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Submitted by:

Chair of the Assembly at the Request of the Mayor

Prepared by:

Project Management & Engineering Department

For Reading:

January 11, 2005

ANCHORAGE, ALASKA AR NO. 2005-2

A RESOLUTION OF THE MUNICIPALITY OF ANCHORAGE ACCEPTING AND APPROPRIATING FOUR HUNDRED ELEVEN THOUSAND SIX HUNDRED DOLLARS (\$411,600) AS A GRANT FROM THE ALASKA DEPARTMENT OF MILITARY AND VETERANS AFFAIRS, DIVISION OF HOMELAND SECURITY AND EMERGENCY MANAGEMENT, TO THE CHUGIAK BIRCHWOOD EAGLE RIVER RURAL ROAD SERVICE AREA CAPITAL IMPROVEMENT FUND (419), FOR THE LOWER FIRE LAKE DAM REHABILITATION PROJECT.

WHEREAS, Lower Fire Lake dam is failing and urgently requires rehabilitation; and

WHEREAS, partial funding for the rehabilitation has been received through previous State of Alaska grants; and

 WHEREAS, the State of Alaska Department of Military and Veterans Affairs, Division of Homeland Security and Emergency Management (DHS&EM), has received hazard mitigation grant funds from the Federal Emergency Management Agency (FEMA) for the Lower Fire Lake Dam Rehabilitation Project; and

 WHEREAS, the Municipality of Anchorage has received a grant in the amount of \$411,600 from the DHS&EM, which includes FEMA hazard mitigation grant funds, to rehabilitate Lower Fire Lake dam; now therefore,

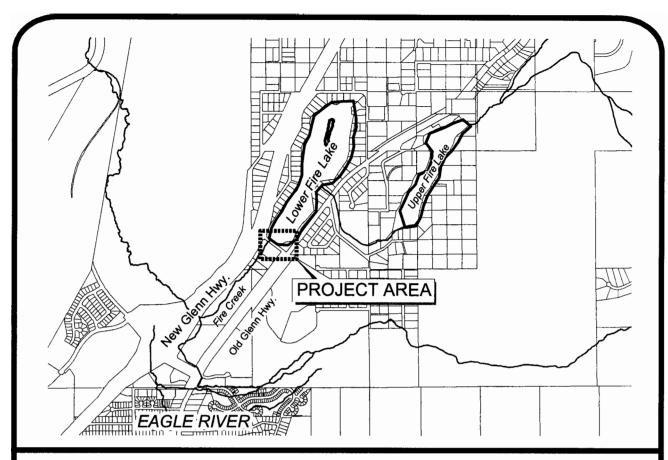
THE ANCHORAGE ASSEMBLY RESOLVES:

<u>Section 1.</u> That a sum of Four Hundred Eleven Thousand Six Hundred Dollars (\$411,600) in DHS&EM grant monies be appropriated for construction activities related to the rehabilitation of Lower Fire Lake Dam.

<u>Section 2.</u> That this resolution shall take effect immediately upon passage and approval by the Anchorage Municipal Assembly.

Resolution Appropriating Hazard Mitigation Grant Funds for the Lower Fire Lake Dam Project Page 2 of 2

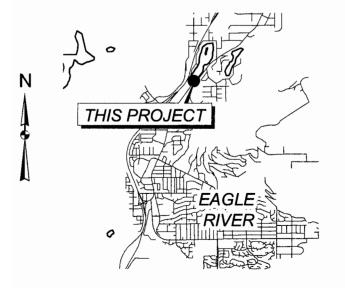
1	PASSED AND APPROVED by the Anchorage Municipal Assembly this day of
2	, 2005.
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6	Chair
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8	ATTEST:
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12	Municipal Clerk
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14	Department of Appropriation:
15	Project Management & Engineering Department \$411,600





PROJECT MAP





Lower Fire Lake Dam Rehabilitation Project

ANCHORAGE, ALASKA

Project Management and Engineering Department
Municipality of Anchorage
The Boutet Company, SC, 12/22/2004
99-31



MUNICIPALITY OF ANCHORAGE ASSEMBLY MEMORANDUM

No. AM 19-2005

Meeting Date: January 11, 2005

FROM:

Mayor

SUBJECT: Resolution to Accept and Appropriate Alaska Department of Military and Veterans Affairs, Division of Homeland Security and Emergency

Management Grant Funds for Lower Fire Lake Dam Rehabilitation, Project

No. 99-31(\$411,600)

The Alaska Department of Military and Veterans Affairs, Division of Homeland Security and Emergency Management (DHS&EM), has granted the Municipality \$411,600 for the rehabilitation of Lower Fire Lake dam. Accelerated deterioration of the dam embankment and spillway has created an urgent need to complete the improvements.

