MEMORANDUM

TO:

File

DATE:

May 1, 2018

FROM:

Amber Herring

SUBJECT:

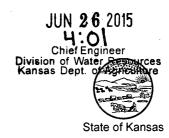
Date Stamping Mail

On Friday, June 26th, 2015, The Administrative Assistant for Kansas Department of Agriculture, on the first floor signed for the certified mail containing the following Applications. I, Amber Herring, did not receive the documents until Monday, **June 29th**, **2015**. Thus, the June 29th date is the correct date and time received by the **Division of Water Resources**.

David. W. Barfield, P.E.

Submit To: CHIEF ENGINEER
Division of Water Resources
Kansas Department of Agriculture
1320 Research Park Drive
Manhattan, Kansas 66502
http://agriculture.ks.gov/dwr

APPLICATION FOR APPROVAL TO CHANGE THE PLACE OF USE, THE POINT OF DIVERSION OR THE USE MADE OF THE WATER UNDER AN EXISTING WATER RIGHT



Filing Fee Must Accompany the Application

(Please refer to Fee Schedule on signature page of application form.)

Paragraph Nos. 1, 2, 3, 4 & 8 must be completed. Complete all other applicable portions. A topographic map or detailed plat showing the authorized and proposed points(s) of diversion and /or place of use must accompany this application.

1.	Application is hereby made for approval of the Chief Engineer to change ide W. Barfield, P.E. Place of Use
•	File No. 21,730 Circle 1 Name of applicant: City of Hays, Kansas and City of Russell, Kansas (See paragraph 2 of the cover letter.)
2.	
	Address: c/o Foulston Siefkin LLP, 1551 N. Waterfront Parkway, Suite 100
	City, State and Zip: Wichita, Kansas 67206
	Phone Number: (316) 291-9725 E-mail address: dtraster@foulston.com
	What is your relationship to the water right; vowner tenant agent other? If other, please explain. Hays and Russell are co-owners of the authorized place of use on the R9 Ranch in Edwards County.
	Name of water use correspondent: City of Hays, Kansas
	Address: P. O. Box 490, 1507 Main Street
	City, State and Zip: Hays, Kansas 67601
	Phone Number: (785) 628-7320 E-mail address: tdougherty@haysusa.com
3.	The change(s) proposed herein are desired for the following reasons (please be specific): See Paragraph 3 of the cover letter filed concurrently with this application. The cover letter is
	incorporated herein by reference.
	The change(s) (was) (will be) completed by See Paragraph 3 of the cover letter (Date)
F.C	r Office Use Only: D. A GMD 5 Meets K.A.R. 5-5-1 (YES / NO) Use 1 RR Source G/S County ED By KAB Date to 129 15 Dide C-3 Fee \$ 700 TR # Receipt Date 6 22 15 Check # 058328
	of 21,000 15053312 SCANNED

DWR 1-120 (Revised 06/16/2014)

Assisted by: _____

File No. 21,730

4.	The presently	v authorized	place of use i	ς.
⊸.	The present	y authorized	place of use i	Э.

Owner of Land — NAME: <u>City of Hays, Kansas</u>

ADDRESS: P.O. Box 490, 1507 Main Street, Hays, Kansas 67601

		NE1⁄4				NW¼				SV	V1/4		SE¼				TOTAL	
Sec. Twp.	Range	NE1⁄4	NW¼	SW1/4	SE1/4	NE¼	NW1⁄4	SW1/4	SE1/4	NE1⁄4	NW1⁄4	SW1/4	SE1/4	NE1⁄4	NW1⁄4	SW1/4	SE½	ACRES
30-T25S-R	19W							Lot 2 23	22	34	Lot 3 34.75	Lot 4 2	1					116.75
																		-

List any other water rights that cover this place of use: None

Owner of Land — NAME: <u>City of Russell, Kansas</u>

ADDRESS: 133 W. 8th Street, Russell, Kansas 67665

				NE	1/4			NW¼		SW¼			SE¼			TOTAL ACRES			
Sec.	Twp.	Range	NE1⁄4	NW¼	SW1/4	SE1/4	NE1/4	NW¼	SW¼	SE1/4	NE1⁄4	NW1/4	SW1/4	SE1/4	NE1⁄4	NW1⁄4	SW1/4	SE1/4	
_				Same as above															
									-										

List any other water rights that cover this place of use: None

(If there are more than two landowners, attach additional sheets as necessary.)

5. It is proposed that the place of use be changed to:

Owner of Land — NAME: <u>City of Hays, Kansas</u>

ADDRESS: P.O. Box 490, 1507 Main Street, Hays, Kansas 67601

				NE	1/4			NW¼			SW1/4				SE1/4				TOTAL
Sec.	Twp.	Range	NE1⁄4	NW¼	SW1/4	SE1/4	NE1⁄4	NW1⁄4	SW1/4	SE¼	NE1⁄4	NW¼	SW1/4	SE1/4	NE1⁄4	NW1/4	SW1/4	SE1/4	ACRES
The City of Hays, Kansas and its immediate vicinity and other locations as more																			
			fully	fully described in paragraph 5 of the cover letter.															
-																			

List any other water rights that cover this place of use: <u>See paragraph 5 of the cover letter.</u>

Owner of Land — NAME: <u>City of Russell, Kansas</u>

ADDRESS: 133 W. 8th Street, Russell, Kansas 67665

				NE	1/4			NV	V1/4			SW	J ¹ / ₄			SE	1/4		TOTAL
Sec.	Twp.	Range	NE1⁄4	NW1/4	SW1/4	SE1/4	NE1⁄4	NW¼	SW1/4	SE1/4	NE1⁄4	NW¼	SW1/4	SE1/4	NE1⁄4	NW1/4	SW1/4	SE1/4	ACRES
			The C	City o	f Rus	sell,	Kans	as and	d its i	mmed	diate v	vicini	ty an	d oth	er loc	ation	s as n	nore	
			fully described in paragraph 5 of the cover letter.																
						•	О.											-	
																			

List any other water rights that cover this place of use: <u>See paragraph 5 of the cover letter.</u>

IF MORE SPACE IS NEEDED, ATTACH ADDITIONAL SHEETS AS NEWESSATE FOURCES RECEIVED

File No. 21,730

О.	the presently authorized point(s) of diversion (is) (are)	irrigation we	(Provide description and number		·
7.	The proposed point(s) of diversion (is) (are) one or me	ore municipal	l wells; see paragraph 7	of the cover l	etter.
	List all presently authorized point(s) of diversion:		(Provide description and number	of points)	
0	Presently authorized point of diversion:				
8.		NE	Occasion of the	SW/	
	One in the NW Quarter of the	25	Quarter of the	3 W	Quarter
	of Section 30 , Township 2 2320	23	South, Range	19	(K /W),
	in <u>Edwards</u> County, Kansas, <u>2,330</u>			utheast corner	of section.
	Authorized Rate 795 gpm Authorized Quantity				
	(DWR use only: Computer ID No G			feet Wes	t)
	☐ This point will not be changed	ill be changed	as follows:		
	Proposed point of diversion: (Complete only if chan	nge is requeste	<u>ed)</u>		
	One in the $\begin{tabular}{c c} NW & Quarter of the \\ \hline of Section & 30 & , Township \\ \hline \end{tabular}$	NE	Quarter of the	SW	Quarter
	of Section, Township	25	South, Range	19	(X X/V/),
	in <u>Edwards</u> County, Kansas, <u>2,282</u>	feet North _	3,870 feet West of So	utheast corner	of section.
	Proposed Rate 795 gpm Proposed Quantity	203.77 a/f	<u>`</u>		
	This point is: Additional Well Geo Center List	other water righ	nts that will use this point	21,731	<u> </u>
			· · · · · · · · · · · · · · · · · · ·		
9.	Presently authorized point of diversion:				
	One in the Quarter of the		Quarter of the		Quarter
	of Section, Township		South, Range		(K /W),
	in County, Kansas,	feet North	feet West of So	utheast corner	of section.
	Authorized Rate Authorized Quantity				
	(DWR use only: Computer ID No G			feet West	t)
	☐ This point will not be changed ☐ This point wi				-,
	Proposed point of diversion: (Complete only if chan	•			
	One in the Quarter of the				Quarter
	of Section, Township				
	in County, Kansas,				
	Proposed Rate Proposed Quantity			utileast comer t	or section.
	· · · · · · · · · · · · · · · · · · ·				
į	This point is: Additional Well Geo Center List	other water righ	its that will use this point		<u> </u>
ا ۱۸	Presently authorized point of diversion:				
ا٠٠'	One in the Quarter of the		Quarter of the		Quarter
	of Section, Township				
	in County, Kansas,			utneast corner of	or section.
	Authorized Rate Authorized Quantity				
	(DWR use only: Computer ID No GI			feet West	t)
	☐ This point will not be changed ☐ This point will	_			
	Proposed point of diversion: (Complete only if chan				
	One in the Quarter of the		Quarter of the		Quarter
	of Section, Township		South, Range		(E/W),
	in County, Kansas,	feet North	feet West of Sou	utheast corner o	of section.
	Proposed Rate Proposed Quantity _				
1	This point is: Additional Well Geo Center List of	other water righ	its that will use this point		
11	Describe the current condition of and future plans for an				
11.	See paragraph 11 of the cover letter.	y pomica) or div	eraion which will no longer	De useu.	
		· · · · · · · · · · · · · · · · · · ·			
	IF MORE SPACE IS NEEDED, ATTA	CH ADDITIO	NAL SHEETS AS NE	CESSARYES RECEIV	OURCES /ED

