



FIELD RECORDING AND PLAYBACK INFORMATION



PROSPECT HILA Pueblo COUNTY OR PARISH _____ STATE OR PROVINCE Globe COUNTRY ARIZONA CLIENT _____ SHEET NO. _____
 LEFT STORAGE _____ ARRIVED FIELD _____ LEFT FIELD _____ ARRIVED STORAGE _____ DATE 2-15-60 OBSERVER _____ PARTY NO. 274

IDENTIFICATION OF RECORDING										CHARGE (E)				SEISMOMETERS AND SPREAD (F)			AMPLIFIER SYSTEM						MAGNETIC RECORDER - REPRODUCER			REMARKS								
LINE NUMBER	PROFILE NUMBER	SHOT NO.	RECORD NUMBER (A)	MAGNETIC DISC OR TAPE		TIME	PROFILE DIRECTION (B)		SHOT POINT OFFSET (D)		NUMBER OF CHARGES	TOTAL CHARGE	CODE (E)	DEPTH		PRIMACORD	CAPS USED	CODE (F)	SEIS. DEPTH	S.P. SEIS. OFFSET	WATER DEPTH MEASURED AT	FILTERS		INITIAL ATTENUATION			A.G.C.	ULTIMATE SENSITIVITY	PER CENT OUTPUT	CIRCUIT TYPE (H)	PER CENT MODULATION	MOVEOUT CAM NO.	SPREAD LENGTH ADJUSTMENT (I)	
				SERIAL NUMBER	HEAD GROUP NO.		GRP.	BEARING	DIRECTION OF GRP. TAPPED	DIST.				DIR.	TOP							BOT.	FROM	TO	HIGH CUT								LOW CUT	SETTING
1	1					4:00																M 140	0	90	60	✓	20	70						
2	2					4:10																M 140	0	50	20		-10	70						
2	3					4:30																M 140	0	40	20		-10	70						
3	4					4:40																M 140	0	90	70		-30	70						
4	5					5:00																M 140	0	30	40		-10	70						

ADDITIONAL REMARKS AND DIAGRAMS

INSTRUCTIONS:

(A) Use M-1, M-2, etc., for monitor or direct records and P-1, P-2, etc., for playback records.
 (B) Give bearings of end groups with reference to spread centers. Use recording boat as reference for water work. (C) Give direction for group tapped on each split spread with reference to spread center. Tap group in direction shooting is progressing. (D) Surveyor's sheets give exact data. Give any changes made by drillers, etc. (E) Draw charge patterns on lower right part of sheet and identify with code. Surveyor's sheets give exact dimensions of regular patterns. (F) Give seis. patterns of groups and group layouts on lower center part of sheet. Identify with code. Surveyor's sheets give complete dimensions of regular group layouts. (G) Split, single-end, etc. (H) Straight, composite type, etc. Draw diagrams of special types and special group to amplifier channel to magnetic track connections. (I) When making moveout corrections with Techno, give head dial readings for 1 and 24 when velocity cam follower on maximum radius.

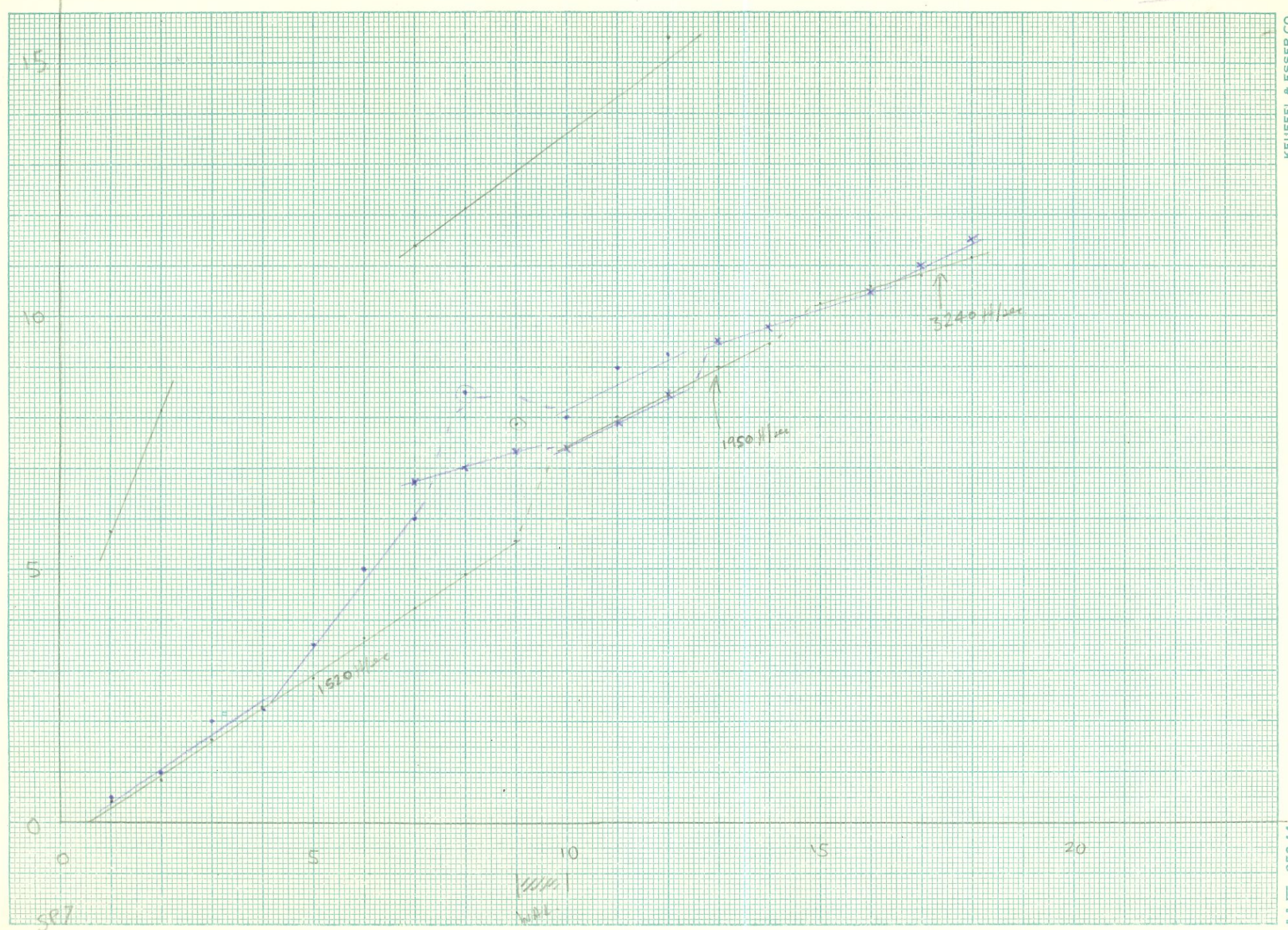
SEISMOMETER AND SPREAD TYPES (F)							
CODE	SEIS. TYPE	NO. PER GROUP	SEIS. INT.	SEIS. PATTERN OF GROUP	NO. GROUPS	GROUP INTERVAL	TYPE OF GROUP LAYOUT (G)

LOG LEVEL INDICATOR CALIBRATION								
OSCILLATOR SIGNAL RANGE _____ mv. TO _____ μ v.								
CALIB. RECORD NUMBER	UNIT NUMBER	FED BY GROUP NUMBER	FILTERS		SENS.	TIME CONSTANT	DEFL.	COMP. RANGE (db)
			HIGH	LOW				

CHARGE ARRANGEMENT (E)		
CODE: A	CODE: B	CODE: C

SWAC

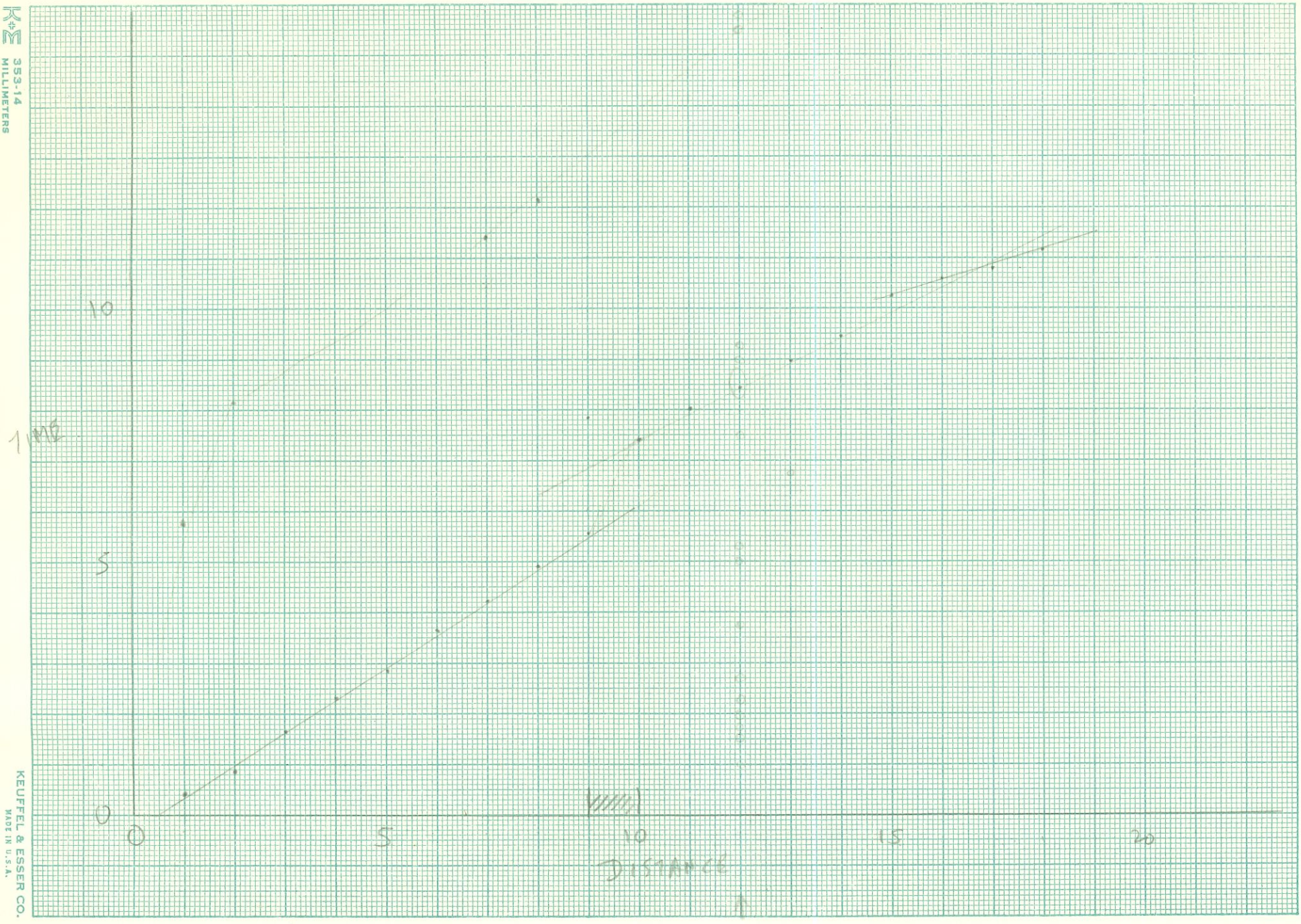
8 & 10 (1)



of of

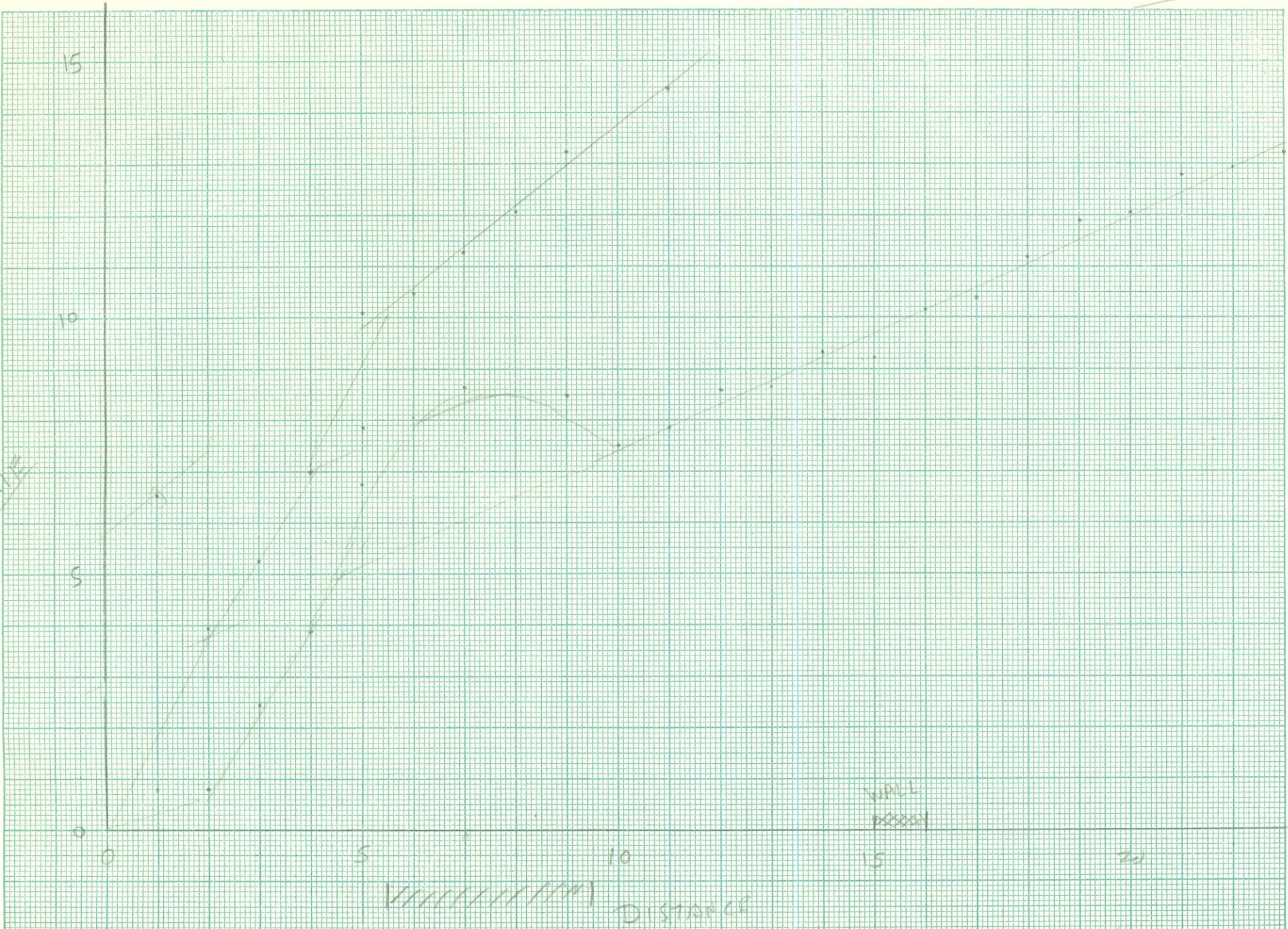
K&E 353-14 MILLIMETERS

KEUFFEL & ESSER CO. MADE IN U.S.A.



K&E 353-14 MILLIMETERS

KEUFFEL & ESSER CO. MADE IN U.S.A.

