STATE OF MONTANA,
MUSSELSHELL COUNTY } ss.

FILED THIS 14 DAY OF
Sept A.D. 19 66
AT 4:35 O'CLOCK P.M.
Claude F. Fletcher
COUNTY RECORDER

DEPUTY

2.00

30

Form No. 18
8-60

T. 10 R. 27

County Musselshell

MONTANA BUREAU OF MINES AND GEOLOGY
Butte, Montana

RECEIVED
JAN 2 1962
STATE ENGINEER

Water Well Log

Owner B. E. Lackey Address Roundup

Driller McCornel Bros Address Roundup

Date Started Oct 10 1959 Date Completed Oct 15 1959

Location: Sec. 30 T. 10 R. 27 ¼ sec. NW Ky

Type of well drilled (Dug, driven, or drilled) Equipment used cable drill (Churn, drill, rotary, other)

Water use: Domestic ✓ Municipal ☐ Stock ☐ Irrigation ☐
Industrial ☐ Drainage ☐ Other

Casing: 0 ft. to 175 ft. Type gabo Size 6 in.

Casing: ft. to ft. Type Size

Casing: ft. to ft. Type Size

Perforated or screened: Ft. 115 to ft. 175. Ft. to ft.

Type of screen or perforations slotted

Static water level, for non-flowing well: 30 from Top feet.

Shut-in pressure, for flowing well: lb./sq. in. on: (date)

Pumping water level 30 feet at 20 gal. per min.

How tested: bailer at completion

Length of test 30 min to 1 hr.

Remarks: (Gravel packing, cementing, packers, type of shut-off, depth of shut-off)

(over)

Log of Well

Depth feet From	To	Description of Material Drilled
0	20	sand & clay
20	85	shale
85	110	sandy shale
110	113	shale
113	123	water sand
123	154	sand
154	172	water sand
172	175	sand shale bottom

32

T. 10 R. 27

County Musselshell

RECEIVED
OCT 5 1960
STATE ENGINEER

MONTANA BUREAU OF MINES AND GEOLOGY
Butte, Montana

WATER WELL LOG

Owner B. E. Lacey Address Roundup, Mont.

Driller P. L. Ferguson Address Roundup, Mont

Date Started Aug 18, 1958 Date Completed Aug 30 - 1958

Location: Sec. 32 T. 10 R. 27 ¼ sec. NW of S.E.

Type of well drilled (Dug, driven, bored, or drilled) Equipment used Churn drill (Churn drill, rotary, other)

Water use: Domestic ☐ Municipal ☐ Stock ☒ Irrigation ☐

Industrial ☐ Drainage ☐ Other:

Casing: 1 ft. to 108 ft. Type Galvanized Size 6"

Casing: ft. to ft. Type Size

Casing: ft. to ft. Type Size

Perforated or Screened: Ft. 134 to ft. 166 Ft. to ft.

Type of screen or perforations Slot

Static Water level, for non-flowing well: feet.

Shut-in pressure, for flowing well: lb./sq. in. on: (date)

Pumping water level feet at gal. per min.

How tested:

Length of test

Remarks: (Gravel packing, cementing, packers, type of shut-off, depth of shut-off)

(over)

Log of Well

Depth, feet From	Depth, feet To	Description of Material Drilled
0	5	surface
5	20	Sandy light shale
20	65	Buff Colored sandy shale
65	86	Dark. Carbonous shale
86	98	Sandy shale little H_2O
98	130	Buff Colored sand
130	134	Hard Gray shale
134	166	Gray shale - H_2O
166	168	Blue shale

32

Form No. 18
8-60

T. 10 R. 27

County Musselshell

MONTANA BUREAU OF MINES AND GEOLOGY
Butte, Montana

RECEIVED
JAN 2 1952
STATE ENGINEER

Water Well Log

Owner B. E. Lackey Address Roundup Mont

Driller P. J. Ferguson Address Roundup Mont

Date Started Aug 1, 1951 Date Completed Aug 10, 51

Location: Sec. 32 T. 10 R. 27 ¼ sec. S E.

Type of well drilled (Dug, driven, or drilled) Equipment used cable drill (Churn, drill, rotary, other)

Water use: Domestic [ ] Municipal [ ] Stock [X] Irrigation [ ]
Industrial [ ] Drainage [ ] Other

Casing: 0 ft. to 168 ft. Type galvanized Size 6 in

Casing: ft. to ft. Type Size

Casing: ft. to ft. Type Size

Perforated or screened: Ft. 156 to ft. 168. Ft. to ft.

Type of screen or perforations slotted

Static water level, for non-flowing well: 70 feet.

Shut-in pressure, for flowing well: lb./sq. in. on: (date)

Pumping water level 70 feet at 10 gal. per min.

How tested: bailer at completion

Length of test ½ to 1 hour

Remarks: (Gravel packing, cementing, packers, type of shut-off, depth of shut-off)

(over)

Log of Well

Depth feet From	To	Description of Material Drilled
0	5	surfacd soil
5	20	sandy light shale
20	65	buff colored sandy shale
65	86	dark carbonous shale
86	98	sandy shale little water
98	130	buff colored sand
130	134	hard shale grey
134	166	grey shale water
166	168	Blue shale

GROUNDWATER INDEX

County Musselshell Twp. 10N Rge. 28E

Sec.	Name of Appropriator	Type of Form	County File No.	Remarks
2	Goffena Louis	GW2	175222	
4	Goffena Ranch & Livestock Co	GW4	169808	
7	Hall, C.A.	GW4	169739	
9	" "	GW4	169740	
15	Goffena, L.W.	57L06		
15	Goffena Ranch	57L06		
18	" "	57L06	165056	
21	Goffena, Wesley	GW2	176698	
21	" " & Betty	GW4	169463	
23	Goffena, Wilbur	57L06	165057	
23	" "	GW4	169498	
32	Goffena, Wesley & Betty	GW4	169460	
?	Goffena Ranch	well log	—	

GW 2

Approved Stock Form—State Publishing Co., Helena, Montana—4232

File No.....

STATE WATER CONSERVATION BOARD

MAR 6 1967

T. 10 R. 28 2

County Musselshell

DUPLICATE

Billings ..... McDermott ..... STATE OF MONTANA
Butte ..... Miles ..... ADMINISTRATOR OF GROUNDWATER CODE
Conrad ..... Helena ..... OFFICE OF STATE ENGINEER
Darlington ..... Sullivan .....
Dickert .....

Notice of Completion of Groundwater Appropriation by Means of Well

DEVELOPED AFTER JANUARY 1, 1962

(Under Chapter 237, Montana Session Laws, 1961)

LOG

Top of Ground 0

(Elev. above sea level.....)

10' soil & gravel

300' shale

325 sandy shale

420 shale

(water)
440 sand

445 shale

Owner Louis Goffena Address Musselshell, Mont.

Driller Harry McConnell Address Roundup Mont.

Date of Notice of appropriation of groundwater.....

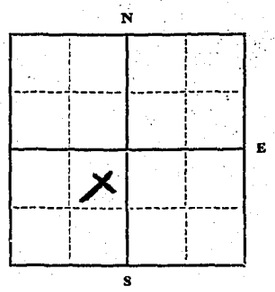
Date well started Dec 29, 1966 Date completed Jan 9, 1967

Type of well drilled (Dug, Driven, bored or drilled) Equipment used rotary (Churn drill, rotary or other)

Water use: Domestic ☐ Municipal ☐ Stock ☒ Irrigation ☐ Industrial ☐ Drainage ☐ Other ☐

Indicate on the diagram the character and thickness of the different strata met with in drilling, such as soil, clay, shale, gravel, rock or sand, etc. Show depth at which water is encountered, thickness and character of water-bearing strata and height to which the water rises in the well.

Size of Drilled Hole	Size and Weight of Casing	From (Feet)	To (Feet)	PERFORATIONS Kind Size	From (Feet)	To (Feet)
6 1/4"	4" I.D. 11#	0	420	none		



Static Water Level for non-flowing well .....feet.

Shut-in Pressure for Flowing Well.....

Pumping Water Level.....feet at.....gal. per minute.

Discharge in gal. per min. of flowing well 12

How Tested water

Length of Test 5 min

Remarks: (Gravel packing, cementing, packers, type of shutoff) 20 sk cement from 75' to top of ground rubber core catcher

NE 1/4 SW 1/4 Sec. 2 T. 10 R. 28

Indicate location of well and place of use, if possible. Each small square represents 40 acres.

at 418'

.....(Continue on reverse side)

USE—If used for irrigation, industrial, drainage or other. Explain, state number of acres and location or other data (i.e.: Lot, Block and Addition).

livestock

Show exact depth of bottom.

This form to be prepared by driller, and three copies to be filed by the owner with the County Clerk and Recorder in the county in which the well is located, tissue copy to be retained by driller.

Please answer all questions. If not applicable, so state, otherwise the form will be returned.

43
Driller's License Number

Harry McConnell
Driller's Signature

175222

STATE OF MONTANA }
MUSSELSHELL COUNTY. }

FILED THIS 22 DAY OF
Nov A. D. 19 67
AT 2:00 O'CLOCK P M.

