



Crop Water Use Report for the week of June 10, 2024

Over the past week, corn used 0.14 inches.
Expected use by corn for this week is 0.16 inches.

In the past week, beets used 0.14 inches.
Expected use by beets for this week is 0.16 inches.

Over the past week, potatoes used 0.14 inches.
Expected use by potatoes for this week is 0.16 inches.

Over the past week, dry beans used 0.08 inches.
Expected use by dry beans for this week is 0.1 inches.

Over the past week, soybeans used 0.14 inches.
Expected use by soybeans for this week is 0.16 inches.

Over the past week, sunflowers used .14 inches.
Expected use by sunflowers for this week is .16 inches.

Over the past week, alfalfa used 1.54 inches.
Expected use by alfalfa for this week is 1.55 inches.

In past week, actively growing lawns used 1.3 inches.
Expected use by actively growing lawns for this week is 1.4 inches.

In the past week average ET gage readings were 1.4 inches.

The average rainfall for the district was 0.19 inches.

The weather forecast for the next week shows highs being in the 70's and 80's with lows in the 50's. There is a chance of rain later this week.

The crop water use report is completed using the average growth stage for each crop and ET gage reading from across the district. To find the conversion for your specific crop growth stage visit <https://nawmn.unl.edu/GrowthStageData>

For more information or to inquire about ET gages or soil moisture monitoring equipment, please contact Robbin Randall at the Upper Niobrara White Natural Resources District at 308.432.6190 or visit our website at www.unwnrd.org. We are committed to helping Nebraskans conserve and protect groundwater.

CORN

ET		V2	V4	V6
Subarea I	Used	0.1	0.18	0.35
	Projected	0.12	0.2	0.37
Subarea II&VI	Used	0.14	0.25	0.49
	Projected	0.16	0.27	0.51
Subarea III	Used	0.14	0.25	0.49
	Projected	0.16	0.17	0.51
Subarea IV	Used	0.18	0.32	0.63
	Projected	0.2	0.34	0.65
Subarea V	Used	0.15	0.27	0.53
	Projected	0.17	0.29	0.55

WHEAT

ET		Jointing	Boot	Heading
Subarea I	Used	1.03	1.1	1.1
	Projected	1.05	1.04	1.12
Subarea II&VI	Used	1.44	1.54	1.54
	Projected	1.46	1.56	1.56
Subarea III	Used	1.44	1.54	1.54
	Projected	1.46	1.54	1.54
Subarea IV	Used	1.85	1.98	1.98
	Projected	1.86	1.99	1.99
Subarea V	Used	1.55	1.65	1.65
	Projected	1.56	1.66	1.66

SUNFLOWERS

ET		Early Vegetation	Vegetation	
Subarea I	Used	0.1	0.1	
	Projected	0.11	0.11	
Subarea II&VI	Used	0.14	0.14	
	Projected	0.16	0.16	
Subarea III	Used	0.14	0.14	

Subarea IV	Projected	0.16	0.16	
	Used	0.18	0.18	
Subarea V	Projected	0.2	0.2	
	Used	0.15	0.15	
	Projected	0.16	0.16	

SUGAR BEETS

ET		Emergence	10-30% Cover	
Subarea I	Used	0.1	0.14	
	Projected	0.12	0.16	
Subarea II&VI	Used	0.14	0.2	
	Projected	0.16	0.22	
Subarea III	Used	0.14	0.2	
	Projected	0.16	0.22	
Subarea IV	Used	0.18	0.25	
	Projected	0.2	0.26	
Subarea V	Used	0.15	0.21	
	Projected	0.16	0.23	

POTATOES

ET		Emergence	Early Vegetative	
Subarea I	Used	0.1	0.13	
	Projected	0.12	0.15	
Subarea II&VI	Used	0.14	0.18	
	Projected	0.16	2	
Subarea III	Used	0.14	0.18	
	Projected	0.16	0.2	
Subarea IV	Used	0.18	0.23	
	Projected	0.2	0.25	
Subarea V	Used	0.15	0.2	
	Projected	0.17	0.22	

DRY BEANS

ET		Emergence	Cover 10-50%	
Subarea I	Used	0.06	0.06	
	Projected	0.08	0.08	
Subarea II&VI	Used	0.08	0.08	
	Projected	0.1	0.1	

Subarea III	Used	0.08	0.08	
	Projected	0.1	0.1	
Subarea IV	Used	0.11	0.11	
	Projected	0.13	0.13	
Subarea V	Used	0.09	0.09	
	Projected	0.11	0.11	

ALFALFA

ET

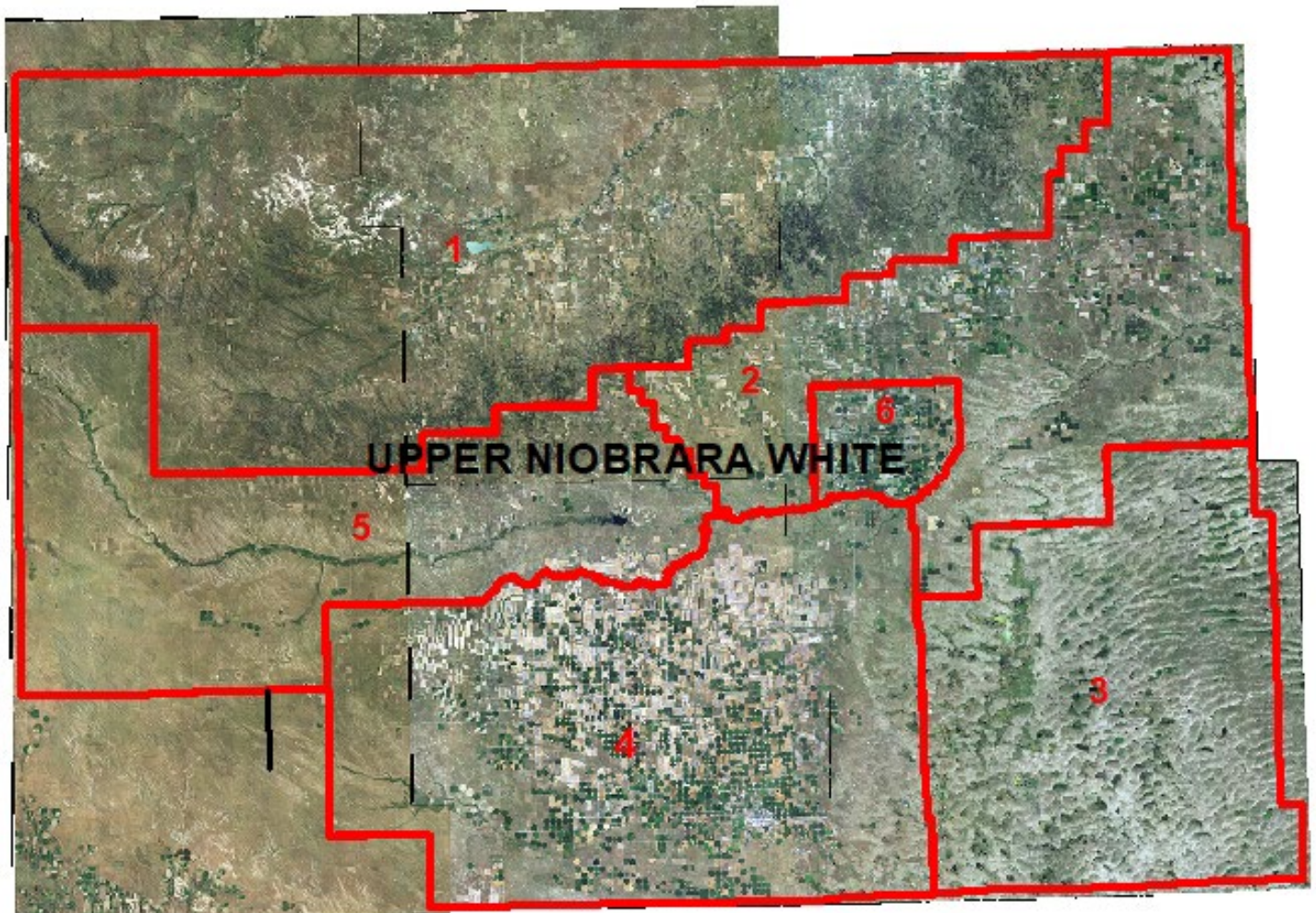
Subarea I	Used	1.1		
	Projected	1.12		
Subarea II&VI	Used	1.54		
	Projected	1.56		
Subarea III	Used	1.54		
	Projected	1.56		
Subarea IV	Used	1.98		
	Projected	2		
Subarea V	Used	1.65		
	Projected	1.67		

GRASS

ET

Subarea I	Used	1.3		
	Projected	1.5		
Subarea II&VI	Used	1.3		
	Projected	1.5		
Subarea III	Used	1.3		
	Projected	1.5		
Subarea IV	Used	1.3		
	Projected	1.5		
Subarea V	Used	1.3		
	Projected	1.5		

UNWNRD Subarea Map





Crop Water Use Report for the week of June 17, 2024

Over the past week, corn used 0.17 inches.
Expected use by corn for this week is 0.15 inches.

In the past week, beets used 0.17 inches.
Expected use by beets for this week is 0.15 inches.

Over the past week, potatoes used 0.17 inches.
Expected use by potatoes for this week is 0.15 inches.

Over the past week, dry beans used 0.1 inches.
Expected use by dry beans for this week is 0.08 inches.

Over the past week, soybeans used 0.17 inches.
Expected use by soybeans for this week is 0.15 inches.

Over the past week, sunflowers used .17 inches.
Expected use by sunflowers for this week is .15 inches.

Over the past week, alfalfa used 1.87 inches.
Expected use by alfalfa for this week is 1.54 inches.

In past week, actively growing lawns used 1.55 inches.
Expected use by actively growing lawns for this week is 1.2 inches.

In the past week average ET gage readings were 1.7 inches.

The average rainfall for the district was 0.59 inches.

The weather forecast for the next week shows highs being in the 60's, 70's and up into the 90's, with lows in the 50's and 60's. There is a chance of scattered storms throughout the week.

The crop water use report is completed using the average growth stage for each crop and ET gage reading from across the district. To find the conversion for your specific crop growth stage visit <https://nawmn.unl.edu/GrowthStageData>

For more information or to inquire about ET gages or soil moisture monitoring equipment, please contact Robbin Randall at the Upper Niobrara White Natural Resources District at 308.432.6190 or visit our website at www.unwnrd.org. We are committed to helping Nebraskans conserve and protect groundwater.

CORN

ET		V2	V4	V6
Subarea I	Used	0.18	0.32	0.63
	Projected	0.12	0.25	0.42
Subarea II&VI	Used	0.17	0.31	0.6
	Projected	0.14	0.25	0.49
Subarea III	Used	0.15	0.27	0.53
	Projected	0.11	0.23	0.46
Subarea IV	Used	0.18	0.32	0.63
	Projected	0.12	0.25	0.42
Subarea V	Used	0.17	0.31	0.6
	Projected	0.14	0.25	0.49

WHEAT

ET		Jointing	Boot	Heading
Subarea I	Used	1.85	1.98	1.98
	Projected	1.44	1.54	1.54
Subarea II&VI	Used	1.75	1.87	1.87
	Projected	1.34	1.43	1.43
Subarea III	Used	1.55	1.65	1.65
	Projected	1.24	1.32	1.32
Subarea IV	Used	1.85	1.98	1.98
	Projected	1.44	1.54	1.54
Subarea V	Used	1.75	1.87	1.87
	Projected	1.34	1.43	1.43

SUNFLOWERS

ET		Early Vegetation	Vegetation	
Subarea I	Used	0.18	0.18	1.8
	Projected	0.15	0.15	1.5
Subarea II&VI	Used	0.17	0.17	1.7
	Projected	0.14	0.14	1.4
Subarea III	Used	0.15	0.15	1.5
	Projected	0.12	0.12	1.2

Subarea IV	Used	0.18	0.18	1.8
	Projected	0.15	0.15	1.5
Subarea V	Used	0.17	0.17	1.7
	Projected	0.14	0.14	1.4

SUGAR BEETS

ET		Emergence	10-30% Cover	
Subarea I	Used	0.18	0.25	
	Projected	0.15	0.21	
Subarea II&VI	Used	0.17	0.24	
	Projected	0.14	0.2	
Subarea III	Used	0.15	0.21	
	Projected	0.11	0.15	
Subarea IV	Used	0.18	0.25	
	Projected	0.15	0.21	
Subarea V	Used	0.17	0.24	
	Projected	0.14	0.2	

POTATOES

ET		Emergence	Early Vegetative	
Subarea I	Used	0.18	0.23	
	Projected	0.15	0.2	
Subarea II&VI	Used	0.17	0.22	
	Projected	0.13	0.17	
Subarea III	Used	0.15	0.2	
	Projected	0.11	0.14	
Subarea IV	Used	0.16	0.21	
	Projected	0.15	0.2	
Subarea V	Used	0.17	0.22	
	Projected	0.13	0.17	

DRY BEANS

ET		Emergence	Cover 10-50%	
Subarea I	Used	0.11	0.11	
	Projected	0.09	0.09	
Subarea II&VI	Used	0.1	0.1	
	Projected	0.08	0.08	
Subarea III	Used	0.09	0.09	

Subarea IV	Projected	0.07	0.07	
	Used	0.11	0.11	
Subarea V	Projected	0.09	0.09	
	Used	0.1	0.1	
	Projected	0.08	0.08	