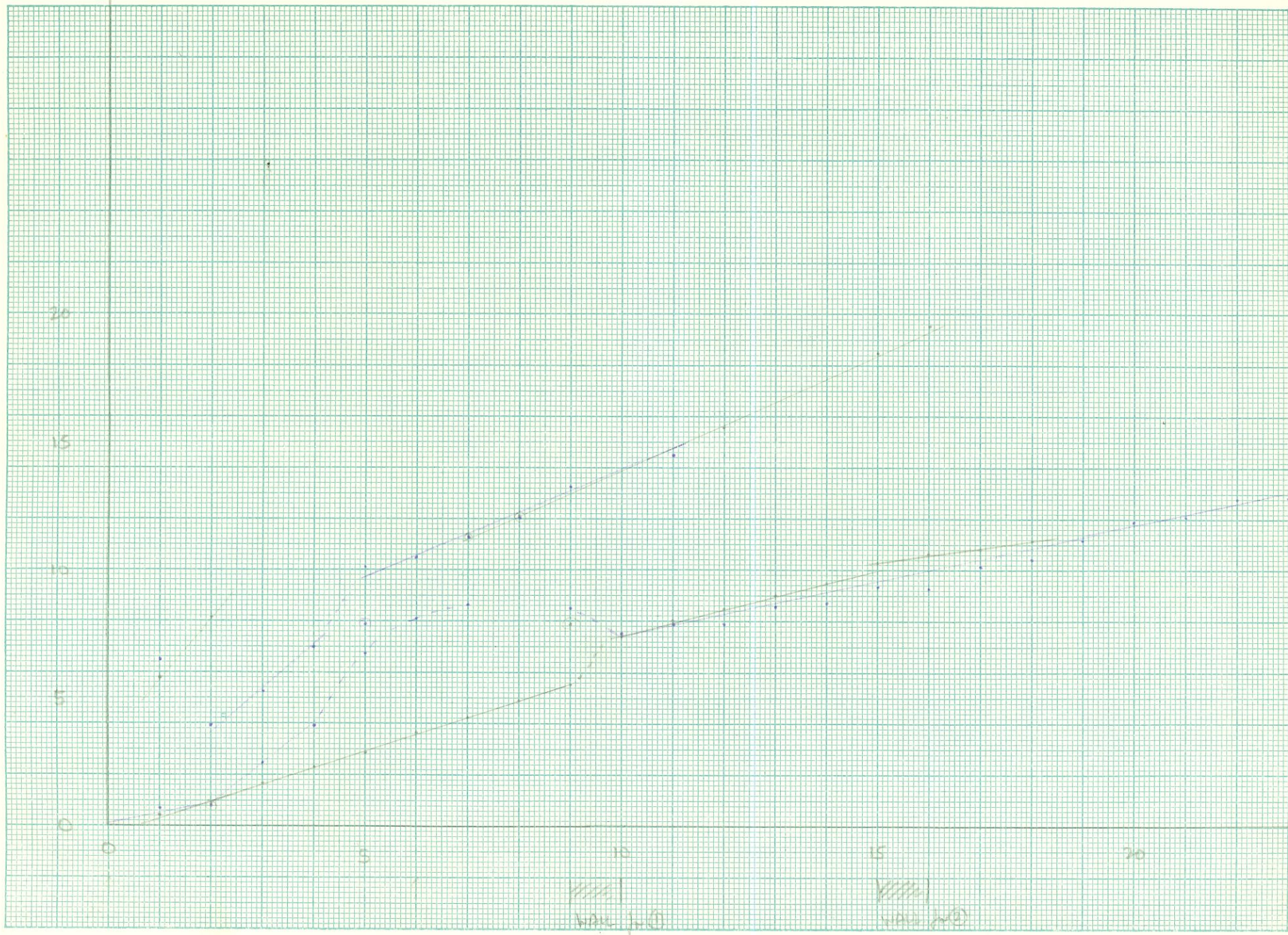


1	0.77	// 6.94	4	3.9	// 7.0	7	8.65	// 11.30	10	7.5	13	8.6	16	9.25	19	11.2	22	12.8		
2	0.8	// 3.94	5	6.75	// 7.87	10.1	8	-	// 12.04	11	7.87	// 14.5	14	8.65	17	10.13	20	11.9	23	12.85
3	2.45	// 3.25	6	8.04	// 10.5	9	8.5	// 13.25	12	7.9	15	9.35	18	10.4	21	12.05	24	13.25		

.75

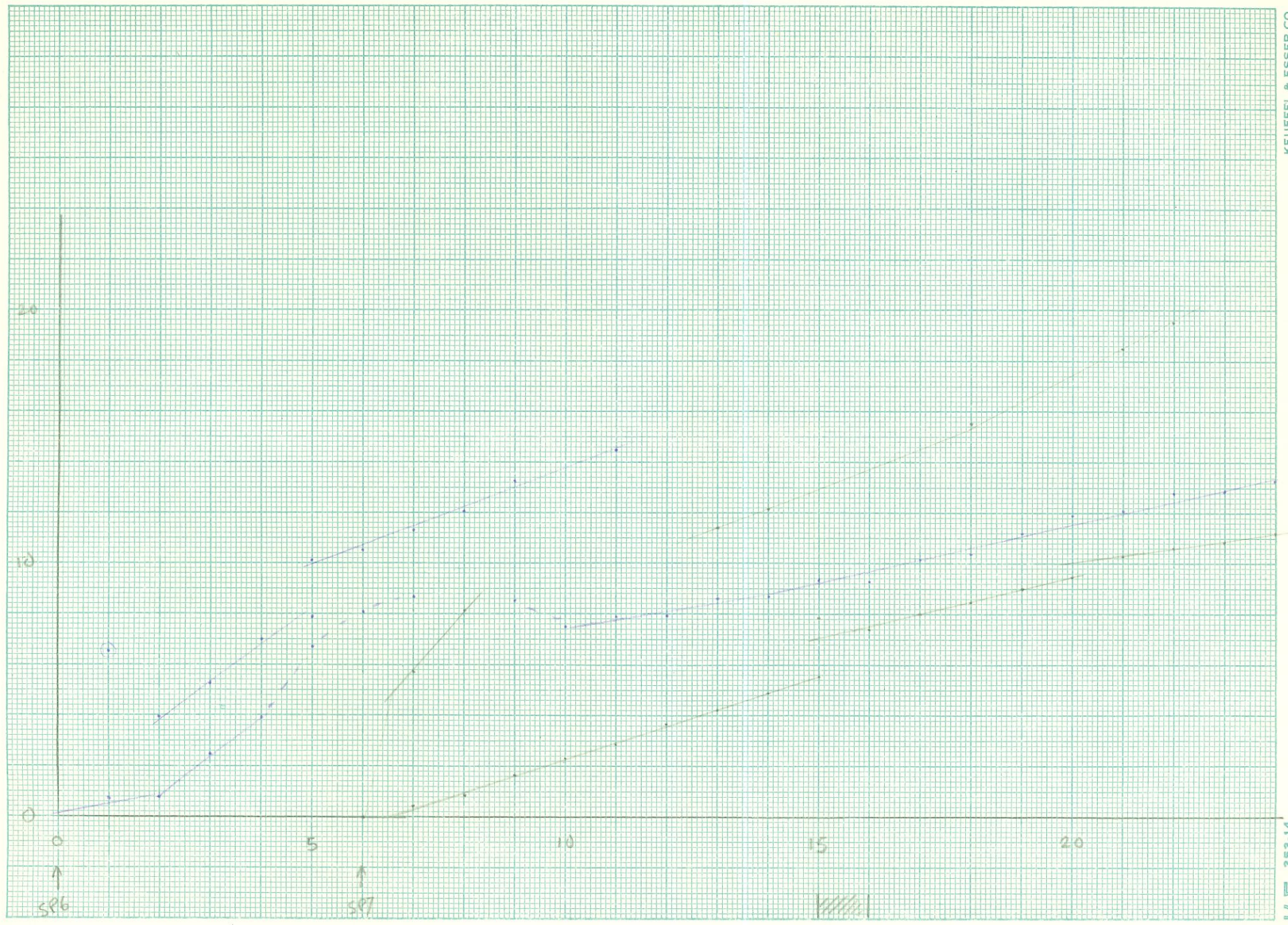
SWAC

1 SP7 → (1)
1 SP6 → (2)



SWAC

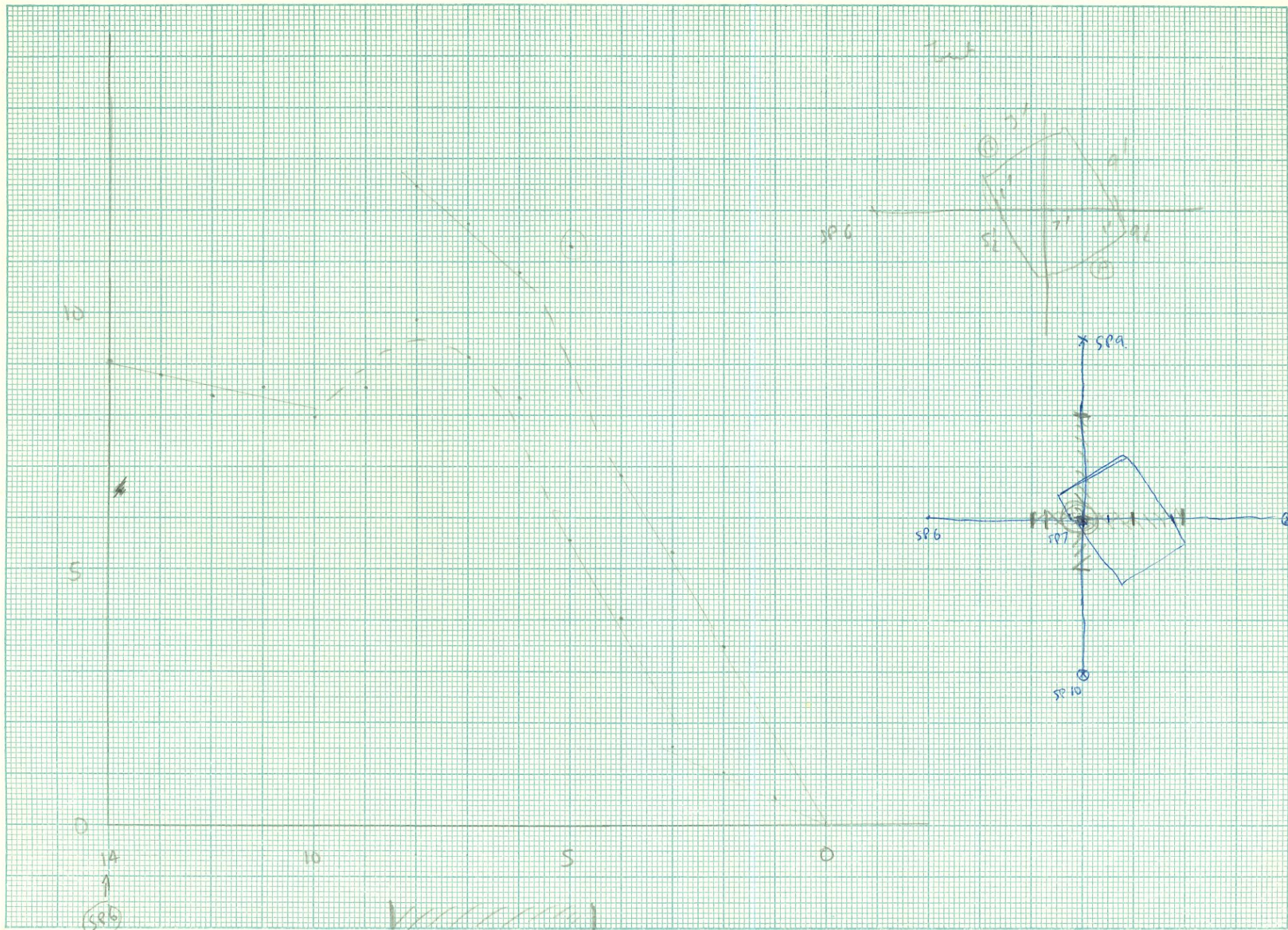
SP7 → ①
SP6 → ②



SWAE

3

TIME



14
↑
SR6



INCHES

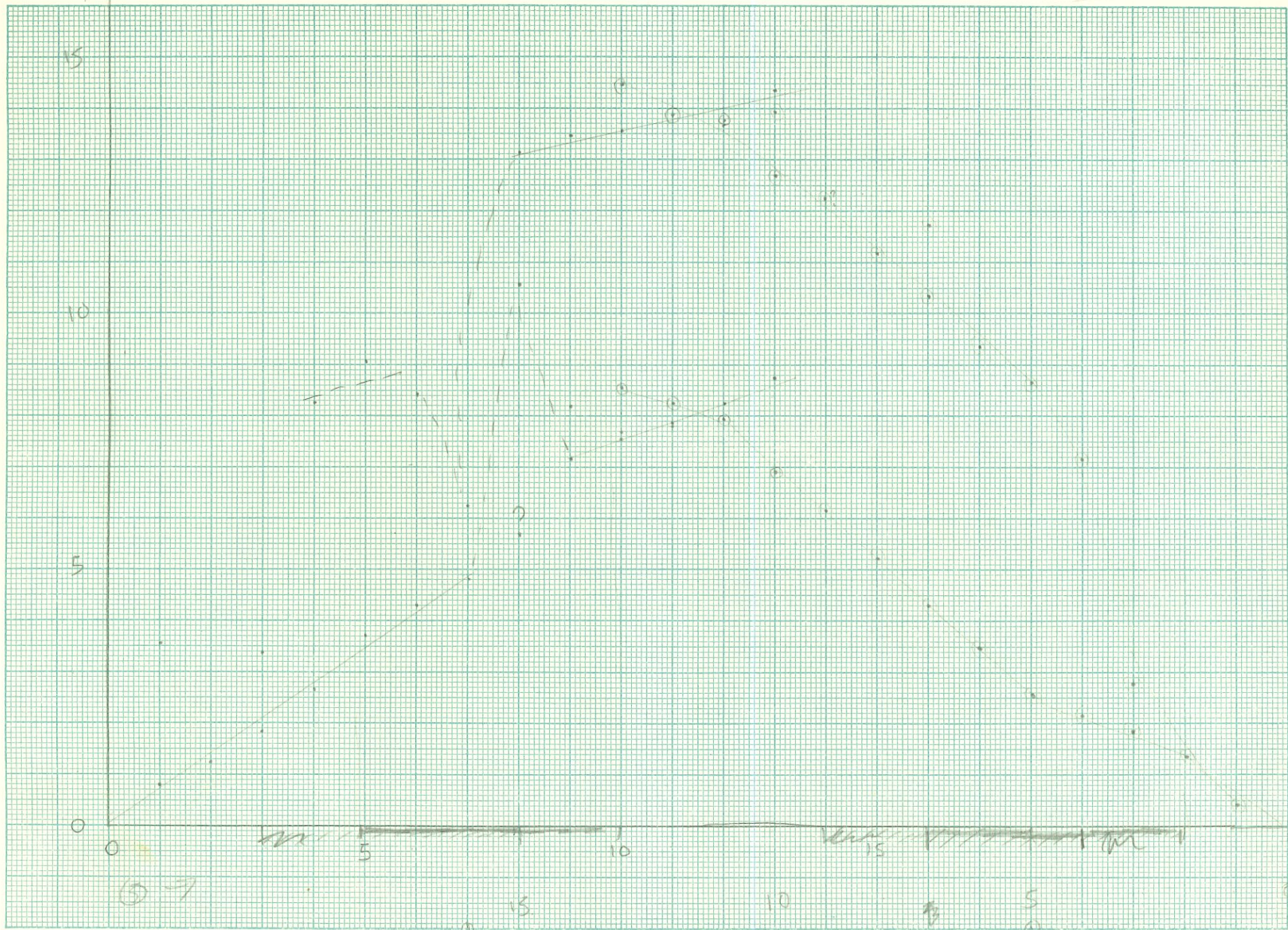
SWAC. (4)
H 15



K&M
353-14
MILLIMETERS

KEUFFEL & ESSER CO.
MADE IN U.S.A.