21730

Page 3 of 38

		217	730	File No	21,730
12.			esently authorized use of water is for <u>irrigation</u> posed that the use be changed to <u>municipal</u>	purposes. purposes.	
13.	See	the	ging the place of use and/or use made of water, describe how the consumptive attached discussion regarding the quantity of water to be changed the cover letter.		
	(Plea	se :	show any calculations here.)		
14.	It is	req	quested that the maximum annual quantity of water be reduced to $\underline{ \text{not appl}}$	icable (acre-feet	or million gallons).
15.	It is	req	quested that the maximum rate of diversion of water be reduced to not applic	cable gallons per mi	nute (c.f.s.).
16.	1:24 Kan Dist show	sas and uld	oplication must include either a topographic map or detailed plat. A U.S. Geo 100, is available through the Kansas Geological Survey, 1930 Constant Avec 66047-3726 (www.usgs.gov). The map should show the location of the preces North and West of the Southeast corner of the section must be shown. also be shown. Identify the center of the section, the section lines and the set, township, and range numbers on the map. In addition the following information.	enue, University of K esently authorized po The presently autho ection corners and sh	ansas, Lawrence, int(s) of diversion. rized place of use ow the appropriate
	a.	lf a	a change in the location of the point(s) of diversion is proposed, show:		
		1)	The location of the proposed point(s) of diversion. Distances North and Wesmust be shown. Please be certain that the information shown on the map Paragraph Nos. 9, 10 and 11 of the application.		
		2)	If the source of supply is groundwater, please show the location of exist domestic wells, within $\frac{1}{2}$ mile of the proposed well or wells. Identify each vibraling address of the property owner or owners. If there are no wells within	vell as to its use and	furnish name and
		3)	If the source of supply is surface water, the names and mailing addresses and $\frac{1}{2}$ mile upstream from your property lines must be shown.	of all landowner(s) ½	mile downstream
			a change in the place of use is desired, show the proposed place of use by rain that the information shown on the map agrees with the information shown		
	loca well	l sc log	documentation to show the change(s) proposed herein will not impair existing burce of supply as to which the water right relates. This information may include, test hole logs, and other information as necessary information to show the below.	ude statements, plats	s, geology reports,
	See	pa	aragraph 17 of the cover letter.		
					,
			·	-	
10	1£ 4h.		mineral description of the Political Control o		

18. If the proposed change(s) does not meet all applicable rules and regulations of the Kansas Water Appropriation Act, please identify the rules and regulations for which you request a waiver. State the reason why a waiver is needed and why the request should be granted. Attach documentation showing that granting the request will not impair existing water rights and will not prejudicially and unreasonably affect the public interest.

See paragraph 7 of the cover letter.

WATER RESOURCES
RECEIVED

JUN 2 9 2015

IF MORE SPACE IS NEEDED, ATTACH ADDITIONAL SHEETS AS NECESSAR MAGRICULTURE

File No.	21,730

Any use of water that is not as authorized by the water right or permit to authorize water <u>before</u> the chief engineer approves this application is a violation of the Kansas Water Appropriation Act for which criminal or civil penalties may be assessed. Such violation is a class C misdemeanor, punishable by a fine not to exceed \$500 and/or a term of confinement not to exceed one month in the county jail. K.S.A. 82a-728(b). Civil penalties shall be not less than \$100 nor more than \$1,000 per violation. In the case of a continuing violation, each day such violation continues may be deemed a separate violation. In addition to these penalties the water right may be modified or suspended. K.S.A. 82a-737, as amended.

The application must be signed by all owners of the place of use authorized under the water right and his or her spouse, if married. Please indicate if there is no spouse. If land is being purchased under contract, the seller must sign as landowner until such time as the contract is completed.

In the event that all applicants cannot appear before one notary public, they may as necessary sign separate copies of the application before any notary public conveniently available to them. All copies signed in this manner shall be considered to be valid parts of the application.

If the request is signed on behalf of any Owner by someone with legal authority to do so (for example, an agent, one who has power of attorney, or an executor, executrix, conservator), it will be necessary to attach proper documents showing such authority.

I declare that I am an owner of the currently authorized authorized to make this application on their behalf, and complete. By filing this application I authorize the chief as specified in sections 14 and 15 of this application.	declare furth	er that the	statement	s contained herein a	are true, co	rrect, and
Dated at Russell Russell County	, Kansas, this	23rd	day of	June	, 20	1 5 .
			_ ,			
(Outres)				(Spouse)		
City of Hays, Kansas, by Toby Dougherty, City	Manager					
(Please Print)				(Please Print)		
<u></u>						
(Owner)				(Spouse)		
(Please Print)	-			(Please Print)		
(Owner)	 -			(Spouse)		
(Please Print)	NOTA	RY PUBLIC MALIND	- State of Ka A MORSE	(Please Print)		
State of Kansas) County of Russell)	Му	Appt. Expires	<i>f</i> 1	18		
I hereby certify that the foregoing application was significant the state of the st	ned in my p	resence ar	nd sworn (to before me this \leq	23rd	day of
My Commission Expires 6/15/18	<u> </u>	ma	en	Notary Public	ayse	<u>-</u>
	FEE SCHEDU	<u>LE</u>				
Each application to change the place of use, the point of diversapplication fee set forth in the schedule below:	sion or the use	made of the	e water und	er this section shall be	accompanie	ed by the
 (1) Application to change a point of diversion 300 fee (2) Application to change a point of diversion more th (3) Application to change the place of use (4) Application to change the use made of the water 	an 300 feet				\$20 \$20	00 00
Make check payable to Kansas Department of Agriculture.						

WATER RESOURCES RECEIVED

	21 720
File No.	21,730

Any use of water that is not as authorized by the water right or permit to authorize water <u>before</u> the chief engineer approves this application is a violation of the Kansas Water Appropriation Act for which criminal or civil penalties may be assessed. Such violation is a class C misdemeanor, punishable by a fine not to exceed \$500 and/or a term of confinement not to exceed one month in the county jail. K.S.A. 82a-728(b). Civil penalties shall be not less than \$100 nor more than \$1,000 per violation. In the case of a continuing violation, each day such violation continues may be deemed a separate violation. In addition to these penalties the water right may be modified or suspended. K.S.A. 82a-737, as amended.

The application must be signed by all owners of the place of use authorized under the water right and his or her spouse, if married. Please indicate if there is no spouse. If land is being purchased under contract, the seller must sign as landowner until such time as the contract is completed.

In the event that all applicants cannot appear before one notary public, they may as necessary sign separate copies of the application before any notary public conveniently available to them. All copies signed in this manner shall be considered to be valid parts of the application.

If the request is signed on behalf of any Owner by someone with legal authority to do so (for example, an agent, one who has power of attorney, or an executor, executrix, conservator), it will be necessary to attach proper documents showing such authority.