The existing dam was built as a culvert road crossing and fish ladder by the Alaska Department of Fish and Game in 1962 (see location on attached map). Later, the fish ladder was removed, leaving a concrete headwall on the downstream face, and the structure effectively became a de facto dam. The Municipality of Anchorage accepted ownership of the dam in 1999. Studies performed by the Municipality in 1999 and 2000 confirmed that the dam is both approaching the end of its service life and undersized to accommodate a major rainfall/flood event in the Lower Fire Lake basin. Because of recent development downstream of the dam, the Alaska Department of Natural Resources has elevated the dam to a Class 1 hazard classification, indicating that failure would probably result in loss of life, utilities and/or high-value property.

In the event of a major flood, water would overtop the existing dam, leading to complete erosion failure of the earthen embankment. The resulting surge would wash forest litter to the culvert crossing of the Glenn Highway and block its entrance. Eventually, the storm water would rise until it crossed the highway. This would necessitate closure of the highway and costly repairs before it could be re-opened.

In the near term, there is evidence that leaking subsurface water is slowly eroding the dam embankment. Continued erosion could lead to a failure of the dam described above, but without the storm surge and breach of the Glenn Highway. Also, the concrete headwall that is an integral part of the dam structure is deteriorating and will eventually fail to retain the soil behind it. This failure is expected within the next two to five years.

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The new dam will have culverts sized to pass a major flood, and a hardened spillway to protect the dam in case of overtopping. The project would also address environmental permit requirements and construct a new, wider roadway section across the dam.

The project design is approximately 65% complete. The current cost to finish the project is estimated at \$530,000. This DHS&EM grant, which includes Federal Emergency Management Agency hazard mitigation grant funds, together with funds remaining from previous State grants, would fully fund this project. Construction would be planned for 2005. The accounting detail is as follows:

Revenue: 419.7192.9825.M55M01.2005 \$411,600

Expenditures: 419.7192.3101.M55M01.2005 \$411,600

THE ADMINISTRATION RECOMMENDS APPROVAL OF THE RESOLUTION APPROPRIATING \$411,600 AS A GRANT FROM THE ALASKA DEPARTMENT OF MILITARY AND VETERANS AFFAIRS, DIVISION OF HOMELAND SECURITY AND EMERGENCY MANAGEMENT TO THE CHUGIAK BIRCHWOOD EAGLE RIVER RURAL ROAD SERVICE AREA CAPITAL IMPROVEMENT FUND (419), FOR THE REHABILITATION OF LOWER FIRE LAKE DAM.

Prepared by: Howard C. Holtan, Director, Project Management & Engineering Department

Fund Certification: Jeffrey E. Sinz, Chief Fiscal Officer

419.7192.9825.M55M01.2005 \$411,600 (2005 State Grant)

Concur: Denis C. LeBlanc, Municipal Manager

Respectfully submitted: Mark Begich, Mayor

Content Information

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Type: AR_FundsApprop - Funds Approp Resolution

A Resolution to Accept and Appropriate Alaska Department of Military Title: and Veterans Affairs, Division of Homeland Security and Emergency

Management Grant Funds for Lower Fire Lake Dam Rehabilitation,

Project No. 99-31(\$411,600)

Author: rerkosp **Initiating Dept: PME**

A Resolution to Accept and Appropriate Alaska Department of Military

and Veterans Affairs, Division of Homeland Security and Emergency Management Grant Funds for Lower Fire Lake Dam Rehabilitation,

Project No. 99-31(\$411,600)

Keywords: \$411,600, lower fire lake dam, FEMA,99-31

Date Prepared: 12/27/04 8:27 AM Director Name: Howard C. Holtan

Assembly '

Meeting Date 1/11/05

MM/DD/YY:

Public Hearing Date MM/DD/YY: 1/25/05

Workflow History

Workflow Name	Action Date	<u>Action</u>	<u>User</u>	Security Group	Content ID		
FundsAppropWorkflow	12/27/04 8:33 AM	Checkin	rerkosp	Public	002465		
PME_SubWorkflow	12/27/04 8:45 AM	Approve	holtanhc	Public	002465		
OMB_SubWorkflow	12/27/04 11:40 AM	Approve	pearcydl	Public	002465		
Finance_SubWorkflow	12/28/04 8:48 AM	Approve	sinzje	Public	002465		
MuniManager_SubWorkflow	12/30/04 10:38 AM	Approve	leblancdc	Public	002465		
MuniMgrCoord_SubWorkflow	1/3/05 12:29 PM	Approve	abbottmk	Public	002465		