SWAC. (5) 8 (4)



(5) 7

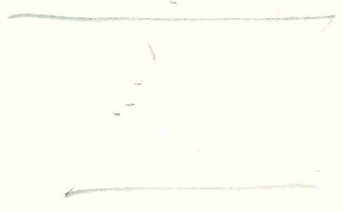
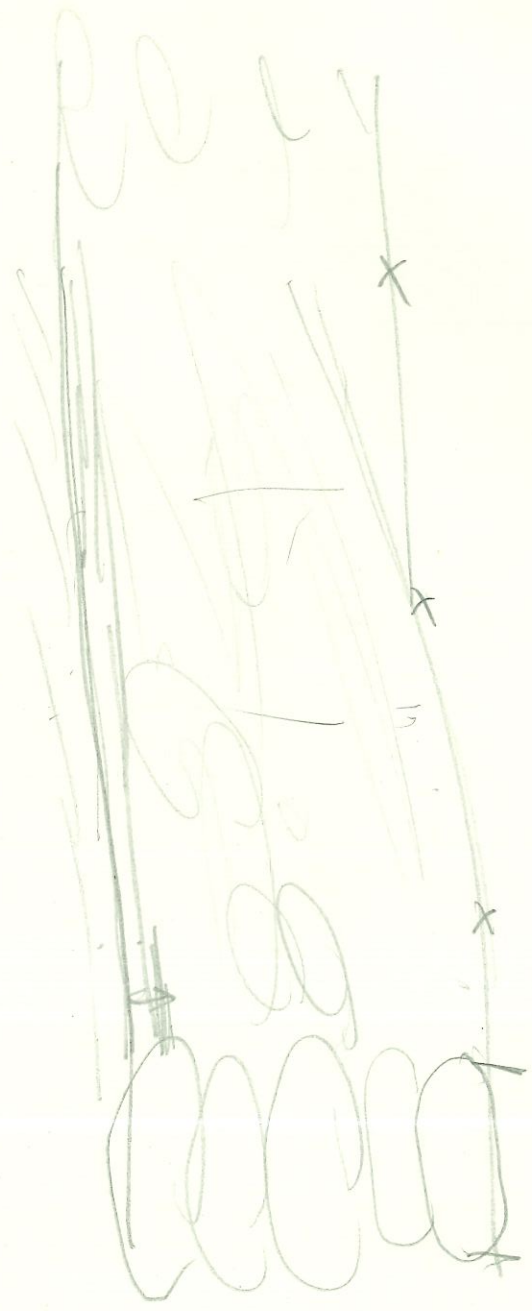
13

10

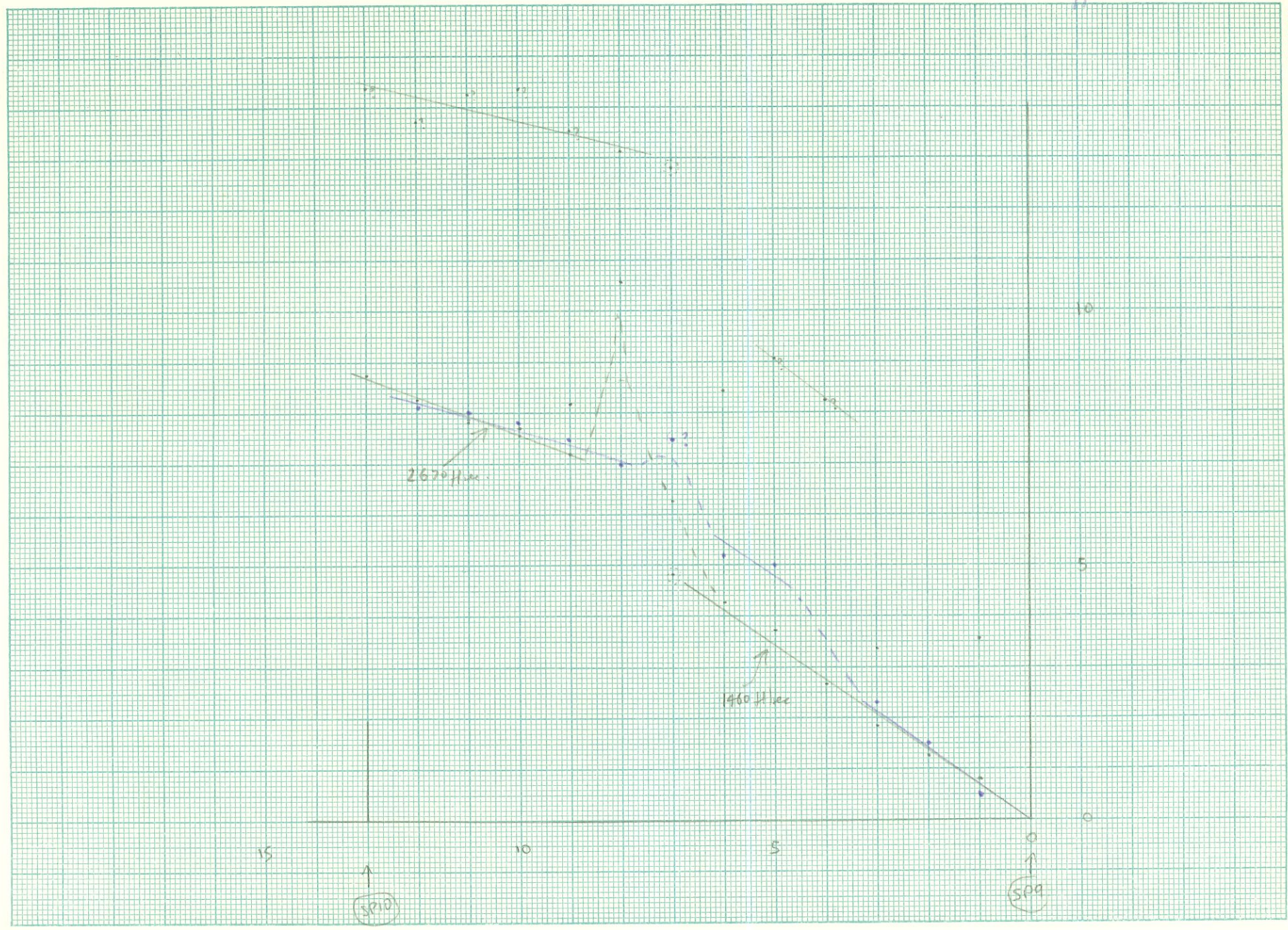
13

5

(4)



4 SWAC (5)



TIME
mSec

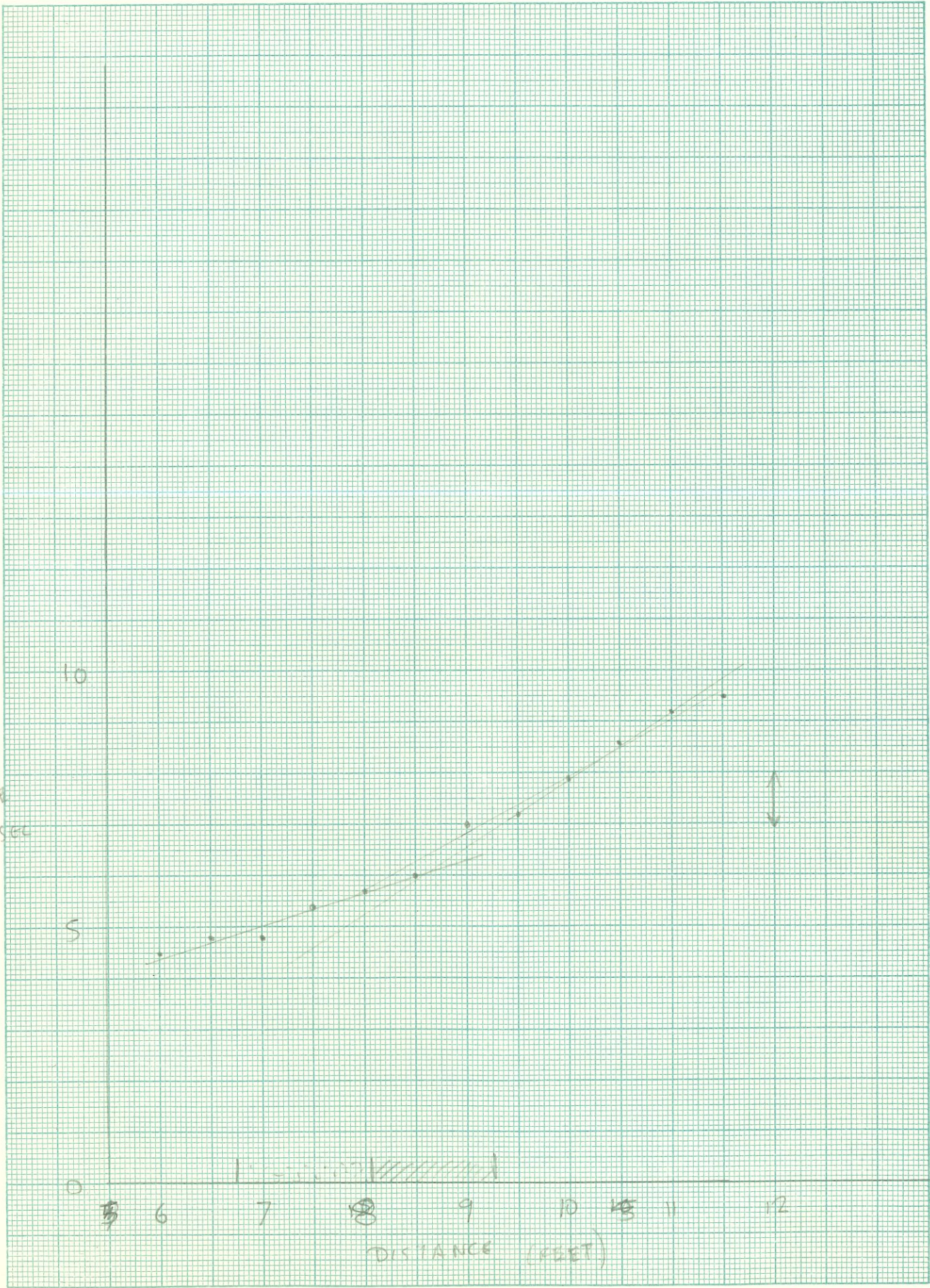
10

5

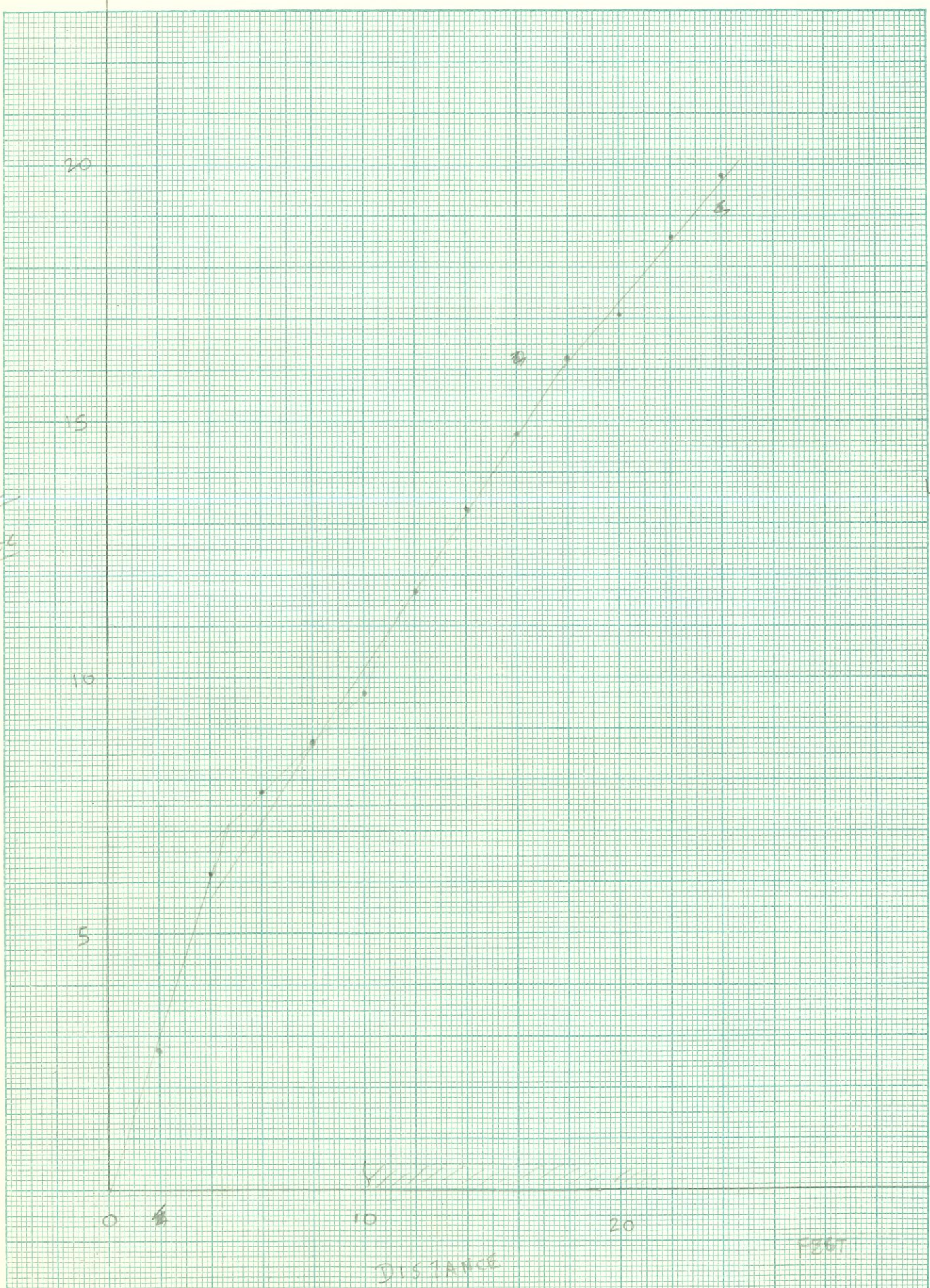
0

6 7 8 9 10 11 12

DISTANCE (FEET)



TIME
msec



SPI 10

As for Record 20.

7UC50 N

(2)

DISTANCE	12	11	10	9	8	7	6	5	4	3	2	1	12	12					
GAIN	4	4	4	4	4	4	4	4	4	4	4	4	0	4					
TIME	2 1/4 1 1/2 1 3/4 4 3 1/2 1 4 3 1/4 2 3/4 2 1/2 2 1/4 3 2 1/4	4 1/4 4 6 6 1/2 6 1/2 6 - -	5 3/4 8 1/4 5 1/2 7 1/4 8 1/4 1 1/2 7 1 3/4 7 1/4 7 1/4	18 1/2 9 8 3/4 9 1/4 4 1/2 2 1/2 2 1/2 9 8 1/4 8 1/2 8 3/4 1 1/4	9 1/2 9 3/4 6 9 1/4 10	20 3/4 20 1/2 12 11 1/2 11 1/2 11 1/2	13 1/4 14 1/2 13 1/2 13 13 1/4	14 3/4 14 1/2 14 3/4 14 1/4 14 3/4	16 16 1/2 16 19 16 1/2 16 1/4	17 17 17 16 1/2 17 1/4	18 1/2 19 18 1/2 18 1/4 17 3/4 18 1/2	20 1/4 14 1/2 20 1/2 10 1/4 19 1/2 19 1/2	2 3/4 3 1 1/2 2 1/4 2 3/4 2 1/4 3 1/4 3 3 3 2 1/4 2 1/4 2 1/4 2 1/4	3 1/2 1 1/2 2 1/2 3 2 1/2 1 1/2 2 1/2 3 2 1/4 3 2 1/4 2 1/4 2 1/2					
AVERAGE C	2 3/4	6 1/2	7 1/4	8 3/4	9 1/2	11 1/2	13 1/4	14 3/4	16 1/2	17	18 1/2	19 1/4							
TIME	2.91	6.17	7.78	8.88	9.7	11.7	13.8	14.75	16.25	17.1	18.6	19.79							

-1.25
-.21

4.75

32 3/4



Geophysical
SPECIALTIES CO.
MINNEAPOLIS, MINNESOTA

10 00 6.25
3.5

DATE _____ OPERATOR _____

LOCATION _____

JOB _____ TRAVERSE _____

1.25
.25

22.75
25

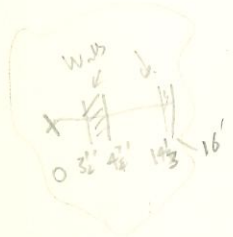
89 1.00

Mound
4' on wall.

No earth connection | Earth fitted

DISTANCE	1'	2'	3'	4'	5'	4'	3'	3'	4'	5'	6'	7'	8'	9'	10'	11'	12'	13'	
GAIN	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	
TIME	2 $\frac{3}{4}$ 2 $\frac{3}{4}$ 2 $\frac{3}{4}$ 2 $\frac{3}{4}$ 2 $\frac{3}{4}$	3 $\frac{3}{4}$ 3 $\frac{3}{4}$ 4 3 $\frac{3}{4}$ 3 $\frac{3}{4}$	5 5 5 5 5 5	6 $\frac{1}{2}$ 6 $\frac{1}{2}$ 6 $\frac{1}{2}$ 3 $\frac{3}{4}$ 10 $\frac{3}{4}$ 10 $\frac{3}{4}$ 10 $\frac{3}{4}$ 10 $\frac{1}{2}$ 2 $\frac{1}{2}$ 10 $\frac{1}{2}$ 10 $\frac{1}{2}$?	4 $\frac{3}{4}$ 5 $\frac{1}{2}$ 5 5 $\frac{1}{4}$ 5 $\frac{1}{2}$ 5 $\frac{1}{2}$ 5 $\frac{1}{2}$ 8 $\frac{3}{4}$ 8 $\frac{3}{4}$ 9 9 8 $\frac{3}{4}$	4 4 $\frac{1}{4}$ 6 $\frac{3}{4}$ 1 $\frac{1}{4}$ 3 $\frac{3}{4}$ 4 $\frac{1}{2}$ 4 $\frac{1}{4}$ 6 4 $\frac{1}{4}$ 4 $\frac{1}{4}$?	5 4 $\frac{3}{4}$ 5 5 5	4 $\frac{3}{4}$ 4 $\frac{3}{4}$ 4 $\frac{3}{4}$ 4 $\frac{3}{4}$ 4 $\frac{3}{4}$	6 $\frac{1}{4}$ 6 $\frac{1}{2}$ 6 $\frac{1}{2}$ 6 $\frac{3}{4}$ 7 $\frac{3}{4}$ 6 $\frac{1}{2}$ 6 $\frac{1}{2}$	9 $\frac{1}{4}$ 9 9 9	11 $\frac{1}{4}$ 11 $\frac{1}{2}$ 11 $\frac{1}{2}$ 11 $\frac{1}{2}$ 11 $\frac{1}{2}$ 11 $\frac{1}{2}$	11 $\frac{3}{4}$ 12 11 $\frac{3}{4}$ 11 $\frac{3}{4}$ 11 $\frac{3}{4}$ 11 $\frac{1}{2}$ 11 $\frac{1}{4}$	11 $\frac{3}{4}$ 11 $\frac{1}{4}$ 12 12 11 $\frac{1}{2}$ 11 $\frac{1}{4}$	12 $\frac{1}{2}$ 12 $\frac{1}{2}$ 12 $\frac{1}{4}$ 12 $\frac{1}{2}$ 12 $\frac{1}{2}$	13 $\frac{1}{2}$ 13 $\frac{1}{2}$ 13 $\frac{1}{2}$ 13 $\frac{1}{2}$ 13 $\frac{1}{4}$	13 $\frac{1}{2}$ 14 14 $\frac{1}{4}$ 14 $\frac{1}{2}$ 13 $\frac{1}{4}$ 14	13 $\frac{1}{2}$ 14 14 $\frac{1}{4}$ 14 $\frac{1}{2}$ 14 $\frac{1}{2}$	14 $\frac{1}{4}$ 14 $\frac{1}{2}$ 14 $\frac{1}{2}$ 14 $\frac{1}{2}$ 14 $\frac{1}{2}$ 15	
AVERAGE TIME	2 $\frac{3}{4}$ 2.75	3 $\frac{3}{4}$ 3.8	5					4 $\frac{3}{4}$ 4.75	6 $\frac{1}{2}$ 6.5	9 9.05	11 $\frac{1}{2}$ 11.4	11 $\frac{3}{4}$ 11.75		11.67	18.8	17.85	16.6	16.25	15.0

line across top of mound



? due to tape connection



Geophysical
SPECIALTIES CO.
MINNEAPOLIS, MINNESOTA

DATE _____ OPERATOR _____
 LOCATION _____
 JOB _____ TRAVERSE _____

Side of hole

A + rods B midy each.

