



PROJECT PROSPECTUS

Part 1 — Project Request (Page 1 of 2)

Key Number: _____ **Jurisdiction:** _____

Section: OTIA III – Dawson Creek (Airport Road) Bridge **Region:** 1 **Area:** Hillsboro **District:** 2A

State Highway No.: _____ **Highway Name:** _____ **Mile Point** _____ **Length: (mi) (km)** _____

Urban **Rural** **City:** Hillsboro **MPO:** _____ **Within UGB:** **Yes** **No** **County:** Washington **Road/Street Name:** Airport Road

Route No.: _____ **NHS:** **YES** **NO** **HPMS:** _____ **FC:** _____ **Applicant (if other than State):** City of Hillsboro

US Congressional District: #1 **State Senate District:** #13 **State Representative District:** #26

Cost Estimates (x \$ 1,000)		Project Components		Right Of Way	
Preliminary Engineering	\$79	Grading	X	Files	(#) 2
Right Of Way	\$93	Paving	X	Hectares	(#)
Utility Reimbursement		Structures	X	Relocations	(#) 0
		Signaling	X	Acquisitions	(#) 2
Roadway	\$493	Signals		Easements	(#)
Structures	\$630	Illumination	X	Work By: State / Consultant / Applicant	
Signals	\$0			Preliminary Engineering	(S,C,A) A,C
Illumination	\$0			Construction Engineering	(S,C,A) C
Temp. Protection	\$8			Right of Way Descriptions	(S,C,A) C
Const. Contingencies	\$113			Right Of Way Acquisitions	(S,C,A) A

Project Categories		Constructed By	
Remove Exist Bridge	\$11	Environmental Class (1, 2, 3, PCE)	<input checked="" type="checkbox"/> Contract <input type="checkbox"/> County Force
Other	\$136	Design Category (1-7)	<input type="checkbox"/> State Force <input type="checkbox"/> Other
Total CE and Construction:	\$1,482	Work Type Code (1-13)	<input type="checkbox"/> City Force
Total Estimate:	\$ 1,654	Primary STIP Work Type:	

Recommended Let Date By Federal Fiscal Year (Quarter-Year): 2/05

PE Fund: _____ **R/W Fund:** _____ **UR Fund:** _____ **CE-CN Fund:** _____

PE EA: _____ **R/W EA:** _____ **UR EA:** _____ **CE-CN EA:** _____

Item	Existing	Proposed	Define The Problem:
Travel Lanes (#)	2	3	The existing Airport Road Bridge is a timber truss structure with an unknown date of construction. The bridge is considered a "small bridge" under the new guidelines and is not included as a listed bridge on the National Bridge Inventory System (NBIS) nor is it included in the 2002-2005 STIP or draft 2004-2007 STIP. This bridge is considered structurally deficient due to the load limitation and functionally obsolete as measured from its intended functional classification as a Collector Roadway.
Structures (#)	1	1	
Signals (#)	0	0	
Bike Way (#)	0	2	
Average Daily Traffic	590	680	
Year of ADT	1999	2020	
Throughway Y/N	Y	Y	

Describe Proposed Solution - Attach Sketch Map

This application proposes to replace the existing structure with a modular steel truss structure constructed to a width and configuration consistent with a three (3) lane Collector roadway, supplemented with bike lanes and pedestrian walkways.

Prepared By: X **Date:** _____ **OTC Approval Date:** _____ **Program Year:** _____ **Funding Amount:** _____



PROJECT PROSPECTUS

Part 1 Project Request (Page 2 of 2)

Key Number:

Jurisdiction:

Section: 011A(1) Dawson Creek (Airport Road) Bridge

Region:

Area: Hillsboro

District: 2A

Project Justification

The Airport Road Bridge encompasses a simply supported timber substructure with an unknown date of construction. The bridge once was under the jurisdiction of Washington County as Bridge No. 1318, and was last inspected on October 25, 2000 (see Appendix D). The deck configuration is less than 30 feet in length and less than 25 feet in width and consists of several inches of asphalt pavement poured over timber beams. Dawson Creek approaches the bridge at an approximate 45 degree angle where a culvert is utilized just upstream of the bridge for an adjacent driveway. The existing structure is posted as weight limited and restricts both passenger car and truck traffic due to an existing width deficiency. The proposed replacement bridge will consist of a modular steel truss structure constructed to a width and configuration consistent with a three (3) lane Collector roadway, supplemented with bike lanes and pedestrian walkways. The replacement of this bridge is expected to facilitate both commercial and industrial development in the area and increase local freight mobility between local industry, businesses supporting local industry and the state highway system, US 26 and/or US 8.

Additional Information For Project Requested By Local Jurisdictions

Responsible Local Office To Be Contacted For The Following Activities:

1. Public Hearing / Citizen Involvement	Tom Arnold, P.E.	(Office)	(503) 681-6247	(Phone)
2. Environmental / Planning	Tom Arnold, P.E.	(Office)	(503) 681-6247	(Phone)
3. Pre-Engineering	Tom Arnold, P.E.	(Office)	(503) 681-6247	(Phone)

This Official Request is From:

City of: HILLSBORO and/or _____ County: _____

By: Thomas E. Arnold, P.E. B _____

By:  B _____

By: _____ B _____

Applicable Intergovernmental Agreements:

IGA Number:	Jurisdiction Name:	Agreement Date:

Administrative Recommendation

Bridge Prospectus Cost Estimate

Applicant:	City of Hillsboro	NBIS	Bridge No.:	
Project / Section:	OTIA III -- Dawson Creek (Airport Road) Bridge	Region:	Area:	District:
		1	Hillsboro	2A

