

SOUTH DAKOTA BLACK HILLS COLD STREAM SURVEY
Annie Creek, Lawrence County
09-0074-00
1995

Table 1. Population and Biomass Estimates for Annie Creek

Site Number: 2
Site Midpoint (Latitude, Longitude): 44.32728433, -103.89361583
Survey Completed by: Chadwick Ecological Services
Stream Classification: BK2

Date Sampled: 08/29/1995
Site Length (m): 100
Mean Width (m): 2.2
Number of Pass: 3

Conductivity (umhos/cm):
pH:
Water Temperature (C):
Voltage:

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	48	48	50	48	2233	54	480	904	48.53	772	121.3	24.3
Brook Trout	>=200mm	5	5	5	5	233	25	50	94	22.72	80	215.2	109.4
Brook Trout	All	53	53	55	53	2465	80	530	998	71.25	853	130.1	32.4
Mountain Sucker	All	25	33	51	25	1535	7	330	622	6.06	531	75.5	4.4

Site Number: 16
Site Midpoint (Latitude, Longitude): 44.33009788, -103.87749203
Survey Completed by: Chadwick Ecological Services
Stream Classification: None

Date Sampled: 08/28/1995
Site Length (m): 100
Mean Width (m): 2.9
Number of Pass: 3

Conductivity (umhos/cm):
pH:
Water Temperature (C):
Voltage:

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)
Mountain Sucker	All	3	3	4	3	103	1	30	42	0.53	48	88.7	5.8

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 Brook Trout 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 Annie Creek, 1985-1995

Site 2

Species/Size	Date	Pop Est.	(95% C.I.)	Stream Classification
Brook Trout <200mm	Oct 27, 1992	11	11-11	
	Aug 29, 1995	48	48-50	
Brook Trout >=200mm	Oct 27, 1992	3	3-3	BK3
	Aug 29, 1995	5	5-5	BK2
Mountain Sucker	Aug 29, 1995	33	25-51	

Site 16

Species/Size	Date	Pop Est.	(95% C.I.)	Stream Classification
Mountain Sucker	Jun 24, 1992	2	2-2	

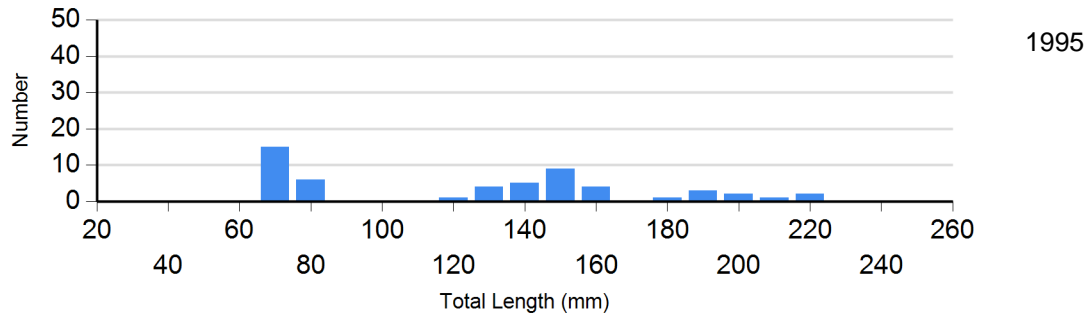
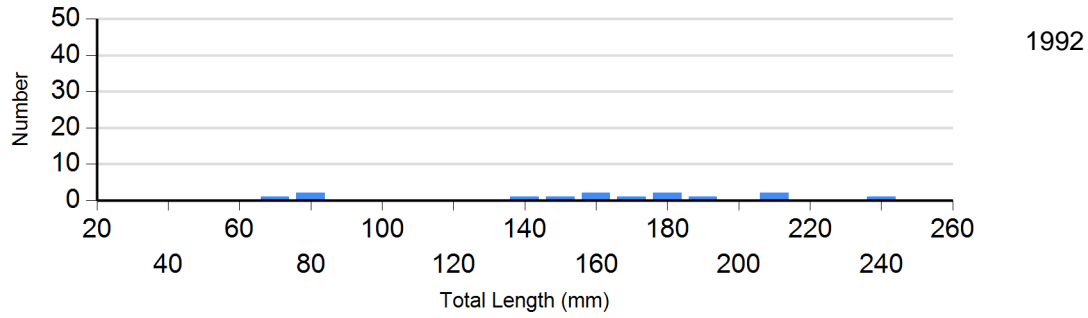
Mountain Sucker	Oct 28, 1992	2	2-4
	Oct 28, 1992	2	2-2
	Aug 28, 1995	3	3-4

Length Frequency Distribution

Length frequency histogram of species sampled by year.

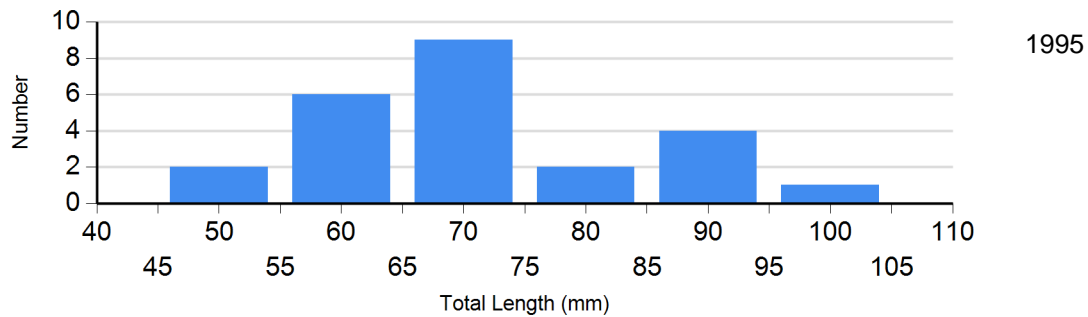
Site: 2

Species: Brook Trout



Site: 2

Species: Mountain Sucker



Site: 16
Species: Mountain Sucker

