

*ATTACHMENT Q*

*PRELIMINARY IN-CHANNEL SEDIMENT INVENTORY*

*GEOMORPH<sup>®</sup> SITE CHARACTERIZATION  
UPPER TITABAWASSEE RIVER*

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Preliminary In-Channel Sediment Inventory  
 GeoMorph Site Characterization  
 Upper Tittabawassee River  
 Midland, Michigan

Reach	Transect	Distance From Southwest		Water and Sediment		Sediment Thickness (ft)	Sample Location
		Bank (ft)	Water Depth (ft)	Depth (ft)			
A	4+25	10	5.9	5.9	0.0		*
	4+25	30	10.0	10.3	0.3		
	4+25	100	12.3	12.5	0.2		
	4+25	200	12.6	12.6	0.0		
	4+25	300	9.4	10.4	1.0		C
	4+25	320	4.0	5.5	1.5		NE
	*Two samples collected in this transect because half of the channel bed consisted of gravel and cobbles.						
A	9+50	10	2.9	5.5	2.6		SW
	9+50	30	6.9	7.7	0.8		
	9+50	60	8.5	8.5	0.0		
	9+50	100	8.2	8.2	0.0		
	9+50	150	8.2	9.0	0.8		C
	9+50	200	9.0	9.0	0.0		
	9+50	250	8.7	9.5	0.8		
	9+50	300	8.0	9.5	1.5		NE
	9+50	325	2.9	3.3	0.4		
B	15+00	10	0.5	2.0	1.5		
	15+00	20	4.0	7.5	3.5		SW
	15+00	50	6.9	8.5	1.6		
	15+00	100	6.8	7.1	0.3		
	15+00	150	7.0	7.1	0.1		
	15+00	200	8.5	10.5	2.0		C
	15+00	250	8.9	9.3	0.4		
	15+00	275	3.8	6.3	2.5		NE
B	22+00	10	1.5	5.8	4.3		SW
	22+00	25	7.3	8.0	0.7		
	22+00	50	7.7	9.5	1.8		C
	22+00	100	8.2	9.5	1.3		NE
	22+00	175	9.3	9.5	0.2		
	22+00	225	9.4	9.5	0.1		
	22+00	275	10.0	10.0	0.0		
	22+00	300	9.0	9.1	0.1		
	22+00	325	3.0	3.3	0.3		

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Reach	Transect	Distance From Southwest		Water and Sediment		Sediment Thickness (ft)	Sample Location
		Bank (ft)	Water Depth (ft)	Depth (ft)			
B	30+50	10	0.8	5.9	5.1	SW	
	30+50	20	3.1	4.5	1.4		
	30+50	50	6.3	8.3	2.0	C	
	30+50	100	7.0	8.9	1.9		
	30+50	175	8.0	9.1	1.1	NE	
	30+50	225	9.2	9.2	0.0		
	30+50	275	9.2	9.4	0.2		
	30+50	300	8.9	8.9	0.0		
B	36+00	10	2.0	6.0	4.0	SW	
	36+00	20	1.1	5.4	4.3		
	36+00	40	3.4	4.5	1.1		
	36+00	100	4.2	6.0	1.8		
	36+00	150	4.9	7.2	2.3	C	
	36+00	200	6.9	8.0	1.1		
	36+00	250	8.1	9.2	1.1	NE	
	36+00	300	7.5	7.6	0.1		
C	38+50	25	1.2	4.0	2.8	SW	
	38+50	40	2.8	5.1	2.3		
	38+50	75	3.8	7.0	3.2	C	
	38+50	125	5.1	7.4	2.3		
	38+50	200	6.8	8.0	1.2	NE	
	38+50	250	8.7	8.8	0.1		
	38+50	300	2.3	2.3	0.0		
C	45+00	15	3.5	6.5	3.0	SW	
	45+00	40	2.9	5.5	2.6		
	45+00	100	3.8	4.4	0.6		
	45+00	150	4.9	7.8	2.9	C	
	45+00	225	5.5	7.5	2.0	NE	
	45+00	275	5.5	7.5	2.0		
	45+00	325	4.3	4.4	0.1		
	45+00	350	3.5	3.6	0.1		

