Geologic Report: Robison et al
#1 Jamison
E½ NENW → E½NENW 26-15S-18E
Franklin Co., Kans.
Elev. 1090 Ground
Contractor: Brady Drlg. Co.
Commenced: October 20, 1964
Completed: Novemeber 4, 1964
Production: D & A

Dr. Corbin E. Robison, M. D.
901 Kentucky
Lawrence, Kansas

Dear Sir:

The #1 Jamison was drilled with a truck mounted rotary rig from the surface to a total depth of 1450 feet as agreed in the written contract. Samples from 5 foot intervals were examined from a depth of 690 to 1450 feet. The driller kept a time log at 5 foot intervals from 690 to 1128 feet; from 1128 to 1450 feet the time log interval was 1 foot. Fresh water mud was used, and the driller maintained adaquate mud viscosity by periodically adding gel. No viscosity determinations were made. A drillers log was kept from surface to 690 feet; a sample log at a scale of 100 feet per inch was kept for the intervals 690-920, 1080-1175, and 1285-1450. Tops were picked by both drilling time breaks and depth of first appearances in the samples. The #1 Jamison offset the #1"A" Barnhardt which is an old cable tool hole which had a reported show of gas at the top of the "Bartlesville" sand.

Logging. An induction-electric log was run on the #1 Jamison by Welex Novemeber 4. The following table summarizes tops and elevations of stratigraphic horizons and compares sample log picks with electric log picks.

Formation	Electric log depth	Electric log elevation	Sample log depth	Remarks
Leavenworth Ls.	not run		9 (+1081, top)	
Toronto Ls.	39	+1057	33 (+1057, base)	
Haskell Ls	202	+888	200	
Lansing Gp.	336	+754	336	
Kansas City Gp.	471	+619	455	as defined by the Kans. Geol. Sur.
Base K. C.	705	+385	707	
"Bartlesville"	1134	-44	1132	
"Burgess"	1426	-336	1424	
Total Depth	1452		1450	

No hydrocarbons were indicated by the electric log in the formations.

Core Samples. A 25 foot core of the "Bartlesville" sand was taken from 1150 to 1175 feet. Core diameter was 3¼ inches. The rock type was a relatively homogeneous, fine to medium grained, yellowish brown sandstone with local, very thin carbonaceous and micaceous laminae. The rock was slightly argillaceous and generally porous. As soon as the core was received Robison, Scott, and Welty examined it for shows of hydrocarbons. No odors or stains were observed. Salt water was tasted and observed bleeding from the sandstone. No stains or odors were observed in th 16 feet of sandstone overlying the cored interval, nor elsewhere in

bleeding from the sandstone. No stains or odors were observed in the 16 feet of sandstone overlying the cored interval, nor elsewhere in the hole.

Structural Position. The following table compares the elevations of stratigraphic datum planes and thicknesses found in the #1 Jamison with those in the #1 Crist a half mile east, and in the #1"A" Barnhardt 300 feet west. Regional dip is about 20 feet per mile in a west northwest direction.

Datum	#1"A" Barnhardt		#1 Jamison		#1 Crist	
Base Toronto	+1053		+1057		+1066	
		305		303		350
Lansing	+748		+754		+716	
		293		371		334
Base K. C	+458		+383		+382	
		795		>743		746
Mississippian	-337		>-360 (not drilled)		-364	

The near surface structure between the 3 holes appears to be developed as expected. The top of the Lansing in this area is a buried erosional surface and thus cannot accurately indicate structure. The Base of the Kansas City is a reliable structural datum. In the #1 Jamison it is level with the same horizon in the #1 Crist; regional dip is not developed. The 75 feet difference in elevation between the #1 Jamison and the #1"A" Barnhardt may be explained by one of two hyptheses: 1) a post-Kansas City pre-Lansing fault may be between the two holes, or 2) the data in the old Barnhardt well is not accurate. Apparently the #1 Jamison was drilled on a local structural terrace having no closure.