ALFALFA

ET

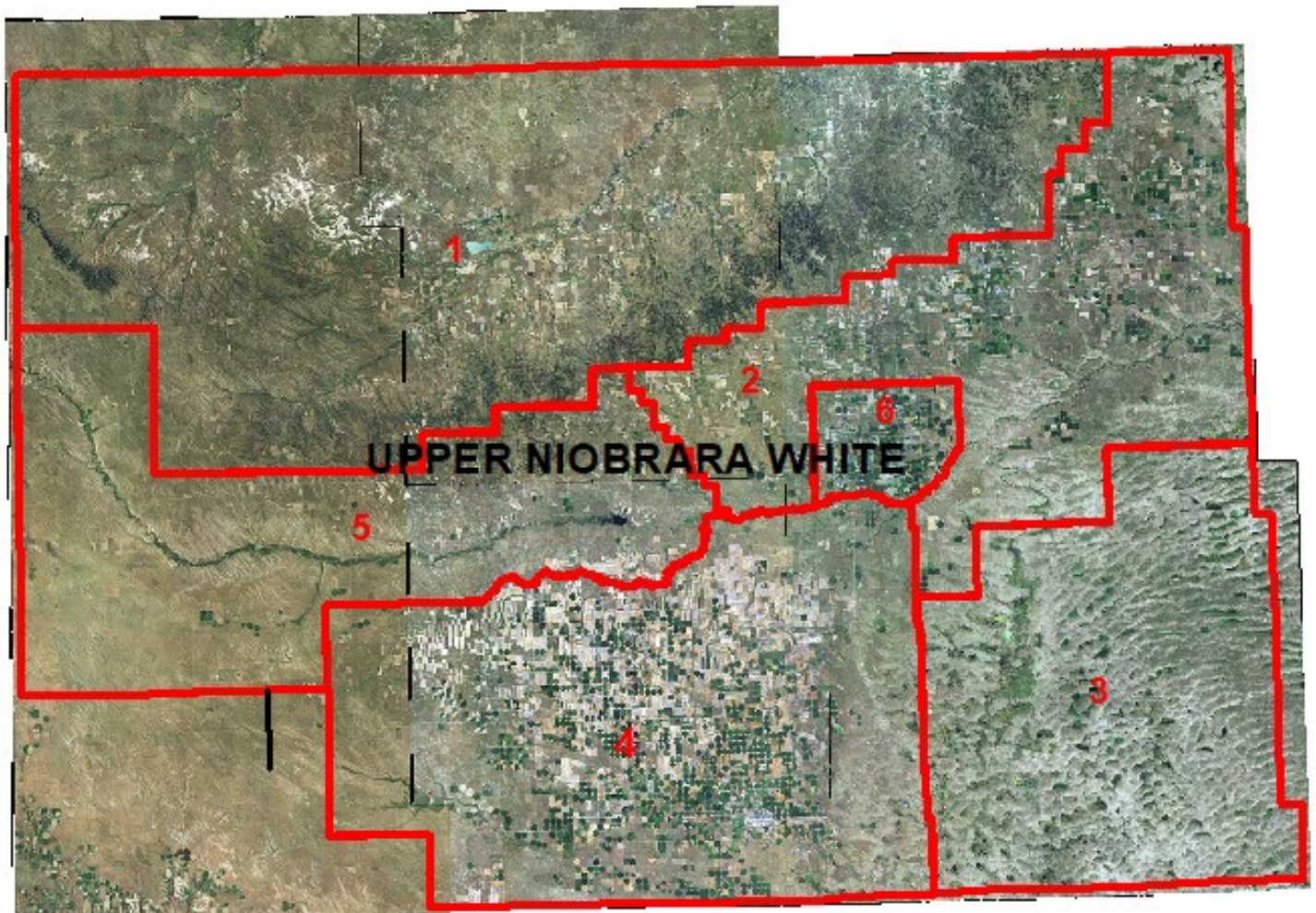
Subarea I	Used	1.98		
	Projected	1.65		
Subarea II&VI	Used	1.87		
	Projected	1.54		
Subarea III	Used	1.65		
	Projected	1.55		
Subarea IV	Used	1.98		
	Projected	1.65		
Subarea V	Used	1.87		
	Projected	1.54		

GRASS

ET

Subarea I	Used	1.55		
	Projected	1.2		
Subarea II&VI	Used	1.55		
	Projected	1.2		
Subarea III	Used	1.55		
	Projected	1.2		
Subarea IV	Used	1.55		
	Projected	1.2		
Subarea V	Used	1.55		
	Projected	1.2		

UNWNRD Subarea Map





Crop Water Use Report for the week of June 24, 2024

Over the past week, corn used 0.22 inches.
Expected use by corn for this week is 0.29 inches.

In the past week, beets used 0.17 inches.
Expected use by beets for this week is 0.25 inches.

Over the past week, potatoes used 0.36 inches.
Expected use by potatoes for this week is 0.48 inches.

Over the past week, dry beans used 0.07 inches.
Expected use by dry beans for this week is 0.1 inches.

Over the past week, soybeans used 0.12 inches.
Expected use by soybeans for this week is 0.17 inches.

Over the past week, sunflowers used 0.12 inches.
Expected use by sunflowers for this week is 0.17 inches.

Over the past week, wheat used 1.32 inches.
Expected use by sunflowers for this week is 1.65 inches.

Over the past week, alfalfa used 1.32 inches.
Expected use by alfalfa for this week is 1.65 inches.

In past week, actively growing lawns used 1.0 inches.
Expected use by actively growing lawns for this week is 1.3 inches.

In the past week average ET gage readings were 1.2 inches.

The average rainfall for the district was 1.21 inches.

The weather forecast for the next week shows highs being in the 80's and 90's and the lows being in the upper 50's and mid 60's. Chances for a stray shower or thunder storms throughout the week.

The crop water use report is completed using the average growth stage for each crop and ET gage reading from across the district. To find the conversion for your specific crop growth stage visit <https://nawmn.unl.edu/GrowthStageData>

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CORN

ET		V2	V4	V6
Subarea I	Used	0.12	0.22	0.42
	Projected	0.17	0.31	0.6
Subarea II&VI	Used	0.1	0.18	0.35
	Projected	0.15	0.27	0.53
Subarea III	Used	0.12	0.22	0.42
	Projected	0.17	0.31	0.6
Subarea IV	Used	0.13	0.23	0.46
	Projected	0.18	0.32	0.63
Subarea V	Used	0.15	0.27	0.53
	Projected	0.2	0.36	0.7

SUGAR BEETS

ET		Emergence	10-30% Cover	Cover 30- 50%
Subarea I	Used	0.12	0.17	0.25
	Projected	0.17	0.24	0.36
Subarea II&VI	Used	0.1	0.14	0.21
	Projected	0.15	0.21	0.32
Subarea III	Used	0.12	0.17	0.25
	Projected	0.17	0.24	0.36
Subarea IV	Used	0.13	0.18	0.27
	Projected	0.18	0.25	0.38
Subarea V	Used	0.15	0.21	0.32
	Projected	0.2	0.28	0.42

POTATOES

ET	Early			
		Emergence	Vegetative	Vegetative
Subarea I	Used	0.12	0.16	0.36
	Projected	0.17	0.22	0.51
Subarea II&VI	Used	0.1	0.13	0.3
	Projected	0.15	0.2	0.45
Subarea III	Used	0.12	0.16	0.36
	Projected	0.17	0.22	0.51
Subarea IV	Used	0.13	0.17	0.39
	Projected	0.19	0.25	0.57
Subarea V	Used	0.15	0.2	0.45
	Projected	0.2	0.26	0.6

DRY BEANS

ET	Cover 10-50%			
		Emergence		
Subarea I	Used	0.07	0.07	
	Projected	0.1	0.1	
Subarea II&VI	Used	0.06	0.06	
	Projected	0.08	0.08	
Subarea III	Used	0.07	0.07	
	Projected	0.1	0.1	
Subarea IV	Used	0.08	0.08	
	Projected	0.11	0.11	
Subarea V	Used	0.09	0.09	
	Projected	0.12	0.12	

SOYBEANS

ET				
		VC	V1	V2
Subarea I	Used	0.12	0.24	0.48
	Projected	0.17	0.34	0.68
Subarea II&VI	Used	0.1	0.2	0.4
	Projected	0.15	0.3	0.6
Subarea III	Used	0.12	0.24	0.48
	Projected	0.17	0.34	0.68
Subarea IV	Used	0.13	0.26	0.52
	Projected	0.18	0.36	0.72
Subarea V	Used	0.15	0.3	0.6
	Projected	0.2	0.4	0.8

SUNFLOWERS

ET		Early Vegetative	Vegetative	Bud Formation
Subarea I	Used	0.12	0.12	1.2
	Projected	0.16	0.16	1.6
Subarea II&VI	Used	0.1	0.1	1
	Projected	0.14	0.14	1.4
Subarea III	Used	0.12	0.12	1.2
	Projected	0.17	0.17	1.7
Subarea IV	Used	0.13	0.13	1.3
	Projected	0.18	0.18	1.8
Subarea V	Used	0.15	0.15	1.5
	Projected	0.19	0.19	1.9

WHEAT

ET		Jointing	Boot	Heading
Subarea I	Used	1.24	1.32	1.32
	Projected	1.65	1.76	1.76
Subarea II&VI	Used	1.03	1.1	1.1
	Projected	1.34	1.43	1.43
Subarea III	Used	1.24	1.32	1.32
	Projected	1.65	1.76	1.76
Subarea IV	Used	1.34	1.43	1.43
	Projected	1.75	1.87	1.87
Subarea V	Used	1.55	1.65	1.65
	Projected	1.96	2.09	2.09

ALFALFA

ET			
Subarea I	Used	1.32	
	Projected	1.65	
Subarea II&VI	Used	1.1	
	Projected	1.54	
Subarea III	Used	1.32	
	Projected	1.76	
Subarea IV	Used	1.43	
	Projected	1.87	
Subarea V	Used	1.65	

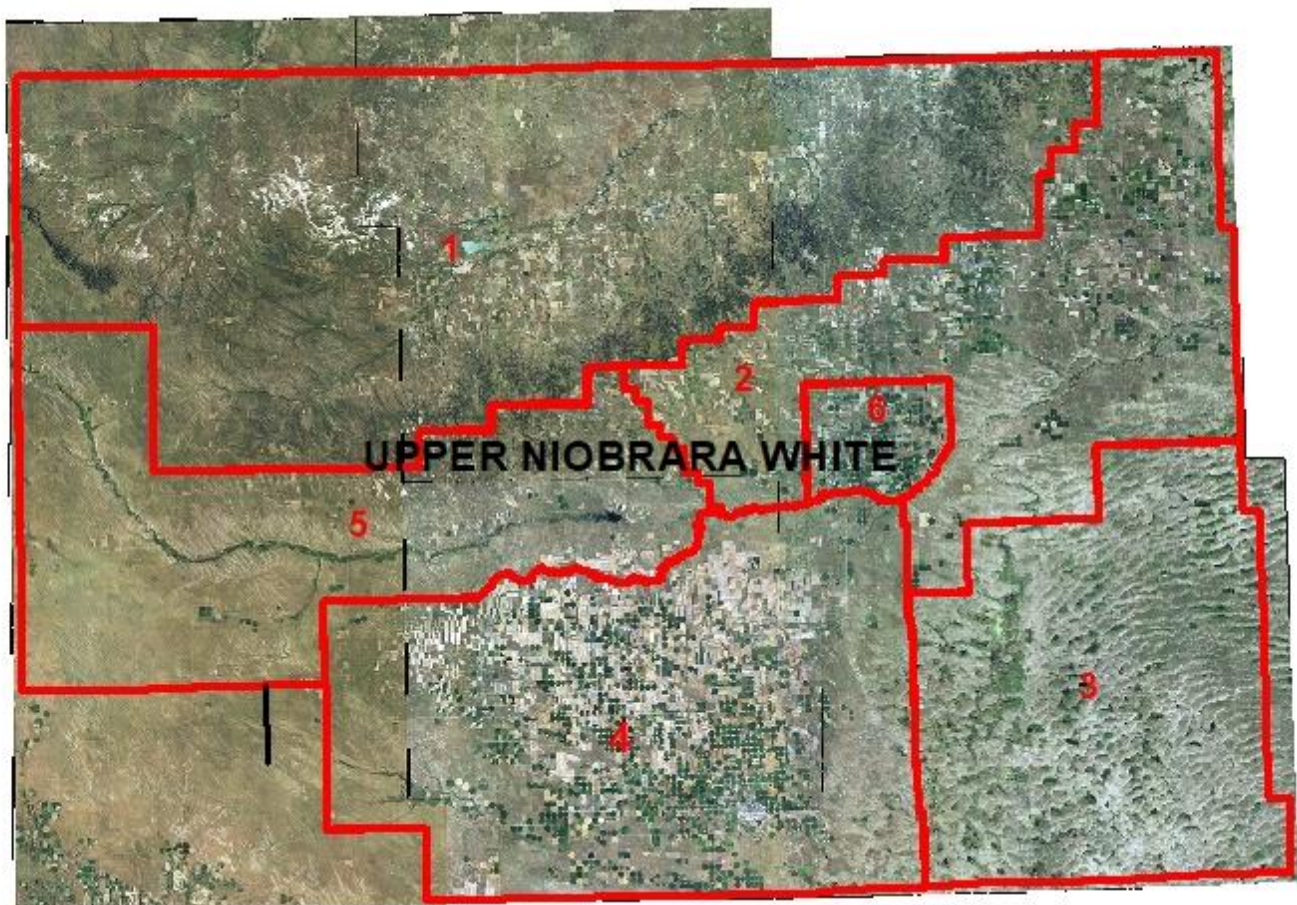
Projected	2.09	
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GRASS

ET

Subarea I	Used	1	
	Projected	1.4	
Subarea II&VI	Used	1	
	Projected	1.4	
Subarea III	Used	1	
	Projected	1.4	
Subarea IV	Used	1	
	Projected	1.4	
Subarea V	Used	1	
	Projected	1.4	

UNWNRD Subarea Map



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Crop Water Use Report for the week of August 19, 2024

Over the past week, corn used 1.76 inches.
Expected use by corn for this week is 1.98 inches.

In the past week, beets used 1.46 inches.
Expected use by beets for this week is 1.64 inches.

Over the past week, potatoes used 1.36 inches.
Expected use by potatoes for this week is 1.53 inches.

Over the past week, dry beans used 1.6 inch.
Expected use by dry beans for this week is 1.8 inches.

Over the past week, soybeans used 1.76 inches.
Expected use by soybeans for this week is 1.98 inches.

Over the past week, sunflowers used 1.84 inches.
Expected use by sunflowers for this week is 2.07 inches.

Over the past week, alfalfa used 1.76 inches.
Expected use by alfalfa for this week is 1.98 inches.

In past week, actively growing lawns used 1.6 inch.
Expected use by actively growing lawns for this week is 1.8 inches.

In the past week average ET gage readings were 1.6 inches.

The average rainfall for the district was 0.15 inches.

The weather forecast for the next week shows highs in the upper 80's and 90's and lows in the 60's. Thunderstorms are possibly Monday evening.