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Reach	Transect	Distance From Southwest		Water and Sediment		Sediment Thickness (ft)	Sample Location
		Bank (ft)	Water Depth (ft)	Depth (ft)			
D	48+00	20	3.0	4.0	1.0		
	48+00	50	5.1	5.6	0.5		
	48+00	100	6.7	9.0	2.3		SW
	48+00	150	5.6	9.3	3.7		C
	48+00	200	5.7	8.9	3.2		
	48+00	250	6.5	8.0	1.5		NE
	48+00	300	7.2	8.3	1.1		
D	55+00	150	4.0	6.7	2.7		
	55+00	160	7.5	9.5	2.0		
	55+00	170	8.6	11.0	2.4		
	55+00	180	8.9	12.0	3.1		CE
	55+00	210	8.7	10.8	2.1		
	55+00	240	8.4	11.5	3.1		
	55+00	290	8.0	10.4	2.4		
	55+00	340	8.6	10.9	2.3		
	55+00	390	8.4	10.5	2.1		NE
55+00	415	8.5	8.7	0.2			
D	55+00	10	6.1	>18	>11.9		SW-2
	55+00	20	7.0	15.5	8.5		
	55+00	40	6.9	15.0	8.1		
	55+00	60	9.6	>18	>8.4		
	55+00	80	10.1	>18	>7.9		
	55+00	100	8.8	16.0	7.2		
	55+00	140	5.5	13.4	7.9		SW-1

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Reach	Transect	Distance From Southwest		Water and Sediment		Sediment Thickness (ft)	Sample Location
		Bank (ft)	Water Depth (ft)	Depth (ft)			
E	61+50	10	2.8	2.8	0.0		*
	61+50	30	3.4	3.4	0.0		
	61+50	50	3.1	3.1	0.0		
	61+50	70	2.2	2.2	0.0		
	61+50	90	1.6	1.6	0.0		
	61+50	110	0.2	0.2	0.0		
	61+50	130	0.6	0.6	0.0		
	61+50	150	1.3	1.3	0.0		
	61+50	170	1.5	1.5	0.0		
	61+50	190	1.4	1.4	0.0		
	61+50	210	1.9	1.9	0.0		
	61+50	230	1.2	1.2	0.0		
	61+50	250	1.7	1.7	0.0		
	*No samples collected due to no sediment present. Transect is located immediately downstream of Dow.						
E	69+50	20	0.4	0.4	0.0		*
	69+50	40	2.9	2.9	0.0		
	69+50	60	3.5	3.7	0.2		
	69+50	80	4.6	4.7	0.1		
	69+50	100	4.9	5.1	0.2		
	69+50	120	4.9	5.8	0.9		
	69+50	140	4.1	5.2	1.1		NE
	69+50	160	3.9	4.0	0.1		
*One sample collected due to lack of sediment along the transect. Strong water current was present.							
E	74+00	20	0.7	0.7	0.0		
	74+00	40	3.1	3.2	0.1		
	74+00	60	4.5	5.5	1.0		
	74+00	80	6.3	6.5	0.2		
	74+00	100	5.5	6.5	1.0		SW
	74+00	120	4.5	5.8	1.3		
	74+00	140	3.3	5.0	1.7		C
	74+00	160	3.4	4.5	1.1		
	74+00	180	2.2	4.8	2.6		NE
E	80+00	20	2.6	2.6	0.0		
	80+00	40	5.1	5.1	0.0		
	80+00	60	5.6	6.3	0.7		
	80+00	70	4.3	5.1	0.8		SW
	80+00	80	4.0	5.1	1.1		
	80+00	100	3.3	5.6	2.3		C
	80+00	120	4.1	5.7	1.6		
	80+00	140	4.2	5.5	1.3		NE
80+00	160	4.1	4.1	0.0			

