post a minimum Bond in the amount of $100,000 for on-site drainage related items. The items could include re-grading, additional on-site storm drain improvements, repair of drainage appurtenances and necessary on- site drainage facilities as identified by the drainage study.~~

Response: **A Maintenance Bond of $50,000 or 50-percent of the construction cost for improvements, whichever is greater, will be posted prior to final approval of improvement plans.**

We acknowledge that a drainage update letter will be required in order for the maintenance bond to be released in the future to justify that the offsite berms/channels are no longer necessary and can be removed.

The last paragraph of comment 2 was deleted per email enclosed in Appendix B.

Comment 3: A review of the grading plan shows an elevation difference of approximately 2-feet of cut/fill adjacent to undeveloped properties. Sites with a grade difference of 2 feet above or below existing grades are required to have approval from the *City of Las Vegas Planning and Development Department.* The engineer must submit copies of the grading plans and detail sheet with a letter justifying the grade difference to the *City Planning Department* (229-6301). The engineer must provide *City Planning* approval with the next submittal.

Response: **A copy of the approved Justification Letter by CLV Planning is enclosed in Appendix B.**

Comment 4: Figure 5 – *Existing Conditions Map* offsite basins EPI 1 and EPI 2 flows are not referenced on summary table. Per referenced Exhibit D EPI1 (Q_{100}=9 cfs) and EPI 2 (Q_{100}=8cfs).

Response: **In the previous submittal, we analyzed the onsite and offsite basins during the Existing Condition using HEC-1 analysis. The flow rates from the HEC-1 were slightly different from those in the approved Master Study. Figure 5 was revised to match the approved Master Study.**

Comment 5: Figure 5 – *Existing Conditions Map* basin XON1 100-yr flow does not match with referenced flow on Exhibit D. EPG is 13 cfs and XON1 is 12 cfs.

Response: **In the previous submittal, we analyzed the onsite and offsite basins during the Existing Condition using HEC-1 analysis. The flow rates from the HEC-1 were**

slightly different from those in the approved Master Study. Figure 5 was revised to match the approved Master Study.

Comment 6: Figure 6 & 7: Flow arrows along lots 78-85 does not match with grading on sheet G-1 of Unit 1 plans.

Response: **Figure 6 and 7 were revised to show flow arrows along lots 78-85 to match the grading plans. Basin PR1 was removed and the areas of basins PR2A and PR2B were increased. The basin boundaries, areas and flow rates for basins PR2A and PR5 were revised. FlowMaster Sections 2, 3, 5, 6, 7, 10 were revised accordingly.**

Comment 7: Provide upstream TCR elevation at Lot 98 on Unit 1 G-4.

Response: **The grading plan was revised to show the TCR elevation at Lot 98.**

Comment 8: Provide a temporary riprap pad prior to discharging flow into Public Street. Place riprap pad at south end of western temporary swale and east end of Peggy Publo Avenue.

Response: **Riprap pads are placed at the east end of Peggy Publo Avenue and at the south end of the western temporary swale as requested. The velocity is less than 5 fps, at each location; therefore, non-erosive. A minimum size riprap of D50=6″ with a depth of 12″ is shown on the plans.**

Comment 9: General Comment: 'Peggy Publo Ave' does not match throughout the exhibits and grading plans. For example, on Figure 7 is called out 'Peggy Publo Ave' and Unit 1 grading plan G1 'Peggy Publow Ave'.

Response: **All exhibits and grading plans were revised to Peggy Publow Ave.**

Comment 10: Proposed drainage easement on the Unit 2 Grading Plan Sheet G-3 must conform to CCAUSD standard drawing 425.S1 including the placement of bollards.

Response: **The grading plan was revised as requested.**

If you have any questions or require additional information, please do not hesitate to contact us.

Sincerely,

RCI Engineering

Andrew E Whittaker, P.E.

CITY OF LAS VEGAS INTER-OFFICE MEMORANDUM				DATE: 3/27/2022
TO: **Land Development Services** Department of Building & Safety				**FROM:** Albert Sung, P.E. Flood Control Project Engineer Department of Public Works
SUBJECT:	Drainage Study for:			**COPIES TO:**
Sunstone Parcel G aka Asher at Sunstone				RCI Engineering
Cross Streets:	O'Hare Road and Sunstone Parkway			Lennar Homes of Nevada
File Number:	F:\Depot\DSMemos\DS5552A.doc			Bart Anderson, P.E., DevCo
Parcel Number:	125-06-710-001			
Zoning Action:				
FEMA Flood Zone	YES	NO	**X**	
Proposed Storm Drain	YES	NO	**X**	

HISTORY	DATE RECEIVED	DATE REVIEWED	COMMENTS	REVIEW FEES	FEES PAID Payment Trn #
1st Submittal	3/17/2022	3/24/2022	See Comments Below	$400	4680993: $400
			TOTAL FEES (LDDRS):	**$400**	**----**

REMARKS:

The Drainage Study for the subject project has been reviewed and:

	is approved subject to conformance to all City standards and the following conditions:
X	must be resubmitted or supplemented including the following:
	is conditionally approved subject to Clark County Regional Flood Control District concurrence.
	is conditionally approved subject to Clark County Public Works Department concurrence.

The following are comments pertaining to the subject site specific drainage study and grading plans:

1. It is unclear how and who will be responsible for the maintenance of existing/proposed swale along the western boundary of the proposed project. If the existing/proposed swales along the western boundary has existing maintenance bond, please provide a copy of the bond. If the existing/proposed swales down not have bond, please post a bond prior to final approval of the improvement plan.

2. The project proposes to build a temporary drainage facility at southwest corner. Prior to final plan approval the developer must complete a maintenance and liability agreement for the interim drainage improvements (off-site berms or channels) and post a minimum maintenance bond of $50,000 or 50-percent of the construction cost for the improvements, whichever is greater. The engineer must submit an estimate of the quantities for constructing the facility and an exhibit that adequately shows the location and limits of the drainage facility to *City of Las Vegas Flood Control* for approval. Once the drainage study is conditionally approved, the engineer should contact the City's Land Development Section (229-6371) to begin the agreement process.

   In order for the maintenance bond to be released in the future, a drainage update / letter will be required to justify that the offsite berms / channels are no longer necessary and can be removed.

Land Development: Upon conditional approval, this project is required to post a minimum Bond in the amount of $100,000 for on-site drainage related items. The items could include re-grading, additional on-site storm drain improvements, repair of drainage appurtenances and necessary on-site drainage facilities as identified by the drainage study.

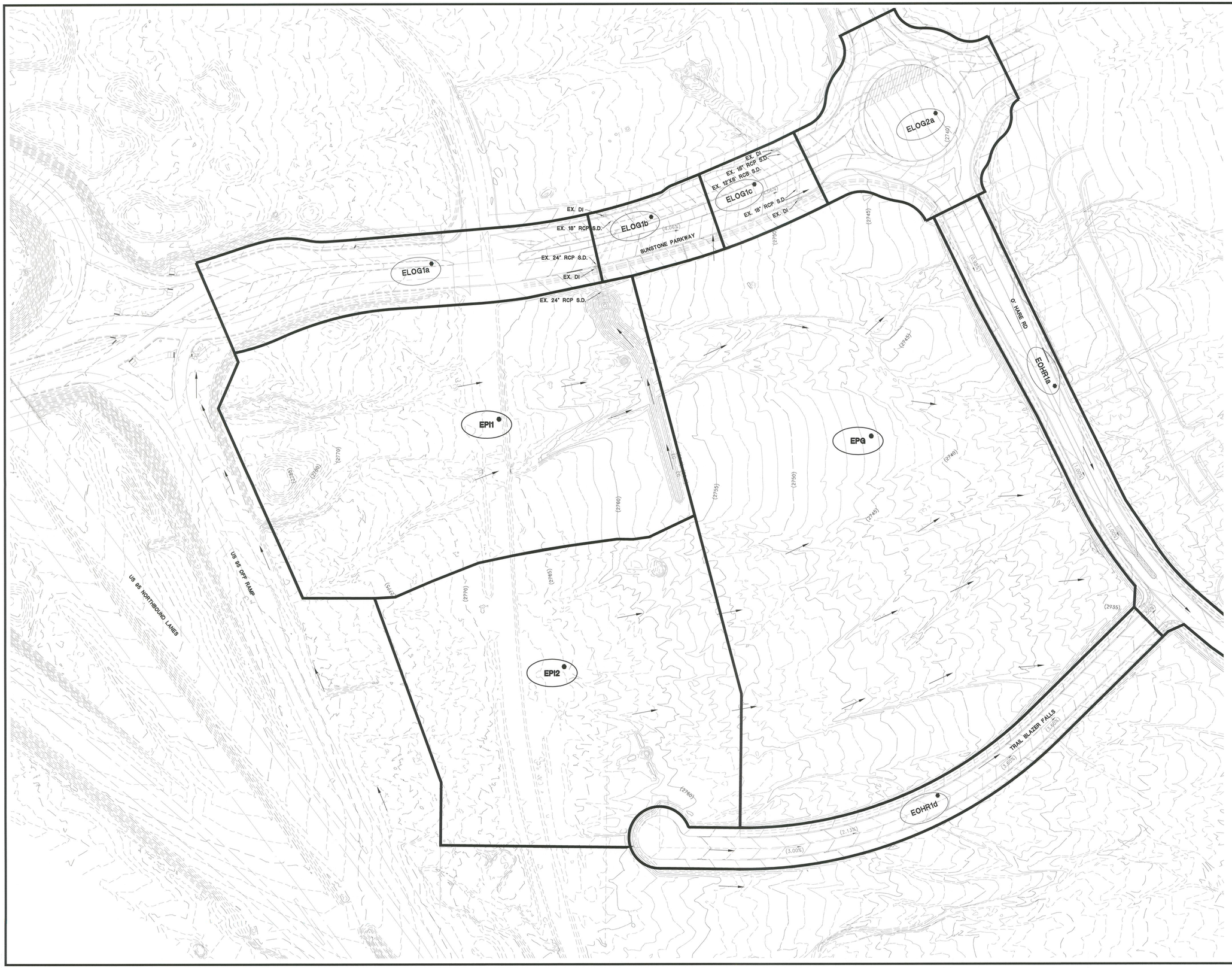
3. **A review of the grading plan shows an elevation difference of approximately 2-feet of cut/fill adjacent to undeveloped properties**. Sites with a grade difference of 2 feet above or below existing grades are required to have approval from the *City of Las Vegas Planning and Development Department.* The engineer must submit copies of the grading plans and detail sheet with a letter justifying the grade difference to the *City Planning Department* (229-6301). The engineer must provide *City Planning* approval with the next submittal.
4. **Figure 5** – *Existing Conditions Map* offsite basins EPI 1 and EPI 2 flows are not referenced on summary table. Per referenced Exhibit D EPI1 (Q_{100}=9 cfs) and EPI 2 (Q_{100}=8cfs).
5. **Figure 5** – *Existing Conditions Map* basin XON1 100-yr flow does not match with referenced flow on Exhibit D. EPG is 13 cfs and XON1 is 12 cfs.
6. **Figure 6 & 7**: Flow arrows along lots 78-85 does not match with grading on sheet G-1 of Unit 1 plans.
7. Provide upstream TCR elevation at Lot 98 on **Unit 1 G-4**.
8. Provide a temporary riprap pad prior to discharging flow into Public Street. Place riprap pad at south end of western temporary swale and east end of Peggy Publo Aenue.
9. General Comment: 'Peggy Publo Ave' does not match throughout the exhibits and grading plans. For example, on Figure 7 is called out 'Peggy Publo Ave' and Unit 1 grading plan G1 'Peggy Publow Ave'.
10. Proposed drainage easement on the Unit 2 Grading Plan Sheet G-3 must conform to CCAUSD standard drawing 425.S1 including the placement of bollards.

NOTE: Please be advised that all land surface area disturbances over 1 acre or any area adjacent to a water way must submit to the *Nevada Division of Environmental Protection* a "Notice of Intent" to discharge that certifies a stormwater pollution prevention plan has been developed and is maintained on site; for inclusion in the Stormwater General Permit No. NVR100000. A phased construction unit in a contiguous subdivision is considered under construction until all stripped or disturbed surface areas have been covered by paving, building construction or planting. For more information, including forms and applications see http://ndep.nv.gov/bwpc/storm01.htm or call (775) 687-9429.