c. 2'6" depth

SWAC

DISTANCE	A	B																
GAIN	107	70																
TIME	2 1 2 2 1/4 3/4 1 1/4 2 2 1/4 1 1/4 2 2 1/4 2 2 2 1/4 1 1/4 2 2 1/4 1 1/4 2	7 1 1/4 2 1/4 3 2 1/4 2 2 1/4 2 1/4 2 1/4 2 1/4 2 1/4 1 1/4 2 1/4 2 1/4 2 2 1/4 1 1/2 2 2 1/4																
AVERAGE TIME	30 1/2	33 1/2																

2.03	2.23
------	------



Geophysical
SPECIALTIES CO.
MINNEAPOLIS, MINNESOTA

30.50 33.50

DATE _____ OPERATOR _____
 LOCATION _____
 JOB _____ TRAVERSE _____

Shot Point 10

SWAC (4)

DISTANCE	1'	2'	3'	4'	5'	6'	7'	8'	9'	10'	11'	12'	5'	11'	13'			
GAIN	5	5	5	5	5	5	5	5	5	5	5	5	5	8	5			
TIME	1/4 1/2 3/4 1 1 1/4 1 1/2 2 2 1/4 2 1/2 3 3 1/4 3 1/2 4 4 1/4 4 1/2 5 5 1/4 5 1/2 6 6 1/4 6 1/2 7 7 1/4 7 1/2 8 8 1/4 8 1/2 9 9 1/4 9 1/2 10 10 1/4 10 1/2 11 11 1/4 11 1/2 12 12 1/4 12 1/2 13 13 1/4 13 1/2 14 14 1/4 14 1/2 15 15 1/4 15 1/2 16 16 1/4 16 1/2 17 17 1/4 17 1/2 18 18 1/4 18 1/2 19 19 1/4 19 1/2 20 20 1/4 20 1/2 21 21 1/4 21 1/2 22 22 1/4 22 1/2 23 23 1/4 23 1/2 24 24 1/4 24 1/2 25 25 1/4 25 1/2 26 26 1/4 26 1/2 27 27 1/4 27 1/2 28 28 1/4 28 1/2 29 29 1/4 29 1/2 30 30 1/4 30 1/2 31 31 1/4 31 1/2 32 32 1/4 32 1/2 33 33 1/4 33 1/2 34 34 1/4 34 1/2 35 35 1/4 35 1/2 36 36 1/4 36 1/2 37 37 1/4 37 1/2 38 38 1/4 38 1/2 39 39 1/4 39 1/2 40 40 1/4 40 1/2 41 41 1/4 41 1/2 42 42 1/4 42 1/2 43 43 1/4 43 1/2 44 44 1/4 44 1/2 45 45 1/4 45 1/2 46 46 1/4 46 1/2 47 47 1/4 47 1/2 48 48 1/4 48 1/2 49 49 1/4 49 1/2 50 50 1/4 50 1/2 51 51 1/4 51 1/2 52 52 1/4 52 1/2 53 53 1/4 53 1/2 54 54 1/4 54 1/2 55 55 1/4 55 1/2 56 56 1/4 56 1/2 57 57 1/4 57 1/2 58 58 1/4 58 1/2 59 59 1/4 59 1/2 60 60 1/4 60 1/2 61 61 1/4 61 1/2 62 62 1/4 62 1/2 63 63 1/4 63 1/2 64 64 1/4 64 1/2 65 65 1/4 65 1/2 66 66 1/4 66 1/2 67 67 1/4 67 1/2 68 68 1/4 68 1/2 69 69 1/4 69 1/2 70 70 1/4 70 1/2 71 71 1/4 71 1/2 72 72 1/4 72 1/2 73 73 1/4 73 1/2 74 74 1/4 74 1/2 75 75 1/4 75 1/2 76 76 1/4 76 1/2 77 77 1/4 77 1/2 78 78 1/4 78 1/2 79 79 1/4 79 1/2 80 80 1/4 80 1/2 81 81 1/4 81 1/2 82 82 1/4 82 1/2 83 83 1/4 83 1/2 84 84 1/4 84 1/2 85 85 1/4 85 1/2 86 86 1/4 86 1/2 87 87 1/4 87 1/2 88 88 1/4 88 1/2 89 89 1/4 89 1/2 90 90 1/4 90 1/2 91 91 1/4 91 1/2 92 92 1/4 92 1/2 93 93 1/4 93 1/2 94 94 1/4 94 1/2 95 95 1/4 95 1/2 96 96 1/4 96 1/2 97 97 1/4 97 1/2 98 98 1/4 98 1/2 99 99 1/4 99 1/2 100 100 1/4 100 1/2 101 101 1/4 101 1/2 102 102 1/4 102 1/2 103 103 1/4 103 1/2 104 104 1/4 104 1/2 105 105 1/4 105 1/2 106 106 1/4 106 1/2 107 107 1/4 107 1/2 108 108 1/4 108 1/2 109 109 1/4 109 1/2 110 110 1/4 110 1/2 111 111 1/4 111 1/2 112 112 1/4 112 1/2 113 113 1/4 113 1/2 114 114 1/4 114 1/2 115 115 1/4 115 1/2 116 116 1/4 116 1/2 117 117 1/4 117 1/2 118 118 1/4 118 1/2 119 119 1/4 119 1/2 120 120 1/4 120 1/2 121 121 1/4 121 1/2 122 122 1/4 122 1/2 123 123 1/4 123 1/2 124 124 1/4 124 1/2 125 125 1/4 125 1/2 126 126 1/4 126 1/2 127 127 1/4 127 1/2 128 128 1/4 128 1/2 129 129 1/4 129 1/2 130 130 1/4 130 1/2 131 131 1/4 131 1/2 132 132 1/4 132 1/2 133 133 1/4 133 1/2 134 134 1/4 134 1/2 135 135 1/4 135 1/2 136 136 1/4 136 1/2 137 137 1/4 137 1/2 138 138 1/4 138 1/2 139 139 1/4 139 1/2 140 140 1/4 140 1/2 141 141 1/4 141 1/2 142 142 1/4 142 1/2 143 143 1/4 143 1/2 144 144 1/4 144 1/2 145 145 1/4 145 1/2 146 146 1/4 146 1/2 147 147 1/4 147 1/2 148 148 1/4 148 1/2 149 149 1/4 149 1/2 150 150 1/4 150 1/2 151 151 1/4 151 1/2 152 152 1/4 152 1/2 153 153 1/4 153 1/2 154 154 1/4 154 1/2 155 155 1/4 155 1/2 156 156 1/4 156 1/2 157 157 1/4 157 1/2 158 158 1/4 158 1/2 159 159 1/4 159 1/2 160 160 1/4 160 1/2 161 161 1/4 161 1/2 162 162 1/4 162 1/2 163 163 1/4 163 1/2 164 164 1/4 164 1/2 165 165 1/4 165 1/2 166 166 1/4 166 1/2 167 167 1/4 167 1/2 168 168 1/4 168 1/2 169 169 1/4 169 1/2 170 170 1/4 170 1/2 171 171 1/4 171 1/2 172 172 1/4 172 1/2 173 173 1/4 173 1/2 174 174 1/4 174 1/2 175 175 1/4 175 1/2 176 176 1/4 176 1/2 177 177 1/4 177 1/2 178 178 1/4 178 1/2 179 179 1/4 179 1/2 180 180 1/4 180 1/2 181 181 1/4 181 1/2 182 182 1/4 182 1/2 183 183 1/4 183 1/2 184 184 1/4 184 1/2 185 185 1/4 185 1/2 186 186 1/4 186 1/2 187 187 1/4 187 1/2 188 188 1/4 188 1/2 189 189 1/4 189 1/2 190 190 1/4 190 1/2 191 191 1/4 191 1/2 192 192 1/4 192 1/2 193 193 1/4 193 1/2 194 194 1/4 194 1/2 195 195 1/4 195 1/2 196 196 1/4 196 1/2 197 197 1/4 197 1/2 198 198 1/4 198 1/2 199 199 1/4 199 1/2 200 200 1/4 200 1/2 201 201 1/4 201 1/2 202 202 1/4 202 1/2 203 203 1/4 203 1/2 204 204 1/4 204 1/2 205 205 1/4 205 1/2 206 206 1/4 206 1/2 207 207 1/4 207 1/2 208 208 1/4 208 1/2 209 209 1/4 209 1/2 210 210 1/4 210 1/2 211 211 1/4 211 1/2 212 212 1/4 212 1/2 213 213 1/4 213 1/2 214 214 1/4 214 1/2 215 215 1/4 215 1/2 216 216 1/4 216 1/2 217 217 1/4 217 1/2 218 218 1/4 218 1/2 219 219 1/4 219 1/2 220 220 1/4 220 1/2 221 221 1/4 221 1/2 222 222 1/4 222 1/2 223 223 1/4 223 1/2 224 224 1/4 224 1/2 225 225 1/4 225 1/2 226 226 1/4 226 1/2 227 227 1/4 227 1/2 228 228 1/4 228 1/2 229 229 1/4 229 1/2 230 230 1/4 230 1/2 231 231 1/4 231 1/2 232 232 1/4 232 1/2 233 233 1/4 233 1/2 234 234 1/4 234 1/2 235 235 1/4 235 1/2 236 236 1/4 236 1/2 237 237 1/4 237 1/2 238 238 1/4 238 1/2 239 239 1/4 239 1/2 240 240 1/4 240 1/2 241 241 1/4 241 1/2 242 242 1/4 242 1/2 243 243 1/4 243 1/2 244 244 1/4 244 1/2 245 245 1/4 245 1/2 246 246 1/4 246 1/2 247 247 1/4 247 1/2 248 248 1/4 248 1/2 249 249 1/4 249 1/2 250 250 1/4 250 1/2 251 251 1/4 251 1/2 252 252 1/4 252 1/2 253 253 1/4 253 1/2 254 254 1/4 254 1/2 255 255 1/4 255 1/2 256 256 1/4 256 1/2 257 257 1/4 257 1/2 258 258 1/4 258 1/2 259 259 1/4 259 1/2 260 260 1/4 260 1/2 261 261 1/4 261 1/2 262 262 1/4 262 1/2 263 263 1/4 263 1/2 264 264 1/4 264 1/2 265 265 1/4 265 1/2 266 266 1/4 266 1/2 267 267 1/4 267 1/2 268 268 1/4 268 1/2 269 269 1/4 269 1/2 270 270 1/4 270 1/2 271 271 1/4 271 1/2 272 272 1/4 272 1/2 273 273 1/4 273 1/2 274 274 1/4 274 1/2 275 275 1/4 275 1/2 276 276 1/4 276 1/2 277 277 1/4 277 1/2 278 278 1/4 278 1/2 279 279 1/4 279 1/2 280 280 1/4 280 1/2 281 281 1/4 281 1/2 282 282 1/4 282 1/2 283 283 1/4 283 1/2 284 284 1/4 284 1/2 285 285 1/4 285 1/2 286 286 1/4 286 1/2 287 287 1/4 287 1/2 288 288 1/4 288 1/2 289 289 1/4 289 1/2 290 290 1/4 290 1/2 291 291 1/4 291 1/2 292 292 1/4 292 1/2 293 293 1/4 293 1/2 294 294 1/4 294 1/2 295 295 1/4 295 1/2 296 296 1/4 296 1/2 297 297 1/4 297 1/2 298 298 1/4 298 1/2 299 299 1/4 299 1/2 300 300 1/4 300 1/2 301 301 1/4 301 1/2 302 302 1/4 302 1/2 303 303 1/4 303 1/2 304 304 1/4 304 1/2 305 305 1/4 305 1/2 306 306 1/4 306 1/2 307 307 1/4 307 1/2 308 308 1/4 308 1/2 309 309 1/4 309 1/2 310 310 1/4 310 1/2 311 311 1/4 311 1/2 312 312 1/4 312 1/2 313 313 1/4 313 1/2 314 314 1/4 314 1/2 315 315 1/4 315 1/2 316 316 1/4 316 1/2 317 317 1/4 317 1/2 318 318 1/4 318 1/2 319 319 1/4 319 1/2 320 320 1/4 320 1/2 321 321 1/4 321 1/2 322 322 1/4 322 1/2 323 323 1/4 323 1/2 324 324 1/4 324 1/2 325 325 1/4 325 1/2 326 326 1/4 326 1/2 327 327 1/4 327 1/2 328 328 1/4 328 1/2 329 329 1/4 329 1/2 330 330 1/4 330 1/2 331 331 1/4 331 1/2 332 332 1/4 332 1/2 333 333 1/4 333 1/2 334 334 1/4 334 1/2 335 335 1/4 335 1/2 336 336 1/4 336 1/2 337 337 1/4 337 1/2 338 338 1/4 338 1/2 339 339 1/4 339 1/2 340 340 1/4 340 1/2 341 341 1/4 341 1/2 342 342 1/4 342 1/2 343 343 1/4 343 1/2 344 344 1/4 344 1/2 345 345 1/4 345 1/2 346 346 1/4 346 1/2 347 347 1/4 347 1/2 348 348 1/4 348 1/2 349 349 1/4 349 1/2 350 350 1/4 350 1/2 351 351 1/4 351 1/2 352 352 1/4 352 1/2 353 353 1/4 353 1/2 354 354 1/4 354 1/2 355 355 1/4 355 1/2 356 356 1/4 356 1/2 357 357 1/4 357 1/2 358 358 1/4 358 1/2 359 359 1/4 359 1/2 360 360 1/4 360 1/2 361 361 1/4 361 1/2 362 362 1/4 362 1/2 363 363 1/4 363 1/2 364 364 1/4 364 1/2 365 365 1/4 365 1/2 366 366 1/4 366 1/2 367 367 1/4 367 1/2 368 368 1/4 368 1/2 369 369 1/4 369 1/2 370 370 1/4 370 1/2 371 371 1/4 371 1/2 372 372 1/4 372 1/2 373 373 1/4 373 1/2 374 374 1/4 374 1/2 375 375 1/4 375 1/2 376 376 1/4 376 1/2 377 377 1/4 377 1/2 378 378 1/4 378 1/2 379 379 1/4 379 1/2 380 380 1/4 380 1/2 381 381 1/4 381 1/2 382 382 1/4 382 1/2 383 383 1/4 383 1/2 384 384 1/4 384 1/2 385 385 1/4 385 1/2 386 386 1/4 386 1/2 387 387 1/4 387 1/2 388 388 1/4 388 1/2 389 389 1/4 389 1/2 390 390 1/4 390 1/2 391 391 1/4 391 1/2 392 392 1/4 392 1/2 393 393 1/4 393 1/2 394 394 1/4 394 1/2 395 395 1/4 395 1/2 396 396 1/4 396 1/2 397 397 1/4 397 1/2 398 398 1/4 398 1/2 399 399 1/4 399 1/2 400 400 1/4 400 1/2 401 401 1/4 401 1/2 402 402 1/4 402 1/2 403 403 1/4 403 1/2 404 404 1/4 404 1/2 405 405 1/4 405 1/2 406 406 1/4 406 1/2 407 407 1/4 407 1/2 408 408 1/4 408 1/2 409 409 1/4 409 1/2 410 410 1/4 410 1/2 411 411 1/4 411 1/2 412 412 1/4 412 1/2 413 413 1/4 413 1/2 414 414 1/4 414 1/2 415 415 1/4 415 1/2 416 416 1/4 416 1/2 417 417 1/4 417 1/2 418 418 1/4 418 1/2 419 419 1/4 419 1/2 420 420 1/4 420 1/2 421 421 1/4 421 1/2 422 422 1/4 422 1/2 423 423 1/4 423 1/2 424 424 1/4 424 1/2 425 425 1/4 425 1/2 426 426 1/4 426 1/2 427 427 1/4 427 1/2 428 428 1/4 428 1/2 429 429 1/4 429 1/2 430 430 1/4 430 1/2 431 431 1/4 431 1/2 432 432 1/4 432 1/2 433 433 1/4 433 1/2 434 434 1/4 434 1/2 435 435 1/4 435 1/2 436 436 1/4 436 1/2 437 437 1/4 437 1/2 438 438 1/4 438 1/2 439 439 1/4 439 1/2 440 440 1/4 440 1/2 441 441 1/4 441 1/2 442 442 1/4 442 1/2 443 443 1/4 443 1/2 444 444 1/4 444 1/2 445 445 1/4 445 1/2 446 446 1/4 446 1/2 447 447 1/4 447 1/2 448 448 1/4 448 1/2 449 449 1/4 449 1/2 450 450 1/4 450 1/2 451 451 1/4 451 1/2 452 452 1/4 452 1/2 453 453 1/4 453 1/2 454 454 1/4 454 1/2 455 455 1/4 455 1/2 456 456 1/4 456 1/2 457 457 1/4 457 1/2 458 458 1/4 458 1/2 459 459 1/4 459 1/2 460 460 1/4 460 1/2 461 461 1/4 461 1/2 462 462 1/4 462 1/2 463 463 1/4 463 1/2 464 464 1/4 464 1/2 465 465 1/4 465 1/2 466 466 1/4 466 1/2 467 467 1/4 467 1/2 468 468 1/4 468 1/2 469 469 1/4 469 1/2 470 470 1/4 470 1/2 471 471 1/4 471 1/2 472 472 1/4 472 1/2 473 473 1/4 473 1/2 474 474 1/4 474 1/2 475 475 1/4 475 1/2 476 476 1/4 476 1/2 477 477 1/4 477 1/2 478 478 1/4 478 1/2 479 479 1/4 479 1/2 480 480 1/4 480 1/2 481 481 1/4 481 1/2 482 482 1/4 482 1/2 483 483 1/4 483 1/2 484 484 1/4 484 1/2 485 485 1/4 485 1/2 486 486 1/4 486 1/2 487 487 1/4 487 1/2 488 488 1/4 488 1/2 489 489 1/4 489 1/2 490 490 1/4 490 1/2 491 491 1/4 491 1/2 492 492 1/4 492 1/2 493 493 1/4 493 1/2 494 494 1/4 494 1/2 495 495 1/4 495 1/2 496 496 1/4 496 1/2 497 497 1/4 497 1/2 498 498 1/4 498 1/2 499 499 1/4 499 1/2 500 500 1/4 500 1/2 501 501 1/4 501 1/2 502 502 1/4 502 1/2 503 503 1/4 503 1/2 504 504 1/4 504 1/2 505 505 1/4 505 1/2 506 506 1/4 506 1/2 507 507 1/4 507 1/2 508 508 1/4 508 1/2 509 509 1/4 509 1/2 510 510 1/4 510 1/2 511 511 1/4 511 1/2 512 512 1/4 512 1/2 513 513 1/4 513 1/2 514 514 1/4 514 1/2 515 515 1/4 515 1/2 516 516 1/4 516 1/2 517 517 1/4 517 1/2 518 518 1/4 518 1/2 519 519 1/4 519 1/2 520 520 1/4 520 1/2 521 521 1/4 521 1/2 522 522 1/4 522 1/2 523 523 1/4 523 1/2 524 524 1/4 524 1/2 525 525 1/4 525 1/2 526 526 1/4 526 1/2 527 527 1/4 527 1/2 528 528 1/4 528 1/2 529 529 1/4 529 1/2 530 530 1/4 530 1/2 531 531 1/4 531 1/2 532 532 1/4 532 1/2 533 533 1/4 533 1/2 534 534 1/4 534 1/2 53																	