The crop water use report is completed using the average growth stage for each crop and ET gage reading from across the district. To find the conversion for your specific crop growth stage visit <https://nawmn.unl.edu/GrowthStageData>

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CORN

ET		V14	V16	R1 Silking, Blister
Subarea I	Used	1.72	1.87	1.87
	Projected	2.02	2.2	2.2
Subarea II&VI	Used	1.72	1.87	1.87
	Projected	2.02	2.2	2.2
Subarea III	Used	1.31	1.43	1.43
	Projected	1.82	1.98	1.98
Subarea IV	Used	1.41	1.54	1.54
	Projected	1.72	1.87	1.87
Subarea V	Used	1.92	2.09	2.09
	Projected	2.12	2.31	2.31

SUGAR BEETS

ET		Max LAI	Root Stage	
Subarea I	Used	1.55	1.55	
	Projected	1.73	1.73	
Subarea II&VI	Used	1.55	1.55	
	Projected	1.73	1.73	
Subarea III	Used	1.18	1.18	
	Projected	1.37	1.37	
Subarea IV	Used	1.27	1.27	
	Projected	1.46	1.46	
Subarea V	Used	1.73	1.73	
	Projected	2	2	

POTATOES

ET		Tuberization	Tuber Bulk	Bulk
Subarea I	Used	1.55	1.45	1.02
	Projected	1.64	1.53	1.08
Subarea II&VI	Used	1.55	1.45	1.02
	Projected	1.64	1.53	1.08
Subarea III	Used	1.18	1.11	0.78
	Projected	1.37	1.28	0.9
Subarea IV	Used	1.27	1.19	0.84
	Projected	1.46	1.36	0.96
Subarea V	Used	1.73	1.62	1.14
	Projected	1.91	1.79	1.26

DRY BEANS

ET		Full Cover	Pod Elongated	Pod Fill
Subarea I	Used	1.7	1.7	1.41
	Projected	1.9	1.9	1.58
Subarea II&VI	Used	1.7	1.7	1.41
	Projected	1.9	1.9	1.58
Subarea III	Used	1.3	1.3	1.08
	Projected	1.5	1.5	1.25
Subarea IV	Used	1.4	1.4	1.16
	Projected	1.7	1.7	1.41
Subarea V	Used	1.9	1.9	1.58
	Projected	2	2	1.66

SOYBEANS

ET		Begin pod, Full Pod, Begin Seed		
Subarea I	Used	1.87		
	Projected	2.09		
Subarea II&VI	Used	1.87		
	Projected	2.09		
Subarea III	Used	1.43		
	Projected	1.76		
Subarea IV	Used	1.54		
	Projected	1.87		
Subarea V	Used	2.09		
	Projected	2.31		

SUNFLOWERS

ET	50% Disk		Early Seed	
	Formation			
Subarea I	Used	1.96	1.96	
	Projected	2.19	2.19	
Subarea II&VI	Used	1.96	1.96	
	Projected	2.19	2.19	
Subarea III	Used	1.5	1.5	
	Projected	1.96	1.96	
Subarea IV	Used	1.61	1.61	
	Projected	1.84	1.84	
Subarea V	Used	2.19	2.19	
	Projected	2.42	2.42	

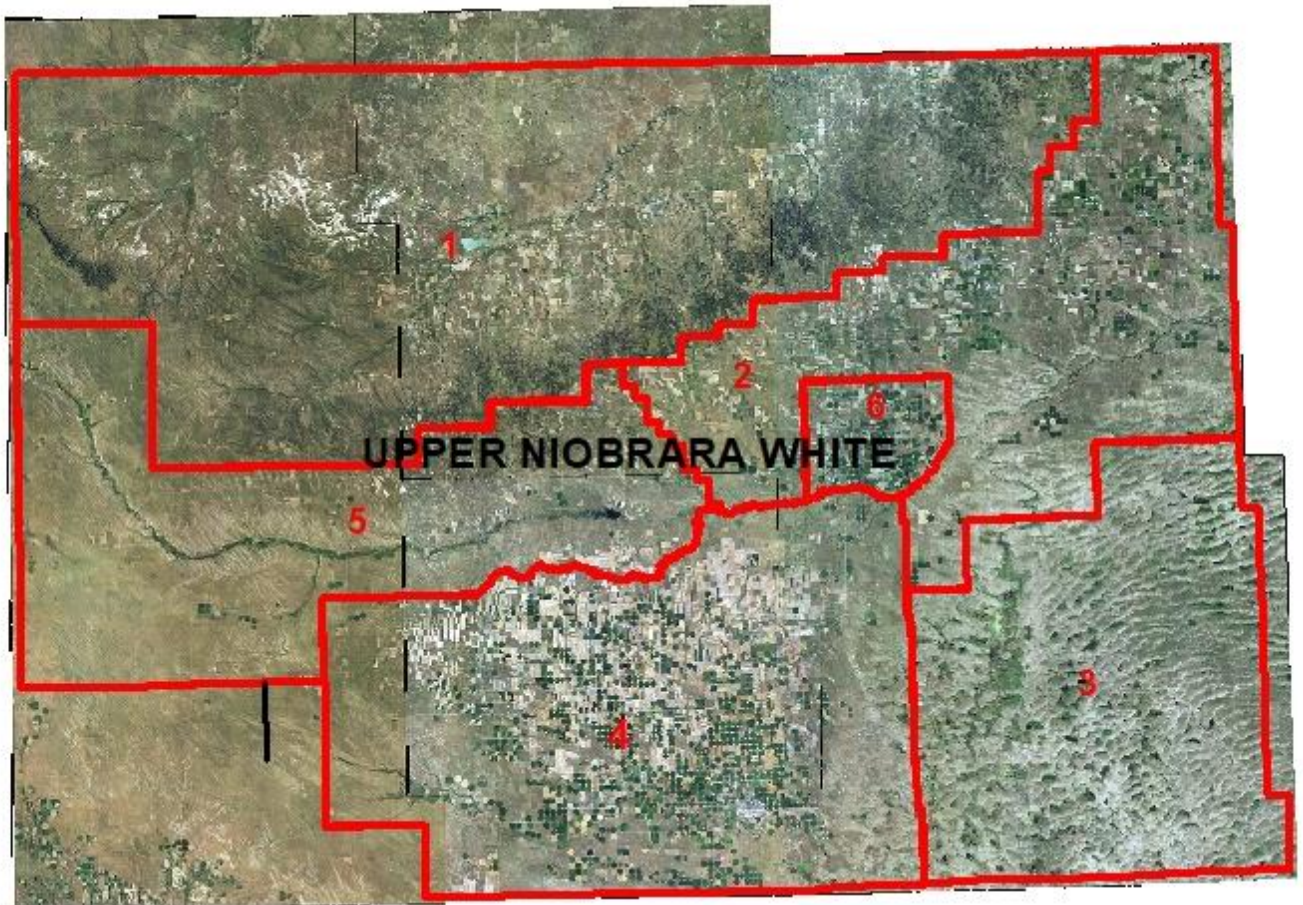
ALFALFA

ET			
Subarea I	Used	1.87	
	Projected	2.09	
Subarea II&VI	Used	1.87	
	Projected	2.09	
Subarea III	Used	1.43	
	Projected	1.75	
Subarea IV	Used	1.54	
	Projected	1.87	
Subarea V	Used	2.09	
	Projected	2.42	

GRASS

ET			
Subarea I	Used	1.6	
	Projected	1.8	
Subarea II&VI	Used	1.6	
	Projected	1.8	
Subarea III	Used	1.6	
	Projected	1.8	
Subarea IV	Used	1.6	
	Projected	1.8	
Subarea V	Used	1.6	

UNWNRD Subarea Map





Crop Water Use Report for the week of July 1, 2024

Over the past week, corn used 0.32 inches.
Expected use by corn for this week is 0.34 inches.

In the past week, beets used 0.25 inches.
Expected use by beets for this week is 0.27 inches.

Over the past week, potatoes used 0.54 inches.
Expected use by potatoes for this week is 0.57 inches.

Over the past week, dry beans used 0.11 inches.
Expected use by dry beans for this week is 0.12 inches.

Over the past week, soybeans used 0.72 inches.
Expected use by soybeans for this week is 0.76 inches.

Over the past week, sunflowers used 0.18 inches.
Expected use by sunflowers for this week is 0.19 inches.

Over the past week, wheat used 0.9 inches.
Expected use by wheat for this week is 0.95 inches.

Over the past week, alfalfa used 1.98 inches.
Expected use by alfalfa for this week is 2.09 inches.

In past week, actively growing lawns used 1.7 inches.
Expected use by actively growing lawns for this week is 1.8 inches.

In the past week average ET gage readings were 1.8 inches.

The average rainfall for the district was 0.13 inches.

The weather forecast for the next week shows highs being in the 80's and 90's and the lows being in the upper 50's and mid 60's. Slight chance of a stray thunder storm in the beginning of the week.

The crop water use report is completed using the average growth stage for each crop and ET gage reading from across the district. To find the conversion for your specific crop growth stage visit <https://nawmn.unl.edu/GrowthStageData>

For more information or to inquire about ET gages or soil moisture monitoring equipment, please contact Robbin Randall at the Upper Niobrara White Natural Resources District at 308.432.6190 or visit our website at www.unwnrd.org. We are committed to helping Nebraskans conserve and protect groundwater.

CORN

ET		V4	V6	V8
Subarea I	Used	0.36	0.7	1.02
	Projected	0.38	0.74	1.07
Subarea II&VI	Used	0.29	0.56	0.77
	Projected	0.31	0.6	0.82
Subarea III	Used	0.27	0.53	0.82
	Projected	0.31	0.6	0.87
Subarea IV	Used	0.32	0.63	0.92
	Projected	0.36	0.7	0.97
Subarea V	Used	0.4	0.77	1.12
	Projected	0.41	0.81	1.17

SUGAR BEETS

ET		10-30% Cover	Cover 30- 50%	Cover 50- 70%
Subarea I	Used	0.28	0.42	0.68
	Projected	0.29	0.44	0.71
Subarea II&VI	Used	0.22	0.34	0.51
	Projected	0.25	0.38	0.54
Subarea III	Used	0.21	0.32	0.54
	Projected	0.22	0.34	0.58
Subarea IV	Used	0.25	0.38	0.61
	Projected	0.27	0.4	0.65
Subarea V	Used	0.31	0.46	0.75
	Projected	0.32	0.48	0.78

POTATOES

ET		Early Vegetative	Vegetative	Blossom Early
Subarea I	Used	0.26	0.6	1.06
	Projected	0.27	0.63	1.11
Subarea II&VI	Used	0.21	0.48	0.8
	Projected	0.21	0.48	0.85
Subarea III	Used	0.2	0.45	0.85
	Projected	0.21	0.48	0.9
Subarea IV	Used	0.23	0.54	0.95
	Projected	0.25	0.57	1.01
Subarea V	Used	0.29	0.66	1.17
	Projected	0.3	0.69	1.22

DRY BEANS

ET		Emergence	Cover 10- 50%	
Subarea I	Used	0.12	0.12	
	Projected	0.13	0.13	
Subarea II&VI	Used	0.1	0.1	
	Projected	0.1	0.1	
Subarea III	Used	0.09	0.09	
	Projected	0.1	0.1	
Subarea IV	Used	0.11	0.11	
	Projected	0.11	0.11	
Subarea V	Used	0.13	0.13	
	Projected	0.13	0.13	

SOYBEANS

ET		V1	<u>V2</u>	V3
Subarea I	Used	0.4	0.8	1.2
	Projected	0.44	0.88	1.32
Subarea II&VI	Used	0.32	0.64	0.96
	Projected	0.36	0.72	1.08
Subarea III	Used	0.3	0.6	0.9
	Projected	0.32	0.64	0.96
Subarea IV	Used	0.36	0.72	1.08
	Projected	0.4	0.8	1.2
Subarea V	Used	0.44	0.88	1.32
	Projected	0.46	0.92	1.38

SUNFLOWERS

ET		Early Vegetative	Vegetative	Bud Formation
Subarea I	Used	0.2	0.2	2
	Projected	0.21	0.21	2.1
Subarea II&VI	Used	0.16	0.16	1.6
	Projected	0.17	0.17	1.7
Subarea III	Used	0.15	0.15	1.5
	Projected	0.16	0.16	1.6
Subarea IV	Used	0.18	0.18	1.8
	Projected	0.2	0.2	2
Subarea V	Used	0.22	0.22	2.2
	Projected	0.23	0.23	2.3

WHEAT

ET		Heading	Soft Dough	Ripening
Subarea I	Used	2.2	2	1
	Projected	2.42	2.1	1.05
Subarea II&VI	Used	1.76	1.6	0.8
	Projected	1.87	1.8	0.9
Subarea III	Used	1.65	1.6	0.8
	Projected	1.76	1.7	0.85
Subarea IV	Used	1.98	1.8	0.9
	Projected	2.09	1.9	2
Subarea V	Used	2.42	2.2	1.1
	Projected	2.42	2.3	2.4

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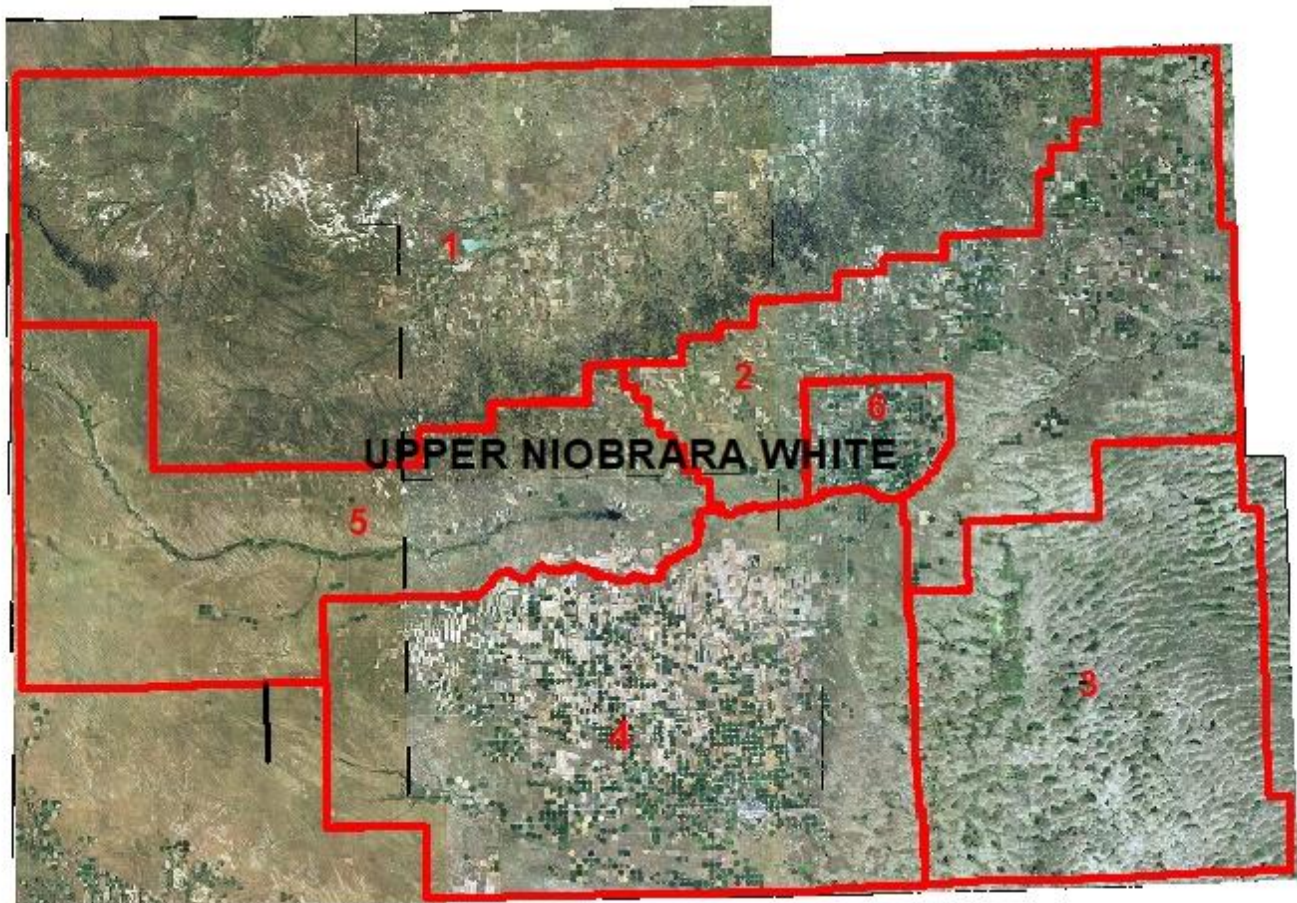
ET			
Subarea I	Used	2.2	
	Projected	2.31	
Subarea II&VI	Used	1.76	
	Projected	1.87	
Subarea III	Used	1.65	
	Projected	1.76	
Subarea IV	Used	1.98	
	Projected	2.09	
Subarea V	Used	2.42	
	Projected	2.53	

GRASS

ET

Subarea I	Used	1.7	
	Projected	1.8	
Subarea II&VI	Used	1.7	
	Projected	1.8	
Subarea III	Used	1.7	
	Projected	1.8	
Subarea IV	Used	1.7	
	Projected	1.8	
Subarea V	Used	1.7	
	Projected	1.8	

UNWNRD Subarea Map





Crop Water Use Report for the week of July 7, 2024

Over the past week, corn used 0.56 inches.
Expected use by corn for this week is 1.02 inches.

