



December 17, 2021

Kevin Slovarp, P.E.
City of Missoula Engineer
Sent Via Email

Re: Mullan Road at Chuck Wagon Drive Road Widening Improvements Project
City Project No. 2019-013
Amendment Request No. 3 - Path Widening, Additional Project Management, and Changes to Project Limits

Dear Kevin:

WGM Group, Inc. (WGM) has been requested to perform additional Preliminary Engineering (PE) services for the above referenced project that are necessary for the completion of the project but are beyond the original agreed upon scope and budget, as amended. These services will be completed by WGM and/or its subconsultants and were unforeseeable at the time the original project scope and previous amendments were prepared. A detailed cost estimate is attached.

Out of Scope Work

The City directed that the design of the shared-use path be modified to include a 10-foot wide path instead of the 8-foot originally incorporated in the project plans. The limits of this path widening include those areas where the path was disturbed by the road project (as originally designed), not the entire length of the project. This path widening was requested by Missoula County during final plans review and the City agreed that where the path is being relocated and reconstructed, it should meet current width standards. Widening the path affects path design and typical section, grading, drainage, plan sheets, cross-sections, and quantities. Effort is also required to determine whether the improvements associated with the widened path can be completed within the existing right-of-way and whether construction easements will be required.

As a result of the proposed path widening and associated changes to grading slopes and drainage ditches, the utility coordination exhibit previously prepared by WGM showing existing/construction/final grades over underground utilities must be revised.

Additionally, the City requested assistance in evaluating the concept of extending the entire two-way-left-turn-lane (TWLTL) road-widening project further to the east to tie into improvements being designed at the Mullan and George Elmer intersection as part of the Mullan BUILD project. The City requested WGM to explore the opportunities and challenges of such an extension; prepare an exhibit illustrating how the two projects currently fit together, the gap between the projects, tapers, etc.; provide a rough estimate of construction costs for the extension; address City questions about the project history, how the current project began and end points were established, why a TWLTL was selected, whether MDT would allow a simple turn lane, etc.; and prepare email summaries addressing each of these items.

Also, MDT requested a revision of the storm water analysis memorandum addressing changes to the drainage and hydraulics patterns related to the relocation of proposed drywell sumps at the intersection of Chuck Wagon Drive and Mullan Road.

Further, the City recently received approval from MDT for a concept whereby the TWLTL on Mullan Road would be achieved, not by widening the road as provided for in the current design plans, but instead by restriping the road with narrower shoulders to achieve the TWLTL within the existing asphalt width. At the same time, the City directed that the TWLTL striping be extended further west than the current project limits, tying to the existing TWLTL striping on Mullan Road at the Hellgate Trading Post, and also further east than the current project limits, tying to the anticipated west end of the future Mullan BUILD project improvements at George Elmer Drive. (For the purposes of this amendment request it is assumed that construction of this project will occur before construction of the BUILD project). This change in the approach to achieving the TWLTL on Mullan Road will cause the majority of the Mullan Road widening currently included in the design and shown in the project plans to have to be “noted out” or in some other way indicated as being NIC (not in contract). It will not be deleted from the design or the plans. This change will not impact the right-turn taper into Chuck Wagon Drive nor the path reconstruction in the immediate vicinity of the Chuck Wagon Drive intersection, each of which are to be constructed as currently designed to ensure that a future project to physically widen Mullan Road can be accomplished without disrupting these improvements. WGM will modify the entire current PS&E set to represent improvements that include only those in the following list. It is presently anticipated that the original design will continue to be shown in the plans, with the area to be constructed highlighted in some manner and new transitions designed to the path, grading, drainage, road widening, etc. to ensure that the improvements tie to match the existing infrastructure and surrounding field conditions.

1. Removal of the existing Hiawatha Road and Roundup Drive approaches as well as the existing private approach east of Chuck Wagon Drive
2. Completion of the connection of Chuck Wagon Drive to Mullan Road including radius returns and the 10:1 right-turn taper on westbound Mullan Road
3. Grading and drainage improvements limited to the areas impacted in Nos. 1 and 2 above, to include the new sump left of station 108+61
4. Path reconstruction from approximately Hiawatha Road to the approach to be eliminated east of Chuck Wagon (the new path will be 10-foot wide and there will be a short taper on each end to match the existing 8-foot path and tie to existing grade)
5. Signing and striping plans for Mullan Road from approximately the Hellgate Trading Post to the west limit of the Mullan BUILD project

The planned approach to plan preparation for this design change is to use the current plan set and grayscale/highlight and/or note-out those portions of the plans that will not be constructed with this project. This will also require turning off the final-design grading currently shown in the plans and displaying new interim design grading contours in the widening area. To extend the striping plans to the west will also require the collection of a small amount of additional field mapping (existing asphalt edge and pavement markings) to ensure that we match and tie into the existing striping with a level of accuracy needed for MDT approval. As discussed with the City, this will be a Stage 4 submittal for final City and MDT approval.

