

| Bridge Culvert Inspection | | | | |
|---------------------------|------------------------------|--|---------------------|--------------------|
| Bridge File Number | 80525 -1 Bridge Culvert | | Form Type | CUL1 |
| Year Built | 1978 | | Lot No. | 4 |
| Bridge or Town Name | HYLO | | Inspector Name | Todd Warshawski |
| Located Over | TRAIL-ANIMAL, OVER SP | | Inspector Class | BR CLS B |
| Located On | 663:08 C1 19.562 | | Assistant Name | |
| Water Body Cl./Year | | | Assistant Class | |
| Navigabil. Cl./Year | | | Inspection Date | 09-Mar-2010 |
| Legal Land Location | SW SEC 36 TWP 65 RGE 16 W4M | | Data Entry By | Theresa Lacusta |
| Longitude, Latitude | -112:17:37, 54:39:46 | | Data Entry Date | 25-Mar-2010 |
| Road Authority | Alberta Transportation (AIT) | | Reviewer Name | Arnold Assenheimer |
| Contract Main. Area | CMA08 | | Review Date | 11-Mar-2010 |
| Clear Roadway/Skew | 8.2 / 30 deg. (RHF) | | Dept. Reviewer Name | Brent Herrick |
| AADT/Year | 980 / 2008 (A) | | Dept. Review Date | 25-Mar-2010 |
| Road Classification | RCU-209-110 | | Follow-Up By | |
| Detour Length (km) | 3 | | | |

| Bridge Culvert Information | | | | | | | | |
|----------------------------|--------|-------------------------------|----------------|------|--------|---------------|--------------------|-------|
| Number of Culverts | | 1 | | | | | | |
| Pipe # | Barrel | Span | Rise (or Dia.) | Type | Length | Corr. Profile | Pl./Slab Thickness | Shape |
| 1 | MAIN | - | 1829 | MP | 24.4 | 68X13 | 3.5 | ROUND |
| Special Features | | | | | | | | |
| Special Features Comment | | BF tag on top of North bevel. | | | | | | |

| Posting Information | | | | | | | | | | |
|--------------------------------------|------|------------|---------------|--|------------------|--|------|----|---------------|------------------|
| Required Vert. Clearance Posting (m) | | | | | | | | | | |
| Posted Vertical Clearance (Y/N) | | | No | | | | | | | |
| Posted: | Lane | NB | On Bridge (m) | | In Advance (Y/N) | | Lane | SB | On Bridge (m) | In Advance (Y/N) |
| Remarks | | not req'd. | | | | | | | | |

| Utilities (Located at) | | | |
|------------------------|--|--|---------------|
| Utility Attachments | | | |
| Telephone | | | Gas |
| Power | | | Municipal |
| Others | | | Problem (Y/N) |
| Remarks | | | |

| Approach Road / Embankment | | | | | |
|--|-------|----------|----------|--|--|
| | | Last | Now | Explanation of Condition | |
| Horizontal Alignment | | 6 | 6 | Intersection on crest of hill to West. Speed limit sign at 85km, field entrances to East. Curve to east. | |
| Vertical Alignment | | 6 | 6 | | |
| Roadway Width (m) | 8.200 | | | | |
| Embankment | | N | 6 | 1.1m | |
| Sideslope (__:1) | 2.0 | | | | |
| (Height of Cover (m) :) | | | | | |
| Guardrail (Y/N) | No | | | | |
| Approach Road / Embankment General Rating | | 6 | 6 | | |

| Upstream End | | | | |
|---|--|-------|-----|--------------------------|
| Culvert Component | | Last | Now | Explanation of Condition |
| Direction | | N | | |
| End Treatment (Concrete, Steel, Others, None) | | STEEL | | |
| Headwall | | X | X | |

| Upstream End | | | | |
|------------------------------------|-------|----------|----------|--------------------------|
| Culvert Component | | Last | Now | Explanation of Condition |
| Collar | | X | X | |
| Wingwalls | | X | X | |
| (Shape :) | | | | |
| Cutoff Wall | | X | X | |
| Bevel End | | N | 6 | |
| Heaving (mm) | 0 | | | |
| Invert Above/Below Stream Bed | BELOW | | | |
| Above/Below (mm) | 100 | | | |
| Scour Protection | | X | X | |
| (Type :) | | | | |
| (Avg. Rock Size (mm) :) | | | | |
| Scour/Erosion | | X | X | |
| Beavers (Y/N) | No | | | |
| Upstream End General Rating | | 7 | 6 | |