CLAUDE F. FLETCHER
COUNTY RECORDER

Elaine
DEPUTY

GW 4

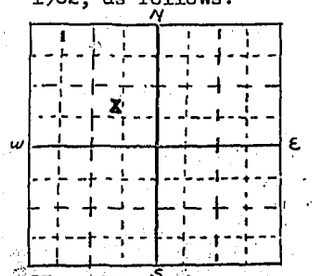
T. 10 N. R. 28 E.
County Musselshell

State of Montana
Administrator of groundwater Code
Office of State Engineer

RECEIVED
JAN 3 1964
STATE ENGINEER

DECLARATION OF VESTED GROUNDWATER RIGHTS
(Under Chapter 237, Montana Session Laws, 1961)

1. Goffena Ranch & Livestock Co., of Roundup
(Name of Appropriator) (Address) (Town)
County of Musselshell State of Montana
have appropriated groundwater according to the Montana laws in effect prior to January 1, 1962, as follows:



SE 1/4 NW 1/4 Sec. 4 T. 10 R. 28

Indicate point of appropriation and place of use, if possible. Each small square represents 10 acres.

2. The beneficial use on which the clain is based
Stock water

3. Date or approximate date of earliest beneficial use; and how continuous the use has been Before 1930, 3 months out of each year.

4. The amount of groundwater claimed (in miner's inches or gallons per minute) 5 gallons per minute

5. If used for irrigation, give the acreage and description of the lands to which water has been applied and name of the owner thereof

6. The means of withdrawing such water from the ground and the location of each well or other means of withdrawal
Pump with pump jack, powered with gasoline engine

7. The date of commencement and completion of the construction of the well, wells, or other works for withdrawal of ground water
Started before 1930 Completed before 1930

8. The depth of water table 42 feet

9. So far as it may be available, the type, size and depth of each well or the general specifications of any other works for the withdrawal of groundwal of groundwater
driven well with churn, Galvanized casing to 148 feet

10. The estimated amount of groundwater withdrawn each year 90,000 gallons

11. The log of formations encountered in the drilling of each well if available
The well starts in Fox hill sands and bottoms in the Bear paw shale.

12. Such other information of a similar nature as may be useful in carrying out the policy of this act, including reference to book and page of any count record

Signature of Owner Goffena Ranch & Livestock Co.
By [signature]
Date December 31, 1963

20652

169808

STATE OF MONTANA, }ss.
MUSSELSHELL COUNTY.

FILED THIS 31 DAY OF
Dec A. D. 19 63
AT 6:20 O'CLOCK P M.

N. E. MATZKE
COUNTY RECORDER

Frances L. Dawson
DEPUTY

GW

Approved Stock Form—State Publishing Co., Helena, Montana—42234

File No.

T. 10N R. 28E

DUPLICATE

County Musselshell

RECEIVED JAN 3 1964 STATE ENGINEER

STATE OF MONTANA
ADMINISTRATOR OF GROUNDWATER CODE
OFFICE OF STATE ENGINEER

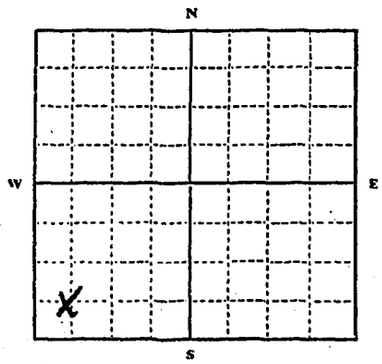
Declaration of Vested Groundwater Rights

(Under Chapter 237, Montana Session Laws, 1961)

1. C. H. Hall (Name of Appropriator), of Roundup (Address) (Town)

County of Musselshell State of Montana

have appropriated groundwater according to the Montana laws in effect prior to January 1, 1962, as follows:



SW ¼ SW ¼ Sec. 7 T 10 R 28

Indicate point of appropriation and place of use, if possible. Each small square represents 10 acres.

2. The beneficial use on which the claim is based: Stockwater

3. Date or approximate date of earliest beneficial use; and how continuous the use has been: 6-1-50 - continuous

4. The amount of groundwater claimed (in miner's inches or gallons per minute): 25 gal/min

5. If used for irrigation, give the acreage and description of the lands to which water has been applied and name of the owner thereof:

6. The means of withdrawing such water from the ground and the location of each well or other means of withdrawal: pump jack & mtr.

7. The date of commencement and completion of the construction of the well, wells, or other works for withdrawal of groundwater: 5-1-50 to 6-1-50

8. The depth of water table: 50'

9. So far as it may be available, the type, size and depth of each well or the general specifications of any other works for the withdrawal of groundwater:

250' Well - 6" Casing

10. The estimated amount of groundwater withdrawn each year: 2,000,000 gal.

11. The log of formations encountered in the drilling of each well if available:

Unknown

12. Such other information of a similar nature as may be useful in carrying out the policy of this act, including reference to book and page of any county record: None

Signature of Owner: C. H. Hall

Date: Dec. 31, 1963

Three copies to be filed by the owner with the County Clerk and Recorder of the county in which the well is located.

Please answer all questions. If not applicable, so state, otherwise the form will be returned.

Original to the County Clerk and Recorder; Duplicate to the State Engineer; Triplicate to the Montana Bureau of Mines and Geology, and Quadruplicate for the Appropriator.

20583

169739

STATE OF MONTANA,
MUSSELSHELL COUNTY. } ss.

FILED THIS 31 DAY OF
December A. D. 19 63
AT 4:00 O'CLOCK P M.

[redacted] MATZKE
COUNTY RECORDER

Frances L Dawson
DEPUTY

2 00

GW 4

Approved Stock Form—State Publishing Co., Helena, Montana—42234

File No.

T 10 N R 28 E

DUPLICATE

County Musselshell

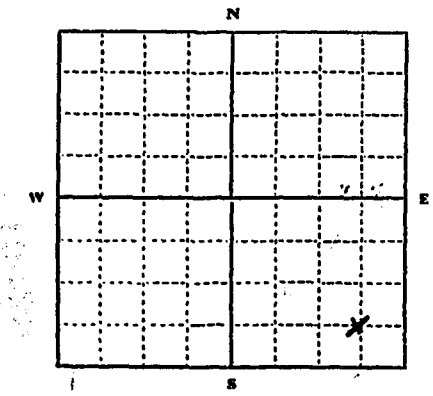
RECEIVED JAN 3 1964 STATE ENGINEER

STATE OF MONTANA
ADMINISTRATOR OF GROUNDWATER CODE
OFFICE OF STATE ENGINEER

Declaration of Vested Groundwater Rights

(Under Chapter 237, Montana Session Laws, 1961)

1. C. H. Hall (Name of Appropriator), of Roundup (Address) (Town)
County of Musselshell State of Montana
have appropriated groundwater according to the Montana laws in effect prior to January 1, 1962, as follows:



SE 1/4 SE 1/4 Sec. 9 T 10 R 28

Indicate point of appropriation and place of use, if possible. Each small square represents 10 acres.

2. The beneficial use on which the claim is based: Stockwater

3. Date or approximate date of earliest beneficial use; and how continuous the use has been: 8-1-1958 - Continuous

4. The amount of groundwater claimed (in miner's inches or gallons per minute): 15 gal/min.

5. If used for irrigation, give the acreage and description of the lands to which water has been applied and name of the owner thereof

6. The means of withdrawing such water from the ground and the location of each well or other means of withdrawal: Artesian well

7. The date of commencement and completion of the construction of the well, wells, or other works for withdrawal of groundwater: 7-15-58 to 8-1-58

8. The depth of water table: 400' well - Artesian flow to surface

9. So far as it may be available, the type, size and depth of each well or the general specifications of any other works for the withdrawal of groundwater: 400' well - 6" casing

10. The estimated amount of groundwater withdrawn each year: 5,000,000 gallons

11. The log of formations encountered in the drilling of each well if available: unknown

12. Such other information of a similar nature as may be useful in carrying out the policy of this act, including reference to book and page of any county record: None

Signature of Owner: C. H. Hall

Date: Dec. 31, 1963

Three copies to be filed by the owner with the County Clerk and Recorder of the county in which the well is located.

Please answer all questions. If not applicable, so state, otherwise the form will be returned.

Original to the County Clerk and Recorder; Duplicate to the State Engineer; Triplicate to the Montana Bureau of Mines and Geology, and Quadruplicate for the Appropriator.

20584

169740

STATE OF MONTANA, }
MUSSELSHELL COUNTY. } ss.

FILED THIS 31 DAY OF

December A. D. 1963

AT 4:02 O'CLOCK P M.

