



Montana Department of Transportation

2701 Prospect Avenue
PO Box 201001
Helena MT 59620-1001

Jim Lynch, Director
Brian Schweitzer, Governor

RECEIVED

October 21, 2005

OCT 28 2005

ENVIRONMENTAL QUALITY COUNCIL
Capitol Station
Helena, MT 59620

LEGISLATIVE ENVIRONMENTAL
POLICY OFFICE

Subject: Statewide Pavement Preservation Projects Concurrence

**SFCS 248-6(7) 27
Peerless - East
CN 5800**

The Environmental Services Bureau of the Montana Department of Transportation has reviewed the Preliminary Field Review/Scope of Work Report and the Environmental Checklist for Pavement Preservation Projects. We have determined that the Statewide PCE for these types of projects would cover this project.

I have attached the Preliminary Field Review/Scope of Work Report, Checklist and the location map for your information.

If you have any questions concerning this letter, please contact me at 444-0456.

Thomas L. Hansen, P.E.
Engineering Section Supervisor
Environmental Services Bureau

Attachments:

tlh:s:\Projects\Glendive\5800ENPCE EQC Pave Pres Cover Ltr.DOC

Copies: Ray Mengel – Glendive District Administrator
Jean A. Riley, P.E. – Environmental Services
Paul Ferry, P.E. - Highway Engineer
Mark Wissinger, P.E. - Construction
Gene Kaufman, P.E. - FHWA
Suzy Althof - Contract Plans
Dave Jensen - Fiscal Planning
File

(FOR PROJECTS WITH NO RIGHT-OF-WAY INVOLVEMENT)

Applicant cannot be authorized to proceed with the proposed work until ALL of the conditions of the checklist have been satisfied

ENVIRONMENTAL CHECKLIST FOR PAVEMENT PRESERVATION PROJECTS (CRACK SEALING, SEAL & COVER, THIN OVERLAYS, MILL & FILL, PLANT MIX LEVELING, MILL OGFC, MICRO SURFACING, FOG SEAL)

Project No.: 5800000 ID: SFCS 248-6(7)27 Project Name: Peerless-East

MASTER FILE COPY

Reference Post (Station) 27.557 to Reference Post (Station) 36.533

Applicants Name: MT DOT Address: 2701 Prospect Ave. Helena, MT 59620

Type of Proposed Pavement Preservation Activity: Thin Lift Overlay, Pavement Markings

Table with 3 columns: Impact Questions, Yes, No. Rows include questions about river impacts, threatened species, water quality, wetlands, hazardous waste, and Indian Reservations.

8. Magnitude and significance of potential impacts: To be completed by applicant. The proposed project does not have any potential impacts, and the Statewide Programmatic Categorical Exclusion for Pavement Preservation projects is the appropriate Environmental Document for the proposed work.

Checklist prepared by:

Kevin J. Gilbert, PE Applicant (Design Project Manager) Approved by: [Signature] Environmental Services Glendive District Project Design Engineer Title ENVIRONMENTAL ENGINEERING SECTION SUPERVISOR Date 10/13/05 10/21/05'

(when items 1, 2, 3, 3a, 4, 4a, 4b, 5, 6, 6a, or 7 are checked "Yes")

- A. The applicant shall complete the checklist indicating a "Yes" or "No" for each item, except number 8 which may require a narrative response.
- B. When a "Yes" is indicated on any number of items 1 through 7, MDT must explain why and provide the appropriate documentation, evaluation, permit, and/or mitigation measures required to satisfy environmental concerns for the project. Use attachments if necessary.
- C. If the applicant checks "Yes" for any one item, the checklist and MDT's mitigation proposal, documentation, evaluation and/or permit shall be submitted to MDT Environmental Services. Contact Number 444-7228.
- D. When the applicant checks a "Yes" item, MDT cannot be authorized to proceed with the proposed work until Environmental Services reviews the information and signs the checklist.
- E. MDT will obtain all necessary permits or authorizations from other entities with jurisdiction prior to beginning the Pavement Preservation Activity.

