March 19, 2010

Eric Solorio
Project Manager
California Energy Commission
1516 Ninth Street
Sacramento, CA 95814

RE: Ridgecrest Solar Power Project (RSPP), Docket No. 09-AFC-9, Supplemental Hydrologic Calculations (HEC-RAS and HMS Output)

Dear Mr. Solorio:

As requested, attached please find Ridgecrest Solar I, LLC's Supplemental Hydrologic Calculations (HEC-RAS and HMS Output).

If you have any questions on this information, please feel free to contact me at 510-809-4662 (office) or 949-433-4049 (cell).

Sincerely,

Billy Owens
Director, Project Development

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BEFORE THE ENERGY RESOURCES CONSERVATION AND DEVELOPMENT COMMISSION OF THE STATE OF CALIFORNIA
1516 NINTH STREET, SACRAMENTO, CA 95814
1-800-822-6228 – WWW.ENERGY.CA.GOV

APPLICATION FOR CERTIFICATION
For the *RIDGECREST SOLAR POWER PROJECT*

Docket No. 09-AFC-9

PROOF OF SERVICE
(Revised 3/2/2010)

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*indicates change

DECLARATION OF SERVICE

I, Elizabeth Copley, declare that on March 19, 2010, I served and filed copies of the attached Ridgecrest Solar Power Project (Docket No. 09-AFC-9) Supplemental Hydrologic Calculations with Mod CN 100-390 (HEC-RAS and HMS Output Tables). The original documents, filed with the Docket Unit, are accompanied by a copy of the most recent Proof of Service list, located on the web page for this project at:

[http://www.energy.ca.gov/sitingcases/solar_millennium_ridgecrest].

The documents have been sent to both the other parties in this proceeding (as shown on the Proof of Service list) and to the Commission's Docket Unit, in the following manner:

(*Check all that Apply*)

For service to all other parties:

X sent electronically to all email addresses on the Proof of Service list;

_ by personal delivery;

X by delivering on this date, for mailing with the United States Postal Service with first-class postage thereon fully prepaid, to the name and address of the person served, for mailing that same day in the ordinary course of business; that the envelope was sealed and placed for collection and mailing on that date to those addresses **NOT** marked "email preferred."

AND

For filing with the Energy Commission:

X sending an original paper copy and one electronic copy, mailed and emailed Respectively, to the address below (preferred method);

OR

__ depositing in the mail an original and 12 paper copies, as follows:

CALIFORNIA ENERGY COMMISSION
Attn: Docket No. 09-AFC-9
1516 Ninth Street, MS-4
Sacramento, CA 95814-5512
docket@energy.state.ca.us

I declare under penalty of perjury that the foregoing is true and correct.

RIDGECREST SOLAR PLANT HEC-RAS OUTPUT

North Ridgecrest Wash - Post-development Conditions

100-Year Hydraulics

River	Reach	River Sta	Profile	Q Total	Min Ch El	W.S. Elev	W. Depth	Crit W.S.	E.G. Elev	E.G. Slope	Vel Chnl	Flow Area	Top Width	Froude # Chl
				(cfs)	(ft)	(ft)	(ft)	(ft)	(ft)	(ft/ft)	(ft/s)	(sq ft)	(ft)	
Dev. Ridgecrest Wash	Channel	116.4	100 Yr	389.7	2770	2770.94	0.94	2771.09	2771.55	0.025025	6.25	62.4	87.6	1.3
Dev. Ridgecrest Wash	Channel	116.3	100 Yr	389.7	2755	2760.11	5.11	2756.76	2760.17	0.000061	2.01	194.23	49.03	0.18
Dev. Ridgecrest Wash	Channel	116.2	100 Yr	389.7	2755	2760.11	5.11	0	2760.17	0.000052	1.83	213.37	56.45	0.17
Dev. Ridgecrest Wash	Channel	116.1	100 Yr	389.7	2758	2759.89	1.89	2759.28	2760.14	0.00341	4.08	95.53	56.37	0.55
Dev. Ridgecrest Wash	Channel	115.4	100 Yr	389.7	2757.99	2759.25	1.26	2759.25	2759.82	0.012776	6.03	64.58	57.45	1
Dev. Ridgecrest Wash	Channel	115.3	100 Yr	389.7	2742.99	2748.15	5.16	2744.73	2748.2	0.00005	1.78	219.11	57.95	0.16
Dev. Ridgecrest Wash	Channel	115.2	100 Yr	389.7	2742.99	2748.15	5.16	0	2748.2	0.00005	1.78	218.95	57.93	0.16
Dev. Ridgecrest Wash	Channel	115.1	100 Yr	389.7	2745.99	2747.93	1.94	2747.28	2748.17	0.003075	3.95	98.71	56.65	0.53
Dev. Ridgecrest Wash	Channel	114.4	100 Yr	389.7	2745.98	2747.27	1.29	2747.27	2747.86	0.012567	6.21	62.79	52.71	1
Dev. Ridgecrest Wash	Channel	114.3	100 Yr	389.7	2729.05	2735.23	6.18	2730.79	2735.26	0.000025	1.38	281.57	64.09	0.12
Dev. Ridgecrest Wash	Channel	114.2	100 Yr	389.7	2729.05	2735.23	6.18	0	2735.26	0.000025	1.38	281.5	64.09	0.12
Dev. Ridgecrest Wash	Channel	114.1	100 Yr	389.7	2732.05	2735.17	3.12	2733.34	2735.26	0.000594	2.3	169.8	63.74	0.25
Dev. Ridgecrest Wash	Channel	113.4	100 Yr	389.7	2730.95	2732.24	1.29	2732.24	2732.83	0.012567	6.21	62.79	52.71	1
Dev. Ridgecrest Wash	Channel	113.3	100 Yr	389.7	2711.5	2717.63	6.13	2713.23	2717.66	0.000025	1.4	278.48	63.8	0.12
Dev. Ridgecrest Wash	Channel	113.2	100 Yr	389.7	2711.5	2717.63	6.13	0	2717.66	0.000025	1.4	278.4	63.8	0.12
Dev. Ridgecrest Wash	Channel	113.1	100 Yr	389.7	2714.5	2717.57	3.07	2715.79	2717.66	0.000629	2.34	166.54	63.43	0.25
Dev. Ridgecrest Wash	Channel	112.4	100 Yr	389.7	2713.6	2714.89	1.29	2714.89	2715.48	0.012567	6.21	62.79	52.71	1
Dev. Ridgecrest Wash	Channel	112.3	100 Yr	389.7	2696	2702.36	6.36	2697.73	2702.39	0.000022	1.33	293	65.15	0.11
Dev. Ridgecrest Wash	Channel	112.2	100 Yr	389.7	2696	2702.36	6.36	0	2702.39	0.000022	1.33	292.92	65.15	0.11
Dev. Ridgecrest Wash	Channel	112.1	100 Yr	389.7	2699	2702.31	3.31	2700.29	2702.38	0.000485	2.14	181.74	64.85	0.23
Dev. Ridgecrest Wash	Channel	111.4	100 Yr	400.1	2698.5	2699.8	1.3	2699.8	2700.42	0.012634	6.28	63.74	52.82	1.01
Dev. Ridgecrest Wash	Channel	111.3	100 Yr	400.1	2684	2689.82	5.82	2685.77	2689.85	0.000033	1.55	258.47	61.89	0.13
Dev. Ridgecrest Wash	Channel	111.2	100 Yr	400.1	2684	2689.81	5.81	0	2689.85	0.000033	1.55	258.37	61.88	0.13
Dev. Ridgecrest Wash	Channel	111.1	100 Yr	400.1	2687	2689.72	2.72	2688.3	2689.84	0.001009	2.76	144.8	61.34	0.32
Dev. Ridgecrest Wash	Channel	110.4	100 Yr	400.1	2686.8	2688.1	1.3	2688.1	2688.72	0.012634	6.28	63.74	52.82	1.01
Dev. Ridgecrest Wash	Channel	110.3	100 Yr	400.1	2677.1	2682.92	5.82	2678.87	2682.96	0.000033	1.55	258.87	61.93	0.13
Dev. Ridgecrest Wash	Channel	110.2	100 Yr	400.1	2677.1	2682.92	5.82	0	2682.96	0.000033	1.55	258.76	61.92	0.13
Dev. Ridgecrest Wash	Channel	110.1	100 Yr	400.1	2680.1	2682.64	2.54	2681.84	2682.93	0.003056	4.33	92.37	45.75	0.54
Dev. Ridgecrest Wash	Channel	109.4	100 Yr	400.1	2680	2681.3	1.3	2681.3	2681.92	0.012634	6.28	63.74	52.82	1.01
Dev. Ridgecrest Wash	Channel	109.3	100 Yr	400.1	2669.1	2674.9	5.8	2670.87	2674.94	0.000033	1.55	257.34	61.78	0.13
Dev. Ridgecrest Wash	Channel	109.2	100 Yr	400.1	2669.1	2674.9	5.8	0	2674.93	0.000033	1.56	257.24	61.77	0.13
Dev. Ridgecrest Wash	Channel	109.1	100 Yr	400.1	2672.1	2674.8	2.7	2673.4	2674.92	0.001036	2.79	143.56	61.22	0.32
Dev. Ridgecrest Wash	Channel	108.4	100 Yr	400.1	2672	2673.3	1.3	2673.3	2673.92	0.012634	6.28	63.74	52.82	1.01
Dev. Ridgecrest Wash	Channel	108.3	100 Yr	400.1	2662.2	2667.78	5.58	2663.96	2667.82	0.000039	1.64	243.82	60.46	0.14
Dev. Ridgecrest Wash	Channel	108.2	100 Yr	400.1	2662.2	2667.77	5.57	0	2667.82	0.000039	1.64	243.7	60.44	0.14
Dev. Ridgecrest Wash	Channel	108.1	100 Yr	400.1	2665.2	2667.65	2.45	2666.5	2667.8	0.00145	3.11	128.44	59.72	0.37
Dev. Ridgecrest Wash	Channel	107.4	100 Yr	410.5	2665	2666.33	1.33	2666.33	2666.95	0.012426	6.3	65.13	52.98	1
Dev. Ridgecrest Wash	Channel	107.3	100 Yr	410.5	2652.2	2657.92	5.72	2653.99	2657.97	0.000037	1.62	252.83	61.34	0.14
Dev. Ridgecrest Wash	Channel	107.2	100 Yr	410.5	2652.2	2657.92	5.72	0	2657.96	0.000037	1.62	252.71	61.33	0.14
Dev. Ridgecrest Wash	Channel	107.1	100 Yr	410.5	2655.2	2657.82	2.62	2656.53	2657.95	0.001223	2.97	138.2	60.69	0.35
Dev. Ridgecrest Wash	Channel	106.4	100 Yr	410.5	2655	2656.33	1.33	2656.33	2656.95	0.012426	6.3	65.13	52.98	1
Dev. Ridgecrest Wash	Channel	106.3	100 Yr	410.5	2642.2	2647.89	5.69	2643.99	2647.93	0.000038	1.64	250.43	61.11	0.14

RIDGECREST SOLAR PLANT HEC-RAS OUTPUT

North Ridgecrest Wash - Post-development Conditions

100-Year Hydraulics

River	Reach	River Sta	Profile	Q Total	Min Ch El	W.S. Elev	W. Depth	Crit W.S.	E.G. Elev	E.G. Slope	Vel Chnl	Flow Area	Top Width	Froude # Chl
				(cfs)	(ft)	(ft)	(ft)	(ft)	(ft)	(ft/ft)	(ft/s)	(sq ft)	(ft)	
Dev. Ridgecrest Wash	Channel	106.2	100 Yr	410.5	2642.2	2647.88	5.68	0	2647.92	0.000038	1.64	250.31	61.1	0.14
Dev. Ridgecrest Wash	Channel	106.1	100 Yr	410.5	2645.2	2647.77	2.57	2646.53	2647.91	0.001298	3.03	135.51	60.42	0.36
Dev. Ridgecrest Wash	Channel	105.4	100 Yr	410.5	2645	2646.33	1.33	2646.33	2646.95	0.012426	6.3	65.13	52.98	1
Dev. Ridgecrest Wash	Channel	105.3	100 Yr	410.5	2632.2	2637.9	5.7	2633.99	2637.94	0.000037	1.63	251.56	61.22	0.14
Dev. Ridgecrest Wash	Channel	105.2	100 Yr	410.5	2632.2	2637.9	5.7	0	2637.94	0.000037	1.63	251.44	61.21	0.14
Dev. Ridgecrest Wash	Channel	105.1	100 Yr	410.5	2635.2	2637.79	2.59	2636.53	2637.93	0.001262	3	136.78	60.55	0.35
Dev. Ridgecrest Wash	Channel	104.4	100 Yr	410.5	2635	2636.33	1.33	2636.33	2636.95	0.012426	6.3	65.13	52.98	1
Dev. Ridgecrest Wash	Channel	104.3	100 Yr	410.5	2622.2	2628.03	5.83	2623.99	2628.07	0.000034	1.58	259.25	61.97	0.14
Dev. Ridgecrest Wash	Channel	104.2	100 Yr	410.5	2622.2	2628.03	5.83	0	2628.07	0.000034	1.58	259.14	61.96	0.14
Dev. Ridgecrest Wash	Channel	104.1	100 Yr	410.5	2625.2	2627.93	2.73	2626.53	2628.06	0.001051	2.82	145.31	61.39	0.32
Dev. Ridgecrest Wash	Channel	103.4	100 Yr	419.5	2625	2626.34	1.34	2626.34	2626.97	0.012526	6.37	65.87	53.06	1.01
Dev. Ridgecrest Wash	Channel	103.3	100 Yr	419.5	2612.2	2618	5.8	2614.02	2618.04	0.000037	1.63	257.25	61.77	0.14
Dev. Ridgecrest Wash	Channel	103.2	100 Yr	419.5	2612.2	2617.99	5.79	0	2618.04	0.000037	1.63	257.13	61.76	0.14
Dev. Ridgecrest Wash	Channel	103.1	100 Yr	419.5	2615.2	2617.89	2.69	2616.54	2618.03	0.001157	2.94	142.8	61.14	0.34
Dev. Ridgecrest Wash	Channel	102.4	100 Yr	419.5	2615	2616.34	1.34	2616.34	2616.97	0.012526	6.37	65.87	53.06	1.01
Dev. Ridgecrest Wash	Channel	102.3	100 Yr	419.5	2602.4	2608.46	6.06	2604.22	2608.5	0.000031	1.53	273.89	63.37	0.13
Dev. Ridgecrest Wash	Channel	102.2	100 Yr	419.5	2602.4	2608.46	6.06	0	2608.5	0.000031	1.53	273.79	63.36	0.13
Dev. Ridgecrest Wash	Channel	102.1	100 Yr	419.5	2605.4	2608.38	2.98	2606.74	2608.49	0.000807	2.61	160.95	62.9	0.29
Dev. Ridgecrest Wash	Channel	101.4	100 Yr	419.5	2604.99	2606.33	1.34	2606.33	2606.96	0.012526	6.37	65.87	53.06	1.01
Dev. Ridgecrest Wash	Channel	101.3	100 Yr	419.5	2597.6	2604.67	7.07	2599.42	2604.69	0.000017	1.25	336.83	68.35	0.1
Dev. Ridgecrest Wash	Channel	101.2	100 Yr	419.5	2597.6	2604.66	7.06	0	2604.69	0.000017	1.25	336.76	68.35	0.1
Dev. Ridgecrest Wash	Channel	101.1	100 Yr	419.5	2601	2604.62	3.62	0	2604.68	0.000411	2.08	201.96	66.7	0.21
Dev. Ridgecrest Wash	Channel	100.4	100 Yr	387.4	2600.5	2604.47	3.97	0	2604.51	0.000253	1.72	225.58	68.79	0.17
Dev. Ridgecrest Wash	Channel	100.3	100 Yr	387.4	2600.48	2604.44	3.96	0	2604.48	0.000255	1.72	224.89	68.73	0.17
Dev. Ridgecrest Wash	Channel	100.2	100 Yr	387.4	2600.45	2604.4	3.95	0	2604.45	0.000256	1.73	224.55	68.7	0.17
Dev. Ridgecrest Wash	Channel	100.1	100 Yr	835.1	2600.31	2603.03	2.72	0	2603.55	0.004407	5.77	144.68	61.33	0.66
Dev. Ridgecrest Wash	Channel	100	100 Yr	835.1	2599.7	2601.17	1.47	2601.17	2601.56	0.01561	5.04	165.63	225.2	1.04
Dev. Ridgecrest Wash	Channel	10	100 Yr	841.5	2596.15	2597.73	1.58	2597.86	2598.38	0.019216	6.42	131.04	144.8	1.19
Dev. Ridgecrest Wash	Channel	9	100 Yr	841.5	2593.98	2595.73	1.75	2595.69	2596.23	0.011299	5.65	149.05	134.17	0.94
Dev. Ridgecrest Wash	Channel	8	100 Yr	841.5	2591.87	2593.55	1.68	2593.48	2594.03	0.010645	5.53	152.16	135.11	0.92
Dev. Ridgecrest Wash	Channel	7	100 Yr	841.5	2589.07	2591.18	2.11	2591.18	2591.72	0.01261	5.86	143.66	132.82	0.99
Dev. Ridgecrest Wash	Channel	6	100 Yr	841.5	2586.9	2588.96	2.06	2588.87	2589.45	0.010026	5.58	150.88	126.44	0.9
Dev. Ridgecrest Wash	Channel	5	100 Yr	841.5	2584.84	2586.58	1.74	2586.58	2587.11	0.013654	5.89	142.85	139.03	1.02
Dev. Ridgecrest Wash	Channel	4	100 Yr	841.5	2582.77	2584.5	1.73	2584.33	2584.86	0.008303	4.78	176.04	161.43	0.81
Dev. Ridgecrest Wash	Channel	3	100 Yr	841.5	2580.95	2582.3	1.35	2582.3	2582.81	0.012818	5.73	146.94	142.31	0.99