END OF REMARKS

T/R/S: T19S/R60E/S06
AREA G-06

APPENDIX A – FIGURES



N

40' 0' 40' 80'

SCALE: 1" = 80'

LEGEND

- PROPOSED FLOW DIRECTION
- PROPOSED SUBBASIN BOUNDARY
- PRORATED BASIN BOUNDARY
- EP — PROPOSED DRAINAGE SUBBASIN

EXISTING CONDITIONS HEC-1 MODEL SUMMARY		
SUBBASIN OR CP	BASIN AREA (AC)	100 YR (cfs)
EPI1	8.6	9
EPI2	7.4	8
EPG	15.9	13
REFERENCED FROM EXHIBIT D WITHIN THE "TDS FOR SUNSTONE PHASE 1 (DS 5135), DATED AUGUST, 2019		

EXISTING CONDITIONS OFFSITE STREET BASINS			
SUBBASIN OR CP	BASIN AREA (AC)	100 YR (cfs)	10 YR (cfs)
ELOG1a	2.7	10	5
ELOG1b	0.9	3	2
ELOG1c	0.7	2	1
ELOG2a	3.1	9	5
EOHR1A	2.2	6	3
EOHR1d	1.93	6	3
REFERENCED FROM EXHIBIT E WITHIN THE "TDS FOR SUNSTONE PHASE 1 (DS 5135), DATED AUGUST, 2019			

* BASIN INFORMATION REFERENCED FROM "TDS FOR SUNSTONE PHASE 1", EXHIBIT E, DS 5135

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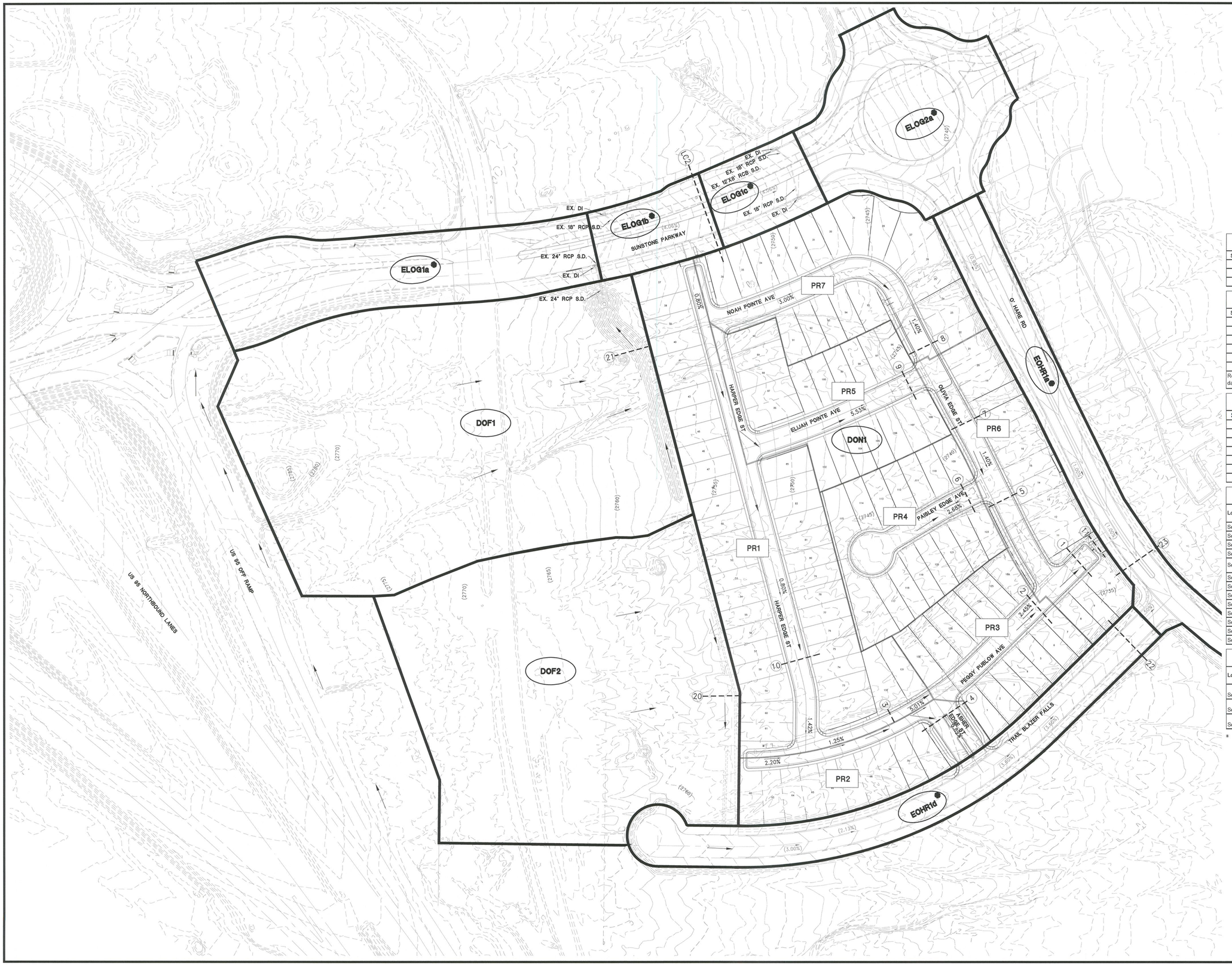
FIGURE 5
EXISTING CONDITIONS MAP

RCI ENGINEERING
500 SOUTH RANCHO DRIVE, SUITE 17, LAS VEGAS, NV 89106
MAIN: 702.453.0800 FAX: 702.453.0801

O:\3040_LENR\0059_Sunstone G_DRAINY FIGURES\ORIGINAL\Figure5.dwg cwhittaker 4/12/22 1:57pm



ULTIMATE CONDITIONS HEC-1 MODEL SUMMARY			
SUBBASIN OR CP	BASIN AREA (AC)	100 YR (cfs)	10 YR (cfs)
DOF1	8.6	26	12
DOF2	7.4	19	8
DON1	15.9	38	17

ULTIMATE CONDITIONS OFFSITE STREET BASINS			
SUBBASIN OR CP	BASIN AREA (AC)	100 YR (cfs)	10 YR (cfs)
ELOG1a	2.7	10	5
ELOG1b	0.9	3	2
ELOG1c	0.7	2	1
ELOG2a	3.1	9	5
EOHR1a	2.2	6	3
EOHR1d	1.9	6	3

Referenced from Exhibit E within the "TDS for Sunstone Phase 1" (DS 5135), dated Aug, 2019

PRORATED BASIN STORM FLOW SUMMARY			
SUBBASIN OR CP	BASIN AREA (AC)	% OF DON1	100 YR (cfs)
PR1	4.43	27.8	11
PR2	1.34	8.4	3
PR3	1.56	9.8	4
PR4	1.85	11.6	4
PR5	2.01	12.6	5
PR6	2.10	13.2	5
PR7	2.57	16.2	6

100-YEAR HYDRAULIC SECTIONS						
Location	Basins	Slope (%)	Q_{100} (cfs)	D_{100} (ft)	V_{100} (ft/sec)	D^*V_{100}
Section 1	DON1-PR2	1.34	35	0.49	3.75	1.8
Section 2	PR1 + PR3	2.45	14	0.34	3.92	1.3
Section 3 (1/2 ST.)	PR1	1.25	11	0.44	3.19	1.4
Section 4	PR2	0.55	3	0.35	1.95	0.7
Section 5	PR4 + PR5 + PR6 + PR7	1.40	20	0.42	3.33	1.4
Section 6	PR4	2.68	4	0.23	3.09	0.7
Section 7	PR5 + PR7	1.40	11	0.34	2.99	1.0
Section 8	PR7	1.40	6	0.28	2.60	0.7
Section 9	PR5	2.38	5	0.25	3.08	0.8
Section 10	PR1	0.80	11	0.37	2.41	0.9
Section 11	DON1-PR2	2.00	35	0.41	8.49	3.5
Section 20	DOF2	0.50	19	0.85	2.6	2.2
Section 21	DOF1	0.50	26	1.69	3.03	5.1

OFFSITE STREETS 100-YEAR HYDRAULICS SECTIONS						
Location	Basins	Slope (%)	Q_{100} (cfs)	D_{100} (ft)	V_{100} (ft/sec)	D^*V_{100}
Section LC2 *	REFERENCED	4.06	7	0.31	4.09	1.3
Section 22	PR2 + DOF2 + EOHR1d	3.00	28	0.47	4.97	2.3
Section 23	DON1 - PR2 + EOHR1a	1.00	41	0.6	3.67	2.2

* HYDRAULIC SECTIONS REFERENCED FROM "TDS FOR SUNSTONE PHASE 1" (DS 5135)

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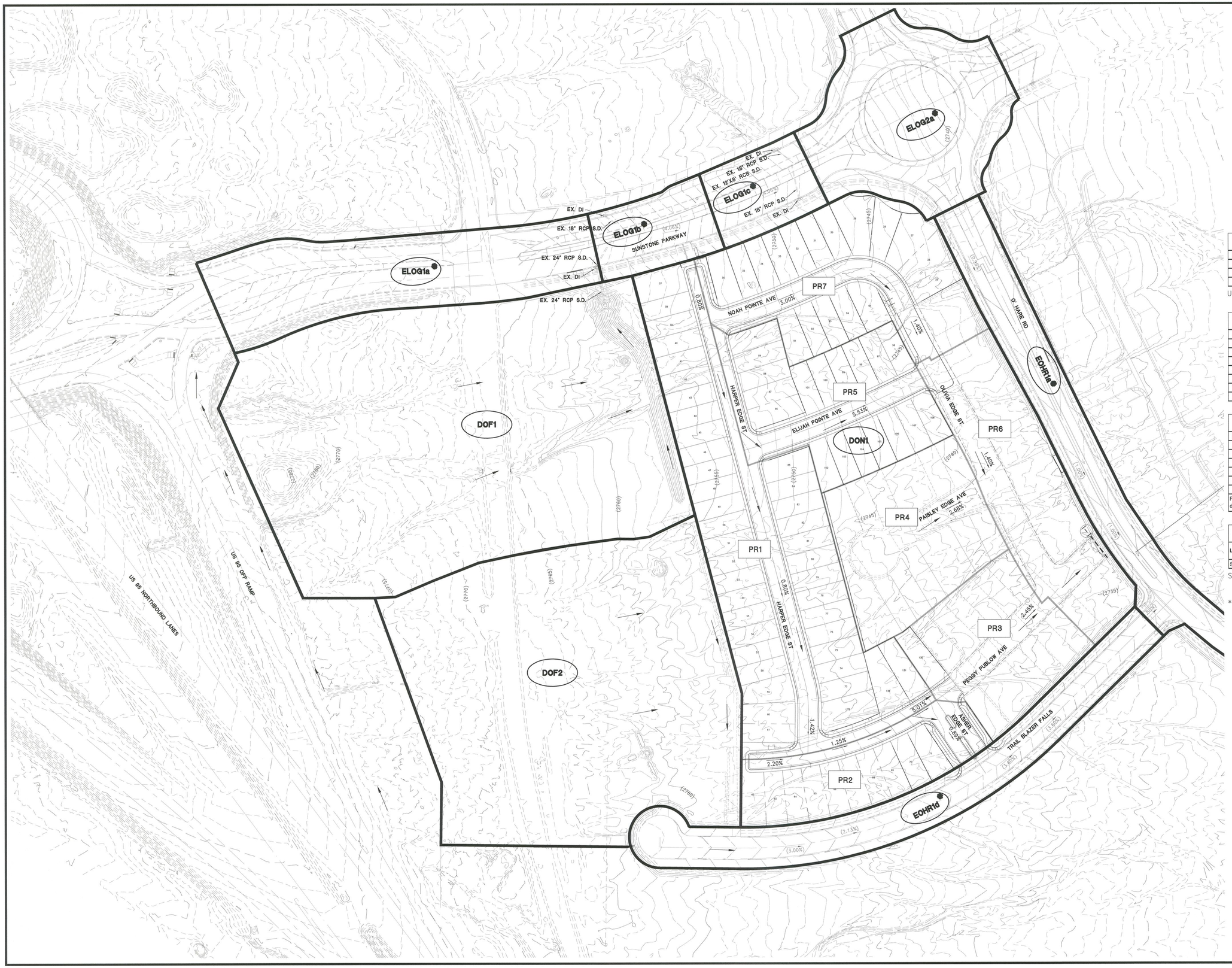
FIGURE 6
ULTIMATE CONDITIONS MAP