New Bridge / Roadway Configuration:		Existing Bridge:	
Left Side Rail	1 feet	Bridge Length	30 feet
Left Sidewalk	5 feet	Bridge Width	25 feet
Shoulder	6 feet	Area	750 square ft.
Lane 2	feet		
Lane 1	12 feet	New AC Top Width	46 feet
—CL—	12 feet	New AC Depth	3 inches
Lane 1	12 feet	New Base Depth	10 inches
Lane 2	feet	Project Length	500 feet
Shoulder	6 feet	Net Road Work Length	450 feet
Right Sidewalk	5 feet	X-S Side Slope	2.5:1
Right Side Rail	1 feet	AC Avg Width	38 feet
		Base Avg Width	38 feet
Bridge Length	70 feet	Asphalt Density	148 pounds/cu ft
Bridge Width	60 feet	Base Density	120 pounds/cu ft
New Area	4200 square ft.	New AC Required	504 tons
		New Base Required	1239 tons

	Quantity	Unit	Price per unit	Cost (\$x1000s)
COST ESTIMATE:				
Right-of-Way	0.25	Acre	\$ 370,260	\$93
==Roadway==				
Clear & Grub		lump sum		\$0
Erosion Control		lump sum		\$0
General Excavation		cubic yards		\$0
Embankment in Place		cubic yards		\$0
Pavement Removal		square feet		\$0
Aggregate Base		tons		\$0
Asphalt Concrete		tons		\$0
Curb		feet		\$0
Sidewalk		feet		\$0
Riprap		cubic yards		\$0
Guardrail Type 2A		feet		\$0
Guardrail Type 3		feet		\$0
Guardrail Trans		each		\$0
Roadway Const. (App. "A")	1.0	LS	#####	\$443
Wetland Restoration	1.0	LS	#####	\$50
Other		lump sum		\$0
Other		lump sum		\$0
Flared Terminals		each		\$0
Subtotal Roadway				\$493
Structures	4,200	square feet	\$ 150.00	\$630
Bridge Rail	-	feet		\$0
Remove Existing Bridge	750	square feet	\$ 15.00	\$11
Other		specify unit		\$0
Other		specify unit		\$0
Other		lump sum		\$0
Other		lump sum		\$0
Subtotal Structures				\$641

Bridge Prospectus Cost Estimate

Applicant:		NBIS		Bridge No.	
Project / Section	City of Hillsboro OTIA III -- Dawson Creek (Airport Road) Bridge	Region:	Area:	District:	
		1	Hillsboro	2A	
Mobilization	12	percent of (Roadway + Structure)		\$136	
Signals	\$ -	lump sum		\$0	
Illumination	\$ -	lump sum		\$0	
Temporary Protection	\$ 8,000	lump sum		\$8	
Detour Route		feet		\$0	
Other		specify unit		\$0	
Other		specify unit		\$0	
Other		lump sum		\$0	
Other		lump sum		\$0	
Mobilization & Traffic				\$144	
Subtotal Construction				\$1,278	
==Engineering==					
Construction Engineering	8	percent of (Roadway + Structure)		\$91	
Contingency	10	percent of (Roadway + Structure)		\$113	
Subtotal Const. Eng.				\$204	
Preliminary Engineering Consultant	5	percent of (Roadway + Structure)		\$57	
State	1	percent of (Roadway + Structure)		\$11	
County	1	percent of (Roadway + Structure)		\$11	
Subtotal PE				\$79	
Total Estimate				\$1,654	

Bridge Project Prospectus Additional Bridge Information

Applicant: City of Hillsboro		NBIS Bridge Number: 0					
Project Name / Section: OTIA III - Dawson Creek (Airport Road) Bridge		Region: 1	Area: Hillsboro				
			District: 2A				
Funding: Preferred Source: <input checked="" type="checkbox"/> OTIA III <input type="checkbox"/> Federal HBRR Acceptable Source: <input checked="" type="checkbox"/> OTIA III <input checked="" type="checkbox"/> Federal HBRR	Heavy Vehicle Usage: <table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th style="width: 50%;">Existing</th> <th style="width: 50%;">Proposed</th> </tr> </thead> <tbody> <tr> <td>Truck AADT: 30</td> <td>34</td> </tr> </tbody> </table> Fire Truck Usage: <input type="checkbox"/> YES, at least 25% of trips use bridge. <input checked="" type="checkbox"/> No, Less than 25% of trips.	Existing	Proposed	Truck AADT: 30	34	Detour: Detour Route: Length: 12500 Map: (Please attach map)	
Existing	Proposed						
Truck AADT: 30	34						

Regional Freight Corridor Analysis

The Airport Road Bridge lies along Airport Road (future Butler Road Extension) and crosses Dawson Creek between Brookwood Parkway and Shute Road. The Butler Road Extension is designated as a Collector roadway running in an easterly/westerly direction between Brookwood Parkway (western) and Cornell Road (eastern). The bridged portion of this roadway lies between an undeveloped commercial area to the south and the Dawson Creek Industrial Park to the north. The replacement of this bridge with a non-load limiting structure will increase freight mobility alternatives for local industrial area circulation. In terms of "Regional Freight Corridor" considerations, a non-load limited structure will permit additional freight mobility from several "industrial" points of origin, including the Port of Portland/Hillsboro Airport to the west and several surrounding Industrial Parks and/or sites to the north and east. The targeted destinations include the Sunset Hwy. (U.S. 26) to the north or the Tualatin Valley Highway (U.S. 8) to the south, via various arterial or collector roadways.

Special Considerations