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		Bank (ft)	Water Depth (ft)	Depth (ft)			
F	86+00	70	3.7	4.1	0.4		*
	86+00	90	2.7	3.1	0.4		
	86+00	110	2.6	3.0	0.4		
	86+00	130	2.8	3.5	0.7		
	86+00	150	2.8	3.5	0.7		
	86+00	170	3.0	4.0	1.0		C
	86+00	190	2.8	3.7	0.9		
	86+00	210	3.0	4.0	1.0		NE
	86+00	230	2.7	3.6	0.9		
*Two samples collected from Transect.							
F	90+50	10	2.2	3.6	1.4		SW
	90+50	30	2.8	3.2	0.4		
	90+50	50	1.4	1.5	0.1		
	90+50	70	1.2	2.6	1.4		C
	90+50	90	1.2	1.7	0.5		
	90+50	110	1.2	1.8	0.6		
	90+50	130	1.1	2.0	0.9		
	90+50	150	1.0	2.0	1.0		
	90+50	170	1.2	2.0	0.8		
	90+50	190	1.8	2.4	0.6		
	90+50	210	1.9	2.5	0.6		
	90+50	230	2.2	3.2	1.0		
	90+50	250	2.2	3.9	1.7		NE
	90+50	270	2.5	2.7	0.2		
	90+50	290	2.6	3.4	0.8		
	90+50	310	4.2	4.5	0.3		
90+50	330	4.5	4.5	0.0			
F	103+50	25	3.3	3.6	0.3		
	103+50	45	3.5	3.9	0.4		
	103+50	65	3.5	4.6	0.5		
	103+50	85	2.8	4.1	1.3		SW
	103+50	105	2.5	3.6	1.1		
	103+50	125	2.4	3.5	1.1		C
	103+50	145	2.8	4.1	1.3		
	103+50	165	2.5	4.3	1.8		
	103+50	185	2.6	3.8	1.2		NE
	103+50	205	2.7	3.0	0.3		
F	112+50	30	0.9	1.1	0.2		
	112+50	50	3.5	4.1	0.6		
	112+50	70	4.0	5.3	1.3		SW
	112+50	90	4.0	4.8	0.8		
	112+50	110	3.6	5.1	1.4		C
	112+50	130	3.8	4.9	1.1		
	112+50	150	3.9	5.3	1.4		
	112+50	170	3.6	5.2	1.6		
	112+50	190	3.5	5.5	2.0		NE
	112+50	210	3.4	4.3	0.9		
	112+50	230	2.9	3.1	0.2		

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		Bank (ft)	Water Depth (ft)	Depth (ft)			
G	117+00	80	1.2	1.8	0.6		
	117+00	100	3.7	5.2	1.5		SW
	117+00	120	2.6	3.3	0.7		
	117+00	140	3.5	4.7	1.2		
	117+00	160	2.7	3.5	0.8		
	117+00	180	2.8	3.3	0.5		
	117+00	200	2.1	4.1	2.0		C
	117+00	220	1.9	2.9	1.0		
	117+00	240	1.6	3.1	1.5		
	117+00	260	1.2	2.8	1.6		NE
	117+00	280	1.3	2.2	0.9		
G	130+50	30	2.1	2.1	0.0		
	130+50	50	2.6	2.6	0.0		
	130+50	70	2.8	2.8	0.0		
	130+50	90	3.2	3.5	0.3		
	130+50	110	3.0	3.0	0.0		
	130+50	130	3.5	3.5	0.0		
	130+50	150	3.0	4.4	1.4		SW
	130+50	170	2.8	4.6	1.8		
	130+50	190	2.5	4.4	1.9		C
	130+50	210	2.3	3.2	0.9		
	130+50	230	2.1	2.5	0.4		NE
G	135+50	15	2.6	3.0	0.4		
	135+50	35	2.0	3.3	1.3		
	135+50	55	1.4	4.1	2.7		SW
	135+50	75	1.9	3.8	1.9		
	135+50	95	2.5	4.1	1.6		
	135+50	115	2.5	4.4	1.9		C
	135+50	135	3.0	4.2	1.2		
	135+50	155	3.1	4.8	1.7		
	135+50	175	3.0	4.2	1.2		
	135+50	195	2.5	3.5	1.0		NE
	135+50	215	2.5	3.1	0.6		
	135+50	225	2.0	2.2	0.2		
	135+50	235	1.7	2.3	0.5		
	135+50	255	1.9	2.1	0.2		
G	140+00	15	0.2	1.6	1.4		SW
	140+00	35	0.7	1.5	0.8		
	140+00	55	1.5	2.5	1.0		
	140+00	75	2.4	4.4	2.0		
	140+00	95	2.5	4.1	1.6		
	140+00	115	2.3	5.0	2.7		
	140+00	135	2.1	4.5	2.4		C
	140+00	155	2.0	4.0	2.0		
	140+00	175	2.0	4.0	2.0		
	140+00	195	2.6	4.3	1.7		
	140+00	215	3.1	5.8	2.7		
	140+00	235	3.5	5.6	2.1		NE
		140+00	255	3.9	4.1	0.2	