Lastly, the original work scope for this project anticipated completion of all design and construction administration services by the end of December, 2020. The project schedule has been extended and completion of the design phase is now not anticipated until the end of 2021. As a result, additional budget is requested for project management activities through the end of 2021 such as monthly reports, coordination with the City, scheduling, and general project oversight. Per agreement between WGM and the City, the extended project management

budget request is made up of two components, estimated hours through the end of 2021 (starting from when this Amendment was first initiated in March 2021), plus the actual amount by which project management tasks are currently over budget (as of March 2021). This latter portion is to cover added project management activities which already occurred prior to the original start of this amendment request and is shown as a lump sum in the "Other" column of the attached spreadsheet.

Fee Estimate

The estimated fee for the additional PE services listed above is \$43,192 using WGM's 2021 billing rates. The City also agreed that the budget for upcoming Construction Engineering (CE) services (Phases 12 and 13 of the original work scope) should be adjusted to reflect WGM's 2021 billing rates, rather than the 2020 rates used to establish the original project budget for these services. (Construction is expected to occur in 2022, but both parties agreed to use 2021 rates). This results in a budget increase of \$2,291 for Phase 12 and 13 services (Advertising and Bidding, & Construction Services).

The current contract amount is \$156,243. With this Amendment Number 3 added, the new contract amount will be \$201,726.

We request that the City prepare a contract amendment document for signature by both parties.

Sincerely,
WGM Group, Inc.



Mark Bancale, P.E., PTOE
PROJECT MANAGER

Encl.

Professional Services Estimate - Amendment Request No. 3

Project Name: **Mullan Road at Chuck Wagon Drive Road Widening Project**

Project #: **19-10-10**

Client: **City of Missoula**

Date: **10/1/2021**



DIRECT LABOR	Phase 01		Phase 02		Phase 03		Phase 04		Phase 05		Phase 06		Phase 07		Phase 08		Phase 09		Phase 10		Phase 11		Phase 12		Phase 13		TOTAL	
	PROJECT SCOPING & MANAGEMENT		SURVEY		PUBLIC OUTREACH		REVIEW CONCEPT PLANS WITH MDT		MOU		ENVIRONMENTAL ANALYSIS		GEOTECH		UTILITY COORDINATION		PRELIMINARY PLANS		PLAN REVIEW		FINAL PLANS PREPARATOIN		ADVERTISING AND BIDDING		CONSTRUCTION SERVICES			
	Hours	Total \$	Hours	Total \$	Hours	Total \$	Hours	Total \$	Hours	Total \$	Hours	Total \$	Hours	Total \$	Hours	Total \$	Hours	Total \$	Hours	Total \$	Hours	Total \$	Hours	Total \$	Hours	Total \$	Hours	Total \$
Sr Principal Engineer	2	\$416																									2	\$ 416
Senior Consultant																												
Principal Engineer																												
Sr Project Engineer	2	\$316									1	\$158									12	\$1,896					15	\$ 2,370
Sr Traffic Engineer	55	\$8,910												1	\$162						56	\$9,072					112	\$ 18,144
Sr Transportation Engineer 2																												
Project Engineer	8	\$1,096									16	\$2,192			3	\$411					87	\$11,919					114	\$ 15,618
Sr Const Project Manager																												
Const Project Manager	2	\$298												1	\$149						4	\$596					7	\$ 1,043
Land Surveyor 3																					2	\$298					2	\$ 298
2-Person Crew																					6	\$1,062					6	\$ 1,062
Sr CADD Drafter																					4	\$464					4	\$ 464
Project Assistant 1	9	\$792									2	\$176															11	\$ 968
Admin. Assistant																												
Accounting	1	\$130																									1	\$ 130
TOTAL LABOR	79	\$ 11,958		\$ -		\$ -		\$ -		\$ -	19	\$ 2,526		\$ -	5	\$ 722		\$ -		\$ -	171	\$ 25,307		\$ -		\$ -	274	\$ 40,513

DIRECT EXPENSES	Phase 01	Phase 02	Phase 03	Phase 04	Phase 05	Phase 06	Phase 07	Phase 08	Phase 09	Phase 10	Phase 11	Phase 12	Phase 13	TOTAL
Sub-consultants	-	-	-	-	-	-	-	-	-	-	-	-	-	\$ -
Copies / Prints	-	-	-	-	-	-	-	-	-	-	-	-	-	\$ -
Mileage	-	-	-	-	-	-	-	-	-	-	-	-	-	\$ -
Lodging / Per Diem	-	-	-	-	-	-	-	-	-	-	-	-	-	\$ -
Fees / Permits	-	-	-	-	-	-	-	-	-	-	-	-	-	\$ -
Survey Equipment	-	-	-	-	-	-	-	-	-	-	-	-	-	\$ -
Technology Fee	32.00	-	-	-	-	-	-	12.00	-	-	364.00	-	-	\$ 408.00
Other	2,271.00	-	-	-	-	-	-	-	-	-	-	-	-	\$ 2,271.00
TOTAL DIRECT EXPENSES	\$ 2,303.00	\$ -	\$ 12.00	\$ -	\$ -	\$ 364.00	\$ -	\$ -	\$ 2,679.00					