RCI ENGINEERING
500 SOUTH RANCHO DRIVE, SUITE 17, LAS VEGAS, NV 89106
MAIN: 702.453.0800 FAX: 702.453.0801



N

40' 0' 40' 80'

SCALE: 1" = 80'

LEGEND

- PROPOSED FLOW DIRECTION
- PROPOSED SUBBASIN BOUNDARY
- PRORATED BASIN BOUNDARY
- ON1 — PROPOSED DRAINAGE SUBBASIN
- PR X — PRORATED DRAINAGE BASIN
- (1) — HYDRAULIC SECTION

ULTIMATE CONDITIONS
HEC-1 MODEL SUMMARY

SUBBASIN OR CP	BASIN AREA (AC)	100 YR (cfs)	10 YR (cfs)
DOF1	8.6	26	12
DOF2	7.4	19	8
DON1	15.9	38	17

ULTIMATE CONDITIONS ARE THE SAME AS INTERIM CONDITIONS

PRORATED BASIN
STORM FLOW SUMMARY

SUBBASIN OR CP	BASIN AREA (AC)	% OF DON1	100 YR (cfs)
PR1	4.43	27.8	11
PR2	1.34	8.4	3
PR3	1.56	9.8	4
PR4	1.85	11.6	4
PR5	2.01	12.6	5
PR6	2.10	13.2	5
PR7	2.57	16.2	6

ULTIMATE CONDITIONS
OFFSITE STREET BASINS

SUBBASIN OR CP	BASIN AREA (AC)	100 YR (cfs)	10 YR (cfs)
ELOG1a	2.7	10	5
ELOG1b	0.9	3	2
ELOG1c	0.7	2	1
ELOG2a	3.1	9	5
EOHR1a	2.2	6	3
EOHR1d	1.9	6	3

Referenced from Exhibit E within the "TDS for Sunstone Phase 1" (DS 5135), dated Aug, 2019

OFFSITE STREETS
100-YEAR HYDRAULICS SECTIONS

Location	Basins	Slope (%)	Q_{100} (cfs)	D_{100} (ft)	V_{100} (ft/sec)	D^*V_{100}
Section I-1	DON1-PR2	1.20	35	0.39	2.81	1.1

SEE FIGURE 6 FOR ALL OTHER HYDRAULIC SECTIONS

* HYDRAULIC SECTIONS REFERENCED FROM "TDS FOR SUNSTONE PHASE 1" (DS 5135)

ASHER @ SUNSTONE
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FIGURE 7
INTERIM CONDITIONS MAP

RCI ENGINEERING
500 SOUTH RANCHO DRIVE, SUITE 17, LAS VEGAS, NV 89106
MAIN: 702.453.0800 FAX: 702.453.0801

APPENDIX B – CORRESPONDENCE

Existing Maintenance Bond

Approved Justification Letter

OFF-SITE IMPROVEMENTS AGREEMENT
PERFORMANCE BOND

SUNSTONE PHASE 1 LOG CABIN WAY

LD PROJECT# DS 5135B/L19-02444
BOND NUMBER LICX1195226
DATE EXECUTED 04/28/2020

IMPORTANT: SURETY COMPANIES EXECUTING BONDS MUST BE LICENSED TO ISSUE SURETY BONDS BY THE STATE OF NEVADA INSURANCE DIVISION PURSUANT TO NEVADA REVISED STATUE 683A.090 AND BONDS MUST BE ISSUED BY AN APPOINTED AGENT PURSUANT TO NEVADA REVISED STATUTE 683A.280. NOTE: INDIVIDUAL SURETY BONDS ARE NOT ACCEPTABLE.

KNOW ALL MEN BY THESE PRESENTS, That we, the undersigned PRINCIPAL AND SURETY, are held and firmly bound unto the City of Las Vegas, Nevada, the obligee of this bond hereinafter referred to as the CITY, in the penal sum of Sixty three thousand seven hundred and 00/100-- ($63,700.00) DOLLARS, for the payment of which sum well and truly to be made, we bind ourselves, our heirs, executors, administrators and successors, and assigns, jointly and severally, firmly by these presents.

THE CONDITION OF THIS OBLIGATION IS SUCH, That whereas the PRINCIPAL is entering into a certain contract with the CITY, entitled ***DRAINAGE IMPROVEMENTS MAINTENANCE AGREEMENT***, a copy of which is attached hereto and incorporated herein;

NOW THEREFORE, if said PRINCIPAL shall well and truly perform and fulfill all the undertakings, covenants, terms and conditions and agreements of said contract during the original term of said contract, then this obligation shall be null and void, otherwise it shall remain in full force and effect.

PROVIDED, that any modifications in the work to be done or the materials to be furnished, which may be made pursuant to the terms of said Contract, shall not in any way release either said PRINCIPAL or said SURETY hereunder, nor shall any extensions of time granted under the provisions of said Contract release either said PRINCIPAL or said SURETY, and notice of such modifications or extensions of the Contract is hereby waived by said Surety.

SIGNED this 28th day of April, 20 20

SEAL AND NOTARIAL ACKNOWLEDGMENT OF SURETY

SC East Landco, LLC, a Nevada limited liability company
(PRINCIPAL)

Robert Johnson, Authorized Agent
(Authorized Representative and Title)

By: _____
(Signature)

Surety: Lexon Insurance Company

License #816259
(State of Nevada, License Number)

Mechele Larkin
(Appointed Agent Name)

By: _____
(Signature) Mechelle Larkin, Attorney-in-Fact

Address: 10002 Shelbyville Rd, Suite 100
Louisville, KY 40223

Telephone: (615) 553-9500

ISSUING COMPANY MUST HOLD CERTIFICATES OF AUTHORITY AS ACCEPTABLE SURETY ON FEDERAL BONDS AND AS ACCEPTABLE REINSURING COMPANY WITH LISTING IN THE DEPARTMENT OF TREASURY, FISCAL SERVICE, (DEPARTMENT OF CIRCULAR "570", CURRENT REVISIONS).

POWER OF ATTORNEY

11857

Lexon Insurance Company

KNOW ALL MEN BY THESE PRESENTS, that **LEXON INSURANCE COMPANY**, a Texas Corporation, with its statutory home office in Austin, Texas, does hereby constitute and appoint: Mechelle Larkin, Kathy R. Mair, My Hua, Brenda Wong, Tenzer V. Cunningham, Martha Gonzales, Joaquin Perez, Jeffrey Strassner its true and lawful Attorney(s)-In-Fact to make, execute, seal and deliver for, and on its behalf as surety, any and all bonds, undertakings or other writings obligatory in nature of a bond.

This authority is made under and by the authority of a resolution which was passed by the Board of Directors of **LEXON INSURANCE COMPANY** on the 1st day of July, 2003 as follows:

Resolved, that the President of the Company is hereby authorized to appoint and empower any representative of the Company or other person or persons as Attorney-In-Fact to execute on behalf of the Company any bonds, undertakings, policies, contracts of indemnity or other writings obligatory in nature of a bond not to exceed $5,000,000.00, Five Million Dollars, which the Company might execute through its duly elected officers, and affix the seal of the Company thereto. Any said execution of such documents by an Attorney-In-Fact shall be as binding upon the Company as if they had been duly executed and acknowledged by the regularly elected officers of the Company. Any Attorney-In-Fact, so appointed, may be removed for good cause and the authority so granted may be revoked as specified in the Power of Attorney.

Resolved, that the signature of the President and the seal of the Company may be affixed by facsimile on any power of attorney granted, and the signature of the Assistant Secretary, and the seal of the Company may be affixed by facsimile to any certificate of any such power and any such power or certificate bearing such facsimile signature and seal shall be valid and binding on the Company. Any such power so executed and sealed and certificate so executed and sealed shall, with respect to any bond of undertaking to which it is attached, continue to be valid and binding on the Company.

IN WITNESS THEREOF, **LEXON INSURANCE COMPANY** has caused this instrument to be signed by its President, and its Corporate Seal to be affixed this 22nd day of June, 2018.

LEXON INSURANCE COMPANY

BY _____
Brian Beggs
President

ACKNOWLEDGEMENT

On this 22nd day of June, 2018, before me, personally came Brian Beggs to me known, who be duly sworn, did depose and say that he is the President of **LEXON INSURANCE COMPANY**, the corporation described in and which executed the above instrument; that he executed said instrument on behalf of the corporation by authority of his office under the By-laws of said corporation.

AMY TAYLOR
Notary Public- State of Tennessee
Davidson County
My Commission Expires 5-9-2023

BY _____
Amy Taylor
Notary Public

CERTIFICATE

I, the undersigned, Assistant Secretary of **LEXON INSURANCE COMPANY**, A Texas Insurance Company, DO HEREBY CERTIFY that the original Power of Attorney of which the forgoing is a true and correct copy, is in full force and effect and has not been revoked and the resolutions as set forth are now in force.

Signed and Seal at Mount Juliet, Tennessee this 28th Day of April, 2020.

BY _____
Andrew Smith
Assistant Secretary

"WARNING: Any person who knowingly and with intent to defraud any insurance company or other person, files and application for insurance of claim containing any materially false information, or conceals for the purpose of misleading, information concerning any fact material thereto, commits a fraudulent insurance act, which is a crime and subjects such person to criminal and civil penalties."

State of **Nevada**
County of **Clark**

On **May 4, 2020** before me, the undersigned, a Notary Public in and for said County and State, personally appeared **Robert Johnson** personally known to me (or proved to me on the basis of satisfactory evidence) to be the person (s) whose name (s) is/are subscribed to the within instrument and acknowledged to me that he/she/they executed the same in his/her/their authorized capacity (ies), and that be his/her/their signature (s) on the instrument the person (s), or WITNESS my and official seal.

SHIRLEY MILLER
Notary Public, State of Nevada
Appointment No. 17-2540-1
My Appt. Expires Jun 25, 2021

(Notary Public)

My Commission Expires: June 25, 2021

Print Date: 3/14/2020

EXHIBIT "A"
MAINTENANCE BOND ESTIMATE FORM

CURRENT FEES

Fee Desc	Status	Paid Date	Amount
Admin Fee	Paid	11/4/2019	$54.00
Express Plan Check Application Fee	Paid	11/4/2019	$300.00
Plan Check Fee	Paid	11/4/2019	$75,408.98
		TOTAL PAID AMOUNT	$75,762.98

Fee Desc	Status	Paid Date	Amount
FPE Express Fee	UnPaid		$80.00
Express Plan Check Hourly Fee	UnPaid		$2,400.00
Geotech Review	UnPaid		$400.00
Improvement Agreements	UnPaid		$100.00
Inspection Fee	UnPaid		$66,202.21
Plan Check Fee	UnPaid		$5,843.79
		TOTAL UNPAID AMOUNT	$75,026.00

Print Date: 3/14/2020

EXHIBIT "A"
MAINTENANCE BOND ESTIMATE FORM

Contractor Details

DATE: 3/14/2020

DEVELOPER CO.: EASTLAND L L C

LAS VEGAS ,NV 89141

PHONE NUMBER:

FAX NUMBER:

RE: Approved Bond Estimate * for: Sunstone Phase 1 Log Cabin Way

Land Development Project : L19-02444

Attached is the approved bond estimate for the above-referenced project. You are required to complete the improvements listed, or guarantee their completion by providing surety prior to the issuance of permits and/or the recordation of any maps. Certain information is required in order to prepare these agreements. As soon as the type of surety (bond, cash, financial institution) is known, please contact Land Development so that the appropriate off-site improvements agreements can be prepared. Please note that the agreements will be prepared using the "owner" shown on the final map. If the project does not have a final map, (a non-subdivision), the "owner" will be determined by the Assessors Parcel Number, please have this available when you call. If there has been a change of ownership, or if someone other than the listed owner will be developing the tract, please submit a copy of the recorded deed showing the new owners, the agreements will then be prepared. Please follow these steps or delays may occur. If you have any questions please contact Land Development at 229-6371.