In the past week, beets used 0.37 inches.
Expected use by beets for this week is 0.65 inches.

Over the past week, potatoes used 0.84 inches.
Expected use by potatoes for this week is 1.44 inches.

Over the past week, dry beans used 0.07 inches.
Expected use by dry beans for this week is 0.11 inches.

Over the past week, soybeans used 0.66 inches.
Expected use by soybeans for this week is 1.14 inches.

Over the past week, sunflowers used 0.11 inches.
Expected use by sunflowers for this week is 0.19 inches.

Over the past week, wheat used 0.55 inches.
Expected use by wheat for this week is 0.95 inches.

Over the past week, alfalfa used 1.1 inches.
Expected use by alfalfa for this week is 1.98 inches.

In past week, actively growing lawns used 0.85 inches.
Expected use by actively growing lawns for this week is 1.6 inches.

In the past week average ET gage readings were 1.1 inches.

The average rainfall for the district was 0.51 inches.

The weather forecast for the next week shows highs being in the 90's and 100's and the lows being in the 60's.

The crop water use report is completed using the average growth stage for each crop and ET gage reading from across the district. To find the conversion for your specific crop growth stage visit <https://nawmn.unl.edu/GrowthStageData>

For more information or to inquire about ET gages or soil moisture monitoring equipment, please contact Robbin Randall at the Upper Niobrara White Natural Resources District at 308.432.6190 or visit our website at www.unwnrd.org. We are committed to helping Nebraskans conserve and protect groundwater.

CORN

ET		V8	V10	V12
Subarea I	Used	0.51	0.69	0.88
	Projected	0.87	1.17	1.5
Subarea II&VI	Used	0.51	0.69	0.88
	Projected	0.87	1.17	1.5
Subarea III	Used	0.56	0.76	0.97
	Projected	0.92	1.24	1.58
Subarea IV	Used	0.61	0.83	1.06
	Projected	0.97	1.31	1.67
Subarea V	Used	0.66	0.9	1.14
	Projected	1.02	1.38	1.76

SUGAR BEETS

ET		Cover 50-70%	Cover 70-80%	Cover 80-90%
Subarea I	Used	0.34	0.48	0.6
	Projected	0.58	0.82	1.02
Subarea II&VI	Used	0.34	0.48	0.6
	Projected	0.58	0.82	1.02
Subarea III	Used	0.37	0.53	0.66
	Projected	0.61	0.86	1.08
Subarea IV	Used	0.41	0.58	0.72
	Projected	0.65	0.91	1.14
Subarea V	Used	0.44	0.62	0.78
	Projected	0.68	0.96	1.2

POTATOES

ET		Vegatative	Early Blossom	Tuber
Subarea I	Used	0.3	0.53	0.76
	Projected	0.51	0.9	1.29
Subarea II&VI	Used	0.3	0.53	0.76
	Projected	0.51	0.9	1.29
Subarea III	Used	0.33	0.58	0.84
	Projected	0.54	0.95	1.37
Subarea IV	Used	0.36	0.64	0.91
	Projected	0.57	1.01	1.44
Subarea V	Used	0.39	0.69	0.99
	Projected	0.6	1.06	1.52

DRY BEANS

ET		Cover 10-50%	Cover 50-80%	
Subarea I	Used	0.06	0.48	
	Projected	0.1	0.82	
Subarea II&VI	Used	0.06	0.48	
	Projected	0.1	0.82	
Subarea III	Used	0.07	0.53	
	Projected	0.11	0.86	
Subarea IV	Used	0.07	0.58	
	Projected	0.11	0.91	
Subarea V	Used	0.08	0.62	
	Projected	0.12	0.96	

SOYBEANS

ET		V3 3rd Node	R1 Begin Bloom	R2 Full Bloom
Subarea I	Used	0.6	0.9	1
	Projected	1.02	1.53	1.7
Subarea II&VI	Used	0.6	0.9	1
	Projected	1.02	1.53	1.7
Subarea III	Used	0.66	0.99	1.1
	Projected	1.08	1.62	1.8
Subarea IV	Used	0.72	1.08	1.2
	Projected	1.14	1.71	1.9
Subarea V	Used	0.78	1.17	1.3

Projected	1.2	1.8	2
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SUNFLOWERS

ET		Vegatative	Bud Formation	
Subarea I	Used	0.1	1	
	Projected	0.17	1.7	
Subarea II&VI	Used	0.1	1	
	Projected	0.17	1.7	
Subarea III	Used	0.11	1.1	
	Projected	0.18	1.8	
Subarea IV	Used	0.12	1.2	
	Projected	0.19	1.9	
Subarea V	Used	0.13	1.3	
	Projected	0.2	2	

WHEAT

ET		Soft Dough	Ripening	Mature
Subarea I	Used	1	0.5	0.1
	Projected	1.7	0.85	0.17
Subarea II&VI	Used	1	0.5	0.1
	Projected	1.7	0.85	0.17
Subarea III	Used	1.1	0.55	0.1
	Projected	1.8	0.9	0.18
Subarea IV	Used	1.2	0.6	0.12
	Projected	1.9	0.95	0.19
Subarea V	Used	1.3	0.65	0.13
	Projected	2	1	0.2

ALFALFA

ET			
Subarea I	Used	1.1	
	Projected	1.87	
Subarea II&VI	Used	1.1	
	Projected	1.87	
Subarea III	Used	1.21	
	Projected	1.98	
Subarea IV	Used	1.32	
	Projected	2.09	
Subarea V	Used	1.43	

Projected	2.2	
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GRASS

ET

Subarea I

Used	0.85	
Projected	1.3	

Subarea II&VI

Used	0.85	
Projected	1.3	

Subarea III

Used	0.85	
Projected	1.3	

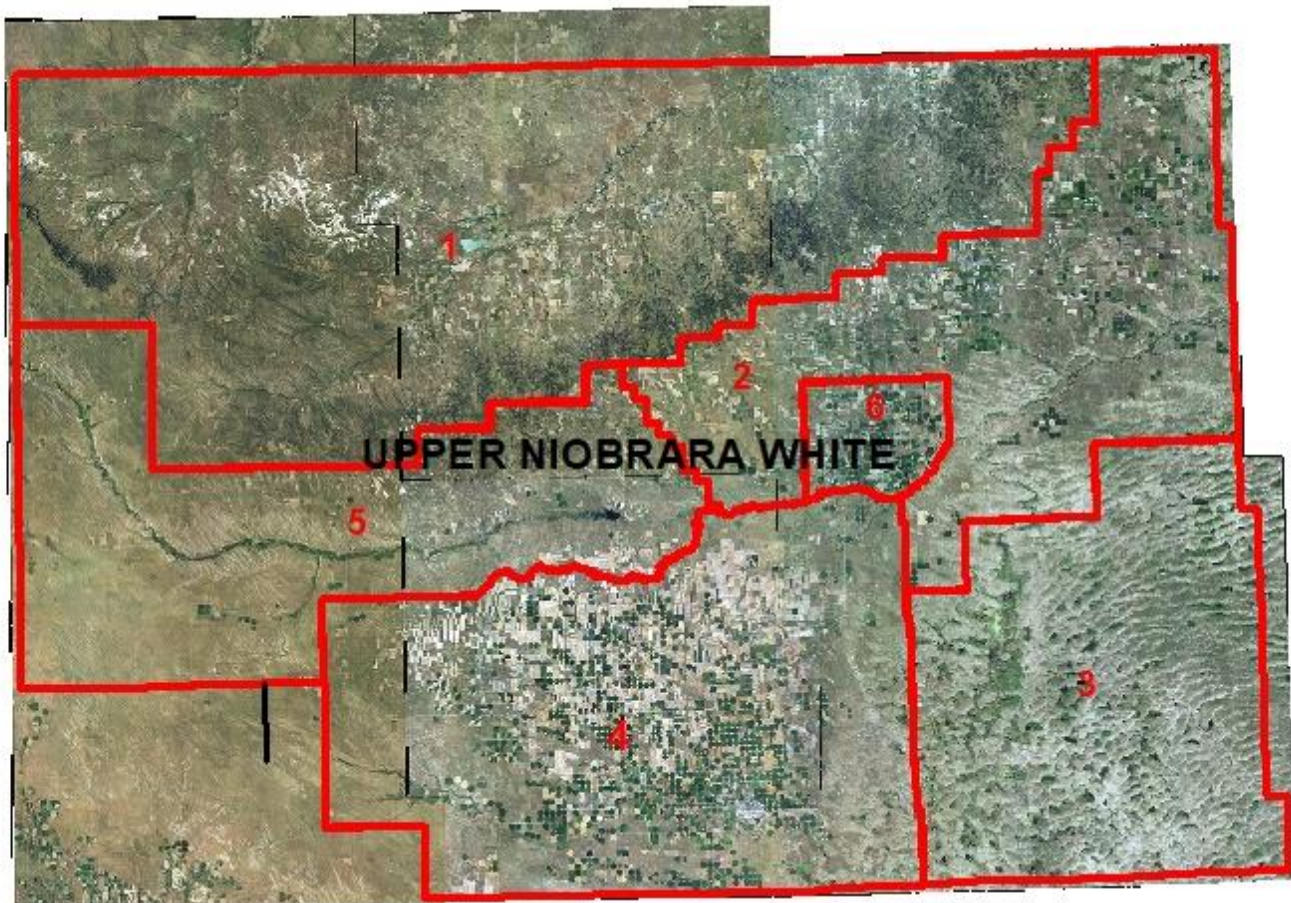
Subarea IV

Used	0.85	
Projected	1.3	

Subarea V

Used	0.85	
Projected	1.3	

UNWNRD Subarea Map





Crop Water Use Report for the week of July 29, 2024

Over the past week, corn used 2.31 inches.
Expected use by corn for this week is 2.53 inches.

In the past week, beets used 1.74 inches.
Expected use by beets for this week is 1.91 inches.

Over the past week, potatoes used 1.91 inches.
Expected use by potatoes for this week is 2.09 inches.

Over the past week, dry beans used 1.01 inches.
Expected use by dry beans for this week is 1.1 inches.

Over the past week, soybeans used 2.31 inches.
Expected use by soybeans for this week is 2.42 inches.

Over the past week, sunflowers used 2.1 inches.
Expected use by sunflowers for this week is 2.3 inches.

Over the past week, alfalfa used 2.31 inches.
Expected use by alfalfa for this week is 2.53 inches.

In past week, actively growing lawns used 2.1 inches.
Expected use by actively growing lawns for this week is 2.3 inches.

In the past week average ET gage readings were 2.1 inches.

The average rainfall for the district was 0.43 inches.

The weather forecast for the next week shows highs being in the 90's and lower 100's and lows being in the 50's and 60's. Scattered storms and showers are possible throughout the week.

The crop water use report is completed using the average growth stage for each crop and ET gage reading from across the district. To find the conversion for your specific crop growth stage visit <https://nawmn.unl.edu/GrowthStageData>

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CORN

ET		V14	V16	R1 Silking
Subarea I	Used	2.42	2.64	2.64
	Projected	2.53	2.75	2.75
Subarea II&VI	Used	2.02	2.2	2.2
	Projected	2.12	2.22	2.22
Subarea III	Used	1.72	1.87	1.87
	Projected	1.92	2.09	2.09
Subarea IV	Used	2.02	2.2	2.2
	Projected	2.12	2.31	2.31
Subarea V	Used	2.32	2.53	2.53
	Projected	2.42	2.64	2.64

SUGAR BEETS

ET		Cover 80 - 90%	Cover 90-Full	Full Cover
Subarea I	Used	1.44	1.75	1.99
	Projected	1.5	1.83	2.08
Subarea II&VI	Used	1.2	1.46	1.66
	Projected	1.26	1.53	1.74
Subarea III	Used	1.02	1.24	1.41
	Projected	1.08	1.31	1.49
Subarea IV	Used	1.2	1.46	1.66
	Projected	1.26	1.53	1.74
Subarea V	Used	1.38	1.68	1.91
	Projected	1.44	1.75	1.99

POTATOES

ET		Early Blossom	Tuber	Tuberization
Subarea I	Used	1.27	1.82	2.18
	Projected	1.33	1.9	2.28
Subarea II&VI	Used	1.06	1.52	1.82
	Projected	1.11	1.6	1.91
Subarea III	Used	0.9	1.29	1.55
	Projected	0.95	1.37	1.64
Subarea IV	Used	1.06	1.52	1.82

Subarea V	Projected	1.11	1.6	1.91
	Used	1.22	1.75	2.09
	Projected	1.27	1.82	2.18

DRY BEANS

ET		Cover 10-50%	Cover 50-80%	Cover 80-Full
Subarea I	Used	0.14	1.15	1.94
	Projected	0.15	1.2	2.03
Subarea II&VI	Used	0.12	0.96	1.62
	Projected	0.13	1.01	1.7
Subarea III	Used	0.1	0.82	1.38
	Projected	0.11	0.86	1.46
Subarea IV	Used	0.12	0.96	1.62
	Projected	0.13	1.01	1.7
Subarea V	Used	0.14	1.1	1.86
	Projected	0.14	1.15	1.94

SOYBEANS

ET		R2	R3-R5	Begin Mature
Subarea I	Used	2.4	2.64	2.16
	Projected	2.5	2.75	2.25
Subarea II&VI	Used	2	2.2	1.8
	Projected	2.1	2.31	1.89
Subarea III	Used	1.7	1.87	1.53
	Projected	1.8	1.98	1.62
Subarea IV	Used	2	2.2	1.8
	Projected	2.3	2.53	2.07
Subarea V	Used	2.3	2.53	2.07
	Projected	2.4	2.64	2.16

SUNFLOWERS

ET

Vegatative Bud Formation

Subarea I	Used	0.24	2.4	
	Projected	0.25	2.5	
Subarea II&VI	Used	0.2	2	
	Projected	0.21	2.1	
Subarea III	Used	0.17	1.7	
	Projected	0.19	1.9	
Subarea IV	Used	0.2	2	
	Projected	0.21	2.1	
Subarea V	Used	0.23	2.3	
	Projected	0.24	2.4	