HMS Output for Post-Development Hydrology Calculations

100 Year Flow Rates

Post-Development Hydrology - North-Eastern Drainage Area

Hydrologic Element	Drainage Area (mi^2)	Peak Discharge (cfs)	Time of Peak	Volume (ac-ft)
3lNF1	0.042	46.50	01Jan2009, 12:00	3.20
3lNF2	0.040	44.30	01Jan2009, 12:00	3.00
3lNF3	0.029	34.20	01Jan2009, 12:00	2.20
3lNF4	0.043	47.70	01Jan2009, 12:00	3.30
3lNF5	0.041	45.40	01Jan2009, 12:00	3.10
3lNF6	0.048	51.70	01Jan2009, 12:03	3.60
3mNF1	0.045	49.90	01Jan2009, 12:00	3.40
3mNF2	0.042	46.50	01Jan2009, 12:00	3.20
3mNF3	0.050	53.80	01Jan2009, 12:03	3.80
3mNF4	0.044	50.40	01Jan2009, 12:00	3.30
3mNF5	0.048	50.90	01Jan2009, 12:03	3.60
3nNF1	0.046	48.00	01Jan2009, 12:03	3.50
3nNF2	0.050	48.50	01Jan2009, 12:03	3.80
3nNF3	0.038	39.10	01Jan2009, 12:03	2.80
Culvert	9.206	22.80	01Jan2009, 12:48	7.10
Ex_Outlet3	10.626	841.50	01Jan2009, 12:24	110.00
J1	9.443	202.60	01Jan2009, 12:06	23.50
J10	9.947	387.40	01Jan2009, 12:21	59.10
J11	0.082	89.70	01Jan2009, 12:03	6.20
J12	0.111	120.30	01Jan2009, 12:03	8.40
J13	0.084	92.00	01Jan2009, 12:03	6.40
J14	0.243	260.00	01Jan2009, 12:03	18.40
J15	0.087	95.20	01Jan2009, 12:03	6.60
J16	0.380	370.70	01Jan2009, 12:06	28.70
J17	0.472	462.40	01Jan2009, 12:06	35.70
J18	0.568	488.20	01Jan2009, 12:15	42.80
J19	0.606	508.00	01Jan2009, 12:12	45.70
J2	9.551	255.10	01Jan2009, 12:12	31.70
J20	10.553	851.00	01Jan2009, 12:18	104.70
J3	9.824	389.70	01Jan2009, 12:12	50.20
J4	0.017	21.70	01Jan2009, 11:57	1.30
J5	9.861	400.10	01Jan2009, 12:12	53.00
J6	0.022	27.60	01Jan2009, 12:00	1.70
J7	9.899	410.50	01Jan2009, 12:15	55.90
J8	0.023	26.60	01Jan2009, 12:00	1.60
J9	9.940	419.50	01Jan2009, 12:18	58.80
NE_Outlet	10.569	835.10	01Jan2009, 12:21	105.80
O3a	9.206	3960.50	01Jan2009, 12:48	728.00
O3b	0.237	200.30	01Jan2009, 12:06	16.30
O3c	0.108	116.20	01Jan2009, 12:03	8.20
O3d	0.273	204.70	01Jan2009, 12:09	19.20
O3e	0.017	21.70	01Jan2009, 11:57	1.30
O3f	0.020	25.00	01Jan2009, 12:00	1.50
O3g	0.022	27.60	01Jan2009, 12:00	1.70
O3h	0.016	20.00	01Jan2009, 12:00	1.20
O3i	0.023	26.60	01Jan2009, 12:00	1.60

Hydrologic Element	Drainage Area (mi^2)	Peak Discharge (cfs)	Time of Peak	Volume (ac-ft)
O3j	0.018	20.00	01Jan2009, 12:00	1.20
O3k	0.007	9.20	01Jan2009, 11:57	0.50
O3o	0.016	22.60	01Jan2009, 11:57	1.20
O3p	0.057	68.80	01Jan2009, 12:00	4.20
R1	9.206	22.80	01Jan2009, 13:06	7.20
R10	9.940	386.10	01Jan2009, 12:21	58.60
R11	9.947	371.90	01Jan2009, 12:21	59.00
R12	0.042	46.30	01Jan2009, 12:03	3.20
R13	0.082	88.30	01Jan2009, 12:03	6.20
R14	0.111	119.60	01Jan2009, 12:03	8.40
R15	0.043	47.50	01Jan2009, 12:03	3.30
R16	0.084	89.00	01Jan2009, 12:06	6.40
R17	0.243	250.90	01Jan2009, 12:09	18.40
R18	0.045	49.60	01Jan2009, 12:03	3.40
R19	0.087	92.40	01Jan2009, 12:03	6.60
R2	9.443	199.10	01Jan2009, 12:12	23.50
R20	0.380	370.20	01Jan2009, 12:06	28.70
R21	0.044	49.00	01Jan2009, 12:03	3.30
R22	0.472	430.20	01Jan2009, 12:15	35.60
R23	0.046	41.40	01Jan2009, 12:09	3.50
R24	0.568	488.20	01Jan2009, 12:15	42.80
R25	0.606	507.10	01Jan2009, 12:15	45.70
R26	10.553	832.00	01Jan2009, 12:21	104.60
R27	10.569	829.40	01Jan2009, 12:24	105.80
R3	9.551	192.80	01Jan2009, 12:12	31.10
R4	9.824	386.40	01Jan2009, 12:12	50.20
R5	0.017	21.60	01Jan2009, 12:00	1.30
R6	9.861	398.00	01Jan2009, 12:15	53.00
R7	0.022	27.50	01Jan2009, 12:00	1.70
R8	9.899	408.40	01Jan2009, 12:18	55.90
R9	0.023	26.50	01Jan2009, 12:00	1.60

HMS Output for Post-Development Hydrology Calculations

25 Year Flow Rates

Post-Development Hydrology - North-Eastern Drainage Area

Hydrologic Element	Drainage Area (mi^2)	Peak Discharge (cfs)	Time of Peak	Volume (ac-ft)
3lNF1	0.042	26.70	01Jan2009, 12:03	1.90
3lNF2	0.040	25.40	01Jan2009, 12:03	1.80
3lNF3	0.029	19.70	01Jan2009, 12:00	1.30
3lNF4	0.043	27.30	01Jan2009, 12:03	1.90
3lNF5	0.041	26.00	01Jan2009, 12:03	1.80
3lNF6	0.048	30.10	01Jan2009, 12:03	2.20
3mNF1	0.045	28.60	01Jan2009, 12:03	2.00
3mNF2	0.042	26.70	01Jan2009, 12:03	1.90
3mNF3	0.050	31.40	01Jan2009, 12:03	2.20
3mNF4	0.044	29.00	01Jan2009, 12:00	2.00
3mNF5	0.048	29.60	01Jan2009, 12:03	2.20
3nNF1	0.046	27.70	01Jan2009, 12:03	2.10
3nNF2	0.050	27.80	01Jan2009, 12:06	2.20
3nNF3	0.038	22.50	01Jan2009, 12:03	1.70
Culvert	9.206	18.60	01Jan2009, 12:48	4.70
Ex_Outlet3	10.626	429.70	01Jan2009, 12:30	65.10
J1	9.443	111.60	01Jan2009, 12:06	14.20
J10	9.947	188.60	01Jan2009, 12:27	34.90
J11	0.082	51.90	01Jan2009, 12:03	3.70
J12	0.111	69.10	01Jan2009, 12:03	5.00
J13	0.084	53.20	01Jan2009, 12:03	3.80
J14	0.243	147.80	01Jan2009, 12:03	10.90
J15	0.087	55.40	01Jan2009, 12:03	3.90
J16	0.380	209.50	01Jan2009, 12:09	17.00
J17	0.472	254.20	01Jan2009, 12:09	21.20
J18	0.568	269.30	01Jan2009, 12:18	25.40
J19	0.606	278.50	01Jan2009, 12:18	27.10
J2	9.551	137.30	01Jan2009, 12:15	19.00
J20	10.553	433.40	01Jan2009, 12:21	62.00
J3	9.824	194.50	01Jan2009, 12:12	29.70
J4	0.017	12.70	01Jan2009, 12:00	0.80
J5	9.861	198.80	01Jan2009, 12:15	31.40
J6	0.022	16.20	01Jan2009, 12:00	1.00
J7	9.899	203.10	01Jan2009, 12:18	33.10
J8	0.023	15.10	01Jan2009, 12:00	1.00
J9	9.940	205.80	01Jan2009, 12:21	34.70
NE_Outlet	10.569	426.20	01Jan2009, 12:27	62.70
O3a	9.206	2298.10	01Jan2009, 12:48	437.60
O3b	0.237	111.20	01Jan2009, 12:06	9.40
O3c	0.108	67.80	01Jan2009, 12:03	4.80
O3d	0.273	113.30	01Jan2009, 12:09	11.10
O3e	0.017	12.70	01Jan2009, 12:00	0.80
O3f	0.020	14.70	01Jan2009, 12:00	0.90
O3g	0.022	16.20	01Jan2009, 12:00	1.00
O3h	0.016	11.80	01Jan2009, 12:00	0.70
O3i	0.023	15.10	01Jan2009, 12:00	1.00

Hydrologic Element	Drainage Area (mi^2)	Peak Discharge (cfs)	Time of Peak	Volume (ac-ft)
O3j	0.018	11.20	01Jan2009, 12:00	0.70
O3k	0.007	5.20	01Jan2009, 11:57	0.30
O3o	0.016	13.20	01Jan2009, 11:57	0.70
O3p	0.057	39.90	01Jan2009, 12:00	2.50
R1	9.206	18.50	01Jan2009, 13:06	4.70
R10	9.940	187.90	01Jan2009, 12:27	34.60
R11	9.947	181.80	01Jan2009, 12:27	34.90
R12	0.042	26.50	01Jan2009, 12:03	1.90
R13	0.082	50.20	01Jan2009, 12:03	3.70
R14	0.111	68.30	01Jan2009, 12:03	5.00
R15	0.043	27.10	01Jan2009, 12:03	1.90
R16	0.084	52.10	01Jan2009, 12:06	3.80
R17	0.243	140.50	01Jan2009, 12:12	10.90
R18	0.045	28.80	01Jan2009, 12:03	2.00
R19	0.087	54.40	01Jan2009, 12:06	3.90
R2	9.443	109.30	01Jan2009, 12:15	14.20
R20	0.380	209.40	01Jan2009, 12:09	17.00
R21	0.044	28.00	01Jan2009, 12:03	2.00
R22	0.472	239.10	01Jan2009, 12:18	21.10
R23	0.046	23.10	01Jan2009, 12:09	2.00
R24	0.568	269.30	01Jan2009, 12:18	25.40
R25	0.606	276.80	01Jan2009, 12:18	27.10
R26	10.553	424.60	01Jan2009, 12:27	61.90
R27	10.569	423.40	01Jan2009, 12:30	62.60
R3	9.551	93.60	01Jan2009, 12:18	18.60
R4	9.824	191.50	01Jan2009, 12:15	29.70
R5	0.017	12.70	01Jan2009, 12:00	0.80
R6	9.861	196.70	01Jan2009, 12:18	31.40
R7	0.022	16.10	01Jan2009, 12:00	1.00
R8	9.899	200.20	01Jan2009, 12:21	33.10
R9	0.023	15.00	01Jan2009, 12:00	1.00

HMS Output for Post-Development Hydrology Calculations

10 Year Flow Rates

Post-Development Hydrology - North-Eastern Drainage Area

Hydrologic Element	Drainage Area (mi^2)	Peak Discharge (cfs)	Time of Peak	Volume (ac-ft)
3INF1	0.042	17.20	01Jan2009, 12:03	1.20
3INF2	0.040	16.30	01Jan2009, 12:03	1.20
3INF3	0.029	12.50	01Jan2009, 12:00	0.90
3INF4	0.043	17.60	01Jan2009, 12:03	1.30
3INF5	0.041	16.70	01Jan2009, 12:03	1.20
3INF6	0.048	19.30	01Jan2009, 12:03	1.40
3mNF1	0.045	18.40	01Jan2009, 12:03	1.30
3mNF2	0.042	17.20	01Jan2009, 12:03	1.20
3mNF3	0.050	20.10	01Jan2009, 12:03	1.50
3mNF4	0.044	18.30	01Jan2009, 12:03	1.30
3mNF5	0.048	18.80	01Jan2009, 12:03	1.40
3nNF1	0.046	17.60	01Jan2009, 12:03	1.40
3nNF2	0.050	17.80	01Jan2009, 12:06	1.50
3nNF3	0.038	14.20	01Jan2009, 12:03	1.10
Culvert	9.206	15.60	01Jan2009, 12:48	3.20
Ex_Outlet3	10.626	240.30	01Jan2009, 12:33	42.90
J1	9.443	67.60	01Jan2009, 12:06	9.30
J10	9.947	103.10	01Jan2009, 12:33	22.90
J11	0.082	32.80	01Jan2009, 12:03	2.40
J12	0.111	43.20	01Jan2009, 12:03	3.30
J13	0.084	33.60	01Jan2009, 12:03	2.50
J14	0.243	91.60	01Jan2009, 12:06	7.20
J15	0.087	35.20	01Jan2009, 12:03	2.60
J16	0.380	126.40	01Jan2009, 12:09	11.30
J17	0.472	155.90	01Jan2009, 12:09	14.00
J18	0.568	162.90	01Jan2009, 12:21	16.80
J19	0.606	168.40	01Jan2009, 12:18	17.90
J2	9.551	83.00	01Jan2009, 12:18	12.50
J20	10.553	240.80	01Jan2009, 12:27	40.80
J3	9.824	104.70	01Jan2009, 12:15	19.50
J4	0.017	8.20	01Jan2009, 12:00	0.50
J5	9.861	107.50	01Jan2009, 12:18	20.60
J6	0.022	10.40	01Jan2009, 12:00	0.70
J7	9.899	109.70	01Jan2009, 12:24	21.70
J8	0.023	9.40	01Jan2009, 12:00	0.60
J9	9.940	112.50	01Jan2009, 12:27	22.80
NE_Outlet	10.569	238.30	01Jan2009, 12:30	41.30
O3a	9.206	1468.60	01Jan2009, 12:48	293.10
O3b	0.237	67.50	01Jan2009, 12:06	6.10
O3c	0.108	43.40	01Jan2009, 12:03	3.20
O3d	0.273	68.50	01Jan2009, 12:09	7.20
O3e	0.017	8.20	01Jan2009, 12:00	0.50
O3f	0.020	9.50	01Jan2009, 12:00	0.60
O3g	0.022	10.40	01Jan2009, 12:00	0.70
O3h	0.016	7.60	01Jan2009, 12:00	0.50
O3i	0.023	9.40	01Jan2009, 12:00	0.60

Hydrologic Element	Drainage Area (mi^2)	Peak Discharge (cfs)	Time of Peak	Volume (ac-ft)
O3j	0.018	6.80	01Jan2009, 12:00	0.40
O3k	0.007	3.20	01Jan2009, 11:57	0.20
O3o	0.016	8.50	01Jan2009, 11:57	0.50
O3p	0.057	25.40	01Jan2009, 12:00	1.60
R1	9.206	15.60	01Jan2009, 13:09	3.20
R10	9.940	102.70	01Jan2009, 12:33	22.70
R11	9.947	99.50	01Jan2009, 12:36	22.90
R12	0.042	16.60	01Jan2009, 12:06	1.20
R13	0.082	31.70	01Jan2009, 12:06	2.40
R14	0.111	42.40	01Jan2009, 12:03	3.30
R15	0.043	17.00	01Jan2009, 12:06	1.30
R16	0.084	32.80	01Jan2009, 12:06	2.50
R17	0.243	89.50	01Jan2009, 12:12	7.20
R18	0.045	18.00	01Jan2009, 12:03	1.30
R19	0.087	34.20	01Jan2009, 12:06	2.60
R2	9.443	66.10	01Jan2009, 12:18	9.30
R20	0.380	126.20	01Jan2009, 12:09	11.30
R21	0.044	18.10	01Jan2009, 12:06	1.30
R22	0.472	144.90	01Jan2009, 12:21	14.00
R23	0.046	14.60	01Jan2009, 12:12	1.40
R24	0.568	162.90	01Jan2009, 12:21	16.80
R25	0.606	167.70	01Jan2009, 12:21	17.90
R26	10.553	237.20	01Jan2009, 12:30	40.80
R27	10.569	236.80	01Jan2009, 12:36	41.30
R3	9.551	51.40	01Jan2009, 12:21	12.30
R4	9.824	103.30	01Jan2009, 12:18	19.50
R5	0.017	8.20	01Jan2009, 12:00	0.50
R6	9.861	106.30	01Jan2009, 12:24	20.60
R7	0.022	10.40	01Jan2009, 12:00	0.70
R8	9.899	109.40	01Jan2009, 12:27	21.70
R9	0.023	9.30	01Jan2009, 12:00	0.60