I declare that I am an owner of the currently authorized place authorized to make this application on their behalf, and decl complete. By filing this application I authorize the chief enginess as specified in sections 14 and 15 of this application.	lare furti	ner that the	statement	s contained herei	n are true, correct, and
Dated at Russell, Russell County , Kar	ısas, this	23rd	day of	June	, 20_15
			_ , _		
(Owner)				(Spouse)	
City of Russell, Kansas, by Jon Quinday, City Manag	er				
(Please Print)				(Please Print)	
(Owner)				(Spouse)	
(Please Print)				(Please Print)	
(Owner)				(Spouse)	
(Please Print)				(Please Print)	
State of Kansas County of Russell I hereby certify that the foregoing application was signed		MALIN ty Appt. Expire		18	<u> 331d</u> day of
My Commission Expires 6/15/18	,	Ma	lex	Notary Public	Jase
<u>FEE</u>	SCHED	ULE			
Each application to change the place of use, the point of diversion of application fee set forth in the schedule below:	or the use	made of th	e water und	er this section shall	be accompanied by the
 (1) Application to change a point of diversion 300 feet or le (2) Application to change a point of diversion more than 3 (3) Application to change the place of use (4) Application to change the use made of the water 	00 feet				
Make check payable to Kansas Department of Agriculture.					

WATER RESOURCES
RECEIVED

8. Rate and Quantity

The Cities are requesting a total of 203.77 acre-feet and 795 gallons per minute from the well associated with this water right, all of which will be diverted from new point of diversion G, as shown on Exhibit J. When combined with existing wells from other water rights, new point of diversion G will have a cumulative total of 426.7 acre-feet and 1,870 gallons per minute.

13. If changing the place of use and the use made of water, describe how the consumptive use will not be increased:

The following discussion is subject to paragraph 13 of the cover letter regarding consumptive use.

DWR Regulation, K.A.R. 5-5-9(a), provides that the default calculation used to address the consumptive use issue allows the conversion of 126.36 acre-feet for municipal use. As discussed below, 117 approved acres were irrigated during the perfection period; 117 acres multiplied by the Edwards County NIR for corn of 1.08 acre-feet per acre equals 126.36 acre-feet.

That same regulation goes on to allow the change to be based on the net consumptive use actually made during the perfection period.³

Quantity authorized and perfected

The permit was issued on February 27, 1976, granting the applicant the right to divert up to 224 acre-feet annually at a rate of up to 1,250 gallons per minute for irrigation use⁴ on 117 acres in Section 30-T25S-R19W,⁵ or 1.92 acre-feet per acre. The certificate limited the authorized rate to 795 gallons per minute.

In the cover letter transmitting the permit, DWR made findings of fact stating that "the proposed use is for a beneficial purpose and is *within reasonable limitations*. If priorities are observed and respected, the proposed use will neither impair any use under existing water rights nor prejudicially and unreasonably affect the public interest."

The Field Inspection Report indicates that 269 acre-feet were applied to 117 acres during the year of record. Since the permit authorized a maximum of 224 acre-feet, the entire quantity was perfected.⁷

While the certificate limits the total quantity to 176 acre-feet based on DWR's after-the-fact determination that 1.5 acre-feet per acre was a reasonable quantity for irrigation use, DWR did not have jurisdiction to make this reduction.⁸

WATER RESOURCES RECEIVED

¹ K.A.R. 5-5-9(a) and (a)(1).

² K.A.R. 5-5-12, NIR Requirements.

³ K.A.R. 5-5-9(b).

⁴ Permit, HAYS000767, Ex. A.

⁵ Application, HAYS000758, Ex. B.

⁶ February 27, 1976, letter (emphasis added), HAYS000766, Ex. C.

⁷ FIR, HAYS000746, Ex. D.

⁸ Certificate, HAYS000776, Ex. E; Larry M. Sheets Memo dated July 9, 1987, HAYS000771, Ex. F; and *Clawson v. Kansas Dept. of Agriculture, Div. of Water Resources*, 49 Kan. App. 2d 789, 315 P.3d 896 (2013).

Since the perfection period has expired, the "authorized quantity" for this water right is the 224 acre-feet actually perfected even though it exceeds the certified quantity.

There are at least two alternative approaches to calculating consumptive use.

NIR for Alfalfa

The FIR states that alfalfa and wheat was grown on this circle during the year of record. According to the Kansas Irrigation Guide, the NIR for the 50% chance rainfall in Edwards County is 13 inches (1.083333 feet) for corn and 20.9 (1.741666 feet) inches for alfalfa.

Since alfalfa was grown on the authorized place of use in at least one year during the perfection period, it is reasonable to use the NIR for alfalfa, which yields a total quantity of 203.77 acre-feet consumed. While this quantity is greater than the quantity set out in the certificate, it is less than the 224 perfected acre-feet, the "maximum annual quantity authorized by the water right."¹⁰

An alternative approach

DWR's use of the NIR of 1.08 feet of water for corn is based on its maximum gross irrigation requirement of 1.5 acre-feet per acre. The regulation allows the conversion of 72% of the maximum quantity to a new use; in other words, it assumes that 28% of the quantity diverted returns to the aquifer.

If 28% of the 224 acre-feet legally applied during the perfection period percolates back to the aquifer, then 72%, or 161.28 acre-feet, should be available for conversion to municipal use. While this quantity is greater than the quantity set out in the certificate, it is less than the 224 perfected acre-feet, the "maximum annual quantity authorized by the water right."

The City requests that DWR approve a total of 203.77 acre-feet for municipal use.

WATER RESOURCES RECEIVED

⁹ FIR, HAYS000749, Ex. G.

¹⁰ See K.A.R. 5-5-9(a)(4).

¹¹ Administrative Policy No. 86-8, dated Nov. 5, 1986, Ex. H (stating that: "In that area of Kansas located between the Range 5 East/Range 6 East Line and the Range 20 West/Range 21 West line, the maximum allowable quantity shall not exceed an average of 1.50 acre-feet per acre irrigated"). See also, K.A.R. 5-3-24 and Larry M. Sheets Memo, dated July 9, 1987, HAYS000771, Ex. F.





OF KANSAS

STATE BOARD OF AGRICULTURE
Roy Freeland, Secretary

DIVISION OF WATER RESOURCES
Guy E. Gibson, Chief Engineer

APPROVAL OF APPLICATION and PERMIT TO PROCEED

(This Is Not a Certificate of Appropriation)

This is to certify that I have examined Application No. 21,730

of the applicant

Midwest Land and Cattle Company c/o John Carson, Manager Box 208

Kinsley, Kansas 67547 for a permit to appropriate water to beneficial use, together with the maps, plans and other submitted data, and that the application is hereby approved and the applicant is hereby authorized, subject to vested rights and prior appropriations, to proceed with the construction of the proposed diversion works and to proceed with all steps necessary for the application of the water to the approved and proposed beneficial use and otherwise perfect the proposed appropriation subject to the following terms, conditions and limitations:

- 1. That the priority date assigned to such application is January 2, 1974.
- 2. That the water sought to be appropriated shall be used for irrigation on the land described in the application.
- 3. That the source from which the appropriation is made shall be from ground water in the drainage basin of the Arkansas River to be withdrawn by means of two (2) wells: one well near the center of the West Half (W_2) and one well in the Northwest Quarter of the Northeast Quarter of the Southwest Quarter (NW_2 NE_3 SW_3) of Section 30, Township 25 South, Range 19 West, in Edwards County, Kansas, located substantially as shown on the aerial photograph accompanying the application.

WATER RESOURCES
RECEIVED

4. That the appropriation sought shall be limited to a maximum diversion rate not in excess of

JUN 2 9 2015

1250 gallons per minute (2.79 c.f.s.)

and to a quantity of not to exceed

224 acre-feet

for any calendar year. KS DEPT OF AGRICULTURE

(OVER)

RECEIVED
MICROFILMED
SCANNEDMAR 8 HAVE 000767

21730 That installation of works for version of water shall be completed on or before ecember 31, 19 77. The applicant shall notify the Chief Engineer of the Division of Water Resources when construction of the works has been completed.

6. That the proposed appropriation shall be perfected by the actual application of water to the proposed beneficial use on or before December 31, 1981 .

7. That the applicant shall maintain records from which the quantity of water actually diverted during each calendar year may be readily determined. Such records shall be furnished to the Chief Engineer as soon as practicable after the close of each calendar year.

8. That the applicant shall not be deemed to have acquired a water appropriation for a quantity in excess of the amount approved herein nor in excess of the amount found by the Chief Engineer to have been actually used for the approved purpose during one calendar year subsequent to approval of the application and within the time specified or any authorized extension thereof.

9. That the use of water herein authorized shall not impair any use under existing water rights nor prejudicially and unreasonably affect the public interest.

10. That the right of the appropriator shall relate to a specific quantity of water and such right must allow for a reasonable raising or lowering of the static water level and for the reasonable increase or decrease of the streamflow at the appropriator's point of diversion.