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ET

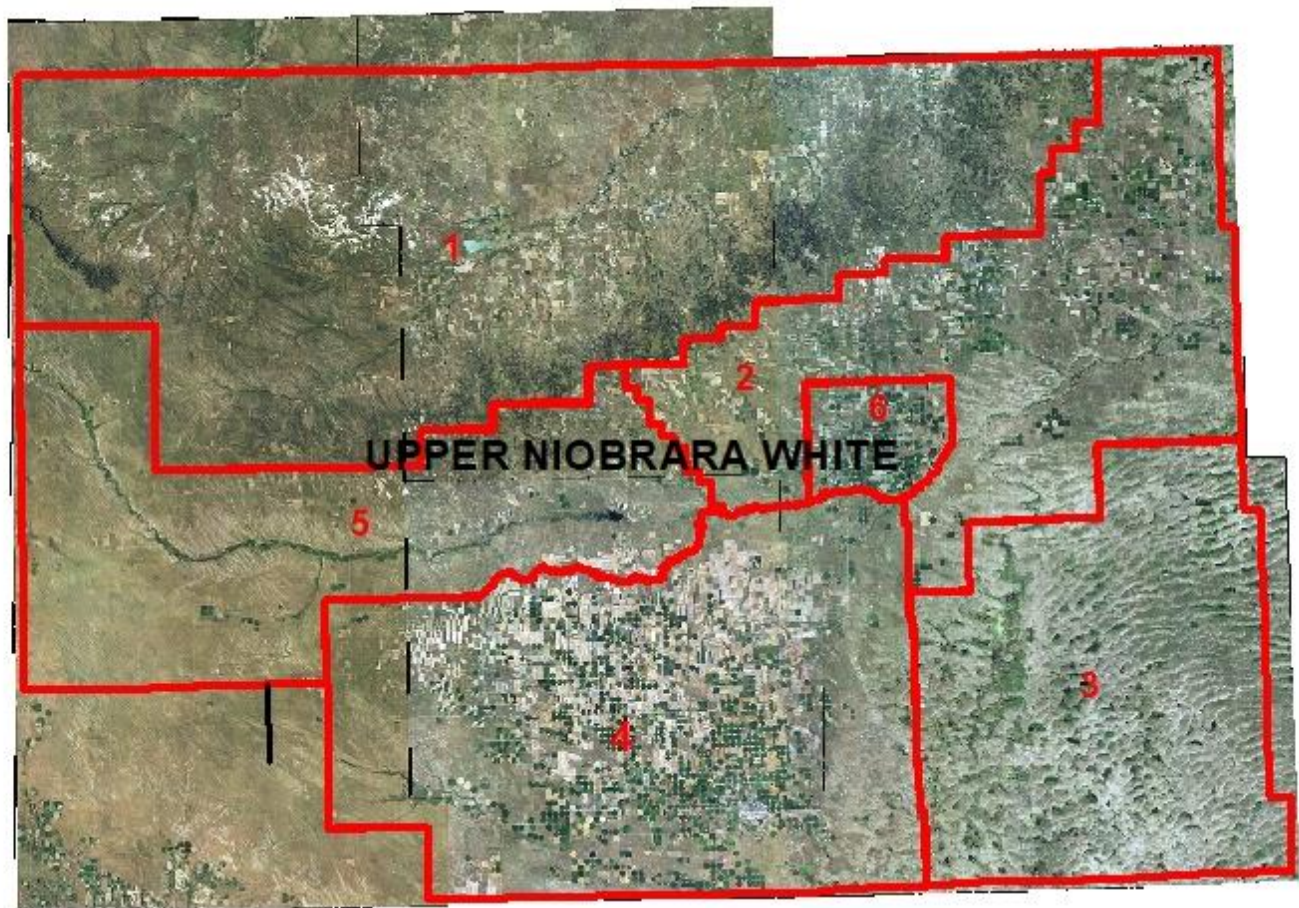
Subarea I	Used	2.64	
	Projected	2.75	
Subarea II&VI	Used	2.2	
	Projected	2.31	
Subarea III	Used	1.87	
	Projected	1.98	
Subarea IV	Used	2.2	
	Projected	2.31	
Subarea V	Used	2.53	
	Projected	2.64	

GRASS

ET

Subarea I	Used	2.1	
	Projected	2.3	
Subarea II&VI	Used	2.1	
	Projected	2.3	
Subarea III	Used	2.1	
	Projected	2.3	
Subarea IV	Used	2.1	
	Projected	2.3	
Subarea V	Used	2.1	
	Projected	2.3	

UNWNRD Subarea Map





Crop Water Use Report for the week of August 5, 2024

Over the past week, corn used 2.09 inches.
Expected use by corn for this week is 1.87 inches.

In the past week, beets used 1.58 inches.
Expected use by beets for this week is 1.41 inches.

Over the past week, potatoes used 1.73 inches.
Expected use by potatoes for this week is 1.64 inches.

Over the past week, dry beans used 1.54 inches.
Expected use by dry beans for this week is 1.38 inches.

Over the past week, soybeans used 2.09 inches.
Expected use by soybeans for this week is 2.87 inches.

Over the past week, sunflowers used 1.9 inches.
Expected use by sunflowers for this week is 1.7 inches.

Over the past week, alfalfa used 2.09 inches.
Expected use by alfalfa for this week is 1.87 inches.

In past week, actively growing lawns used 1.8 inches.
Expected use by actively growing lawns for this week is 1.7 inches.

In the past week average ET gage readings were 1.9 inches.

The average rainfall for the district was 0.008 inches.

The weather forecast for the next week shows highs in the 70's 80's and 90's and lows in the 50's and 60's. There are chances of scattered thunderstorms later this week.

The crop water use report is completed using the average growth stage for each crop and ET gage reading from across the district. To find the conversion for your specific crop growth stage visit <https://nawmn.unl.edu/GrowthStageData>

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308.432.6190 or visit our website at www.unwnrd.org. We are committed to helping Nebraskans conserve and protect groundwater.

CORN

ET		V14	V16	R1 Silking, Blister, Dough
Subarea I	Used	2.12	2.31	2.31
	Projected	2.02	2.2	2.2
Subarea II&VI	Used	2.02	2.2	2.2
	Projected	1.92	2.09	2.09
Subarea III	Used	1.52	1.65	1.65
	Projected	1.41	1.54	1.54
Subarea IV	Used	1.72	1.87	1.87
	Projected	1.62	1.76	1.76
Subarea V	Used	2.22	2.42	2.42
	Projected	2.12	2.31	2.31

SUGAR BEETS

ET		Cover 90-Full	Full Cover	Max LAI
Subarea I	Used	1.53	1.74	1.91
	Projected	1.46	1.66	1.82
Subarea II&VI	Used	1.46	1.66	1.82
	Projected	1.39	1.58	1.73
Subarea III	Used	1.1	1.25	1.37
	Projected	1.02	1.16	1.27
Subarea IV	Used	1.24	1.41	1.55
	Projected	1.17	1.33	1.46
Subarea V	Used	1.61	1.83	2
	Projected	1.53	1.74	1.91

POTATOES

ET	Tuber	Tuberization	Tuber Bulk
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Subarea I	Used	1.6	1.91	1.79
	Projected	1.52	1.82	1.7
Subarea II&VI	Used	1.52	1.82	1.7
	Projected	1.44	1.73	1.62
Subarea III	Used	1.14	1.37	1.28
	Projected	1.06	1.27	1.19
Subarea IV	Used	1.29	1.55	1.45
	Projected	1.22	1.46	1.36
Subarea V	Used	1.67	2	1.87
	Projected	1.6	1.91	1.79

DRY BEANS

ET		Cover 80%- Full	Full Cover	Pod Elongation
Subarea I	Used	1.7	2.1	2.1
	Projected	1.62	2	2
Subarea II&VI	Used	1.62	2	2
	Projected	1.54	1.9	1.9
Subarea III	Used	1.22	1.5	1.5
	Projected	1.13	1.4	1.4
Subarea IV	Used	1.38	1.7	1.7
	Projected	1.3	1.6	1.6
Subarea V	Used	1.78	2.2	2.2
	Projected	1.7	2.1	2.1

SOYBEANS

ET		Full Pod	Begin Seed	
Subarea I	Used	2.31	2.31	
	Projected	2.2	2.2	
Subarea II&VI	Used	2.2	2.2	
	Projected	2.09	2.09	
Subarea III	Used	1.65	1.65	
	Projected	1.54	1.54	
Subarea IV	Used	1.87	1.87	
	Projected	1.76	1.76	
Subarea V	Used	2.42	2.42	
	Projected	2.31	2.31	

SUNFLOWERS

ET		Bud Formation	Flower Initiation	
Subarea I	Used	2.1	2.31	

Subarea II&VI	Projected	2	2.2	
	Used	2	2.2	
Subarea III	Projected	1.9	2.09	
	Used	1.5	1.65	
Subarea IV	Projected	1.4	1.54	
	Used	1.7	1.87	
Subarea V	Projected	1.6	1.76	
	Used	2.2	2.42	
	Projected	2.1	2.31	

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ET

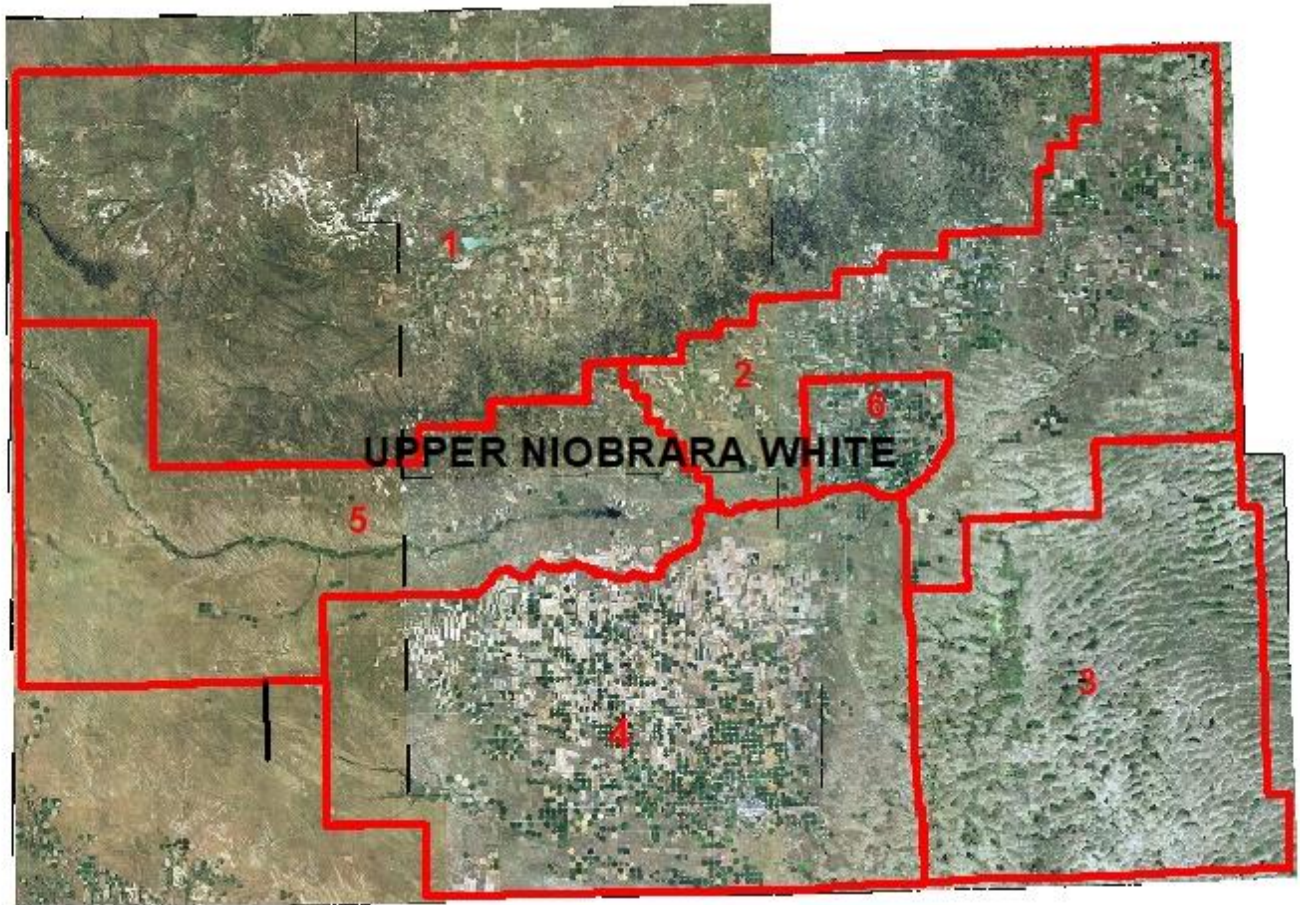
Subarea I	Used	2.31	
	Projected	2.2	
Subarea II&VI	Used	2.2	
	Projected	2.09	
Subarea III	Used	1.65	
	Projected	1.54	
Subarea IV	Used	1.87	
	Projected	1.76	
Subarea V	Used	2.42	
	Projected	2.31	

GRASS

ET

Subarea I	Used	1.8	
	Projected	1.7	
Subarea II&VI	Used	1.8	
	Projected	1.7	
Subarea III	Used	1.8	
	Projected	1.7	
Subarea IV	Used	1.8	
	Projected	1.7	
Subarea V	Used	1.8	
	Projected	1.7	

UNWNRD Subarea Map



Serving Box Butte, Dawes, Sheridan and Sioux Counties

430 East Second Street Chadron, Nebraska 69337

Phone 308.432.6190

www.unwnrd.org

Fax 308.432.6187



Crop Water Use Report for the week of August 12, 2024

Over the past week, corn used 1.1 inches.
Expected use by corn for this week is 1.76 inches.

In the past week, beets used 0.91 inches.
Expected use by beets for this week is 1.46 inches.

Over the past week, potatoes used 0.85 inches.
Expected use by potatoes for this week is 1.36 inches.

Over the past week, dry beans used 1 inch.
Expected use by dry beans for this week is 1.6 inches.

Over the past week, soybeans used 1.1 inches.
Expected use by soybeans for this week is 1.76 inches.

Over the past week, sunflowers used 1.1 inches.
Expected use by sunflowers for this week is 1.76 inches.

Over the past week, alfalfa used 1.1 inches.
Expected use by alfalfa for this week is 1.76 inches.

In past week, actively growing lawns used 1 inch.
Expected use by actively growing lawns for this week is 1.6 inches.

In the past week average ET gage readings were 1 inch.

The average rainfall for the district was 0.51 inches.

The weather forecast for the next week shows highs in the 80's and 90's and lows in the 50's and 60's. There are chances of scattered thunderstorms throughout the week.

The crop water use report is completed using the average growth stage for each crop and ET gage reading from across the district. To find the conversion for your specific crop growth stage visit <https://nawmn.unl.edu/GrowthStageData>

For more information or to inquire about ET gages or soil moisture monitoring equipment, please contact Robbin Randall at the Upper Niobrara White Natural Resources District at

308.432.6190 or visit our website at www.unwnrd.org. We are committed to helping Nebraskans conserve and protect groundwater.

