

RIFC-MT
Survey

CHANNEL SURVEY

COAL CREEK

Survey 9/27/46

JRC 10/1/46

Sect No.	Road Log. mi.	X-sec sq. ft.	slope	Map dist. mi.	Vol. ac ft.
① bridge	0	600	3%	700 X .45	
		800	3		
④ dam	1	2000	3	1400 X .45	1100 ^{ft} av.
		1000	3%	1500 X .45	$\times 2 \frac{1}{2} \times .12$
⑩ S. Fork	2	800	3 $\frac{1}{2}$	900 X .45	= 300. ac ft.
		1200	3	1000 X .45	$2 \frac{25}{2}$
19 Ashdown	3	360	2	780	
		500	3	430	510 ^{ft} av.
⑩ S. Fork	4	900	3	450	$\times 1 \frac{7}{8} \times .12$
				450	= 108. ac ft.
⑧	5 $^{\circ}$	400	3	400	
		400	3	400	375 ^{ft} av.
⑨	6	300	3	350	$\times 1 \frac{5}{8} \times .12$
		400	3	350	= 68. ac ft.
⑩ S. Fork	7	300	3	350	
		400	3	350	310 ^{ft} av.
⑩ S. Fork	8	300	4	350	$\times 2 \frac{1}{2} \times .12$
		250	4	350	= 75. ac ft.
⑩ Ashdown	9 $^{\circ}$	200	4	250	
					551 ac ft.

Gully Sects.

Unit No.	Xsect.	Number	Spacing	Vol cu ft	Vol. acft.	F.S.
20	45	200	150'	6750X200	31	IV
21	45	205	"	6750X205	32	IV
22	40	150	100'	4000X150	14	IV
26	20	200	"	2000X200	9	IV
28	30	300	"	3000X300	20	III
29	20	300	"	2000X300	14	III
31	10	140	"	1000X140	3	III
		1495			123	

Drops

10	55	4	$\frac{1}{2}$ sq.mi.	ESTIMATED			
sq.ft.	miles	acres	sq. ft.	miles	sq.ft.	miles	acres
100			200		50		
20	2 $\frac{1}{2}$	14.5	45	2 $\frac{1}{2}$	10	2 $\frac{1}{2}$	7.5
125			200		150		
20	2 $\frac{1}{2}$	17.5	45	4 $\frac{1}{2}$	10	1 $\frac{1}{2}$	9.5
100	0 $\frac{1}{2}$		100		100		
10		3.5	45	2 $\frac{1}{2}$	10	1 $\frac{1}{2}$	9.5
75			200		75		
10	0 $\frac{1}{2}$	2.5	45	5 $\frac{1}{2}$	10	1 $\frac{1}{2}$	7.5
50			100		200		
10	2 $\frac{1}{2}$	7.5	45	4 $\frac{1}{2}$	20	2 $\frac{1}{2}$	26.5
200			100				
30	3 $\frac{1}{2}$	42.0	55	16 $\frac{1}{2}$	140.0		
100			55				
15	1 $\frac{1}{2}$	14.0	20	3 $\frac{1}{2}$	12.0		
200			100				
45	3 $\frac{1}{2}$	44.5	20	1 $\frac{1}{2}$	7.5		

Fun | 7900

Debris B.
Canyon

Overflow

Total 7,838
Av = 196 - 40 yrs

$$A = 196 \cdot 40^{\frac{1}{2}}$$

146.

354.