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Reach	Transect	Distance From Southwest		Water and Sediment		Sediment Thickness (ft)	Sample Location
		Bank (ft)	Water Depth (ft)	Depth (ft)			
H	147+00	10	1.4	2.7	1.3		
	147+00	30	2.0	3.7	1.7		SW
	147+00	50	2.3	4.2	1.9		
	147+00	70	2.4	3.6	1.2		
	147+00	90	2.8	4.4	1.6		C
	147+00	110	3.1	4.9	1.8		
	147+00	130	3.1	5.7	2.6		NE
	147+00	150	3.5	4.3	0.8		
	147+00	170	5.3	5.3	0.0		
	147+00	190	5.7	6.0	0.3		
	147+00	210	4.0	4.5	0.5		
H	158+00	30	3.6	3.7	0.1		
	158+00	50	4.2	4.2	0.0		
	158+00	70	2.9	2.9	0.0		
	158+00	90	2.9	2.9	0.0		
	158+00	110	3.1	3.4	0.3		
	158+00	130	3.1	3.8	0.7		SW
	158+00	150	2.9	4.2	1.3		
	158+00	170	2.4	4.4	2.0		C
	158+00	190	2.1	3.2	1.1		
	158+00	210	2.0	3.0	1.0		
	158+00	230	2.2	3.9	1.7		NE
H	162+00	20	2.7	2.7	0.0		
	162+00	40	3.2	3.2	0.0		
	162+00	60	2.6	2.6	0.0		
	162+00	80	2.9	3.0	0.0		
	162+00	100	2.6	3.0	0.4		
	162+00	120	2.5	3.5	1.0		
	162+00	140	2.2	4.0	1.8		SW
	162+00	160	1.5	2.5	1.0		
	162+00	180	1.3	2.2	0.9		
	162+00	200	1.2	3.6	2.4		C
	162+00	220	1.2	3.1	1.9		
	162+00	240	1.2	3.5	2.3		
	162+00	260	2.1	3.8	1.7		
	162+00	280	2.0	4.1	2.1		NE
162+00	300	1.1	2.0	0.9			
162+00	320	1.0	4.0	3.0			

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		Bank (ft)	Water Depth (ft)	Depth (ft)			
I	167+00	90	0.4	1.8	1.4		SW
	167+00	110	1.2	1.6	0.4		
	167+00	130	2.2	3.1	0.9		
	167+00	150	1.1	3.2	2.1		
	167+00	170	1.0	2.5	1.5		
	167+00	190	1.2	2.7	1.5		C
	167+00	210	1.1	1.7	0.6		
	167+00	230	0.8	1.3	0.5		
	167+00	250	0.8	2.5	1.7		
	167+00	270	1.0	2.5	1.5		
	167+00	290	1.8	4.8	3.0		NE
	167+00	310	2.8	5.0	2.2		
	167+00	330	2.6	3.4	0.8		
I	172+00	60	0.4	1.2	0.8		SW
	172+00	80	1.0	3.5	2.5		
	172+00	100	1.7	2.8	1.1		
	172+00	120	1.7	2.8	1.1		
	172+00	140	1.2	3.4	2.2		
	172+00	160	1.0	3.8	2.8		C
	172+00	180	2.7	4.0	1.3		
	172+00	200	2.6	4.2	1.6		NE
	172+00	220	3.0	3.5	0.5		
	172+00	240	1.7	1.8	0.1		
I	177+00	70	0.6	2.4	1.8		SW
	177+00	90	1.9	3.5	1.6		
	177+00	110	2.7	3.9	1.2		C
	177+00	130	3.0	4.7	1.7		
	177+00	150	3.7	4.7	1.0		NE
	177+00	170	4.1	4.5	0.4		
	177+00	190	3.8	3.9	0.1		
	177+00	210	2.9	2.9	0.0		
177+00	230	2.2	2.5	0.3			
I	184+00	75	0.5	4.0	3.5		SW
	184+00	95	1.6	4.0	2.4		
	184+00	115	2.0	4.0	2.0		C
	184+00	135	2.6	4.4	1.8		
	184+00	155	3.1	5.5	2.4		
	184+00	175	3.0	4.4	1.4		NE
	184+00	195	3.5	4.0	0.5		
	184+00	215	3.9	4.1	0.2		
	184+00	235	3.7	3.8	0.1		
	184+00	255	3.0	3.1	0.1		