N. E. MATZKE

COUNTY RECORDER

Frances L. Dawson

DEPUTY

2.00

15

Form No. 18
8-60

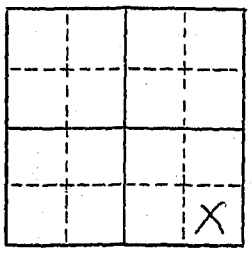
T. 10 R. 28

County Musselshell

MONTANA BUREAU OF MINES AND GEOLOGY
Butte, Montana

RECEIVED
JAN 2 1962
STATE ENGINEER

Water Well Log



Owner L. W. Coffera Address Roundup

Driller R. L. Ferguson Address Roundup

Date Started May 24, 1958 Date Completed June 4, 1958

Location: Sec. 15 T. 10 R. 28 ¼ sec. S.E. of S.E.

Type of well driven (Dug, driven, or drilled) Equipment used churn (Churn, drill, rotary, other)

Water use: Domestic [ ] Municipal [ ] Stock [X] Irrigation [ ]
Industrial [ ] Drainage [ ] Other

Casing: 0 ft. to 180 ft. Type Galvanized Size 6"

Casing: ft. to ft. Type Size

Casing: ft. to ft. Type Size

Perforated or screened: Ft. 150 to ft. 175. Ft. to ft.

Type of screen or perforations slots

Static water level, for non-flowing well: 34 feet.

Shut-in pressure, for flowing well: — lb./sq. in. on: — (date)

Pumping water level 170 feet at 6 gal. per min.

How tested: Bailing

Length of test one hour

Remarks: (Gravel packing, cementing, packers, type of shut-off, depth of shut-off)

(over)

Log of Well

Depth feet From	To	Description of Material Drilled
0	4	Surface soil
4	12	Hard. iron-colored sand
12	34	dark, sticky shale
34	85	light-grey, sandy shale - 1 gal. water per minute
85	138	grey shale with bentonite
138	160	sand - medium grain - dry
160	175	porous sand - water 5 gal. per min.
175	180	shale

15

T. 10 R. 28

County Musselshell

RECEIVED
AUG 15 1958
STATE ENGINEER

MONTANA BUREAU OF MINES AND GEOLOGY
Butte, Montana

WATER WELL LOG

		x	

Owner: Coffena Ranch Address: Roundup, Mont

Driller: P. L. Ferguson Address: Roundup, Mont

Date Started: 6-5-58 Date Completed: 6-12-58

Location: Sec SE¼ 15 T. [redacted] R. [redacted] ¼ sec. 28E

Type of well: Drilled (Dug, driven, bored, or drilled) Equipment used: Churn drill (Churn drill, rotary, other)

Water use: Domestic [ ] Municipal [ ] Stock [x] Irrigation [ ]

Industrial [ ] Drainage [ ] Other:

Casing: 1 ft. to 180 ft. Type: light six in. Size: Galvanized

Casing: ft. to ft. Type: Size:

Casing: ft. to ft. Type: Size:

Perforated or Screened: Ft. 45 to ft. 65 Ft. 145 to ft. 175

Type of screen or perforations: slot perforations

Static Water level, for non-flowing well: 95 feet below surface feet.

Shut-in pressure, for flowing well: lb./sq. in. on: (date)

Pumping water level: 160 feet at 5 gal. per min.

How tested: bailing

Length of test: 90 min

Remarks: (Gravel packing, cementing, packers, type of shut-off, depth of shut-off)

(over)

Log of Well

Depth, feet From	Depth, feet To	Description of Material Drilled
0	4	surface soil
4	12	hard iron colored sand
12	34	Dark sticky shale
34	85	Light gray shale 1 gal per minute
85	138	Gray shale witvh bentonite
138	160	Sand medium gray dry
160	175	Porous sand water 5 gal per minute
175	180	Shale

18

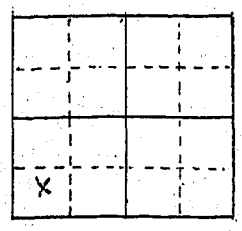
Form No. 18
8-60

T. 10 R. 28

County Musselshell

MONTANA BUREAU OF MINES AND GEOLOGY
Butte, Montana

WATER WELL LOG



Owner Goffena Ranch & Livestock Co. Address Roundup, Montana

Driller Miles Jackson Address

Date Started Jan. 1961 Date Completed April 1, 1961

Location: Sec. 18 T. 10 R. 28 ¼ sec. SW¼

Type of well Drilled (Dug, driven, bored, or drilled) Equipment used standard oil rig (Churn, drill, rotary, other)

Water use: Domestic ☐ Municipal ☐ Stock ☒ Irrigation ☐
Industrial ☐ Drainage ☐ Other

Casing: 0 ft. to 150 ft. Type heavy Size 8-5/8

Casing: 0 ft. to 720 ft. Type Heavy 14# Size 5½

Casing: ft. to ft. Type Size

Perforated or Screened: Ft. to ft. . Ft. to ft.

Type of screen or perforations slits in casing

Static Water level, for non-flowing well: feet.

Shut-in pressure, for flowing well: 42 lb./sq. in. on: June 1961 (date)

Pumping water level feet at 4½ gal. per min.

How tested: rail & watch

Length of test one minute

Remarks: (Gravel packing, cementing, packers, type of shut-off, depth of shut-off)

0-150 ft. cemented off - 400 to 500 ft cemented again

(over)

Log of Well

Depth, feet From	Depth, feet To	Description of Material Drilled
0	180	sand and shale of Judith River
180	690	Claggert shale
690	770	upper Eagle

STATE OF MONTANA,
MUSSELSHELL COUNTY } ss.
FILED THIS 30 DAY OF
[illegible] A. D. 19 61
AT 10 40 O'CLOCK A. M.
R. H. MATZKE
COUNTY RECORDER
[illegible]
DEPUTY

165056

GW 2

Approved Stock Form—State Publishing Co., Helena, Montana—45642

21

File No.....

MONTANA WATER RESOURCES BOARD
RECEIVED
APR 5 1968

T. 10 R. 28

DUPLICATE

County Musselshell

STATE OF MONTANA
ADMINISTRATOR OF GROUNDWATER CODE
OFFICE OF STATE ENGINEER

Notice of Completion of Groundwater Appropriation by Means of Well

DEVELOPED AFTER JANUARY 1, 1962

(Under Chapter 237, Montana Session Laws, 1961)

LOG

~~Top of Ground~~ 0'

(Elev. above sea level.....)

35' shale

50' sand

shale & streaks of

115 muddy sand

173 shale

185 sand

690' shale

no water

735 sand (muddy)

800' shale

820' sand (water)

830' shale

Show exact depth of bottom.

Owner Wesley Goffena Address Delphia Mont.

Driller Harley McConnell Address Roundup Mont

Date of Notice of appropriation of groundwater.....

Date well started Dec 19, 1967 Date completed March 1, 1968

Type of well drilled (Dug, driven, bored or drilled) Equipment used Churn drill (Churn drill, rotary or other)

Water use: Domestic ☐ Municipal ☐ Stock ☒ Irrigation ☐ Industrial ☐ Drainage ☐ Other ☐

Indicate on the diagram the character and thickness of the different strata met with in drilling, such as soil, clay, shale, gravel, rock or sand, etc. Show depth at which water is encountered, thickness and character of water-bearing strata and height to which the water rises in the well.

Size of Drilled Hole	Size and Weight of Casing	From (Feet)	To (Feet)	PERFORATIONS Kind Size	From (Feet)	To (Feet)
6"	4" 11 #	0	580'	none		
4"	2 7/8" 7 #	554	830	16" slots	800'	820'

N

W E

S

NE-SE 1/4 Sec. 21 T. 10 R. 28

Indicate location of well and place of use, if possible. Each small square represents 40 acres.

Static Water Level for non-flowing well 0 feet.

Shut-in Pressure for Flowing Well.....

Pumping Water Level 220 feet at 9 gal. per minute.

Discharge in gal. per min. of flowing well .....

How Tested bailer

Length of Test 8 hrs.

Remarks: (Gravel packing, cementing, packers, type of shutoff) 4" Casing cemented from 200' to 40' with 30 sx number packer at 800 ft.

.....(Continue on reverse side)

USE—If used for irrigation, industrial, drainage or other. Explain, state number of acres and location or other data (i.e.: Lot, Block and Addition).

livestock

This form to be prepared by driller, and three copies to be filed by the owner with the County Clerk and Recorder in the county in which the well is located, tissue copy to be retained by driller.

Please answer all questions. If not applicable, so state, otherwise the form will be returned.

43
Driller's License Number

Harvey McConnell
Driller's Signature.

44,033

176698

STATE OF MONTANA, } ss.
MUSSELSHELL COUNTY.

FILED THIS 4 DAY OF
April A. D. 19 68
AT 4:15 O'CLOCK P M.
Claude F. Fletcher
COUNTY RECORDER
202
DEPUTY

GW 4

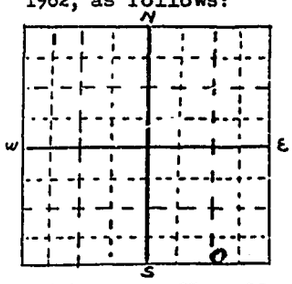
T. 10 N R. 28 E
County: Musselshell

State of Montana
Administrator of groundwater Code
Office of State Engineer

RECEIVED
DEC 30 1963
STATE ENGINEER

DECLARATION OF VESTED GROUNDWATER RIGHTS
(Under Chapter 237, Montana Session Laws, 1961)

1. Wesley and Betty Coffene, of Delphia, Montana
(Name of Appropriator) (Address) (Town)
County of Musselshell State of Montana
have appropriated groundwater according to the Montana laws in effect prior to January 1, 1962, as follows:



SW.¼ Sec. 21 T. 10 R. 28

Indicate point of appropriation and place of use, if possible. Each small square represents 10 acres.