Very truly yours,

Robert W. Scott, Geologist

Copies to:
Mr. S. N. Drum
Mr. R. S. Scott
Mr. Harold Brady
Mr. Roger Welty

Robison et al #1 Jamison
E½ NE NW, 26, 15S, 18E
Franklin County, Kansas
Elevation: 1090 Ground level

7" surface casing, 18'
Comm: 10-20-64
Comp: 11-4-64

All measurements are from ground level.

Drillers log to 690

Depth	Rock type	Remarks
9	soil	
12	limestone	Leavenworth Ls
17	shale	
33	limestone	Toronto Ls
200	shale	
205	limestone	Haskell Ls
210	shale	
240	sandstone	
250	shale	>
275	sand	>
280	shale	
290	sand	
336	shale	
355	limestone	Lansing Gp.
362	shale	
372	limestone	
376	shale	
404	limestone	
411	shale	
439	limestone	
445	shale	Kansas City Gp
455	limestone	
526	shale	
552	limestone	
559 ~~shale~~	shale	
576	limestone	
605	shale	
615	limestone	
632	shale	
640	limestone	
644	shale	
657	limestone	
663 ~~shale~~	shale	
685	limestone	
690	shale	

Geologist's log

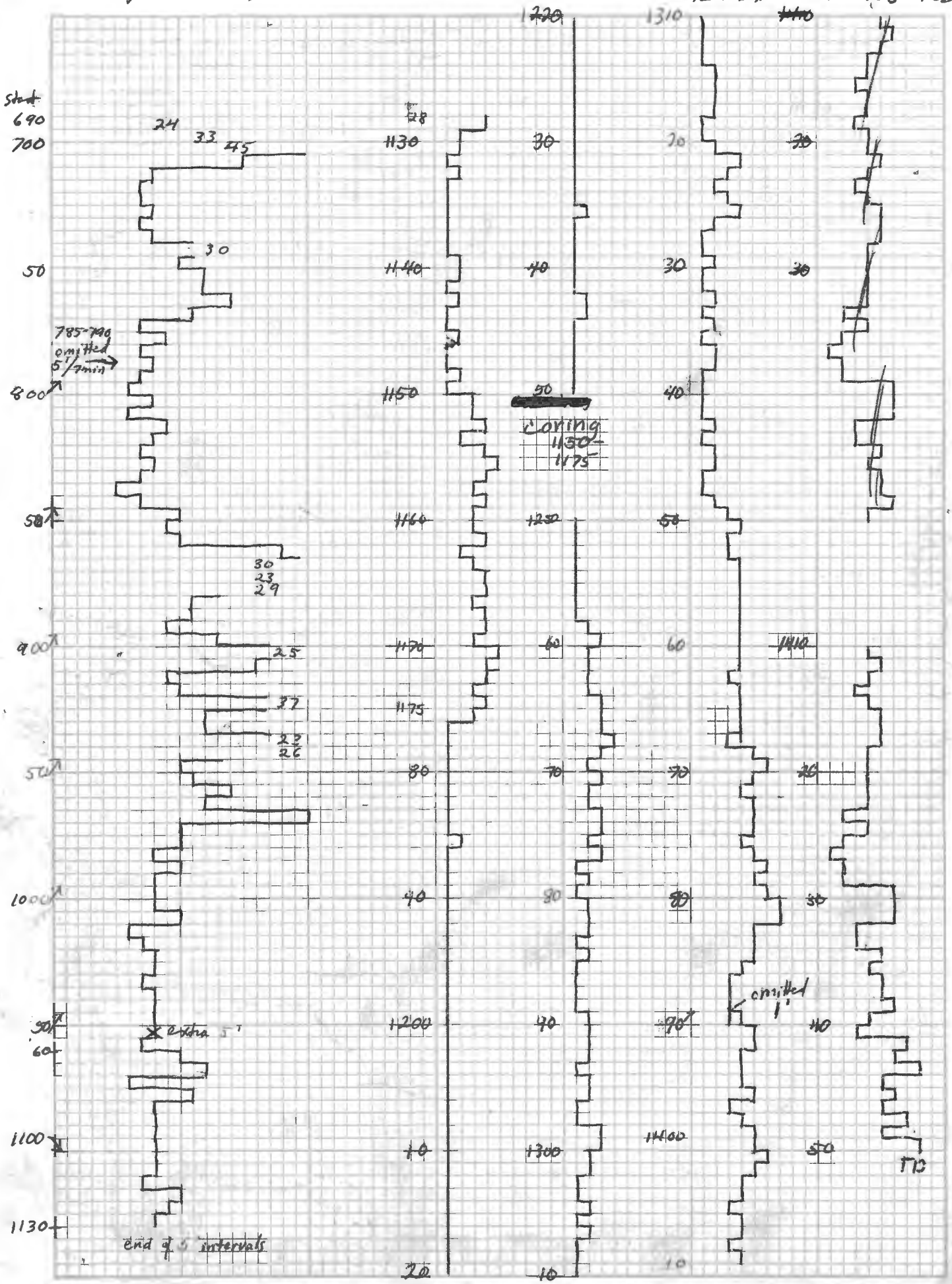
690-707	limestone, light gray, fine-medium crystalline, cherty. Base K.C.
707-720	siltstone and sandstone, very fine grained, carbonaceous, gray shale breaks
720-830	silty shale and siltstone interbedded, dark gray, micaceous
830-840	sandstone, very fine grained, slightly carbonaceous
840-850	shale, black
850-870	shale and siltstone, green and red
870-885	limestone, light gray, fine crystalline
885-895	shale, silty, greenish gray
895-903	sandstone, very fine to fine grained
903-912	limestone, light gray, fine crystalline
912-920	siltstone and shale, gray