SP6

SWAC

2

DISTANCE	24'	23'	22'	21'	20'	19'	18'	17'	16'	15'	14'	13'	12'	11'	10'	9'	8'	7'	6'
GAIN	5	5	5	5	5	5	5	5	5	5	5	5	5	5	5	5	5	5	5
TIME	13 1/4 10 1/2 13 1/4 13 13 1/4 13 1/2	12 3/4 12 3/4 6 13 1/4 12 3/4 12 3/4	12 3/4 12 3/4 12 3/4 2 3/4 13 12 3/4	7 1/2 12 1/2 12 8 1/2 1 11 3/4 6 1/2 1 1/2 12 12 1/4	12 12 11 1/2 11 1/2 12 1/4	10 3/4? 11 1/2 11 1/2 11 3/4 10 3/4 11 10 3/4 11 8 1/2 11 1/4	10 1/2 10 1/4 10 1/4 11 1/4 9 1/4 10 3/4 10 3/4 11 1/4	11 2 1/4 12 10 9 1/2 10 10 10	8 1/2 9 1/4 8 1/2 2 1/4 9 1/2 7 9 1/4 3 1/2 7 1/4	4 3/4 9 1/4 9 1/2 19 9 1/2 9 1/4 9 1/4	8 1/4 8 1/2 15 3/4 8 1/4 8 1/2 8 1/2 8 1/2 8 1/2	8 1/4 5 8 1/2 8 1/2 9 8 1/2	15 1/2 4 1/2 3 8 8 7 3/4 7 1/4	4 5 5 8 14 1/2 8 1/4 8 7 1/2 14 1/2 7 1/4 7 1/2	7 1/2 7 1/2 7 3/4 7 1/2 7 1/4	8 1/2 8 1/2 8 1/2 13 1/4 8 1/2	12 1/2 12 12 12 1/2 11 1/2 11 3/4 12 1/4 9 1/2 12 1/2 12 11 1/4	11 1/4 11 1/4 11 1/4 11 1/2 11 1/2 11 1/2 8 1/4 8 1/2 8 3/4 8 1/2 9	10 1/2 10 3/4 10 1/2 10 1/4 10 1/2 10 1/2 11 1/2 8 1/2 8 1/2 7 1/4 8 8
AVERAGE TIME	5'	5'	4'	4'	3'	3'	2'	2'	3 1/2	1'	1'	1'	5	7 1/4	7 1/2	11 1/4	9	8	8



Geophysical
SPECIALTIES CO.
MINNEAPOLIS, MINNESOTA

DATE

OPERATOR

LOCATION

JOB

TRAVERSE

7-25 10-75 8-37
14 14
1.25 2.5 1.75 .25 .75 1.25 1.5 1.75 2.5 3.00
1.15 1.5 1.75 2.5 3.00
3.5 3.25

SP7 ~~SP7~~ As for record

in 058
log

S.W.A.C. (1)

DISTANCE	1'	2'	3'	4'	5'	6'	7'	8'	9'	10'	10'	11'	12'	13'	14'	15'	16'	17'	18'
GAIN	5	5	5	5	5	5	5	5	5	6	5	5	5	5	5	5	5	5	5
TIME	$\frac{3}{4}$ $\frac{5}{2}$ $\frac{5}{2}$ $\frac{5}{4}$ $\frac{1}{4}$ $\frac{1}{2}$ $\frac{5}{4}$ 6 $\frac{1}{2}$ $\frac{5}{4}$ 6 $\frac{1}{4}$ $\frac{1}{2}$ $\frac{1}{4}$ 6	1 $\frac{3}{4}$ 1 $\frac{1}{4}$ 8 $\frac{3}{4}$ 3 4	$1\frac{1}{2}$ 2 $\frac{5}{4}$ $2\frac{1}{4}$ $1\frac{1}{2}$ $1\frac{1}{2}$ $1\frac{1}{2}$ $1\frac{1}{2}$ $1\frac{1}{4}$	2 $2\frac{1}{4}$ $2\frac{3}{4}$ $2\frac{1}{4}$ $6\frac{1}{4}$ $2\frac{1}{4}$	3 $2\frac{1}{2}$ 3 $2\frac{3}{4}$ $1\frac{1}{4}$ 3	$3\frac{1}{2}$ $10\frac{1}{2}$ $3\frac{1}{4}$ $5\frac{1}{2}$ 4 $3\frac{1}{4}$	4 $11\frac{1}{4}$ $11\frac{1}{2}$ $2\frac{1}{2}$ $2\frac{3}{4}$ $4\frac{1}{2}$ 1 $11\frac{1}{2}$ $11\frac{1}{2}$ $3\frac{1}{2}$ $3\frac{3}{4}$ $11\frac{1}{2}$ 4 $9\frac{1}{2}$ $11\frac{1}{4}$ 4 $11\frac{1}{2}$ $11\frac{1}{2}$ $4\frac{1}{2}$	$4\frac{1}{4}$ $2\frac{1}{4}$ 5 12 $9\frac{1}{4}$ $12\frac{1}{2}$ $4\frac{1}{4}$ $5\frac{1}{8}$ $12\frac{1}{8}$ 12 $11\frac{1}{4}$	$5\frac{1}{2}$ 8 8 $7\frac{3}{4}$ 8 $7\frac{1}{4}$ $7\frac{1}{2}$ $8\frac{1}{2}$ 8 8 8 6 $8\frac{1}{4}$ 5 5 5 2 $8\frac{1}{4}$	2 14 1 $8\frac{1}{2}$ $\frac{1}{2}$ $10\frac{1}{2}$ $3\frac{1}{2}$ $4\frac{1}{2}$ 10 8 8 8 8 8 8 8	$7\frac{1}{2}$ $7\frac{1}{4}$ $7\frac{1}{2}$ $4\frac{1}{2}$ $3\frac{1}{2}$ 7 1 $7\frac{1}{2}$ 8 8 8 8 8 8 8	$8\frac{1}{2}$ $8\frac{1}{2}$ $8\frac{1}{2}$ $15\frac{1}{2}$ $8\frac{1}{2}$ $8\frac{1}{4}$	$8\frac{3}{4}$ $9\frac{1}{4}$ $6\frac{3}{4}$ $9\frac{3}{4}$ 9 $4\frac{1}{4}$ $8\frac{1}{2}$ $8\frac{1}{2}$	$9\frac{1}{2}$ $9\frac{3}{4}$ $4\frac{3}{4}$ $9\frac{1}{4}$ $2\frac{1}{2}$ $\frac{1}{4}$ $9\frac{1}{4}$ $9\frac{1}{2}$	$10\frac{1}{2}$ $10\frac{1}{4}$ $18\frac{1}{2}$ 10 $10\frac{1}{2}$ $\frac{3}{4}$ $8\frac{3}{4}$ $18\frac{1}{2}$ $10\frac{1}{2}$ 10	$10\frac{1}{2}$ $14\frac{1}{2}$ $10\frac{3}{4}$ $19\frac{1}{2}$ $10\frac{3}{4}$ $3\frac{1}{2}$ $2\frac{3}{4}$ $10\frac{1}{2}$ $10\frac{1}{2}$	$10\frac{1}{2}$ $10\frac{3}{4}$ 11 11 $2\frac{1}{4}$ $10\frac{1}{4}$ $3\frac{1}{2}$ $10\frac{1}{2}$ $10\frac{1}{2}$	$10\frac{1}{2}$ $11\frac{1}{4}$ $11\frac{1}{2}$ $6\frac{1}{2}$ $10\frac{1}{2}$ 3 $11\frac{1}{4}$	$11\frac{1}{4}$ $11\frac{1}{4}$ $11\frac{1}{2}$ $6\frac{1}{2}$ $10\frac{1}{2}$ 3 $11\frac{1}{4}$
AVERAGE TIME	$\frac{0.406}{5.75}$	$\frac{0.85}{8.125}$	1.64	2.3	2.85	3.65	$\frac{4.21}{11.41}$	$\frac{4.9}{12.13}$	$\frac{7.87}{5.56}$	X	7.4	8.0	8.45 (11.5)	9.0	9.45	10.25 (12.5)	10.6 (19.5)	10.8	11.15

