# SOUTH DAKOTA BLACK HILLS COLD STREAM SURVEY

### **Higgins Gulch, Lawrence County**

09-0045-00

2008

Table 1. Population and Biomass Estimates for Higgins Gulch

Site Number: 182 Site Midpoint (Latitude, Longitude): 44.46415850, -103.94874003 Survey Completed by: Stream Classification: BK3							Date Sampled: Site Length (m): Mean Width (m): Number of Pass:		3.5	(um pH: Wat	Conductivity (umhos/cm): pH: Water Temperature (C): Voltage:		407 8.3 13.5 300
Species	Size Class	Total Number Captured	Est. # in site	Upper 95% Cl	Lower 95% Cl	# per Hectacre	Kg per Hectacre	# per Km	# per Acre	lb. per Acre	# per Mile	Mean Length (mm)	Mean Weight (grams)
Brook Trout	<200mm	14	14	14	14	405	15	140	164	13.29	225	147.0	36.7
Brook Trout	>=200mm	1	1	1	1	29	3	10	12	2.46	16	212.0	95.0
Brook Trout	All	15	15	15	15	434	18	150	176	15.74	241	151.3	40.6

Stream sites are classified based on the estimates of adult trout over eight inches that exist within the site. Estimates are derived from 3-pass backpack electrofishing surveys at 100-meter sites within streams. While all fish in the site are collected and measured, only trout species are used for classifications. Sites are numbered in accordance for the distance (m) from the stream confluence of a higher order stream/river.

Based on number of trout in excess of eight inches				
Class BR1	Number of wild Brown Trout exceeds 150 per acre			
Class BR2	Number of wild Brook Trout ranges from 25 to 150 per acre			
Class BR3	Number of wild Brown Trout is less than 25 per acre			
Class BK1	Number of wild Brook Trout exceeds 150 per acre			
Class BK2	Number of wild Brook Trout ranges from 25 to 150 per acre			
Class BK3	Number of wild BrookTrout is less than 25 per acre			
Class RB1	Number of wild Rainbow Trout exceeds 25 per acre			
Class RB2	Number of wild Rainbow Trout is less than 25 per acre			

Table 2. Species composition and population estimates on Higgins Gulch, 1998-2008

#### Site 182

Species/Size	Date	Pop Est.	(95% C.I.)	Stream Classification
Brook Trout <200mm	Jul 10, 2008	14	14-14	
Brook Trout >=200mm	Jul 10, 2008	1	1-1	ВКЗ

## Length Frequency Distribution

Length frequency histogram of species sampled by year.

#### Site: 182 Species: Brook Trout