RIDGECREST SOLAR PLANT HEC-RAS OUTPUT

North Ridgecrest Wash - Pre-development Conditions

100-Year Hydraulics

River	Reach	River Sta	Profile	Q Total	Min Ch El	W.S. Elev	W. Depth	Crit W.S.	E.G. Elev	E.G. Slope	Vel Chnl	Flow Area	Top Width	Froude # Chl
				(cfs)	(ft)	(ft)	(ft)	(ft)	(ft)	(ft/ft)	(ft/s)	(sq ft)	(ft)	
Ex. Ridgecrest Wash	1	66	100 Yr	116	2758.98	2760.57	1.59	2760.57	2760.81	0.017249	3.95	29.35	61.81	1.01
Ex. Ridgecrest Wash	1	65	100 Yr	116	2755	2755.57	0.57	2755.52	2755.72	0.014293	3.11	37.28	97.8	0.89
Ex. Ridgecrest Wash	1	64	100 Yr	116	2751.65	2752.15	0.5	2752.15	2752.29	0.020862	3.08	37.6	132.81	1.02
Ex. Ridgecrest Wash	1	63	100 Yr	116	2746.74	2747.48	0.74	2747.43	2747.61	0.013118	2.98	38.93	102.24	0.85
Ex. Ridgecrest Wash	1	62	100 Yr	116	2743.67	2744.15	0.48	2744.15	2744.28	0.021959	2.9	39.94	160.48	1.03
Ex. Ridgecrest Wash	1	61	100 Yr	116	2737.24	2739.96	2.72	2740.04	2740.21	0.028827	4	29.01	88.5	1.23
Ex. Ridgecrest Wash	1	60	100 Yr	116	2735.47	2735.97	0.5	2735.97	2736.11	0.020633	2.97	38.99	144.18	1.01
Ex. Ridgecrest Wash	1	59	100 Yr	116	2730.92	2731.36	0.44	2731.36	2731.49	0.023552	2.95	39.39	163.31	1.06
Ex. Ridgecrest Wash	1	58	100 Yr	116	2725.99	2726.54	0.55	2726.52	2726.66	0.01668	2.8	41.46	143.3	0.92
Ex. Ridgecrest Wash	1	57	100 Yr	116	2722.05	2722.68	0.63	2722.68	2722.79	0.022726	2.61	44.45	215.13	1.01
Ex. Ridgecrest Wash	1	56	100 Yr	116	2717.72	2718.47	0.75	2718.46	2718.62	0.017109	3.11	37.24	111.69	0.95
Ex. Ridgecrest Wash	1	55	100 Yr	116	2714.07	2714.46	0.39	2714.46	2714.57	0.024233	2.6	44.6	227.59	1.04
Ex. Ridgecrest Wash	1	54	100 Yr	116	2709.71	2710.27	0.56	2710.25	2710.4	0.017401	2.93	39.63	132.12	0.94
Ex. Ridgecrest Wash	1	53	100 Yr	116	2705.87	2706.36	0.49	2706.36	2706.46	0.022391	2.55	45.56	226.21	1
Ex. Ridgecrest Wash	1	52	100 Yr	116	2701.95	2702.44	0.49	2702.41	2702.55	0.015018	2.61	44.4	157.24	0.87
Ex. Ridgecrest Wash	1	51	100 Yr	116	2698.11	2699.37	1.26	2699.34	2699.59	0.014458	3.76	30.83	61.3	0.94
Ex. Ridgecrest Wash	1	50	100 Yr	116	2695.66	2696.37	0.71	2696.35	2696.47	0.016513	2.54	45.68	181.22	0.89
Ex. Ridgecrest Wash	1	49	100 Yr	210	2692.88	2693.72	0.84	2693.65	2693.92	0.011202	3.57	58.81	104.61	0.84
Ex. Ridgecrest Wash	1	48	100 Yr	210	2689.99	2690.98	0.99	2690.98	2691.26	0.015889	4.19	50.06	90.87	1
Ex. Ridgecrest Wash	1	47	100 Yr	210	2687.34	2688.37	1.03	2688.28	2688.53	0.011123	3.28	64.04	128.75	0.82
Ex. Ridgecrest Wash	1	46	100 Yr	210	2684.97	2685.6	0.63	2685.6	2685.8	0.017291	3.55	59.11	146.67	0.99
Ex. Ridgecrest Wash	1	45	100 Yr	210	2681.89	2682.74	0.85	2682.64	2682.93	0.010291	3.52	59.58	101.38	0.81
Ex. Ridgecrest Wash	1	44	100 Yr	210	2678.96	2680.36	1.4	2680.32	2680.67	0.012521	4.41	47.61	66.99	0.92
Ex. Ridgecrest Wash	1	43	100 Yr	210	2676.8	2677.67	0.87	2677.66	2677.93	0.01482	4.09	51.31	91.72	0.96
Ex. Ridgecrest Wash	1	42	100 Yr	210	2673.95	2674.61	0.66	2674.61	2674.88	0.015847	4.11	51.11	95.53	0.99
Ex. Ridgecrest Wash	1	41	100 Yr	210	2670.97	2671.93	0.96	2671.78	2672.11	0.00815	3.39	61.94	93.78	0.74
Ex. Ridgecrest Wash	1	40	100 Yr	210	2668.93	2669.63	0.7	2669.63	2669.86	0.016519	3.87	54.3	114.63	0.99
Ex. Ridgecrest Wash	1	39	100 Yr	210	2666	2667.01	1.01	2666.92	2667.18	0.009807	3.31	63.39	114.17	0.78
Ex. Ridgecrest Wash	1	38	100 Yr	210	2663	2664.39	1.39	2664.39	2664.67	0.016446	4.25	49.43	90.26	1.01
Ex. Ridgecrest Wash	1	37	100 Yr	210	2660.98	2662.01	1.03	2661.87	2662.16	0.007985	3.12	67.32	113.75	0.71
Ex. Ridgecrest Wash	1	36	100 Yr	210	2658.86	2659.7	0.84	2659.7	2659.96	0.015696	4.12	50.99	94.27	0.99
Ex. Ridgecrest Wash	1	35	100 Yr	210	2655.96	2657.02	1.06	2656.93	2657.14	0.010467	2.79	75.32	184.55	0.77
Ex. Ridgecrest Wash	1	34	100 Yr	210	2653.93	2654.57	0.64	2654.53	2654.76	0.013485	3.53	59.43	123.4	0.9
Ex. Ridgecrest Wash	1	33	100 Yr	304	2650.97	2651.99	1.02	2651.94	2652.24	0.011963	4.08	74.42	113.64	0.89
Ex. Ridgecrest Wash	1	32	100 Yr	304	2648.03	2649.19	1.16	2649.19	2649.5	0.015814	4.46	68.14	112.38	1.01
Ex. Ridgecrest Wash	1	31	100 Yr	304	2645.99	2647.08	1.09	2646.94	2647.27	0.008028	3.5	86.87	124.01	0.74
Ex. Ridgecrest Wash	1	30	100 Yr	304	2643.86	2644.8	0.94	2644.8	2645.11	0.015154	4.41	68.88	111.81	0.99
Ex. Ridgecrest Wash	1	29	100 Yr	304	2641	2642.15	1.15	2642.09	2642.38	0.011826	3.8	79.99	134.92	0.87
Ex. Ridgecrest Wash	1	28	100 Yr	304	2638.63	2639.41	0.78	2639.41	2639.66	0.015759	3.96	76.7	150.68	0.98
Ex. Ridgecrest Wash	1	27	100 Yr	304	2635.98	2636.94	0.96	2636.85	2637.14	0.010231	3.59	84.69	139.61	0.81

RIDGECREST SOLAR PLANT HEC-RAS OUTPUT

North Ridgecrest Wash - Pre-development Conditions

100-Year Hydraulics

River	Reach	River Sta	Profile	Q Total (cfs)	Min Ch El (ft)	W.S. Elev (ft)	W. Depth (ft)	Crit W.S. (ft)	E.G. Elev (ft)	E.G. Slope (ft/ft)	Vel Chnl (ft/s)	Flow Area (sq ft)	Top Width (ft)	Froude # Chl
Ex. Ridgecrest Wash	1	26	100 Yr	304	2632.95	2634.3	1.35	2634.3	2634.64	0.015491	4.64	65.47	100.1	1.01
Ex. Ridgecrest Wash	1	25	100 Yr	304	2631	2632.15	1.15	2632.02	2632.31	0.008212	3.18	95.61	160.33	0.73
Ex. Ridgecrest Wash	1	24	100 Yr	304	2629	2629.76	0.76	2629.76	2629.99	0.017296	3.9	77.91	167.98	1.01
Ex. Ridgecrest Wash	1	23	100 Yr	304	2626	2626.93	0.93	2626.83	2627.07	0.00934	3.05	99.78	196.46	0.75
Ex. Ridgecrest Wash	1	22	100 Yr	304	2623	2624.34	1.34	2624.34	2624.55	0.017953	3.63	83.85	207.54	1.01
Ex. Ridgecrest Wash	1	21	100 Yr	304	2620.98	2621.9	0.92	2621.79	2622.02	0.008707	2.88	105.71	215.34	0.72
Ex. Ridgecrest Wash	1	20	100 Yr	304	2618.91	2619.52	0.61	2619.51	2619.74	0.01557	3.71	81.95	176.22	0.96
Ex. Ridgecrest Wash	1	19	100 Yr	304	2616	2617.26	1.26	2617.15	2617.41	0.008877	3.17	96.03	171.85	0.75
Ex. Ridgecrest Wash	1	18	100 Yr	304	2613.99	2615.03	1.04	2615	2615.23	0.013622	3.57	85.12	175.26	0.9
Ex. Ridgecrest Wash	1	17	100 Yr	395.4	2611.67	2612.83	1.16	2612.72	2613.04	0.009333	3.69	107.23	158.48	0.79
Ex. Ridgecrest Wash	1	16	100 Yr	395.4	2609.18	2610.38	1.2	2610.36	2610.72	0.014832	4.63	85.48	127.25	0.99
Ex. Ridgecrest Wash	1	15	100 Yr	395.4	2607	2608.5	1.5	2608.31	2608.69	0.007101	3.51	112.71	146.23	0.7
Ex. Ridgecrest Wash	1	14	100 Yr	395.4	2605.27	2606.33	1.06	2606.33	2606.68	0.014879	4.7	84.12	122.57	1
Ex. Ridgecrest Wash	1	13	100 Yr	395.4	2602.98	2603.98	1	2603.86	2604.22	0.009303	3.94	100.46	134.3	0.8
Ex. Ridgecrest Wash	1	12	100 Yr	395.4	2600.97	2602.17	1.2	2602.04	2602.4	0.008934	3.87	102.06	135.54	0.79
Ex. Ridgecrest Wash	1	11	100 Yr	395.4	2598.95	2599.81	0.86	2599.81	2600.14	0.014655	4.62	85.55	126.39	0.99
Ex. Ridgecrest Wash	1	10	100 Yr	402.7	2596.15	2597.5	1.35	2597.4	2597.76	0.00981	4.07	99.03	131.17	0.82
Ex. Ridgecrest Wash	1	9	100 Yr	402.7	2593.98	2595.22	1.24	2595.17	2595.56	0.012316	4.69	85.91	109.05	0.93
Ex. Ridgecrest Wash	1	8	100 Yr	402.7	2591.87	2593.1	1.23	2592.99	2593.38	0.009527	4.23	95.24	116.4	0.82
Ex. Ridgecrest Wash	1	7	100 Yr	402.7	2589.07	2590.67	1.6	2590.67	2591.05	0.014479	4.93	81.71	108.59	1
Ex. Ridgecrest Wash	1	6	100 Yr	402.7	2586.9	2588.45	1.55	2588.32	2588.75	0.008916	4.35	92.55	103.07	0.81
Ex. Ridgecrest Wash	1	5	100 Yr	402.7	2584.84	2586.13	1.29	2586.13	2586.48	0.014789	4.75	84.83	121.17	1
Ex. Ridgecrest Wash	1	4	100 Yr	402.7	2582.77	2584.35	1.58	2583.87	2584.46	0.002847	2.64	152.55	152.7	0.47
Ex. Ridgecrest Wash	1	3	100 Yr	980	2580.95	2582.42	1.47	2582.42	2582.98	0.012535	5.96	164.36	147.36	0.99

HMS Output for Pre-Development Hydrology Calculations

10 Year Flow Rates

Pre-Development Hydrology - North-Eastern Drainage Area

Hydrologic Element	Drainage Area (mi^2)	Peak Discharge (cfs)	Time of Peak	Volume (ac-ft)
Culvert	9.206	15.60	01Jan2009, 12:48	3.20
E3a	9.206	1468.60	01Jan2009, 12:48	293.10
E3b	0.720	139.00	01Jan2009, 12:27	20.50
E3c	0.652	170.40	01Jan2009, 12:15	19.30
E3d	0.359	72.70	01Jan2009, 12:21	9.70
E3e	0.143	50.90	01Jan2009, 12:06	4.20
E3f	0.057	25.4	01Jan2009, 12:00	1.6
Ex_Outlet3	10.994	340.8	01Jan2009, 12:24	54.3
Ex_Outlet 4	0.143	50.9	01Jan2009, 12:06	4.2
J2	1.011	232.3	01Jan2009, 12:15	29
NE_Outlet	9.926	139	01Jan2009, 12:27	23.7
R1	9.206	16.8	01Jan2009, 14:00	3.2
R2	9.926	137.5	01Jan2009, 12:30	23.7
R3	1.011	230.9	01Jan2009, 12:21	29

HMS Output for Pre-Development Hydrology Calculations

25 Year Flow Rates

Pre-Development Hydrology - North-Eastern Drainage Area

Hydrologic Element	Drainage Area (mi^2)	Peak Discharge (cfs)	Time of Peak	Volume (ac-ft)
Culvert	9.206	18.60	01Jan2009, 12:48	4.70
E3a	9.206	2298.10	01Jan2009, 12:48	437.60
E3b	0.720	222.70	01Jan2009, 12:27	31.20
E3c	0.652	269.60	01Jan2009, 12:15	29.20
E3d	0.359	118.10	01Jan2009, 12:21	14.90
E3e	0.143	79.60	01Jan2009, 12:06	6.40
E3f	0.057	39.9	01Jan2009, 12:00	2.5
Ex_Outlet3	10.994	548.1	01Jan2009, 12:24	82.4
Ex_Outlet 4	0.143	79.6	01Jan2009, 12:06	6.4
J2	1.011	374.6	01Jan2009, 12:15	44
NE_Outlet	9.926	222.7	01Jan2009, 12:27	35.9
R1	9.206	18.5	01Jan2009, 13:57	4.7
R2	9.926	220.5	01Jan2009, 12:30	35.9
R3	1.011	367.7	01Jan2009, 12:21	44

HMS Output for Pre-Development Hydrology Calculations

100 Year Flow Rates

Pre-Development Hydrology - North-Eastern Drainage Area

Hydrologic Element	Drainage Area (mi^2)	Peak Discharge (cfs)	Time of Peak	Volume (ac-ft)
Culvert	9.206	22.80	01Jan2009, 12:48	7.10
E3a	9.206	3960.50	01Jan2009, 12:48	728.00
E3b	0.720	395.10	01Jan2009, 12:24	53.00
E3c	0.652	468.30	01Jan2009, 12:15	49.20
E3d	0.359	211.90	01Jan2009, 12:18	25.50
E3e	0.143	138.80	01Jan2009, 12:03	10.80
E3f	0.057	68.8	01Jan2009, 12:00	4.2
Ex_Outlet3	10.994	980	01Jan2009, 12:21	139.1
Ex_Outlet 4	0.143	138.8	01Jan2009, 12:03	10.8
J2	1.011	662.5	01Jan2009, 12:15	74.7
NE_Outlet	9.926	395.4	01Jan2009, 12:24	60.1
R1	9.206	22.8	01Jan2009, 13:51	7.2
R2	9.926	391.7	01Jan2009, 12:27	60.1
R3	1.011	652	01Jan2009, 12:18	74.7

RIDGECREST SOLAR PLANT HEC-RAS OUTPUT

South El Paso Wash - Post-development Conditions

100-Year Hydraulics

River	Reach	River Sta	Profile	Q Total	Min Ch El	W.S. Elev	W. Depth	Crit W.S.	E.G. Elev	E.G. Slope	Vel Chnl	Flow Area	Top Width	Froude # Chl
				(cfs)	(ft)	(ft)	(ft)	(ft)	(ft)	(ft/ft)	(ft/s)	(sq ft)	(ft)	
Dev. El Paso Wash	1	116	100 Yr	6674.2	2819.35	2822.51	3.16	2822.68	2823.58	0.015011	8.29	804.8	503.36	1.16
Dev. El Paso Wash	1	115	100 Yr	6674.2	2816.92	2819.61	2.69	2819.76	2820.53	0.0151	7.7	866.43	608.11	1.14
Dev. El Paso Wash	1	114	100 Yr	6674.2	2814	2816.84	2.84	2816.89	2817.69	0.013166	7.4	901.76	606.49	1.07
Dev. El Paso Wash	1	113	100 Yr	6674.2	2811	2814	3	2814.12	2814.94	0.014367	7.76	860.47	575.91	1.12
Dev. El Paso Wash	1	112	100 Yr	6674.2	2808	2811.31	3.31	2811.36	2812.21	0.012951	7.62	876.18	557.55	1.07
Dev. El Paso Wash	1	111	100 Yr	6674.2	2806	2808.76	2.76	2808.82	2809.68	0.012451	7.68	868.51	529.34	1.06
Dev. El Paso Wash	1	110	100 Yr	6674.2	2803	2805.5	2.5	2805.74	2806.71	0.017672	8.84	755.16	485.45	1.25
Dev. El Paso Wash	1	109	100 Yr	6674.2	2800.49	2803.11	2.62	2803.11	2804	0.011143	7.59	879.74	503.14	1.01
Dev. El Paso Wash	1	108	100 Yr	6674.2	2796.35	2799.75	3.4	2800.1	2801.01	0.020634	9	741.33	520.44	1.33
Dev. El Paso Wash	1	107	100 Yr	6674.2	2794	2797.38	3.38	2797.38	2798.07	0.011981	6.64	1004.62	740.09	1
Dev. El Paso Wash	1	106	100 Yr	6674.2	2791	2794.51	3.51	2794.62	2795.35	0.01537	7.37	906	689.05	1.13
Dev. El Paso Wash	1	105	100 Yr	6674.2	2788	2791.86	3.86	2791.88	2792.62	0.012073	6.99	954.23	654.63	1.02
Dev. El Paso Wash	1	104	100 Yr	6674.2	2786	2788.74	2.74	2788.95	2789.81	0.016163	8.29	805.35	532.9	1.19
Dev. El Paso Wash	1	103	100 Yr	6674.2	2783.21	2786.78	3.57	2786.78	2787.74	0.010796	7.83	851.93	453.2	1.01
Dev. El Paso Wash	1	102	100 Yr	6674.2	2781	2784.43	3.43	2784.45	2785.6	0.010406	8.68	768.95	341.08	1.02
Dev. El Paso Wash	1	101	100 Yr	6674.2	2779.34	2782.48	3.14	2782.52	2783.45	0.011615	7.91	844.01	467.9	1.04
Dev. El Paso Wash	1	100	100 Yr	6674.2	2776	2779.54	3.54	2779.76	2780.81	0.014753	9.06	736.33	397.78	1.17
Dev. El Paso Wash	1	99	100 Yr	6674.2	2774	2776.84	2.84	2776.99	2777.99	0.013156	8.6	776.3	416.86	1.11
Dev. El Paso Wash	1	98	100 Yr	6674.2	2771	2774.18	3.18	2774.31	2775.23	0.014222	8.19	814.64	498.49	1.13
Dev. El Paso Wash	1	97	100 Yr	6674.2	2768.55	2771.95	3.4	2771.79	2772.66	0.008647	6.8	981.64	546.8	0.89
Dev. El Paso Wash	1	96	100 Yr	6674.2	2765.45	2769.82	4.37	2769.82	2770.69	0.011207	7.51	888.31	517.66	1.01
Dev. El Paso Wash	1	95	100 Yr	6674.2	2764	2766.1	2.1	2766.52	2767.59	0.020822	9.8	680.76	423.58	1.36
Dev. El Paso Wash	1	94	100 Yr	6674.2	2761.17	2764.44	3.27	2764.44	2765.39	0.010948	7.81	854.5	461.69	1.01
Dev. El Paso Wash	1	93	100 Yr	6674.2	2758	2761.26	3.26	2761.53	2762.61	0.017568	9.31	716.96	424.33	1.26
Dev. El Paso Wash	1	92	100 Yr	6674.2	2756	2759.16	3.16	2759.16	2760.1	0.010684	7.8	855.64	454.36	1
Dev. El Paso Wash	1	91	100 Yr	6674.2	2753	2756.54	3.54	2756.7	2757.62	0.014482	8.35	799.57	482.24	1.14
Dev. El Paso Wash	1	90	100 Yr	6674.2	2751	2753.84	2.84	2753.94	2754.79	0.013503	7.8	855.84	542.41	1.09
Dev. El Paso Wash	1	89	100 Yr	6674.2	2748.73	2751.43	2.7	2751.28	2752.24	0.008493	7.22	923.94	463.89	0.9
Dev. El Paso Wash	1	88	100 Yr	6674.2	2746	2749.26	3.26	2749.26	2750.34	0.010368	8.34	800.34	376.07	1.01
Dev. El Paso Wash	1	87	100 Yr	6674.2	2744	2747.21	3.21	2747.25	2748.11	0.011304	7.62	876.37	503.65	1.02
Dev. El Paso Wash	1	86	100 Yr	6674.2	2741.62	2744.29	2.67	2744.5	2745.4	0.016315	8.45	789.76	511.35	1.2
Dev. El Paso Wash	1	85	100 Yr	6674.2	2738.1	2741.61	3.51	2741.66	2742.44	0.01278	7.34	908.95	605.11	1.06
Dev. El Paso Wash	1	84	100 Yr	6674.2	2736	2739.46	3.46	2739.46	2740.23	0.011536	7.02	950.89	627.16	1
Dev. El Paso Wash	1	83	100 Yr	6674.2	2734	2736.73	2.73	2736.84	2737.69	0.013845	7.85	850.26	543.78	1.11
Dev. El Paso Wash	1	82	100 Yr	6674.2	2732	2734.31	2.31	2734.4	2735.19	0.014573	7.55	884.04	622.88	1.12
Dev. El Paso Wash	1	81	100 Yr	6674.2	2728	2732.16	4.16	2732.16	2732.93	0.011911	7.02	950.08	641.06	1.02
Dev. El Paso Wash	1	80	100 Yr	6674.2	2726.32	2729.43	3.11	2729.53	2730.32	0.014309	7.56	882.64	611.91	1.11
Dev. El Paso Wash	1	79	100 Yr	6674.2	2724	2727.27	3.27	2727.28	2727.97	0.012322	6.71	994.41	736.95	1.02
Dev. El Paso Wash	1	78	100 Yr	6674.2	2722	2724.76	2.76	2724.79	2725.46	0.013016	6.74	989.55	758.38	1.04

