J.Bruggink edit 09/16/2005
T.Clifford edit 11/23/2005
T.Hardy edit 12/12/2005

BURNED-AREA REPORT
(Reference FSH 2509.13)

PART I - TYPE OF REQUEST

A. Type of Report
[ ] 1. Funding request for estimated WFSU-SULT funds
[X] 2. Accomplishment Report
[ ] 3. No Treatment Recommendation

B. Type of Action
[ ] 1. Initial Request (Best estimate of funds needed to complete eligible rehabilitation measures)
[X] 2. Interim Report
[ ] Updating the initial funding request based on more accurate site data or design analysis
[X] Status of accomplishments to date
[ ] 3. Final Report (Following completion of work)

PART II - BURNED-AREA DESCRIPTION

A. Fire Name: Gregory

B. Fire Number: P4B5SM

C. State: Idaho

D. County: Boise

E. Region: Intermountain (4)

F. Forest: Boise National Forest

G. District: Idaho City (3)

H. Date Fire Started: September 3, 2005

I. Date Fire Contained: September 10, 2005

J. Suppression Cost: $2,200,000

K. Fire Suppression Damages Repaired with Suppression Funds
1. Fireline waterbarred (miles): 15.4
2. Fireline seeded (miles): 15.4
3. Other (identify):

L. Watershed Number: 17050112

M. Total Acres Burned: 1132 acres
NFS Acres (981) Other Federal ( ) State ( ) Private (152)

Sum of acres	Severity			Grand total
Owner	High	Moderate	Low	
BNF	399.2	397.0	184.7	980.9
PVT	25.1	78.9	47.8	151.8
Grand total	424.3	475.9	232.5	1132.7

N. Vegetation Types: Douglas fir and ponderosa pine, various shrubs and grasses, various weed types, aspen, alder, willow.

O. Dominant Soils: Derived from granodiorite bedrock including deep skeletal, sandy loam, and loamy soils.

P. Geologic Types: Idaho batholith – granodiorite, quartz monzonite, and basalt dikes at lower elevations.

Q. Miles of Stream Channels by Order or Class:

Sum of miles	Severity in basin area*				Grand total
Stream no.	High	Moderate	Low	Unburned	
1	0.7	1.2	0.6	7.1	10.7
2	0.1	0.1	0.4	2.3	4.8
3	0.0	0.5	0.0	1.3	4.8
Grand total	0.8	1.8	1.0	10.7	14.3

* Includes unburned portions of Warm Springs and Gregory drainage basins

R. Transportation System
Trails: 1.76 miles Roads: 4.14 miles

PART III - WATERSHED CONDITION

A. Burn Severity (acres): 233 low 476 moderate 424 high

Sum of acres	Severity (acres)				
Watershed	High	Moderate	Low	Unburned	Grand total
Gregory Gulch	98 (8%)	63 (5%)	141 (12%)	888 (75%)	1190 (34%)
Sawmill	262 (40%)	234 (36%)	75 (12%)	79 (12%)	649 (18%)
Tollgate	39 (28%)	44 (32%)	17 (12%)	37 (27%)	136 (4%)
Warm Springs	26 (2%)	136 (9%)	0 (0%)	1382 (90%)	1544 (44%)
Grand total	424 (12%)	476 (12%)	233 (7%)	2387 (68%)	3520 (100%)

B. Water-Repellent Soil (acres): 808*
* Water repellent acres = 0.9*(high) + 0.7*(moderate) + 0.4*(low); formula based on observations in the fire area.

C. Soil Erosion Hazard Rating (acres): 418 low 532 moderate 181 high
Calculated using percent of acres in each classification within the burned area; (37% low, 45% moderate, 16% high).

D. Erosion Potential: 10 – 30 tons per acre per year based on estimates of accelerated erosion from the burned sites within the watershed obtained using the WEPP model.