11. That this permit does not constitute authority under K. S. A. 82a-301 to 305 to construct any dam or other obstruction; it does not give any right-of-way, or authorize any injury to, or trespass upon, public or private property; it does not obviate the necessity of obtaining assent from Federal or Local Governmental authorities when necessary.

12. That failure without cause to comply with provisions of the permit and its terms, conditions and limitations will result in the forfeiture of the priority date, revocation of the permit and dismissal of the application.

> WATER RESOURCES RECEIVED

Dated this 27th day of February

1976

JUN **2 9** 2015

KS DEPT OF AGRICULTURE

SCANNED

HAYS000768









OF KANSAS

STATE BOARD OF AGRICULTURE

Roy Freeland, Secretary
Recol check \$50 1.2.74
Che from : Wilson, & Irame

DIVISION OF WATER RESOURCES

Guy E. Gibson, Chief Engineer

APPLICATION FOR PERMIT TO APPROPRIATE WATER FOR BENEFICIAL USE

(The Statutory Filing Fee of \$50.00 Must Accompany the Application)

	To the Chief Engineer of the Division of Water Resources, Kansas State Board of Agriculture: * SEE LETTE DATED 8-8-	:e :<
	(Mr.) MIDWEST LAND & CATTLE COMPANY CEE	.
	(Mrs.) C/O JOHN CARSON, MANAGER	
	Comes now the applicant (Miss) Kineley Joint Venture whose post office 80 × 208 Kinsley Kansas 67547	
	address is c/o Andrew J. Moore, Attorney at Law, F.O. Box 588, Woodward, Oklahoma	• 1
	73801	
	and makes application to the Chief Engineer of the Division of Water Resources, Kansas State Board of Agri-	
	culture, for a permit to appropriate for beneficial use such unappropriated ground water (surface water or groundwater)	11
	as may be available in Arkansas River Basin in the county of Edwards	-
	(name of stream or drainage basin)	
	state of Kansas, to the extent and in accordance with the particulars hereinafter described:	
	1. The quantity of water desired is in the amount of 224 acre feet per year, to be	
	diverted at a maximum rate of 1250 gals per minute	
	(gallons per minute or cubic feet per second)	
	2. The location of the proposed wells or other works for diversion of water is in the quarter of the	
	quarter of the 19/4 quarter of section 30 ; township 25 , range 19 , in	å •
		,
	Edwards County, Kansas, and in the MW/4 of ME/4 of SW/4 of said section. Then the section is section.	R
	3. The water is intended to be appropriated for: Amount (a) Domestic use	اد
10	Amount Son Of WALER RES	
	MENTALD &	& ∭`
S /	(a) Domestic use () © OCT1 5 1975	(S)
(DE	(b) Municipal use ()	ا ان
	(c) Irrigation use (x) 1250 gals per minute (D) AGRICULT	* *.
	(d) Industrial use ()	
Onti	WAT	ER RESOURCES
Ascari	KECEIVED	RECEIVED
9:0	Water Power use	LINE 9 0 2015
-(10	check included use or uses and show intended Quantity for each use JUL 1 5 1974	UN 2 3 2013
	10 ll	ENT OF ACDIOURTURE
	JUL 2 4 1975 ** Guy Ellis MAR II 1970 DIVISION DAMS DOOR 500 THE DOT	EPT OF AGRICULTURE
	(2) (2) (2) (2) (2) (3) (3) (3) (3) (3) (3) (3) (3) (3) (3	
	Page 11 of 38 FIELD OFFICE DIVISION OF WATER RESOURCES SCA	NNED

STAFFORD

- 4. If for municipal use, attach tables or curves showing past, present and estimated future population and water requirements of the city.
- 5. If for industrial use, attach tables or curves showing past, present and estimated future water requirements.
- 6. If for irrigation use list below or attach name and address of each landowner and the legal description of the lands to be irrigated by designating the actual number of acres to be irrigated in each forty acre tract or

fractional portion thereof: Kinoley Joint Venture is a partnership with the following owners:

J. D. Hodges, 1921 Breadmoor, Woodward, Oklahoma Midwest Land & Cattle CQ:

W. A. McQuiddy, 1210 S. Pordham, Perryton, Texas

Drew Ellis, 823 S. Indiana, Perryton, Texas

John C. Ellis Jr., P. O. Box 610, Perryton, Texas

H. C. Brillhart Jr., P. O. Box 576, Perryton, Texas

Word B. Sherrill, P. O. Box 399, Perryton, Texas

* SEE LETTER

Owner of Land-NAME: Kinsley Joint Venture

DATED 8-8-75 GEE

ADDRESS: c/o-Andrew J. Moore; Attorney, P.O. Box 588, Woodward,

900	Toma	Range		N.	ΕĮ			N	Wł			sı	V.			8	Eł		
.JCU.	TWP.	renge	NE	NW!	sw:	SE ₂	NE:	NW	sw ₁	SE	NE!	NWI	sw ₁	8E‡	NE:	NW!	sw ₁	SE	Total
30	25	19							23	22 20	シ4 33	35 24	2.	Ī				37	/// ##2)
	,																. 97		

These acreages are only those irrigated by wells on this application - other wells irrigate some acreage in this section but the placeted or the contract of t

ADDRESS:

g., ,	Т	D		N	Eł			N	W1			sı	Wł			8	E}	1	
	I wp.	Range	NE	NM1	sw:	SE	NE!	имŧ	sw1	SE!	NE:	NWI	swi	SE	NE!	NM!	sw ₁	SE	Total
							·		-										
					٠,		4				-								
							·;												

Owner of Land—NAME:

ADDRESS:

Son Trum Brown		N	Εł			N'	Wł			81	V }			8	Eł		m. 4.1"	
Sec. Twp. Range	NE	NW	sw ₁	SE:	NE:	NW1	sw:	SE:	NE	NW	8Wł	SE	NE	NW1	sw ₁	8E}	Total	١
						١.												
-												1						.j

WATER RESOURCES
RECEIVED

JUN 2 9 2015

KS DEPT OF AGRICULTURE

4-9-75

	2 One wells and pur	mps at the pivot of a circle
The same had a state of the same as	mump in this cor	em; also another well and stion which supplies an
7. The works for diversion of water will consist drain system whose pivot is	or10	f the well in Section 31.
(well	, pumps, etc.)	, J
and will be completed by already comple	(Date)	
8. The first actual application of water for	he beneficial use proposed	l was or is estimated to be
already used - use begun with 1973	rowing season	
9. The application must be accompanied either	by a detailed plat prepare	d from an actual survey or by
an aerial photograph of the area.		
The plat or aerial photograph should show		
(a) Location of the proposed point or po	nts of diversion	
(b) Location of the pipe lines, canals, r	servoirs or other facilities i	for conveying water from the
point of diversion to the place of use		
(c) If for irrigation, show the location of	the land proposed to be irriga	ated
(d) If for industrial or other use, show th	location of the land where v	water will be used.
10. List and describe other applications filed or	vested rights held by applicar	nt:
None		
11. The relation of the subscriber to this applica	ion is that of Atto	orney
nd he is authorized to make this application in behali		(Owner, agent or otherwise)
Dated at Kinsley Ka	nsas, this 15 day of	<u> Nee 1973</u>
	KINSLEY JOINT VEN	NTURE pplicant)
	, D. alla	n Frame
	D. Allen Frame, Att	torney

Note:

1 cubic foot per second = 448.8 gallons per minute = 646,317 gallons per day = 1.98 acre feet per day.

1 million gallons per day = 1.547 cubic feet per second = 3.07 acre feet per day.

1 acre foot = 43,560 cubic feet = 325,851 gallons.

MICRUFILMED

WATER RESOURCES

RECEIVED

RECEIVED

JUN 2 9 2015

RECEIVED

DIVISION OF WATER RESOURCES.

