

LAYNE-WESTERN COMPANY

WATER SUPPLY CONTRACTORS

WELL WATER SUPPLIES AND
PUMP EQUIPMENT FOR
MUNICIPALITIES
INDUSTRIES
RAILROADS
MINES AND IRRIGATION

Affiliated With
LAYNE & BOWLER, INC.
LAYNE WELLS AND LAYNE PUMPS
P. O. BOX 662
SOUTH DUFF

JUN 28 1949
W-3713
FACTORIES
MEMPHIS, TENN.
HOUSTON, TEXAS
LOS ANGELES, CALIF.
BRANCHES - REPRESENTATIVES
THROUGHOUT THE COUNTRY

AMES, IOWA

June 27, 1949

Iowa Geological Survey
Geology Annex Bldg.
Iowa City, Iowa

Attention: Dr. H. G. Hershey

Gentlemen:

The following information on a well recently completed at Garnavillo, Iowa will probably be of interest to you.

16" casing was set to the rock at 40 feet. 10" casing was set through the 16" 20 feet into the rock and cemented to the surface. 10" open hole was continued to 386 feet. Following is the driller's log on the well:

0	-	5'	surface soil
5	-	20	yellow sandy clay
20	-	25	blue clay
25	-	40	yellow sandy clay
40	-	350	lime
350	-	362	green shale
362	-	385	sand (white)
385	-	386	blue shale

On the pumping test the static water level was 70 feet. The well stabilized at 76 gpm with a drawdown of 63 feet and a pumping level of 133 feet.

Yours very truly,

LAYNE-WESTERN COMPANY


Frank H. Flores

FHF:le

IOWA GEOLOGICAL SURVEY
In Cooperation with U. S. Geological Survey

W-3713

RECORD OF WELL

Location:

Town: Garnavillo (N E)
(S W): County Clayton

CE 1/2 SE NE sec. 18 T 93 N., R. 3 W. Twp.

Well name and number Garnavillo Town Well

Owner → Address _____

Tenant _____ Address _____

Contractor Layne-Western Address _____

Drillers _____

Drilling dates _____ COMPLETED JUNE 1949

Well data:

Elevations: Drilling curb 1062 feet; Land surface 1062 feet

Determined by _____

Topographic position _____

Total depth: Reported 385 feet, Measured _____ feet

Drilling method _____

Hole and casing data _____

Original depth to water 70' above
ft. below _____ Date _____

Original elevation of water level _____ ft.; Source of data _____

Sources of water: Principal _____; Others _____

Production data: _____ Date _____

Static depth to water 70 _____ Measuring point _____
Pumping level 133 _____ at 76 _____ g.p.m.

Specific capacity _____ g.p.m. per ft. drawdown; Temperature _____ °F.

Pump data: Type pump _____ Column Dia. _____ Length _____
Cylinder or bowls: Dia. _____ Length _____ Suction pipe _____

Power _____ Airline _____

Estimated rate of production: _____ g.p.m. for _____ hrs. a day
Use of water _____

WATER ANALYSES (in parts per million)

Date samples	_____	_____	_____	_____
Sampled by	_____	_____	_____	_____
Total solids	_____	_____	_____	_____
Insoluble matter	_____	_____	_____	_____
Alkalinity (Meo)	_____	_____	_____	_____
Alkalinity (Phn)	_____	_____	_____	_____
pH	_____	_____	_____	_____
Fe ₂ O ₃ + Mn ₂ O ₃ +Al ₂ O ₃	_____	_____	_____	_____
Alkali as sodium	_____	_____	_____	_____
Calcium	_____	_____	_____	_____
Magnesium	_____	_____	_____	_____
Iron (unfiltered)	_____	_____	_____	_____
Manganese	_____	_____	_____	_____
Nitrate	_____	_____	_____	_____
Fluoride	_____	_____	_____	_____
Chloride	_____	_____	_____	_____
Sulfate	_____	_____	_____	_____
Bicarbonate	_____	_____	_____	_____
Hardness (ppm)	_____	_____	_____	_____
Hardness (gpg)	_____	_____	_____	_____
Remarks	_____			

Laboratory data: _____ Sample storage location CEI-5

Sample range 10 - 385 No. spls. 76 No. dupls. & cond. 76 Poor

Spls. prepared by VLM Washed range 50-385 by VLM

Driller's log and cond. _____

Insoluble residues: Prepared by _____ Studied by _____ Strip log _____

Microscopic study Huntley strip log Aug 24, 1949

Gen. log _____ Correl. by _____