E. Sediment Potential: 45,000 tons / square mile over the next 4 years

PART IV - HYDROLOGIC DESIGN FACTORS

A. Estimated Vegetative Recovery Period (years): 2-5

B. Design Chance of Success (percent): 75

C. Equivalent Design Recurrence Interval (years): 2

D. Design Storm Duration (hours): 1

E. Design Storm Magnitude (inches): 0.51

F. Design Flow (cubic feet / second/ square mile): 45

G. Estimated Reduction in Infiltration (percent): 46%

H. Adjusted Design Flow (cfs per square mile): 223

PART V - SUMMARY OF ANALYSIS

A. Describe Watershed Emergency: **Threat to human health and property.** The human-caused Gregory Fire was ignited on September 3, 2005. The fire burned about 1,132 acres and created a severe watershed disturbance within Mores Creek drainage tributaries 2 miles west of Idaho City. The BAER Team has focused on three BAER action issues identified through field reconnaissance. Critical issues include soil erosion, debris flow potential, and noxious weed management.

Of most immediate concern is the risk of sedimentation and/or debris flow potential in Sawmill and Tollgate gulches and the associated impacts of such events on private lands at the mouth of both creeks. Both Sawmill and Tollgate gulches have homes built in the floodplain. Should flood or debris flow of any magnitude occur, the probability for damage appears to be very high. A 15-year storm would probably destroy both homes.

The fire burned 76% of Sawmill Gulch at moderate or high intensity. To assess the erosion and debris flow risk, the geometry of Sawmill Gulch was compared to a variety of BNF drainages that have recently exhibited high rates of sedimentation following a fire. Based on this analysis, a reasonable expectation exists that drainage geometry in Sawmill is permissible for production of debris flow events given adequate precipitation. Work by Cannon, et. al. (Debris-flow Analysis of Basins Burned by the 2002 Coal Seam and Missionary Fires, Colorado) also confirms that Sawmill is a current debris flow risk given an adequate magnitude triggering event. Since triggering events in Steele, Lake and Bear creeks were determined to be a three-year storm, and considering that Sawmill is generally smaller in area, lower gradient (see table B), but higher overall burn intensity with most of the high intensity burn near the headwaters, the expected return interval for a triggering event in Sawmill is qualitatively estimated to be in the range of 5-10 years. An event of this magnitude would produce flows at the pour-point of Sawmill Gulch in the range of 290 to 320 cfs; a 400% increase over the unburned response.

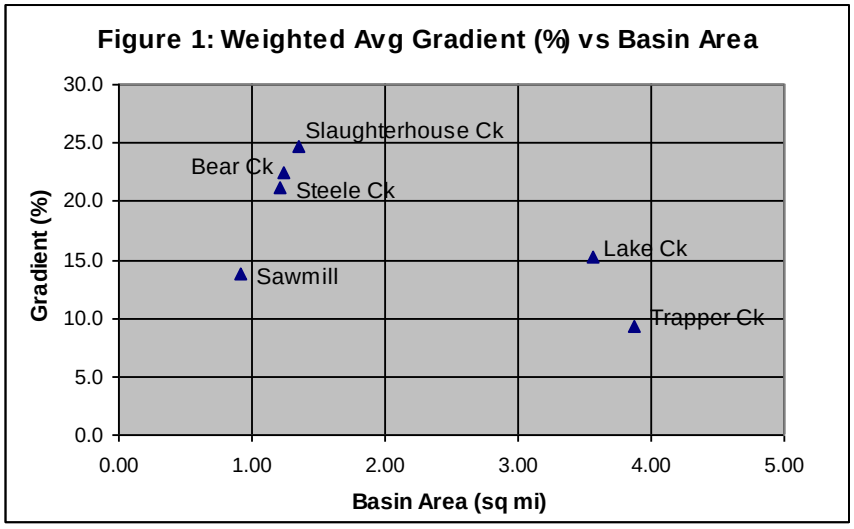
Table B

Parameter	Basin					
	Sawmill	Trapper	Steele	Lake	Bear	Slaughterhouse
Basin area (sq mi)	0.91	3.87	1.21	3.56	1.23	1.35
Weighted avg gradient (%)	13.8	9.4	21.1	15.2	22.5	24.7
Elev relief (ft)	1,430	1,833	3,085	3,694	2,580	2,524
Length (mi)	2.01	3.78	2.79	4.59	2.29	1.99
Debris flow prone?	Yes	Yes	Yes	Yes	Yes	Yes