Montana's Wild and/or Scenic Rivers system as published by the U.S. DEPARTMENT OF AGRICULTURE (USDA), or the U.S. DEPARTMENT OF THE INTERIOR (DOI)

- 1. Middle Fork of the Flathead River (headwaters to South Fork of the Flathead River confluence)
- 2. North Fork of the Flathead River (Canadian Border to Middle Fork of the Flathead River confluence)
- 3. South Fork of the Flathead River (headwaters to Hungry Horse Reservoir)
- 4. Missouri River (Fort Benton to Charles M. Russell National Wildlife Refuge)



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PO Box 201001
Helena, MT 59620-1001

Memorandum

To: Paul Ferry, P. E.
Highways Engineer

From: Damian Krings, P. E. *DMK*
Road Design Engineer

Date: October 13, 2005

Subject: **SFCS 248-6(7)27**
Peerless East
Control No. 5800000
Work Type 180

This is a combined Preliminary Field Review & Scope of Work Report

We request that you approve the Preliminary Field Review/Scope of Work Report for the subject project.

Approved *Paul Ferry* Date 10-17-05
Paul Ferry, P.E.
Highways Engineer

We are requesting comments from the following individuals, who have also received a copy of the Report. We will assume their concurrences if no comments are received by two weeks from the above, signed date. **The report is also being distributed under a separate cover as a Scope of Work Report for comments and approval.**

Distribution:

P. Ferry, Highways	P. A. Jomini, Safety	J. A. Walther, Engineering
Damian Krings, Road Design	B. A. Larsen, Survey	R. Jackson, Geotechnical
M. A. Goodman, Hydraulics	Susan Rowell, Proj. Mngmnt	Susan Sillick, Research
Danielle Bolan, Traffic	B. F. Juvan, Proj. Mngmnt	

cc: D. W. Jensen, Fiscal Programming
Highways File

DMK:rap:5800000rdpfrsow.doc

Combined Preliminary Field Review And Scope of Work Report

Traffic Data

2005 ADT = 340 Present
2006 ADT = 350 Letting Date
2026 ADT = 420 Design Year
DHV = 60
D = _____ %
T = 7.6 %
EAL = 11
AGR = 1.0 %

Accident History

The following information is summarized from Safety Management's memo dated August 15, 2005:

The analysis covers S-248, between RP 27.557 and 36.553 for the period 1/1/1995 – 12/21/2004.

ENGINEERING STUDY EVALUATION

DESCRIPTION: PEERLESS-EAST

ROUTE & RP: S-248, RP 27.557-36.553

DATA TIME FRAME: 1-1-1995 to 12-31-2004

STATEWIDE AVERAGE FOR SECONDARY

STUDY AREA

ALL VEHICLES ACCIDENT RATE:	<u>1.73</u>	<u>0.89</u>
ALL VEHICLES SEVERITY INDEX:	<u>2.39</u>	<u>3.00</u>
ALL VEHICLES SEVERITY RATE:	<u>4.16</u>	<u>2.67</u>
TRUCK ACCIDENTS		<u>0</u>
TOTAL RECORDED ACCIDENTS:		<u>11</u>

I. VARIATIONS FROM AVERAGE OCCURRENCE:

- 27% of accidents occurred at "dawn", compared to the statewide average of 3% occurring at this time.
- 27% of accidents involved non-incapacitating injuries, compared to the statewide average of 15%.
- 36% of accidents happened on "wet" or "snow or slush" road conditions, compared to the statewide average of 2%.
- 27% of accidents took place with "fog, smog, smoke" conditions present, compared to the statewide average of 2%.
- 73% of recorded crashes were "off-road".

II. ACCIDENT CLUSTERS AND SAFETY PROJECTS:

S-248 between RP 27.557 and 36.553 has not been part of an accident cluster or safety project within the data time frame.