2. The beneficial use on which the claim is based
Stock Water

3. Date or approximate date of earliest beneficial use; and how continuous the use has been May 10, 1951

4. The amount of groundwater claimed (in miner's inches or gallons per minute) 5 gallons per minute

5. If used for irrigation, give the acreage and description of the lands to which water has been applied and name of the owner thereof. Not used for irrigation

6. The means of withdrawing such water from the ground and the location of each well or other means of withdrawal
Cylinder pump

7. The date of commencement and completion of the construction of the well, wells, or other works for withdrawal of ground water
May 10, 1951 it was commenced and completed on Sept. 15, 1951

8. The depth of water table 150 feet

9. So far as it may be available, the type, size and depth of each well or the general specifications of any other works for the withdrawal of groundwal of groundwater
Drilled well 6 inch casing and depth of 225 feet

10. The estimated amount of groundwater withdrawn each year. Several thousand gallons

11. The log of formations encountered in the drilling of each well if available
Log not available

12. Such other information of a similar nature as may be useful in carrying out the policy of this act, including reference to book and page of any count record
None recorded and no other information that we know of.

Signature of Owner Betty Coffene

Date Dec. 27, 1963

r5360

169463

STATE OF MONTANA.
MISSOULA COUNTY. } ss.

FILED THIS 27 DAY OF
Dec A. D. 1963
at 3:36 O'CLOCK P M.
A. H. MATZKE
COUNTY RECORDER
Frances L. Dawson
DEPUTY
2.00

23

Form No. 18
8-60

T. 10 R. 28

County Musselshell

MONTANA BUREAU OF MINES AND GEOLOGY
Butte, Montana

WATER WELL LOG

		X

Owner Silbur Goffena Address Roundup, Montana

Driller ACC - Barker Address

Date Started Nov. Date Completed Dec. 1960

Location: Sec. 23 T. 10 R. 28 ¼ sec. NE¼

Type of well drilled (Dug, driven, bored, or drilled) Equipment used standard oil rig (Churn, drill, rotary, other)

Water use: Domestic ☐ Municipal ☐ Stock ☒ Irrigation ☐

Industrial ☐ Drainage ☐ Other

Casing: 0 ft. to 100 ft. Type Heavy Size 8-5/8

Casing: 0 ft. to 860 ft. Type heavy 14# Size 5¾

Casing: ft. to ft. Type Size

Perforated or Screened: Ft. to ft. . Ft. to ft.

Type of screen or perforations slits in casing

Static Water level, for non-flowing well: feet.

Shut-in pressure, for flowing well: 36 lb./sq. in. on: (date)

Pumping water level feet at 2 gal. per min.

How tested: 5 gal pail & watch

Length of test 2 minutes

Remarks: (Gravel packing, cementing, packers, type of shut-off, depth of shut-off)

0 - 100 ft. cement

(over)

Log of Well

Depth, feet From	Depth, feet To	Description of Material Drilled
0	720	sand & shale of Judith River & Claggett
720	860	sand & shale of Eagle

STATE OF MONTANA, }ss.
MUSSELSHELL COUNTY, }
FILED THIS [illegible] DAY OF [illegible] A. D. [illegible]
AT [illegible] O'CLOCK [illegible] M.
B. H. MATZKE
COUNTY RECORDER.
[illegible]
DEPUTY

16-057

GV

Approved Stock Form—State Publishing Co., Helena, Montana—41921

File No.

T. 10 N R. 28 E

DUPLICATE

County Musselshell

Section No. 23

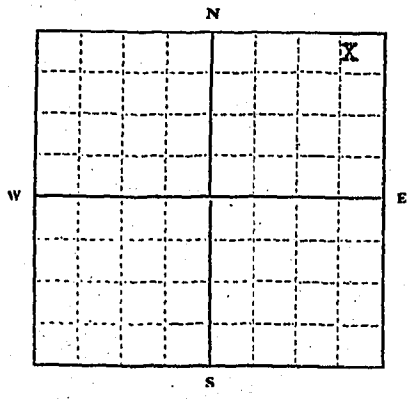
STATE OF MONTANA
ADMINISTRATOR OF GROUNDWATER CODE
OFFICE OF STATE ENGINEER

RECEIVED
JAN 2 1964
STATE ENGINEER

Declaration of Vested Groundwater Rights

(Under Chapter 237, Montana Session Laws, 1961)

1. Wilbur V. Goffena (Name of Appropriator), of Box 8 (Address) Roundup (Town)
County of Musselshell State of Montana
have appropriated groundwater according to the Montana laws in effect prior to January 1, 1962, as follows:



NE ¼ NE¼ Sec. 23 T. 10 R. 28

Indicate point of appropriation and place of use, if possible. Each small square represents 10 acres.

2. The beneficial use on which the claim is based is livestock water

3. Date or approximate date of earliest beneficial use; and how continuous the use has been since December, 1960

4. The amount of groundwater claimed (in miner's inches or gallons per minute) is 2 gallons per minute

5. If used for irrigation, give the acreage and description of the lands to which water has been applied and name of the owner thereof

6. The means of withdrawing such water from the ground and the location of each well or other means of withdrawal is flowing water

7. The date of commencement and completion of the construction of the well, wells, or other works for withdrawal of groundwater is December, 1960

8. The depth of water table is 690 feet

9. So far as it may be available, the type, size and depth of each well or the general specifications of any other works for the withdrawal of groundwater is a 6 inch casing and depth is 690 feet

10. The estimated amount of groundwater withdrawn each year ~~1,680,000~~ 1,179,350 gallons

11. The log of formations encountered in the drilling of each well if available none

12. Such other information of a similar nature as may be useful in carrying out the policy of this act, including reference to book and page of any county record

Signature of Owner Wilbur V. Goffena

Date December 29, 1963

Three copies to be filed by the owner with the County Clerk and Recorder of the county in which the well is located.

Please answer all questions. If not applicable, so state, otherwise the form will be returned.

Original to the County Clerk and Recorder; Duplicate to the State Engineer; Triplicate to the Montana Bureau of Mines and Geology, and Quadruplicate for the Appropriator.

17749

224 160408

STATE OF MONTANA,
MUSSELSHELL COUNTY, } ss.

FILED THIS 30 DAY OF
Dec A. D. 19 63
AT 12:09 O'CLOCK P M.

R. H. MATZKE
COUNTY RECORDER

Frances L. Dawson
DEPUTY

2.00

G -Helena Independent Record

File No.....

T. 10 N R. 28 E 32

DUPLICATE

County Musselshell

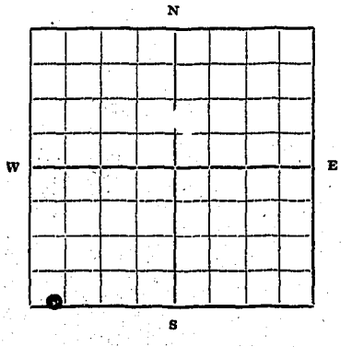
STATE OF MONTANA
ADMINISTRATOR OF GROUNDWATER CODE
OFFICE OF STATE ENGINEER

RECEIVED
DEC 30 1963
STATE ENGINEER

Declaration of Vested Groundwater Rights

(Under Chapter 237, Montana Session Laws, 1961)

1. Wesley and Betty Goffena, of Delphia Montana
(Name of Appropriator) (Address) (Town)
County of Musselshell State of Montana
have appropriated groundwater according to the Montana laws in effect prior to January 1, 1962, as follows:



SW ¼ Sec. 32 T. 10 R. 28

Indicate point of appropriation and place of use, if possible. Each small square represents 10 acres.

2. The beneficial use on which the claim is based
Stock water

3. Date or approximate date of earliest beneficial use; and how continuous the use has been
Before 1910 with intermittent use since

4. The amount of groundwater claimed (in miner's inches or gallons per minute) About 6 gallons per minute

5. If used for irrigation, give the acreage and description of the lands to which water has been applied and name of the owner thereof
Not used for irrigation.

6. The means of withdrawing such water from the ground and the location of each well or other means of withdrawal
Cylinder pump

7. The date of commencement and completion of the construction of the well, wells, or other works for withdrawal of groundwater
Information on the well unknown.

8. The depth of water table 44 feet

9. So far as it may be available, the type, size and depth of each well or the general specifications of any other works for the withdrawal of groundwater
drilled, eight inch casing and depth of 90 feet

10. The estimated amount of groundwater withdrawn each year average of several thousand gallons

11. The log of formations encountered in the drilling of each well if available Log not available

12. Such other information of a similar nature as may be useful in carrying out the policy of this act, including reference to book and page of any county record
None that we know of.