STAFFORD

JUL 1 5 1974

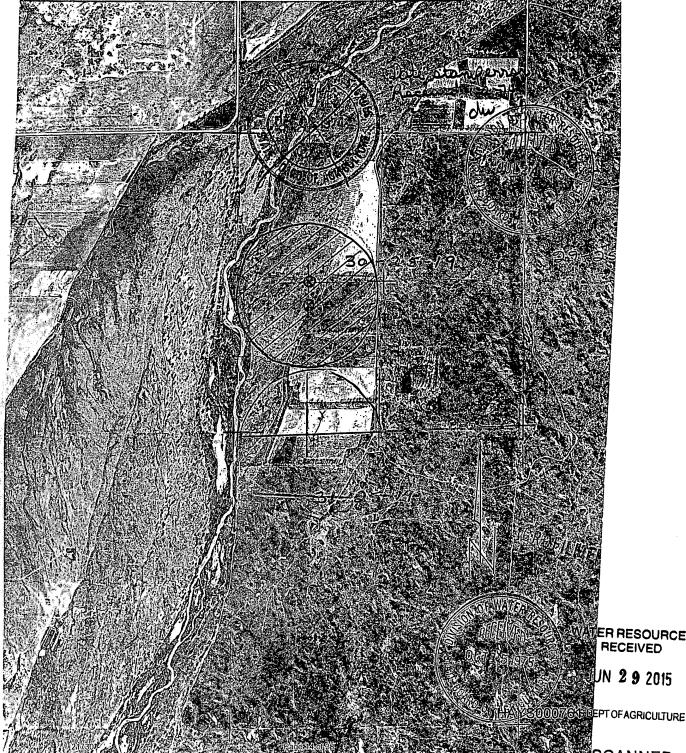
KS DEPT OF AGRICULTURE

HAYS000760

The northern most circle irrigation system shown on this map is located entirely within the W/2 of Section 30-25-19. The radius of this system is 120 feet and the pump and wel serving this system are located at the pivot. Also shown is the part of Section 30 irrigated by circle irrigation system which is located in the NW/4 of Section 31-25-19.

A well on Section 30-25-19 supplies water for the irrigation system located in Section 31-25-19. See map showing the irrigation systems in Section 31-25-19 for complete explanation of wells and irrigation systems whose pivots are located Out stone on that section. The circle system completely shown on this map covers 112 acres.

DEC 02/1974 Received 1-2-74



ER RESOURCES RECEIVED

UN 2 9 2015

SCANNED



February 27, 1976

Midwest Land and Cattle Company c/o John Carson, Manager Box 208 Kinsley, Kansas 67547

> Appropriation of Water Application No. 21,730

Gentlemen:

Your application has been examined and is found to be in proper form. Further, we find that the proposed use is for a beneficial purpose and is within reasonable limitations. If priorities are observed and respected, the proposed use will neither impair any use under existing water rights nor prejudicially and unreasonably affect the public interest. It is presumed that the application is made in good faith, and that you are ready to proceed with the proposed diversion works and the application of water to the proposed use. The application has, therefore, been approved.

There is enclosed the approval of the application authorizing you to proceed with construction of the proposed diversion works, to divert such unappropriated water as may be available from the source and at the location specified in the approval of application, and to use it for the purpose and at the location described in the application.

There is also enclosed a memorandum setting forth the procedure to obtain a certificate of appropriation which will establish the extent of your water rights.

Should you have any questions or if we can be of any assistance to you, please feel free to write or call us.

Very truly yours,

WATER RESOURCES RECEIVED

Riley M. Dixon Hydrologist

- JUN 2 9 2015

RECEIVED

KS DEPT OF AGRICULTURE

Encs.

RMD:eel

MAR 8

DIVISION OF

ATER RESOURCES—KANSAS STATE BOARD OF THE STATE OF THE STA	
IELD INSPECTION REPORT (RE-SUBMITTEL)	□ P
(RE-SUBMITTAL) HLLLIVED \=	⊠ F
JUN 3 0 1007 \ F	☐ R

_	icatio	No.	21	730	<u> </u>	_ Da	pection te	2/1/	86	Fi	irm/Fi	eld O	ffice	Pur ei-A	npin Ffilia	a P)	ant	K)ass Te	sting,	Inc.
															No. (es_		
			Additio	a mal lan	downer	s and	ddress	es iden	tified i	n remai	rks sect	ion.							OF WALL	FIVE NEGO
Wate	r Use	Class	ificati	on: (() Do) Re			() 1		rial cwatei	, ,	Irrig ()		(er Po) Mu wer	micip	al	1	S CEP	1 6 1987
Source (X)	ce: Groui	ndwati	er	() <u>s</u>	Surfac	e Wa	er	Basi	n/Stre	am _	A.	Ka	n.34:	s R	ive			<u> </u>	STA C	2009
			t of D	iversi					1/2	· S	w 1/	A b	<u>e</u>	ec 3	<u>О</u> .т.	25	R. ≥	<u>) 4</u> ,	ID NOARD	OF AGRICU
	oxima al Poi	•	Divers	ion:	,	1 5	h and		L ,	Swl	Vy .		S	ec. 3	orner	25	R.	19	- :	
Appr	oxima	tely_	_2	338 eterm	2ft.	Nort	h and		34	137	Z	_ft. \	Vest	of SE	corne	of Se	ec	30		
			ntity		225	/	A l		1.0	ابنا	٠	1,142	sion]	Rate .	12:	50	g.p.ı	n. (2.79 c.f	.s.)
Prior	ity D	ite	Jan	\ <u>`</u> à,	197	4	_ Appr	oval l	Date .	Fe	ь. 2	7, j	976	_ Per	fection	ı Date	e	ec.	31,198.	
				ering overla								lon	<u>a</u>	· it						
				JDEC					secu	, in the second			i 		•					
s	, т	R	NE		E¼			-	V/4	Lon	210		V%	c.c.	ME		sw	SE	TOTAL ACRES	
30	25	19	NE	NW	sw	SE	NE	NW	23	SE 22	NE 34	S'S	sw 2	SE	NE	NW	311	SE.	דע	· ·
				, ,											.,					
	D IRI	RIGAT	ED-	-YEAI	R OF	REC	ORD_)9:	85	<u>چ</u>	e At	tack	ed)	she	et			li		
LAN	Т	R		NE	EV4			NV	N V4				.V14				E14		TOTAL ACRES	,
S			NE	NW	SW	SE	NE	NW	sw 2/	SE 22	NE 37	NW 34	sw	SE 3	NE	NW	SW.	SE	119	
s	25	19	<u> </u>																	<u> </u>
s	25	19							0				1	ئـــــا	<u> </u>	•		1		
s 30									L		1		l							
s 30	red i	DIVE		N RA					L		i				7	9)		, C.	1.7/	
s 30	red i	DIVE		N RA		(c	.f.s			_)	N	lorma	1 G.P	,М	_7	9/		(c.f.s.	1.76	
S 30 TEST	rED I	DIVE G.P.M	1			····		FO	R D.	W.R.	USE	ONL	Y							
S 30 TEST Maxin	rED inum	DIVE. G.P.M	19	85		· · · · · · · ·	Exten	FO	R D.	W.R.	USE led: Y	ONL:	Y) N	o (ৃ)		Attac				
S 30 TEST Maxin	rED inum	DIVE. G.P.M	19			· · · · · · · ·	Exten	FO	R D.	W.R.	USE led: Y	ONL:	Y) N	o (ৃ)		Attac			1.76	
S 30 TEST Maxim	rED in mum of Rec	DIVE G.P.M	1 	85 837		×	Extens	FO	R D.	W.R.	USE led: Y	es (.419 × 100) N	o () 26	9	Attac AF	ched?	yes) WATER RESO
S 30 TEST Maxin Year Ac. F	mum of Rec	DIVE G.P.M	1	85 837 ated_	2 hrs.	×	Extens	FO	R D. of time g.p. acre	W.R.	USE led: Y	es (.419 < 100) N	26 AF =	9	Attac AF	ched?	yes (() no (WATER RESO
S 30 TEST Maxin Year Ac. F	mum of Rec 't. Ap	DIVE G.P.M coord _ plied " Land	1	837 837 ated_ erlapp	2 hrs.	×	Exten:	FO	R D. of time	W.R. e need in. ×	USE led: Y	ONL: es (.419 (100) N	2 () 2 6 AF =	9	Attac AF	ched? _ AF/a _ AF/a	yes (acre	() no () WATER RESO

GENERAL INFORMATION ON IRRIGATION SYSTEM:

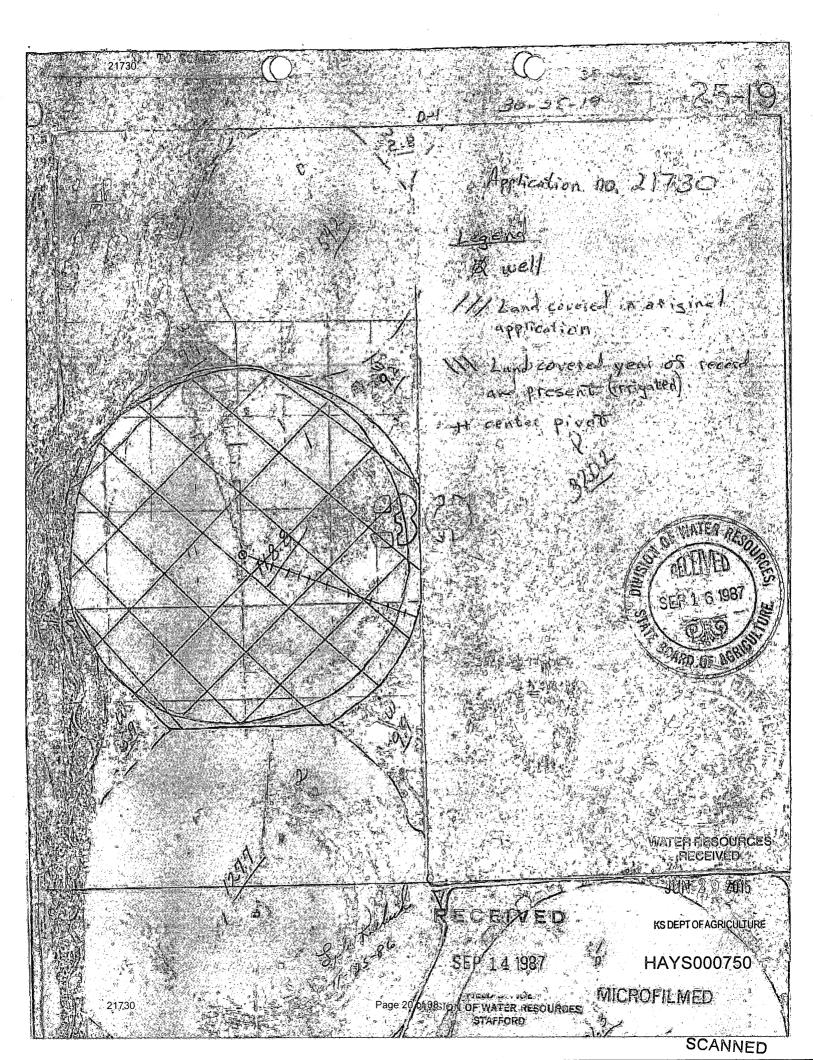
	•
Manufacturer Eimmetic Model 3/0 Serial No. 3222	
Drive: Water See Electric Length of Pivot Arm acres irr	
Design Pressure-Pivotp.s.i. Operating Pressure-Pivot	p.s.i.
Is there an End Gun? (X) yes () no Is end gun operating during Test (X) yes () no	
End Gun Model Rating g.p.m. Orifice size	
Gravity Irrigation	
Items to be shown on sketch of system: 1) Layout of pipe, 2) sizes of pipe, 3) type of pipe, 4) set which	h was
tested, 5) test location and 6) hydrant location.	*
Description	
	·
Other Type	
Manufacturer Model Serial No	
unusual condition/other information	· · · · · · · · · · · · · · · · · · ·
20, 12, 13, 13, 13, 13, 13, 13, 13, 13, 13, 13	· .
POWER UNIT INFORMATION:	
Manufacturer Ford Model No. 300 HP	
Serial No. 08947 E-23-72 Fuel Natura) Gas Rated RPM	
PUMP INFORMATION:	
Manufacturer 30hnston Model No Rated RPM	
Scrial No. CF2/241 Type Vertice/ Tuchine No. stages	
GEAR HEAD INFORMATION:	. 4
Manufacturer Amarillo Model No. 560	He V
Serial No. 88424 Drive Right Angle Ratio 5:4	<u> </u>
WELL INFORMATION:	
Date Drilled Jan. 1974 Original Depth ft. Static Water Level When Drilled	ft.
Length of time well has () operated rested prior to measurement) hrs
Is measurement tube required? () yes (A no Is measurement tube present () yes (A) no	
Depth to water ft. below LSD.	WATER RESOURCE
ADDITIONAL REQUIREMENTS:	RECEIVED
Is a meter required? () yes () no Make of Meter	JUN 2 9 2015
) KS DEPT OF AGRICULTURE
Injection port present? (yes () no Operating an injection system? HAY \$000	7747
Low Pressure Drain? (X) yes () no Vacuum Breaker? (X) yes ()	
Page 17 of 38 Plant Health Chemigation Report completed? (×) ves () no	SCANNE

SKETCH OF ACTUAL PLACE O. SE, LOCATION OF DIVERSION WORL AND DISTRIBUTION SYSTEM. (Indicate distribution system layout at time of field test). W. Car 186 14. 44 (jul 1 N Scale TEST OF DIVERSION RATE: Location of test In horizontal pipe between sump and pivo?

Pipe Diameter (I.D.) 734 inches Test No. 1-Normal Conditions Test No. 2-Maximum Conditions R.P.M. POWER UNIT _2203 R.P.M. POWER UNIT R.P.M. PUMP UNIT 1762 R.P.M. PUMP UNIT 70 psi Pressure at Pump Pressure at Pump ☐ Jacuzzi Meter Test 🧓 🤃 🤫 - Meter Identification; No. 🚉 Area Constant $K = 2.45 \times I.D.^3 =$ Velocity (fps) Velocity (fps) 4. 8. 9. 9. _ 10. 10. Total Total Avg. Avg. G.P.M. G.P.M. 6.1° 5.3. Propeller Meter Test Manufacturer. Model. Serial No. . WATER RESOURCES RECEIVED Meter Diameter_ inches Ending ____ _gal. Ending. JUN 2 9 2015 Beginning_ .gal. gal. Beginning. Difference ____ gal. Difference. gal. Time. _min. _min. KS DEPT OF AGRICULTURE Rate. gpm Rate .gpm $\label{eq:hays000748} \textbf{ HAYS000748} \\ \textbf{ Use Supplemental Sheet (include meter identification, data and calculations).}$ Other Flow Meter