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Reach	Transect	Distance From Southwest		Water and Sediment		Sediment Thickness (ft)	Sample Location
		Bank (ft)	Water Depth (ft)	Depth (ft)			
J	187+00	10	1.2	1.9	0.7		
	187+00	30	1.1	2.5	1.4		
	187+00	50	1.5	3.9	2.4		SW
	187+00	60	2.0	3.2	1.2		
	187+00	80	1.5	3.2	1.7		
	187+00	100	1.9	3.3	1.4		
	187+00	120	2.2	3.9	1.7		C
	187+00	140	2.1	3.5	1.4		
	187+00	160	2.2	3.9	1.7		
	187+00	180	2.5	3.5	1.0		
	187+00	200	2.2	3.5	1.3		NE
	187+00	220	2.0	3.1	1.1		
	187+00	240	2.3	3.3	1.0		
	187+00	260	1.5	2.2	0.7		
187+00	280	2.1	2.3	0.2			
J	192+00	0	1.2	1.7	0.5		
	192+00	20	2.1	2.8	0.7		
	192+00	40	2.3	2.9	0.6		
	192+00	60	1.7	2.9	1.2		
	192+00	80	1.8	3.6	1.8		SW
	192+00	100	2.0	3.5	1.5		
	192+00	120	2.1	3.6	1.5		
	192+00	140	2.3	5.1	2.8		C
	192+00	160	2.5	3.8	1.3		
	192+00	180	2.4	3.6	1.2		
	192+00	200	1.8	3.1	2.3		
	192+00	220	1.6	3.0	1.4		
	192+00	240	0.6	1.9	1.3		
	192+00	260	0.0	1.5	1.5		
	192+00	280	0.0	2.0	2.0		NE
	192+00	300	0.0	1.0	1.0		
	192+00	320	0.0	0.5	0.5		
192+00	340	0.0	0.8	0.8			

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Reach	Transect	Distance From Southwest		Water and Sediment		Sediment Thickness (ft)	Sample Location
		Bank (ft)	Water Depth (ft)	Depth (ft)			
K	197+00	10	1.0	1.3	0.3		
	197+00	30	2.8	3.5	0.7		
	197+00	50	2.7	3.9	1.2		SW
	197+00	70	3.0	3.3	0.3		
	197+00	90	2.8	3.5	0.7		
	197+00	110	2.5	6.2	3.7		C
	197+00	130	2.2	2.9	0.7		
	197+00	150	1.7	2.6	0.9		
	197+00	170	1.3	3.0	1.7		
	197+00	190	0.1	2.0	1.9		
	197+00	210	0.0	1.2	1.2		
	197+00	230	0.0	2.7	2.7		NE
	197+00	250	0.1	1.5	1.4		
	197+00	270	0.2	1.4	1.2		
	197+00	290	0.1	1.2	1.1		
197+00	310	0.0	0.5	0.5			
197+00	330	0.0	0.2	0.2			
K	206+00	20	2.7	2.7	0.0		
	206+00	40	5.0	5.1	0.1		
	206+00	60	6.7	6.8	0.1		
	206+00	80	7.6	8.0	0.4		
	206+00	100	6.4	8.0	1.6		SW
	206+00	120	4.9	7.0	2.1		
	206+00	140	3.9	5.4	1.5		C
	206+00	160	2.7	4.7	2.0		NE
206+00	180	2.5	3.1	0.6			
K	216+50	20	1.5	3.5	2.0		SW
	216+50	40	5.1	5.7	0.6		
	216+50	60	5.9	6.1	0.2		
	216+50	80	6.5	6.6	0.1		
	216+50	100	6.5	7.5	1.0		
	216+50	120	5.7	7.3	1.6		C
	216+50	140	6.9	8.0	1.1		
	216+50	160	5.7	7.9	2.2		
	216+50	180	5.0	6.7	1.7		NE
	216+50	200	4.9	6.9	2.0		
K	232+00	80	4.7	5.5	0.8		
	232+00	100	4.1	5.7	1.6		SW
	232+00	120	3.8	4.6	1.2		
	232+00	140	3.8	5.0	1.2		
	232+00	160	3.8	5.5	1.7		
	232+00	180	3.9	6.0	2.1		
	232+00	200	3.5	7.4	3.9		C
	232+00	220	3.1	6.3	3.2		
	232+00	240	3.0	6.1	3.1		
	232+00	260	2.1	5.4	2.3		NE
	232+00	280	2.2	3.9	1.7		

