

**Agency: Commerce, Community and Economic Development****Grants to Municipalities (AS 37.05.315)****Grant Recipient: Anchorage****Federal Tax ID: 92-0059987****Project Title:****Project Type: Remodel, Reconstruction and Upgrades**

## Anchorage - Fire Station #14 Drive Through Access

**State Funding Requested: \$100,000****House District: Anchorage Areawide (16-32)**

Future Funding May Be Requested

**Brief Project Description:**

The project would result in a paved 20 foot wide driveway that would provide access from the parking area around the east side to the north side equipment bay doors.

**Funding Plan:**

Total Project Cost:	\$438,922
Funding Already Secured:	(\$0)
FY2013 State Funding Request:	(\$100,000)
Project Deficit:	\$338,922

*Funding Details:**Initial planning for drive through at Fire Station 14***Detailed Project Description and Justification:**

Fire Station No. 14 is a project designed to reduce the East Anchorage Fire Department (AFD) emergency response times to within the adopted four-minute standard. A major issue at the time of the station's design/construction was the need to provide drive-through equipment bays. The current design requires an unsafe 250 foot equipment backup motion. This exceeds the fire code design requirement of no more than a 150 foot backing distance and greatly increases the likelihood of damage to the equipment and/or the fire station structure. While the department uses additional staff to aid in safe backing, it does not relieve the safety concerns.

Tudor Road has a 120 foot buffer setback, which comes to about 40 feet north of the north side of the fire station. The major reason the north side access was not pursued during the initial construction was because during the design phase, the Planning Staff noted it would take a year to resolve the north side access.

**Project Timeline:**

Sitework: \$95,000
Storm Sewer: \$15,860
Landscaping: \$27,200
Sitework Total: \$138,060
Paving and Parking Lot On-site Paving: \$101,000
Driveway: \$26,050
Paving and Drive Way Total: \$127,050
Site Improvement Sub-Total: \$265,110
Site Improvement Total: \$ 438,922

**Entity Responsible for the Ongoing Operation and Maintenance of this Project:**

Anchorage Municipality
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**Grant Recipient Contact Information:**

Name:	Ted Fussell
Title:	Sr Captain
Address:	4501 Campbell Airstrip Road Anchorage, Alaska 99507
Phone Number:	(907)267-5014
Email:	FussellTJ@ci.anchorage.ak.us

Has this project been through a public review process at the local level and is it a community priority?  Yes  No



May 19, 2005  
W.O. D59102

Ms. Michelle Weston  
Anchorage Fire Department  
100 East 4th Avenue  
Anchorage, Alaska 99501

Subject: Fire Station No. 14 Drive-through Access Study

Dear Ms. Weston:

Thank you for the opportunity to provide a review of the options for developing drive-through access for Fire Station No. 14. We have compiled this letter report based upon interviews with you and your staff, field review of the site, and discussions with the affected utility companies. In summary, after some detailed checking, we believe that Alternative No. 4, going through the existing parking area around the east side of the building, appears to be the most viable route.

**Background:** Fire Station No. 14 was a project designed to reduce the East Anchorage Fire Department (AFD) emergency response times to within the adopted four-minute standard. A major issue at the time of the station's design/construction was the need to provide drive-through equipment bays. Tudor Road has a 120-foot buffer setback, which comes to about 40 feet north of the north side of the fire station. At the time of design, to be able to provide the north side access, the Planning Staff noted it would take a year delay to resolve this issue. This was the major reason the north side access was not pursued during the initial construction. The resultant design requires an unsafe 250-foot equipment backup motion. This exceeds the fire code design requirement of no more than a 150-foot backing distance and greatly increases the likelihood of damage to the equipment and/or the fire station structure. While the department uses additional staff to aid in safe backing, it does not relieve the safety concerns.

**Analysis:** We developed and analyzed five alternative routes for north side access as shown on the alternatives map (Appendix A). We also developed an alternatives decision chart (Appendix B) listing each option and providing our understanding of the alternative comparison information. During our meeting with you and Chief Fullenwider, we reviewed our alternatives and the decision chart. It was decided that the two best approaches included Alternative No. 2, the direct access from Tudor Road, and Alternative No. 4, the access through the parking lot around the east side of the fire station. We further reviewed these two approaches, developed cost estimates (Appendix C), gathered additional utility data, and prepared this recommendation.

**Recommendation:** We are recommending Alternative No. 4, around the east side of the Fire Station (Appendix D), as the most effective method to provide this access. It reduces the impact on the Tudor Road Buffer, does not have a major grade conflict with the 12-inch gas line running in the utility easements along the south side of Tudor Road, and has the lower cost compared to the access from Tudor Road. When the original fire station was designed, the Anchorage Water and Wastewater Utility (AWWU) utility easement east of the building was not available for use. Now that the Anchorage Water Loop IV project has taken another route, the easement area is now available as per the attached email (Appendix E) from AWWU. This approach puts the majority of the driveway on the fire station property and achieves the ultimate goal of providing a drive-through equipment bay.