Depth	Rock type
920-1080	samples not logged, rock types ~~suggested by~~ interpreted from time log
920-925	shale
925-930	limestone
930-942	shale
942-949	limestone
949-1015	shale
1015-1020	sand
1020-1065	shale
1065-1075	sand
1075-1080	shale
1080-1119	shale, green and black; sandy
1119-1120	coal
1120-1132	shale, green and black
1132-1150	sandstone, fine-medium grained, subrounded quartz, carbon, ~~fine-medium gr~~ "Bartlesville"
1150-1175	cored sandstone, as above
1175-1285	samples not logged; mainly sand and shale
1285-1325	sandstone, as above, and shale, dark gray
1325-1360	sandstone, as above
1360-1422	shale, black and dark gray; trace of sand
1422-1428	sandstone, fine to coarse grained, rounded to subrounded quartz, carbon
1428-1430	shale, black "Burgess"
1430-1450	sandstone, as above
1450 TD	

space →

Drilling time log

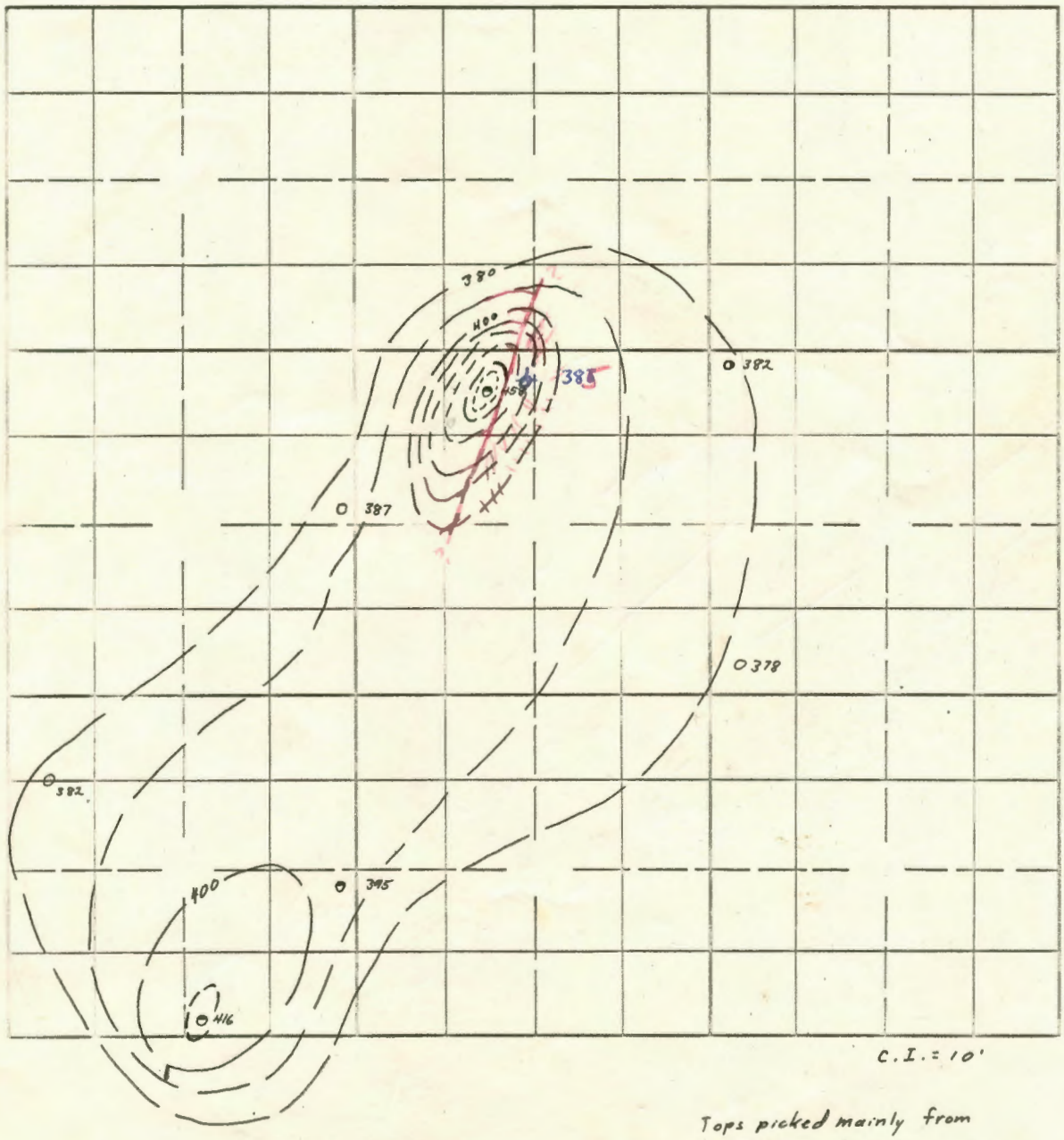
Robison et al #1 Jamison
E½ NE NW 26 – 15S – 18E



STRUCTURE CONTOUR MAP ON BASE OF KANSAS CITY

Secs. 22, 23, 24, 25, 26, 27, 34, 35, 36 T. 15 S. R. 18 E.

County Franklin



C.I. = 10'

