

J.F. Shea Construction, Inc.

General Contractors
License No. 769989

July 03, 2024

Mission Springs Water District
66575 Second Street
Desert Hot Springs, CA 92240

Attention: Lucas Rathe – Resident Engineer
Reginal Water Reclamation Facility
Project No. 17-002-S

Subject: Potential Change Order No. 082 – Adverse Weather Direct Operations Inefficiencies

Dear Mr. Rathe,

J.F. Shea Construction, Inc. (JFS) has been in discussion with Mission Springs Water District (MSWD) regarding the issues that have impacted our ability to complete the project per the original schedule. There are several significant unforeseen events that have contributed to the overall project delays. This summary is intended to provide facts related to the issues and a guideline to acknowledging merit for these impacts.

In accordance with the bidding documents and contract (Reference Pre-bid Q&A #130, 224, 269), a 15-working day (WD) allowance was designated for adverse weather. The contractual project duration of 600 calendar days through Substantial Completion equates to 412 working days. Based on the 15 WD allowance, 3.6% of the contractual working days would have been expected to be impacted by adverse weather.

This project has experienced an unprecedented and unforeseen amount of adverse weather days. Please reference Exhibit 1 – 17002S-MSWD-RWRF Adverse Weather Days Summary. A total of 77 WD have been affected by adverse weather, 62 WD of which can be claimed as unforeseen. The 62 WD are equivalent to a 15.1% unplanned weather impacts to available working days to construct the project, thereby delaying project completion by an indetermined amount.

JFS has evaluated the effects of adverse weather impacts to operational direct cost and has determined that these events have caused significant direct cost losses due to the inability to perform work safely and at a cost-effective production rate. In most cases, high winds caused grounding of cranes based on manufacturer safety guidelines. Additionally, general project safety risks such as eye injuries and materials storage became increasingly difficult to control during these events.

JFS has compiled actual direct cost data for the project and used an inefficiency factor to develop a value for the operational impacts. Please reference Exhibit 2 – 17002S-MSWD-RWRF Adverse Weather Impacts – Direct Operations Inefficiencies. Note, this cost information is confidential and must not be shared outside of your organization without explicit approval from JFS.

In accordance with General Conditions Section 2.13, J.F. Shea Construction, Inc. is hereby providing a Lump Sum Cost Proposal in the amount of \$428,086.00 for the Adverse Weather Direct Operations Inefficiencies. Please reference Exhibit 3 – 17002S-MSWD-RWRF Adverse Weather Impacts Cost Summary.

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Per General Conditions Section 2.13, J.F. Shea Construction, Inc. is requesting issuance of a Change Order in order to formalize this change request. Please contact me at (909) 824-4293 if you have any questions or require any additional information.

Sincerely,



Rafael Torres
Project Manager
J.F. Shea Construction, Inc.

Attachments:

1. Exhibit 1 – 17002S-MSWD-RWRF Adverse Weather Days Summary
2. Exhibit 2 – 17002S-MSWD-RWRF Adverse Weather Impacts – Direct Operations Inefficiencies
3. Exhibit 3 – 17002S-MSWD-RWRF Adverse Weather Impacts Cost Summary

EXHIBIT 1

17002S-MSWD-RWRF

17002S-MSWD-RWRF Adverse Weather Days Summary

Date of Occurance	Non-Work Days This Notice	Cummulative Allowable Non-Work Days	Type	Cummulative Actual Non-Work Days
4/14/2022	1	0	Wind	1
10/7/2022	1	0	PM-10	2
11/28/2022	1	0	Wind	3
12/1/2022	1	0	Wind	4
1/5/2023	1	0	Rain	5
1/16/2023	1	0	Rain	6
1/17/2023	1	0	Wind	7
1/23/2023	1	0	Wind	8
2/14/2023	1	0	Wind	9
2/28/2023	1	0	Wind	10
3/1/2023	1	0	Wind	11
3/8/2023	1	0	Wind	12
3/13/2023	1	0	Wind	13
3/15/2023	1	0	Rain	14
3/21/2023	1	0	Rain	15
3/23/2023	1	1	Rain	16
4/3/2023	1	2	Wind	17
4/12/2023	1	3	Wind	18
4/13/2023	1	4	Wind	19
4/14/2023	1	5	Wind	20
4/17/2023	1	6	Wind	21
4/18/2023	1	7	Wind	22
4/19/2023	1	8	Wind	23
4/24/2023	1	9	Wind	24
5/1/2023	1	10	Wind	25
5/2/2023	1	11	Wind	26
5/3/2023	1	12	Wind	27
5/4/2023	1	13	Wind	28
5/5/2023	1	14	Wind	29
5/8/2023	1	15	Wind	30
5/9/2023	1	16	Wind	31
5/10/2023	1	17	Wind	32
5/11/2023	1	18	Wind	33
5/30/2023	1	19	Wind	34
5/31/2023	1	20	Wind	35
6/1/2023	1	21	Wind	36
6/5/2023	1	22	Wind	37
6/6/2023	1	23	Wind	38
6/7/2023	1	24	Wind	39
6/8/2023	1	25	Wind	40
6/9/2023	1	26	Wind	41
6/12/2023	1	27	Wind	42