III. REMARKS:

Seven of eleven (64%) recorded crashes cite "overturn" as first and most harmful event. Check bridge rail near RP 35.6. *The bridge rail will be upgraded with this project.*

Combined Preliminary Field Review And Scope of Work Report

Combined Preliminary Field Review And Scope of Work Report

A preliminary field review was held May 9, 2005 for this project. The following attended:

- Kevin Gilbert, P. E., Acting Glendive Project Design Manager-Helena
- Jim Frank, P. E., Engineering Services Supervisor-Glendive
- Larry Sickerson, Environmental-Helena
- Dan Hill, Pavement Management-Helena
- Gerry Brown, Engineering Oversight-Lewistown
- Randy Pisk, Construction-Wolf Point
- Bill Juve, Wolf Point Maintenance Chief

Scope of Work

The scope of work is pavement preservation 0.20' thin lift overlay, seal and cover (type 1), upgrade guardrail, delineation, and pavement markings. The Helena Road Design Section will design this project. This project will be developed in English units.

Project Location and Limits

- Location: Daniels County, on S 248/Montana 248, in the following townships, ranges, and sections:
T 35 N; R 45 E, sections 1, 2, 3, 10, 11, 12
T 35 N; R 46 E, sections 1, 2, 3, 4, 5, 6, 7, 8, 9, 10, 11, 12
- Begin: RP 27.557, as-built station 537+99.2 on S 8(10), 1962
- End: RP 36.533, as-built station 1011+93.5 on S 8(10), 1962
- Length: 8.976 miles

See map at the end of this report.

Physical Characteristics

1. Existing widths:

RP 27.557 to RP 36.533 28.0 ft

Note: This roadway is classified as a minor arterial. This road was constructed with a 28' surface width; this will be narrowed up to a 26' top with 4:1± surfacing inslopes.

2. Existing Geometrics: The terrain is level. Functional Classification: minor arterial. The horizontal and vertical alignments will be perpetuated for this project.

3. PvMS Index Numbers & Recommended Treatments for 2005:

<u>Section</u>	<u>Ride</u>	<u>Rut</u>	<u>ACI</u>	<u>MCI</u>	<u>Construction</u>	<u>Maintenance</u>
RP 27.557 to RP 36.533	73.8	75.8	89.1	56.9	Minor rehabilitation	Reactive Maintenance

4. As-Built Road Plans

S 8 (10), 1962

ed Preliminary Field Review And Scope of Work Report

Design Features:

way's functional classification is minor arterial, but is considered a rural collector road for design it being a secondary in a rural location with low traffic volumes.

Speed

According to Geometric Design Criteria for Rural Collector Roads (Secondary System) for level

Horizontal and Vertical Alignments

is level and there are no horizontal curves. Both the horizontal and vertical alignments will be on this project.

Surface Treatments

The 0.20' plant mix overlay* will be placed the full width of the typical section to a 26' surface with 4:1 surfacing inslopes. Cold milling will be done at the connection at the end of the project. There will be no connection at the beginning of the project as it will tie in with the East of Glentana East Project STPS 248-2(5)12.

The surfacing will be feathered 120' into the public approach rt. at RP 27.557 (Peerless intersection.)

is an isolation lift.

will be upgraded at the bridge at RP 35.71 using box beam guardrail. There is no other guardrail on this project.

Rumble Strips

no existing rumble strips and the finished width will be too narrow to install any.

Special Considerations

Special considerations are anticipated on this project.

Surface Condition

Surface has been crack sealed. Surface distortions will receive leveling.

Special

Special considerations are anticipated on this project.

the bridge on this project: S00248035+07101 Spring Creek, Timber deck, asphalt surface

The timber bridge at RP 35.71 will be cold milled to a depth of 0.20' from a point 120' before the structure, through and to 120' past the structure then receive the 0.20' PMS overlay.