CORN

ET		V14	V16	R1 Silking, Blister
Subarea I	Used	1.01	1.1	1.1
	Projected	1.41	1.54	1.54
Subarea II&VI	Used	1.21	1.32	1.32
	Projected	1.62	1.76	1.76
Subarea III	Used	1.01	1.1	1.1
	Projected	1.31	1.43	1.43
Subarea IV	Used	1.01	1.1	1.1
	Projected	1.31	1.43	1.43
Subarea V	Used	1.11	1.21	1.21
	Projected	1.74	1.87	1.87

SUGAR BEETS

ET		Full Cover	Max LAI	Root Stage
Subarea I	Used	0.83	0.91	0.91
	Projected	1.16	1.27	1.27
Subarea II&VI	Used	1	1.09	1.09
	Projected	1.33	1.46	1.46
Subarea III	Used	0.83	0.91	0.91
	Projected	1.08	1.18	1.18
Subarea IV	Used	0.83	0.91	0.91
	Projected	1.16	1.27	1.27
Subarea V	Used	0.91	1	1
	Projected	1.16	1.27	1.27

POTATOES

ET		Tuberization	Tuber Bulk	Bulk
Subarea I	Used	0.91	0.85	0.6
	Projected	1.27	1.19	0.84
Subarea II&VI	Used	1.09	1.02	0.72
	Projected	1.37	1.28	0.9
Subarea III	Used	0.91	0.85	0.6
	Projected	1.37	1.28	0.9
Subarea IV	Used	0.91	0.85	0.6
	Projected	1.27	1.19	0.84
Subarea V	Used	0.91	0.85	0.6
	Projected	1.37	1.28	0.9

DRY BEANS

ET		Full Cover	Pod Elongated	Pod Fill
Subarea I	Used	1	1	0.83
	Projected	1.4	1.4	1.16
Subarea II&VI	Used	1.2	1.2	1
	Projected	1.6	1.6	1.33
Subarea III	Used	1	1	0.83
	Projected	1.4	1.4	1.16
Subarea IV	Used	1	1	0.83
	Projected	1.6	1.6	1.33
Subarea V	Used	1.1	1.1	0.91
	Projected	1.7	1.7	1.41

SOYBEANS

ET		Begin pod	Full Pod	
Subarea I	Used	1.1	1.1	
	Projected	1.54	1.54	
Subarea II&VI	Used	1.32	1.32	
	Projected	1.65	1.65	
Subarea III	Used	1.1	1.1	
	Projected	1.54	1.54	
Subarea IV	Used	1.1	1.1	
	Projected	1.76	1.76	
Subarea V	Used	1.21	1.21	
	Projected	1.65	1.65	

SUNFLOWERS

ET		Flower Initiation	50% Disk Formation	
Subarea I	Used	1.1	1.15	
	Projected	1.54	1.61	
Subarea II&VI	Used	1.32	1.38	
	Projected	1.76	1.84	
Subarea III	Used	1.1	1.15	
	Projected	1.54	1.61	
Subarea IV	Used	1.1	1.15	
	Projected	1.54	1.61	
Subarea V	Used	1.21	1.27	
	Projected	1.76	1.84	

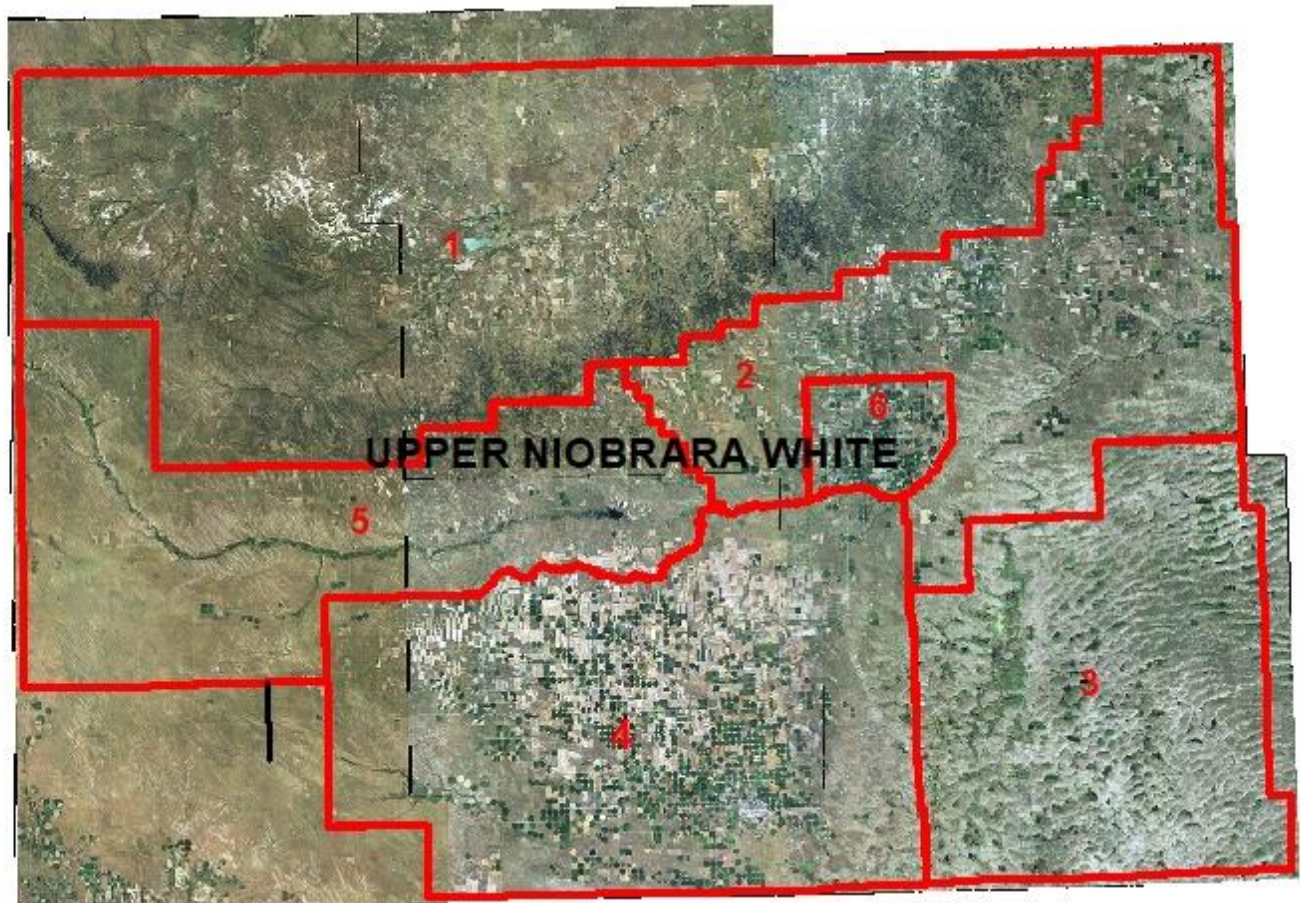
ALFALFA

ET			
Subarea I	Used	1.1	
	Projected	1.43	
Subarea II&VI	Used	1.32	
	Projected	1.43	
Subarea III	Used	1.1	
	Projected	1.54	
Subarea IV	Used	1.1	
	Projected	1.54	
Subarea V	Used	1.21	
	Projected	1.43	

GRASS

ET			
Subarea I	Used	1	
	Projected	1.6	
Subarea II&VI	Used	1	
	Projected	1.6	
Subarea III	Used	1	
	Projected	1.6	
Subarea IV	Used	1	
	Projected	1.6	
Subarea V	Used	1	
	Projected	1.6	

UNWNRD Subarea Map



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Crop Water Use Report for the week of August 19, 2024

Over the past week, corn used 1.76 inches.
Expected use by corn for this week is 1.98 inches.

In the past week, beets used 1.46 inches.
Expected use by beets for this week is 1.64 inches.

Over the past week, potatoes used 1.36 inches.
Expected use by potatoes for this week is 1.53 inches.

Over the past week, dry beans used 1.6 inch.
Expected use by dry beans for this week is 1.8 inches.

Over the past week, soybeans used 1.76 inches.
Expected use by soybeans for this week is 1.98 inches.

Over the past week, sunflowers used 1.84 inches.
Expected use by sunflowers for this week is 2.07 inches.

Over the past week, alfalfa used 1.76 inches.
Expected use by alfalfa for this week is 1.98 inches.

In past week, actively growing lawns used 1.6 inch.
Expected use by actively growing lawns for this week is 1.8 inches.

In the past week average ET gage readings were 1.6 inches.

The average rainfall for the district was 0.15 inches.

The weather forecast for the next week shows highs in the upper 80's and 90's and lows in the 60's. Thunderstorms are possibly Monday evening.

The crop water use report is completed using the average growth stage for each crop and ET gage reading from across the district. To find the conversion for your specific crop growth stage visit <https://nawmn.unl.edu/GrowthStageData>

For more information or to inquire about ET gages or soil moisture monitoring equipment, please contact Robbin Randall at the Upper Niobrara White Natural Resources District at

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CORN

ET		V14	V16	R1 Silking, Blister
Subarea I	Used	1.72	1.87	1.87
	Projected	2.02	2.2	2.2
Subarea II&VI	Used	1.72	1.87	1.87
	Projected	2.02	2.2	2.2
Subarea III	Used	1.31	1.43	1.43
	Projected	1.82	1.98	1.98
Subarea IV	Used	1.41	1.54	1.54
	Projected	1.72	1.87	1.87
Subarea V	Used	1.92	2.09	2.09
	Projected	2.12	2.31	2.31

SUGAR BEETS

ET		Max LAI	Root Stage	
Subarea I	Used	1.55	1.55	
	Projected	1.73	1.73	
Subarea II&VI	Used	1.55	1.55	
	Projected	1.73	1.73	
Subarea III	Used	1.18	1.18	
	Projected	1.37	1.37	
Subarea IV	Used	1.27	1.27	
	Projected	1.46	1.46	
Subarea V	Used	1.73	1.73	
	Projected	2	2	

POTATOES

ET		Tuberization	Tuber Bulk	Bulk
Subarea I	Used	1.55	1.45	1.02
	Projected	1.64	1.53	1.08
Subarea II&VI	Used	1.55	1.45	1.02
	Projected	1.64	1.53	1.08
Subarea III	Used	1.18	1.11	0.78
	Projected	1.37	1.28	0.9
Subarea IV	Used	1.27	1.19	0.84
	Projected	1.46	1.36	0.96
Subarea V	Used	1.73	1.62	1.14
	Projected	1.91	1.79	1.26

DRY BEANS

ET		Full Cover	Pod Elongated	Pod Fill
Subarea I	Used	1.7	1.7	1.41
	Projected	1.9	1.9	1.58
Subarea II&VI	Used	1.7	1.7	1.41
	Projected	1.9	1.9	1.58
Subarea III	Used	1.3	1.3	1.08
	Projected	1.5	1.5	1.25
Subarea IV	Used	1.4	1.4	1.16
	Projected	1.7	1.7	1.41
Subarea V	Used	1.9	1.9	1.58
	Projected	2	2	1.66

SOYBEANS

ET		Begin pod, Full Pod, Begin Seed		
Subarea I	Used	1.87		
	Projected	2.09		
Subarea II&VI	Used	1.87		
	Projected	2.09		
Subarea III	Used	1.43		
	Projected	1.76		
Subarea IV	Used	1.54		
	Projected	1.87		
Subarea V	Used	2.09		
	Projected	2.31		

SUNFLOWERS

ET		50% Disk Formation		Early Seed
Subarea I	Used	1.96	1.96	
	Projected	2.19	2.19	
Subarea II&VI	Used	1.96	1.96	
	Projected	2.19	2.19	
Subarea III	Used	1.5	1.5	
	Projected	1.96	1.96	
Subarea IV	Used	1.61	1.61	
	Projected	1.84	1.84	
Subarea V	Used	2.19	2.19	
	Projected	2.42	2.42	

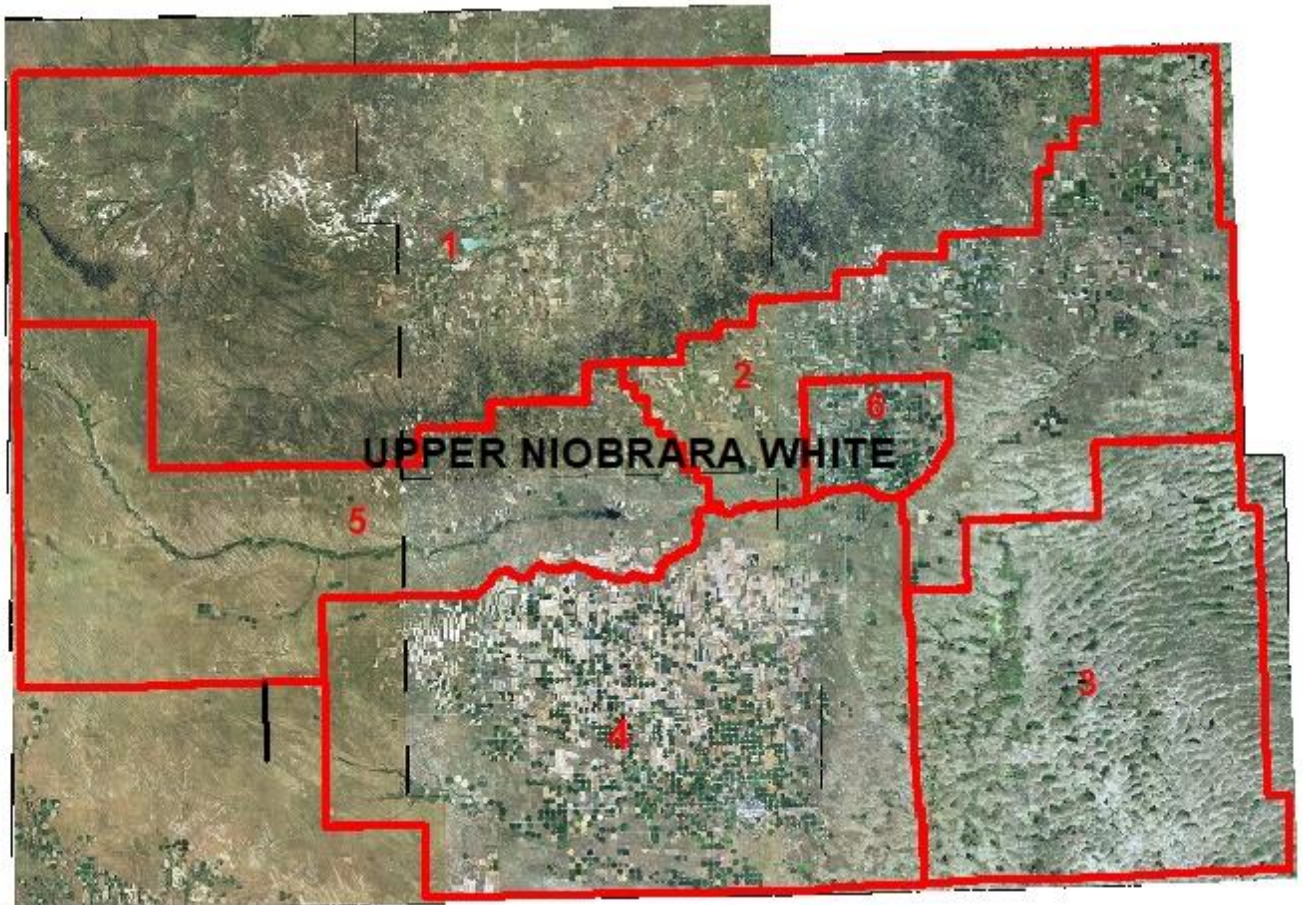
ALFALFA

ET			
Subarea I	Used	1.87	
	Projected	2.09	
Subarea II&VI	Used	1.87	
	Projected	2.09	
Subarea III	Used	1.43	
	Projected	1.75	
Subarea IV	Used	1.54	
	Projected	1.87	
Subarea V	Used	2.09	
	Projected	2.42	

GRASS

ET			
Subarea I	Used	1.6	
	Projected	1.8	
Subarea II&VI	Used	1.6	
	Projected	1.8	
Subarea III	Used	1.6	
	Projected	1.8	
Subarea IV	Used	1.6	
	Projected	1.8	
Subarea V	Used	1.6	

UNWNRD Subarea Map





Crop Water Use Report for the week of August 27, 2024

Over the past week, corn used 1.87 inches.
Expected use by corn for this week is 1.76 inches.