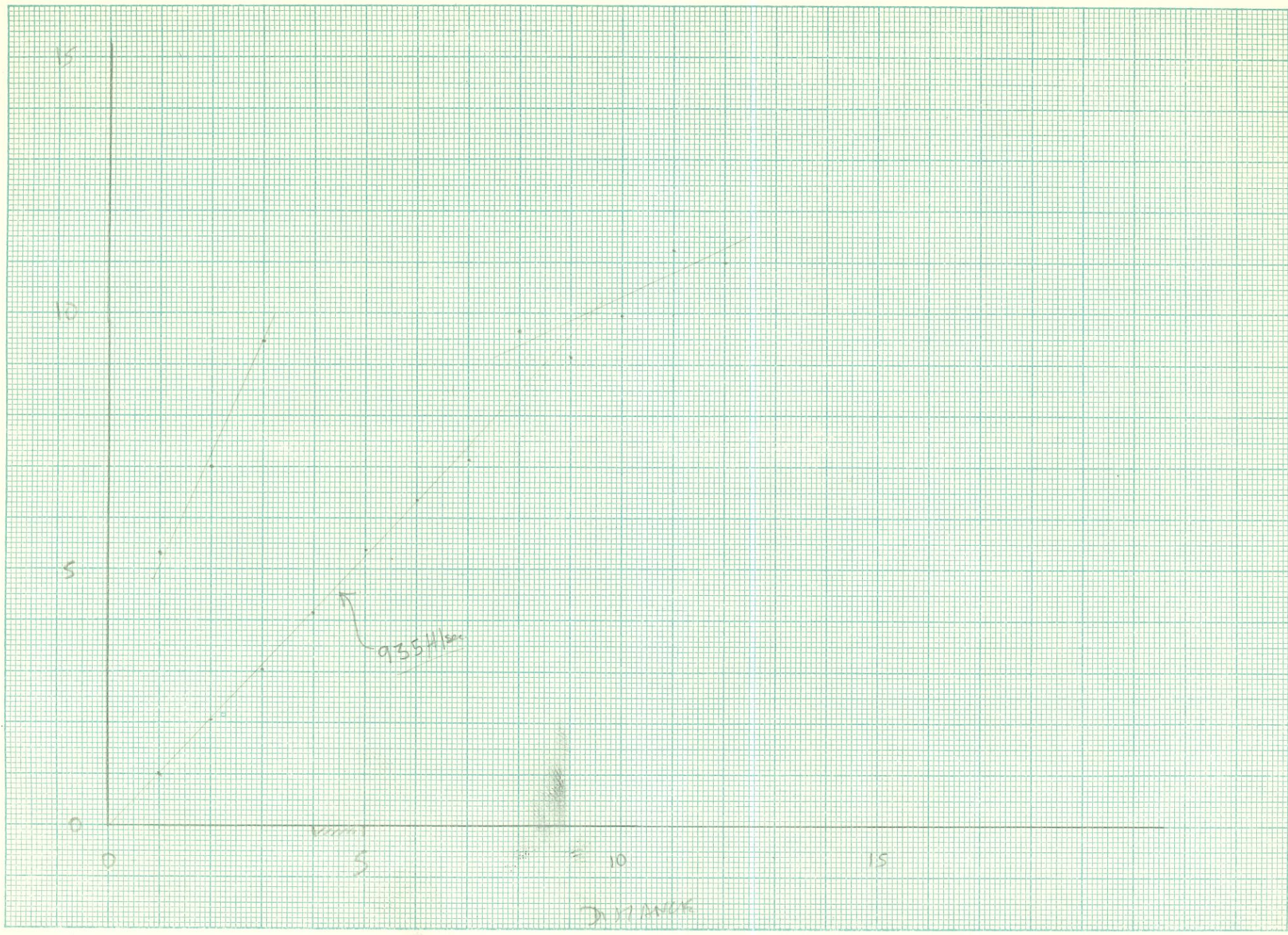


DATE _____ OPERATOR _____
 LOCATION _____
 JOB _____ TRAVERSE _____

SWPC

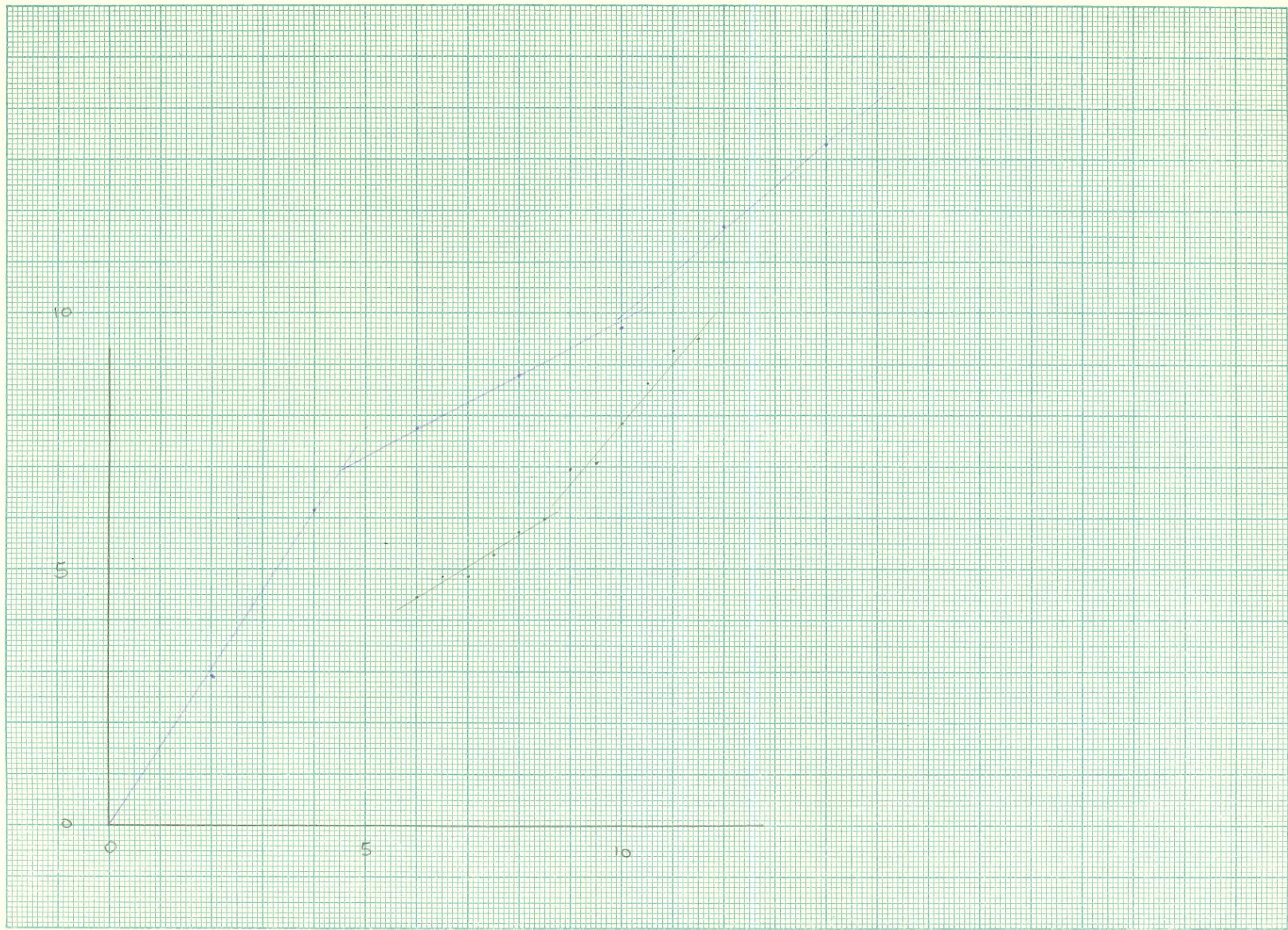
⑥

TIME



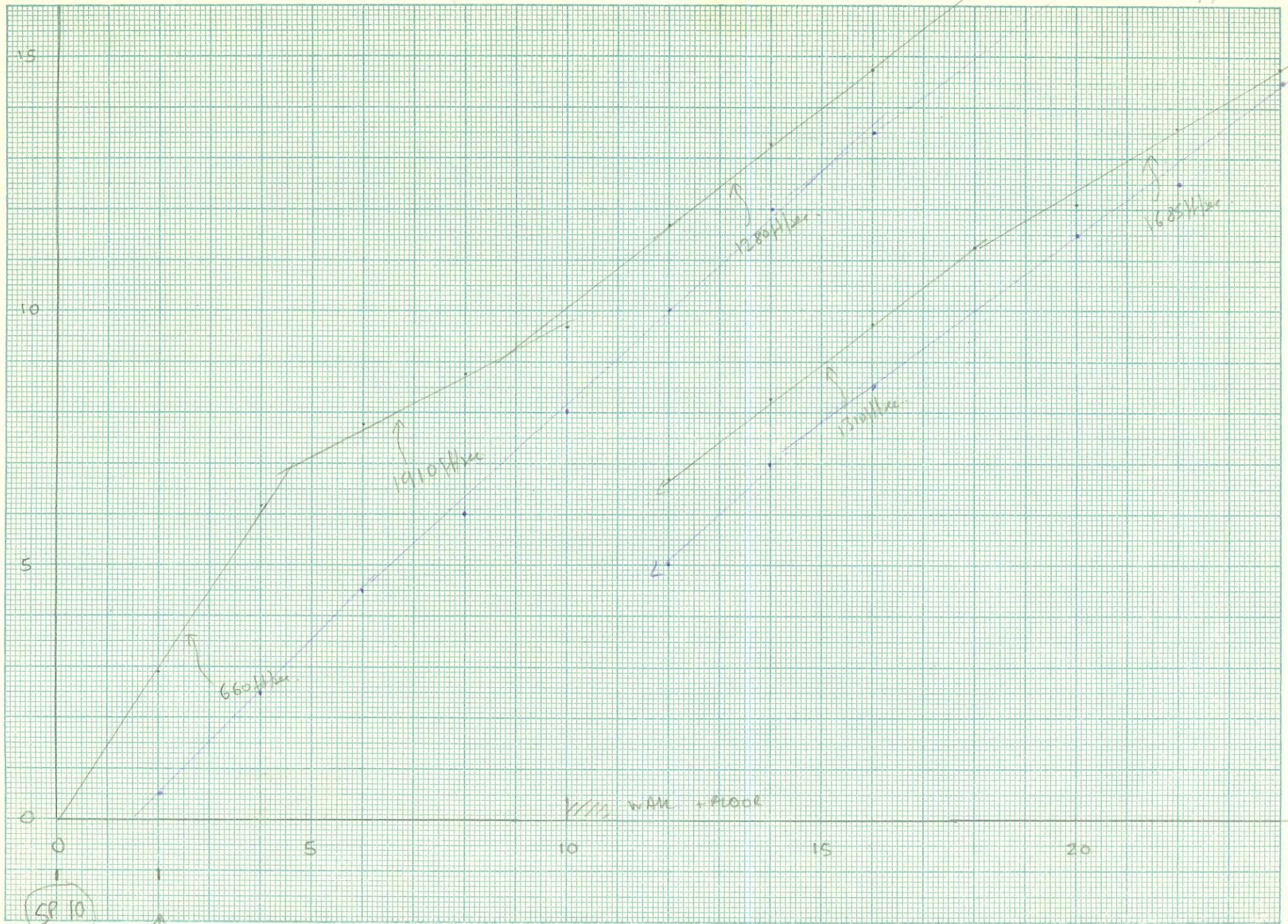
TUESON

10 & 21



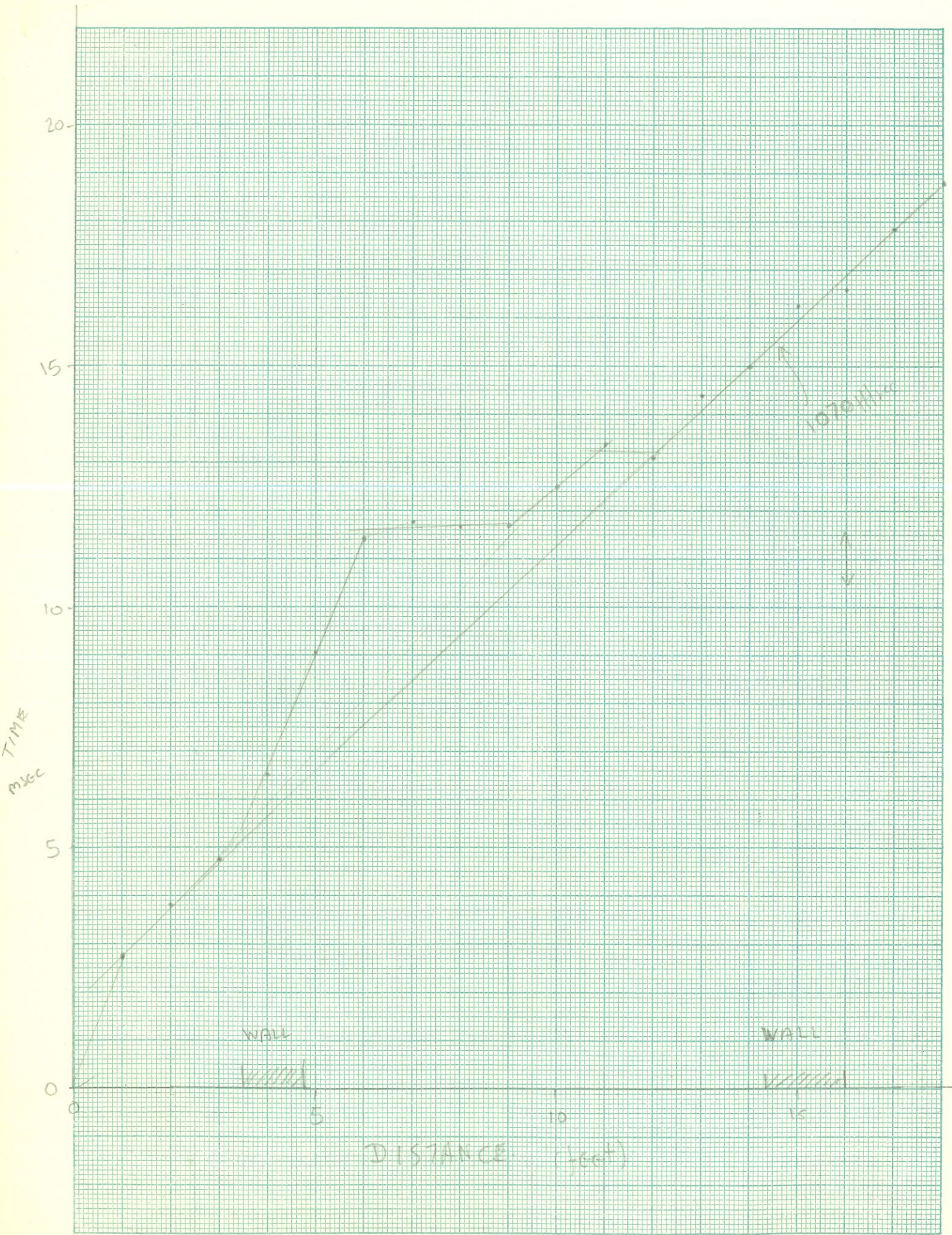
TUCSON

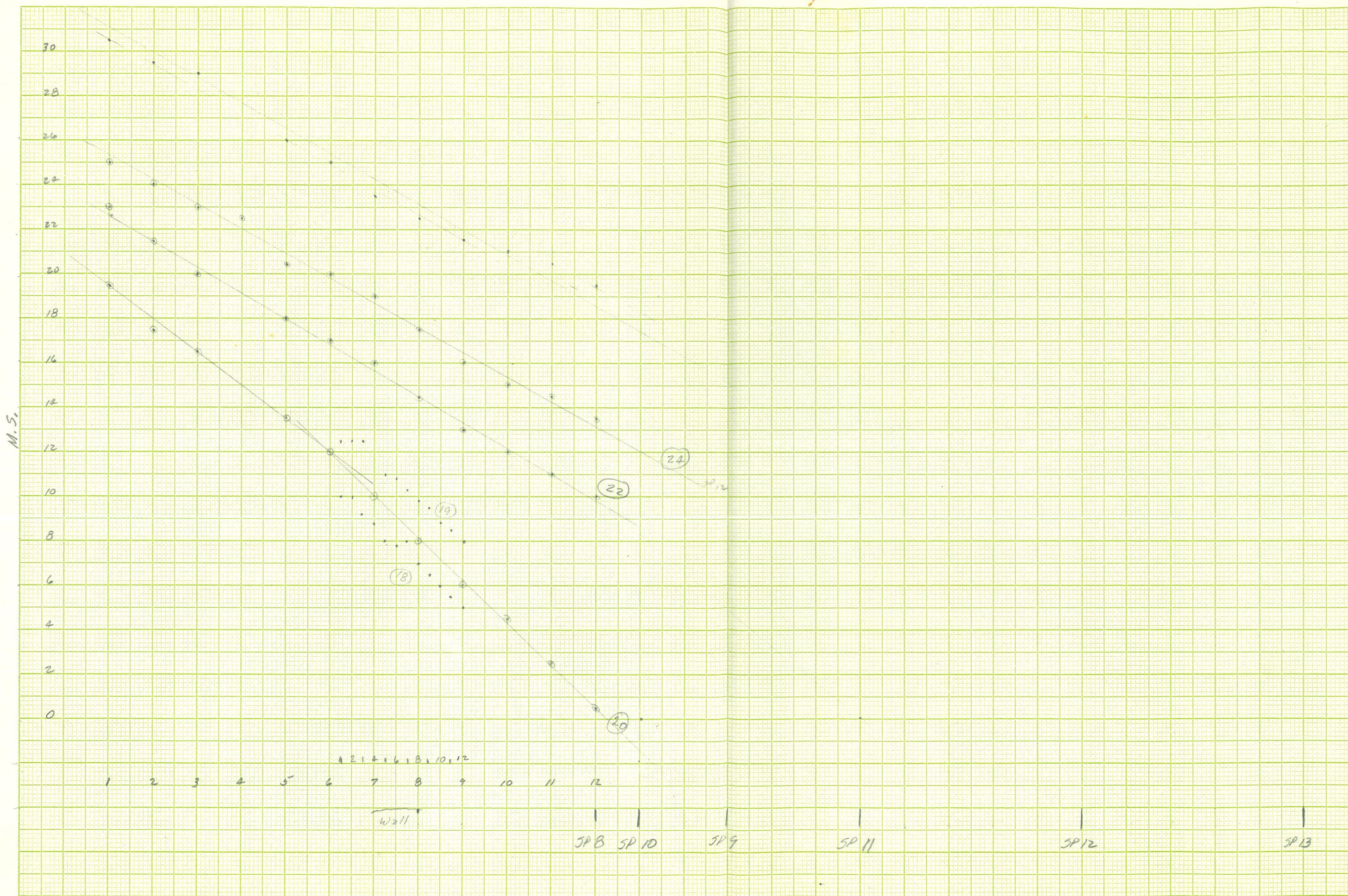
#20 (2)



KEUFFEL & ESSER CO.
MADE IN U.S.A.