DS#5135B

DRAINAGE IMPROVEMENTS
MAINTENANCE AGREEMENT

THIS AGREEMENT, made and entered into this _____ day of _____, 2020, by and between the CITY OF LAS VEGAS, a municipal corporation of the State of Nevada (hereinafter referred to as the "City"), and

SC EAST LANDCO, LLC., 9275 W RUSSEL ROAD, SUITE 400, LAS VEGAS, NEVADA 89148 hereinafter referred to as "Developer")

W I T N E S S E T H:

WHEREAS, the Developer is the owner of record of that certain real property that is located within the corporate boundaries of the City AS SHOWN IN EXHIBIT "B" (the "Property" herein); and

WHEREAS, the Developer has or there will have been constructed certain Drainage structures on adjacent property as flood control facilities to protect the Property as shown in Exhibit B; and

WHEREAS, the City of Las Vegas Public Works Department – Flood Control Section, at a review held on ***9/5/2019 CONDITIONALLY*** approved the Drainage Study **(5135B)** for the Property, the approval of which is conditioned upon the completion of a Drainage Improvement Maintenance Agreement to guarantee maintenance of said Drainage Structures (the "Drainage Improvements" herein); and

WHEREAS, by its execution of this Agreement, the Developer intends to bind and obligate itself and its heirs, successors and assigns to inspect, maintain, and repair the Drainage Improvements in the manner and at the times that are hereinafter set forth;

NOW, THEREFORE, for and in consideration of the premises, of the mutual promises and agreements that are hereinafter contained and of other good and valuable considerations, the receipt and sufficiency of which is hereby acknowledged by each of the parties hereto, said parties do hereby agree as follows:

1. COVENANT OF MAINTENANCE AND WORKSITE CLEAN-UP: The Developer, for itself, its heirs, successors and assigns, hereby covenants and agrees that:

(A) At its sole cost and expense, the Developer shall maintain the Drainage Improvements strictly in accordance with plans and specifications that are approved by the City pursuant to Paragraph 2 hereof, and shall be responsible for the removal, at its sole cost and expense and to the City's satisfaction, of all rubbish, trash, debris, surplus material and equipment from the area that is the subject of this Agreement (hereinafter the "Worksite").

(B) The Developer shall inspect and maintain the Drainage Improvements continually until the City of Las Vegas provides written notice to take over the inspection and maintenance duties.

Once the above conditions are met, all guaranties and obligations shall terminate for construction, reconstruction, alteration, inspection, removal and maintenance of the Drainage Improvements pursuant to this Agreement.

2. PLANS AND SPECIFICATIONS: The Developer agrees to submit to the City, and obtain the approval of the City of as-built plans and specifications for the Drainage Improvements. Thereafter, the continued maintenance of the Drainage Improvements shall be in accordance with the approved plans and specifications (hereinafter the "Improvement Plans"). The Developer hereby assumes full and complete responsibility for the accuracy of the Improvement Plans, and any subsequent approval thereof by the City shall not relieve the Developer of such responsibility.

3. STATEMENT OF INSPECTION: In the event the City Engineer, or his authorized representative, inspects any of the work that is described in Paragraph 2 above and finds that such work has been performed in a satisfactory manner, the City Engineer, or his authorized representative, shall issue a statement of inspection; provided, however, that the inspection and approval of the work shall not relieve the Developer of its responsibility for the proper maintenance of the work in accordance with the standards that are set forth in Paragraph 6 hereof, or abridge the right of the City to require the correction of faulty workmanship or the replacement of defective materials at any time during the course of the work, notwithstanding the fact that the construction has been completed according to the Improvement Plans. Should subsurface conditions, including without limitation excess water, clay salts, voids or similar defects, subsequently be discovered, the City may require the Developer, at the Developer's sole cost and expense, to alter the Improvement Plans for any further construction or to correct, change or reconstruct the area that is affected by such conditions, or to take both of such actions subject to the limitations of Paragraph 1(B), above.

4. UTILITIES: The Developer agrees, at its sole cost and expense, to make any adjustment in the construction and installation of the Drainage Improvements which is necessary in order to accommodate the location of all existing utilities or, in the alternative and with the approval of the utility company that owns such utilities, to adjust such utilities in order to avoid any conflict between them and the Drainage Improvements.

5. APPROVAL:

(A) The City shall have no obligation to approve the Drainage Improvements as-built, notwithstanding any prior approval. The City hereby reserves the right to require the correction by the Developer of any portion of the Drainage Improvements that does not comply with the standards that are set forth in Paragraph 6 hereof, subject to the limitations of Paragraph 1(B), above.

(B) It is expressly understood and agreed by the Developer that any inspection and approval of the Drainage Improvements do not relieve the Developer of its responsibility for latent defects in the work. The Developer also expressly agrees to assume any consequence of proceeding with modifications to the existing detention basin.

6. STANDARDS OF CONSTRUCTION AND INSTALLATION: The Developer agrees that the maintenance and repair of the Drainage Improvements shall be in accordance with all applicable ordinances, regulations and requirements of the City, including any public works standards that the City may deem necessary or appropriate for the Project, subject to the limitations of Paragraph 1(B), above.

7. INSPECTION, MAINTENANCE AND REPAIR OF DRAINAGE IMPROVEMENTS:

(A) The Developer shall be responsible for maintaining the Drainage Improvements in accordance with the Improvement Plans. If, at any time during the effective period of this Agreement, the Drainage Improvements are altered by periodic runoff that is diverted within the Drainage Improvements, or are otherwise in need of repair, the Developer shall in a timely manner restore the Drainage Improvements to their original improved state. Maintenance and restoration which may be requested or demanded by the City shall be performed within such *reasonable* time as the City may indicate by written notice. Maintenance of the Drainage Improvements shall continue until terminated in accordance with Paragraph 1(B).

(B) The Developer and its representatives shall visually monitor the Drainage Improvements continually until termination of such obligation in accordance with Paragraph 1(B). The Developer shall be responsible for conducting site inspections at least once every 30 days and after any storm event that produces storm water discharge within the Drainage Improvements. Upon any such inspection that reveals any obvious change to the Drainage Improvements, a written inspection report shall be prepared and forwarded to the City's Department of Public Works for review. In the event of any significant change, the City shall be contacted immediately in order to allow the City the opportunity to conduct its own inspection.

8. DEFAULT: In the event the Developer fails to perform any obligation described in Paragraph 7 (hereinafter the "Additional Work") and such failure is not cured within the reasonable time specified for such cure, the City may, at its option, proceed to perform any such work or obligation at the expense of the Developer or pursue its remedies under the performance security that is provided for in Paragraph 9 hereof, or take both of such actions.

9. PERFORMANCE SECURITY:

In order to secure the faithful performance of all of the terms, conditions and covenants of this Agreement, the Developer agrees to execute and deliver to the City a performance bond, in the amount of $SIXTY THREE THOUSAND SEVEN HUNDRED which is issued by a surety company that is authorized to transact business within the State of Nevada and is in a form that is approved by the City Attorney. Said performance bond shall name the City as the obligee thereof; shall be in a penal sum that is equal to the above referenced amount and shall be conditioned that the Developer shall perform the Additional Work in a timely manner as described in Paragraph 7, or, in the event of the default of the Developer so to do, that the proceeds of said bond may, at the option of the City and to the extent needed, be used for the payment of the Additional Work upon the City's exercise of its option to complete the same; and shall provide that any application to the surety for the release thereof shall not be granted unless such application is accompanied by a written statement by the City Engineer to the effect that all of the work that is required of the Developer hereunder has been completed in a satisfactory manner, is in full accordance with the terms hereof and has been approved by the City.

10. DELIVERY: Upon the Developer's delivery to the City of the performance security that is required in Paragraph 9 and any insurance certificates required pursuant to Paragraph 15, and the acceptance thereof by the City, the City shall, if otherwise warranted, perform all such acts as may be appropriate in order to permit the recordation of the Developer's final map(s) for the Property.

11. OCCUPANCY OR FINAL INSPECTION: The City may withhold any certificate of occupancy or final inspection with respect to the Property if and to the extent the Developer is in default of any of its obligations under this Agreement.

12. PERFORMANCE OF ADDITIONAL AGREEMENTS: The Developer further agrees that, in addition to its performance of all of the terms, conditions and covenants on its part to be performed under this Agreement, it will faithfully comply with all the conditions that may have been imposed by the Planning Commission,

the City Council, the City's Department of Public Works, or any of them, in order to obtain approval for the final map or to obtain any other development permit or approval.

13. RESPONSIBILITY FOR THE WORKSITE: Subject to the limitations of Paragraph 1(B), the Developer hereby assumes all responsibility for protecting and caring for the work and maintaining the Worksite and all other areas in which any construction work or Additional Work has taken or will take place, in a safe and secure manner from the date of the execution of this Agreement. The responsibilities that are assumed herein by the Developer shall include without limitation the responsibility to keep the Worksite free and clear of dangerous accumulations of rubbish, trash and debris and to install and maintain, in a sufficient number, any necessary barricades, traffic controls, lights, excavation covers and similar protection devices.

14. INDEMNIFICATION:

(A) The Developer hereby agrees to protect, indemnify and hold the City, its officers, agents and employees, harmless from and against any and all claims, damages, losses, expenses, suits, actions, decrees, judgments, awards, attorneys' fees and court costs which the City, its officers, employees or agents, may suffer, or which may be sought against, or are recovered or obtainable from, the City, its officers, employees or agents, as a result of, or by reason of, or arising out of or in consequence of any act or omission, negligent or otherwise, of the Developer or its contractor, subcontractors, agents or anyone who is or was directly or indirectly employed by, or acting in concert with, the Developer, its contractor, subcontractors or agents in the construction of the Drainage Improvements or the Additional Work associated therewith, subject to the limitations of Paragraph 1(B).

(B) In this connection, the Developer expressly agrees, at its sole cost and expense, to defend the City, its officers, employees and agents, in any suit or action that may be brought against it or them, or any of them, by reason of any act or omission, negligent or otherwise, against which the Developer has agreed to indemnify the City, its officers, employees and agents. If the Developer fails so to do, the City shall have the right, but not the obligation to defend same and to charge all of the reasonable direct and incidental costs of such defense, including attorneys' fees and court costs, to the Developer, and the City may recover such costs, or such portion thereof as may be available, from the performance security that it holds pursuant to Paragraph 9 above, if such security has not theretofore been exhausted or released.

15. INSURANCE:

(A) The Developer further agrees to secure and maintain, at a minimum and at its sole cost and expense, the following liability insurance coverages with respect to the use, maintenance, and repair of the Drainage Improvements, which coverages shall be maintained throughout the existence of this Agreement:

(1) Personal injury liability for injury or death to one person: $1,000,000.00;

(2) Personal injury liability for injury or death to any number of persons with respect to one occurrence: $3,000,000.00;

(3) Property damage liability per occurrence:

$1,000,000.00.

The City shall be named as an additional party insured under all of the liability coverages that are obtained with respect to the Improvements. The coverages that are required herein must be written by a company which is acceptable to the City and which is licensed to do business in the State of Nevada, and each policy with respect thereto shall provide that such coverages may not be canceled or materially altered without providing the City with sixty (60) calendar days' prior written notice of such cancellation or alteration.

(B) The Developer shall submit to the City a certificate of insurance, which evidences the required coverages. Such insurance coverages shall be so endorsed as to create the same liability on the part of the insurer that would exist if separate policies had been written for each the Developer and the City.

(C) In the event that any of the insurance coverages that are required herein is canceled, terminated, reduced or restricted, and the Developer fails to obtain equivalent replacement coverage before such cancellation, termination, reduction or restriction becomes effective, the City may avail itself of any remedy for breach provided herein or at law or in equity.

16. ASSIGNABILITY: Subject to approval by the City through the City Manager, Developer shall have the right to assign the *rights*, duties, covenants, obligations, representations and warranties stated herein or arising here from to a homeowners' association for the Property provided such association has the financial capability to assume such duties and obligations and to provide the performance security required by Section 9 herein.

IN WITNESS WHEREOF, the parties hereto have caused this Agreement to be executed by their duly authorized representatives the day and year first above written.