RIDGECREST SOLAR PLANT HEC-RAS OUTPUT

South El Paso Wash - Post-development Conditions

100-Year Hydraulics

River	Reach	River Sta	Profile	Q Total	Min Ch El	W.S. Elev	W. Depth	Crit W.S.	E.G. Elev	E.G. Slope	Vel Chnl	Flow Area	Top Width	Froude # Chl
				(cfs)	(ft)	(ft)	(ft)	(ft)	(ft)	(ft/ft)	(ft/s)	(sq ft)	(ft)	
Dev. El Paso Wash	1	77	100 Yr	6700.2	2719.31	2722.45	3.14	2722.1	2722.87	0.005658	5.2	1289.61	782.72	0.71
Dev. El Paso Wash	1	76	100 Yr	6700.2	2716.53	2720.52	3.99	2720.52	2721.24	0.012206	6.82	982.51	705.36	1.02
Dev. El Paso Wash	1	75	100 Yr	6700.2	2714	2718.06	4.06	2717.98	2718.69	0.010092	6.39	1049.09	731.35	0.93
Dev. El Paso Wash	1	74	100 Yr	6700.2	2712	2715.79	3.79	2715.79	2716.51	0.01171	6.85	978.53	676.99	1
Dev. El Paso Wash	1	73	100 Yr	6700.2	2709.54	2713.09	3.55	2713.17	2713.89	0.014542	7.21	929.87	700.6	1.1
Dev. El Paso Wash	1	72	100 Yr	6700.2	2707.17	2710.94	3.77	2710.94	2711.76	0.011003	7.25	924.42	560.01	0.99
Dev. El Paso Wash	1	71	100 Yr	6700.2	2705	2708.91	3.91	2708.79	2709.66	0.00936	6.96	962.13	548.21	0.93
Dev. El Paso Wash	1	70	100 Yr	6700.2	2703.32	2706.72	3.4	2706.72	2707.59	0.011352	7.48	895.16	529.59	1.01
Dev. El Paso Wash	1	69	100 Yr	6700.2	2701.12	2704.68	3.56	2704.53	2705.35	0.008139	6.53	1025.93	580.32	0.87
Dev. El Paso Wash	1	68	100 Yr	6700.2	2699.17	2702.63	3.46	2702.63	2703.44	0.011108	7.23	927.18	568.96	1
Dev. El Paso Wash	1	67	100 Yr	6700.2	2697.04	2700.81	3.77	2700.55	2701.6	0.007613	7.16	936.23	439.11	0.86
Dev. El Paso Wash	1	66	100 Yr	6700.2	2696	2699.95	3.95	2699.38	2700.36	0.004346	5.13	1304.96	661.39	0.64
Dev. El Paso Wash	1	65	100 Yr	6700.2	2693	2698.14	5.14	2698.14	2699.01	0.010805	7.47	897.06	512.18	0.99
Dev. El Paso Wash	1	64	100 Yr	6700.2	2691	2695.03	4.03	2695.34	2696.32	0.016579	9.13	733.96	428.08	1.23
Dev. El Paso Wash	1	63	100 Yr	6887.1	2690	2693.49	3.49	2693.49	2694.45	0.010541	7.84	878.3	458.45	1
Dev. El Paso Wash	1	62	100 Yr	6887.1	2686	2689.2	3.2	2689.78	2691.07	0.02921	10.96	628.38	426.35	1.59
Dev. El Paso Wash	1	61	100 Yr	6887.1	2683	2687.03	4.03	2687.03	2687.8	0.011034	7.06	975.98	617.35	0.99
Dev. El Paso Wash	1	60	100 Yr	6887.1	2681	2684.49	3.49	2684.59	2685.31	0.014095	7.28	946.12	686.5	1.09
Dev. El Paso Wash	1	59	100 Yr	6887.1	2679	2682.13	3.13	2682.04	2682.79	0.009926	6.52	1056.93	696.1	0.93
Dev. El Paso Wash	1	58.9*	100 Yr	6887.1	2678.7	2681.83	3.13	2681.78	2682.57	0.010589	6.89	1000.21	636.57	0.97
Dev. El Paso Wash	1	58.8*	100 Yr	6887.1	2678.4	2681.62	3.22	2681.55	2682.35	0.010403	6.87	1002.52	631.83	0.96
Dev. El Paso Wash	1	58.7*	100 Yr	6887.1	2678.1	2681.38	3.28	2681.33	2682.13	0.010622	6.95	991.47	624.22	0.97
Dev. El Paso Wash	1	58.6*	100 Yr	6887.1	2677.8	2681.17	3.37	2681.12	2681.91	0.010519	6.92	995.07	625.35	0.97
Dev. El Paso Wash	1	58.5*	100 Yr	6887.1	2677.5	2680.98	3.48	2680.9	2681.7	0.00999	6.79	1014.3	631.07	0.94
Dev. El Paso Wash	1	58.4*	100 Yr	6887.1	2677.2	2680.84	3.64	0	2681.49	0.008686	6.46	1066.53	644.18	0.88
Dev. El Paso Wash	1	58.3*	100 Yr	6887.1	2676.9	2680.76	3.86	0	2681.31	0.006852	5.97	1152.73	654.83	0.79
Dev. El Paso Wash	1	58.2*	100 Yr	6887.1	2676.6	2680.66	4.06	0	2681.17	0.006035	5.74	1200.71	649.13	0.74
Dev. El Paso Wash	1	58.1*	100 Yr	6887.1	2676.3	2680.62	4.32	0	2681.04	0.004595	5.25	1312.67	659.54	0.66
Dev. El Paso Wash	1	58	100 Yr	6887.1	2676	2680.6	4.6	0	2680.94	0.003151	4.66	1479.34	677.02	0.56
Dev. El Paso Wash	1	57.9*	100 Yr	6887.1	2675.8	2680.4	4.6	0	2680.85	0.004912	5.38	1280.62	653.21	0.68
Dev. El Paso Wash	1	57.8*	100 Yr	6887.1	2675.6	2679.87	4.27	2679.86	2680.67	0.011488	7.21	954.9	593.1	1
Dev. El Paso Wash	1	57.7*	100 Yr	6887.1	2675.4	2679.52	4.12	2679.51	2680.43	0.011391	7.65	900.43	508.83	1.01
Dev. El Paso Wash	1	57.6*	100 Yr	6887.1	2675.2	2679.29	4.09	2679.29	2680.21	0.011271	7.7	894.69	487.94	1
Dev. El Paso Wash	1	57.5*	100 Yr	6887.1	2675	2678.62	3.62	2678.9	2679.9	0.016766	9.05	761.29	450.94	1.23
Dev. El Paso Wash	1	57.4*	100 Yr	6887.1	2674.8	2678.57	3.77	2678.6	2679.54	0.011695	7.9	871.98	483.54	1.04
Dev. El Paso Wash	1	57.3*	100 Yr	6887.1	2674.6	2678.18	3.58	2678.32	2679.27	0.014351	8.39	821.28	487.41	1.14
Dev. El Paso Wash	1	57.2*	100 Yr	6887.1	2674.4	2678.01	3.61	2678.11	2679.01	0.012871	8.02	859.05	499.32	1.08
Dev. El Paso Wash	1	57.1*	100 Yr	6887.1	2674.2	2677.81	3.61	2677.84	2678.73	0.01169	7.7	894.56	516.62	1.03
Dev. El Paso Wash	1	57	100 Yr	6887.1	2674	2677.61	3.61	2677.63	2678.48	0.011317	7.49	919.36	540.77	1.01

RIDGECREST SOLAR PLANT HEC-RAS OUTPUT

South El Paso Wash - Post-development Conditions

100-Year Hydraulics

River	Reach	River Sta	Profile	Q Total	Min Ch El	W.S. Elev	W. Depth	Crit W.S.	E.G. Elev	E.G. Slope	Vel Chnl	Flow Area	Top Width	Froude # Chl
				(cfs)	(ft)	(ft)	(ft)	(ft)	(ft)	(ft/ft)	(ft/s)	(sq ft)	(ft)	
Dev. El Paso Wash	1	56.9*	100 Yr	6887.1	2673.8	2677.37	3.57	2677.4	2678.26	0.011594	7.56	911.57	540.07	1.02
Dev. El Paso Wash	1	56.8*	100 Yr	6887.1	2673.61	2677.14	3.53	2677.18	2678.05	0.011805	7.64	902	533.24	1.03
Dev. El Paso Wash	1	56.7*	100 Yr	6887.1	2673.41	2676.92	3.51	2676.97	2677.83	0.011872	7.69	895.59	526.06	1.04
Dev. El Paso Wash	1	56.6*	100 Yr	6887.1	2673.21	2676.69	3.48	2676.73	2677.63	0.011997	7.77	886.44	516.75	1.05
Dev. El Paso Wash	1	56.5*	100 Yr	6887.1	2673.02	2676.47	3.45	2676.53	2677.42	0.012039	7.83	879.91	508.59	1.05
Dev. El Paso Wash	1	56.4*	100 Yr	6887.1	2672.82	2676.24	3.42	2676.32	2677.22	0.012403	7.94	867.07	501.32	1.06
Dev. El Paso Wash	1	56.3*	100 Yr	6887.1	2672.62	2675.99	3.37	2676.12	2677.02	0.013239	8.14	845.63	494.51	1.1
Dev. El Paso Wash	1	56.2*	100 Yr	6887.1	2672.42	2675.8	3.38	2675.91	2676.82	0.013069	8.12	848.19	493.45	1.09
Dev. El Paso Wash	1	56.1*	100 Yr	6887.1	2672.23	2675.54	3.31	2675.7	2676.65	0.014753	8.43	816.97	492.06	1.15
Dev. El Paso Wash	1	56	100 Yr	6887.1	2672.03	2675.37	3.34	2675.53	2676.44	0.014564	8.29	830.62	507.93	1.14
Dev. El Paso Wash	1	55	100 Yr	6887.1	2670.93	2673.53	2.6	2673.53	2674.32	0.011565	7.13	965.86	623.39	1.01
Dev. El Paso Wash	1	54	100 Yr	6887.1	2668.49	2671.4	2.91	2671.3	2672.16	0.009352	6.97	987.99	562.43	0.93
Dev. El Paso Wash	1	53	100 Yr	6887.1	2666	2669.3	3.3	2669.3	2670.11	0.011244	7.23	952.87	589.83	1
Dev. El Paso Wash	1	52	100 Yr	6887.1	2663	2666.77	3.77	2666.86	2667.71	0.012724	7.75	888.28	542.66	1.07
Dev. El Paso Wash	1	51	100 Yr	6887.1	2661.32	2664.65	3.33	2664.66	2665.41	0.011641	6.96	989.95	665.98	1.01
Dev. El Paso Wash	1	50	100 Yr	6887.1	2659.53	2662.61	3.08	2662.35	2663.19	0.006975	6.1	1128.11	628.6	0.8
Dev. El Paso Wash	1	49	100 Yr	6887.1	2657	2660.58	3.58	2660.58	2661.43	0.011133	7.36	935.23	558.8	1
Dev. El Paso Wash	1	48	100 Yr	6887.1	2655	2658.81	3.81	2658.46	2659.37	0.006729	6.01	1145.11	635.56	0.79
Dev. El Paso Wash	1	47	100 Yr	6887.1	2653	2656.9	3.9	2656.85	2657.71	0.010088	7.24	951.6	542.13	0.96
Dev. El Paso Wash	1	46	100 Yr	6887.1	2651	2654.65	3.65	2654.65	2655.6	0.010877	7.84	877.95	468.95	1.01
Dev. El Paso Wash	1	45	100 Yr	6887.1	2649	2652.73	3.73	2652.6	2653.52	0.008918	7.14	964.32	510.78	0.92
Dev. El Paso Wash	1	44	100 Yr	6887.1	2647	2650.64	3.64	2650.64	2651.55	0.01083	7.67	897.85	494.31	1
Dev. El Paso Wash	1	43	100 Yr	6887.1	2645	2648.76	3.76	2648.35	2649.49	0.005888	6.85	1005.8	414.92	0.78
Dev. El Paso Wash	1	42	100 Yr	6887.1	2642.49	2646.85	4.36	2646.85	2647.93	0.010207	8.34	825.64	382.81	1
Dev. El Paso Wash	1	41	100 Yr	6887.1	2640.63	2644.88	4.25	2644.76	2645.79	0.008755	7.65	900.1	423.7	0.93
Dev. El Paso Wash	1	40	100 Yr	6887.1	2639	2643.57	4.57	0	2644.34	0.005769	7.02	981.15	384.44	0.77
Dev. El Paso Wash	1	39	100 Yr	6888.2	2638	2641.65	3.65	2641.65	2642.81	0.010002	8.62	799.01	347.32	1
Dev. El Paso Wash	1	38	100 Yr	6888.2	2635.72	2639.78	4.06	2639.64	2640.78	0.008368	8.02	859.35	364.45	0.92
Dev. El Paso Wash	1	37	100 Yr	6888.2	2634	2637.79	3.79	2637.79	2638.93	0.010207	8.53	807.41	362.26	1.01
Dev. El Paso Wash	1	36	100 Yr	6888.2	2632	2635.92	3.92	2635.78	2636.81	0.008253	7.53	914.44	421.87	0.9
Dev. El Paso Wash	1	35	100 Yr	6888.2	2630	2633.95	3.95	2633.95	2634.94	0.010526	7.98	862.84	437.68	1
Dev. El Paso Wash	1	34	100 Yr	6888.2	2628	2632.19	4.19	2631.95	2632.92	0.007825	6.85	1004.93	512.97	0.86
Dev. El Paso Wash	1	33	100 Yr	6888.2	2626	2630.81	4.81	0	2631.46	0.006582	6.45	1068.57	525.36	0.8
Dev. El Paso Wash	1	32	100 Yr	6888.2	2625	2628.82	3.82	2628.82	2629.78	0.010574	7.87	875.09	455.07	1
Dev. El Paso Wash	1	31	100 Yr	6888.2	2623	2626.69	3.69	2626.65	2627.61	0.009998	7.67	898.38	466.08	0.97
Dev. El Paso Wash	1	30	100 Yr	6888.2	2621.57	2624.6	3.03	2624.6	2625.54	0.010615	7.81	882.26	465.97	1
Dev. El Paso Wash	1	29	100 Yr	6888.2	2620	2622.64	2.64	2622.49	2623.42	0.008705	7.12	967.24	505.5	0.91
Dev. El Paso Wash	1	28	100 Yr	6888.2	2618	2620.69	2.69	2620.61	2621.59	0.009531	7.63	902.55	455.03	0.95
Dev. El Paso Wash	1	27	100 Yr	6888.2	2616	2618.78	2.78	2618.73	2619.65	0.00979	7.46	922.87	490.9	0.96