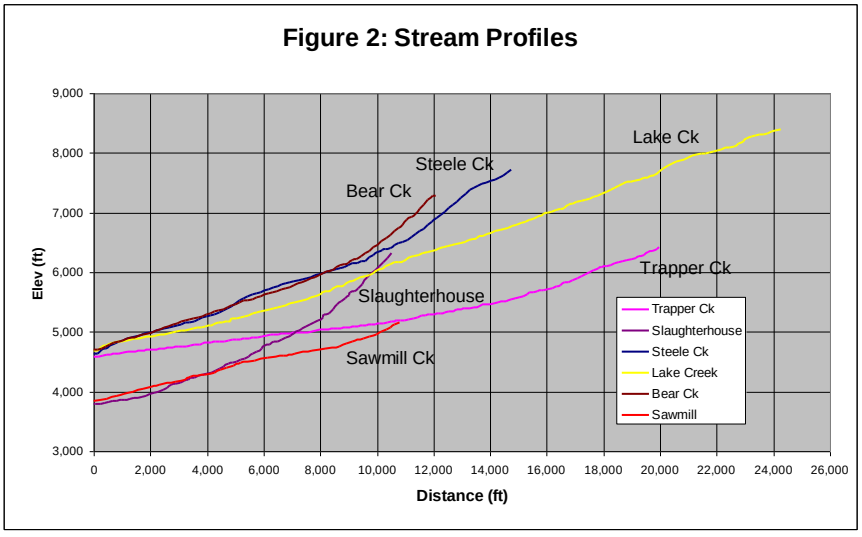
Table C shows the pre- and post-fire expected response for all affected drainages. Figure 1 shows how Sawmill Gulch geometry compares to other similar drainages that have experienced a debris flow following a recent fire. Figure 2 shows basin profiles for the comparative drainages; note that the profile for Sawmill approximates that of Bear and Steele creeks.

Table C

Watershed	Drainage area (mi^2)	Post-fire return interval flood increase (%)					
		2-year	5-year	10-year	25-year	50-year	100-year
Gregory Gulch	1.83	80%	82%	82%	83%	82%	82%
Tollgate	0.21	300%	327%	325%	327%	322%	320%
Sawmill	0.91	395%	400%	397%	398%	398%	399%
Warm Springs	2.37	36%	35%	34%	37%	37%	36%



Erosion and Sedimentation: Sediment modeling shows that the highest severity burned watersheds produce substantially more sediment erosion than those less severely burned. It is estimated that the Gregory Fire will produce about 35,000 - 50,000 tons/mi^2 of sediment over the next 4 years. The initial erosion of ash and surface soil during the first storm(s) will reduce slope roughness by filling in depressions above rocks, logs, and any remaining vegetation. The ability of the burned slopes to detain water and sediment will be reduced accordingly. This will add to the potential for "flashy" runoff caused solely by hydrophobic soils and will increase the distance that eroded materials are transported.



Debris flows are the primary sediment concern because of the volume of materials mobilized during storm events. The primary source of sediment that forms a debris flow is rocky material and vegetative debris stored in-channel and on adjacent hill slopes. The upper elevation, severely burned slopes that were covered by conifers prior to the fire will experience increased rates of soil loss due to decreased root strength/density for the next 3 to 7 years. During this period, shallow seated debris avalanches may have a higher than normal likelihood of occurring. It appears that the fire did not kill all conifer seed sources. However, if there are areas where the seed source for conifers is completely lost, then it may take decades before tree root soil-holding capacity is fully regained. Though not a short-term hazard, these sites should be evaluated to determine if tree plantings would benefit long-term recovery.

Culvert removals: FS 311A has two culvert crossings in intermittent headwater tributary channels to Sawmill Gulch. Both crossings are potential sediment traps in the event of storm events that mobilize sediment. The BAER team recommends replacement of both culverts with appropriately armored fords. The zone engineer will be consulted to for appropriate guidance during culvert removal and ford construction activities.