Signature of Owner Betty Goffena

Date Dec. 27, 1963

Three copies to be filed by the owner with the County Clerk and Recorder of the county in which the well is located.

Please answer all questions. If not applicable, so state, otherwise the form will be returned.

Original to the County Clerk and Recorder; duplicate to the State Engineer; Triplicate to the Montana Bureau of Mines and Geology and Quadruplicate for the Appropriator.

15357

169460

STATE OF MONTANA,
MUSSELSHELL COUNTY. } SS.

THIS _____ DAY OF

_____ A. D. 19____

_____ O'CLOCK ____ M.

_____
COUNTY RECORDER

_____
DEPUTY

STATE OF MONTANA,
MUSSELSHELL COUNTY. } SS.

FILED THIS 27 DAY OF

dec A. D. 19 63

AT 3:33 O'CLOCK P M.

R. H. MATZKE

COUNTY RECORDER

Frances L Dawson
DEPUTY

2.00

RECEIVED
OCT 5 1960
STATE ENGINEER

T. 10 R. 28
County Musselshell

MONTANA BUREAU OF MINES AND GEOLOGY
Butte, Montana

WATER WELL LOG

Owner Koppena Ranch Address Roundup, Mont
Driller P. L. Ferguson Address Roundup, Mont.
Date Started May 24, 1958 Date Completed June 1, 1958
Location: Sec. ..... T. ..... R. ..... ¼ sec. .....

Type of well drilled (Dug, driven, bored, or drilled) Equipment used Churn drill (Churn drill, rotary, other)

Water use: Domestic [ ] Municipal [ ] Stock [X] Irrigation [ ]
Industrial [ ] Drainage [ ] Other: .....

Casing: 1 ft. to 180 ft. Type galvanized Size 6"
Casing: ..... ft. to ..... ft. Type ..... Size .....
Casing: ..... ft. to ..... ft. Type ..... Size .....
Perforated or Screened: Ft. 35 to ft. 85 Ft. 160 to ft. 175
Type of screen or perforations slot
Static Water level, for non-flowing well: ..... feet.
Shut-in pressure, for flowing well: 130 lb./sq. in. on: ..... (date)
Pumping water level 50 feet at 6 gal. per min.
How tested: bailing
Length of test 1 hr.

Remarks: (Gravel packing, cementing, packers, type of shut-off, depth of shut-off)

(over)

Log of Well

Depth, feet From	Depth, feet To	Description of Material Drilled Judith River
0	4	surface soil
4	12	Hard sand
12	34	Dark sticky shale
34	85	Light Grey sandy shale H_2O 1 gal per Min.
85	138	Grey shale with bentonite
138	160	Sand Med. grain dry
160	175	Porous sand H_2O 5 gal. per Min
175	180	Shale

GROUNDWATER INDEX

County Musselshell Twp. 10N Rge. 29E

Sec.	Name of Appropriator	Type of Form	County File No.	Remarks
17	H&H Ranch Co.	GW4	169490	
17	" " "	GW4	169491	
22	" " "	GW4	169488	
23	" " "	GW4	169489	

G\

Approved Stock Form—State Publishing Co., Helena, Montana—42234 3 17

File No.....

T. 10 N R. 29 E

DUPLICATE

County Musselshell

F.W.

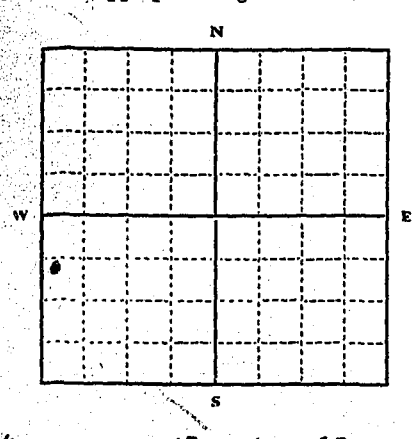
STATE OF MONTANA
ADMINISTRATOR OF GROUNDWATER CODE
OFFICE OF STATE ENGINEER

RECEIVED
JAN 2 1964
STATE ENGINEER

Declaration of Vested Groundwater Rights

(Under Chapter 237, Montana Session Laws, 1961)

1. Hank H. Rauch et, of Melstone
(Name of Appropriator) (Address) (Town)
County of Musselshell State of Mont
have appropriated groundwater according to the Montana laws in effect prior to January 1, 1962, as follows:



SW 1/4 Sec. 17 T. 10 R. 29

Indicate point of appropriation and place of use, if possible. Each small square represents 10 acres.

2. The beneficial use on which the claim is based
Stock Water

3. Date or approximate date of earliest beneficial use; and how continuous the use has been
6-1-48
Flowing well

4. The amount of groundwater claimed (in miner's inches or gallons per minute) 5 gallons

5. If used for irrigation, give the acreage and description of the lands to which water has been applied and name of the owner thereof

6. The means of withdrawing such water from the ground and the location of each well or other means of withdrawal
Flows

7. The date of commencement and completion of the construction of the well, wells, or other works for withdrawal of groundwater

8. The depth of water table 850 ft

9. So far as it may be available, the type, size and depth of each well or the general specifications of any other works for the withdrawal of groundwater

10. The estimated amount of groundwater withdrawn each year 2,624,000

11. The log of formations encountered in the drilling of each well if available This well was drilled for oil and abandoned - we completed it as a water well - it flows 5 gallons a minute from a depth of 850 ft.

12. Such other information of a similar nature as may be useful in carrying out the policy of this act, including reference to book and page of any county record

Signature of Owner Hank H. Rauch et
J Hank Hoyer

Date

Three copies to be filed by the owner with the County Clerk and Recorder of the county in which the well is located.

Please answer all questions. If not applicable, so state, otherwise the form will be returned.

Original to the County Clerk and Recorder; Duplicate to the State Engineer; Triplicate to the Montana Bureau of Mines and Geology, and Quadruplicate for the Appropriator.

17741

169490

STATE OF MONTANA,
MUSSELSHELL COUNTY. } ss.

FILED THIS 30 DAY OF
Dec A. D. 1963
AT 11:53 O'CLOCK a M.

B. H. MATZKE
COUNTY RECORDER

Frances L. Dawson
DEPUTY

2. 00

GW

Approved Stock Form—State Publishing Co., Helena, Montana—42234 17

File No.....

T. 10 N R. 29 E

DUPLICATE

County. Musselshell

STATE OF MONTANA
ADMINISTRATOR OF GROUNDWATER CODE
OFFICE OF STATE ENGINEER

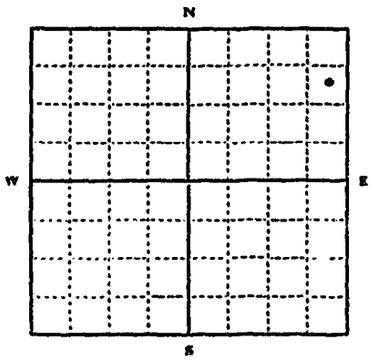
RECEIVED
JAN 2 1964
STATE ENGINEER

Declaration of Vested Groundwater Rights

(Under Chapter 237, Montana Session Laws, 1961)

1. Hoe H. Rand Co, of Melstone
(Name of Appropriator) (Address) (Town)

County of Musselshell State of Montana
have appropriated groundwater according to the Montana laws in effect prior to January 1, 1962, as follows:



NW ¼ Sec. 17 T. 10 R. 29

Indicate point of appropriation and place of use, if possible. Each small square represents 10 acres.

2. The beneficial use on which the claim is based. Stock water

3. Date or approximate date of earliest beneficial use; and how continuous the use has been. Aug 15 - 1960

4. The amount of groundwater claimed (in miner's inches or gallons per minute). 1½ gallons per minute

5. If used for irrigation, give the acreage and description of the lands to which water has been applied and name of the owner thereof

6. The means of withdrawing such water from the ground and the location of each well or other means of withdrawal. Flows

7. The date of commencement and completion of the construction of the well, wells, or other works for withdrawal of groundwater

8. The depth of water table. 850 ft

9. So far as it may be available, the type, size and depth of each well or the general specifications of any other works for the withdrawal of groundwater

10. The estimated amount of groundwater withdrawn each year. 688 400 gallons

11. The log of formations encountered in the drilling of each well if available. This well was drilled by an oil co and abandoned. We completed it as a water well.

12. Such other information of a similar nature as may be useful in carrying out the policy of this act, including reference to book and page of any county record

Signature of Owner. Hoe H. Rand Co
B Harold Hoyer

Date. 12-30-63

Three copies to be filed by the owner with the County Clerk and Recorder of the county in which the well is located.

Please answer all questions. If not applicable, so state, otherwise the form will be returned.

Original to the County Clerk and Recorder; Duplicate to the State Engineer; Triplicate to the Montana Bureau of Mines and Geology, and Quadruplicate for the Appropriator.

17942

169491

STATE OF MONTANA,
MUSSELSHELL COUNTY. } ss.

