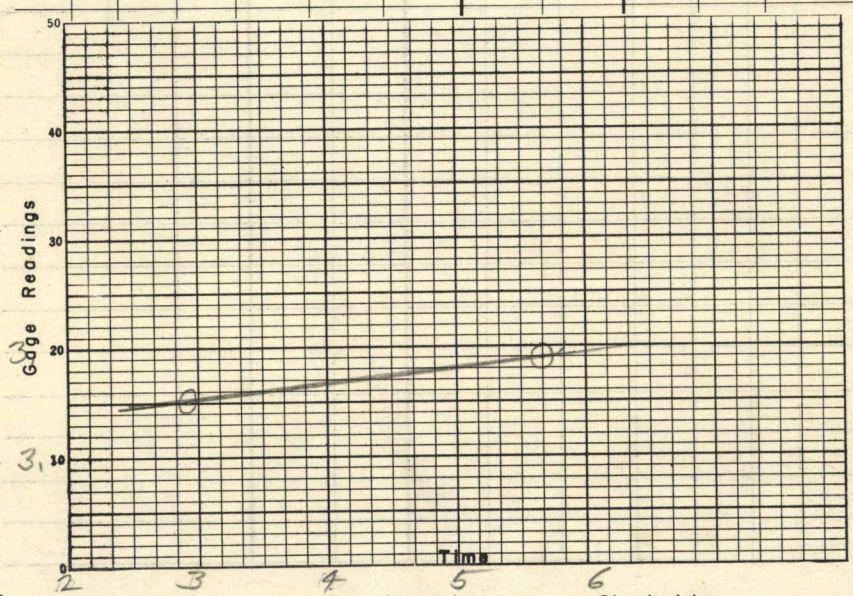
River at

Dist. from initial point	Angle Coefficient	Depth	Depth of observation	Revolutions	Time in seconds	VELOCITY At point	VELOCITY Mean in section	Corr. Area	Area	Width	Discharge



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UNITED STATES
DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY

Water Resources Branch

DISCHARGE MEASUREMENT NOTES

Meas. No. 519

Checked by _____

Date _____

Water temp. _____ °F

Air temp. _____ °F

Time _____

Not Reviewed
Engr. in Chg.

Brazos River at Richmond, Tex.

Date Aug 20, 19 57 Party Sauer & Tinker

Width 236.4 Area 1,230 Vel. 1.05 G.H. _____ Disch. 1,290

Method 6.2.8 No. Secs. 22 G.H. Chng. +0.11 ft. per hr. Time meas. 1.1 hrs.

Meter No. 3052 Date Rated Jan 54 Susp. 30 c.s. Boat Susp. Coef. 1.005

Method Coef. 1.00 Hor. angle Coef. 1 Used rating for, rod 5 Susp.

Meter 0.5 ft. above bottom of weight

Spin before meas. OK after OK

Wading, cable, ice, boat, upstr., downstr., side bridge 1500 feet, mile, above, below gage, and at large sand bar

Chain, wire, found 58.70 at _____ G-Sta.

Changed to _____ at _____

Correct length 58.68

Levels Obtained _____

Measurement rated, excellent (2 %), good (5%) fair (8 %), poor (over 8 %) based on following

Cross section uniform sand

GAGE READINGS

Time	Meas	Recorder (WWT)	Tape	Inside	Outside
10:05am	W	Wt = 3.04	3.97	dry	3.02
2:55pm	W	Wt = 3.15			
3:50	(S)	(3.16)			
4:55	(E)	(3.18)			
5:40pm	W	WT = 3.19			
~~Weighted~~ MGH		3.17			
GH Corr.					
Correct MGH					

Flow smooth Weather hot - clear

Other —

Gage Gage well was full of sand - cleaned out some but it got dark - will return tomorrow - Record removed No Intakes flushed No

Pencil ~~4B~~ NONE Wt. Adj. No Paper dry

Record Float on sand Chart time OK Clock Reg. No

Observer —

Control —

Remarks Min. ind = 3.97 } Both Reset.
Max. ind = 4.29 }

Page 1 of ___ G.H. of zero flow _____ ft.

River at

Dist. from initial point	Angle Coefficient	Depth	Depth of observation	Revolutions	Time in seconds	VELOCITY At point	VELOCITY Mean in section	Corr. Area	Area	Width	Discharge
		REW @ 3:50 pm									
25		0								2½	—
		All velocities are recorded in reverse									
30		3.7	.7	7	43	.38	.40	27.8		7½	11.1
			3.0	7	40	.41					
40		8.6	1.7	7	45	.36	.69	86		10	59.3
			6.9	20	44	1.02					
50		12.5	2.5	25	42	1.32	1.26	125		10	158
			10.0	25	46	1.21					
60		12.4	2.5	25	41	1.35	1.34	124		10	166
			9.9	25	42	1.32					
70		12.2	2.4	25	49	1.14	1.19	122		10	145
			9.8	25	45	1.24					
80		9.6	1.9	20	46	.97	1.03	96		10	98.8
			7.7	20	41	1.09					
90		8.8	1.8	25	47	1.18	1.25	88		10	110
			7.0	25	42	1.32					
100		8.0	1.6	20	40	1.12	1.26	80		10	101
			6.4	25	40	1.39					
110		7.0	1.4	25	46	1.21	1.28	70		10	89.6
			5.6	25	41	1.35					
120		6.3	1.3	20	42	1.06	1.19	63		10	75.0
			5.0	25	42	1.32					
130		5.5	1.1	25	50	1.12	1.19	55		10	65.5
			4.4	25	44	1.26					
140		5.0	1.0	20	45	.99	1.10	50		10	55.0
			4.0	25	46	1.21					
150		4.4	.9	20	50	.90	.98	44.0		10	43.1
			3.5	20	42	1.06					
160		3.8	.8	15	42	.80	.86	38.0		10	32.7
			3.0	20	48	.93					

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Dist. from initial point	Angle Coefficient	Depth	Depth of observation	Revolutions	Time in seconds	VELOCITY At point	VELOCITY Mean in section	Corr. Area	Area	Width	Discharge
170		3.3	.7	15	46	.74	.71	33.0		10	23.4
			2.6	15	50	.68					
180		2.9	1.7	15	52		.65	29.0		10	18.8
190		2.5	1.5	10	48		.48	31.2		12½	15.0
205		2.0	1.2	10	57		.41	30.0		15	12.3
220		1.5	.9	7	59		.28	26.2		17½	7.3
240		0.7	Est v = 1/3 of sta 220				(.09)	13.6		19½	1.2
259		0								9½	—
234			LEW @ 4:55 pm					1231.8		234	1288.0
											X1.005
											1294

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