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Reach	Transect	Distance From Southwest		Water and Sediment		Sediment Thickness (ft)	Sample Location
		Bank (ft)	Water Depth (ft)	Depth (ft)			
L	239+00	40	0.9	2.3	1.4	SW	
	239+00	60	1.3	2.4	1.1		
	239+00	80	2.5	4.0	1.5	C	
	239+00	100	2.5	3.5	1.0		
	239+00	120	3.9	5.3	1.4		
	239+00	140	4.0	5.5	1.5	NE	
	239+00	160	2.8	3.8	1.0		
	239+00	180	2.2	2.5	0.3		
L	246+00	25	1.5	4.0	2.5	SW	
	246+00	45	2.5	3.5	1.0		
	246+00	65	2.7	3.7	1.0		
	246+00	85	3.5	5.7	2.2	C	
	246+00	105	3.5	5.1	1.6		
	246+00	125	3.7	5.8	2.1		
	246+00	145	3.7	4.9	1.2		
	246+00	165	2.7	3.8	1.1	NE	
	246+00	185	2.6	2.7	0.1		
246+00	205	2.6	2.8	0.2			
L	252+00	25	2.5	4.2	1.7		
	252+00	45	2.0	4.0	2.0	SW	
	252+00	65	2.0	2.9	0.9		
	252+00	85	2.0	3.5	1.5		
	252+00	105	1.9	3.6	1.7	C	
	252+00	125	2.0	3.0	1.0		
	252+00	145	2.5	3.8	1.3		
	252+00	165	2.6	3.8	1.2	NE	
	252+00	185	3.8	4.2	0.4		
	252+00	205	3.7	4.7	1.0		
252+00	215	1.0	3.2	2.2			
L	258+50	0	1.5	2.9	1.4		
	258+50	20	1.1	2.5	1.4		
	258+50	40	1.5	2.6	1.1		
	258+50	60	1.8	4.1	2.3	SW	
	258+50	80	1.8	3.4	1.6		
	258+50	100	1.1	1.5	0.4		
	258+50	120	1.4	3.4	2.0		
	258+50	140	1.5	2.9	1.4		
	258+50	160	1.3	3.0	1.7	C	
	258+50	180	1.4	2.8	1.4		
	258+50	200	1.3	3.1	1.8		
	258+50	220	1.2	2.1	0.9		
	258+50	240	1.9	3.2	1.3	NE	
	258+50	260	3.0	3.9	0.9		
258+50	280	3.0	3.2	0.2			

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Reach	Transect	Distance From Southwest		Water and Sediment		Sediment Thickness (ft)	Sample Location
		Bank (ft)	Water Depth (ft)	Depth (ft)			
M	262+00	20	2.5	5.9	3.4	SW	
	262+00	40	3.5	5.7	2.2		
	262+00	60	2.5	4.1	1.6	C	
	262+00	80	3.8	4.7	0.9		
	262+00	100	3.8	4.8	1.0	NE	
	262+00	120	3.5	4.0	0.5		
	262+00	140	3.6	3.8	0.2		
	262+00	160	3.5	3.6	0.1		
	262+00	180	3.0	3.9	0.9		
M	268+00	10	1.2	2.8	1.6		
	268+00	30	1.9	3.5	1.6	SW	
	268+00	50	2.0	3.5	1.5		
	268+00	70	1.4	3.0	1.6		
	268+00	90	1.9	3.5	1.6		
	268+00	110	2.5	4.1	1.6	C	
	268+00	130	3.7	4.9	1.2		
	268+00	150	3.7	6.1	2.4	NE	
	268+00	170	3.6	4.8	1.2		
	268+00	190	3.0	3.9	0.9		
	268+00	210	3.0	3.3	0.2		
	268+00	230	2.8	3.0	0.2		
M	276+00	50	3.5	4.0	0.5		
	276+00	70	3.4	4.5	1.1	SW	
	276+00	90	2.9	5.2	2.3		
	276+00	110	3.5	6.0	2.5	C	
	276+00	130	2.7	5.1	2.4		
	276+00	150	2.6	4.8	2.2	NE	
	276+00	170	2.4	3.1	0.7		
	276+00	190	2.2	3.1	0.9		
	276+00	210	1.9	3.0	1.1		
	276+00	230	1.5	2.0	0.5		
M	284+00	15	1.9	2.0	0.1		
	284+00	35	2.5	2.5	0.0		
	284+00	55	3.6	3.6	0.0		
	284+00	75	3.2	3.3	0.1		
	284+00	95	3.4	3.6	0.2		
	284+00	115	3.6	3.8	0.2		
	284+00	135	4.0	5.4	1.4	SW	
	284+00	155	4.0	5.0	1.1		
	284+00	175	4.0	5.2	1.2		
	284+00	195	3.9	5.0	1.1	C	
	284+00	215	2.9	4.0	1.1		
	284+00	235	2.6	3.8	1.2		
	284+00	255	2.1	3.7	1.6	NE	