Ms. Weston  
Anchorage Fire Department  
May 19, 2005  
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This recommendation would result in a paved 20-foot-wide driveway that would provide access from the parking area around the east side to the north side equipment bay doors. The design would be aligned to reduce the amount of lawn taken from the east side of the building by regrading some of the utility easement area. The current drainage along the north side of the building would be maintained with flow to the west. The disturbed area of the slope would be landscaped and seeded. We may need to relocate the fire station electrical service line deeper, but that would be a minor cost. Overall, we are confident this solution meets your safety and site objectives.

**Next Steps:**

1. AFD selection of access option - You would make a final decision on which option to pursue.
2. AFD identify the funding necessary to design and construct the project.
3. Phase Two (Scope of Services attached, Appendix F):
  - a. Resolve Tudor Road buffer issue – A small portion of any of the drive-through options will infringe on the Tudor Road buffer area. We will need to work with the Municipality of Anchorage (MOA) planning staff to resolve this use. This work may require Planning and Zoning Commission site plan approval. At your request, we have not talked with any MOA agency about this project, so we do not have a feeling about which direction this will go.
  - b. Complete access design and bidding plan set – We would develop the bid-ready plan set for installing the new driveway areas.
  - c. Construct driveway – If requested, we could provide the construction testing and inspection associated with the project.

**Schedule Discussion:** With an AFD access selection, we could develop the plan set ready for bidding within two months of Notice-to-Proceed. The MOA construction bidding process is probably a three-month period. It may also be advantageous to incorporate this project with other smaller-size efforts by Project Management and Engineering to get reduced unit pricing resulting in cost savings. The construction will likely be a three to four-week period from Notice-to-Proceed until completion.

We believe we have reviewed the available options and recommended the most efficient approach to this work. Please review this report and provide us with your comments. We are prepared to move ahead based upon your review and approval.

Sincerely,  
DOWL Engineers



Robert Kniefel, P.E.  
Senior Planner

Attachments: As stated

East Tudor Road

2

Fire Station  
#14

Benny B  
Scho

Campbell

Airstrip

Road

4

5

1



Quantity Unit Unit Cost Total

Quantity	Unit	Unit Cost	Total
1	Lump Sum	\$7,500.00	\$7,500.00
1	Lump Sum	\$15,000.00	\$15,000.00
15	Per Day	\$500.00	\$7,500.00
5000	C.Y.	\$13.00	\$65,000.00
<b>Sub-total</b>			<b>\$95,000.00</b>

**Storm Sewer**

50	L.F.	\$30.00	\$1,500.00
<b>Drainage Structures</b>			
2	EACH	\$3,500.00	\$7,000.00
2	C.Y.	\$80.00	\$160.00
900	L.F.	\$8.00	\$7,200.00
<b>Sub-total</b>			<b>\$15,860.00</b>

**Landscaping**

16	MSF	\$700.00	\$11,200.00
1	Lump Sum	\$16,000.00	\$16,000.00
<b>Sub-total</b>			<b>\$27,200.00</b>
<b>SITework TOTAL</b>			<b>\$138,060.00</b>

**PAVING AND PARKING LOT**

<b>ON-SITE PAVING</b>			
1500	S.Y.	\$22.00	\$33,000.00
2100	TON	\$24.00	\$50,400.00
40	S.Y.	\$40.00	\$1,600.00
200	L.F.	\$75.00	\$15,000.00
40	L.F.	\$25.00	\$1,000.00
<b>Sub-total</b>			<b>\$101,000.00</b>

**Driveway**

900	L.F.	\$2.00	\$1,800.00
4	EACH	\$5,500.00	\$22,000.00
2	EACH	\$1,000.00	\$2,000.00
2	EACH	\$125.00	\$250.00
<b>Sub-total</b>			<b>\$26,050.00</b>
<b>PAVING AND DRIVEWAY TOTAL</b>			<b>\$127,050.00</b>

**SITE IMPROVEMENT SUB-TOTAL**

Design Consultants - 20%	\$53,022.00	
Construction Inspection - 15%	\$39,766.50	
Design Survey	\$5,000.00	
Construction Survey	\$2,700.00	
Design Geotechnical	\$15,000.00	
22% Contingency	\$58,324.20	
<b>SITE IMPROVEMENT TOTAL</b>		<b>\$438,922.70</b>

**ASSUMPTIONS**

No contamination or environmental cleanup is required  
 No underground utility conflicts  
 Assumed Driveway length to be 450 feet