Total Est. =

123

146
258

550
61

688

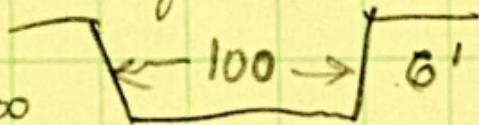
1

Coal Creek

① ~~at bridge~~

80°

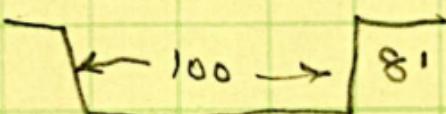
$$A = 600$$



$$S = 3\%$$

②

$$A = 800$$



80°

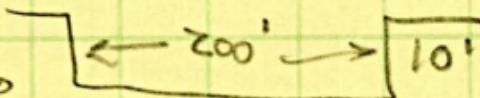
$$S = 3\%$$

③

Below dam

81°

$$A = 2000$$

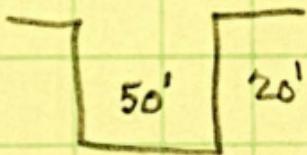


$$S = 3\%$$

④ At dam

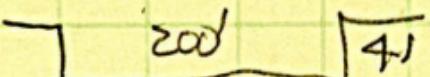
81°

$$A = 1000$$

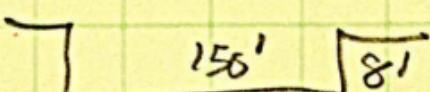


$$S = 3\%$$

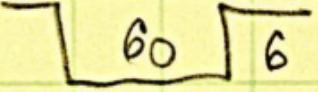
Debris dam full
debris slope = 1%

⑤ 

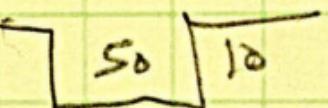
$$A = 800 \quad s = 3\frac{1}{2}\% \quad 82\text{a}$$

⑥ 

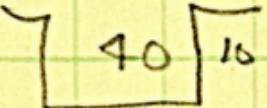
$$A = 1200 \quad s = 3\% \quad 82\text{b}$$

⑦ 

$$A = 360 \quad s = 2\% \quad 83\text{a}$$

⑧ 

$$A = 500 \quad s = 5\% \quad 83\text{b}$$

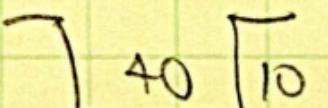
⑨ 

$$A = 400 \quad s = 3\% \quad 84\text{a}$$

Debris Dam full $84\frac{25}{25}$

debris slope = $1\% + 2\text{ ft}$

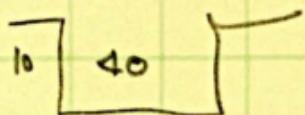
⑩ below S. Fork



$$A = 400 \quad s = 3\% \quad 84\text{b}$$

⑪ above S. Fork

$$A = 400$$



$$\begin{aligned} & \text{Eq. } \left\{ \begin{array}{l} 85^\circ \\ 92^\circ \end{array} \right. \\ & S = 3\% \end{aligned}$$

South Fork boulders deposit

$$\text{Slope} = 5\%$$

$$\text{Area} = 2500' \times 150'$$

$$\text{depth} = 5 \text{ ft.}$$

$$\text{Vol} = 43 \text{ ac-ft}$$

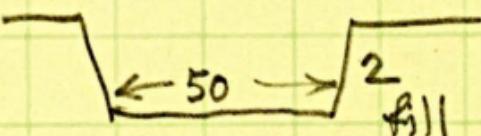
South Fork Sect.

at mouth.

85°

①

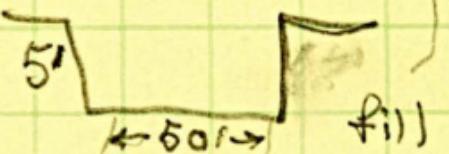
$$A = 100$$



$$S = 4\%$$

②

$$A = 250$$



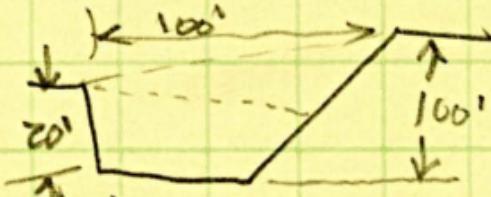
86.5

$$S = 7\%$$

③ at 1st Fork East.