CITY OF LAS VEGAS

_____

CAROLYN G. GOODMAN, Mayor

The "City"

ATTEST:

_____

LuAnn D. Holmes, MMC, City Clerk

Approved as to form:

_____

Date

SC EAST LANDCO, LLC

By_____

The Developer

Print Name Robert Johnson
Authorized Agent

9275 W RUSSEL ROAD, SUITE 400

LAS VEGAS, NEVADA 89148

OFF-SITE IMPROVEMENTS AGREEMENT
PERFORMANCE BOND

SUNSTONE PHASE 1 LOG CABIN WAY

LD PROJECT# DS 5135B/L19-02444
BOND NUMBER_____
DATE EXECUTED_____

IMPORTANT: SURETY COMPANIES EXECUTING BONDS MUST BE LICENSED TO ISSUE SURETY BONDS BY THE STATE OF NEVADA INSURANCE DIVISION PURSUANT TO NEVADA REVISED STATUE 683A.090 AND BONDS MUST BE ISSUED BY AN APPOINTED AGENT PURSUANT TO NEVADA REVISED STATUTE 683A.280. NOTE: INDIVIDUAL SURETY BONDS ARE NOT ACCEPTABLE.

KNOW ALL MEN BY THESE PRESENTS, That we, the undersigned PRINCIPAL AND SURETY, are held and firmly bound unto the City of Las Vegas, Nevada, the obligee of this bond hereinafter referred to as the CITY, in the penal sum of _____DOLLARS, for the payment of which sum well and truly to be made, we bind ourselves, our heirs, executors, administrators and successors, and assigns, jointly and severally, firmly by these presents.

THE CONDITION OF THIS OBLIGATION IS SUCH, That whereas the PRINCIPAL is entering into a certain contract with the CITY, entitled ***DRAINAGE IMPROVEMENTS MAINTENANCE AGREEMENT***, a copy of which is attached hereto and incorporated herein;

NOW THEREFORE, if said PRINCIPAL shall well and truly perform and fulfill all the undertakings, covenants, terms and conditions and agreements of said contract during the original term of said contract, then this obligation shall be null and void, otherwise it shall remain in full force and effect.

PROVIDED, that any modifications in the work to be done or the materials to be furnished, which may be made pursuant to the terms of said Contract, shall not in any way release either said PRINCIPAL or said SURETY hereunder, nor shall any extensions of time granted under the provisions of said Contract release either said PRINCIPAL or said SURETY, and notice of such modifications or extensions of the Contract is hereby waived by said Surety.

SEAL AND NOTARIAL ACKNOWLEDGMENT OF SURETY

SIGNED this ____ day of _____, 20___

_____
(PRINCIPAL)

_____
(Authorized Representative and Title)

By:_____
(Signature)

Surety:_____

_____
(State of Nevada, License Number)

_____
(Appointed Agent Name)

By:_____
(Signature)

Address:_____

_____

Telephone:_____

ISSUING COMPANY MUST HOLD CERTIFICATES OF AUTHORITY AS ACCEPTABLE SURETY ON FEDERAL BONDS AND AS ACCEPTABLE REINSURING COMPANY WITH LISTING IN THE DEPARTMENT OF TREASURY, FISCAL SERVICE, (DEPARTMENT OF CIRCULAR "570", CURRENT REVISIONS).

City of Las Vegas
Department of Building & Safety
Limited-Liability Company
Certificate of Authorization Form

I, Robert Johnson (Name of person signing this Certificate), the Authorized Agent (Title of member signing this Certificate, must be an LLC Member) of SC East Landco (Name of LLC), a Nevada (State in which LLC is created) limited liability company (the "LLC") named as Owner in the attached Drainage Offsite Agreement (Insert type of Application or Document) do hereby certify that Robert Johnson (Name of person signing the Application or Document), a Authorized Agent (LLC Manager or Member) of the LLC, is is authorized to sign the Drainage Offsite Agreement (Insert type of Application or Document) for and on behalf of the LLC for the project known as Sunstone Ph. 1 Log Cabin Way Drainage (Insert name of Project) in the City of Las Vegas, County of Clark, Nevada.

Signature: _____ Date: 3·17·20

Print Name: Robert Johnson

Title: Authorized Agent

STATE OF)
)ss.
COUNTY OF)

On this 17 day of March, 2020, before me personally appeared Robert Johnson, known or proven to me to be the person who executed this Certificate, who acknowledged that he is a Member of SC East Landco, LLC the LLC named as Owner above, and that he executed this Certificate on behalf of said LLC for the purposes therein stated.

SHIRLEY MILLER
Notary Public, State of Nevada
Appointment No. 17-2540-1
My Appt. Expires Jun 25, 2021

_____
Notary Public

PLEASE DO NOT WRITE WITHIN 1-INCH MARGINS

City of Las Vegas Department of Building & Safety
Land Development

Ownership Disclosure
Form

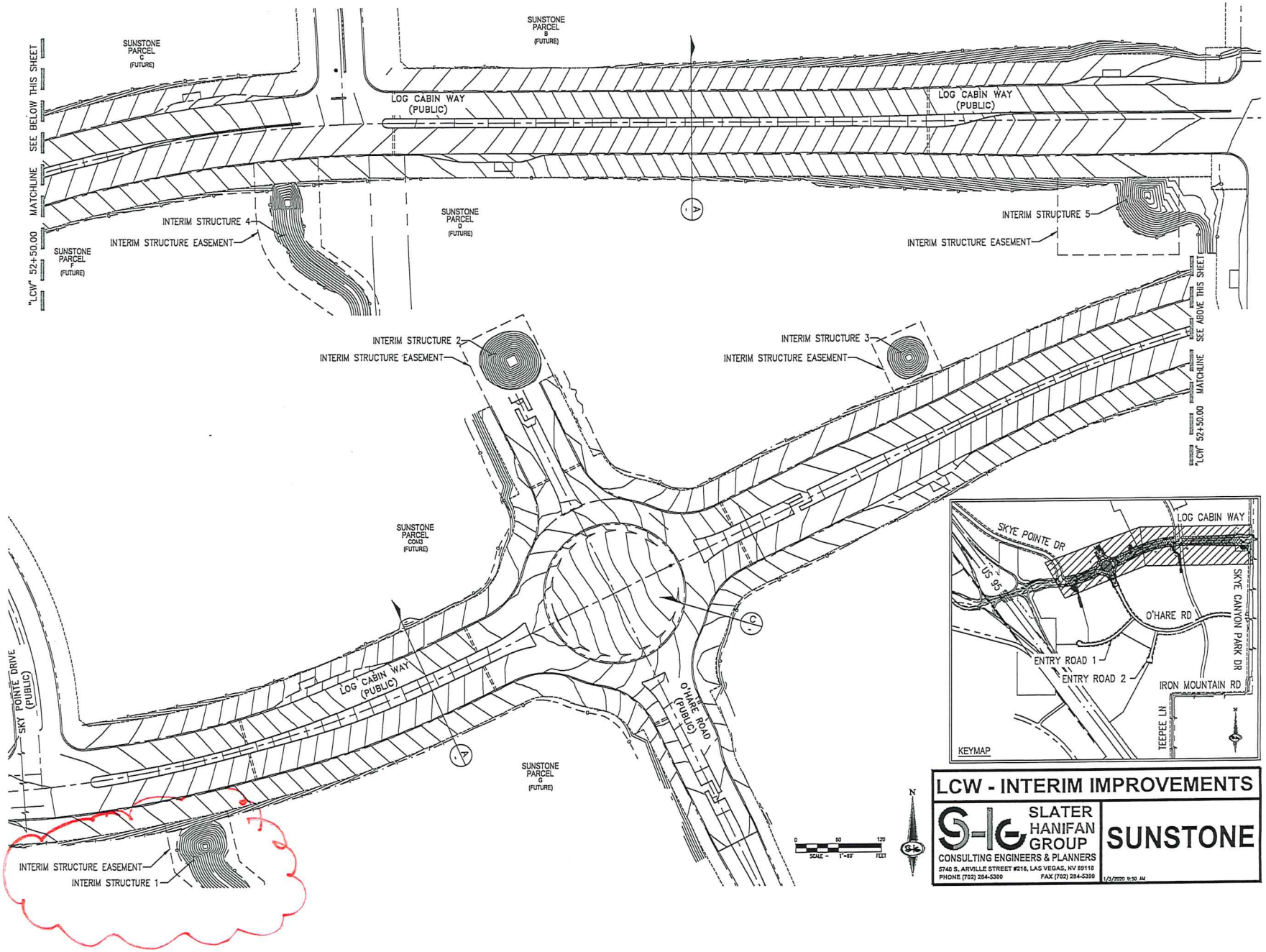
Project: Sunstone Ph. 1 Log Cabin Way - Drainage

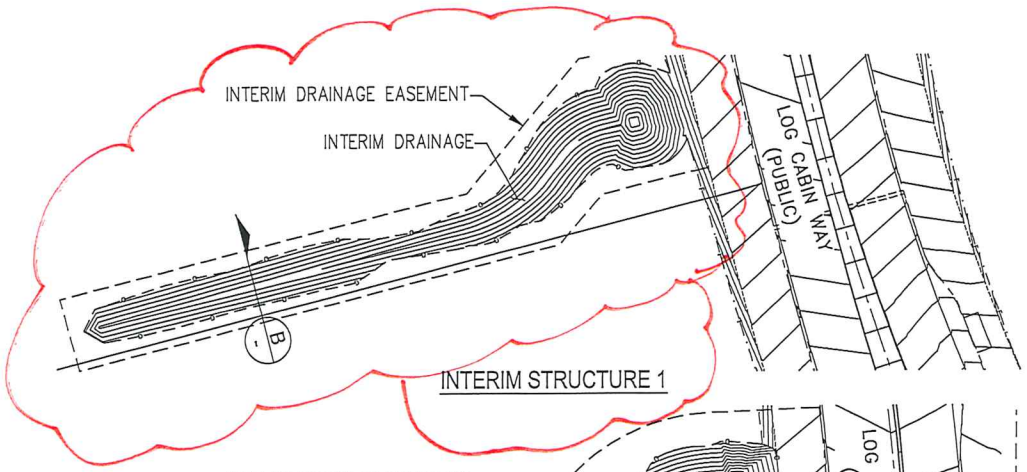
Please list all individuals and entities with an ownership interest in Owner. Said list should include, without limitation, any and all trustees, general and limited partnerships, corporate officers, managers, agents of home owner's associations, limited liability companies, partnerships and joint ventures.

Name	Relationship/Position	% of Ownership
SC East Land 00, LLC	owner	100 %

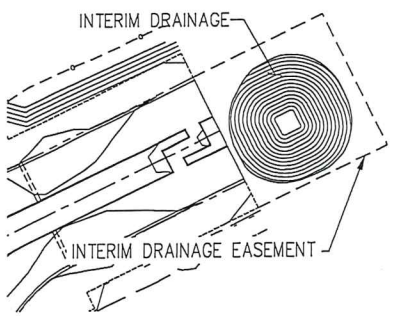
Please add additional pages if necessary and indicate number of additional page here: _____

PLEASE COMPLETE IN BLACK INK OR TYPE &
DO NOT WRITE WITHIN 1-INCH MARGINS


SUNSTONE PARCEL C (FUTURE)
SUNSTONE PARCEL B (FUTURE)
LOG CABIN WAY (PUBLIC)
LOG CABIN WAY (PUBLIC)
SEE BELOW THIS SHEET
MATCHLINE "LCW" 52+50.00
INTERIM STRUCTURE 4
INTERIM STRUCTURE EASEMENT
SUNSTONE PARCEL F (FUTURE)
SUNSTONE PARCEL D (FUTURE)
INTERIM STRUCTURE 5
INTERIM STRUCTURE EASEMENT
INTERIM STRUCTURE 2
INTERIM STRUCTURE EASEMENT
INTERIM STRUCTURE 3
INTERIM STRUCTURE EASEMENT
SEE ABOVE THIS SHEET
MATCHLINE "LCW" 52+50.00
SUNSTONE PARCEL D-1-3 (FUTURE)
SKY POINTE DRIVE (PUBLIC)
LOG CABIN WAY (PUBLIC)
O'HARE ROAD (PUBLIC)
SUNSTONE PARCEL G (FUTURE)
INTERIM STRUCTURE EASEMENT
INTERIM STRUCTURE 1
SKYE POINTE DR
LOG CABIN WAY
US 95
O'HARE RD
SKYE CANYON PARK DR
ENTRY ROAD 1
ENTRY ROAD 2
IRON MOUNTAIN RD
TEEPEE LN
KEYMAP
0 60 120
SCALE - 1"=60' FEET
N
LCW - INTERIM IMPROVEMENTS
SLATER HANIFAN GROUP
CONSULTING ENGINEERS & PLANNERS
5740 S. ARVILLE STREET #216, LAS VEGAS, NV 89118
PHONE (702) 284-5300 FAX (702) 284-5399
SUNSTONE
1/3/2020 9:50 AM



