

RESERVOIR SEDIMENTATION
DATA SUMMARY

Lake Eldorado
NAME OF RESERVOIR

46 - 11
DATA SHEET NO.

DAM	1. OWNER City of Eldorado			2. RIVER Satchel Creek			3. STATE Kansas				
	4. SEC. 20 TWP. 25S RANGE 6E			5. NEAREST TOWN Eldorado			6. COUNTY Butler				
	7. STREAM BED ELEV. 1,268			8. TOP OF DAM ELEV. 1,308			9. SPILLWAY CREST ELEV. 1,300				
RESERVOIR	10. STORAGE ALLOCATION	11. ELEVATION TOP OF POOL	12. SURFACE AREA ACRES	13. STORAGE ACRE- FEET	14. ACCUMULATED ACRE- FEET	15. DATE STORAGE BEGAN					
	a. FLOOD CONTROL					April 1928					
	b. POWER										
	c. WATER SUPPLY	1,300	362	3,213	3,213	16. DATE NORMAL OPER. BEGAN					
	d. IRRIGATION					April 1928					
	e. CONSERVATION										
	f. INACTIVE										
WATERSHED	17. LENGTH OF RESERVOIR 2.65 MILES			AV. WIDTH OF RESERVOIR 0.21 MILES							
	18. TOTAL DRAINAGE AREA 35.1 SQ. MI.			22. MEAN ANNUAL PRECIPITATION 31.03 (45) INCHES							
	19. NET SEDIMENT CONTRIBUTING AREA 34.3 SQ. MI.			23. MEAN ANNUAL RUNOFF INCHES							
	20. LENGTH 12 MILES			AV. WIDTH 3 MILES			24. MEAN ANNUAL RUNOFF AC.-FT.				
	21. MAX. ELEV. 1,520			MIN. ELEV. 1,268			25. CLIMATIC CLASSIFICATION Humid				
SURVEY DATA	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/W RATIO AC.-FT. PER SQ. MI.			
	1928	-	-	-	-	362	3,213	91.5			
	April 1937	9.0	9.0	Range detailed	22	362	3,082	87.8			
	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			
	April 1937	30.11									
	26. DATE OF SURVEY	37. PERIOD SEDIMENT DEPOSITS 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				
	April 1937	131	14.6	0.426	131	14.6	0.426				
	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. ANNUAL	b. TOT. TO DATE	a. PERIOD	b. TOT. TO DATE				
April 1937	66 (4)	612	612	0.45	4.08						

26. DATE OF SURVEY	43. DEPTH DESIGNATION RANGE IN FEET ABOVE, AND BELOW, 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	-125
	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.

46. ELEVATION-AREA-CAPACITY DATA								
ELEVATION	AREA	CAPACITY	ELEVATION	AREA	CAPACITY	ELEVATION	AREA	CAPACITY

47. REMARKS AND REFERENCES
 Jones, V. H. Advance report on the sedimentation survey of Lake Eldorado, Eldorado, Kansas. U.S. Soil Conserv. Serv. SCS-SS-25, 14 pp., illus., processed. Washington, D. C. July 1938.
 A resurvey was made in 1948 by Black & Veatch, Consulting Engineers, Kansas City, Missouri. Evaluation of this survey has not been made.
 Sediment is sand, silt, and clay, with little or no coarse material.
 Mechanical analysis shows sand 57.6%, silt 23.0% and clay 19.4% in the average sample.
 Region 5, Soil Conservation Service
 U. S. Dept. of Agriculture
 Lincoln, Nebraska

48. AGENCY SUPPLYING DATA

49. DATE May 25, 1951