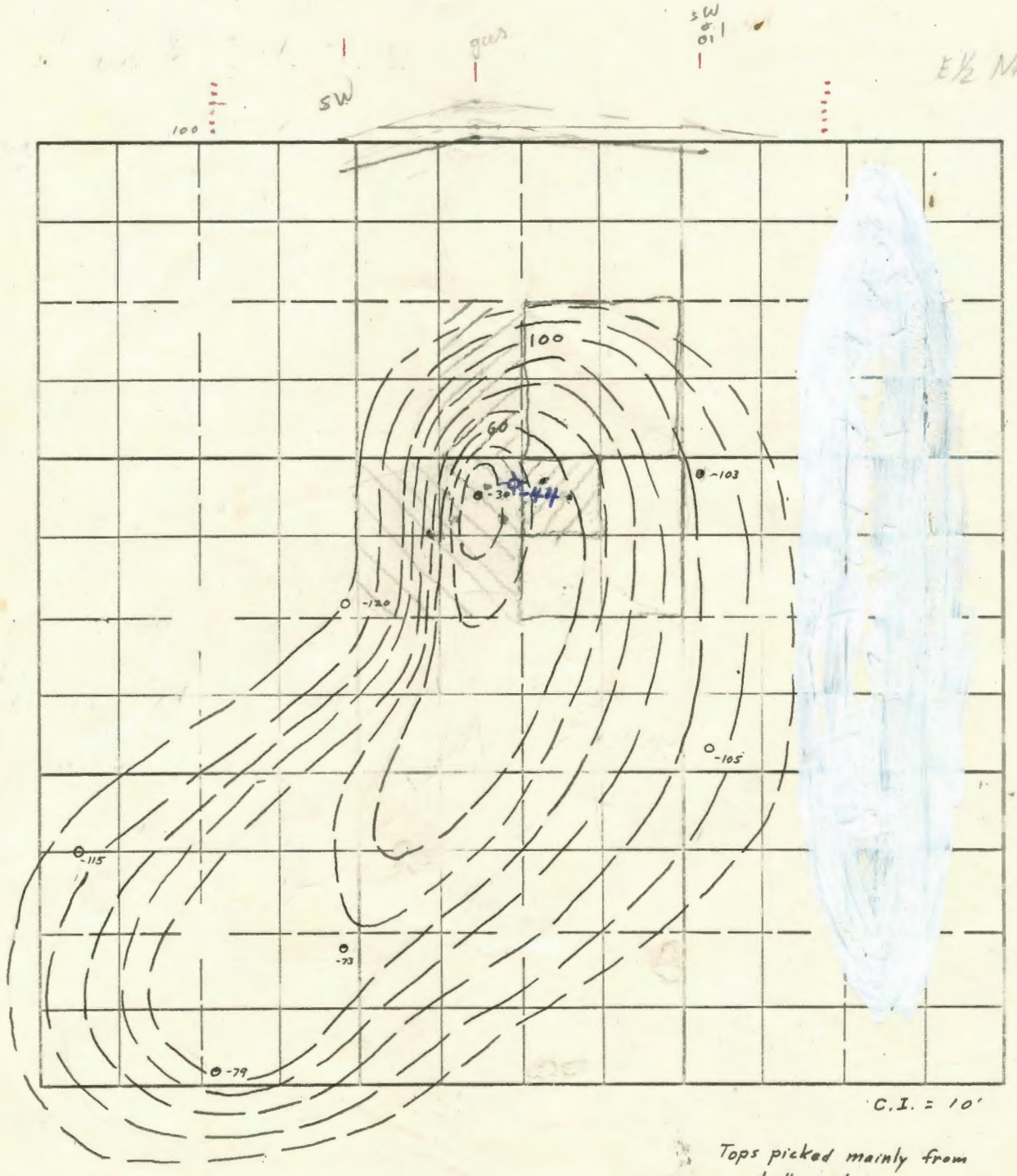
Tops picked mainly from drillers logs.

R. W. Scott Sept. 11, 1964

STRUCTURE CONTOUR MAP ON TOP OF "BARTLESVILLE"