INTERIM STRUCTURE 1



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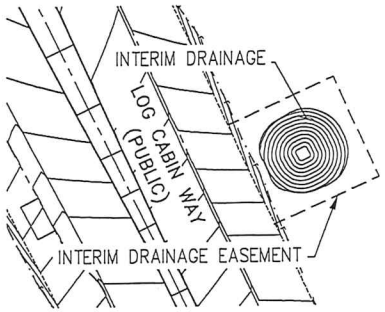

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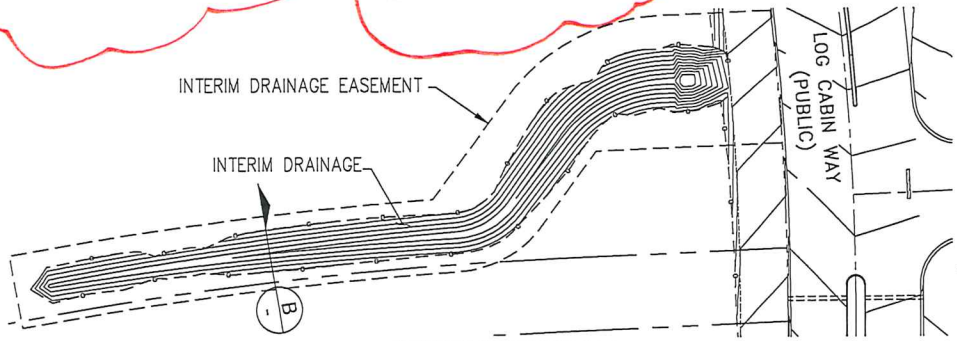

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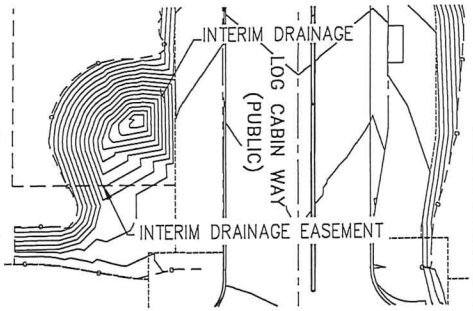
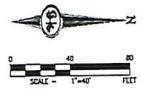
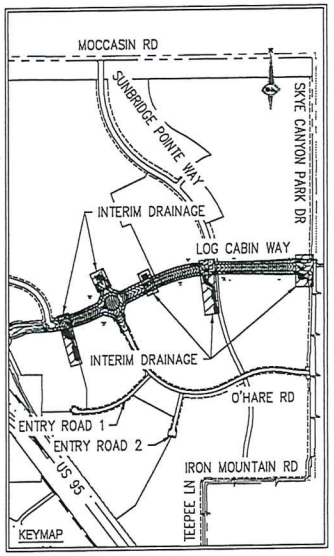
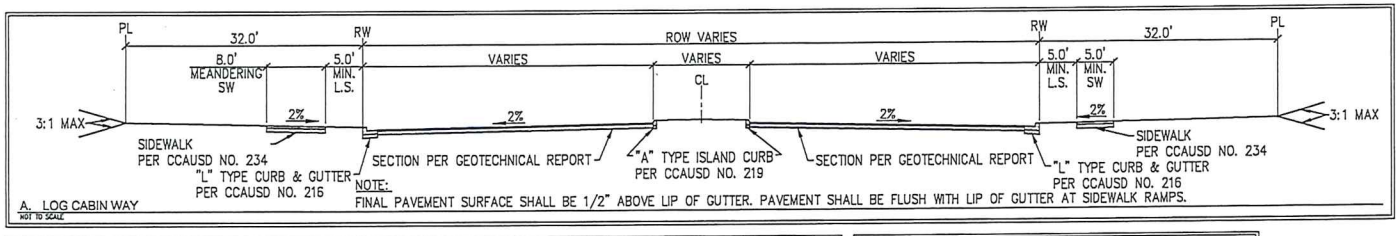
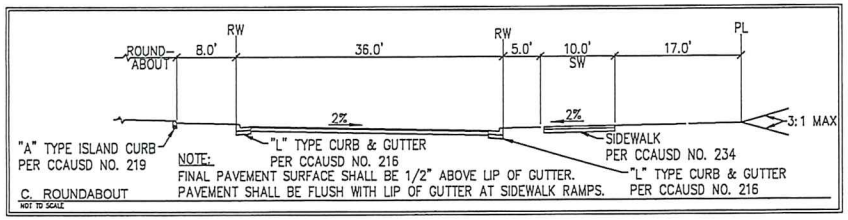


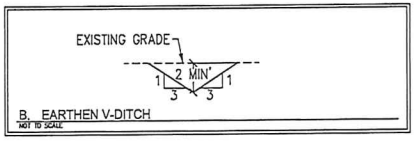
INTERIM STRUCTURE 5











LCW - INTERIM IMPROVEMENTS

SLATER HANIFAN GROUP
CONSULTING ENGINEERS & PLANNERS
5740 S. ARVILLE STREET #216, LAS VEGAS, NV 89118
PHONE (702) 284-5300 FAX (702) 284-5399

SUNSTONE

1/3/2020 9:56 AM

RCI ENGINEERING

March 29, 2022

City of Las Vegas
Planning Department
333 N. Rancho Drive
Las Vegas, NV 89106

APPROVED
DEPARTMENT OF PLANNING
CITY OF LAS VEGAS, NEVADA
2-Foot Grade Difference Only
mrex
Mar 30 2022

RE: Justification Letter for Sunstone G - Asher
Public Works Grading Plan Review per 19.06.030
APN 125-06-710-001

On behalf of our client Lennar, we have prepared the following justification letter in support of a vertical grade difference of two (2) feet or greater adjacent to existing grade for the 132 lot Sunstone Parcel G (AKA Asher at Sunstone) residential subdivision, APN 125-06-710-001.

Per City of Las Vegas Title 19 Section 19.06.030.B.1 *when the natural grade of a lot is proposed to be raised more than two feet at any point from existing grade a review of the proposed grading plan is required by the Department of Public Works to determine if the proposed grading plan will not be incompatible or out of harmony with the surrounding area.*

This letter and attached grading plans for the subject development are intended to provide clarification of the areas of grade difference in excess of two feet as well as identify that there will be no negative impact to adjacent developments in relation to Title 19 requirements.

Unit 1
A majority of the proposed grading within Unit 1 is more than two feet above the existing grade. The site had to be raised within Unit 1 so that the proposed minimum finish floor elevation would be at or above 2744.3 feet. This is the minimum finish floor elevation allowed within the Las Vegas Valley Pressure Zone Boundary for Unit 1. The finish floor elevations for Lots 25, 26, 96, 97, 107, and 108 have all been raised up to 2744.30 feet. All lots upstream of those lots were raised to provide positive drainage to the southeast corner of the site to match the Master Drainage Study for Sunstone. The Master Study shows the entire Parcel G draining to the south and the southeast corner of the site. The only way we could get the area along the north and west part of the site to drain to the south and southeast was to raise the site in those areas more than two feet above natural grade.

Unit 2
A majority of the proposed grading within Unit 2 is below the existing grade so that the minimum water pressure could meet the Water District criteria. Lots within Unit 2 will connect to the lower water pressure zone.

RCI ENGINEERING

The "Sunstone Parcel G" development is in compliance with the Sunstone Master Plan design guidelines and will not create an adverse condition on adjacent developments or streets. Should you have any questions or wish to further discuss this application please contact me at (702) 453-0800.

Sincerely,

RCI Engineering

Andrew E. Whittaker, P.E.

Digitally signed by Andrew E. Whittaker, P.E.
DN: C=US, E=awhittaker@rcinevada.com, CN="Andrew E. Whittaker, P.E."
Date: 2022.03.29 15:18:23-07'00'

Andrew E. Whittaker, P.E.

Andrew Whittaker

From: Oh-Sang Kwon <okwon@LasVegasNevada.GOV> on behalf of Oh-Sang Kwon
Sent: Monday, March 28, 2022 1:39 PM
To: Andrew Whittaker
Cc: Albert Sung
Subject: RE: DS05552

Sorry. disregard the $100K comment. It was for $50K.

Thank you,

Oh-Sang Kwon
Engineering Project Manager
Public Works | City Engineering
702-229-1815 | 702-379-9491
495 S. Main Street, 5th Floor | Las Vegas, NV 89101

lasvegasnevada.gov

Your opinion is important! Click here to take a short survey.

From: Andrew Whittaker <awhittaker@rcinevada.com>
Sent: Monday, March 28, 2022 1:33 PM
To: Oh-Sang Kwon <okwon@LasVegasNevada.GOV>
Cc: Albert Sung <YSung@LasVegasNevada.GOV>
Subject: RE: DS05552

I understand the $50,000 maintenance bond for the temporary OFFSITE drainage facility to the west.

However, I am asking for clarification on the $100,000 bond for ONSITE DRAINAGE RELATED ITEMS (1st paragraph on page 2). No one in our office has experienced receiving a comment regarding a bond for ONSITE DRAINAGE RELATED ITEMS.

Thanks,
Andy

From: Oh-Sang Kwon [mailto:okwon@LasVegasNevada.GOV]
Sent: Monday, March 28, 2022 1:18 PM

To: Andrew Whittaker <awhittaker@rcinevada.com>
Cc: Albert Sung <YSung@LasVegasNevada.GOV>
Subject: RE: DS05552

Any temporary/interim drainage facility that is required to protect your subdivision requires maintenance bond. We have been doing this before my time at the City.

Thank you,

Oh-Sang Kwon
Engineering Project Manager
Public Works | City Engineering
702-229-1815 | 702-379-9491
495 S. Main Street, 5th Floor | Las Vegas, NV 89101

lasvegasnevada.gov

Your opinion is important! Click here to take a short survey.

From: Andrew Whittaker <awhittaker@rcinevada.com>
Sent: Monday, March 28, 2022 12:12 PM
To: Oh-Sang Kwon <okwon@LasVegasNevada.GOV>
Cc: Albert Sung <YSung@LasVegasNevada.GOV>
Subject: RE: DS05552

Oh-Sang,
In the last paragraph of Comment 2, you want us to post a bond of $100,000 minimum for on-site drainage related items.
Can you clarify on why this is needed? This is the 1st time we have seen this comment.
We do not have any on-site storm drain, if we did, it would be provided on the bond estimate.
Regards,
Andy

Andrew E. Whittaker, P.E.
RCI Engineering
702-998-2102

From: Oh-Sang Kwon [mailto:okwon@LasVegasNevada.GOV]
Sent: Sunday, March 27, 2022 2:31 PM
To: Andrew Whittaker <awhittaker@rcinevada.com>

Cc: Albert Sung <YSung@LasVegasNevada.GOV>
Subject: DS05552

Andrew,

Please see attached comment for DS05552.

Thank you,

Oh-Sang Kwon
Engineering Project Manager
Public Works | City Engineering
702-229-1815 | 702-379-9491
495 S. Main Street, 5th Floor | Las Vegas, NV 89101

lasvegasnevada.gov

Your opinion is important! Click here to take a short survey.