21730

ď	Year	Hours Pumped (hr)	Reported Pumping Rate (gpm)	Water Used (AF)	Acres Irrigated	
	1975	***************************************	,			
	1976	1 .	· · · · · · · · · · · · · · · · · · ·			
	1977	875	800		175	
	1978					
	1979					
-	- 1980	1416	650		65	
	- 1981	1152	550		116	•
	1982					
	1983	1/30	700		119	
	1984	1700**	850**	· · · · · · · · · · · · · · · · · · ·	119**	
*	1985	1850 **	791		119**	
	1986		791 *			
				·	·	
		* obtained	1 from te	st on 10/1,	186	
		* obtaine	1 From Wu	R sent to u	s from Terry	Weaver
		•			. 11	
	ear of Record wit				ford Files	
Crops Irrig	ated: this year _	Alfalfa		Year of record	Alfalfa + W	
Crops Irrig	ated: this year _			Year of record		
Crops Irrig	cated: this year _ CORDS: (Complete the complete the comp	HISA) FA	nformation is not av	Year of record	Alfalfa + W	
Crops Irrig	cated: this year _ CORDS: (Complete the complete the comp	HISA) Fa	nformation is not av	Year of record	Alfalfa + W	
Crops Irrig	cated: this year _ CORDS: (Complete the complete the comp	# fa fa lete only if water use in Supplier	nformation is not av	Year of record	A A Sa Serial No	
Crops Irrig	cated: this year _ CORDS: (Complete tricity Meter Manufact Kwati	ete only if water use in Supplier urer v/rev r	nformation is not av	Year of record vailable)	AISAISA * W Serial No	
Crops Irrig	cated: this year _ CORDS: (Complete tricity Meter Manufact Kwati	lete only if water use in Supplier urer trev r 6 =	Typerevolutions	Year of record vailable) tsec	Serial Noonds	
Crops Irrig	cated: this year _ CORDS: (Complete tricity Meter Manufact Kwati	lete only if water use in Supplier urer trev r 6 =	Typerevolutions	Year of record vailable) tsec	AISAISA * W Serial No	
Crops Irrig	cated: this year _ CORDS: (Complete tricity Meter Manufact Kwatt Rate = Kr × 3. t ther Fuels	lete only if water use in Supplier urer trev r Type Natura	Type_revolutions	Year of record vailable) tsec	Serial Noonds	
Crops Irrig	cated: this year _ CORDS: (Complete tricity Meter Manufact K wati Rate = Kr × 3 t ther Fuels Rate = Volume	lete only if water use in Supplier urer i/rev r Type Natura	Typerevolutions	Year of record vallable) tseconds: =k rate	Serial Noonds Nebraska	heat
Crops Irrig	cated: this year _ CORDS: (Complete tricity Meter Manufact Kwatt Rate = Kr × 3 t ther Fuels Rate = Volume time How was the tes	ctest) = ct volume determined?	Type	Year of record valiable) tsecours =k rate lier_Kansas	Serial No. onds - Nebraska	heat
Crops Irrig	cated: this year _ CORDS: (Complete tricity Meter Manufact Kwatt Rate = Kr × 3 t ther Fuels Rate = Volume time How was the tes	ctest) = ct volume determined?	Type	Year of record valiable) tsecours =k rate lier_Kansas	Serial Noonds Nebraska	heat
Crops Irrig	cated: this year _ CORDS: (Complete tricity Meter Manufact Kwatt Rate = Kr × 3 t ther Fuels Rate = Volume time How was the tes	ctest) = ct volume determined?	Type	Year of record valiable) tsecours =k rate lier_Kansas	Serial No. onds - Nebraska	lividual meter
Crops Irrig	cated: this year _ CORDS: (Complete tricity Meter Manufact Kwatt Rate = Kr × 3 t ther Fuels Rate = Volume time How was the tes	ctest) = ct volume determined?	Type	Year of record valiable) tsecours =k rate lier_Kansas	Serial No. onds - Nebraska	lividual meter
Crops Irrig	cated: this year _ CORDS: (Complete tricity Meter Manufact Kwatt Rate = Kr × 3 t ther Fuels Rate = Volume time How was the tes	ctest) = ct volume determined?	Type	Year of record valiable) tsecours =k rate lier_Kansas	Serial No. onds - Nebraska	lividual meter
Crops Irrig	cated: this year _ CORDS: (Complete tricity Meter Manufact Kwatt Rate = Kr × 3 t ther Fuels Rate = Volume time How was the tes	ctest) = ct volume determined?	Type	Year of record valiable) tsecours =k rate lier_Kansas	Serial No. onds - Nebraska	WATER RESOURCE RECEIVED
Crops Irrig FUEL REC SA OI REMARKS Person pres	cated: this year _ CORDS: (Complete tricity Meter Manufact Kwatt Rate = Kr × 3 t ther Fuels Rate = Volume time How was the test S: See a Hase sent at test	lete only if water use in Supplier Urer Type Natura (test) = et volume determined? Acal sheet S	Type revolutions Sw/hr Ho Gas Suppl Not Deter	Year of record valiable) tsecons =k rate lier_Kansas mined Eng	Serial No. Serial No. onds - Nebraska ine not on ind year of re	WATER RESOURCE RECEIVED JUN 2 9 2015 KSDEPT OF AGRICULTURE
Crops Irrig FUEL REC SA OI REMARKS Person pres	cated: this year _ CORDS: (Complete tricity Meter Manufact Kwatt Rate = Kr × 3 t ther Fuels Rate = Volume time How was the test S: See a Hase sent at test	lete only if water use in Supplier Urer Type Natura (test) = et volume determined? Acal sheet S	Type revolutions Sw/hr Ho Gas Suppl Not Deter	Year of record valiable) tsecons =k rate lier_Kansas mined Eng	Serial No. Serial No. onds - Nebraska ine not on ind year of re	WATER RESOURCE RECEIVED JUN 2 9 2015 KSDEPT OF AGRICULTURE
Crops Irrig FUEL REC SA OI REMARKS Person pres	cated: this year _ CORDS: (Complete tricity Meter Manufact Kwatt Rate = Kr × 3 t ther Fuels Rate = Volume time How was the test S: See a Hase sent at test	lete only if water use in Supplier Urer Type Natura (test) = et volume determined? Acal sheet S	Type revolutions Sw/hr Ho Gas Suppl Not Deter	Year of record valiable) tsecons =k rate lier_Kansas mined Eng	Serial No. Serial No. onds whr = Nebraska ine not on ind year es re	WATER RESOURCE RECEIVED JUN 2 9 2015 KSDEPT OF AGRICULTURE



APPLICATION NO: 21730

AME: Connecticut General Life Ins

DIVERSIONSION AND SECTION CORNERS

The actual section corners of the land applied for and the land irrigated have never been dearly marked. (If it was marked at some time, we, nor the present owners and managers could find any marks or records) It appears the land described on the applications was based on visible marks, but we don't know for sure. It might have been surveyed and be more accurate than our method of identifying section corners. Our procedure of finding the section corners consisted of several steps. First, we used copies of the original survey plats to find the dimension of each section. Second, we laid out each section on the large small-scale photos in the ASCS office. For this, we used not only survey plat dimensions, but also by drawing lines across several miles from identifiable boundaries. However, sometimes these points made a section so "out-of-square" that we shifted the boudaries until they were reasonably tolerable. Because some of these marks were based on our judgement, we can not be sure they would be the same if the land was surveyed. These points were then transfered to the large-scale photos included.

The point of diversion location on the photo is correct. The photos were taken at a time when the diversion points were visible. The problem is in our ability to correctly describe the diversion points in relation to section

PUMPING PLANT TESTING, INC

RECEIVED Reviewed by:

SEP 1 4 1987

Professional Enginee HAWATE

MICROFILMED

JUN **2 9** 2015

SCANNED

KS DEPT OF AGRICULTURE

APPLICATION NO: 21, 730

NAME: CONNECTICUT GENERAL LIKE

NOTES ON CHOUSING A YEAR OF RECORD

THIS DEVELOPMENT HOSS HOSD SEVERAL DWINELS SINCE ITS
IN CEPTION IN 1975, WITH UNINELS FROM EUROPE & ALRUND THE
U.S. AT VOLUNGSTIMES, A STATE OF CONFUSION HOSS EMISTRO
IN THE CAPP PROJUCTION REFURT. ML OF THE WATER USE
1000 REQUIPMENT RECORDS HOSTE BREN ATTHER DESTROYED
OR LOST, BYO THE SYSTEMS AND PUMPING PLANT UMPONEUTS
1700LE BREN INTERCUMBINGAD ONER THE YEARS.

SINCE LATE 1983, CONNECTICUT GENERAL HAS MADE A DILICENT REFORT TO KEEP GOOD RECROS. THERE FARE, IT WOULD SEEM REBSTUBBLE TO USE THE YEARS SINCE 1983 IN CHOOSING A YEAR OF RECRO.

WATER RESOURCES

JUN 2 9 2015

KS DEPT OF AGRICULTURE





SCANNED

RECEIVED

PUMPING PLANT TESTING, INC.

SEP 14 198 eviewed by:

ill). W. SHAYSOOOT

Professional Engineer

- DIVISION OF WATER RESOURCES Page 22 of 38 STAFFORD

APPLICATION NO: 21730 NAME: Connecticut General Life Insurance

COLLINS METER TEST Collins Meter No. 1-83 Meter Calibration Factor .9559 Pipe Inside Diameter (inches) 73/4 Flow Rate Factor 145/4 Test Pressure (psi) 70 Test RPM, Pump 1762 Description of Test Location In horizontal pipe between pump and pivat

ST DATA: Q_ Check, Meter Setting From Center of Pipe	Initial <u> </u>	ity of Pipe Side if	Vel Right Si (or Bad	S/7/ locity ide of Pipe ck Side if ical Test)
1%6	5,89	5,82	5.88	5,85
23/4	5.84	5.81	5.80	5.75
3%	5,61	5,31	5,18	5,54
Average Unlamit.	ne Hotas m Co	f U-1	12 -	5,69

Average Velocity of Water = Sum of Vel. - 12 = 5.69

Corrected Ave. Vel. = (Ave. Vel.) \times (Calibration Factor) = $\frac{5.69}{1.9559} \times \frac{1.9559}{1.9559} = \frac{5.49}{1.9559} \times \frac{1.9559}{1.9559} = \frac{1.955$

Flow Rate = (Corrected Ave. Vel.) \times (Flow Rate Factor) = $\frac{5.99}{4} \times \frac{195.9}{4} = \frac{791}{4} \times \frac{195}{4} \times \frac{$

SEP 14 SE

PUMPING PLANT TESTING, INC.