SUMMARY	Phase 01	Phase 02	Phase 03	Phase 04	Phase 05	Phase 06	Phase 07	Phase 08	Phase 09	Phase 10	Phase 11	Phase 12	Phase 13	TOTAL
Hours	79.0					19.0		5.0			171.0			274.0
Labor	\$ 11,958.00	\$ -	\$ -	\$ -	\$ -	\$ 2,526.00	\$ -	\$ 722.00	\$ -	\$ -	\$ 25,307.00	\$ -	\$ -	\$ 40,513.00
Expenses	\$ 2,303.00	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 12.00	\$ -	\$ -	\$ 364.00	\$ -	\$ -	\$ 2,679.00
TOTAL	\$ 14,261.00	\$ -	\$ -	\$ -	\$ -	\$ 2,526.00	\$ -	\$ 734.00	\$ -	\$ -	\$ 25,671.00	\$ -	\$ -	\$ 43,192.00

Amendment Request No. 3

Project Name: **Mullan Road at Chuck Wagon Drive Road Widening Project**
 Project #: **19-10-10**
 Client: **City of Missoula**
 Date: **10/01/21**



		SR. PRINCIPAL ENGINEER	SR PRJCT ENGINEER	SR TRAFFIC ENGINEER	PROJECT ENGINEER	CONST PROJ MGR	LAND SURVEYOR 3	2-PERSON SURVEY CREW	SR CADD DRAFTER	PROJECT ASSISTANT 1	ACCOUNTANT	COPIES & PRINTS	MILEAGE	TECHNOLOGY FEE	OTHER	LABOR	CONSULTANTS	EXPENSES	TOTAL	NOTES	
BILLING RATE:		208	158	162	137	149	149	177	116	88	130										
Phase 01	PROJECT SCOPING & MANAGEMENT																				
1.01	Activities, Scope & Cost		2.0	12.0	8.0	2.0				2.0				\$ 32.00		\$ 3,830.00		\$ 32.00	\$ 3,862.00		
1.02	Negotiations and Project Agreement			8.0						2.0	1.0			\$ -		\$ 1,602.00		\$ -	\$ 1,602.00		
1.03	Monthly Reports			20.0						5.0				\$ -		\$ 3,680.00		\$ -	\$ 3,680.00		
1.04	Coordination with City and MDT	2.0		10.0										\$ -		\$ 2,036.00		\$ -	\$ 2,036.00		
1.05	Schedule			5.0										\$ -		\$ 810.00		\$ -	\$ 810.00		
														\$ 2,271.00				\$ 2,271.00	\$ 2,271.00		
SUBTOTAL		2.0	2.0	55.0	8.0	2.0				9.0	1.0			\$ -	\$ -	\$ 32.00	\$ 2,271.00	\$ 11,958.00	\$ -	\$ 2,303.00	\$ 14,261.00
Phase 06	ENVIRONMENTAL ANALYSIS																				
6.03	Hydraulic Report		1.0		16.0					2.0				\$ -		\$ 2,526.00		\$ -	\$ 2,526.00		
SUBTOTAL			1.0		16.0					2.0				\$ -	\$ -	\$ -	\$ -	\$ 2,526.00	\$ -	\$ -	\$ 2,526.00
Phase 08	UTILITY COORDINATION																				
8.04	S.U.E.II Services			1.0	3.0	1.0								\$ 12.00		\$ 722.00		\$ 12.00	\$ 734.00		
SUBTOTAL				1.0	3.0	1.0								\$ -	\$ -	\$ 12.00	\$ -	\$ 722.00	\$ -	\$ 12.00	\$ 734.00
Phase 11	FINAL PLANS PREPARATOIN																				
11.07	Path Widening		5.0	7.0	24.0									\$ 96.00		\$ 5,212.00		\$ 96.00	\$ 5,308.00		
11.08	Initial Evaluation of Project Extension		3.0	13.0	3.0									\$ 12.00		\$ 2,991.00		\$ 12.00	\$ 3,003.00		
11.09	Design & Plan Changes for New Approach to TWLTL		4.0	36.0	60.0	4.0	2.0	6.0	4.0					\$ 256.00		\$ 17,104.00		\$ 256.00	\$ 17,360.00		
SUBTOTAL			12.0	56.0	87.0	4.0	2.0	6.0	4.0					\$ -	\$ -	\$ 364.00	\$ -	\$ 25,307.00	\$ -	\$ 364.00	\$ 25,671.00
PROJECT TOTALS		2.0	15.0	112.0	114.0	7.0	2.0	6.0	4.0	11.0	1.0			\$ -	\$ -	\$ 408.00	\$ 2,271.00	\$ 40,513.00	\$ -	\$ 2,679.00	\$ 43,192.00

*As of March 2021