Secs. 22, 23, 24, 25, 26, 27, 34, 35, 36 T. 15 S. R. 18 E

County Franklin



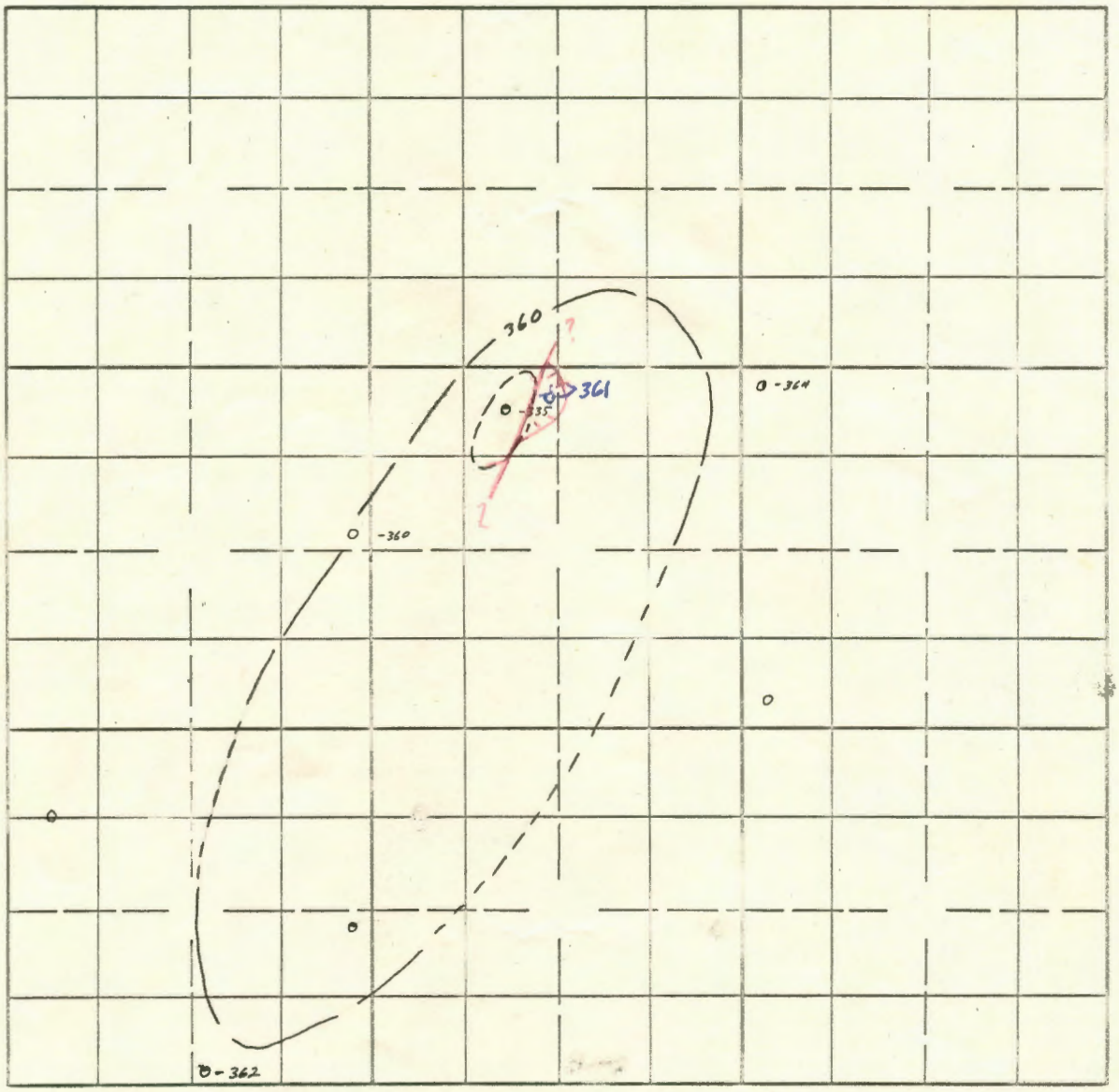
Tops picked mainly from drillers logs.

R.W. Scott Sept. 11, 1964

STRUCTURE CONTOUR MAP ON TOP OF MISSISSIPPAN ROCKS

Secs. 22, 23, 24, 25, 26, 27, 34, 35, 36 T. 15 S. R. 18 E.