FILED THIS 30 DAY OF
dec A. D. 19 63
AT 11:55 O'CLOCK a M.

E. H. MATZKE
COUNTY RECORDER

Frances L. Dawson
DEPUTY

2.00

GW

Approved Stock Form—State Publishing Co., Helena, Montana—42234

22

File No.....

T. 10 N R. 29 E

DUPLICATE

County Musselshell

STATE OF MONTANA
ADMINISTRATOR OF GROUNDWATER CODE
OFFICE OF STATE ENGINEER

RECEIVED
JAN 2 1964
STATE ENGINEER

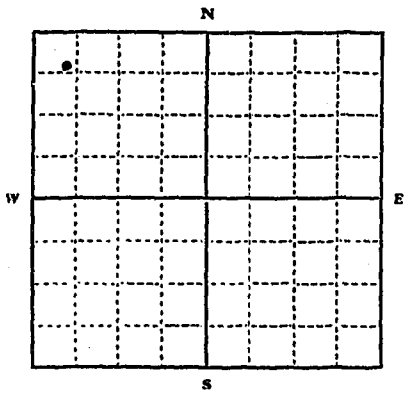
Declaration of Vested Groundwater Rights

(Under Chapter 237, Montana Session Laws, 1961)

1. H. and H. Rauch Co, of Melstone
(Name of Appropriator) (Address) (Town)

County of Musselshell State of Montana

have appropriated groundwater according to the Montana laws in effect prior to January 1, 1962, as follows:



NW¼ Sec. 22 T. 10 R. 29

Indicate point of appropriation and place of use, if possible. Each small square represents 10 acres.

2. The beneficial use on which the claim is based Stock water

3. Date or approximate date of earliest beneficial use; and how continuous the use has been June - 1948

4. The amount of groundwater claimed (in miner's inches or gallons per minute) 15 gallons per minute

5. If used for irrigation, give the acreage and description of the lands to which water has been applied and name of the owner thereof

6. The means of withdrawing such water from the ground and the location of each well or other means of withdrawal Artesian Submersible pump

7. The date of commencement and completion of the construction of the well, wells, or other works for withdrawal of groundwater

8. The depth of water table 120 ft

9. So far as it may be available, the type, size and depth of each well or the general specifications of any other works for the withdrawal of groundwater

10. The estimated amount of groundwater withdrawn each year 50,000 gal yearly

11. The log of formations encountered in the drilling of each well if available

12. Such other information of a similar nature as may be useful in carrying out the policy of this act, including reference to book and page of any county record

Signature of Owner H. and H. Rauch Co
By Henry Hoy
Date 12-30-63

Three copies to be filed by the owner with the County Clerk and Recorder of the county in which the well is located.

Please answer all questions. If not applicable, so state, otherwise the form will be returned.

Original to the County Clerk and Recorder; Duplicate to the State Engineer; Triplicate to the Montana Bureau of Mines and Geology, and Quadruplicate for the Appropriator.

17739

169488

STATE OF MONTANA,
MUSSELSHELL COUNTY. } ss.

FILED THIS 30 DAY OF
Dec A. D. 1963
AT 11:49 O'CLOCK 9 M.

B. H. MATZKE
COUNTY RECORDER

Frances L. Dawson
DEPUTY

2. ok

GW

Approved Stock Form—State Publishing Co., Helena, Montana—42234

23

File No.....

T. 10 N R. 29 E

DUPLICATE

County Musselshell

STATE OF MONTANA
ADMINISTRATOR OF GROUNDWATER CODE
OFFICE OF STATE ENGINEER

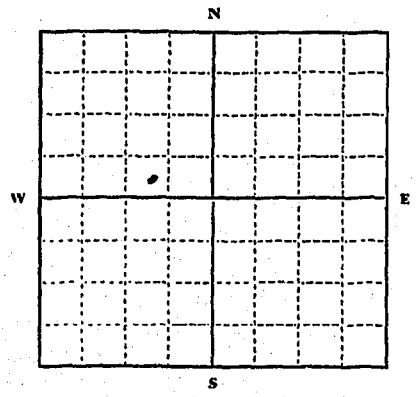
RECEIVED
JAN 2 1964
STATE ENGINEER

Declaration of Vested Groundwater Rights

(Under Chapter 237, Montana Session Laws, 1961)

1. Hans H. Ranch Co, of Melstone
(Name of Appropriator) (Address)

County of Musselshell State of Montana
have appropriated groundwater according to the Montana laws in effect prior to January 1, 1962, as follows:



NW ¼ Sec. 23 T. 10 R. 29

Indicate point of appropriation and place of use, if possible. Each small square represents 10 acres.

2. The beneficial use on which the claim is based Stock Water June - 1948

3. Date or approximate date of earliest beneficial use; and how continuous the use has been June 1948
Each summer since 1948

4. The amount of groundwater claimed (in miner's inches or gallons per minute) 10 gallons per minute

5. If used for irrigation, give the acreage and description of the lands to which water has been applied and name of the owner thereof

6. The means of withdrawing such water from the ground and the location of each well or other means of withdrawal Electric pump

7. The date of commencement and completion of the construction of the well, wells, or other works for withdrawal of groundwater

8. The depth of water table About 120 ft.

9. So far as it may be available, the type, size and depth of each well or the general specifications of any other works for the withdrawal of groundwater

10. The estimated amount of groundwater withdrawn each year 60,000 per year

11. The log of formations encountered in the drilling of each well if available

12. Such other information of a similar nature as may be useful in carrying out the policy of this act, including reference to book and page of any county record

Signature of Owner Hans H. Ranch Co
By Harold Hoyer

Date 12-30-63

Three copies to be filed by the owner with the County Clerk and Recorder of the county in which the well is located.

Please answer all questions. If not applicable, so state, otherwise the form will be returned.

Original to the County Clerk and Recorder; Duplicate to the State Engineer; Triplicate to the Montana Bureau of Mines and Geology, and Quadruplicate for the Appropriator.

17740

169489

STATE OF MONTANA,
MUSSELSHELL COUNTY. } ss.

FILED THIS 30 DAY OF
Dec A. D. 1963
AT 11:51 O'CLOCK A M.

B. H. MATZKE
COUNTY RECORDER

Frances L. Dawson
DEPUTY

2.00

GROUNDWATER INDEX

County Musselshell Twp. 10N Rge. 30E

Sec.	Name of Appropriator	Type of Form	County File No.	Remarks
7	H & H Ranch Co.	8W4	169487	
36	Hougan, Harold	8W4	169496	

GV.

Approved Stock Form—State Publishing Co., Helena, Montana—42234

File No.

T. 10 N R. 30 E

DUPLICATE

County Musselshell

STATE OF MONTANA
ADMINISTRATOR OF GROUNDWATER CODE
OFFICE OF STATE ENGINEER

RECEIVED
JAN 2 1964
STATE ENGINEER

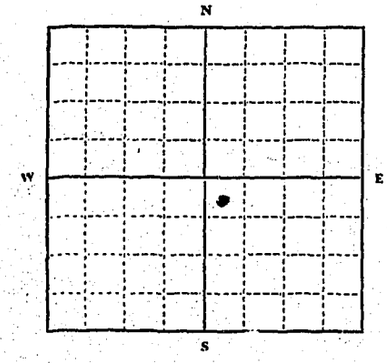
Declaration of Vested Groundwater Rights

(Under Chapter 237, Montana Session Laws, 1961)

1. Hank H. Rensch, of Melstone
(Name of Appropriator) (Address) (Town)

County of Musselshell State of Montana

have appropriated groundwater according to the Montana laws in effect prior to January 1, 1962, as follows:



SE ¼ Sec. 7 T. 10 R. 30

Indicate point of appropriation and place of use, if possible. Each small square represents 10 acres.

2. The beneficial use on which the claim is based Stock water

3. Date or approximate date of earliest beneficial use; and how continuous the use has been July 1960

4. The amount of groundwater claimed (in miner's inches or gallons per minute) 15 gallon per minute

5. If used for irrigation, give the acreage and description of the lands to which water has been applied and name of the owner thereof

6. The means of withdrawing such water from the ground and the location of each well or other means of withdrawal Flowing

7. The date of commencement and completion of the construction of the well, wells, or other works for withdrawal of groundwater

8. The depth of water table 3700 ft

9. So far as it may be available, the type, size and depth of each well or the general specifications of any other works for the withdrawal of groundwater This well was drilled by an oil co and was abandoned & was completed but as a water well

10. The estimated amount of groundwater withdrawn each year 1,000,000

11. The log of formations encountered in the drilling of each well if available

12. Such other information of a similar nature as may be useful in carrying out the policy of this act, including reference to book and page of any county record

Signature of Owner Hank H. Rensch
By Hancel Hoyer

Date 12-30-63

Three copies to be filed by the owner with the County Clerk and Recorder of the county in which the well is located.

Please answer all questions. If not applicable, so state, otherwise the form will be returned.

Original to the County Clerk and Recorder; Duplicate to the State Engineer; Triplicate to the Montana Bureau of Mines and Geology, and Quadruplicate for the Appropriator.