The Bridge Bureau has approval for box beam bridge rail mounted to timber structures. Box Beam guardrail will be used.

and Preliminary Field Review And Scope of Work Report

Design Features:

Highway's functional classification is minor arterial, but is considered a rural collector road for design it being a secondary in a rural location with low traffic volumes.

Speed

According to Geometric Design Criteria for Rural Collector Roads (Secondary System) for level

Horizontal and Vertical Alignments

Highway is level and there are no horizontal curves. Both the horizontal and vertical alignments will remain as-is on this project.

Surface Treatments

The 0.20' plant mix overlay* will be placed the full width of the typical section to a 26' surface with 4:1 surfacing inslopes. Cold milling will be done at the connection at the end of the project. There will be no connection at the beginning of the project as it will tie in with the East of Glentana East Project STPS 248-2(5)12.

The surfacing will be feathered 120' into the public approach rt. at RP 27.557 (Peerless intersection.)

There is an isolation lift.

The bridge will be upgraded at the bridge at RP 35.71 using box beam guardrail. There is no other guardrail on this project.

Rumble Strips

There are no existing rumble strips and the finished width will be too narrow to install any.

Special Considerations

Technical considerations are anticipated on this project.

Surface Condition

The surface has been crack sealed. Surface distortions will receive leveling.

Notes

Technical considerations are anticipated on this project.

The timber bridge on this project: S00248035+07101 Spring Creek, Timber deck, asphalt surface

The timber bridge at RP 35.71 will be cold milled to a depth of 0.20' from a point 120' before the structure, through and to 120' past the structure then receive the 0.20' PMS overlay.

The Bridge Bureau has approval for box beam bridge rail mounted to timber structures. Box Beam guardrail will be used.

Combined Preliminary Field Review And Scope of Work Report

Approaches

1. Private and public approaches will be paved to R/W line.
2. Farm field approaches will be paved with a 12' strip.
3. The turn to Peerless will receive seal and cover.

Traffic & Safety

The existing pavement marking layout will be used to re-stripe the roadway. Delineators will be included with this project.

Pedestrian/Bicycle/ADA

This project will not include pedestrian, bicycle, or ADA facilities.

Design Exceptions

No design exceptions are required for pavement preservation projects.

Right-of-Way

No new right-of-way will be required for this project.

Utilities/Railroads

There are overhead and underground utilities, but as this is a PMS overlay project there will be no utility involvement.

There are no railroads within the project limits.

Environmental Considerations

A programmatic categorical exclusion environmental checklist is appropriate for this project. If situations are observed during construction that may potentially impact water quality, including wetland areas, utilize Best Management Practices (BMP) and/or temporary erosion control measures as necessary to protect the resource. Refer to Section 208 of the MDT Detailed Drawings (2002 English edition) for erosion and sediment control Best Management Practices. The installation of temporary erosion control measures will be paid as "Miscellaneous Work." No water quality permits are anticipated at this time.

Environmental will provide any necessary environmental related special provisions.

Traffic Control

A traffic control plan will be developed as the design of the project progresses. Traffic will be maintained during construction activities throughout the project.

Appropriate traffic control devices and signing will be used throughout the project in accordance with the *Manual of Uniform Traffic Control Devices*.

Survey

No survey is anticipated for this pavement preservation project. If survey is needed it will be performed by the District.

Combined Preliminary Field Review And Scope of Work Report

Public Involvement

This will be Level A public involvement. A news release to the appropriate newspapers explaining the project and including a point of contact will be distributed.

Cost Estimate & Ready Date

Estimate \$100,000/mile, special provision for shoulder gravel. 0.20' includes 0.15' plus isolation lift.

Estimated CN Cost: \$900,000
Estimated CE Cost: \$ 90,000
Total Cost: \$990,000*

*This project is to be tied for letting with STPS 248-2(4)12, East of Glentana-East, CN 5520, and is scheduled for a February 23, 2006 letting date with an estimate of \$1,100,000.

This cost estimate does not include indirect costs.

The ready date is November 2005.

Combined Preliminary Field Review And Scope of Work Report

