SOUTH DAKOTA BLACK HILLS COLD STREAM SURVEY

Grizzly Bear Creek, Custer County 21-0016-00 1994

Table 1. Population and Biomass Estimates for Grizzly Bear Creek

Site Number: 41

Site Midpoint (Latitude, Longitude): 43.87710125, -103.43943546

Survey Completed by: South Dakota Game, Fish and Parks

Stream Classification: BK2

Date Sampled: 06/08/1994

Site Length (m): 100

Mean Width (m): 2.9

Number of Pass: 3

Conductivity 71 (umhos/cm):

pH: 8.5

Water Temperature (C): 16.0

Voltage: 600

Species	Size Class	Total Number Captured	Est. # in site	Upper 95% CI	Lower 95% CI	# per Hectacre	Kg per Hectacre	# per Km	# per Acre	lb. per Acre	# per Mile	Mean Length (mm)	Mean Weight (grams)
Brook Trout	<200mm	164	166	170	164	5804	91	1660	2351	81.50	2671	114.4	15.7
Brook Trout	>=200mm	3	3	4	3	105	16	30	42	13.92	48	235.0	148.7
Brook Trout	All	167	170	174	167	5944	108	1700	2407	96.13	2735	116.6	18.1
Creek Chub	All	3	3	3	3	105	1	30	42	0.59	48	84.7	6.3
Hatchery Brown Trout	>=200mm	5	5	5	5	175	24	50	71	21.76	80	240.2	139.4
Hatchery Brown Trout	All	5	5	5	5	175	24	50	71	21.76	80	240.2	139.4
Longnose Dace	All	43	60	90	43	2098	9	600	850	7.97	965	79.0	4.3
White Sucker	All	4	4	6	4	140	15	40	57	13.24	64	210.8	106.0

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 Grizzly Bear Creek, 1984-1994

Site 41

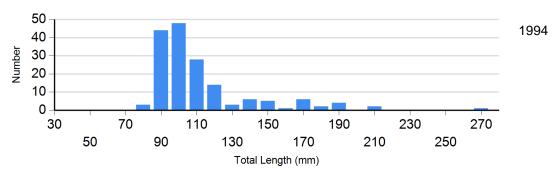
Species/Size	Date	Pop Est.	(95% C.I.)	Stream Classification
Brook Trout <200mm	Jun 08, 1994	166	164-170	
Brook Trout >=200mm	Jun 08, 1994	3	3-4	BK2
Creek Chub	Jun 08, 1994	3	3-3	
Hatchery Brown Trout >=200mm	Jun 08, 1994	5	5-5	
Longnose Dace	Jun 08, 1994	60	43-90	
White Sucker	Jun 08, 1994	4	4-6	

Length Frequency Distribution

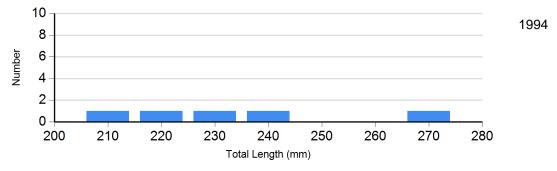
Length frequency histogram of species sampled by year.

Site: 41

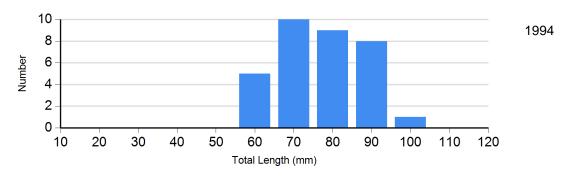
Species: Brook Trout



Site: 41 Species: Hatchery Brown Trout

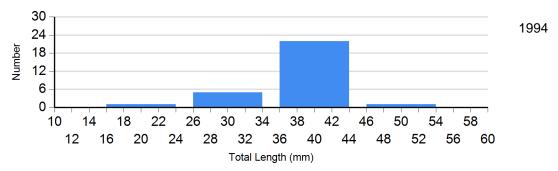


Site: 41 Species: Longnose Dace



Site: 41

Species: Unidentified YOY Trout



Site: 41

Species: White Sucker