17738

169487

STATE OF MONTANA,
MUSSELSHELL COUNTY. } ss.

FILED THIS 30 DAY OF
Dec A. D. 19 63
AT 11:47 O'CLOCK a M.
B. H. MATZKE
COUNTY RECORDER
Frances L. Dawson
DEPUTY

GW

Approved Stock Form—State Publishing Co., Helena, Montana—42234

File No.....

T. 10 N R. 30 E 36

DUPLICATE

County Musselshell

STATE OF MONTANA
ADMINISTRATOR OF GROUNDWATER CODE
OFFICE OF STATE ENGINEER

RECEIVED
JAN 2 1964
STATE ENGINEER

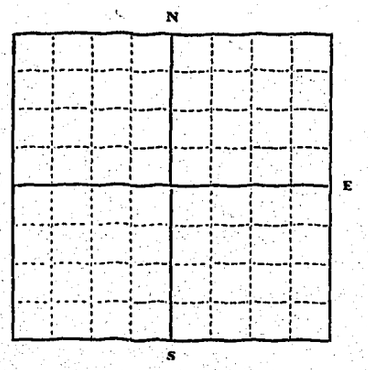
Declaration of Vested Groundwater Rights

(Under Chapter 237, Montana Session Laws, 1961)

1. Harold Hoyem, of Melstone
(Name of Appropriator) (Address) (Town)

County of Musselshell State of Montana

have appropriated groundwater according to the Montana laws in effect prior to January 1, 1962, as follows:



SW 1/4 SW Sec. 36 T. 10 R. 30

Indicate point of appropriation and place of use, if possible. Each small square represents 10 acres.

2. The beneficial use on which the claim is based House and stock water

3. Date or approximate date of earliest beneficial use; and how continuous the use has been 1950 and since

4. The amount of groundwater claimed (in miner's inches or gallons per minute) 8 gallon per minute

5. If used for irrigation, give the acreage and description of the lands to which water has been applied and name of the owner thereof

6. The means of withdrawing such water from the ground and the location of each well or other means of withdrawal Electric pump

7. The date of commencement and completion of the construction of the well, wells, or other works for withdrawal of groundwater

8. The depth of water table 35 ft

9. So far as it may be available, the type, size and depth of each well or the general specifications of any other works for the withdrawal of groundwater

10. The estimated amount of groundwater withdrawn each year

11. The log of formations encountered in the drilling of each well if available

12. Such other information of a similar nature as may be useful in carrying out the policy of this act, including reference to book and page of any county record

Signature of Owner Harold Hoyem

Date 12-30-63

Three copies to be filed by the owner with the County Clerk and Recorder of the county in which the well is located.

Please answer all questions. If not applicable, so state, otherwise the form will be returned.

Original to the County Clerk and Recorder; Duplicate to the State Engineer; Triplicate to the Montana Bureau of Mines and Geology, and Quadruplicate for the Appropriator.

17747

169496

STATE OF MONTANA,
MUSSELSHELL COUNTY. } ss.

FILED THIS 30 DAY OF
Dec A. D. 19 63
AT 12:05 O'CLOCK P M.

B. H. MATZKE
COUNTY RECORDER

Frances L Larson
DEPUTY

2.00

GROUNDWATER INDEX

County Muscatine Twp. 9N Rge. 22E

Sec.	Name of Appropriator	Type of Form	County File No.	Remarks
12	Gieve, Elizabeth	BW4	169553	
12	Daugherty, E.D.	BW4	169691	
24	Harrison, Vern	57L08		
24	" "	57L06	165103	
25	Davis, Betty Jean	BW4	169421	

4—Helena Independent Record

File No.....

DUPLICATE

T. 9 N R. 22 E 12

County MUSSELSHELL

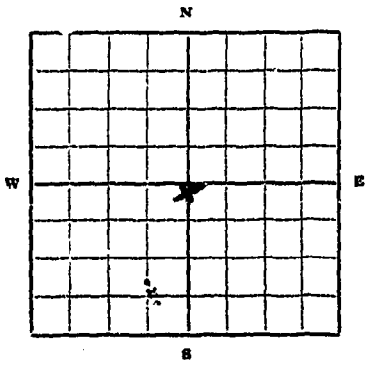
STATE OF MONTANA
ADMINISTRATOR OF GROUNDWATER CODE
OFFICE OF STATE ENGINEER

RECEIVED
JAN 2 1964
STATE ENGINEER

Declaration of Vested Groundwater Rights

(Under Chapter 237, Montana Session Laws, 1961)

1. ELIZABETH GIESE, of BOX 236 ROUNDUP
(Name of Appropriator) (Address) (Town)
County MUSSELSHELL State of MONTANA
have appropriated groundwater according to the Montana laws in effect prior to January 1, 1962, as follows:



SE ¼ Sec. 12 T. 9 R. 22

Indicate point of appropriation and place of use, if possible. Each small square represents 10 acres.

2. The beneficial use on which the claim is based LIVESTOCK DRINKING WATER

3. Date or approximate date of earliest beneficial use; and how continuous the use has been NOV 14 1952 EVERY YEAR

4. The amount of groundwater claimed (in miner's inches or gallons per minute) CAN NOT BE BALED DRY BY WELL DRILLER

5. If used for irrigation, give the acreage and description of the lands to which water has been applied and name of the owner thereof NOT USED FOR IRRIGATION

6. The means of withdrawing such water from the ground and the location of each well or other means of withdrawal PUMP JACK GASSOLINE ENGINE

7. The date of commencement and completion of the construction of the well, wells, or other works for withdrawal of groundwater COMPLETED NOV 14 1952

8. The depth of water table 7 FEET FROM TOP OF WELL

9. So far as it may be available, the type, size and depth of each well or the general specifications of any other works for the withdrawal of groundwater SIX INCH DRILLED WELL THIRTY NINE FEET DEEP

10. The estimated amount of groundwater withdrawn each year DO NOT KNOW

11. The log of formations encountered in the drilling of each well if available NOT AVAILABLE

12. Such other information of a similar nature as may be useful in carrying out the policy of this act, including reference to book and page of any county record

Signature of Owner Elizabeth Giese

Date Dec 30 1963

Three copies to be filed by the owner with the County Clerk and Recorder of the county in which the well is located.

Please answer all questions. If not applicable, so state, otherwise the form will be returned.

Original to the County Clerk and Recorder; duplicate to the State Engineer; Triplicate to the Montana Bureau of Mines and Geology and Quadruplicate for the Appropriator.

17802

169553

STATE OF MONTANA, }
MUSSELSHELL COUNTY. } ss.

FILED THIS 30 DAY OF
Dec A. D. 19 63
AT 2:04 O'CLOCK P M.

B. H. MATZKE
COUNTY RECORDER

Francis L. Dawson
DEPUTY

$2.00

GW 4

12

T 9N R 22 E
County MUSSELSHELL

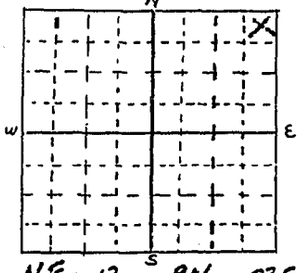
State of Montana
Administrator of groundwater Code
Office of State Engineer

JAN 3 1964

STATE ENGINEER

DECLARATION OF VESTED GROUNDWATER RIGHTS
(Under Chapter 237, Montana Session Laws, 1961)

1. E. D. DAUGHERTY, of ROUNDUP
(Name of Appropriator) (Address) (Town)
County of MUSSELSHELL State of MONTANA
have appropriated groundwater according to the Montana laws in effect prior to January 1, 1962, as follows:



NE ¼ 12 Sec 9N T 23E R

Indicate point of appropriation and place of use, if possible. Each small square represents 10 acres.

2. The beneficial use on which the claim is based
STOCK WATER

3. Date or approximate date of earliest beneficial use; and how continuous the use has been 1930 APPROX CONTINUOUS

4. The amount of groundwater claimed (in miner's inches or gallons per minute) 5 GAL MIN

5. If used for irrigation, give the acreage and description of the lands to which water has been applied and name of the owner thereof

6. The means of withdrawing such water from the ground and the location of each well or other means of withdrawal
GRAVITY - SPRING

7. The date of commencement and completion of the construction of the well, wells, or other works for withdrawal of ground water 1930 - WPA WORK

8. The depth of water table 6 FT

9. So far as it may be available, the type, size and depth of each well or the general specifications of any other works for the withdrawal of groundwal of groundwater
SPRING - PIPED APPROX 100 FT TO TANK

10. The estimated amount of groundwater withdrawn each year 10,000 GAL

11. The log of formations encountered in the drilling of each well if available

12. Such other information of a similar nature as may be useful in carrying out the policy of this act, including reference to book and page of any count record

Signature of Owner E. D. Daugherty
Date Jan 27, 1963

20536

169691

STATE OF MONTANA, } ss.
MUSSELSHELL COUNTY.