Noxious weeds and invasive plant species: Infestations of bull thistle, rush skeleton weed, knapweed, and toadflax were ubiquitous within the fire perimeter and remain so in areas surrounding the burn. Many populations within the perimeter were incompletely consumed by the fire. Expectations are that populations of weeds surrounding the burn as well as remaining populations within the burned area will readily invade and establish new infestations on unvegetated slopes. Seeding and mulching vegetation-free slopes will reduce the advantage invasive plant species currently have in the area.

Sensitive Plants: There are two documented populations of the rare plant Epipactis gigantea (giant helleborine orchid) at thermal springs southwest of Idaho City. One population is located on private property at the former Warm Springs Resort (Idaho Conservation Data Center; Element Occurrence #002), and the other is located in the lower end of Warm Springs Gulch on Forest Service Land (Element Occurrence #034) . Epipactis gigantea is proposed as a Sensitive species for the Boise NF.

Other Rare Plant Species: There are no other document rare plant species within about 10 miles of the Gregory Fire, but habitat for other species exists.

Proposed Project Impacts: There are no documented populations of rare plants within the project area, but there are known populations in the surrounding watershed and potential habitat for other species.

Cultural Resources: No significant cultural resources have been identified within or near the fire perimeter.

Summary of Issues

- Potential threats to human life and property from potential increases in storm flow runoff, flooding and debris flows from Sawmill Gulch.
- Ability of existing drainage structures in FS311A1 to pass flood and debris flows and leading to failures, plugged culverts, and negative effects to downstream water quality and fish habitat in Mores Creek.
- Spread of noxious weeds within and near the burned area exacerbating an already bad situation.
- Loss of soil productivity and increased erosion.
- BAER cannot design nor implement treatments to protect against all scales of flood and debris flow events.

B. Emergency Treatment Objectives:

- Reduce the risk for loss of human life and/or injury, and/or property damage for residents and property respectively located near the Gregory Fire perimeter.
- Locate and stabilize, where feasible, severely burned where post-fire runoff is a potential direct threat to human health and life, property, or critically important natural resources.
- Implement measures to control the spread of invasive plant species.
- Develop monitoring recommendations intended to measure the effectiveness of rehabilitation prescriptions.

C. Probability of Completing Treatment Prior to First Major Damage-Producing Storm:
Land: 50% Channel: 50% Roads: 50% Other: 75%

D. Probability of Treatment Success (%)

	Years after Treatment		
	1	3	5
Land	50	70	80
Channel	N/A	N/A	N/A
Roads	100	100	100
Other	5	10	50

E. Cost of No-Action (Including Loss): Private property improvements located on land at the mouth of Sawmill Gulch are currently exposed to the greatest risk of damage from flood or debris flow. Improvements on the property include a house (approximately 1800 sf) and a garage/barn structure (approx 200 sf). Using a replacement cost of $125/sf for the house and $50/sf for the garage, the maximum cost for loss of improvements on this property is $235,000. Considering the property value itself, the loss of use, and other intangibles such as the cost of relocation, potential loss of the contents of the house and garage, the total at-risk cost is somewhere in the range of 3X the value of improvements. Property at risk at the mouth of Tollgate Gulch includes a structure with an estimated replacement value of $200,000 and a total value at risk of $600,000. Assessment cost is approximately $11,000. Total value at risk at both locations is therefore estimated to be $1,305,000 + assessment cost = $1,316,000.

F. Cost of Recommended Alternative (Including loss): The total cost of implementing the recommended alternative is $303,952. Potential losses are estimated to be 40% of the no-action alternative. Total cost of the recommended alternative is $303,952 + 0.4 * 1,305,000 = $825,952.

G. Skills Represented on Burned-Area Survey Team:

[X] Hydrology	[X] Soils	[X] Geology	[X] Range	[ ] (other)
[ ] Forestry	[ ] Wildlife	[ ] Fire Mgmt	[X] Engineering	[ ] (other)
[X] Contracting	[ ] Ecology	[X] Botany	[ ] Archaeology	[ ] (other)
[ ] Fisheries	[ ] Research	[ ] GIS	[X] Landscape Arch	

Team Leader: Michael Balen, South Zone Engineer, Boise NF
Email: mbalen@fs.fed.us Phone: 208.373.4144 FAX: 208.373.4111

Team Members:

Sarah Peterson, Hydrologist, Mountain Home RD, Boise NF
Mike Stevens, Silvaculturalist, Idaho City RD, Boise NF
Darin Vrem, Archeologist, Boise NF
Terry Hardy, Soil Scientist, Boise NF
Kay Beall, Botanist, Idaho City RD, Boise NF
Charlie Swearengen, Rangeland Management Specialist, Idaho City RD, Boise NF
Doug Brown, GIS Support, Lowman RD, Boise NF
Norbert Schuster, Silvacultural Technician, Idaho City RD, Boise NF

H. Treatment Narrative:

(Describe the emergency treatments, where and how they will be applied, and what they are intended to do. This information helps to determine qualifying treatments for the appropriate funding authorities. For seeding treatments, include species, application rates and species selection rationale.)

Land Treatments: Land treatments will include aerial straw and wood straw mulch application, aerial seeding, and culvert removal.

Helicopter straw mulching and seeding within moderate and high severity burn areas in the headwaters of Tollgate Creek and Sawmill Gulch is needed to decrease rill, gully, and sheet erosion. Additionally, this treatment will promote the recovery of hydrophobic soil conditions through vegetation establishment in severely burned areas, thereby increasing ground cover in these areas to attenuate erosion from expected increases in overland flows. Straw mulching severely burned areas will increase ground cover and moisture retention, will slightly decrease the potential for erosion and debris flows, and will provide cover and improve germination rates for applied recovery seed. Wood straw mulching on selected MODERATE or HIGH burn intensity slopes with slope angles greater than 30% in Sawmill and Tollgate gulches will provide improved soil stabilization characteristics as compared to protections offered by wheat straw mulch. The application prescription for wood straw mulch is to mitigate debris flow potential through reduction of rill, gully, and sheet erosion in Sawmill and Tollgate gulches. This treatment provides nearly the same benefit as wattles applied over the same target areas with considerably less associated cost.

At lower elevations within the burn area, aerial seeding is necessary to protect against the spread of noxious weeds in HIGH and MODERATE burn severity hillsides in the southern portion of the burn area. Aerial seed application rates are 12 lbs/acre for the mix specified below. Seed soil suitability, climate, and market availability were factors considered in selecting species in the seed mix. The following seed mix has been specified for use by Idaho City range management specialists:

Seed Mix for Upper-Elevation Landscapes			
Plant Species	**Pounds PLS/Acre**	**Cost / Pound**	**Cost / Acre**
Mountain Brome	4.0	$1.75	$7.00
Slender Wheatgrass	8.0	$1.75	$14.00
Total Seed Cost			**$21.00**

Table D shows expected itemized costs for preferred treatment options on affected Forest service lands. This treatment proposal includes the use of WoodStraw on slopes greater than 30% that burned at MODERATE or HIGH intensity. The use of WoodStraw can provide additional soil-holding effectiveness on steep slopes and in wind-prone areas. Costs for purchase and application of WoodStraw are about twice the rate for conventional straw mulch.

Wood shreddings (WoodStraw) did a good job of controlling erosion when tested by the rainfall simulator at the RMRS laboratory in Moscow, ID. The results show that wood shreddings are a viable solution for erosion control. Shreddings at 30-percent coverage performed as well as published estimates for straw mulch at 70-percent coverage. The advantages of shreddings over straw are that shreddings do not introduce new weeds, deer and elk do not eat them, they generate less dust than straw, the material is native to the area, and the manufacturing process uses small-diameter wood sources.

Costs have been calculated and provided in Table E for treatments on private lands in the event that a decision by other agencies is implemented for treatment of such lands.

The net total treatment cost difference between the option using conventional straw mulch and that option using a combination of conventional straw mulch and WoodStraw is $72,496.

A funding opportunity may exist outside of BAER that could be used to offset the extra cost associated with the use of WoodStraw. Lindsey Nothern with Idaho Senator Craig's office has offered to investigate the availability of funds for this purpose. Timing for acquisition of funds from Senator Craig's office is uncertain and could possibly be after implementation is complete.