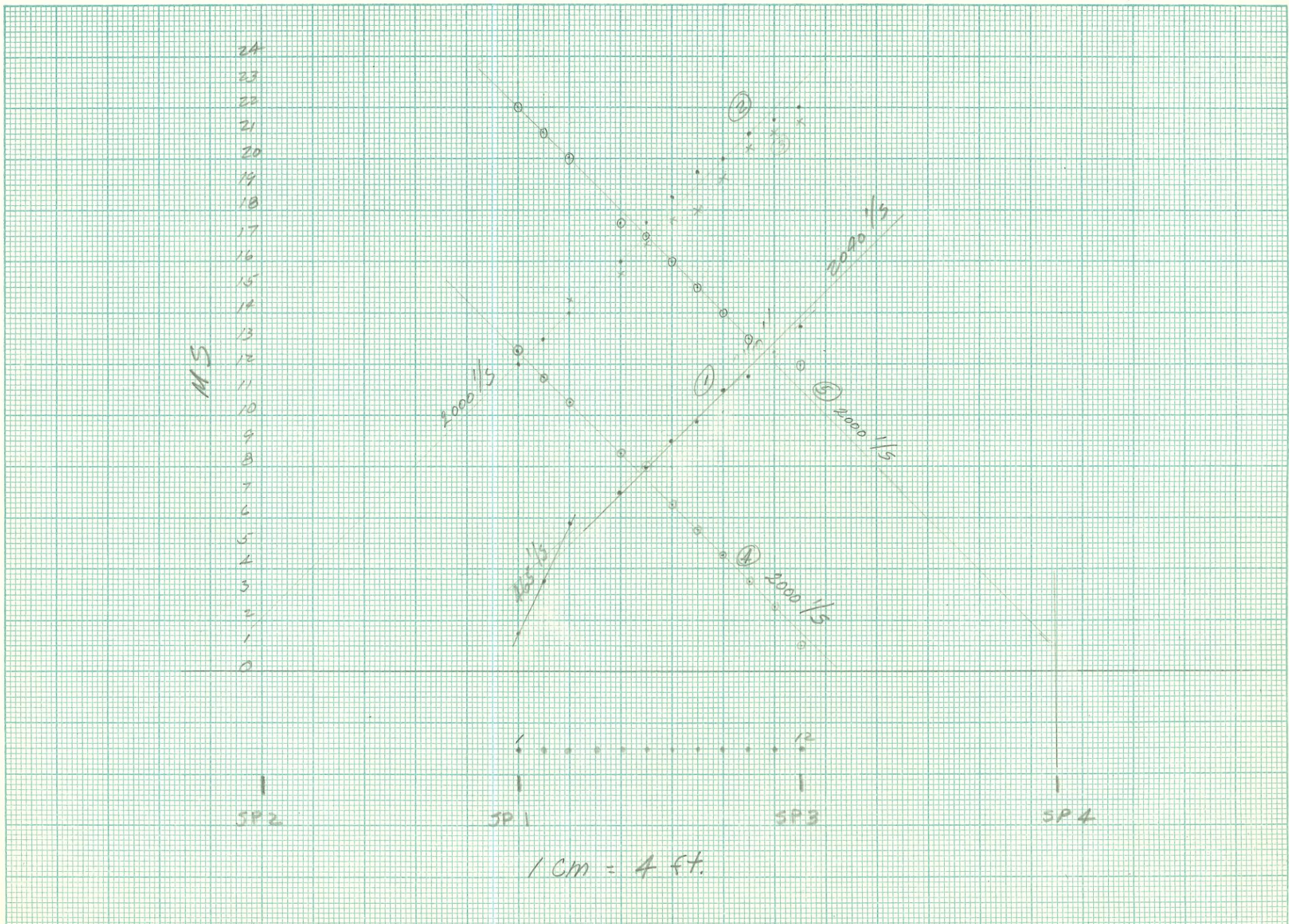
353-14
MILLIMETERS





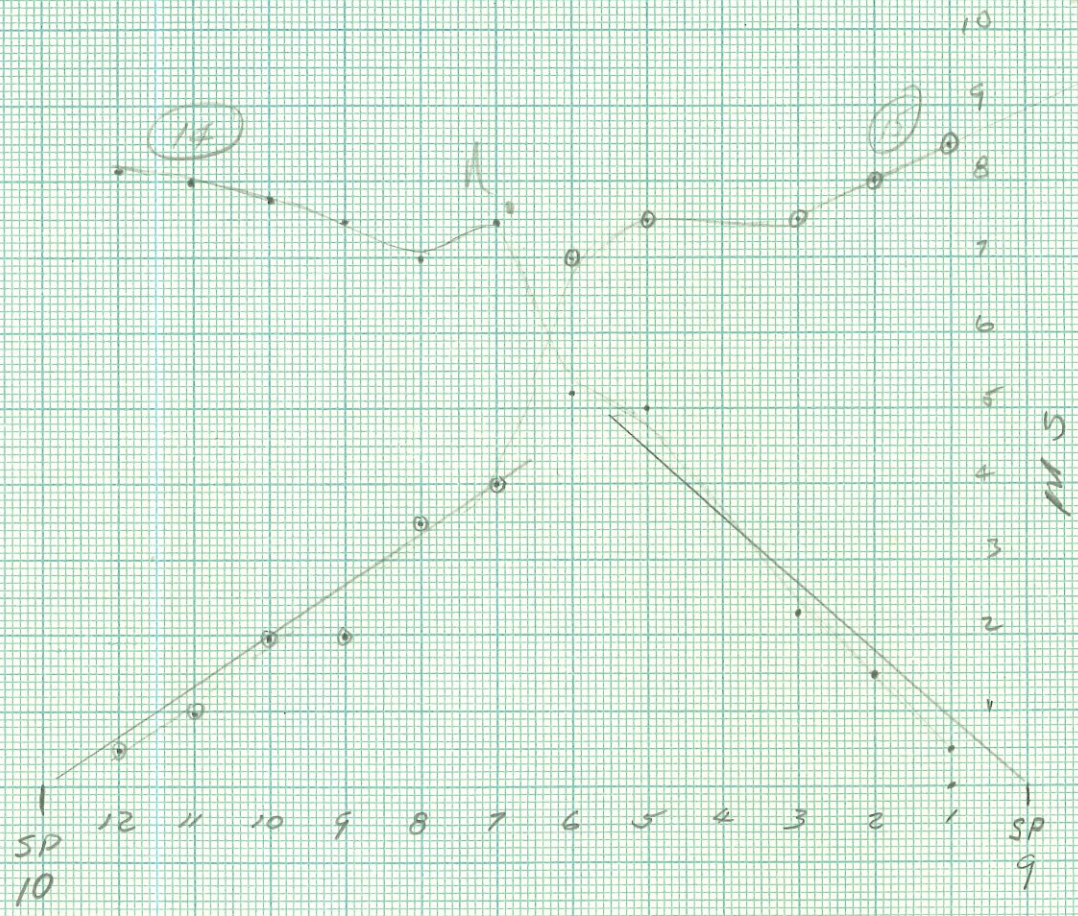
1

GLOBE
2-15-61
Gila Pueblo



"NORMAL" CONDITIONS
 $V = 2000 \text{ 1/s}$

CROSS SPREAD ANOMALY # 1



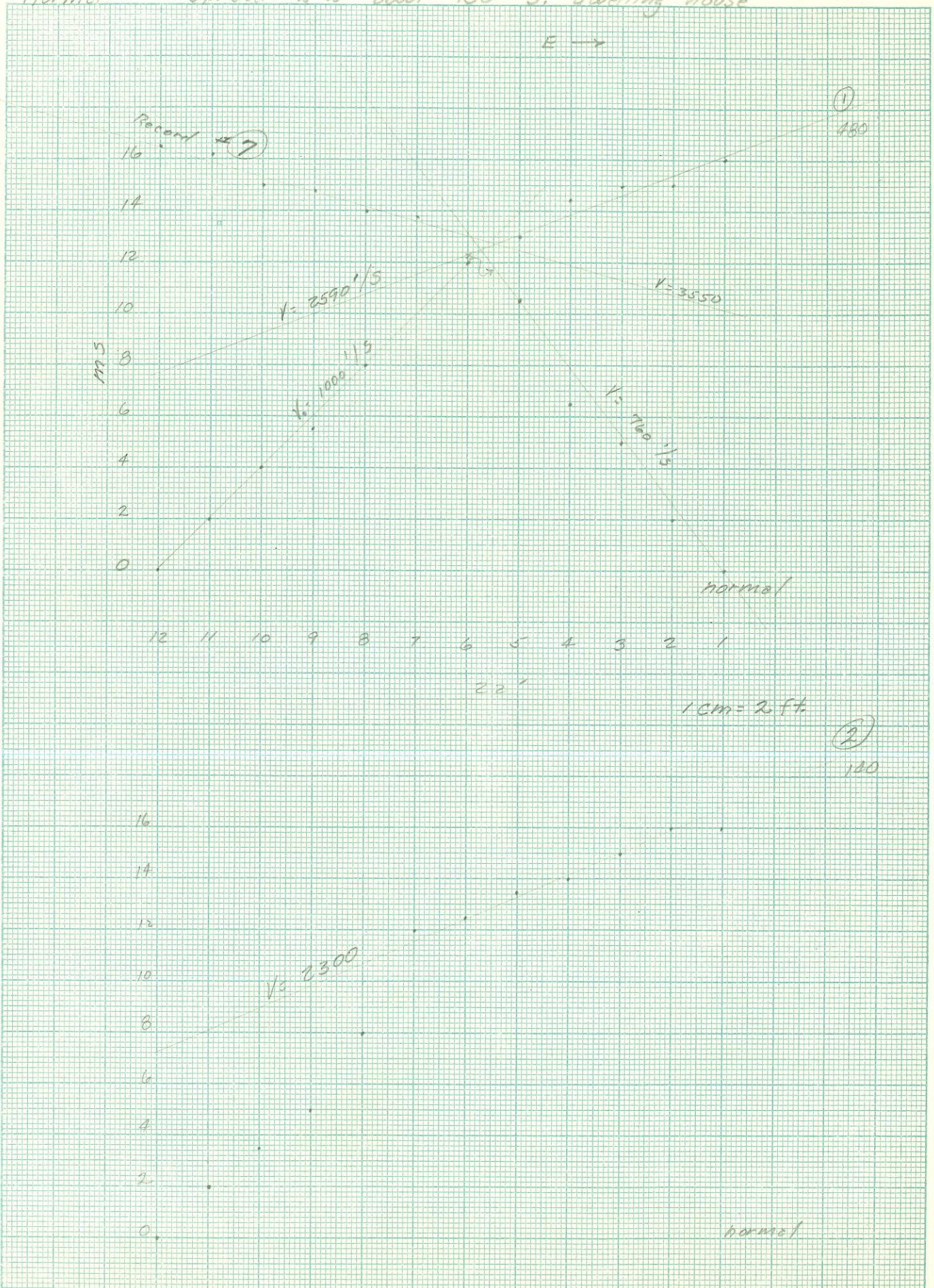
Old Indian Ruins

2/13/61

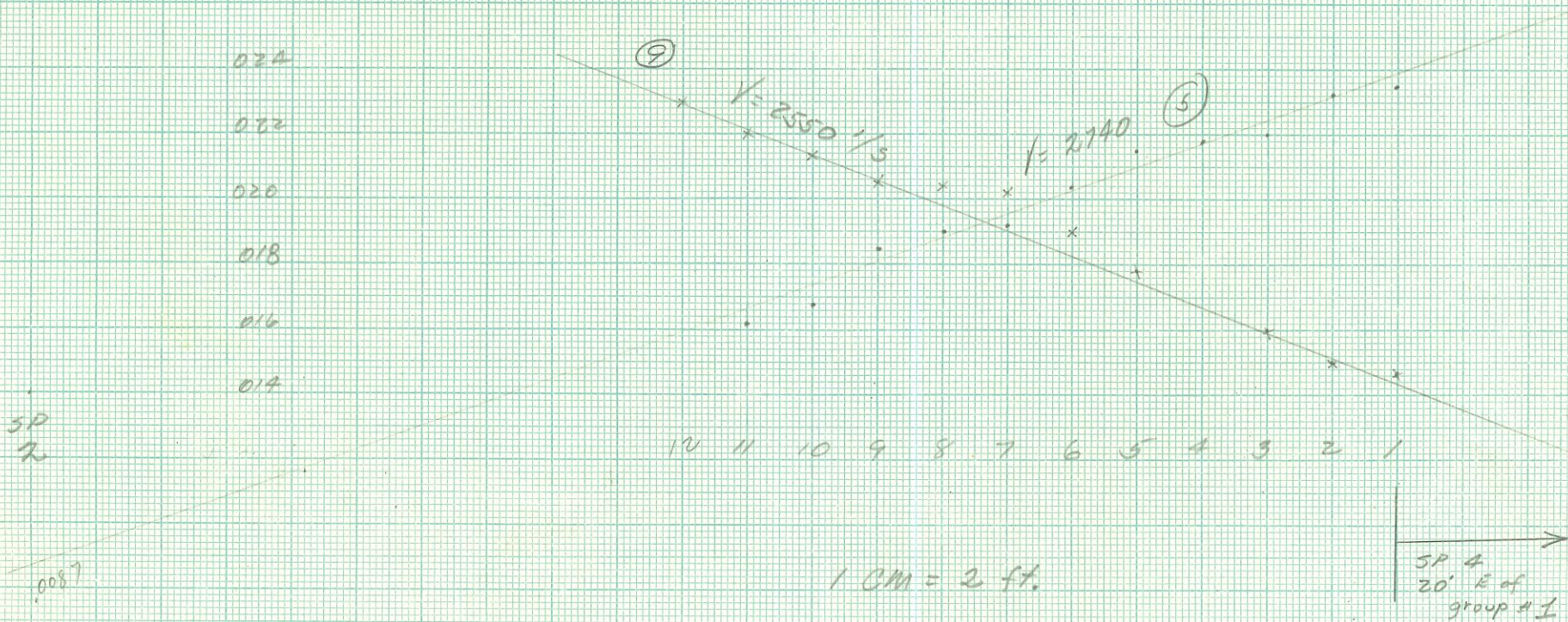
P1

Tucson
"normal"

spread E-W about 150' S. dwelling house



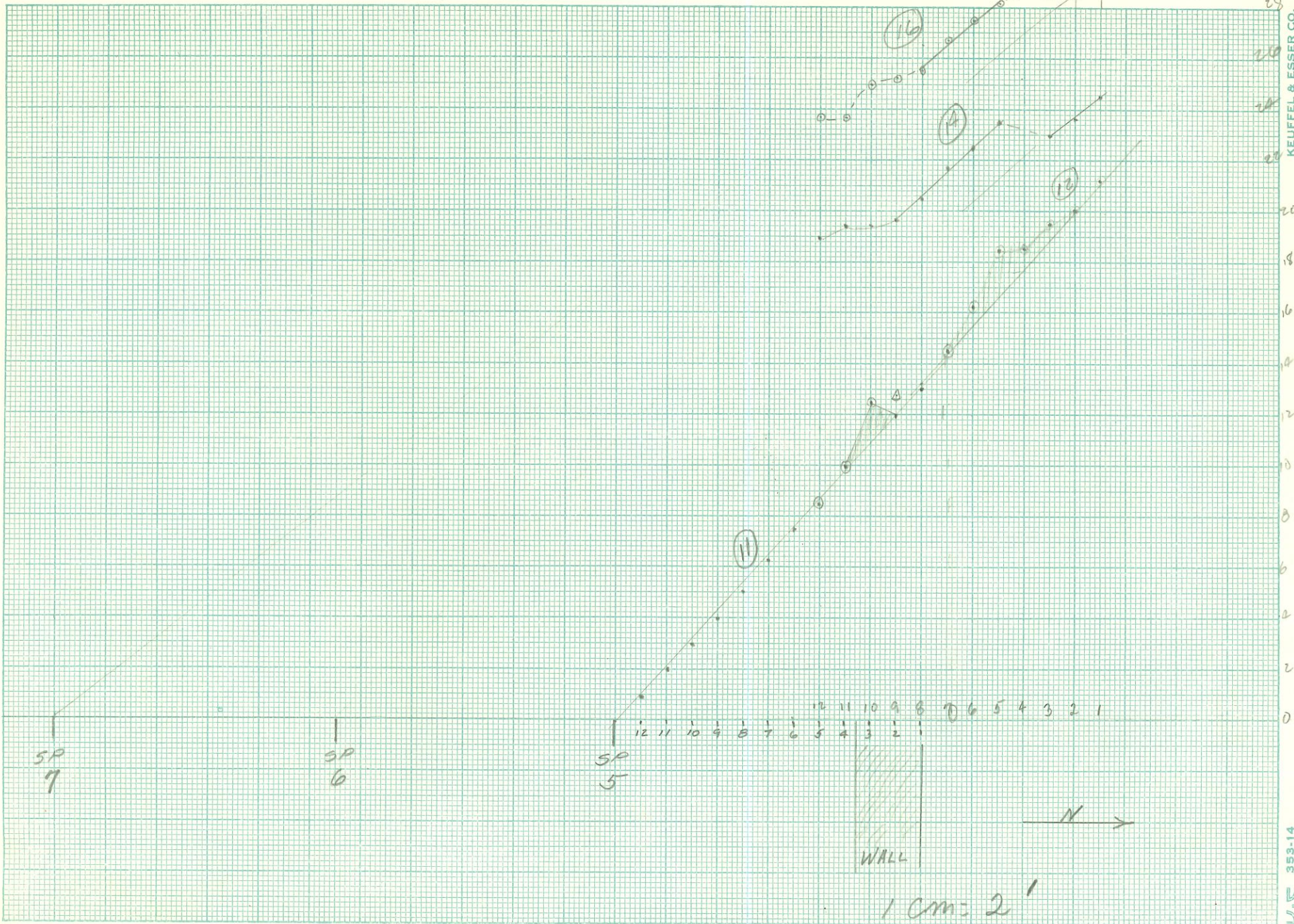
2/13/61 P2
Record #5



P3

Old Indian Ruins Tucson
Buried adobe wall
Largest MOUND

2/13/61

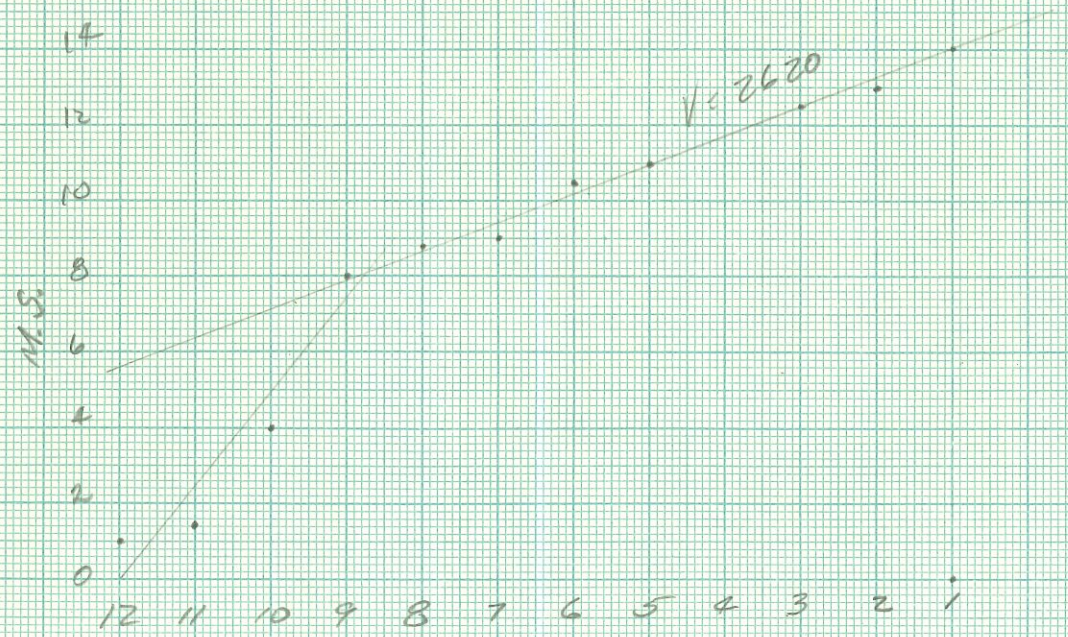


KEUFFEL & ESSER CO.
MADE IN U.S.A.