87°

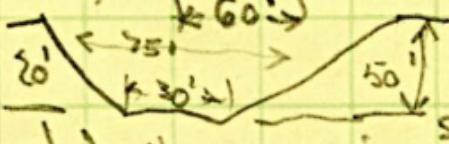
$$A = 4000$$



$$S = 10\%$$

④

$$A = 1500$$

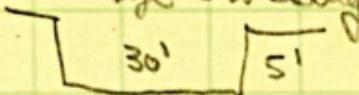


$$S = 7\%$$

88.0

⑤

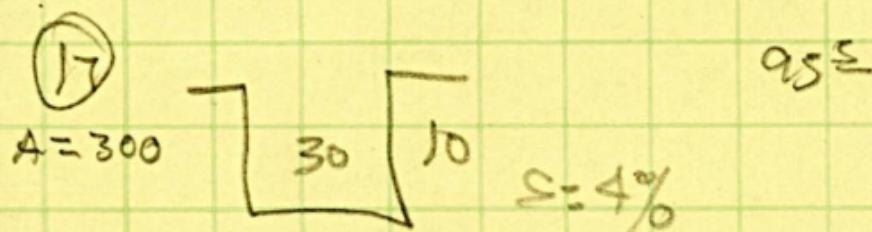
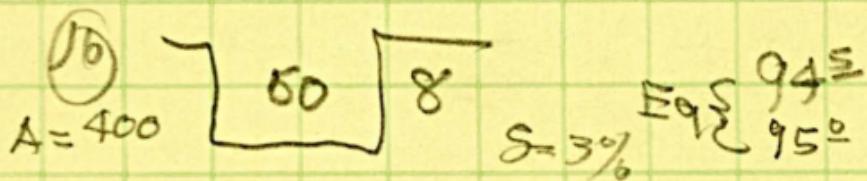
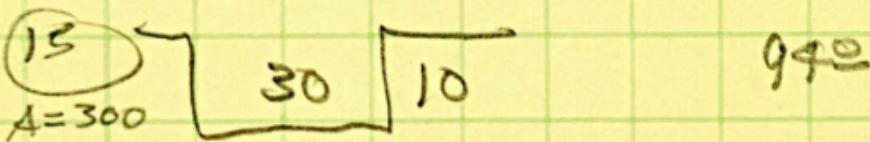
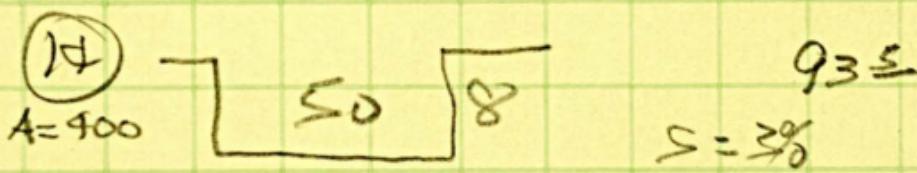
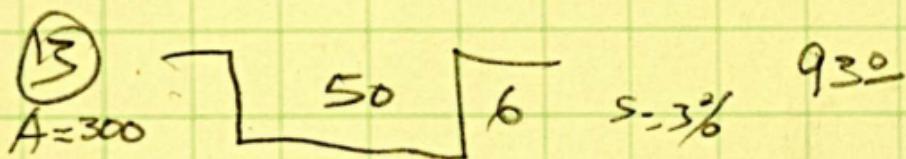
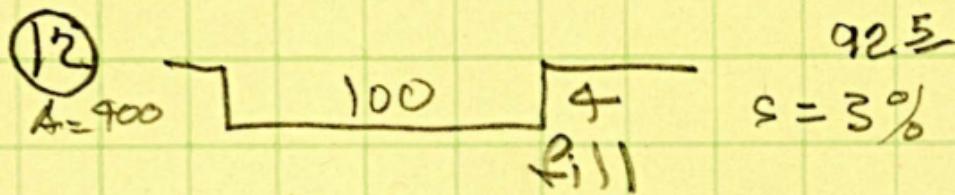
$$A = 150$$



$$S = 5\% \quad 88.5$$

at S, Fork 92°

Coal Creek (cont)



(18) $A = 250$

$$1 \left[25 \sqrt{10} \right] s = 9\%$$

96 \pm

below Ashdown.

(19) $A = 200$

$$1 \left[20 \sqrt{10} \right] s = 9\%$$

96 \pm

(20)

recent fill behind slide
from Highway constr.

slope = 2%

width = 150' ave

length = 2000 ft?

depth = 25-30' at dam