11
rain/PM
10
days

29 Wind
days
from
4/4/24 to
5/31/24

6/13/2023	1	28	Wind	43
6/14/2023	1	29	Wind	44
6/15/2023	1	30	Wind	45
6/16/2023	1	31	Wind	46
6/19/2023	1	32	Wind	47
6/20/2023	1	33	Wind	48
6/21/2023	1	34	Wind	49
6/22/2023	1	35	Wind	50
6/26/2023	1	36	Wind	51
6/27/2023	1	37	Wind	52
6/28/2023	1	38	Wind	53
7/3/2023	1	39	Wind	54
7/5/2023	1	40	Wind	55
7/6/2023	1	41	Wind	56
7/7/2023	1	42	Wind	57
7/10/2023	1	43	Wind	58
7/11/2023	1	44	Wind	59
7/12/2023	1	45	Wind	60
7/13/2023	1	46	Wind	61
7/14/2023	1	47	Wind	62
7/31/2023	1	48	PM-10	63
8/9/2023	1	49	Wind	64
8/10/2023	1	50	Wind	65
8/11/2023	1	51	Wind	66
8/21/2023	1	52	Rain	67
8/22/2023	1	53	Rain	68
9/20/2023	1	54	Wind	69
9/21/2023	1	55	Wind	70
10/10/2023	1	56	Wind	71
10/11/2023	1	57	Wind	72
10/23/2023	1	58	Wind	73
10/26/2023	1	59	Wind	74
11/7/2023	1	60	Wind	75
2/5/2024	1	61	Rain	76
2/6/2024	1	62	Rain	77

EXHIBIT 2

17002S-MSWD-RWRF

Adverse Weather Impacts – Direct Operations Inefficiencies

Actual Cost Data:

Total Project Labor Cost	\$8,945,563
<u>Indirect Labor Cost</u>	<u>(\$2,122,934)</u>
Direct Labor Cost	\$6,822,629

Total Project Equipment Cost	\$2,830,636
<u>Indirect Equipment Cost</u>	<u>(\$306,458)</u>
Direct Equipment Cost	\$2,524,178

Total Direct Labor & Equipment Cost **\$9,346,807**

(Cost data based on actual cost as detailed in Water Division Job Cost Report – February Monthly thru 03/03/24)

Adverse Weather Impact Analysis:

Project Duration	412 WD
<u>Adverse Weather Allowance</u>	<u>15 WD</u>
Expected Adverse Weather Impacts	3.6% [15 WD/ 412WD]

Project Duration	412 WD
<u>Unplanned Adverse Weather</u>	25 – 62 WD [77 WD – 15 WD]
Unplanned Adverse Weather Impacts	15.1% [62 WD/ 412WD] 6.07%

Adverse Weather Inefficiency Factor	~25.0%	12.5%
<u>Unplanned Adverse Weather Impacts</u>	<u>15.1%</u>	
Unplanned Impacts to Direct Cost Factor	3.775% [~25.0% x 15.1%]	1.52% 0.759%

(Contractual completion time is 600 calendar days which is equivalent to 412 working days)

Adverse Weather Cost Impact Summary:

Total Direct Labor & Equipment Cost	\$9,346,807		
	X		
Unplanned Impacts to Direct Cost Factor	3.775%	1.52%	0.759%
Unplanned Impacts to Direct Cost	<u>\$352,842</u>	\$142,071	\$70,918

JF Shea Construction, Inc.												
Water Division Job Cost Report												
GL Posting Dates: 02/10/24- Through -03/08/24												
For costs incurred: February Monthly thru 03/03/24												
Cost Code	Cost Code Description	Uom	Type	Estimate Dollars	Estimate Units	Estimate Unit Cost	Job to Date % Compl.	Job to Date Units	Job to Date Dollars	Job to Date Bdgt Earned	Job to Date Unit Cost	Job to Date Gain / Loss
13658	Mission Springs RWRF											
Job Code												
L	Labor								8,945,563			
T	Supplies											
I	Equipment Renl - Internal								2,163,442			
O	Equipment Rent - External								667,194			
M	Permanet Materials											
S	Subcontracts											

EXHIBIT 3

17002S-MSWD-RWRF

JF Shea Construction
Regional Water Reclamation Facility
MSWD Project No. 17-002-S

PCO/ CO: PCO-082

DESCRIPTION: Adverse Weather Direct Operations Inefficiencies

DATE

Issued: 04/30/24
Priced: 07/01/24

Item	Description	UM	Qty	MH/unit	Total MH	Rate	Total Labor Cost	Material Taxable	Other Non-Tax	Equipment	Sub	Total Cost
1	JFS Direct Cost Inefficiencies	LS	1			\$ 352,842.00	\$ -	\$ -	\$ 352,842.00	\$ -	\$ -	\$ 352,842.00
2						\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
3						\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
4						\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
5						\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
6						\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
7						\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
8						\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
9						\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
10						\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
11						\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
12						\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
13						\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
14						\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
15						\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
16						\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
17						\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
18						\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
19						\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
20						\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
SUBTOTAL					0		\$ -	\$ -	\$ 352,842.00	\$ -	\$ -	\$ 352,842.00
Sales Tax 7.75%								\$ -				\$ -
SUBTOTAL							\$ -	\$ -	\$ 352,842.00	\$ -	\$ -	\$ 352,842.00
MARKUP (Profit Only)												
Labor 10%							\$ -					\$ -
Materials 10%								\$ -	\$ 52,926.30			\$ 52,926.30
Equipment 10%										\$ -		\$ -
Subcontractor 5%											\$ -	\$ -
SUBTOTAL							\$ -	\$ -	\$ 52,926.30	\$ -	\$ -	\$ 405,768.30
G&A COST (5.5%)												\$ 22,317.26
Total Cost												\$ 428,086.00

Notes:

1. Reference Exhibit 2 for cost details.
- 2.
- 3.