RIDGECREST SOLAR PLANT HEC-RAS OUTPUT

South El Paso Wash - Post-development Conditions

100-Year Hydraulics

River	Reach	River Sta	Profile	Q Total	Min Ch El	W.S. Elev	W. Depth	Crit W.S.	E.G. Elev	E.G. Slope	Vel Chnl	Flow Area	Top Width	Froude # Chl
				(cfs)	(ft)	(ft)	(ft)	(ft)	(ft)	(ft/ft)	(ft/s)	(sq ft)	(ft)	
Dev. El Paso Wash	1	26	100 Yr	6888.2	2614	2616.98	2.98	2616.84	2617.81	0.008579	7.3	943.58	469.98	0.91
Dev. El Paso Wash	1	25	100 Yr	6888.2	2612	2615.29	3.29	2615.11	2616.13	0.008232	7.37	934.53	444.67	0.9
Dev. El Paso Wash	1	24	100 Yr	6888.2	2610	2613.25	3.25	2613.25	2614.25	0.010765	8.02	859.2	440.84	1.01
Dev. El Paso Wash	1	23	100 Yr	6888.2	2608.22	2611.33	3.11	2611.19	2612.08	0.008589	6.95	990.65	531.31	0.9
Dev. El Paso Wash	1	22	100 Yr	6888.2	2606	2609.29	3.29	2609.29	2610.12	0.011146	7.31	941.78	569.08	1
Dev. El Paso Wash	1	21	100 Yr	6888.2	2604	2607.7	3.7	2607.3	2608.3	0.005883	6.23	1106.44	526.85	0.76
Dev. El Paso Wash	1	20	100 Yr	6888.2	2602	2606.56	4.56	0	2607.19	0.005288	6.35	1085.44	463.81	0.73
Dev. El Paso Wash	1	19	100 Yr	6857.3	2600.56	2604.81	4.25	2604.81	2605.7	0.010771	7.57	905.64	506.26	1
Dev. El Paso Wash	1	18	100 Yr	6857.3	2600	2602.99	2.99	2602.69	2603.48	0.006421	5.58	1227.92	735.48	0.76
Dev. El Paso Wash	1	17	100 Yr	6857.3	2598.55	2601.36	2.81	2601.19	2601.98	0.008532	6.31	1086.04	669.34	0.87
Dev. El Paso Wash	1	16	100 Yr	6857.3	2595	2599.64	4.64	2599.42	2600.34	0.007866	6.7	1024.24	543.35	0.86
Dev. El Paso Wash	1	15	100 Yr	6857.3	2594	2598.08	4.08	2597.87	2598.78	0.007741	6.72	1020.6	532.36	0.86
Dev. El Paso Wash	1	14	100 Yr	6857.3	2593	2596.44	3.44	2596.29	2597.16	0.008463	6.82	1005.16	547.68	0.89
Dev. El Paso Wash	1	13	100 Yr	6857.3	2591	2594.56	3.56	2594.47	2595.39	0.009101	7.32	937.02	485.17	0.93
Dev. El Paso Wash	1	12	100 Yr	6857.3	2589	2592.71	3.71	2592.63	2593.53	0.009599	7.28	941.66	511.69	0.95
Dev. El Paso Wash	1	11	100 Yr	6857.3	2587	2590.85	3.85	2590.76	2591.63	0.009389	7.07	969.36	540.91	0.93
Dev. El Paso Wash	1	10	100 Yr	6857.3	2585	2589.18	4.18	2588.97	2589.88	0.007936	6.72	1020.85	542.92	0.86
Dev. El Paso Wash	1	9	100 Yr	6857.3	2583	2587.65	4.65	0	2588.32	0.007581	6.61	1037.38	546.07	0.85
Dev. El Paso Wash	1	8	100 Yr	6857.3	2581.49	2585.73	4.24	2585.7	2586.54	0.010516	7.22	949.42	559.64	0.98
Dev. El Paso Wash	1	7	100 Yr	6857.3	2579	2583.78	4.78	2583.67	2584.49	0.009694	6.75	1015.89	623.37	0.93
Dev. El Paso Wash	1	6	100 Yr	6857.3	2578	2581.81	3.81	2581.75	2582.5	0.010196	6.69	1025.18	662.28	0.95
Dev. El Paso Wash	1	5	100 Yr	6857.3	2577	2579.76	2.76	2579.69	2580.47	0.010088	6.79	1009.43	632.42	0.95
Dev. El Paso Wash	1	4	100 Yr	6857.3	2574	2577.71	3.71	2577.66	2578.44	0.010322	6.82	1006.14	638.03	0.96
Dev. El Paso Wash	1	3	100 Yr	6857.3	2572	2575.43	3.43	2575.43	2576.24	0.011523	7.26	944.12	590.67	1.01
Dev. El Paso Wash	1	2	100 Yr	6857.3	2570	2573.87	3.87	2573.4	2574.34	0.005072	5.5	1246.47	639.56	0.69
Dev. El Paso Wash	1	1	100 Yr	6857.3	2569	2571.84	2.84	2571.84	2572.89	0.010355	8.5	858.99	412.57	1.01

HMS Output for Post-Development Hydrology Calculations

100 Year Flow Rates

Post-Development Hydrology - Western & Eastern Drainage Areas

Hydrologic Element	Drainage Area (mi^2)	Peak Discharge (cfs)	Time of Peak	Volume (ac-ft)
2iSF1	0.029	31.20	01Jan2009, 12:03	2.20
2iSF2	0.040	42.50	01Jan2009, 12:03	3.00
2iSF3	0.040	42.50	01Jan2009, 12:03	3.00
2iSF4	0.030	33.20	01Jan2009, 12:00	2.30
2iSF5	0.041	44.10	01Jan2009, 12:03	3.10
2iSF6	0.041	44.10	01Jan2009, 12:03	3.10
2jSF1	0.038	40.30	01Jan2009, 12:03	2.90
2jSF2	0.035	37.10	01Jan2009, 12:03	2.60
2jSF3	0.042	43.80	01Jan2009, 12:03	3.20
2jSF4	0.053	53.50	01Jan2009, 12:03	4.00
2jSF5	0.042	43.80	01Jan2009, 12:03	3.20
2k	0.020	17.00	01Jan2009, 12:09	1.50
2lSF1	0.050	50.50	01Jan2009, 12:03	3.80
2lSF2	0.039	41.40	01Jan2009, 12:03	2.90
2lSF3	0.051	54.10	01Jan2009, 12:03	3.90
2lSF4	0.041	43.50	01Jan2009, 12:03	3.10
2lSF5	0.038	42.10	01Jan2009, 12:00	2.90
2mSF1	0.052	54.20	01Jan2009, 12:03	3.90
2mSF2	0.062	62.60	01Jan2009, 12:03	4.70
2mSF3	0.052	54.20	01Jan2009, 12:03	3.90
2mSF4	0.061	62.60	01Jan2009, 12:03	4.60
2qNF1	0.033	35.50	01Jan2009, 12:03	2.50
2qNF2	0.030	34.30	01Jan2009, 12:00	2.30
2qNF3	0.050	52.20	01Jan2009, 12:03	3.80
2qNF4	0.030	32.30	01Jan2009, 12:03	2.30
2sNF1	0.052	53.30	01Jan2009, 12:03	3.90
2sNF2	0.047	47.40	01Jan2009, 12:03	3.60
2sNF3	0.050	51.30	01Jan2009, 12:03	3.80
2sNF4	0.060	58.20	01Jan2009, 12:03	4.50
2uNF1	0.052	53.30	01Jan2009, 12:03	3.90
2uNF2	0.047	48.20	01Jan2009, 12:03	3.60
2uNF3	0.042	43.10	01Jan2009, 12:03	3.20
2uNF4	0.044	45.10	01Jan2009, 12:03	3.30
2uNF5	0.055	53.40	01Jan2009, 12:03	4.20
East_Outlet	23.400	6857.30	01Jan2009, 13:06	1593.50
Ex_Outlet1	4.542	1946.30	01Jan2009, 12:48	326.50
Ex_Outlet2	27.942	8161.40	01Jan2009, 13:09	1919.90
J0	20.962	6700.20	01Jan2009, 12:57	1409.40
J1	3.129	1458.90	01Jan2009, 12:33	226.90
J10	0.071	75.50	01Jan2009, 12:03	5.40
J11	0.221	217.60	01Jan2009, 12:06	16.70
J12	0.073	73.70	01Jan2009, 12:03	5.50
J13	0.336	291.70	01Jan2009, 12:12	25.40
J14	0.431	360.60	01Jan2009, 12:09	32.50
J15	0.353	283.10	01Jan2009, 12:12	26.70
J16	0.466	365.60	01Jan2009, 12:09	35.20

Hydrologic Element	Drainage Area (mi^2)	Peak Discharge (cfs)	Time of Peak	Volume (ac-ft)
J17	0.943	712.90	01Jan2009, 12:15	71.20
J18	22.241	6887.10	01Jan2009, 13:00	1506.00
J19	22.535	6869.20	01Jan2009, 13:03	1528.10
J2	4.483	1951.90	01Jan2009, 12:33	322.00
J20	0.063	68.00	01Jan2009, 12:03	4.80
J21	0.143	145.50	01Jan2009, 12:03	10.80
J22	0.099	91.90	01Jan2009, 12:06	7.50
J23	0.110	99.70	01Jan2009, 12:06	8.30
J24	0.209	189.80	01Jan2009, 12:06	15.80
J25	22.800	6888.20	01Jan2009, 13:03	1548.20
J26	0.099	91.80	01Jan2009, 12:06	7.50
J27	0.086	77.60	01Jan2009, 12:06	6.50
J28	0.141	111.60	01Jan2009, 12:06	10.60
J29	0.240	200.70	01Jan2009, 12:06	18.10
J3	0.089	85.00	01Jan2009, 12:06	6.70
J30	23.313	6900.50	01Jan2009, 13:06	1586.90
J4	0.109	100.70	01Jan2009, 12:09	8.20
J5	0.092	92.70	01Jan2009, 12:03	7.00
J6	0.239	217.60	01Jan2009, 12:06	18.10
J7	20.658	6674.20	01Jan2009, 12:54	1383.00
J8	0.069	71.50	01Jan2009, 12:03	5.20
J9	0.109	106.70	01Jan2009, 12:06	8.20
O1a	0.392	272.70	01Jan2009, 12:12	26.60
O1b	2.737	1336.60	01Jan2009, 12:33	200.30
O1c	1.354	732.00	01Jan2009, 12:24	95.10
O1d	0.059	75.30	01Jan2009, 11:57	4.50
O2a	20.528	6647.90	01Jan2009, 12:54	1373.70
O2b	0.130	93.50	01Jan2009, 12:12	9.40
O2c	0.284	291.00	01Jan2009, 12:06	24.90
O2d	0.014	16.50	01Jan2009, 12:00	1.10
O2e	0.006	8.00	01Jan2009, 11:57	0.50
O2f	0.216	168.80	01Jan2009, 12:12	16.30
O2g	0.018	25.80	01Jan2009, 11:57	1.40
O2h	0.046	52.60	01Jan2009, 12:00	3.50
O2n	0.046	52.60	01Jan2009, 12:00	3.50
O2o	0.056	67.60	01Jan2009, 12:00	4.20
O2p	0.151	162.50	01Jan2009, 12:03	11.40
O2r	0.056	70.10	01Jan2009, 12:00	4.20
O2t	0.273	254.80	01Jan2009, 12:06	20.60
O2v	0.087	105.10	01Jan2009, 12:00	6.60
R1	0.392	266.60	01Jan2009, 12:12	26.60
R10	20.962	6663.50	01Jan2009, 13:00	1409.30
R11	0.018	24.60	01Jan2009, 12:06	1.40
R12	0.029	30.40	01Jan2009, 12:06	2.20
R13	0.069	69.00	01Jan2009, 12:06	5.20
R14	0.109	106.60	01Jan2009, 12:06	8.20
R15	0.030	31.80	01Jan2009, 12:06	2.30
R16	0.071	73.00	01Jan2009, 12:06	5.40
R17	0.221	206.50	01Jan2009, 12:12	16.70
R18	0.038	38.60	01Jan2009, 12:06	2.90
R19	0.073	69.80	01Jan2009, 12:06	5.50
R2	3.129	1442.10	01Jan2009, 12:36	226.90
R20	0.336	291.50	01Jan2009, 12:12	25.40

Hydrologic Element	Drainage Area (mi^2)	Peak Discharge (cfs)	Time of Peak	Volume (ac-ft)
R21	0.053	49.40	01Jan2009, 12:09	4.00
R22	0.431	357.50	01Jan2009, 12:15	32.50
R23	0.050	48.80	01Jan2009, 12:09	3.80
R24	0.089	83.70	01Jan2009, 12:09	6.70
R25	0.109	100.00	01Jan2009, 12:09	8.20
R26	0.051	51.90	01Jan2009, 12:06	3.90
R27	0.092	90.30	01Jan2009, 12:06	7.00
R28	0.239	209.30	01Jan2009, 12:15	18.10
R29	0.052	50.10	01Jan2009, 12:09	3.90
R3	4.483	1951.30	01Jan2009, 12:33	322.00
R30	0.353	282.50	01Jan2009, 12:12	26.70
R31	0.052	50.10	01Jan2009, 12:09	3.90
R32	0.466	352.10	01Jan2009, 12:18	35.20
R33	0.943	714.40	01Jan2009, 12:18	71.20
R34	22.241	6837.10	01Jan2009, 13:03	1505.90
R35	0.033	35.10	01Jan2009, 12:03	2.50
R36	0.063	66.80	01Jan2009, 12:03	4.80
R37	0.050	48.00	01Jan2009, 12:06	3.80
R38	0.143	141.70	01Jan2009, 12:09	10.80
R39	22.535	6857.00	01Jan2009, 13:03	1528.20
R4	4.542	1946.30	01Jan2009, 12:48	326.50
R40	0.052	47.10	01Jan2009, 12:09	3.90
R41	0.099	91.40	01Jan2009, 12:06	7.50
R42	0.050	45.40	01Jan2009, 12:09	3.80
R43	0.110	98.50	01Jan2009, 12:06	8.30
R44	0.209	186.20	01Jan2009, 12:06	15.80
R45	22.800	6840.10	01Jan2009, 13:06	1548.20
R46	0.052	47.40	01Jan2009, 12:09	3.90
R47	0.099	90.60	01Jan2009, 12:06	7.50
R48	0.042	36.40	01Jan2009, 12:09	3.20
R49	0.086	66.10	01Jan2009, 12:12	6.40
R5	4.542	1938.00	01Jan2009, 12:51	326.40
R50	0.141	110.9	01Jan2009, 12:09	10.6
R51	0.240	198.4	01Jan2009, 12:06	18.1
R52	23.313	6849.2	01Jan2009, 13:06	1586.9
R53	23.4	6806.1	01Jan2009, 13:12	1593.4
R6	0.130	92.8	01Jan2009, 12:12	9.4
R7	20.658	6650.80	01Jan2009, 12:57	1383.00
R8	0.014	16.10	01Jan2009, 12:03	1.10
R9	0.006	7.90	01Jan2009, 12:00	0.50
West_Outlet	4.542	1959.80	01Jan2009, 12:33	326.40

HMS Output for Post-Development Hydrology Calculations

25 Year Flow Rates

Post-Development Hydrology - Western & Eastern Drainage Areas

Hydrologic Element	Drainage Area (mi^2)	Peak Discharge (cfs)	Time of Peak	Volume (ac-ft)
2iSF1	0.029	18.20	01Jan2009, 12:03	1.30
2iSF2	0.040	24.60	01Jan2009, 12:03	1.80
2iSF3	0.040	24.60	01Jan2009, 12:03	1.80
2iSF4	0.030	19.10	01Jan2009, 12:03	1.30
2iSF5	0.041	25.70	01Jan2009, 12:03	1.80
2iSF6	0.041	25.70	01Jan2009, 12:03	1.80
2jSF1	0.038	23.40	01Jan2009, 12:03	1.70
2jSF2	0.035	21.60	01Jan2009, 12:03	1.60
2jSF3	0.042	25.30	01Jan2009, 12:03	1.90
2jSF4	0.053	30.70	01Jan2009, 12:03	2.40
2jSF5	0.042	25.30	01Jan2009, 12:03	1.90
2k	0.020	9.90	01Jan2009, 12:09	0.90
2lSF1	0.050	29.00	01Jan2009, 12:03	2.20
2lSF2	0.039	24.00	01Jan2009, 12:03	1.70
2lSF3	0.051	31.40	01Jan2009, 12:03	2.30
2lSF4	0.041	25.30	01Jan2009, 12:03	1.80
2lSF5	0.038	24.10	01Jan2009, 12:03	1.70
2mSF1	0.052	31.40	01Jan2009, 12:03	2.30
2mSF2	0.062	35.90	01Jan2009, 12:03	2.80
2mSF3	0.052	31.40	01Jan2009, 12:03	2.30
2mSF4	0.061	36.00	01Jan2009, 12:03	2.70
2qNF1	0.033	20.70	01Jan2009, 12:03	1.50
2qNF2	0.030	19.70	01Jan2009, 12:00	1.30
2qNF3	0.050	30.10	01Jan2009, 12:03	2.20
2qNF4	0.030	18.80	01Jan2009, 12:03	1.30
2sNF1	0.052	30.70	01Jan2009, 12:03	2.30
2sNF2	0.047	27.20	01Jan2009, 12:03	2.10
2sNF3	0.050	29.50	01Jan2009, 12:03	2.20
2sNF4	0.060	33.40	01Jan2009, 12:06	2.70
2uNF1	0.052	30.70	01Jan2009, 12:03	2.30
2uNF2	0.047	27.80	01Jan2009, 12:03	2.10
2uNF3	0.042	24.80	01Jan2009, 12:03	1.90
2uNF4	0.044	26.00	01Jan2009, 12:03	2.00
2uNF5	0.055	30.60	01Jan2009, 12:06	2.50
East_Outlet	23.400	3721.10	01Jan2009, 13:09	917.30
Ex_Outlet1	4.542	1078.80	01Jan2009, 12:51	190.90
Ex_Outlet2	27.942	4466.00	01Jan2009, 13:12	1108.20
J0	20.962	3607.50	01Jan2009, 13:00	807.90
J1	3.129	823.80	01Jan2009, 12:33	133.00
J10	0.071	43.20	01Jan2009, 12:03	3.20
J11	0.221	124.40	01Jan2009, 12:06	9.90
J12	0.073	41.70	01Jan2009, 12:06	3.30
J13	0.336	160.30	01Jan2009, 12:15	15.10
J14	0.431	196.20	01Jan2009, 12:12	19.30
J15	0.353	154.10	01Jan2009, 12:15	15.80
J16	0.466	194.00	01Jan2009, 12:12	20.90

Hydrologic Element	Drainage Area (mi^2)	Peak Discharge (cfs)	Time of Peak	Volume (ac-ft)
J17	0.943	385.20	01Jan2009, 12:21	42.20
J18	22.241	3722.10	01Jan2009, 13:03	865.30
J19	22.535	3721.00	01Jan2009, 13:03	878.50
J2	4.483	1086.50	01Jan2009, 12:33	188.20
J20	0.063	39.20	01Jan2009, 12:03	2.80
J21	0.143	83.30	01Jan2009, 12:03	6.40
J22	0.099	52.10	01Jan2009, 12:06	4.40
J23	0.110	55.40	01Jan2009, 12:06	4.90
J24	0.209	105.90	01Jan2009, 12:06	9.40
J25	22.800	3725.50	01Jan2009, 13:06	890.40
J26	0.099	52.30	01Jan2009, 12:06	4.40
J27	0.086	43.70	01Jan2009, 12:06	3.80
J28	0.141	60.30	01Jan2009, 12:09	6.30
J29	0.240	110.80	01Jan2009, 12:09	10.70
J3	0.089	48.30	01Jan2009, 12:06	4.00
J30	23.313	3742.00	01Jan2009, 13:09	913.40
J4	0.109	57.60	01Jan2009, 12:09	4.90
J5	0.092	52.60	01Jan2009, 12:06	4.10
J6	0.239	121.40	01Jan2009, 12:09	10.70
J7	20.658	3599.80	01Jan2009, 12:57	791.80
J8	0.069	40.60	01Jan2009, 12:03	3.10
J9	0.109	60.80	01Jan2009, 12:06	4.90
O1a	0.392	150.50	01Jan2009, 12:12	15.30
O1b	2.737	753.50	01Jan2009, 12:33	117.70
O1c	1.354	406.10	01Jan2009, 12:24	55.20
O1d	0.059	44.10	01Jan2009, 12:00	2.60
O2a	20.528	3585.20	01Jan2009, 12:57	786.40
O2b	0.130	51.50	01Jan2009, 12:12	5.40
O2c	0.284	173.60	01Jan2009, 12:09	15.20
O2d	0.014	9.50	01Jan2009, 12:00	0.60
O2e	0.006	4.60	01Jan2009, 11:57	0.30
O2f	0.216	97.60	01Jan2009, 12:12	9.70
O2g	0.018	15.20	01Jan2009, 11:57	0.80
O2h	0.046	30.30	01Jan2009, 12:00	2.10
O2n	0.046	30.30	01Jan2009, 12:00	2.10
O2o	0.056	39.30	01Jan2009, 12:00	2.50
O2p	0.151	94.70	01Jan2009, 12:03	6.80
O2r	0.056	41.20	01Jan2009, 12:00	2.50
O2t	0.273	147.30	01Jan2009, 12:06	12.20
O2v	0.087	61.00	01Jan2009, 12:00	3.90
R1	0.392	146.90	01Jan2009, 12:15	15.30
R10	20.962	3582.80	01Jan2009, 13:03	808.00
R11	0.018	14.80	01Jan2009, 12:06	0.80
R12	0.029	17.70	01Jan2009, 12:06	1.30
R13	0.069	39.00	01Jan2009, 12:09	3.10
R14	0.109	60.70	01Jan2009, 12:06	4.90
R15	0.030	18.70	01Jan2009, 12:06	1.30
R16	0.071	41.20	01Jan2009, 12:06	3.20
R17	0.221	117.50	01Jan2009, 12:15	9.90
R18	0.038	22.30	01Jan2009, 12:06	1.70
R19	0.073	40.10	01Jan2009, 12:09	3.30
R2	3.129	813.00	01Jan2009, 12:36	133.00
R20	0.336	160.20	01Jan2009, 12:15	15.10