FILED THIS 31 DAY OF
[illegible] A. D. 19 68
AT 1:55 O'CLOCK P M.
E. H. MATZKE
COUNTY RECORDER
Frances L Dawson
DEPUTY

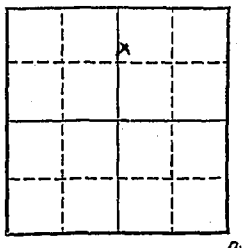
RECEIVED
JUL 29 1960
STATE ENGINEER

24

T. 9 R. 32
County Musselshell

MONTANA BUREAU OF MINES AND GEOLOGY
Butte, Montana

WATER WELL LOG



Owner Verne D. Harmon Address Lavina, Mont.

Driller Don Strand Address Roundup "

Date Started June 14-1960 Date Completed July 15-1960

Location: Sec. 24 T. 9 R. 32 ¼ sec. NW¼ of the NE¼

Type of well drilled (Dug, driven, bored, or drilled) Equipment used Churn drill (Churn drill, rotary, other)

Water use: Domestic ☐ Municipal ☐ Stock ☒ Irrigation ☐

Industrial ☐ Drainage ☐ Other:

Casing: 0 ft. to 160 ft. Type Plain Size 6" 20 ga. galv.

Casing: ft. to ft. Type Size

Casing: ft. to ft. Type Size

Perforated or Screened: Ft. 128 to ft. 154 Ft. to ft.

Type of screen or perforations 16" holes

Static Water level, for non-flowing well: 122 ft. from top feet.

Shut-in pressure, for flowing well: lb./sq. in. on: (date)

Pumping water level 143 feet at gal. per min.

How tested: Bail-tested

Length of test Three hours (3)

Remarks: (Gravel packing, cementing, packers, type of shut-off, depth of shut-off)

Gravel-packed with ½ inch washed gravel outside casing to bottom to prevent caving from plugging formations. Very slow drilling because of the steep pitch of formations. Top vein turned out to be a frog pond so had to go to next vein of water

(over)

Log of Well

Depth, feet From	Depth, feet To	Description of Material Drilled
0	9	Shale and clay
9	21	yellow clay
21	29	Sticky brown shale
29	41	Sand rock
41	49	Brown sand rock
49	58	Soft shale - tan and grey
58	62	Dark brown shale
62	69	Grey shale
69	76	Sand rock
76	77	Hard rock
77	84	Sand rock
84	88	Grey shale
88	91	Coal
91	104	Grey shale
104	112	Soft grey shale - streaks of sand
112	120	Sandy grey shale
120	122	Sandy brown shale
122	132	Sandy grey shale
132	133	Water sand - one gals.
133	151	Sandy grey shale
151	153	Water sand - 3½ gals.
153	160	Reddish brown shale

24

Form No. 18
8-60

T. 7 R. 22

County [illegible]

MONTANA BUREAU OF MINES AND GEOLOGY
Butte, Montana

RECEIVED
OCT 10 1961
STATE ENGINEER

Water Well Log

		X

Owner VERN HARMON Address LAVINA, MONT

Driller JOE KOHLER Address ROUNDUP, MONT

Date Started 8-10-61 Date Completed 8-12-61

Location: Sec. 24 T. 7 R. 22 ¼ sec. N.E.

Type of well [illegible] (Dug, driven, bored, or drilled) Equipment used [illegible] (Churn, drill, rotary, other)

Water use: Domestic ☐ Municipal ☐ Stock ☒ Irrigation ☐

Industrial ☐ Drainage ☐ Other

Casing: 0 ft. to 132 ft. Type 2 S. SALV. Size 6"

Casing: ft. to ft. Type Size

Casing: ft. to ft. Type Size

Perforated or screened: Ft. 75 to ft. 107. Ft. 107 to ft. 132

Type of screen or perforations FACTORY [illegible] AND 1/8 INCH [illegible]

Static water level, for non-flowing well: 65 feet.

Shut-in pressure, for flowing well: lb./sq. in. on: (date)

Pumping water level 90 feet at 8 gal. per min.

How tested: BAILER

Length of test 1 HR

Remarks: (Gravel packing, cementing, packers, type of shut-off, depth of shut-off)

(over)

24

Form No. 18
8-60

T. 9 R. 22

County MUSSELSHELL

MONTANA BUREAU OF MINES AND GEOLOGY
Butte, Montana

RECEIVED
OCT 10 1961
STATE ENGINEER

Water Well Log

Owner VERN HARMON Address LAVINA, MONT

Driller JOE KUHOS Address ROUNDUP, MONT

Date Started 8-10-61 Date Completed 8-12-61

Location: Sec. 24 T. 9 R. 22 ¼ sec. NE

Type of well (Dug, driven, bored, or drilled) Equipment used (Churn, drill, rotary, other)

Water use: Domestic ☐ Municipal ☐ Stock ☒ Irrigation ☐
Industrial ☐ Drainage ☐ Other

Casing: 4 ft. to 122 ft. Type 2 G. GALV. Size 1 IN

Casing: ft. to ft. Type Size

Casing: ft. to ft. Type Size

Perforated or screened: Ft. 75 to ft. 107. Ft. 107 to ft. 122

Type of screen or perforations FACTORY SCREEN AND 1/2 INCH HOLES

Static water level, for non-flowing well: 65 feet.

Shut-in pressure, for flowing well: lb./sq. in. on: (date)

Pumping water level 90 feet at 8 gal. per min.

How tested: BAILER

Length of test 1 HR

Remarks: (Gravel packing, cementing, packers, type of shut-off, depth of shut-off)

(over)

Log of Well

Depth, feet From	To	Description of Material Drilled
0	5	SANDY SOIL
5	35	SANDY CLAY
35	45	BROWN SAND
45	65	YELLOW SAND
65	122	GRAY SANDSTONE
122	122	GRAY ROCK

STATE OF MONTANA,
MUSSELSHELL COUNTY, } ss.

FILED THIS [illegible] DAY OF [illegible] A. D. 19[illegible]

AT 1:30 O'CLOCK [illegible] M.

B. H. MATZIKE
COUNTY RECORDER

[illegible] DEPUTY

165103

GW

File No.

DUPLICATE

SECTION No.

RECEIVED
MAR 5 1964
STATE ENGINEER

T. 9 N R. 22E

County Musselshell

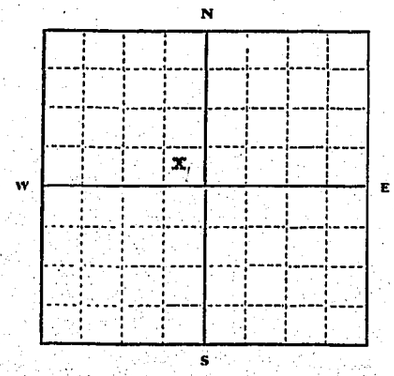
STATE OF MONTANA
ADMINISTRATOR OF GROUNDWATER CODE
OFFICE OF STATE ENGINEER

RECEIVED
DEC 30 1963
STATE ENGINEER

Declaration of Vested Groundwater Rights

(Under Chapter 237, Montana Session Laws, 1961)

1. Betty Jean Davis, of Roundup, Montana
(Name of Appropriator) (Address) (Town)
County of Musselshell State of Montana
have appropriated groundwater according to the Montana laws in effect prior to January 1, 1962, as follows:



SE ¼ NW Sec. 25 T. 9 R. 22E

Indicate point of appropriation and place of use, if possible. Each small square represents 10 acres.

2. The beneficial use on which the claim is based Stockwater

3. Date or approximate date of earliest beneficial use; and how continuous the use has been 1912

4. The amount of groundwater claimed (in miner's inches or gallons per minute) 1½ gal.

5. If used for irrigat... ive the acreage and description of the lands to which water has been applied and name of the owner therec...

6. The means of withdrawing such water from the ground and the location of each well or other means of withdrawal Natural flow, Spring

7. The date of commencement and completion of the construction of the well, wells, or other works for withdrawal of groundwater

8. The depth of water table Surface

9. So far as it may be available, the type, size and depth of each well or the general specifications of any other works for the withdrawal of groundwater

10. The estimated amount of groundwater withdrawn each year 388,800 gals.

11. The log of formations encountered in the drilling of each well if available

12. Such other information of a similar nature as may be useful in car ing out the policy of this act, including reference to book and page of any county record This water ... used for stockwater continuously since the land has been in pri ... nership

Signature of Owner Betty Jean Davis

Date 12/26/63

Three copies to be filed by the owner with the County Clerk and Recorder of the county in which the well is located.

Please answer all questions. If not applicable, so state, otherwise the form will be returned.

Original to the County Clerk and Recorder; Duplicate to the State Engineer; Triplicate to the Montana Bureau of Mines and Geology, and Quadruplicate for the Appropriator.

15318

169421

STATE OF MONTANA,
MUSSELSHELL COUNTY. } ss.

FILED THIS 27 DAY OF
Dec A. D. 19 63
AT 2:30 O'CLOCK P M.

B. H. MATZKE
COUNTY RECORDER

Frances L. Dawson
DEPUTY