APPENDIX C – HYDRAULIC CALCS

100-Year Ultimate Condition

Flow Rate Hydraulic Street Cross Sections

Emergency Overflow Calculations

Worksheet for Irregular Section - 1

Project Description	
Friction Method	Manning Formula
Solve For	Normal Depth

Input Data	
Channel Slope	1.34 %
Discharge	35.00 cfs

Section Definitions

Station (ft)	Elevation (ft)
0+00.0	0.48
0+05.0	0.38
0+06.5	0.00
0+07.5	0.08
0+07.5	0.12
0+24.5	0.46
0+41.5	0.12
0+41.5	0.08
0+43.5	0.00
0+44.0	0.38
0+49.0	0.48

Roughness Segment Definitions

Start Station	Ending Station	Roughness Coefficient
(0+00.0, 0.48)	(0+07.5, 0.12)	0.013
(0+07.5, 0.12)	(0+41.5, 0.12)	0.016
(0+41.5, 0.12)	(0+49.0, 0.48)	0.013

Options	
Current Roughness Weighted Method	Pavlovskii's Method
Open Channel Weighting Method	Pavlovskii's Method
Closed Channel Weighting Method	Pavlovskii's Method

Results	
Normal Depth	0.49 ft
Elevation Range	0.00 to 0.48 ft
Flow Area	9.3 ft²
Wetted Perimeter	49.29 ft
Hydraulic Radius	0.19 ft
Top Width	49.00 ft
Normal Depth	0.49 ft
Critical Depth	0.55 ft

Worksheet for Irregular Section - 1

Results	
Critical Slope	0.53 %
Velocity	3.75 ft/s
Velocity Head	0.22 ft
Specific Energy	0.71 ft
Froude Number	1.516
Flow Type	Supercritical

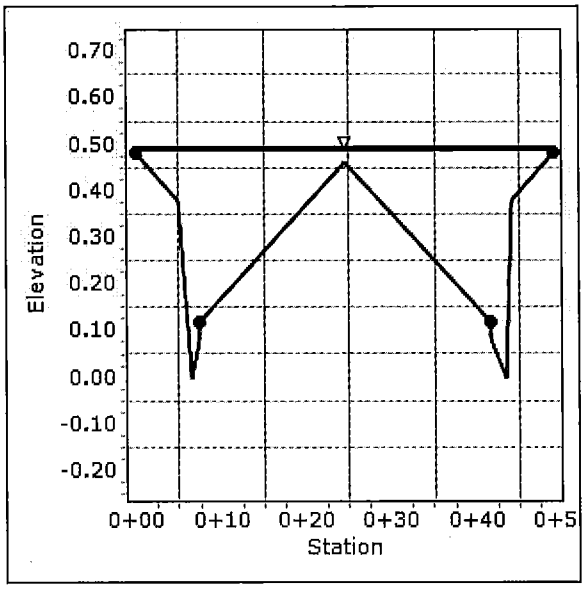
GVF Input Data	
Downstream Depth	0.00 ft
Length	0.00 ft
Number Of Steps	0

GVF Output Data	
Upstream Depth	0.00 ft
Profile Description	N/A
Profile Headloss	0.00 ft
Downstream Velocity	Infinity ft/s
Upstream Velocity	Infinity ft/s
Normal Depth	0.49 ft
Critical Depth	0.55 ft
Channel Slope	1.34 %
Critical Slope	0.53 %

Cross Section for Irregular Section - 1

Project Description	
Friction Method	Manning Formula
Solve For	Normal Depth

Input Data	
Channel Slope	1.34 %
Normal Depth	0.49 ft
Discharge	35.00 cfs



Worksheet for Irregular Section - 2

Project Description	
Friction Method	Manning Formula
Solve For	Normal Depth

Input Data	
Channel Slope	2.45 %
Discharge	14.00 cfs

Section Definitions

Station (ft)	Elevation (ft)
0+00.0	0.48
0+05.0	0.38
0+06.5	0.00
0+07.5	0.08
0+07.5	0.12
0+24.5	0.46
0+41.5	0.12
0+41.5	0.08
0+43.5	0.00
0+44.0	0.38
0+49.0	0.48

Roughness Segment Definitions

Start Station	Ending Station	Roughness Coefficient
(0+00.0, 0.48)	(0+07.5, 0.12)	0.013
(0+07.5, 0.12)	(0+41.5, 0.12)	0.016
(0+41.5, 0.12)	(0+49.0, 0.48)	0.013

Options	
Current Roughness Weighted Method	Pavlovskii's Method
Open Channel Weighting Method	Pavlovskii's Method
Closed Channel Weighting Method	Pavlovskii's Method

Results	
Normal Depth	0.34 ft
Elevation Range	0.00 to 0.48 ft
Flow Area	3.6 ft²
Wetted Perimeter	26.82 ft
Hydraulic Radius	0.13 ft
Top Width	26.58 ft
Normal Depth	0.34 ft
Critical Depth	0.42 ft

Worksheet for Irregular Section - 2

Results	
Critical Slope	0.65 %
Velocity	3.92 ft/s
Velocity Head	0.24 ft
Specific Energy	0.58 ft
Froude Number	1.886
Flow Type	Supercritical

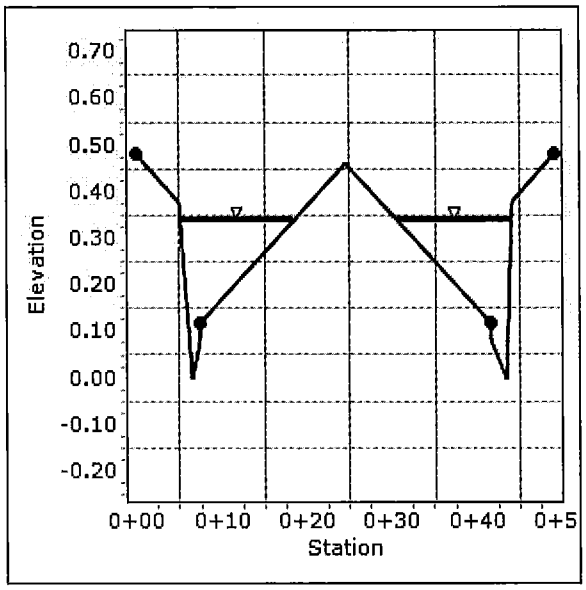
GVF Input Data	
Downstream Depth	0.00 ft
Length	0.00 ft
Number Of Steps	0

GVF Output Data	
Upstream Depth	0.00 ft
Profile Description	N/A
Profile Headloss	0.00 ft
Downstream Velocity	Infinity ft/s
Upstream Velocity	Infinity ft/s
Normal Depth	0.34 ft
Critical Depth	0.42 ft
Channel Slope	2.45 %
Critical Slope	0.65 %

Cross Section for Irregular Section - 2

Project Description	
Friction Method	Manning Formula
Solve For	Normal Depth

Input Data	
Channel Slope	2.45 %
Normal Depth	0.34 ft
Discharge	14.00 cfs



Worksheet for Irregular Section - 3(1/2 STREET)

Project Description	
Friction Method	Manning Formula
Solve For	Normal Depth

Input Data	
Channel Slope	1.25 %
Discharge	11.00 cfs

Section Definitions

Station (ft)	Elevation (ft)
0+00.0	0.48
0+05.0	0.38
0+06.5	0.00
0+07.5	0.08
0+07.5	0.12
0+24.5	0.46

Roughness Segment Definitions

Start Station	Ending Station	Roughness Coefficient
(0+00.0, 0.48)	(0+07.5, 0.12)	0.013
(0+07.5, 0.12)	(0+24.5, 0.46)	0.016

Options	
Current Roughness Weighted Method	Pavlovskii's Method
Open Channel Weighting Method	Pavlovskii's Method
Closed Channel Weighting Method	Pavlovskii's Method

Results	
Normal Depth	0.44 ft
Elevation Range	0.00 to 0.48 ft
Flow Area	3.5 ft²
Wetted Perimeter	21.72 ft
Hydraulic Radius	0.16 ft
Top Width	21.63 ft
Normal Depth	0.44 ft
Critical Depth	0.49 ft
Critical Slope	0.60 %
Velocity	3.19 ft/s
Velocity Head	0.16 ft
Specific Energy	0.60 ft
Froude Number	1.406
Flow Type	Supercritical

Worksheet for Irregular Section - 3 (1/2 STREET)

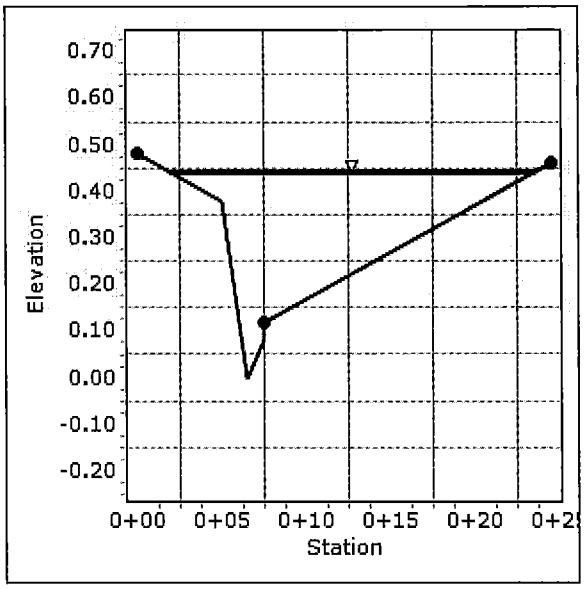
GVF Input Data	
Downstream Depth	0.00 ft
Length	0.00 ft
Number Of Steps	0

GVF Output Data	
Upstream Depth	0.00 ft
Profile Description	N/A
Profile Headloss	0.00 ft
Downstream Velocity	Infinity ft/s
Upstream Velocity	Infinity ft/s
Normal Depth	0.44 ft
Critical Depth	0.49 ft
Channel Slope	1.25 %
Critical Slope	0.60 %

Cross Section for Irregular Section - 3(1/2 STREET)

Project Description	
Friction Method	Manning Formula
Solve For	Normal Depth

Input Data	
Channel Slope	1.25 %
Normal Depth	0.44 ft
Discharge	11.00 cfs



Worksheet for Irregular Section - 4

Project Description	
Friction Method	Manning Formula
Solve For	Normal Depth

Input Data	
Channel Slope	0.55 %
Discharge	3.00 cfs

Section Definitions

Station (ft)	Elevation (ft)
0+00.0	44.14
0+00.5	44.14
0+00.5	43.64
0+02.0	43.77
0+02.0	43.81
0+25.0	43.34
0+25.0	43.84
0+33.0	43.70
0+33.0	43.20
0+56.0	42.85
0+56.0	42.81
0+57.5	42.68
0+57.5	43.15
0+58.0	43.15

Roughness Segment Definitions

Start Station	Ending Station	Roughness Coefficient
(0+00.0, 44.14)	(0+02.0, 43.81)	0.013
(0+02.0, 43.81)	(0+25.0, 43.84)	0.016
(0+25.0, 43.84)	(0+58.0, 43.15)	0.013

Options	
Current Roughness Weighted Method	Pavlovskii's Method
Open Channel Weighting Method	Pavlovskii's Method
Closed Channel Weighting Method	Pavlovskii's Method

Results	
Normal Depth	0.35 ft
Elevation Range	42.68 to 44.14 ft
Flow Area	1.5 ft²
Wetted Perimeter	13.95 ft
Hydraulic Radius	0.11 ft

Worksheet for Irregular Section - 4

Results	
Top Width	13.55 ft
Normal Depth	0.35 ft
Critical Depth	0.36 ft
Critical Slope	0.53 %
Velocity	1.95 ft/s
Velocity Head	0.06 ft
Specific Energy	0.41 ft
Froude Number	1.022
Flow Type	Supercritical

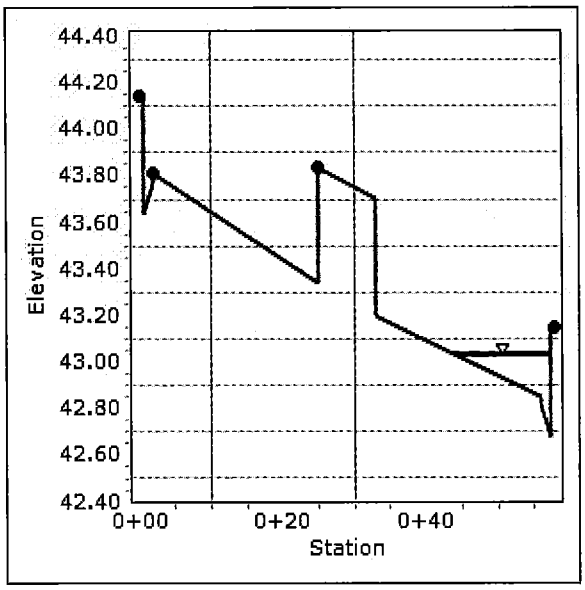
GVF Input Data	
Downstream Depth	0.00 ft
Length	0.00 ft
Number Of Steps	0

GVF Output Data	
Upstream Depth	0.00 ft
Profile Description	N/A
Profile Headloss	0.00 ft
Downstream Velocity	Infinity ft/s
Upstream Velocity	Infinity ft/s
Normal Depth	0.35 ft
Critical Depth	0.36 ft
Channel Slope	0.55 %
Critical Slope	0.53 %