County Franklin



C. I. = 20'

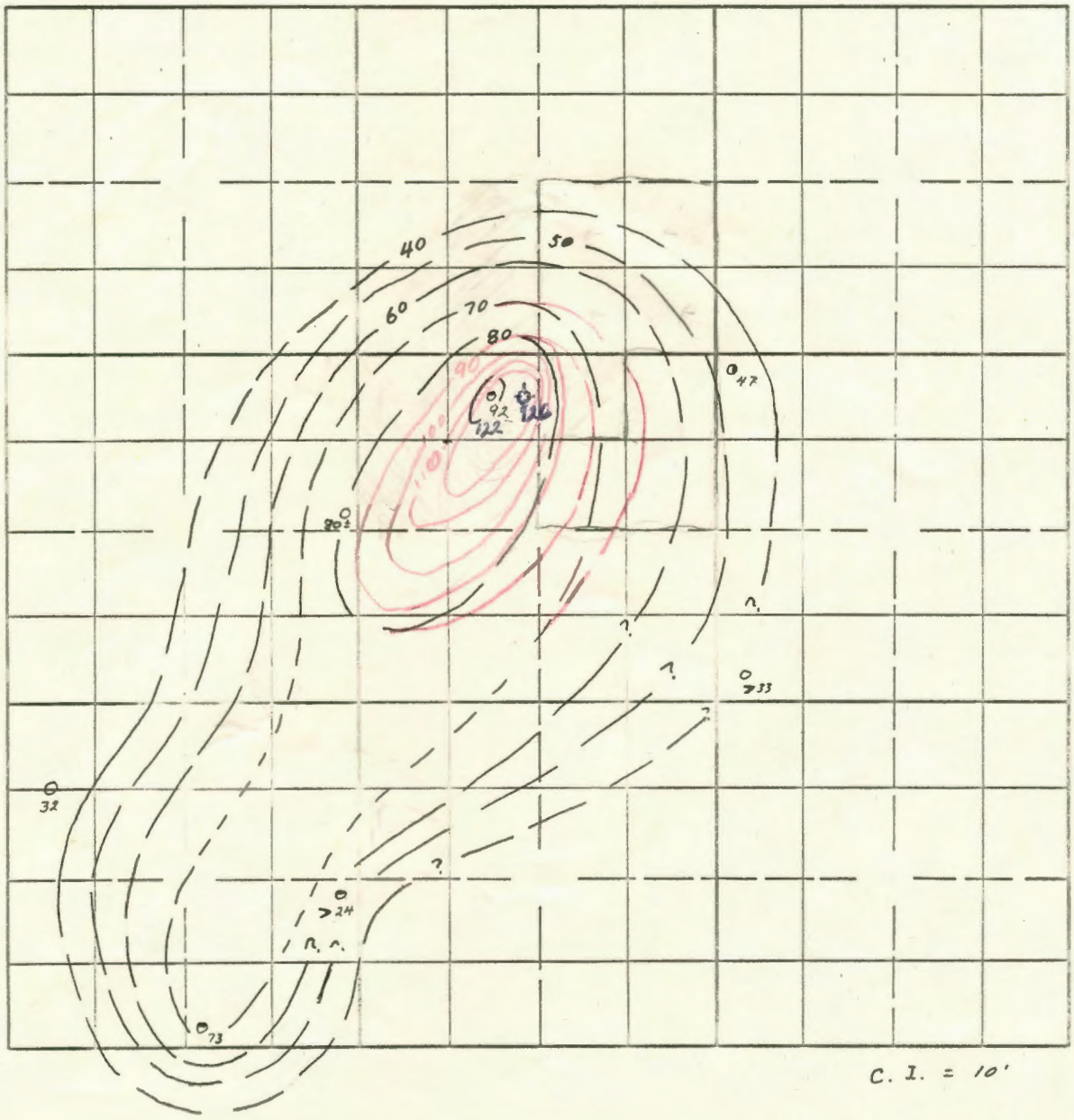
Tops picked mainly from drillers logs.

R. W. Scott Sept. 11, 1964

ISOPACH MAP OF "BARTLESVILLE" SAND

Secs. 22, 23, 24
25, 26, 27
34 35, 36 — T. 15 S. — R. 18 E.

County Franklin



C. I. = 10'

Sand fluids

- o water
- ⊖ gas show
- ⊙ oil show

Data mainly from drillers logs.

R. W. Scott Sept. 11, 1964