Hydrologic Element	Drainage Area (mi^2)	Peak Discharge (cfs)	Time of Peak	Volume (ac-ft)
R21	0.053	28.60	01Jan2009, 12:09	2.40
R22	0.431	193.40	01Jan2009, 12:18	19.30
R23	0.050	28.80	01Jan2009, 12:09	2.20
R24	0.089	47.70	01Jan2009, 12:09	4.00
R25	0.109	55.80	01Jan2009, 12:12	4.90
R26	0.051	29.90	01Jan2009, 12:06	2.30
R27	0.092	50.80	01Jan2009, 12:09	4.10
R28	0.239	116.80	01Jan2009, 12:18	10.70
R29	0.052	29.30	01Jan2009, 12:09	2.30
R3	4.483	1084.80	01Jan2009, 12:33	188.20
R30	0.353	153.70	01Jan2009, 12:15	15.80
R31	0.052	29.10	01Jan2009, 12:09	2.30
R32	0.466	188.10	01Jan2009, 12:21	20.90
R33	0.943	383.20	01Jan2009, 12:24	42.20
R34	22.241	3700.40	01Jan2009, 13:03	865.30
R35	0.033	19.80	01Jan2009, 12:03	1.50
R36	0.063	37.90	01Jan2009, 12:03	2.80
R37	0.050	28.70	01Jan2009, 12:06	2.20
R38	0.143	83.20	01Jan2009, 12:09	6.40
R39	22.535	3706.40	01Jan2009, 13:06	878.50
R4	4.542	1078.80	01Jan2009, 12:51	190.90
R40	0.052	27.60	01Jan2009, 12:09	2.30
R41	0.099	51.60	01Jan2009, 12:06	4.40
R42	0.050	25.70	01Jan2009, 12:12	2.20
R43	0.110	54.70	01Jan2009, 12:09	4.90
R44	0.209	105.20	01Jan2009, 12:09	9.40
R45	22.800	3705.10	01Jan2009, 13:09	890.40
R46	0.052	27.70	01Jan2009, 12:09	2.30
R47	0.099	50.70	01Jan2009, 12:09	4.40
R48	0.042	20.70	01Jan2009, 12:09	1.90
R49	0.086	36.30	01Jan2009, 12:12	3.80
R5	4.542	1074.9	01Jan2009, 12:57	190.9
R50	0.141	60	01Jan2009, 12:09	6.3
R51	0.24	110.4	01Jan2009, 12:09	10.7
R52	23.313	3716.2	01Jan2009, 13:09	913.4
R53	23.400	3693.1	01Jan2009, 13:15	917.2
R6	0.130	50.80	01Jan2009, 12:12	5.40
R7	20.658	3577.90	01Jan2009, 13:00	791.80
R8	0.014	9.40	01Jan2009, 12:03	0.60
R9	0.006	4.60	01Jan2009, 12:00	0.30
West_Outlet	4.542	1090.30	01Jan2009, 12:33	190.90

HMS Output for Post-Development Hydrology Calculations

10 Year Flow Rates

Post-Development Hydrology - Western & Eastern Drainage Areas

Hydrologic Element	Drainage Area (mi^2)	Peak Discharge (cfs)	Time of Peak	Volume (ac-ft)
2iSF1	0.029	11.60	01Jan2009, 12:03	0.90
2iSF2	0.040	15.70	01Jan2009, 12:03	1.20
2iSF3	0.040	15.70	01Jan2009, 12:03	1.20
2iSF4	0.030	12.30	01Jan2009, 12:03	0.90
2iSF5	0.041	16.50	01Jan2009, 12:03	1.20
2iSF6	0.041	16.50	01Jan2009, 12:03	1.20
2jSF1	0.038	14.90	01Jan2009, 12:03	1.10
2jSF2	0.035	13.70	01Jan2009, 12:03	1.00
2jSF3	0.042	16.10	01Jan2009, 12:03	1.20
2jSF4	0.053	19.30	01Jan2009, 12:03	1.60
2jSF5	0.042	16.10	01Jan2009, 12:03	1.20
2k	0.020	6.30	01Jan2009, 12:09	0.60
2lSF1	0.050	18.20	01Jan2009, 12:03	1.50
2lSF2	0.039	15.30	01Jan2009, 12:03	1.20
2lSF3	0.051	20.00	01Jan2009, 12:03	1.50
2lSF4	0.041	16.10	01Jan2009, 12:03	1.20
2lSF5	0.038	15.50	01Jan2009, 12:03	1.10
2mSF1	0.052	19.90	01Jan2009, 12:03	1.50
2mSF2	0.062	22.60	01Jan2009, 12:03	1.80
2mSF3	0.052	19.90	01Jan2009, 12:03	1.50
2mSF4	0.061	22.80	01Jan2009, 12:03	1.80
2qNF1	0.033	13.30	01Jan2009, 12:03	1.00
2qNF2	0.030	12.50	01Jan2009, 12:03	0.90
2qNF3	0.050	19.10	01Jan2009, 12:03	1.50
2qNF4	0.030	12.00	01Jan2009, 12:03	0.90
2sNF1	0.052	19.40	01Jan2009, 12:03	1.50
2sNF2	0.047	17.10	01Jan2009, 12:03	1.40
2sNF3	0.050	18.60	01Jan2009, 12:03	1.50
2sNF4	0.060	21.30	01Jan2009, 12:06	1.80
2uNF1	0.052	19.40	01Jan2009, 12:03	1.50
2uNF2	0.047	17.50	01Jan2009, 12:03	1.40
2uNF3	0.042	15.70	01Jan2009, 12:03	1.20
2uNF4	0.044	16.40	01Jan2009, 12:03	1.30
2uNF5	0.055	19.60	01Jan2009, 12:06	1.60
East_Outlet	23.400	2227.30	01Jan2009, 13:12	590.00
Ex_Outlet1	4.542	661.80	01Jan2009, 12:57	124.70
Ex_Outlet2	27.942	2700.10	01Jan2009, 13:18	714.70
J0	20.962	2142.30	01Jan2009, 13:00	517.70
J1	3.129	511.10	01Jan2009, 12:33	87.10
J10	0.071	26.70	01Jan2009, 12:03	2.10
J11	0.221	76.90	01Jan2009, 12:06	6.60
J12	0.073	26.50	01Jan2009, 12:06	2.20
J13	0.336	97.30	01Jan2009, 12:18	10.00
J14	0.431	117.60	01Jan2009, 12:15	12.80
J15	0.353	92.90	01Jan2009, 12:18	10.50
J16	0.466	115.50	01Jan2009, 12:18	13.80

Hydrologic Element	Drainage Area (mi^2)	Peak Discharge (cfs)	Time of Peak	Volume (ac-ft)
J17	0.943	227.60	01Jan2009, 12:24	28.00
J18	22.241	2228.60	01Jan2009, 13:03	555.60
J19	22.535	2232.40	01Jan2009, 13:06	564.40
J2	4.483	670.30	01Jan2009, 12:36	122.90
J20	0.063	24.70	01Jan2009, 12:03	1.90
J21	0.143	52.30	01Jan2009, 12:06	4.20
J22	0.099	31.50	01Jan2009, 12:06	2.90
J23	0.110	34.00	01Jan2009, 12:09	3.30
J24	0.209	65.10	01Jan2009, 12:09	6.20
J25	22.800	2233.60	01Jan2009, 13:06	572.20
J26	0.099	32.00	01Jan2009, 12:06	2.90
J27	0.086	26.20	01Jan2009, 12:06	2.50
J28	0.141	35.30	01Jan2009, 12:09	4.20
J29	0.240	66.50	01Jan2009, 12:09	7.10
J3	0.089	29.50	01Jan2009, 12:06	2.60
J30	23.313	2237.70	01Jan2009, 13:12	587.40
J4	0.109	35.00	01Jan2009, 12:09	3.20
J5	0.092	33.50	01Jan2009, 12:06	2.70
J6	0.239	74.30	01Jan2009, 12:09	7.10
J7	20.658	2135.50	01Jan2009, 12:57	506.80
J8	0.069	25.50	01Jan2009, 12:06	2.00
J9	0.109	37.40	01Jan2009, 12:06	3.20
O1a	0.392	90.80	01Jan2009, 12:12	9.80
O1b	2.737	466.80	01Jan2009, 12:33	77.20
O1c	1.354	246.90	01Jan2009, 12:24	35.80
O1d	0.059	28.60	01Jan2009, 12:00	1.80
O2a	20.528	2126.00	01Jan2009, 12:57	503.30
O2b	0.130	30.70	01Jan2009, 12:12	3.50
O2c	0.284	113.50	01Jan2009, 12:09	10.30
O2d	0.014	6.00	01Jan2009, 12:00	0.40
O2e	0.006	3.00	01Jan2009, 12:00	0.20
O2f	0.216	62.00	01Jan2009, 12:12	6.40
O2g	0.018	9.80	01Jan2009, 11:57	0.50
O2h	0.046	19.10	01Jan2009, 12:03	1.40
O2n	0.046	19.10	01Jan2009, 12:03	1.40
O2o	0.056	25.00	01Jan2009, 12:00	1.70
O2p	0.151	60.70	01Jan2009, 12:03	4.50
O2r	0.056	26.50	01Jan2009, 12:00	1.70
O2t	0.273	93.50	01Jan2009, 12:06	8.10
O2v	0.087	38.90	01Jan2009, 12:00	2.60
R1	0.392	87.90	01Jan2009, 12:15	9.80
R10	20.962	2126.10	01Jan2009, 13:03	517.70
R11	0.018	9.50	01Jan2009, 12:09	0.50
R12	0.029	11.10	01Jan2009, 12:06	0.90
R13	0.069	24.80	01Jan2009, 12:09	2.00
R14	0.109	37.30	01Jan2009, 12:06	3.20
R15	0.030	11.90	01Jan2009, 12:06	0.90
R16	0.071	26.10	01Jan2009, 12:09	2.10
R17	0.221	72.80	01Jan2009, 12:18	6.60
R18	0.038	13.90	01Jan2009, 12:06	1.10
R19	0.073	25.30	01Jan2009, 12:09	2.20
R2	3.129	505.20	01Jan2009, 12:36	87.10
R20	0.336	97.30	01Jan2009, 12:18	10.00

Hydrologic Element	Drainage Area (mi^2)	Peak Discharge (cfs)	Time of Peak	Volume (ac-ft)
R21	0.053	18.20	01Jan2009, 12:09	1.60
R22	0.431	115.20	01Jan2009, 12:21	12.80
R23	0.050	18.10	01Jan2009, 12:09	1.50
R24	0.089	28.90	01Jan2009, 12:12	2.60
R25	0.109	34.70	01Jan2009, 12:12	3.20
R26	0.051	18.70	01Jan2009, 12:06	1.50
R27	0.092	32.20	01Jan2009, 12:09	2.70
R28	0.239	71.30	01Jan2009, 12:21	7.10
R29	0.052	18.40	01Jan2009, 12:09	1.50
R3	4.483	669.30	01Jan2009, 12:36	122.90
R30	0.353	92.50	01Jan2009, 12:18	10.50
R31	0.052	18.20	01Jan2009, 12:09	1.50
R32	0.466	111.80	01Jan2009, 12:27	13.80
R33	0.943	226.20	01Jan2009, 12:27	28.00
R34	22.241	2218.40	01Jan2009, 13:06	555.60
R35	0.033	12.70	01Jan2009, 12:06	1.00
R36	0.063	23.90	01Jan2009, 12:06	1.90
R37	0.050	17.70	01Jan2009, 12:06	1.50
R38	0.143	51.00	01Jan2009, 12:12	4.20
R39	22.535	2220.20	01Jan2009, 13:06	564.40
R4	4.542	661.80	01Jan2009, 12:57	124.70
R40	0.052	16.80	01Jan2009, 12:09	1.50
R41	0.099	31.40	01Jan2009, 12:09	2.90
R42	0.050	16.30	01Jan2009, 12:12	1.50
R43	0.110	33.70	01Jan2009, 12:09	3.30
R44	0.209	64.30	01Jan2009, 12:09	6.20
R45	22.800	2212.90	01Jan2009, 13:12	572.30
R46	0.052	17.20	01Jan2009, 12:09	1.50
R47	0.099	31.70	01Jan2009, 12:09	2.90
R48	0.042	12.70	01Jan2009, 12:12	1.20
R49	0.086	22.00	01Jan2009, 12:15	2.50
R5	4.542	657.5	01Jan2009, 13:00	124.7
R50	0.141	34.8	01Jan2009, 12:09	4.2
R51	0.24	65.8	01Jan2009, 12:09	7.1
R52	23.313	2224	01Jan2009, 13:12	587.5
R53	23.400	2210.4	01Jan2009, 13:18	590
R6	0.130	30.50	01Jan2009, 12:15	3.50
R7	20.658	2121.40	01Jan2009, 13:00	506.80
R8	0.014	6.00	01Jan2009, 12:03	0.40
R9	0.006	2.90	01Jan2009, 12:03	0.20
West_Outlet	4.542	672.80	01Jan2009, 12:36	124.60

RIDGECREST SOLAR PLANT HEC-RAS OUTPUT (REV. CN)

South El Paso Wash - Pre-development Conditions

100-Year Hydraulics

River	Reach	River Sta	Profile	Q Total	Min Ch El	W.S. Elev	W. Depth	Crit W.S.	E.G. Elev	E.G. Slope	Vel Chnl	Flow Area	Top Width	Froude # Chl
				(cfs)	(ft)	(ft)	(ft)	(ft)	(ft)	(ft/ft)	(ft/s)	(sq ft)	(ft)	
Ex. El Paso Wash	1	116	100 Yr	5349.2	2819.35	2822.31	2.96	2822.43	2823.21	0.015008	7.61	702.48	499.3	1.13
Ex. El Paso Wash	1	115	100 Yr	5349.2	2816.92	2819.41	2.49	2819.51	2820.2	0.014737	7.12	751.66	583.42	1.1
Ex. El Paso Wash	1	114	100 Yr	5349.2	2814	2816.65	2.65	2816.69	2817.37	0.013451	6.83	783.26	603.96	1.06
Ex. El Paso Wash	1	113	100 Yr	5349.2	2811	2813.81	2.81	2813.89	2814.6	0.014241	7.11	752.13	569.61	1.09
Ex. El Paso Wash	1	112	100 Yr	5349.2	2808	2811.11	3.11	2811.13	2811.87	0.012966	7	763.66	551.57	1.05
Ex. El Paso Wash	1	111	100 Yr	5349.2	2806	2808.55	2.55	2808.58	2809.32	0.012535	7.07	756.75	525.47	1.04
Ex. El Paso Wash	1	110	100 Yr	5349.2	2803	2805.29	2.29	2805.49	2806.33	0.017926	8.19	653.48	476.36	1.23
Ex. El Paso Wash	1	109	100 Yr	5349.2	2800.49	2802.86	2.37	2802.86	2803.64	0.011628	7.09	754.12	492.54	1.01
Ex. El Paso Wash	1	108	100 Yr	5349.2	2796.35	2799.54	3.19	2799.82	2800.63	0.019726	8.38	638.14	482.09	1.28
Ex. El Paso Wash	1	107	100 Yr	5349.2	2794	2797.19	3.19	2797.19	2797.79	0.012686	6.2	862.36	735.03	1.01
Ex. El Paso Wash	1	106	100 Yr	5349.2	2791	2794.36	3.36	2794.42	2795.05	0.014771	6.69	800.13	683.23	1.09
Ex. El Paso Wash	1	105	100 Yr	5349.2	2788	2791.64	3.64	2791.66	2792.31	0.012716	6.61	809.73	629.23	1.03
Ex. El Paso Wash	1	104	100 Yr	5349.2	2786	2788.54	2.54	2788.68	2789.45	0.015873	7.65	699.2	514.58	1.16
Ex. El Paso Wash	1	103	100 Yr	5349.2	2783.21	2786.5	3.29	2786.5	2787.34	0.011546	7.38	725.02	443.82	1.02
Ex. El Paso Wash	1	102	100 Yr	5349.2	2781	2784.19	3.19	2784.07	2785.13	0.009014	7.76	689.31	324.75	0.94
Ex. El Paso Wash	1	101	100 Yr	5349.2	2779.34	2782.25	2.91	2782.25	2783.07	0.011519	7.27	735.46	459.36	1.01
Ex. El Paso Wash	1	100	100 Yr	5349.2	2776	2779.25	3.25	2779.46	2780.39	0.015847	8.59	622.67	384.66	1.19
Ex. El Paso Wash	1	99	100 Yr	5349.2	2774	2776.63	2.63	2776.68	2777.57	0.012229	7.79	686.51	404.51	1.05
Ex. El Paso Wash	1	98	100 Yr	5349.2	2771	2773.68	2.68	2774.06	2774.87	0.014599	8.74	612.22	346.89	1.16
Ex. El Paso Wash	1	97	100 Yr	5349.2	2768.55	2771.73	3.18	2771.56	2772.32	0.008414	6.2	862.82	540.77	0.86
Ex. El Paso Wash	1	96	100 Yr	5349.2	2765.45	2769.58	4.13	2769.58	2770.34	0.011706	7	763.65	510.78	1.01
Ex. El Paso Wash	1	95	100 Yr	5349.2	2764	2765.87	1.87	2766.19	2767.18	0.021944	9.19	581.84	414.7	1.37
Ex. El Paso Wash	1	94	100 Yr	5349.2	2761.17	2764.17	3	2764.17	2765	0.011565	7.3	732.41	456.03	1.02
Ex. El Paso Wash	1	93	100 Yr	5349.2	2758	2761.06	3.06	2761.26	2762.18	0.017229	8.5	629.64	421.25	1.22
Ex. El Paso Wash	1	92	100 Yr	5349.2	2756	2758.89	2.89	2758.89	2759.71	0.011195	7.26	736.42	450.74	1
Ex. El Paso Wash	1	91	100 Yr	5349.2	2753	2756.34	3.34	2756.43	2757.23	0.013703	7.58	705.33	471.27	1.09
Ex. El Paso Wash	1	90	100 Yr	5349.2	2751	2753.62	2.62	2753.69	2754.44	0.014014	7.25	737.95	536.65	1.09
Ex. El Paso Wash	1	89	100 Yr	5349.2	2748.73	2751.1	2.37	2751.02	2751.84	0.009646	6.9	775.64	459.3	0.94
Ex. El Paso Wash	1	88	100 Yr	5349.2	2746	2749	3	2748.93	2749.89	0.009701	7.58	705.43	363.71	0.96
Ex. El Paso Wash	1	87	100 Yr	5349.2	2744	2746.99	2.99	2746.99	2747.75	0.011461	7.02	761.6	499.35	1
Ex. El Paso Wash	1	86	100 Yr	5349.2	2741.62	2744.09	2.47	2744.25	2745.03	0.016235	7.78	687.47	501.96	1.17
Ex. El Paso Wash	1	85	100 Yr	5349.2	2738.1	2741.51	3.41	2741.42	2742.12	0.010019	6.28	851.73	597.21	0.93
Ex. El Paso Wash	1	84	100 Yr	5349.2	2736	2739.24	3.24	2739.24	2739.91	0.012208	6.58	812.67	615.83	1.01
Ex. El Paso Wash	1	83	100 Yr	5349.2	2734	2736.52	2.52	2736.59	2737.34	0.01375	7.23	739.68	532.21	1.08
Ex. El Paso Wash	1	82	100 Yr	5349.2	2732	2734.26	2.26	2734.19	2734.87	0.010475	6.26	853.96	621.5	0.94
Ex. El Paso Wash	1	81	100 Yr	5349.2	2728	2731.95	3.95	2731.95	2732.62	0.012033	6.57	814.41	612.5	1
Ex. El Paso Wash	1	80	100 Yr	5349.2	2726.32	2729.25	2.93	2729.31	2729.99	0.014218	6.93	772.31	607.86	1.08
Ex. El Paso Wash	1	79	100 Yr	5349.2	2724	2727.08	3.08	2727.08	2727.69	0.012556	6.25	855.51	715.19	1.01
Ex. El Paso Wash	1	78	100 Yr	5349.2	2722	2724.51	2.51	2724.58	2725.19	0.015766	6.62	808.11	735.48	1.11

