

RESERVOIR SEDIMENT
DATA SUMMARY

U. S. DEPARTMENT OF AGRICULTURE
SOIL CONSERVATION SERVICE

CS-34 Rev. 6-66

Lowrey Draw, Site No. 12

NAME OF RESERVOIR

56-7

DATA SHEET NO.

DAM	1. OWNER Edwards Plateau C. D.			2. STREAM Trib. of Lowrey Draw			3. STATE Texas					
	4. SEC. TWP. RANGE			5. NEAREST P. O. 2.5 mi. NE Sonora			6. COUNTY Sutton					
	7. LAT. 30° 35' 30" N LONG 100° 36' 47" W			8. TOP OF DAM ELEVATION 2204.0			9. SPILLWAY CREST ELEV. 2198.0					
RESERVOIR	10. STORAGE ALLOCATION		11. ELEVATION TOP OF POOL		12. ORIGINAL SURFACE AREA, ACRES		13. ORIGINAL CAPACITY, ACRE-Feet		14. GROSS STORAGE, ACRE-Feet		15. DATE STORAGE BEGAN	
	a. FLOOD CONTROL		2198.0		122.5		1024.5		1110.0		June 15, 1961	
	b. MULTIPLE USE											
	c. POWER										June 15, 1961	
	d. WATER SUPPLY											
	e. IRRIGATION											
	f. CONSERVATION											
g. INACTIVE 1/		2180.8		14.1		85.5		85.5				
17. LENGTH OF RESERVOIR 0.89 MILES				AV. WIDTH OF RESERVOIR 0.21 MILES								
WATERSHED	18. TOTAL DRAINAGE AREA 4.38 SQ. MI.				22. MEAN ANNUAL PRECIPITATION 21.48(45 yr) INCHES							
	19. NET SEDIMENT CONTRIBUTING AREA 4.19 SQ. MI.				23. MEAN ANNUAL RUNOFF 0.54(8 yr) INCHES							
	20. LENGTH 3.26 MILES		AV. WIDTH 1.34 MILES		24. MEAN ANNUAL RUNOFF 126(8 yr) AC.-FT.							
	21. MAX. ELEV. 2350		MIN. ELEV. 2170		25. ANNUAL TEMP: MEAN 66°F RANGE 0° to 105°F							
	26. DATE OF SURVEY		27. PERIOD YEARS	28. ACCL. YEARS	29. TYPE OF SURVEY	30. NO. OF RANGES OR CONTOUR INT.	31. SURFACE AREA, ACRES	32. CAPACITY, ACRE-Feet	33. C/I. RATIO, AC.-FT. PER AC.-FT.			
6-15-61						14.1^{1/}	85.46^{1/}	0.68^{1/}				
2-6-69		7.65	7.65	Contour(D)	2 CI	14.1^{1/}	84.03^{1/}	0.67^{1/}				
26. DATE OF SURVEY		34. PERIOD ANNUAL PRECIPITATION		35. PERIOD WATER INFLOW, ACRE-Feet			36. WATER INFL. TO DATE, AC.-FT.					
				a. MEAN ANNUAL	b. MAX. ANNUAL	c. PERIOD TOTAL	a. MEAN ANNUAL		b. TOTAL TO DATE			
2-6-69		20.83		126	406	1008	126		1008			
26. DATE OF SURVEY		37. PERIOD CAPACITY LOSS, ACRE-Feet			38. TOTAL SED. DEPOSITS TO DATE, ACRE-Feet							
		a. PERIOD TOTAL	b. AV. ANNUAL	c. PER SQ. MI.-YEAR	a. TOTAL TO DATE	b. AV. ANNUAL	c. PER SQ. MI.-YEAR					
2-6-69		1.43^{1/}	0.19^{1/}	0.04^{1/}	1.43^{1/}	0.19^{1/}	0.04^{1/}					
26. DATE OF SURVEY		39. AV. DRY WGT., LBS. PER CU. FT.		40. SED. DEP., TONS PER SQ. MI.-YR.		41. STORAGE LOSS, PCT.		42. SED. INFLOW, PPM				
		a. PERIOD	b. TOTAL TO DATE	a. AV. ANN.	b. TOT. TO DATE	a. PERIOD	b. TOT. TO DATE					
2-6-69		64	62.2^{1/}	62.2^{1/}	0.22^{1/}	1.67^{1/}	1451	1451				

26. DATE OF SURVEY	43. DEPTH DESIGNATION RANGE IN FEET BELOW, AND ABOVE, CREST ELEVATION												
PERCENT OF TOTAL SEDIMENT LOCATED WITHIN DEPTH DESIGNATION													

26. DATE OF SURVEY	44. REACH DESIGNATION PERCENT OF TOTAL ORIGINAL LENGTH OF RESERVOIR													
	0-10	10-20	20-30	30-40	40-50	50-60	60-70	70-80	80-90	90-100	-105	-110	-115	-120
PERCENT OF TOTAL SEDIMENT LOCATED WITHIN REACH DESIGNATION														

45. RANGE IN RESERVOIR OPERATION							
WATER YEAR	MAX. ELEV.	MIN. ELEV.	INFLOW, AC.-FT.	WATER YEAR	MAX. ELEV.	MIN. ELEV.	INFLOW, AC.-FT.
1961	2174.9	2167.6	49				
62	2170.4	2167.6	2				
63	2169.8	2167.6	2				
64	2188.4	2167.6	406				
65	2185.5	2167.6	326				
66	2177.6	2167.6	51				
67	2169.9	2167.6	2				
68	2181.0	2167.6	170				
69	2167.6	2167.6	0				

46. ELEVATION-AREA-CAPACITY DATA								
ELEVATION	AREA	CAPACITY	ELEVATION	AREA	CAPACITY	ELEVATION	AREA	CAPACITY
Original Capacity - 1961			2168.0	0.03	0.01	2172.0	3.85	4.85
2180.8	14.05	85.46	2167.6	0.00	0.00	2170.0	0.50	0.50
2180.0	12.24	74.95	1969 Capacity			2168.0	0.00	0.00
2178.0	10.73	51.98	2180.8	14.05	84.03			
2176.0	8.72	32.53	2180.0	12.24	73.52			
2174.0	6.84	16.97	2178.0	10.73	50.55			
2172.0	3.88	6.25	2176.0	8.72	31.10			
2170.0	1.17	1.20	2174.0	6.84	15.54			

47. REMARKS AND REFERENCES

1/ Sediment pool only

Land Use in Watershed: 98 percent rangeland; 2 percent roads.

Published Reports: Sediment Yield from Rangeland Watersheds in the Edwards Plateau of Texas, Williams, J. R. and Knisel, W. G., Jr., ARS 41-185, October 1971, p. 9.

48. AGENCY MAKING SURVEY Blackland Conservation Research Center, Agric. Research Serv.

49. AGENCY SUPPLYING DATA Agricultural Research Service

50. DATE Jan. 13, 1972