353-14
MILLIMETERS

3
GLOBE
GILO PUENO SITE
2-16-61

PROFILE NORMAL PROFILES OF GRAPH (2)
Parallel to the wall



1 CM = 2'

Tucson

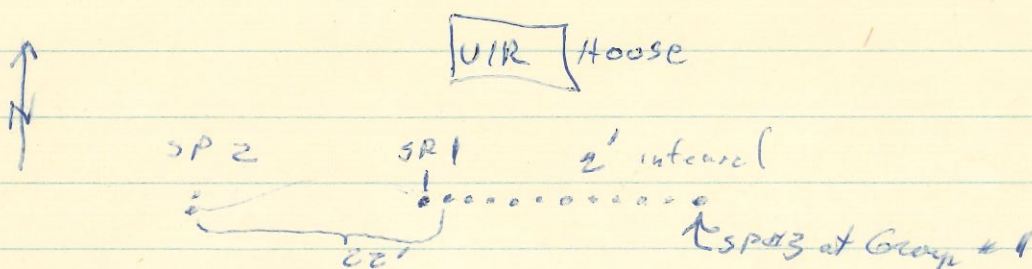
Feb. 13, 1961

11:00 AM

West of Madison Ruins,

is Normal 2' spacing, level ground - "neutral"

Spread E-W, #1 E, about 150' S of UIR dwelling house.



SP 1 Record # 1 0-480

11 # 2 0-140

SP 2 22' apart from tran # 11

SP 3 at tran # 1

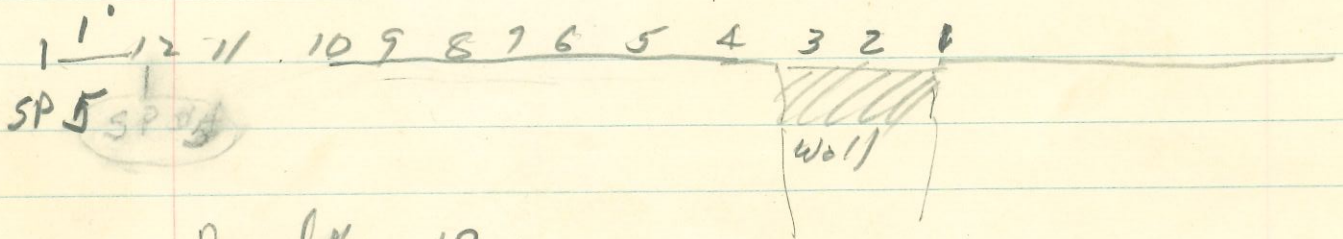
SP 4 22' E of tran # 2

SP 4 Placed ref. wire in S.P.S. circuit.

Feb 13.

old Indian Ruins
seis interval 1 ft.

N_c
→

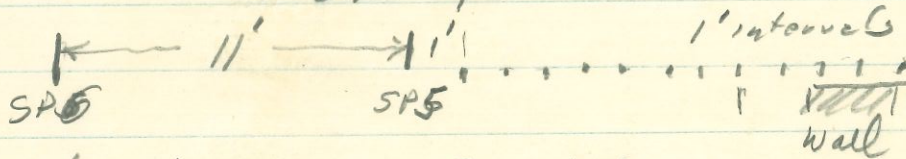


Record 10

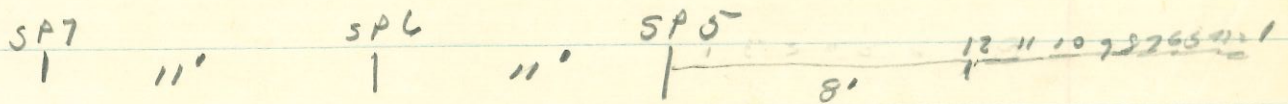
" 11 SPS removed, same spread as 10

SP 5 Record 12 } Seises Groups 1, 2, 3, 5 remain in place
 " 12 } spread continued North of #1 @ 1' interval
 " 13 } same as above, No SPS

SP 6 " 14 SPREAD SAME as Record 12, 13
Shot point moved 11' south



SP 7 Moved 11' south of SP 6
Record 15 seises same position as record 14

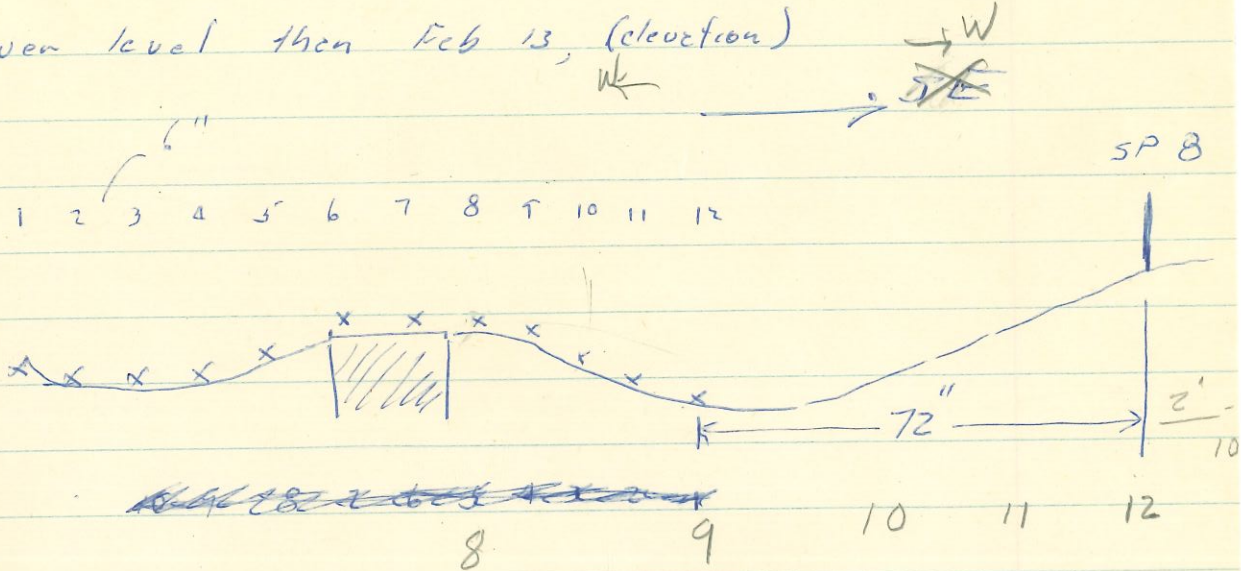


Record 16 Same as 15 except increased sensitivity

Tucson

Feb. 14 1961

Old Indian Ruins - site in SE corner of plot.
lower level than Feb 13, (elevation)



Record 17 0-140 sketch above
 " 18 Same settings check with Binary Counter
 detector at group #1

Record ^{SP 9} 19 Same spread. S.P. Moved 6 ft. out from SP 8

Round SP 10 SP 10 19 2' away from wall from
 SP 8 Seises at 2' intervals and
 2' from SP 10 to Group 12
 Group 8 is on west edge of wall in
 sketch on this page. Hammer on
 flat of axe

Ken 21 Same spread, same S.P. ^{3 lb.} Hammer on Stake

Feb. 14-1961

Rec. 22 SP 11 Same spread as record 20, 21
SHOT POINT MOVED 10' west SP #10.

Rec 23 SP 12 Same spread as 20, 21
SHOT POINT MOVED 10' West of SP 11

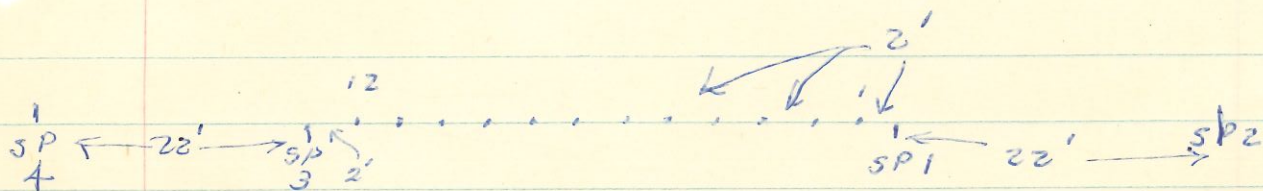
Rec. 24 Same as 23 but with SPS counted

Rec. 25 Same spread, SP MOVED 10' west of
S.P. 13 SP. 12

Checked with Benon counted same
spreads.

GLOBE, ARIZ
Feb. 15 - 1961
Gila Pueblo site

SP 1 Record 1 "NORMAL"



SP 2 Record 2 (above)

SP 2 " 3 Same as (2), harder blow

SP 3 " 4 Same speed, SP 2 from #12

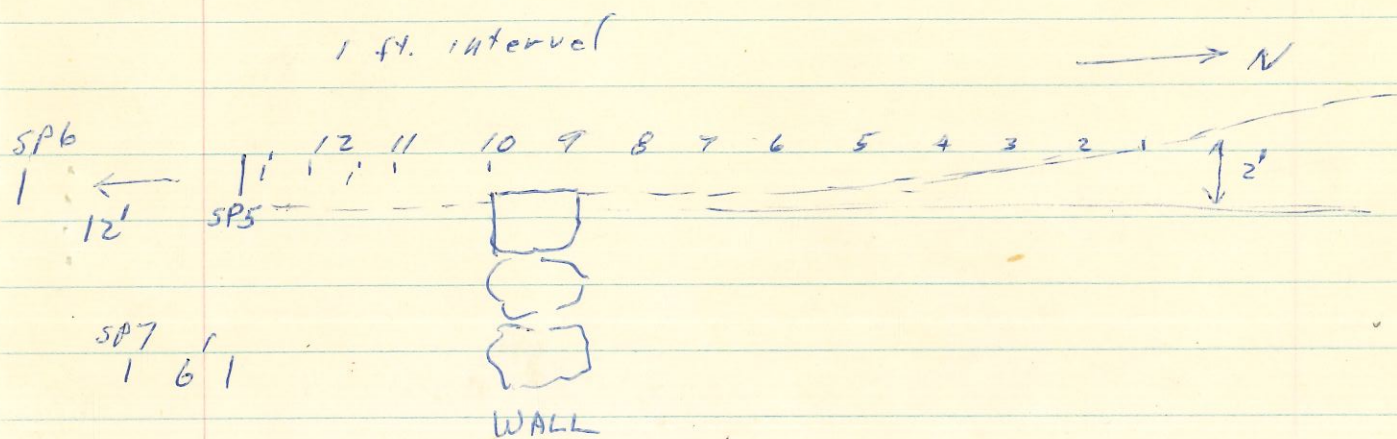
SP 4 " 5 Saw

GLOBE, ARIZ.
GIL0 PUEBLO SITE

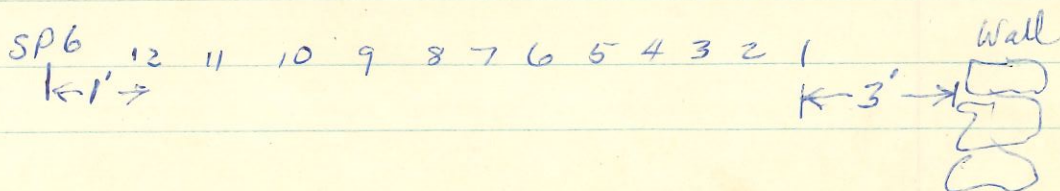
Feb. 16 1961

SP 5 Rec. #6

SPREAD OVER BURIED WALL OF Boulders
(Foot ball size) ON MOUND NEAR HOUSE

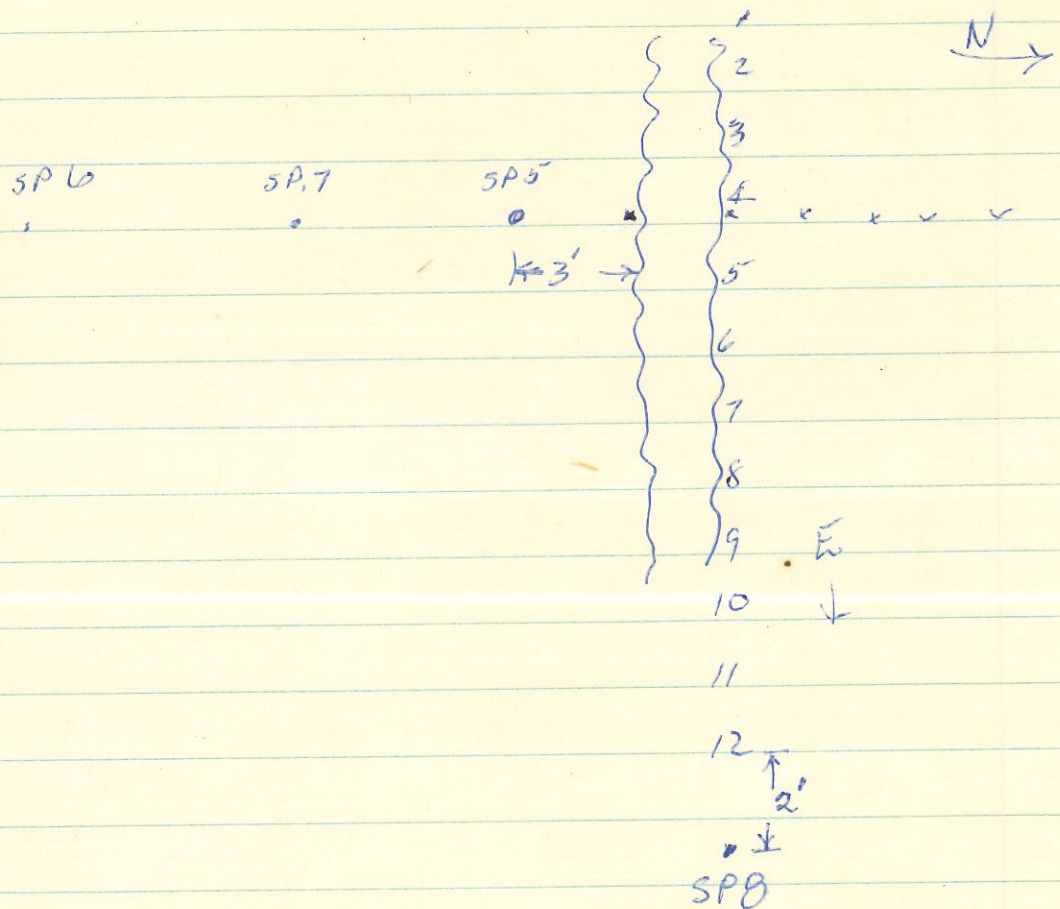


- SP6 Record #7 Same spread, SP 6 is 12' S of SP5
 SP7 Record #8 " " SP7 is half way between 6 & 5
 SP7 Rec #9 " " Same SP But NO AGC
 (Group 106 picked up & moved south of 12)
 SP7 Rec #10 SPREAD MOVED UP, GROUP # 12
 is 1' from SP 7 & #1 is 12' from SP
 SP6 Rec #11 Same spread as Rec. 10,
 SP6 Rec #12 Picked up 1 to 6 and moved back



GLOBE
 GILO PUERTO SITE
 Feb 16 1961

SP 8 SPREAD, 2' intervals, E & W, along edge
 of wall shot across from S.P. 5, 6, 7



SP 8 Rec. 13 SPREAD E & W

GLOBE
HILO PUEBLO SITE
2-16-61

CROSS SPREAD TO CHECK ANOMOLY

SP # 9 Rec # 14

SP 1' W of # 11 1' interval

7 is common to SP # 7

SP 10 Rec # 15 Reverse of above

SP is 1' East of # 12

TUCSON

No zero

No zero

51 31

	(10)	(11)	(12)	(13)	(14)	(15)
12	1	2	(12)	5	20	22
11	2	4	?	? 2	20	25
10	3	5	13	10	20	25
9	4	6+	13	9	20	25
8	5	7	13+	10	21	25
7	6	8	14	11	21	26
6	7 1/2 -	9 1/2	15	12	22	26
5	9	11	18?	(15)	23	28
4	✓	12	-	16	-	-
3	?	? 12	19	16 -	25	28
2	11/12	14	20	17	23+	28
1	12/13	15+	20	17 1/2	24	29

TUCSON
10214, 16.

TIME
in SECS.