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Reach	Transect	Distance From Southwest		Water and Sediment		Sediment Thickness (ft)	Sample Location
		Bank (ft)	Water Depth (ft)	Depth (ft)			
N	290+50	20	3.9	3.9	0.0		
	290+50	40	5.7	5.8	0.1		
	290+50	60	5.0	6.0	1.0		SW
	290+50	80	4.7	5.8	1.1		
	290+50	100	4.8	6.8	2.0		C
	290+50	120	4.8	6.1	1.3		
	290+50	140	4.6	5.3	0.7		
	290+50	160	4.4	6.2	1.8		NE
	290+50	180	4.0	5.9	1.9		
N	297+00	20	3.5	3.8	0.3		
	297+00	40	3.1	3.8	0.7		
	297+00	60	3.1	3.8	0.7		
	297+00	80	3.1	3.7	0.6		
	297+00	100	2.9	3.8	0.9		SW
	297+00	120	3.0	4.3	1.3		
	297+00	140	3.1	5.7	2.6		C
	297+00	160	3.1	4.0	0.9		
	297+00	180	3.0	4.1	1.1		NE
N	305+00	20	2.8	4.1	1.3		
	305+00	40	3.0	4.1	1.1		SW
	305+00	60	4.0	4.9	0.9		
	305+00	80	4.0	7.5	3.5		C
	305+00	100	3.7	4.9	1.2		
	305+00	120	4.3	5.3	1.0		NE
	305+00	140	5.1	5.7	0.6		
	305+00	160	3.7	3.7	0.0		
	305+00	180	1.8	1.8	0.0		
N	316+00	80	4.0	4.9	0.9		
	316+00	100	5.0	6.7	1.7		
	316+00	120	4.9	7.0	2.1		SW
	316+00	140	5.2	6.7	1.5		
	316+00	160	5.0	6.7	1.7		C
	316+00	180	4.9	6.0	1.1		
	316+00	200	4.6	6.0	1.4		NE*
	316+00	220	5.1	6.0	0.9		
	316+00	240	4.5	4.8	0.3		

\* Low Recovery due to high gravel content

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Reach	Transect	Distance From Southwest		Water and Sediment		Sediment Thickness (ft)	Sample Location
		Bank (ft)	Water Depth (ft)	Depth (ft)			
O	322+50	20	0.9	0.9	0.0		
	322+50	40	2.8	2.8	0.0		
	322+50	60	3.0	3.3	0.3		
	322+50	80	4.6	4.7	0.1		
	322+50	100	4.2	5.3	1.1		
	322+50	120	3.9	5.6	1.7		SW
	322+50	140	2.9	3.5	0.6		
	322+50	160	2.3	3.0	0.7		
	322+50	180	1.9	2.6	0.7		C
	322+50	200	2.3	3.0	0.7		
	322+50	220	2.5	3.5	1.0		
	322+50	240	2.4	4.0	1.6		NE
	O	327+50	20	2.1	2.2	0.1	
327+50		40	3.0	3.1	0.1		
327+50		60	3.7	4.0	0.3		SW
327+50		80	4.4	4.7	0.3		
327+50		100	4.2	4.8	0.6		
327+50		120	3.2	4.1	0.9		C
327+50		140	2.5	3.0	0.5		
327+50		160	2.3	3.2	0.9		
O	333+00	20	2.1	2.1	0.0		
	333+00	40	2.5	2.6	0.1		
	333+00	60	2.7	2.9	0.2		
	333+00	80	4.0	5.5	1.5		
	333+00	100	4.2	5.5	1.3		SW
	333+00	120	3.8	4.4	0.6		
	333+00	140	3.4	3.9	0.5		C
	333+00	160	3.5	4.0	0.5		
	333+00	180	3.5	4.5	1.0		NE