Implementation of Land Treatments: The aerial straw mulch was the alternative used to complete the mulching treatment as described above. No woodstraw was utilized on this fire due to limited production capability of manufacturer. The entire project was completed on October 5 and woodstraw was promised in the amount of 12 tons delivered on October 12, 2005. All of the acres planned were treated with certified weed-free straw. Many of the acres with treatments planned had trees with needles in the trees and these acres were still treated with mulch. Mulch layer ranges from 0.5 inches to 4 inches deep with the average depth estimated to be about 1 inch.

Seed was applied to all of the planned acres at the rate specified. Seeding operations went very well with the distribution on the ground matching the planned rate of 12 pls. lbs./acre.

An agreement was signed between all landowners that allowed treatment of private land through the use of the Wyden amendment.

Channel Treatments: n/a

Roads and Trail Treatments: Removal of culverts on FR 311A in Sawmill Creek are needed to allow passage of increased post-fire flows and associated debris. Existing culverts are too small to pass the expected post-fire runoff. The BAER team recommends removing the culverts and building fords at each crossing. Cost for culvert removal and ford construction are: $4,000/culvert X 2 culverts = $8,000.

Implementation of Road Treatments: Both culverts on the FR 311A in Sawmill Creek were removed and fords constructed as planned and designed above.

Structures: An early warning system is recommended for notification of potential rainfall events that may cause debris flows in the fire area. A RAWS station is currently available on the Uinta NF. This station can be transported to the Gregory fire and installed immediately. The weather station is to include an early warning signal to notify local authorities during rain events that may result in runoff within the burn area. The cost for the RAWS station includes transport to the Gregory fire from the Uinta NF in Utah, installation, replacement of parts and maintenance for one year of the station. Estimated cost is $5,000. Yearly maintenance beyond the first year is estimated at $1,000 per year.

Implementation of Early Warning System: An early warning system was transferred from the Uinta National Forest and placed on the Eastern ridge of Tollgate Gulch. It is fully operational and connected directly to the Sheriff's Dispatch office. It had been triggered one time as of October 12 and will need to be adjusted. They know to coordinate the adjustment with Russ Long (Forest Service contact) and Jay Breidenbach with the National Weather Service.

I. Monitoring Narrative:

(Describe the monitoring needs, what treatments will be monitored, how they will be monitored, and when monitoring will occur. A detailed monitoring plan must be submitted as a separate document to the Regional BAER coordinator.)

1. Conduct monitoring to determine if additional treatment is needed.
2. Monitoring should be used to evaluate and improve treatment effectiveness.
3. Monitoring for up to three years to evaluate treatment effectiveness is covered by BAER funds.

Monitoring if approved, will be conducted yearly as needed and requested for up to three years following implementation of BAER treatments to evaluate the effectiveness of the BAER treatments, and determine if additional treatments may be required.

Treatment Monitoring
The purpose of BAER monitoring in this is to confirm the effectiveness of ground cover soil stabilization and improvement treatments and to verify changes in ground cover. To accomplish this, surveys will be conducted along established roads and trails within the fire boundary to assess soil denudation and vegetation regeneration. Sediment collection structures may be placed at various control points to provided additional data.

Weed Monitoring
Conduct systematic ground surveys on fire suppression sites and in burned areas adjacent to infested sites. Conduct qualitative estimates of each of the invasive species mentioned above. Collect quantitative vegetation data using line intercepts subjectively placed within representative stands of invasive associations.

Other Monitoring
No other monitoring is deemed necessary as neither rare plant species or significant cultural resources have not been identified on Forest Service property within the fire boundary.

Costs
Monitoring Activity 1: Monitor all treated areas within the burn for treatment effectiveness during the first year following treatment.

Cost Estimate: $1,000 (includes field/data collection, materials/supplies, and report)

Monitoring Activity 2: In 2006, monitor all moderate and high intensity burn areas in the fire as well as ATV trails and roads to identify if populations of thistle, noxious weeds, or other undesirable plant species have established.

Cost Estimate: $1,200 (Includes 2 days for field/data collection, materials/supplies, and report)

Rocky Mountain Research Station (Pete Robichaud) expressed interest in performing monitoring on the effectiveness of WoodStraw applications. If RMRS becomes involved in monitoring, supplemental funding may be required to cover the additional associated costs.