| Bridge Culvert Barrel | | | | |
|---|-------------|------|-----|-----------------------------------|
| Culvert Component | | Last | Now | Explanation of Condition |
| (Pipe # : 1, Primary Span, Location Code: MAIN, Span (mm): -, Rise (mm): 1829, Type: MP) | | | | |
| Barrel Last Accessible Date | 09-Mar-2010 | | | |
| Special Features | | | | |
| Special Feature | | | | |
| (Type :) | | | | |
| Special Feature | | | | |
| (Type :) | | | | |
| Roof | | 7 | 7 | |
| Measured Rise (mm) | | | | |
| Measured At Ring No. | | | | |
| Sag (mm) | 52 | | | est @ 2% |
| Percent Sag | | | | |
| Sidewall | | 7 | 7 | |
| Measured Span (mm) | 1894 | | | |
| Measured At Ring No. | | | | |
| Deflection (mm) | 65 | | | |
| Percent Deflection | 4 | | | |
| Floor | | N | N | Covered with cold mix and gravel. |
| Bulge (mm) | 0 | | | |
| Measured At Ring No. | | | | |
| Abrasion (Y/N) | No | | | |
| Circumferential Seams | | 6 | 5 | Damage to South seam.-photo |
| Separation (mm) | 100 | | | |
| Longitudinal Seams | | X | X | |
| Total No. of Cracked Rings | | | | |
| Total No. of Rings with Two Cracked Seams | | | | |
| Min. Remaining Steel Between Cracks (mm) | | | | |
| Proper Lap (Y/N) | | | | |
| Longitudinal Stagger (Y/N) | | | | |

| Bridge Culvert Barrel | | | | |
|---|------|----------|----------|---|
| Culvert Component | | Last | Now | Explanation of Condition |
| (Pipe # : 1, Primary Span, Location Code: MAIN, Span (mm): -, Rise (mm): 1829, Type: MP) | | | | |
| Coating | | 5 | 6 | Few spots of superficial rust along edges of fill on floor. |
| Corrosion By Soil (Y/N) | No | | | |
| Corrosion By Water (Y/N) | No | | | |
| Camber POS/ZERO/NEG | ZERO | | | |
| Ponding (Y/N) | No | | | |
| Fish Passage Adequacy | | X | X | |
| Baffle | | X | X | |
| (Type :) | | | | |
| Waterway Adequacy | | X | X | |
| Icing (Y/N) | No | | | |
| Silting (Y/N) | No | | | |
| Drift (Y/N) | No | | | |
| Barrel General Rating | | 7 | 7 | |

| Downstream End | | | | | |
|---|-------|----------|----------|--------------------------|--|
| Culvert Component | | Last | Now | Explanation of Condition | |
| Direction | | S | | | |
| End Treatment (Concrete, Steel, Others, None) | STEEL | | | | |
| Headwall | | X | X | | |
| Collar | | X | X | | |
| Wingwalls | | X | X | | |
| (Shape :) | | | | | |
| Cutoff Wall | | X | X | | |
| Bevel End | | N | 7 | | |
| Heaving (mm) | | | | | |
| Invert Above/Below Stream Bed | BELOW | | | | |
| Above/Below (mm) | 100 | | | | |
| Scour Protection | | X | X | | |
| (Type :) | | | | | |
| (Avg. Rock Size (mm) :) | | | | | |
| Scour/Erosion | | X | X | | |
| Beavers (Y/N) | No | | | | |
| Downstream End General Rating | | 7 | 7 | | |

| Structure Usage | | | | |
|-------------------------|----|------|-----|--------------------------|
| | | Last | Now | Explanation of Condition |
| Grade Separation | | | | |
| Road Alignment | | 7 | 7 | |
| Roadway Surface | | 7 | 7 | |
| (Type :) | | | | |
| Cold mix/gravel. | | | | |
| Icing (Y/N) | No | | | |

| Structure Usage | | | | |
|--|----|----------|----------|--|
| | | Last | Now | Explanation of Condition |
| Traffic Safety Features | | X | X | |
| Type | | | | |
| Lighting | | X | X | |
| Barrel Leakage (Y/N) | No | | | |
| Drainage | | 7 | 4 | Soils/debris in S. bevel block drainage. |
| Structure In Use (Y/N) | No | | | |
| Grade Separation General Rating | | 7 | 4 | |

| Maintenance Recommendations | | | | | | | |
|---|------------------|--|---------------------------|---------------|-----------|-------------------|----|
| Inspector Recommendations | Year | Inspector Comments | Department Comments | Target Year | Est. Cost | Cat # | |
| SHOTCRETE REPAIRS | | | | | | | |
| PLACE ADDITIONAL RIP RAP | | | | | | | |
| REMOVE DRIFT ACCUMULATION | | | | | | | |
| INSTALL CONCRETE/STEEL LINING | | | | | | | |
| INSTALL STRUTS | | | | | | | |
| INSTALL CONCRETE COLLAR/CUTOFF | | | | | | | |
| REPAIR SEAMS | | | | | | | |
| OTHER ACTION | | | | | | | |
| OTHER ACTION | | | | | | | |
| OTHER ACTION | | | | | | | |
| OTHER ACTION | | | | | | | |
| Structural Condition Rating (Last/Now) (%) | 77.8/77.8 | Sufficiency Rating (Last/Now) (%) | 83.0/79.9 | Est. Repl. Yr | 2033 | Maint. Req. (Y/N) | No |
| Special Comments for Next Inspection | | | Department Comments | | | | |
| Maintenance Reviewed By | | | Date | | | Estimated Total | 0 |
| Proposed Long-Term Strategy | | | | | | | |
| On 3-Year Program (Y/N) | | | | | | | |
| Proposed Action | | | | | | | |
| Previous Inspector's Name | Jason Saly | | Previous Assistant's Name | | | | |
| Next Inspection Date | 09-Jun-2013 | | Previous Inspection Date | 05-Dec-2006 | | | |
| Inspection Cycle (Default) (months) | 39 | | | | | | |
| Comment | | | | | | | |