In the past week, beets used 1.55 inches.
Expected use by beets for this week is 1.46 inches.

Over the past week, potatoes used 1.02 inches.
Expected use by potatoes for this week is 0.96 inches.

Over the past week, dry beans used 1.41 inch.
Expected use by dry beans for this week is 1.33 inches.

Over the past week, soybeans used 1.87 inches.
Expected use by soybeans for this week is 1.76 inches.

Over the past week, sunflowers used 1.96 inches.
Expected use by sunflowers for this week is 1.84 inches.

Over the past week, alfalfa used 1.87 inches.
Expected use by alfalfa for this week is 1.76 inches.

In past week, actively growing lawns used 1.7 inch.
Expected use by actively growing lawns for this week is 1.6 inches.

In the past week average ET gage readings were 1.7 inches.

The average rainfall for the district was 0.11 inches.

The weather forecast for the next week shows highs in the 80's and 90's and lows in the 50's and 60's.

The crop water use report is completed using the average growth stage for each crop and ET gage reading from across the district. To find the conversion for your specific crop growth stage visit <https://nawmn.unl.edu/GrowthStageData>

For more information or to inquire about ET gages or soil moisture monitoring equipment, please contact Robbin Randall at the Upper Niobrara White Natural Resources District at

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CORN

ET		Dough, Begin Dent	Full Dent	
Subarea I	Used	2.09	1.82	
	Projected	1.98	1.73	
Subarea II&VI	Used	1.76	1.54	
	Projected	1.65	1.44	
Subarea III	Used	1.54	1.34	
	Projected	1.43	1.25	
Subarea IV	Used	1.76	1.54	
	Projected	1.65	1.44	
Subarea V	Used	1.98	1.73	
	Projected	1.87	1.63	

SUGAR BEETS

ET		Max LAI	Root Stage	
Subarea I	Used	1.73	1.73	
	Projected	1.64	1.64	
Subarea II&VI	Used	1.46	1.46	
	Projected	1.37	1.37	
Subarea III	Used	1.37	1.37	
	Projected	1.27	1.27	
Subarea IV	Used	1.46	1.46	
	Projected	1.37	1.37	
Subarea V	Used	1.64	1.64	
	Projected	1.55	1.55	

POTATOES

ET		Tuber Bulk Tuber	Bulk	Pre - Senescence
Subarea I	Used	1.62	1.14	0.57
	Projected	1.53	1.08	0.54
Subarea II&VI	Used	1.36	0.96	0.48
	Projected	1.28	0.9	0.45
Subarea III	Used	1.19	0.84	0.42
	Projected	1.11	0.78	0.39
Subarea IV	Used	1.36	0.96	0.48
	Projected	1.28	0.9	0.45

Subarea V	Used	1.53	1.08	0.54
	Projected	1.45	1.02	0.51

DRY BEANS

ET		Pod Elongation	Pod Fill	Dry Down
Subarea I	Used	1.9	1.58	1.12
	Projected	1.8	1.49	1.06
Subarea II&VI	Used	1.6	1.33	0.94
	Projected	1.5	1.25	0.89
Subarea III	Used	1.4	1.16	0.83
	Projected	1.3	1.08	0.77
Subarea IV	Used	1.6	1.33	0.94
	Projected	1.5	1.25	0.89
Subarea V	Used	1.8	1.49	1.06
	Projected	1.7	1.41	1

SOYBEANS

ET		Begin pod, Full Pod, Begin Seed, Full Seed		
Subarea I	Used	2.09		
	Projected	1.98		
Subarea II&VI	Used	1.76		
	Projected	1.65		
Subarea III	Used	1.54		
	Projected	1.43		
Subarea IV	Used	1.76		
	Projected	1.65		
Subarea V	Used	1.98		
	Projected	1.87		

SUNFLOWERS

ET		50% Disk Formation	Early Seed	
Subarea I	Used	2.19	2.19	
	Projected	2.07	2.07	
Subarea II&VI	Used	1.84	1.84	
	Projected	1.73	1.73	
Subarea III	Used	1.61	1.61	
	Projected	1.5	1.5	
Subarea IV	Used	1.84	1.84	

Subarea V	Projected	1.73	1.73	
	Used	2.07	2.07	
	Projected	1.96	1.96	

ALFALFA

ET

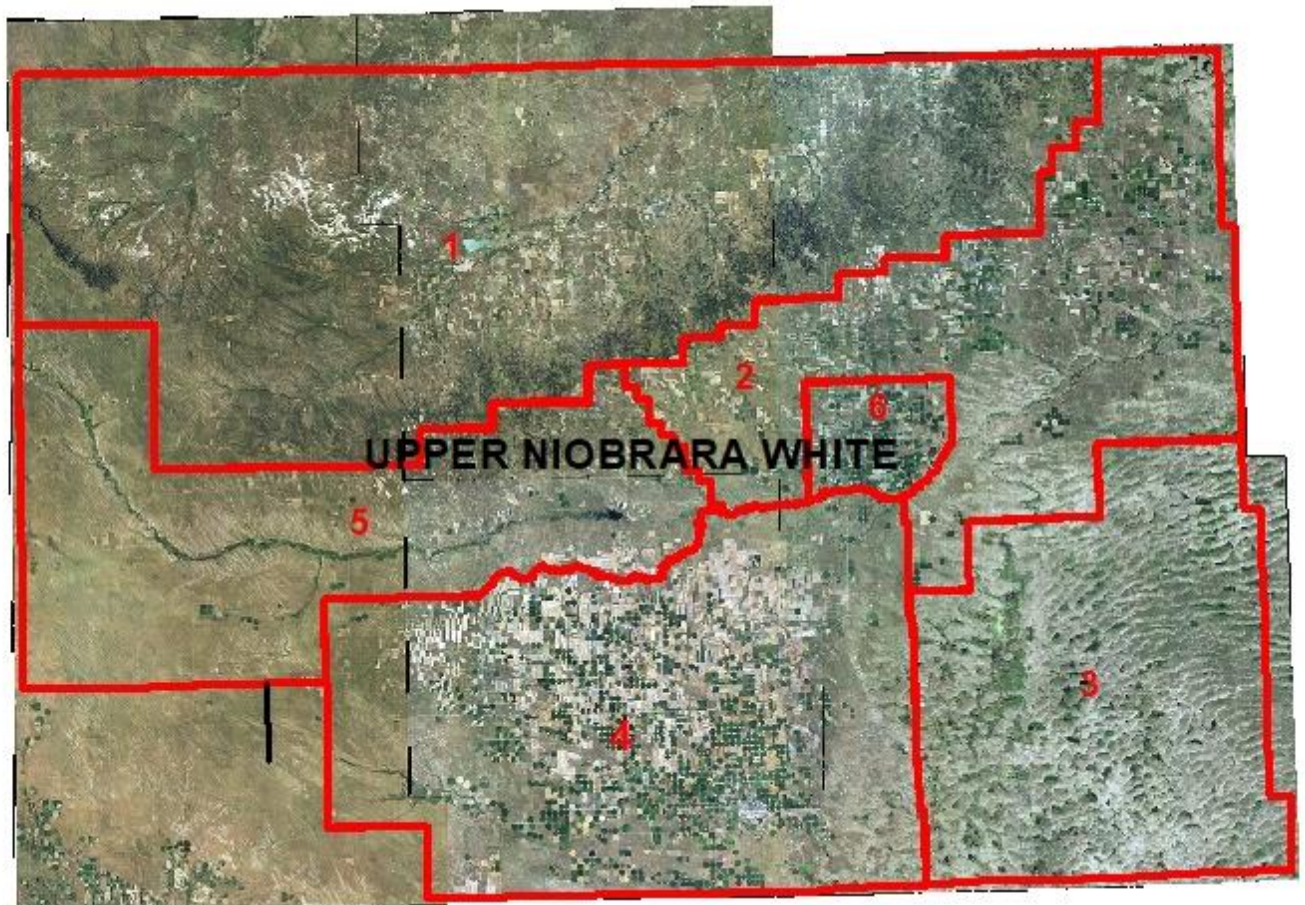
Subarea I	Used	2.09	
	Projected	1.98	
Subarea II&VI	Used	1.76	
	Projected	1.65	
Subarea III	Used	1.54	
	Projected	1.43	
Subarea IV	Used	1.76	
	Projected	1.65	
Subarea V	Used	1.98	
	Projected	1.87	

GRASS

ET

Subarea I	Used	1.7	
	Projected	1.6	
Subarea II&VI	Used	1.7	
	Projected	1.6	
Subarea III	Used	1.7	
	Projected	1.6	
Subarea IV	Used	1.7	
	Projected	1.6	
Subarea V	Used	1.7	
	Projected	1.6	

UNWNRD Subarea Map



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Crop Water Use Report for the week of September 3, 2024

Over the past week, corn used 2.09 inches.
Expected use by corn for this week is 2.2 inches.

In the past week, beets used 1.73 inches.
Expected use by beets for this week is 1.82 inches.

Over the past week, dry beans used 1.12 inch.
Expected use by dry beans for this week is 1.18 inches.

Over the past week, soybeans used 2.09 inches.
Expected use by soybeans for this week is 2.2 inches.

Over the past week, sunflowers used 2.19 inches.
Expected use by sunflowers for this week is 2.3 inches.

Over the past week, alfalfa used 2.09 inches.
Expected use by alfalfa for this week is 2.2 inches.

In past week, actively growing lawns used 1.9 inch.
Expected use by actively growing lawns for this week is 2.0 inches.

In the past week average ET gage readings were 1.9 inches.

The average rainfall for the district was 0.13 inches.

The weather forecast for the next week shows highs in the 80's and 90's and lows in the 50's and 60's.

The crop water use report is completed using the average growth stage for each crop and ET gage reading from across the district. To find the conversion for your specific crop growth stage visit <https://nawmn.unl.edu/GrowthStageData>

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CORN

ET		Dough, Begin Dent	Full Dent	
Subarea I	Used	2.53	2.21	
	Projected	2.64	2.3	
Subarea II&VI	Used	2.09	1.82	
	Projected	2.2	1.92	
Subarea III	Used	1.65	1.44	
	Projected	1.76	1.54	
Subarea IV	Used	1.98	1.73	
	Projected	1.87	1.63	
Subarea V	Used	2.42	2.11	
	Projected	2.31	2.02	

SUGAR BEETS

ET		Max LAI	Root Stage	
Subarea I	Used	2.09	2.09	
	Projected	2.18	2.18	
Subarea II&VI	Used	1.73	1.73	
	Projected	1.82	1.82	
Subarea III	Used	1.37	1.37	
	Projected	1.46	1.46	
Subarea IV	Used	1.64	1.64	
	Projected	1.73	1.73	
Subarea V	Used	2	2	
	Projected	2.09	2.09	

DRY BEANS

ET		Pod Fill	Dry Down	Senescense
Subarea I	Used	1.91	1.36	0.69
	Projected	1.99	1.42	0.72
Subarea II&VI	Used	1.58	1.12	0.57
	Projected	1.66	1.18	0.6
Subarea III	Used	1.25	0.89	0.45
	Projected	1.33	0.94	0.48
Subarea IV	Used	1.49	1.06	0.54
	Projected	1.58	1.12	0.57
Subarea V	Used	1.83	1.3	0.66
	Projected	1.91	1.36	0.69

SOYBEANS

ET

Begin pod, Full Pod, Begin Seed, Full Seed

Subarea I	Used	2.42		
	Projected	2.31		
Subarea II&VI	Used	2.09		
	Projected	1.98		
Subarea III	Used	1.65		
	Projected	1.54		
Subarea IV	Used	1.98		
	Projected	1.87		
Subarea V	Used	2.42		
	Projected	2.31		

SUNFLOWERS

ET

50% Disk Flower

Early Seed

Late Seed

Subarea I	Used	2.65	2.65	2.65
	Projected	2.64	2.64	2.64
Subarea II&VI	Used	2.19	2.19	2.19
	Projected	2.3	2.3	2.3
Subarea III	Used	1.73	1.73	1.73
	Projected	1.84	1.84	1.84
Subarea IV	Used	2.07	2.07	2.07
	Projected	2.19	2.19	2.19
Subarea V	Used	2.53	2.53	2.53
	Projected	2.65	2.65	2.65

ALFALFA

ET

Subarea I	Used	2.53	
	Projected	2.64	
Subarea II&VI	Used	2.09	
	Projected	2.2	
Subarea III	Used	1.65	
	Projected	1.76	
Subarea IV	Used	1.98	
	Projected	2.09	
Subarea V	Used	2.42	
	Projected	2.31	

GRASS

ET

Subarea I

Used	1.9	
Projected	2	
Used	1.9	
Projected	2	
Used	1.9	
Projected	2	
Used	1.9	
Projected	2	
Used	1.9	
Projected	2	