Part VI – Emergency Rehabilitation Treatments and Source of Funds by Landownership

A. Initial Estimate of Costs submitted in initial funding request and approved by Regional Forester (Costs listed under column heading "Non-Fed" are for non-BAER treatments on private lands).

			NFS Lands			Other Lands				All
		Unit	# of	WFSU	Other	# of	Fed	# of	Non Fed	Total
Line Items	Units	Cost	Units	SULT $	$	units	$	Units	$	$
A. Land Treatments										
Aerial Seeding	acres	72	786	$56,592	$0		$0	131	$9,432	$66,024
Aerial Mulching	acres	458	209	$95,722	$0		$0	131	$59,998	$155,720
Aerial Woodstraw	acres	673	219	$147,387	$0		$0		$0	$147,387
Subtotal Land Treatments				$299,701	$0		$0		$9,432	$369,131
B. Channel Treatments										
na				$0	$0		$0		$0	$0
Subtotal Channel Treat.				$0	$0		$0		$0	$0
C. Road and Trails										
Culvert Replacment	each	4,000	2	$8,000	$0		$0		$0	$8,000
Jersey Barriers	each	300		$0	$0		$0	20	$6,000	$6,000
Subtotal Road & Trails				$8,000	$0		$0		$0	$14,000
D. Structures										
Early Warning System	each	5000	1	$5,000	$0		$0		$0	$5,000
Subtotal Structures				$5,000	$0		$0		$0	$5,000
E. BAER Evaluation										
Salary	team	9,568	1	$9,568	$0		$0		$0	$9,568
Helicopter	hour	950	1.8	$1,710	$0		$0		$0	$1,710
Subtotal Evaluation				$11,278	$0		$0		$0	$11,278
F. Monitoring										
Yr 1 Weed & Effectiver	job	2,200	1	$2,200	$0		$0		$0	$2,200
Subtotal Monitoring				$2,200	$0		$0		$0	$2,200
G. Totals				**$326,179**	**$0**		**$0**		**$9,432**	**$401,609**

B. Estimate of costs for implemented emergency treatments based on contract, supply, and personnel costs without reference to transaction reports.

			NFS Lands			Other Lands				All
		Unit	# of	WFSU	Other	# of	Fed	# of	Non Fed	Total
Line Items	Units	Cost	Units	SULT $	$	units	$	Units	$	$
A. Land Treatments										
Aerial Seeding	acres	36	786	$28,296	$0		$0	131	$4,716	$33,012
Aerial Mulching	acres	390	389	$151,710	$0		$0	131	$51,090	$202,800
Aerial Woodstraw	acres	673	0	$0	$0		$0		$0	$0
Subtotal Land Treatments				$180,006	$0		$0		$4,716	$235,812
B. Channel Treatments										
na				$0	$0		$0		$0	$0
Subtotal Channel Treat.				$0	$0		$0		$0	$0
C. Road and Trails										
Culvert Replacment	each	747	2	$1,494	$0		$0		$0	$1,494
Jersey Barriers	each	300		$0	$0		$0		$0	$0
Subtotal Road & Trails				$1,494	$0		$0		$0	$1,494
D. Structures										
Early Warning System	each	5000	1	$5,000	$0		$0		$0	$5,000
Subtotal Structures				$5,000	$0		$0		$0	$5,000
E. BAER Evaluation										
Salary	team	9,568	1	$9,568	$0		$0		$0	$9,568
Helicopter	hour	950	1.8	$1,710	$0		$0		$0	$1,710
Subtotal Evaluation				$11,278	$0		$0		$0	$11,278
F. Monitoring										
Yr 1 Weed & Effectiver	job	2,200		$0	$0		$0		$0	$0
Subtotal Monitoring				$0	$0		$0		$0	$0
G. Totals				**$197,778**	**$0**		**$0**		**$4,716**	**$253,584**

PART VII - APPROVALS

1. /s/ Lyn Morelan for — 9/14/2005
   Forest Supervisor (signature) — Date

2. /s/ Mary Wagner Acting — 09/16/2005
   Regional Forester (signature) — Date