RIDGECREST SOLAR PLANT HEC-RAS OUTPUT

South El Paso Wash - Pre-development Conditions

100-Year Hydraulics

River	Reach	River Sta	Profile	Q Total	Min Ch El	W.S. Elev	W. Depth	Crit W.S.	E.G. Elev	E.G. Slope	Vel Chnl	Flow Area	Top Width	Froude # Chl
				(cfs)	(ft)	(ft)	(ft)	(ft)	(ft)	(ft/ft)	(ft/s)	(sq ft)	(ft)	
Ex. El Paso Wash	1	77	100 Yr	5372.5	2719.31	2722.24	2.93	2721.88	2722.59	0.005628	4.76	1127.98	776.87	0.7
Ex. El Paso Wash	1	76	100 Yr	5372.5	2716.53	2720.29	3.76	2720.29	2720.94	0.012734	6.48	828.68	662.46	1.02
Ex. El Paso Wash	1	75	100 Yr	5372.5	2714	2717.85	3.85	2717.75	2718.4	0.009751	5.93	906.24	679.08	0.9
Ex. El Paso Wash	1	74	100 Yr	5372.5	2712	2715.56	3.56	2715.56	2716.21	0.012139	6.47	829.95	641.73	1
Ex. El Paso Wash	1	73	100 Yr	5372.5	2709.54	2713.05	3.51	2712.94	2713.6	0.010305	5.95	902.69	699.76	0.92
Ex. El Paso Wash	1	72	100 Yr	5372.5	2707.17	2710.67	3.5	2710.66	2711.41	0.011417	6.9	778.73	522.26	1
Ex. El Paso Wash	1	71	100 Yr	5372.5	2705	2708.69	3.69	2708.59	2709.32	0.009305	6.38	842.39	545.3	0.9
Ex. El Paso Wash	1	70	100 Yr	5372.5	2703.32	2706.5	3.18	2706.5	2707.24	0.011557	6.92	776.35	523.67	1
Ex. El Paso Wash	1	69	100 Yr	5372.5	2701.12	2704.46	3.34	2704.29	2705.02	0.008095	5.99	896.75	575	0.85
Ex. El Paso Wash	1	68	100 Yr	5372.5	2699.17	2702.4	3.23	2702.4	2703.11	0.011379	6.74	796.82	552.48	0.99
Ex. El Paso Wash	1	67	100 Yr	5372.5	2697.04	2700.53	3.49	2700.27	2701.2	0.007307	6.56	819.1	424.56	0.83
Ex. El Paso Wash	1	66	100 Yr	5372.5	2696	2699.63	3.63	2699.14	2700	0.004367	4.86	1104.36	609.17	0.64
Ex. El Paso Wash	1	65	100 Yr	5372.5	2693	2697.86	4.86	2697.86	2698.64	0.011054	7.08	758.35	476.8	0.99
Ex. El Paso Wash	1	64	100 Yr	5372.5	2691	2695.31	4.31	2695.02	2695.9	0.007327	6.21	865.76	488.39	0.82
Ex. El Paso Wash	1	63	100 Yr	5649.2	2690	2693.21	3.21	2693.21	2694.09	0.011058	7.51	751.78	433.6	1.01
Ex. El Paso Wash	1	62	100 Yr	5649.2	2686	2689.03	3.03	2689.51	2690.64	0.029049	10.19	554.65	418.36	1.56
Ex. El Paso Wash	1	61	100 Yr	5649.2	2683	2686.81	3.81	2686.81	2687.51	0.011754	6.71	841.94	602.25	1
Ex. El Paso Wash	1	60	100 Yr	5649.2	2681	2684.35	3.35	2684.39	2685.03	0.013025	6.63	851.57	669.39	1.04
Ex. El Paso Wash	1	59	100 Yr	5649.2	2679	2681.71	2.71	2681.74	2682.48	0.012461	7.02	804.36	561.41	1.03
Ex. El Paso Wash	1	58	100 Yr	5649.2	2676	2679.56	3.56	2679.46	2680.26	0.009592	6.68	845.81	522.92	0.93
Ex. El Paso Wash	1	57	100 Yr	5649.2	2674	2677.41	3.41	2677.41	2678.16	0.011483	6.96	811.44	539.53	1
Ex. El Paso Wash	1	56	100 Yr	5649.2	2672.03	2675.41	3.38	2675.29	2676.1	0.009156	6.64	850.41	512.01	0.91
Ex. El Paso Wash	1	55	100 Yr	5649.2	2670.93	2673.29	2.36	2673.29	2674.02	0.011824	6.88	821.3	568.88	1.01
Ex. El Paso Wash	1	54	100 Yr	5649.2	2668.49	2671.22	2.73	2671.08	2671.85	0.008938	6.38	884.94	555.66	0.89
Ex. El Paso Wash	1	53	100 Yr	5649.2	2666	2669.09	3.09	2669.09	2669.81	0.011741	6.8	830.48	581.61	1
Ex. El Paso Wash	1	52	100 Yr	5649.2	2663	2666.56	3.56	2666.6	2667.38	0.012462	7.3	774.22	510.05	1.04
Ex. El Paso Wash	1	51	100 Yr	5649.2	2661.32	2664.47	3.15	2664.47	2665.13	0.012053	6.52	867.04	660.64	1
Ex. El Paso Wash	1	50	100 Yr	5649.2	2659.53	2662.39	2.86	2662.14	2662.89	0.006975	5.68	994.68	617.76	0.79
Ex. El Paso Wash	1	49	100 Yr	5649.2	2657	2660.33	3.33	2660.33	2661.11	0.011435	7.08	798.09	516.26	1
Ex. El Paso Wash	1	48	100 Yr	5649.2	2655	2658.53	3.53	2658.04	2659.05	0.006757	5.77	978.8	579.66	0.78
Ex. El Paso Wash	1	47	100 Yr	5726.5	2653	2656.71	3.71	2656.63	2657.41	0.009891	6.74	849.25	530.1	0.94
Ex. El Paso Wash	1	46	100 Yr	5726.5	2651	2654.4	3.4	2654.4	2655.27	0.011417	7.49	764.5	453.84	1.02
Ex. El Paso Wash	1	45	100 Yr	5726.5	2649	2652.54	3.54	2652.41	2653.22	0.008709	6.62	865.38	504.88	0.89
Ex. El Paso Wash	1	44	100 Yr	5726.5	2647	2650.41	3.41	2650.41	2651.23	0.011265	7.26	788.33	485.1	1
Ex. El Paso Wash	1	43	100 Yr	5726.5	2645	2648.49	3.49	2648.08	2649.13	0.005846	6.41	893.92	405.38	0.76
Ex. El Paso Wash	1	42	100 Yr	5726.5	2642.49	2646.58	4.09	2646.58	2647.55	0.01056	7.94	721.39	369.62	1
Ex. El Paso Wash	1	41	100 Yr	5726.5	2640.63	2644.6	3.97	2644.5	2645.43	0.009126	7.31	783.62	407.68	0.93
Ex. El Paso Wash	1	40	100 Yr	5726.5	2639	2643.28	4.28	0	2643.95	0.005743	6.59	869.28	373.39	0.76
Ex. El Paso Wash	1	39	100 Yr	5726.5	2638	2641.33	3.33	2641.33	2642.4	0.010494	8.3	689.59	328.7	1.01

RIDGECREST SOLAR PLANT HEC-RAS OUTPUT

South El Paso Wash - Pre-development Conditions

100-Year Hydraulics

River	Reach	River Sta	Profile	Q Total (cfs)	Min Ch El (ft)	W.S. Elev (ft)	W. Depth (ft)	Crit W.S. (ft)	E.G. Elev (ft)	E.G. Slope (ft/ft)	Vel Chnl (ft/s)	Flow Area (sq ft)	Top Width (ft)	Froude # Chl
Ex. El Paso Wash	1	38	100 Yr	5726.5	2635.72	2639.53	3.81	2639.35	2640.39	0.008224	7.47	766.57	356.7	0.9
Ex. El Paso Wash	1	37	100 Yr	5726.5	2634	2637.52	3.52	2637.52	2638.53	0.010447	8.08	708.6	350.92	1
Ex. El Paso Wash	1	36	100 Yr	5726.5	2632	2635.7	3.7	2635.5	2636.46	0.007984	6.98	819.93	413.31	0.87
Ex. El Paso Wash	1	35	100 Yr	5726.5	2630	2633.7	3.7	2633.7	2634.59	0.010872	7.58	755.68	424.64	1
Ex. El Paso Wash	1	34	100 Yr	5726.5	2628	2631.9	3.9	2631.67	2632.58	0.007456	6.64	862.58	445.44	0.84
Ex. El Paso Wash	1	33	100 Yr	5726.5	2626	2630.6	4.6	0	2631.15	0.006495	5.99	955.29	518.56	0.78
Ex. El Paso Wash	1	32	100 Yr	5726.5	2625	2628.55	3.55	2628.55	2629.44	0.011253	7.57	756.53	437.12	1.01
Ex. El Paso Wash	1	31	100 Yr	5726.5	2623	2626.5	3.5	2626.42	2627.28	0.009634	7.09	807.66	458.29	0.94
Ex. El Paso Wash	1	30	100 Yr	5726.5	2621.57	2624.36	2.79	2624.36	2625.21	0.01103	7.4	774.36	456.64	1
Ex. El Paso Wash	1	29	100 Yr	5726.5	2620	2622.41	2.41	2622.28	2623.11	0.008967	6.72	852.63	497.47	0.9
Ex. El Paso Wash	1	28	100 Yr	5726.5	2618	2620.46	2.46	2620.38	2621.25	0.009485	7.14	802.19	445.48	0.94
Ex. El Paso Wash	1	27	100 Yr	5726.5	2616	2618.57	2.57	2618.49	2619.33	0.009715	6.98	821	480.64	0.94
Ex. El Paso Wash	1	26	100 Yr	5726.5	2614	2616.73	2.73	2616.59	2617.48	0.008821	6.92	827.21	455.55	0.91
Ex. El Paso Wash	1	25	100 Yr	5726.5	2612	2615.06	3.06	2614.87	2615.79	0.008032	6.85	836.53	436.63	0.87
Ex. El Paso Wash	1	24	100 Yr	5726.5	2610	2613	3	2613	2613.9	0.01108	7.63	750.7	424.06	1.01
Ex. El Paso Wash	1	23	100 Yr	5726.5	2608.22	2611.14	2.92	2610.96	2611.78	0.00826	6.42	892.01	523.7	0.87
Ex. El Paso Wash	1	22	100 Yr	5726.5	2606	2609.09	3.09	2609.09	2609.83	0.011579	6.92	827.95	559.85	1
Ex. El Paso Wash	1	21	100 Yr	5726.5	2604	2607.43	3.43	2607.07	2607.98	0.006235	5.95	962.67	512.66	0.76
Ex. El Paso Wash	1	20	100 Yr	5726.5	2602	2606.32	4.32	0	2606.85	0.005019	5.89	972.77	447.4	0.7
Ex. El Paso Wash	1	19	100 Yr	5726.5	2600.56	2604.53	3.97	2604.53	2605.39	0.011102	7.42	772.11	455.42	1
Ex. El Paso Wash	1	18	100 Yr	5726.5	2600	2602.81	2.81	2602.51	2603.23	0.006507	5.23	1094.3	729.84	0.75
Ex. El Paso Wash	1	17	100 Yr	5726.5	2598.55	2601.13	2.58	2600.98	2601.71	0.008941	6.12	936.37	627.09	0.88
Ex. El Paso Wash	1	16	100 Yr	5726.5	2595	2599.4	4.4	0	2600.03	0.007852	6.41	894.02	506.1	0.85
Ex. El Paso Wash	1	15	100 Yr	5726.5	2594	2597.87	3.87	0	2598.48	0.007545	6.29	910.96	515.05	0.83
Ex. El Paso Wash	1	14	100 Yr	5726.5	2593	2596.23	3.23	2596.08	2596.87	0.008639	6.4	894.15	544	0.88
Ex. El Paso Wash	1	13	100 Yr	5726.5	2591	2594.36	3.36	2594.25	2595.08	0.009172	6.84	837.3	482.73	0.92
Ex. El Paso Wash	1	12	100 Yr	5726.5	2589	2592.53	3.53	2592.43	2593.23	0.009277	6.74	850.21	506.26	0.92
Ex. El Paso Wash	1	11	100 Yr	5726.5	2587	2590.64	3.64	2590.56	2591.33	0.009692	6.68	857.07	533.6	0.93
Ex. El Paso Wash	1	10	100 Yr	5726.5	2585	2588.96	3.96	0	2589.58	0.00774	6.32	905.57	517.46	0.84
Ex. El Paso Wash	1	9	100 Yr	5726.5	2583	2587.44	4.44	0	2588.03	0.007692	6.2	923.18	540.47	0.84
Ex. El Paso Wash	1	8	100 Yr	5726.5	2581.49	2585.55	4.06	2585.49	2586.25	0.010303	6.72	851.6	550.29	0.95
Ex. El Paso Wash	1	7	100 Yr	5726.5	2579	2583.6	4.6	2583.48	2584.22	0.009797	6.35	902.25	612.05	0.92
Ex. El Paso Wash	1	6	100 Yr	5726.5	2578	2581.65	3.65	2581.57	2582.25	0.009969	6.22	920.56	651.98	0.92
Ex. El Paso Wash	1	5	100 Yr	5726.5	2577	2579.57	2.57	2579.5	2580.21	0.010427	6.43	890.41	620.81	0.95
Ex. El Paso Wash	1	4	100 Yr	5726.5	2574	2577.55	3.55	2577.47	2578.18	0.009941	6.34	902.69	619.71	0.93
Ex. El Paso Wash	1	3	100 Yr	5726.5	2572	2575.23	3.23	2575.23	2575.97	0.012141	6.92	827.73	579.32	1.02
Ex. El Paso Wash	1	2	100 Yr	5726.5	2570	2573.62	3.62	2573.22	2574.05	0.005391	5.28	1085.27	620.5	0.7
Ex. El Paso Wash	1	1	100 Yr	5726.5	2569	2571.6	2.6	2571.6	2572.53	0.010623	8.01	762.06	411.17	1.01

HMS Output for Pre-Development Hydrology Calculations (Rev CN)

10 Year Flow Rates

Pre-Development Hydrology - Western & Eastern Drainage Areas

Hydrologic Element	Drainage Area (mi^2)	Peak Discharge (cfs)	Time of Peak	Volume (ac-ft)
E1a	4.201	506.40	01Jan2009, 12:54	116.10
E1b	0.151	50.90	01Jan2009, 12:06	4.50
E2a	0.824	122.2	01Jan2009, 12:36	22.3
E2b	0.450	96.2	01Jan2009, 12:21	12.7
E2c	20.581	1699.7	01Jan2009, 13:15	504.6
E2d	0.291	87.4	01Jan2009, 12:09	8.6
E2e	0.056	24.7	01Jan2009, 12:03	1.7
E2f	0.046	28.20	01Jan2009, 12:03	2.00
E2g	0.192	68.30	01Jan2009, 12:15	8.00
E2h	0.674	233.70	01Jan2009, 12:18	29.00
East_Outlet	23.114	1842.80	01Jan2009, 13:33	588.90
Ex_Outlet1	4.352	516.00	01Jan2009, 13:15	120.60
Ex_Outlet2	27.466	2324.60	01Jan2009, 13:33	709.50
J1	20.872	1710.00	01Jan2009, 13:21	513.20
J2	22.440	1809.80	01Jan2009, 13:21	559.90
R1	4.201	504.60	01Jan2009, 13:15	116.10
R2	0.151	49.90	01Jan2009, 12:33	4.50
R3	20.581	1698.2	01Jan2009, 13:21	504.6
R4	0.824	121.9	01Jan2009, 12:39	22.3
R5	0.450	95.9	01Jan2009, 12:24	12.7
R6	20.872	1709.4	01Jan2009, 13:24	513.2
R7	22.440	1806.5	01Jan2009, 13:33	559.9
R8	23.114	1840.9	01Jan2009, 13:36	588.9
R9	4.352	515.2	01Jan2009, 13:21	120.6
West_Outlet	4.201	506.4	01Jan2009, 12:54	116.1