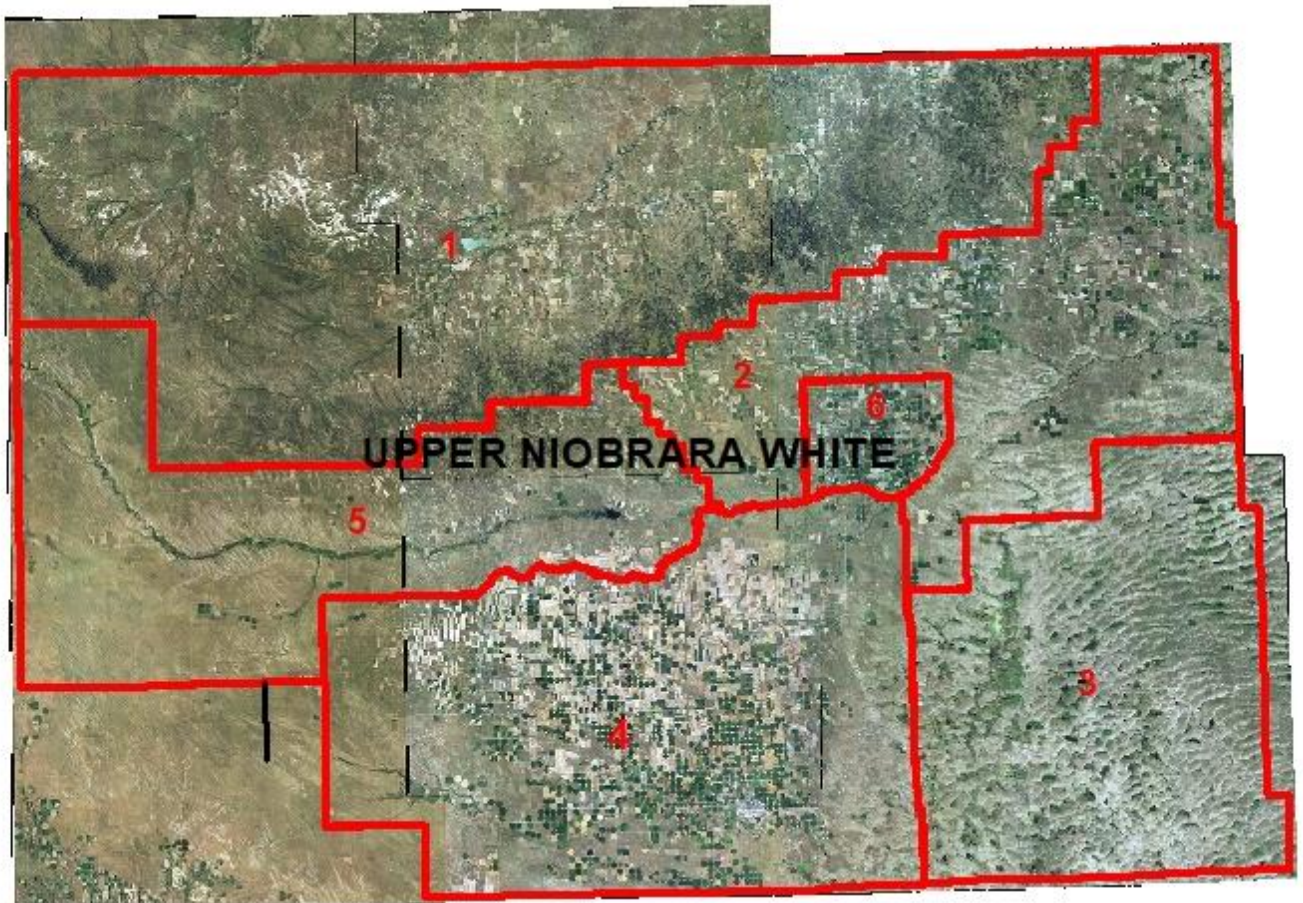
Subarea II&VI

Subarea III

Subarea IV

Subarea V

UNWNRD Subarea Map



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Crop Water Use Report for the week of September 9, 2024

Over the past week, corn used 1.87 inches.
Expected use by corn for this week is 1.76 inches.

In the past week, beets used 1.55 inches.
Expected use by beets for this week is 1.46 inches.

Over the past week, dry beans used 0.51 inch.
Expected use by dry beans for this week is 0.48 inches.

Over the past week, soybeans used 1.87 inches.
Expected use by soybeans for this week is 1.76 inches.

Over the past week, sunflowers used 1.96 inches.
Expected use by sunflowers for this week is 1.84 inches.

Over the past week, alfalfa used 1.98 inches.
Expected use by alfalfa for this week is 1.87 inches.

In past week, actively growing lawns used 1.3 inch.
Expected use by actively growing lawns for this week is 1.2 inches.

In the past week average ET gage readings were 1.7 inches.

The average rainfall for the district was 0.018 inches.

The weather forecast for the next week shows highs in the 80's and 90's and lows in the 50's and 60's.

The crop water use report is completed using the average growth stage for each crop and ET gage reading from across the district. To find the conversion for your specific crop growth stage visit <https://nawmn.unl.edu/GrowthStageData>

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CORN

ET		Begin Dent	Full Dent	
Subarea I	Used	1.54	1.36	
	Projected	1.43	1.25	
Subarea II&VI	Used	1.76	1.54	
	Projected	1.65	1.44	
Subarea III	Used	2.2	1.92	
	Projected	2.09	1.82	
Subarea IV	Used	1.98	1.73	
	Projected	1.87	1.63	
Subarea V	Used	2.2	1.92	
	Projected	2.09	1.82	

SUGAR BEETS

ET		Max LAI	Root Stage	
Subarea I	Used	1.27	1.27	
	Projected	1.18	1.18	
Subarea II&VI	Used	1.46	1.46	
	Projected	1.37	1.37	
Subarea III	Used	1.82	1.82	
	Projected	1.73	1.73	
Subarea IV	Used	1.64	1.64	
	Projected	1.55	1.55	
Subarea V	Used	1.82	1.82	
	Projected	1.73	1.73	

DRY BEANS

ET		Dry Down	Senescence	Mature
Subarea I	Used	0.83	0.42	0.13
	Projected	0.77	0.39	0.12
Subarea II&VI	Used	0.94	0.48	0.14
	Projected	0.89	0.45	0.14
Subarea III	Used	1.18	0.6	0.18
	Projected	1.12	0.57	0.17
Subarea IV	Used	1.06	0.54	0.16
	Projected	1	0.51	0.15
Subarea V	Used	1.18	0.6	0.18
	Projected	1.12	0.57	0.17

SOYBEANS

ET		Full Seed	Begin Mature	
Subarea I	Used	1.54	1.26	
	Projected	1.43	1.17	
Subarea II&VI	Used	1.76	1.44	
	Projected	1.65	1.35	
Subarea III	Used	2.2	1.8	
	Projected	2.09	1.71	
Subarea IV	Used	1.98	1.62	
	Projected	1.87	1.53	
Subarea V	Used	2.2	1.8	
	Projected	2.09	1.71	

SUNFLOWERS

ET		50% Disk Flower	Early Seed	Late Seed
Subarea I	Used	1.61	1.61	1.61
	Projected	1.5	1.5	1.5
Subarea II&VI	Used	1.84	1.84	1.84
	Projected	1.73	1.73	1.73
Subarea III	Used	2.3	2.3	2.3
	Projected	2.19	2.19	2.19
Subarea IV	Used	2.07	2.07	2.07
	Projected	1.96	1.96	1.96
Subarea V	Used	2.3	2.3	2.3
	Projected	2.19	2.19	2.19

ALFALFA

ET			
Subarea I	Used	1.54	
	Projected	1.43	
Subarea II&VI	Used	1.76	
	Projected	1.65	
Subarea III	Used	2.2	
	Projected	2.09	
Subarea IV	Used	1.98	
	Projected	1.87	
Subarea V	Used	2.2	
	Projected	2.09	

GRASS

ET

Subarea I

Used	1.3	
Projected	1.2	

Subarea
II&VI

Used	1.3	
Projected	1.2	

Subarea III

Used	1.3	
Projected	1.2	

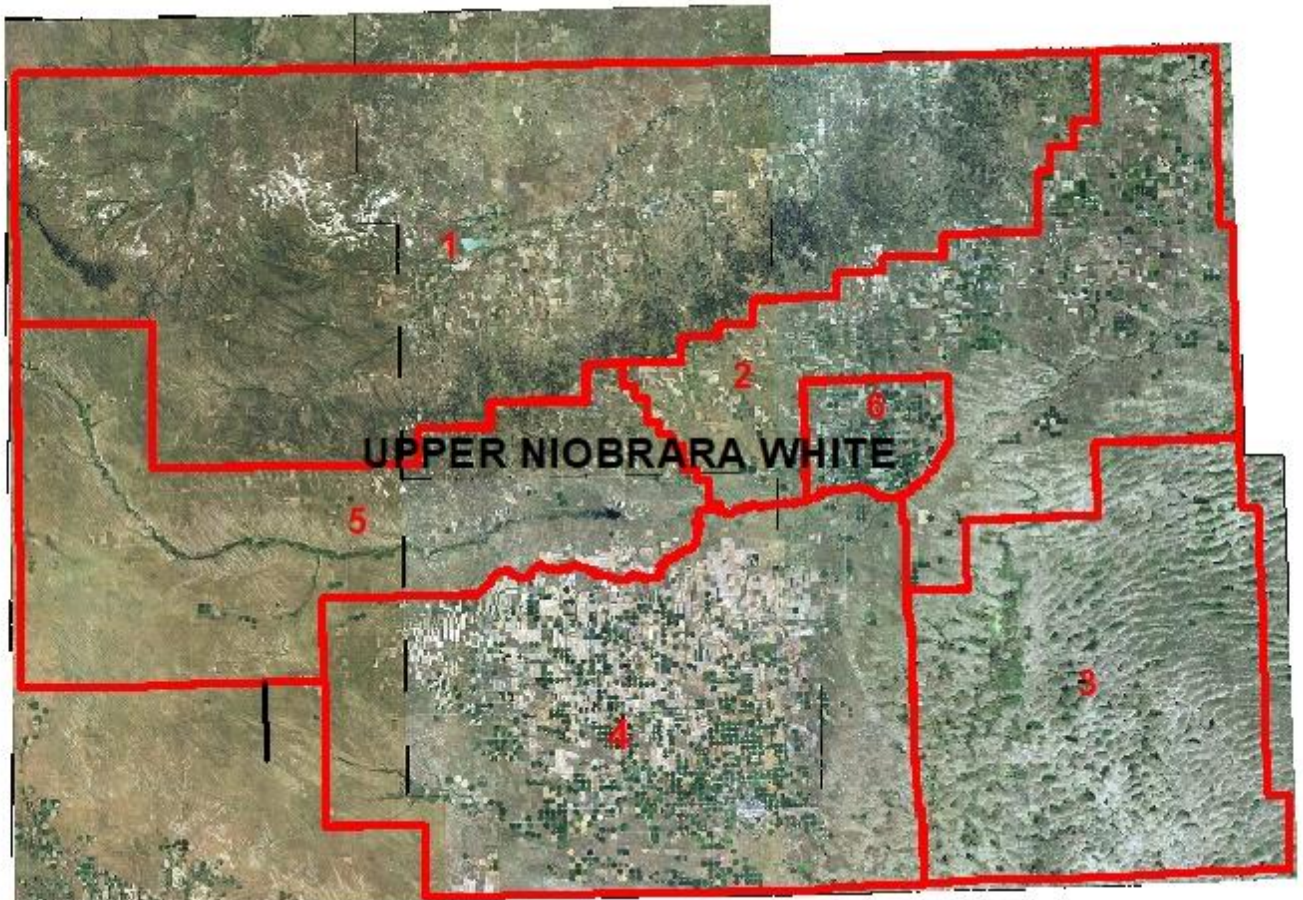
Subarea IV

Used	1.3	
Projected	1.2	

Subarea V

Used	1.3	
Projected	1.2	

UNWNRD Subarea Map



Serving Box Butte, Dawes, Sheridan and Sioux Counties

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Crop Water Use Report for the week of September 3, 2024

Over the past week, corn used 1.87 inches.
Expected use by corn for this week is 1.76 inches.

In the past week, beets used 1.55 inches.
Expected use by beets for this week is 1.46 inches.

Over the past week, dry beans used 0.51 inch.
Expected use by dry beans for this week is 0.48 inches.

Over the past week, soybeans used 1.87 inches.
Expected use by soybeans for this week is 1.76 inches.

Over the past week, sunflowers used 1.96 inches.
Expected use by sunflowers for this week is 1.84 inches.

Over the past week, alfalfa used 1.98 inches.
Expected use by alfalfa for this week is 1.87 inches.

In past week, actively growing lawns used 1.3 inch.
Expected use by actively growing lawns for this week is 1.2 inches.

In the past week average ET gage readings were 1.7 inches.

The average rainfall for the district was 0.018 inches.

The weather forecast for the next week shows highs in the 80's and 90's and lows in the 50's and 60's.

The crop water use report is completed using the average growth stage for each crop and ET gage reading from across the district. To find the conversion for your specific crop growth stage visit <https://nawmn.unl.edu/GrowthStageData>

For more information or to inquire about ET gages or soil moisture monitoring equipment, please contact Robbin Randall at the Upper Niobrara White Natural Resources District at 308.432.6190 or visit our website at www.unwnrd.org. We are committed to helping Nebraskans conserve and protect groundwater.

CORN

ET		Begin Dent	Full Dent	
Subarea I	Used	1.54	1.36	
	Projected	1.43	1.25	
Subarea II&VI	Used	1.76	1.54	
	Projected	1.65	1.44	
Subarea III	Used	2.2	1.92	
	Projected	2.09	1.82	
Subarea IV	Used	1.98	1.73	
	Projected	1.87	1.63	
Subarea V	Used	2.2	1.92	
	Projected	2.09	1.82	

SUGAR BEETS

ET		Max LAI	Root Stage	
Subarea I	Used	1.27	1.27	
	Projected	1.18	1.18	
Subarea II&VI	Used	1.46	1.46	
	Projected	1.37	1.37	
Subarea III	Used	1.82	1.82	
	Projected	1.73	1.73	
Subarea IV	Used	1.64	1.64	
	Projected	1.55	1.55	
Subarea V	Used	1.82	1.82	
	Projected	1.73	1.73	

DRY BEANS

ET		Dry Down	Senescence	Mature
Subarea I	Used	0.83	0.42	0.13
	Projected	0.77	0.39	0.12
Subarea II&VI	Used	0.94	0.48	0.14
	Projected	0.89	0.45	0.14
Subarea III	Used	1.18	0.6	0.18
	Projected	1.12	0.57	0.17
Subarea IV	Used	1.06	0.54	0.16
	Projected	1	0.51	0.15
Subarea V	Used	1.18	0.6	0.18
	Projected	1.12	0.57	0.17

SOYBEANS

ET		Full Seed	Begin Mature	
Subarea I	Used	1.54	1.26	
	Projected	1.43	1.17	
Subarea II&VI	Used	1.76	1.44	
	Projected	1.65	1.35	
Subarea III	Used	2.2	1.8	
	Projected	2.09	1.71	
Subarea IV	Used	1.98	1.62	
	Projected	1.87	1.53	
Subarea V	Used	2.2	1.8	
	Projected	2.09	1.71	

SUNFLOWERS

ET		50% Disk Flower	Early Seed	Late Seed
Subarea I	Used	1.61	1.61	1.61
	Projected	1.5	1.5	1.5
Subarea II&VI	Used	1.84	1.84	1.84
	Projected	1.73	1.73	1.73
Subarea III	Used	2.3	2.3	2.3
	Projected	2.19	2.19	2.19
Subarea IV	Used	2.07	2.07	2.07
	Projected	1.96	1.96	1.96
Subarea V	Used	2.3	2.3	2.3
	Projected	2.19	2.19	2.19

ALFALFA

ET			
Subarea I	Used	1.54	
	Projected	1.43	
Subarea II&VI	Used	1.76	
	Projected	1.65	
Subarea III	Used	2.2	
	Projected	2.09	
Subarea IV	Used	1.98	
	Projected	1.87	
Subarea V	Used	2.2	
	Projected	2.09	

GRASS

ET

Subarea I

Used	1.3	
Projected	1.2	

Subarea II&VI

Used	1.3	
Projected	1.2	

Subarea III

Used	1.3	
Projected	1.2	

Subarea IV

Used	1.3	
Projected	1.2	

Subarea V

Used	1.3	
Projected	1.2	

UNWNRD Subarea Map