Cross Section for Irregular Section - 4

Project Description	
Friction Method	Manning Formula
Solve For	Normal Depth

Input Data	
Channel Slope	0.55 %
Normal Depth	0.35 ft
Discharge	3.00 cfs



Worksheet for Irregular Section - 5

Project Description	
Friction Method	Manning Formula
Solve For	Normal Depth

Input Data	
Channel Slope	1.40 %
Discharge	20.00 cfs

Section Definitions

Station (ft)	Elevation (ft)
0+00.0	0.48
0+05.0	0.38
0+06.5	0.00
0+07.5	0.08
0+07.5	0.12
0+24.5	0.46
0+41.5	0.12
0+41.5	0.08
0+43.5	0.00
0+44.0	0.38
0+49.0	0.48

Roughness Segment Definitions

Start Station	Ending Station	Roughness Coefficient
(0+00.0, 0.48)	(0+07.5, 0.12)	0.013
(0+07.5, 0.12)	(0+41.5, 0.12)	0.016
(0+41.5, 0.12)	(0+49.0, 0.48)	0.013

Options	
Current Roughness Weighted Method	Pavlovskii's Method
Open Channel Weighting Method	Pavlovskii's Method
Closed Channel Weighting Method	Pavlovskii's Method

Results	
Normal Depth	0.42 ft
Elevation Range	0.00 to 0.48 ft
Flow Area	6.0 ft²
Wetted Perimeter	38.38 ft
Hydraulic Radius	0.16 ft
Top Width	38.11 ft
Normal Depth	0.42 ft
Critical Depth	0.47 ft

Worksheet for Irregular Section - 5

Results	
Critical Slope	0.62 %
Velocity	3.33 ft/s
Velocity Head	0.17 ft
Specific Energy	0.59 ft
Froude Number	1.478
Flow Type	Supercritical

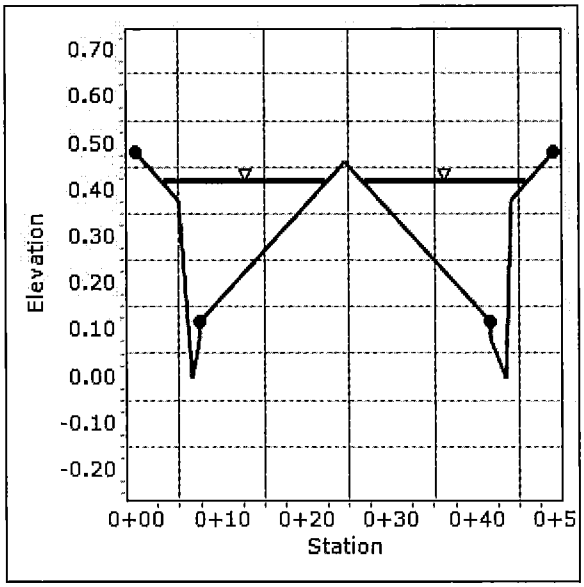
GVF Input Data	
Downstream Depth	0.00 ft
Length	0.00 ft
Number Of Steps	0

GVF Output Data	
Upstream Depth	0.00 ft
Profile Description	N/A
Profile Headloss	0.00 ft
Downstream Velocity	Infinity ft/s
Upstream Velocity	Infinity ft/s
Normal Depth	0.42 ft
Critical Depth	0.47 ft
Channel Slope	1.40 %
Critical Slope	0.62 %

Cross Section for Irregular Section - 5

Project Description	
Friction Method	Manning Formula
Solve For	Normal Depth

Input Data	
Channel Slope	1.40 %
Normal Depth	0.42 ft
Discharge	20.00 cfs



Worksheet for Irregular Section - 7

Project Description	
Friction Method	Manning Formula
Solve For	Normal Depth

Input Data	
Channel Slope	1.40 %
Discharge	11.00 cfs

Section Definitions

Station (ft)	Elevation (ft)
0+00.0	0.48
0+05.0	0.38
0+06.5	0.00
0+07.5	0.08
0+07.5	0.12
0+24.5	0.46
0+41.5	0.12
0+41.5	0.08
0+43.5	0.00
0+44.0	0.38
0+49.0	0.48

Roughness Segment Definitions

Start Station	Ending Station	Roughness Coefficient
(0+00.0, 0.48)	(0+07.5, 0.12)	0.013
(0+07.5, 0.12)	(0+41.5, 0.12)	0.016
(0+41.5, 0.12)	(0+49.0, 0.48)	0.013

Options	
Current Roughness Weighted Method	Pavlovskii's Method
Open Channel Weighting Method	Pavlovskii's Method
Closed Channel Weighting Method	Pavlovskii's Method

Results	
Normal Depth	0.34 ft
Elevation Range	0.00 to 0.48 ft
Flow Area	3.7 ft²
Wetted Perimeter	27.23 ft
Hydraulic Radius	0.13 ft
Top Width	26.99 ft
Normal Depth	0.34 ft
Critical Depth	0.38 ft

Worksheet for Irregular Section - 7

Results	
Critical Slope	0.66 %
Velocity	2.99 ft/s
Velocity Head	0.14 ft
Specific Energy	0.48 ft
Froude Number	1.430
Flow Type	Supercritical

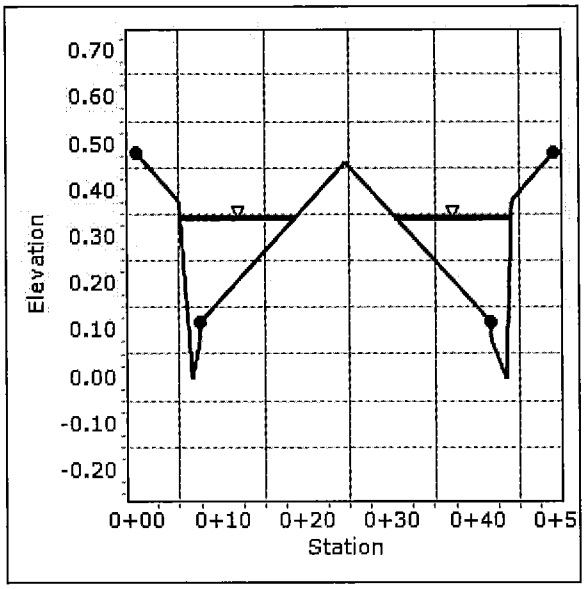
GVF Input Data	
Downstream Depth	0.00 ft
Length	0.00 ft
Number Of Steps	0

GVF Output Data	
Upstream Depth	0.00 ft
Profile Description	N/A
Profile Headloss	0.00 ft
Downstream Velocity	Infinity ft/s
Upstream Velocity	Infinity ft/s
Normal Depth	0.34 ft
Critical Depth	0.38 ft
Channel Slope	1.40 %
Critical Slope	0.66 %

Cross Section for Irregular Section - 7

Project Description	
Friction Method	Manning Formula
Solve For	Normal Depth

Input Data	
Channel Slope	1.40 %
Normal Depth	0.34 ft
Discharge	11.00 cfs



Worksheet for Irregular Section - 9

Project Description	
Friction Method	Manning Formula
Solve For	Normal Depth

Input Data	
Channel Slope	2.38 %
Discharge	5.00 cfs

Section Definitions

Station (ft)	Elevation (ft)
0+00.0	0.48
0+05.0	0.38
0+06.5	0.00
0+07.5	0.08
0+07.5	0.12
0+24.5	0.46
0+41.5	0.12
0+41.5	0.08
0+43.5	0.00
0+44.0	0.38
0+49.0	0.48

Roughness Segment Definitions

Start Station	Ending Station	Roughness Coefficient
(0+00.0, 0.48)	(0+07.5, 0.12)	0.013
(0+07.5, 0.12)	(0+41.5, 0.12)	0.016
(0+41.5, 0.12)	(0+49.0, 0.48)	0.013

Options	
Current Roughness Weighted Method	Pavlovskii's Method
Open Channel Weighting Method	Pavlovskii's Method
Closed Channel Weighting Method	Pavlovskii's Method

Results	
Normal Depth	0.25 ft
Elevation Range	0.00 to 0.48 ft
Flow Area	1.6 ft²
Wetted Perimeter	17.42 ft
Hydraulic Radius	0.09 ft
Top Width	17.21 ft
Normal Depth	0.25 ft
Critical Depth	0.30 ft

Worksheet for Irregular Section - 9

Results	
Critical Slope	0.71 %
Velocity	3.08 ft/s
Velocity Head	0.15 ft
Specific Energy	0.40 ft
Froude Number	1.769
Flow Type	Supercritical

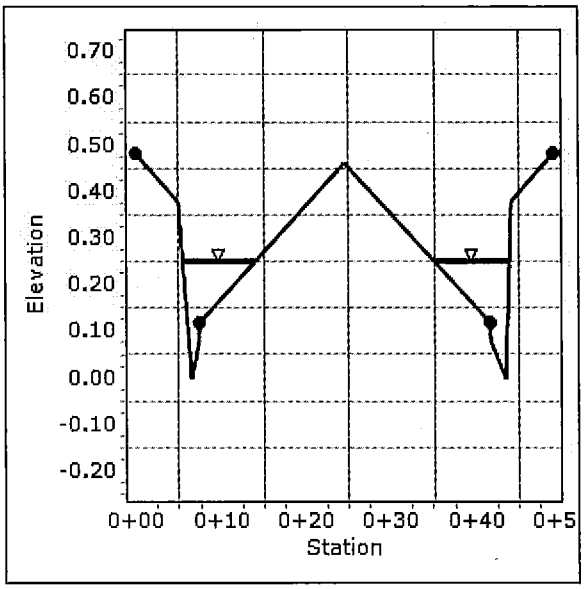
GVF Input Data	
Downstream Depth	0.00 ft
Length	0.00 ft
Number Of Steps	0

GVF Output Data	
Upstream Depth	0.00 ft
Profile Description	N/A
Profile Headloss	0.00 ft
Downstream Velocity	Infinity ft/s
Upstream Velocity	Infinity ft/s
Normal Depth	0.25 ft
Critical Depth	0.30 ft
Channel Slope	2.38 %
Critical Slope	0.71 %

Cross Section for Irregular Section - 9

Project Description	
Friction Method	Manning Formula
Solve For	Normal Depth

Input Data	
Channel Slope	2.38 %
Normal Depth	0.25 ft
Discharge	5.00 cfs



Worksheet for Irregular Section - 10

Project Description	
Friction Method	Manning Formula
Solve For	Normal Depth

Input Data	
Channel Slope	0.80 %
Discharge	11.00 cfs

Section Definitions

Station (ft)	Elevation (ft)
0+00.0	0.48
0+05.0	0.38
0+06.5	0.00
0+07.5	0.08
0+07.5	0.12
0+24.5	0.46
0+41.5	0.12
0+41.5	0.08
0+43.5	0.00
0+44.0	0.38
0+49.0	0.48

Roughness Segment Definitions

Start Station	Ending Station	Roughness Coefficient
(0+00.0, 0.48)	(0+07.5, 0.12)	0.013
(0+07.5, 0.12)	(0+41.5, 0.12)	0.016
(0+41.5, 0.12)	(0+49.0, 0.48)	0.013

Options	
Current Roughness Weighted Method	Pavlovskii's Method
Open Channel Weighting Method	Pavlovskii's Method
Closed Channel Weighting Method	Pavlovskii's Method

Results	
Normal Depth	0.37 ft
Elevation Range	0.00 to 0.48 ft
Flow Area	4.6 ft²
Wetted Perimeter	30.51 ft
Hydraulic Radius	0.15 ft
Top Width	30.24 ft
Normal Depth	0.37 ft
Critical Depth	0.38 ft

Worksheet for Irregular Section - 10

Results	
Critical Slope	0.66 %
Velocity	2.41 ft/s
Velocity Head	0.09 ft
Specific Energy	0.46 ft
Froude Number	1.095
Flow Type	Supercritical

GVF Input Data	
Downstream Depth	0.00 ft
Length	0.00 ft
Number Of Steps	0

GVF Output Data	
Upstream Depth	0.00 ft
Profile Description	N/A
Profile Headloss	0.00 ft
Downstream Velocity	Infinity ft/s
Upstream Velocity	Infinity ft/s
Normal Depth	0.37 ft
Critical Depth	0.38 ft
Channel Slope	0.80 %
Critical Slope	0.66 %

Cross Section for Irregular Section - 10

Project Description	
Friction Method	Manning Formula
Solve For	Normal Depth

Input Data	
Channel Slope	0.80 %
Normal Depth	0.37 ft
Discharge	11.00 cfs