HMS Output for Pre-Development Hydrology Calculations (Rev CN)

25 Year Flow Rates

Pre-Development Hydrology - Western & Eastern Drainage Areas

Hydrologic Element	Drainage Area (mi^2)	Peak Discharge (cfs)	Time of Peak	Volume (ac-ft)
E1a	4.201	828.60	01Jan2009, 12:51	177.60
E1b	0.151	81.10	01Jan2009, 12:06	6.80
E2a	0.824	201.4	01Jan2009, 12:36	34.3
E2b	0.450	156.8	01Jan2009, 12:18	19.3
E2c	20.581	2868.1	01Jan2009, 13:15	788.4
E2d	0.291	139.7	01Jan2009, 12:09	13
E2e	0.056	38.8	01Jan2009, 12:00	2.5
E2f	0.046	39.20	01Jan2009, 12:03	2.70
E2g	0.192	96.10	01Jan2009, 12:15	11.10
E2h	0.674	326.10	01Jan2009, 12:18	40.10
East_Outlet	23.114	3088.80	01Jan2009, 13:27	911.60
Ex_Outlet1	4.352	842.30	01Jan2009, 13:12	184.40
Ex_Outlet2	27.466	3875.20	01Jan2009, 13:27	1096.00
J1	20.872	2883.60	01Jan2009, 13:15	801.50
J2	22.440	3041.00	01Jan2009, 13:18	871.40
R1	4.201	825.80	01Jan2009, 13:12	177.70
R2	0.151	79.40	01Jan2009, 12:30	6.80
R3	20.581	2865.7	01Jan2009, 13:18	788.4
R4	0.824	201.2	01Jan2009, 12:39	34.3
R5	0.450	156.1	01Jan2009, 12:24	19.3
R6	20.872	2881.9	01Jan2009, 13:21	801.5
R7	22.440	3035	01Jan2009, 13:27	871.4
R8	23.114	3084.7	01Jan2009, 13:30	911.6
R9	4.352	841.6	01Jan2009, 13:15	184.4
West_Outlet	4.201	828.6	01Jan2009, 12:51	177.6

HMS Output for Pre-Development Hydrology Calculations (Rev CN)

100 Year Flow Rates

Pre-Development Hydrology - Western & Eastern Drainage Areas

Hydrologic Element	Drainage Area (mi^2)	Peak Discharge (cfs)	Time of Peak	Volume (ac-ft)
E1a	4.201	1491.70	01Jan2009, 12:51	303.40
E1b	0.151	141.60	01Jan2009, 12:06	11.40
E2a	0.824	365.7	01Jan2009, 12:33	58.8
E2b	0.450	279.9	01Jan2009, 12:18	32.9
E2c	20.581	5349.2	01Jan2009, 13:12	1377.2
E2d	0.291	244.7	01Jan2009, 12:09	22
E2e	0.056	67.3	01Jan2009, 12:00	4.2
E2f	0.046	60.60	01Jan2009, 12:03	4.20
E2g	0.192	151.10	01Jan2009, 12:15	17.20
E2h	0.674	508.30	01Jan2009, 12:18	62.00
East_Outlet	23.114	5726.50	01Jan2009, 13:21	1578.50
Ex_Outlet1	4.352	1516.50	01Jan2009, 13:06	314.90
Ex_Outlet2	27.466	7147.40	01Jan2009, 13:21	1893.40
J1	20.872	5372.50	01Jan2009, 13:12	1399.20
J2	22.440	5649.20	01Jan2009, 13:15	1516.60
R1	4.201	1487.90	01Jan2009, 13:06	303.40
R2	0.151	137.90	01Jan2009, 12:27	11.40
R3	20.581	5343.4	01Jan2009, 13:15	1377.2
R4	0.824	364.9	01Jan2009, 12:36	58.8
R5	0.450	278.2	01Jan2009, 12:21	32.9
R6	20.872	5368.7	01Jan2009, 13:15	1399.2
R7	22.440	5636.7	01Jan2009, 13:21	1516.5
R8	23.114	5719.4	01Jan2009, 13:24	1578.5
R9	4.352	1512.9	01Jan2009, 13:09	314.9
West_Outlet	4.201	1491.7	01Jan2009, 12:51	303.4

HMS Input Parameters for Post-Development Hydrology Calculations (Revised CN)

Post-Development Hydrology - Western Drainage Area

Sub-Basin	Area (mi^2)	Length (mi)	L_{CA} (mi)	Elev. Difference (D)	Slope (ft/mi)	n	CN	S=(1000/CN)-10	T_{lag} (hours) = $24n(LL_{CA}/S^{05})^{0.38}$	T_{lag} (mins) = $24n(LL_{CA}/S^{05})^{0.38}$	IA
O1a	0.392	1.62	0.73	131.00	80.76	0.03	77.72	2.87	0.33	20.03	0.57
O1b	2.737	4.28	2.29	1503.50	351.29	0.04	79.28	2.61	0.75	45.01	0.52
O1c	1.354	3.23	1.62	1402.00	434.32	0.04	78.47	2.74	0.57	34.03	0.55
O1d	0.059	0.36	0.14	62.00	173.67	0.03	80.00	2.50	0.09	5.24	0.50

Post-Development Hydrology - Eastern Drainage Area

Sub-Basin	Area (mi^2)	Length (mi)	L_{CA} (mi)	Elev. Difference (D)	Slope (ft/mi)	n	CN	S=(1000/CN)-10	T_{lag} (hours) = $24n(LL_{CA}/S^{05})^{0.38}$	T_{lag} (mins) = $24n(LL_{CA}/S^{05})^{0.38}$	IA
O2a	20.528	7.47	3.37	1560.00	208.89	0.04	77.42	2.92	1.19	71.12	0.58
O2b	0.130	1.60	0.79	101.00	63.05	0.03	77.42	2.92	0.36	21.47	0.58
O2c	0.284	1.48	0.50	150.00	101.35	0.03	79.95	2.51	0.27	16.03	0.50
O2d	0.014	0.45	0.18	26.00	58.30	0.03	80.00	2.50	0.13	7.59	0.50
O2e	0.006	0.23	0.12	22.00	94.02	0.03	80.00	2.50	0.08	4.64	0.50
O2f	0.216	1.45	0.84	126.00	87.20	0.03	80.00	2.50	0.33	19.91	0.50
O2g	0.018	0.16	0.06	23.00	140.24	0.03	80.00	2.50	0.05	2.90	0.50
O2h	0.046	0.44	0.27	32.00	72.73	0.03	80.00	2.50	0.14	8.52	0.50
2iSF1	0.029	0.36	0.18	4.79	13.49	0.03	80.00	2.50	0.16	9.32	0.50
2iSF2	0.040	0.40	0.21	5.92	14.84	0.03	80.00	2.50	0.17	10.07	0.50
2iSF3	0.040	0.40	0.21	5.88	14.74	0.03	80.00	2.50	0.17	10.08	0.50
2iSF4	0.030	0.36	0.18	4.79	13.34	0.03	80.00	2.50	0.15	9.27	0.50
2iSF5	0.041	0.40	0.20	6.38	15.95	0.03	80.00	2.50	0.16	9.81	0.50
2iSF6	0.041	0.40	0.20	6.70	16.75	0.03	80.00	2.50	0.16	9.72	0.50
2jSF1	0.038	0.38	0.19	4.44	11.59	0.03	80.00	2.50	0.17	10.10	0.50
2jSF2	0.035	0.37	0.22	4.34	11.64	0.03	80.00	2.50	0.17	10.41	0.50
2jSF3	0.042	0.40	0.22	4.87	12.17	0.03	80.00	2.50	0.18	10.61	0.50
2jSF4	0.053	0.43	0.26	4.74	10.95	0.03	80.00	2.50	0.20	11.89	0.50
2jSF5	0.042	0.40	0.21	4.70	11.66	0.03	80.00	2.50	0.18	10.56	0.50
2k	0.020	1.03	0.56	46.50	45.32	0.03	80.00	2.50	0.28	16.91	0.50
2lSF1	0.050	0.44	0.29	6.00	13.67	0.03	80.00	2.50	0.20	11.95	0.50
2lSF2	0.039	0.40	0.21	4.93	12.48	0.03	80.00	2.50	0.17	10.29	0.50
2lSF3	0.051	0.44	0.20	6.62	15.08	0.03	80.00	2.50	0.17	10.27	0.50
2lSF4	0.041	0.40	0.20	6.08	15.21	0.03	80.00	2.50	0.17	9.90	0.50
2lSF5	0.038	0.37	0.17	5.52	14.92	0.03	80.00	2.50	0.15	9.10	0.50
2mSF1	0.052	0.44	0.22	5.39	12.33	0.03	80.00	2.50	0.18	10.93	0.50
2mSF2	0.062	0.44	0.26	5.40	12.30	0.03	80.00	2.50	0.20	11.74	0.50
2mSF3	0.052	0.44	0.21	5.68	12.94	0.03	80.00	2.50	0.18	10.68	0.50
2mSF4	0.061	0.44	0.25	6.18	14.01	0.03	80.00	2.50	0.19	11.25	0.50
O2n	0.046	0.35	0.14	6.00	17.00	0.03	80.00	2.50	0.14	8.13	0.50
O2o	0.056	0.37	0.22	32.00	86.49	0.03	80.00	2.50	0.12	7.14	0.50
O2p	0.151	0.68	0.30	69.00	101.47	0.03	80.00	2.50	0.16	9.82	0.50
2qNF1	0.033	0.37	0.21	5.86	15.67	0.03	80.00	2.50	0.16	9.72	0.50
2qNF2	0.030	0.34	0.14	3.58	10.69	0.03	80.00	2.50	0.14	8.66	0.50
2qNF3	0.050	0.44	0.20	5.17	11.86	0.03	80.00	2.50	0.18	10.73	0.50
2qNF4	0.030	0.33	0.17	2.50	7.58	0.03	80.00	2.50	0.16	9.77	0.50
O2r	0.056	0.39	0.15	36.00	93.51	0.03	80.00	2.50	0.10	6.22	0.50
2sNF1	0.052	0.44	0.22	4.66	10.71	0.03	80.00	2.50	0.19	11.21	0.50
2sNF2	0.047	0.41	0.23	3.40	8.25	0.03	80.00	2.50	0.20	11.74	0.50
2sNF3	0.050	0.44	0.20	4.78	10.96	0.03	80.00	2.50	0.18	10.89	0.50
2sNF4	0.060	0.47	0.27	4.18	8.99	0.03	80.00	2.50	0.21	12.88	0.50
O2t	0.273	1.03	0.41	78.00	75.58	0.03	80.00	2.50	0.23	13.67	0.50

Sub-Basin	Area (mi^2)	Length (mi)	L_{CA} (mi)	Elev. Difference (D)	Slope (ft/mi)	n	CN	S=(1000/CN)-10	T_{lag} (hours) = $24n(LL_{CA}/S^{05})^{0.38}$	T_{lag} (mins) = $24n(LL_{CA}/S^{05})^{0.38}$	IA
2uNF1	0.052	0.44	0.22	4.36	10.02	0.03	80.00	2.50	0.19	11.35	0.50
2uNF2	0.047	0.41	0.23	4.16	10.10	0.03	80.00	2.50	0.19	11.30	0.50
2uNF3	0.042	0.40	0.21	2.96	7.38	0.03	80.00	2.50	0.19	11.43	0.50
2uNF4	0.044	0.41	0.21	3.02	7.40	0.03	80.00	2.50	0.19	11.50	0.50
2uNF5	0.055	0.44	0.24	3.21	7.31	0.03	80.00	2.50	0.21	12.65	0.50
O2v	0.087	0.49	0.18	43.50	89.32	0.03	80.00	2.50	0.12	7.33	0.50

HMS Input Parameters for Post-Development Hydrology Calculations (Revised CN)

Post-Development Hydrology - North-Eastern Drainage Area

Sub-Basin	Area (mi^2)	Length (mi)	L_{CA} (mi)	Elev. Difference (D)	Slope (ft/mi)	n	CN	S=(1000/CN)-10	T_{lag} (hours) = $24n(LL_{CA}/S^{05})^{0.38}$	T_{lag} (mins) = $24n(LL_{CA}/S^{05})^{0.38}$	IA
O3a	9.206	6.36	3.05	1505.00	236.64	0.04	80.97	2.35	1.05	62.91	0.47
O3b	0.237	1.07	0.54	143.00	133.40	0.03	78.05	2.81	0.23	13.83	0.56
O3c	0.108	0.72	0.40	141.13	197.11	0.03	80.00	2.50	0.16	9.82	0.50
O3d	0.273	1.52	0.74	176.46	116.02	0.03	78.46	2.75	0.31	18.32	0.55
O3e	0.017	0.28	0.16	33.00	116.61	0.03	80.00	2.50	0.09	5.42	0.50
O3f	0.020	0.38	0.19	55.00	145.50	0.03	80.00	2.50	0.10	6.14	0.50
O3g	0.022	0.33	0.18	39.00	116.77	0.03	80.00	2.50	0.10	5.94	0.50
O3h	0.016	0.36	0.17	51.00	140.50	0.03	80.00	2.50	0.10	5.81	0.50
O3i	0.023	0.34	0.17	28.00	83.58	0.03	78.76	2.70	0.11	6.31	0.54
O3j	0.018	0.32	0.17	34.00	105.59	0.03	77.56	2.89	0.10	5.87	0.58
O3k	0.007	0.17	0.07	11.60	69.88	0.03	78.57	2.73	0.06	3.51	0.55
3INF1	0.042	0.41	0.23	14.23	35.05	0.03	80.00	2.50	0.15	8.99	0.50
3INF2	0.040	0.40	0.23	12.83	32.07	0.03	80.00	2.50	0.15	9.03	0.50
3INF3	0.029	0.36	0.18	11.75	33.01	0.03	80.00	2.50	0.13	7.87	0.50
3INF4	0.043	0.41	0.23	15.57	37.98	0.03	80.00	2.50	0.15	8.80	0.50
3INF5	0.041	0.40	0.23	11.65	29.12	0.03	80.00	2.50	0.15	9.16	0.50
3INF6	0.048	0.43	0.26	13.28	30.96	0.03	80.00	2.50	0.16	9.74	0.50
3mNF1	0.045	0.41	0.24	15.51	37.83	0.03	80.00	2.50	0.15	8.99	0.50
3mNF2	0.042	0.40	0.24	13.99	35.06	0.03	80.00	2.50	0.15	9.03	0.50
3mNF3	0.050	0.43	0.27	14.00	32.71	0.03	80.00	2.50	0.16	9.81	0.50
3mNF4	0.044	0.41	0.23	18.22	44.77	0.03	80.00	2.50	0.14	8.53	0.50
3mNF5	0.048	0.43	0.26	10.78	25.13	0.03	80.00	2.50	0.17	10.13	0.50
3nNF1	0.046	0.41	0.22	4.21	10.32	0.03	80.00	2.50	0.18	11.09	0.50
3nNF2	0.050	0.43	0.25	3.35	7.83	0.03	80.00	2.50	0.21	12.40	0.50
3nNF3	0.038	0.38	0.20	3.32	8.71	0.03	79.76	2.54	0.18	10.81	0.51
O3o	0.016	0.19	0.07	18.00	95.74	0.03	80.00	2.50	0.06	3.44	0.50
O3p	0.057	0.38	0.172	30.00	79.16	0.03	79.61	2.56	0.11	6.67	0.51

HMS Input Parameters for Pre-Development Hydrology Calculations (Revised CN)

Pre-Development Hydrology - Western Drainage Area

Sub-Basin	Area (mi^2)	Length (mi)	L_{CA} (mi)	Elev. Difference (D)	Slope (ft/mi)	n	Composite CN	S=(1000/CN)-10	T_{lag} (hours) = $24n(LL_{CA}/S^{05})^{0.38}$	T_{lag} (mins) = $24n(LL_{CA}/S^{05})^{0.38}$	IA
E1a	4.201	5.03	2.82	1546.00	307.42	0.04	79.03	2.65	0.89	53.12	0.53
E1b	0.151	0.86	0.41	55.00	64.33	0.03	80.00	2.50	0.22	13.14	0.50

Pre-Development - Eastern Drainage Area

Sub-Basin	Area (mi^2)	Length (mi)	L_{CA} (mi)	Elev. Difference (D)	Slope (ft/mi)	n	Composite CN	S=(1000/CN)-10	T_{lag} (hours) = $24n(LL_{CA}/S^{05})^{0.38}$	T_{lag} (mins) = $24n(LL_{CA}/S^{05})^{0.38}$	IA
E2a	0.824	3.34	1.76	215.00	64.37	0.03	78.82	2.69	0.64	38.38	0.54
E2b	0.450	2.28	0.84	165.00	72.37	0.03	79.26	2.62	0.41	24.51	0.52
E2c	20.581	7.47	3.42	1560.00	208.84	0.04	77.43	2.92	1.19	71.52	0.58
E2d	0.291	1.48	0.50	150.00	101.35	0.03	79.95	2.51	0.27	16.02	0.50
E2e	0.056	0.37	0.22	32.00	86.49	0.03	80.00	2.50	0.12	7.14	0.50
E2f	0.046	0.44	0.27	32.00	72.73	0.03	80.00	2.50	0.14	8.52	0.50
E2g	0.192	2.05	0.88	187.00	91.22	0.03	79.64	2.56	0.38	22.93	0.51
E2h	0.674	2.16	0.97	155.00	71.79	0.03	80.00	2.50	0.42	25.38	0.50

HMS Input Parameters for Pre-Development Hydrology Calculations (Revised CN)

Pre-Development - North-Eastern Drainage Area

Sub-Basin	Area (mi^2)	Length (mi)	L_{CA} (mi)	Elev. Difference (D)	Slope (ft/mi)	n	Composite CN	S=(1000/CN)-10	T_{lag} (hours) = $24n(LL_{CA}/S^{05})^{0.38}$	T_{lag} (mins) = $24n(LL_{CA}/S^{05})^{0.38}$	IA
E3a	9.206	6.36	3.05	1505.00	236.64	0.04	80.97	2.35	1.05	62.91	0.47
E3b	0.720	3.44	1.72	279.00	81.15	0.03	79.45	2.59	0.61	36.77	0.52
E3c	0.652	2.04	1.11	230.00	112.52	0.03	79.93	2.51	0.40	24.04	0.50
E3d	0.359	2.55	1.51	270.00	105.76	0.03	78.69	2.71	0.50	29.72	0.54
E3e	0.143	0.85	0.36	54.00	63.60	0.03	80.00	2.50	0.21	12.50	0.50
E3f	0.057	0.38	0.17	30.00	79.16	0.03	79.61	2.56	0.11	6.64	0.51