Reviewed By:

is me

SCANNED

Professional Engineer

WATER RESOURCES
RECEIVED

HAYS000753

O FIELD WATER RES

Page 23 JUN **2 9 2015**

MICROFILMED



THE STATE



OF KANSAS

STATE BOARD OF AGRICULTURE Sam Brownback, Secretary

DIVISION OF WATER RESOURCES David L. Pope, Chief Engineer

CERTIFICATE OF APPROPRIATION FOR BENEFICIAL USE OF WATER

WATER RIGHT, File No. 21.730 PRIORITY DATE January 2, 1974

WHEREAS, It has been determined by the undersigned that construction of the appropriation diversion works has been completed, that water has been used for beneficial purposes and that the appropriation right has been perfected, all in conformity with the conditions of approval of the application pursuant to the water right referred to above and in conformity with the laws of the State of Kansas,

Now, THEREFORE, Be It Known that DAVID L. POPE, the duly appointed, qualified and acting Chief Engineer of the Division of Water Resources of the Kansas State Board of Agriculture, by authority of the laws of the State of Kansas, and particularly K.S.A. 82a-714, does hereby certify that, subject to vested rights and prior appropriation rights, the appropriator is entitled to make use of groundwater in the drainage basin of the Arkansas River to be withdrawn by means of a well located in the Northwest Quarter of the Northeast Quarter of the Southwest Quarter (NW NE% SW%) of Section 30, more particularly described as being near a point 2,330 feet North and 3,937 feet West of the Southeast corner of said Section, in Township 25 South, Range 19 West, Edwards County, Kansas, at a diversion rate not in excess of 795 gallons per minute (1.77 c.f.s.) and in a quantity not to exceed 176 acre-feet per calendar year for irrigation use on the following described property:

23.00 acres in Lot 2 (SW4 NW4), 22.00 acres in the Southeast Quarter of the Northwest Quarter (SE% NW%), 34.00 acres in the Northeast Quarter of the Southwest Quarter (NE's SW's), 34.75 acres in Lot 3 (NW% SW%), 2.00 acres in Lot 4 (SW% SW%), 1.00 acres in the Southeast Quarter of the Southwest Quarter (SE& SW4),

a total of 116.75 acres in Section 30, Township 25 South, Range 19 West, Edwards County, Kansas.

> WATER RESOURCES RECEIVED

> > JUN **2 9** 2015

SEP 14 1987

RECEIVED

KS DEPT OF AGRICULTURE

MICROFILMED CALLET OF WATER HELDURCES WATER REST Startoad Page 24 of 38

HAYS000776

SCANNED

(OVER)

The appropriator shall maintain in an operating condition, satisfactory to the Chief Engineer, all check valves installed for preventing chemical or other foreign substance pollution of the water supply.

The appropriator shall maintain records from which the quantity of water actually diverted during each calendar year may be readily determined. Such records shall be furnished to the Chief Engineer within 30 days of receipt of the annual water use report form.

The appropriation right as perfected is appurtenant to and severable from the land herein described.

The appropriation right shall be deemed abandoned and shall terminate when without due and sufficient cause no lawful beneficial use is made of water under this appropriation for three (3) successive years.

The right of the appropriator shall relate to a specific quantity of water and such right must allow for a reasonable raising or lowering of the static water level and for the reasonable increase or decrease of the stream flow at the appropriator's point of diversion.

IN WITNESS WHEREOF, I have hereunto set my hand at my office at Topeka, Kansas, this 31st day of August, 1987.

DAVID L. POPE

Chief Engineer

Division of Water Resources

CHIEF ENGINEER

BOARD OF WATER FOR THE STATE OF THE ST

The foregoing instrument was acknowledged before me this 31st day of August , 1987 by David L. Pope, P.E., Chief Engineer, Division of Water Resources, Kansas State Board of Agriculture.

STATE OF KANSAS, Shawnee COUNTY, ss.

NOTARY Denise J. Waters, Notary Public

day of COUNTY, SS. (Record in the Office of Register of Deeds in the county Ë counties wherein the point of diversion is located) WATER APPROPRIATION WATER RESOURCES o'clock STATE OF KANSAS Register of Deeds. CERTIFICATE 21,730 RECEIVED JUN 2 9 2015 No. 16,465 Water Right, File No. Safe 52 of 38 And 56 Bage 52 of Kansas, Filed for record this recorded in Book KS DEPT OF AGRICULTURE HAYS00077 SCANNED Fee 21730



KANSAS STATE BOARD OF AGRICULTURE Division of Water Resources

MEMORANDUM



TO: File DATE: July 9, 1987

FROM: Larry M. Sheets

Appropriation of Water RE:

File No. 21.730

The Field Inspection Report (F.I.R.) for the above referenced file, conducted under contract by Pumping Plant Testing, has been reviewed. It meets the requirements specified in the scope of work. Based on the 1985 Water Use Report (W.U.R.), 1,850 hours of pumping the well in the NW4 NE4 SW4 of Sec. 30, T 25 S, R 19 W, Edwards County, Kansas, provided 269 acre-feet of water for irrigating 117 acres or 2.30 acre-feet per acre. The Certificate of Appropriation has been drafted for the tested pumping rate rounded up to 795 g.p.m. and a reasonable quantity for the approved acres irrigated (117 x 1.5 = 176).

The section is along the Arkansas River, and has lots along the West side. The lot designations have been incorporated in the description of the place of use.

The information gathered by Pumping Plant Testing indicates one of two wells which were approved was not drilled. Jerry Weaver of Agri. Affiliates (managers of the land) confirmed that only one well existed for use under File No. 21,730. The deletion of one well will be noted in the draft Certificate of Appropriation transmittal letter.

The F.I.R. notes the possibility that 2 additional acres are being irrigated. This is in an area of the state where section corners are difficult to define. There was some confusion (the application has revised figures) as to the acres intended to be irrigated on the original application. The place of use has been described in lots with the appropriate acreage as listed in item 6 of the application.

Concern regarding the location of the existing well resulted in the contract firm submitting a second F.I.R. The description of the well location has been left as approved (NW1 NE1 SW2).

RECEIVEDRY on that

RECEIVED

WATER RESOURCES

JUN 2 9 2015

GRICULTURE

Larry M. Sheets SEP 14 198 Aydrologist

LMS: rk

DIVISION OF WATER RESOURCES Page 126- p. 5385

MICHOPILINED SCANNED

EXHII	ВІТ
· G	21730

NW-NE-SW-30 25-19W-02

	ATION OF WATI	ER USE:				
	Year	Hours Punped	Reported Pumping Rate	Water Used	Acres Irrigated	
y r		(hr)	(gpm)	(AF)		
	1975					
	1976	1.				
	1977	875	800		175	
	1978		·····			
	1979					
	- 1980	1416	650		65	
	- 1981	1152	550		116	
	1982					
	1983	1/30	700		119	
	1984	1700**	850 **		119**	
	* 1985	1850 **	791*		119##	
	1986		791*			
		* obtained	1 0 10		146	
			•	•		
		*# ODUAL	T-COM WH	N SERV DO M	s from Terry	
Crops Irr	Year of Record wingated: this year _ ECORDS: (Comp	0.00		Year of record	ford Files Alfalfa + W	theat
Crops Irr	igated: this year _	Alsalsa slete only if water use in Supplier	nformation is not a	Year of record		s heat
Crops Irr	rigated: this year _ ECORDS: (Comp Electricity Meter Manufact	Alsa salete only if water use in Supplier turer t/rev r	nformation is not av Type_ revolutions	Year of record vailable)	Serial No	i heat
Crops Irr	rigated: this year _ ECORDS: (Comp Electricity Meter Manufact	# \$a \$a Supplier turer t/rev	Typerevolutions	Year of record vailable) tsecond ours =k rate	Serial No	i heat
Crops Irr	rigated: this year _ ECORDS: (Comp Electricity Meter Manufact	# \$a \$a Supplier turer t/rev	Typerevolutions	Year of record vailable) tsecond ours =k rate	Serial No	i heat
Crops Irr	rigated: this year _ ECORDS: (Comp Electricity Meter Manufact K wat $Rate = \frac{Kr \times 3}{t}$ Other Fuels	Alsa) fa slete only if water use in Supplier turer t/rev r 1.6 = Type Nat usa	Typerevolutions	Year of record vailable) tsecond ours =k rate	Serial No	i heat
Crops Irr	ECORDS: (Comp Electricity Meter Manufact Kwat Rate = Kr × 3 t Other Fuels Rate = Volume	flete only if water use in Supplier turer t/rev Type Nat usa c (test) =	Typerevolutions	Year of record vailable) tseconds: burs =k rate	Serial Noonds w-hr =	
Crops Irr	ECORDS: (Comp Electricity Meter Manufact Kwat Rate = Kr × 3 t Other Fuels Rate = Volume	flete only if water use in Supplier turer t/rev Type Nat usa c (test) =	Typerevolutions	Year of record vailable) tseconds: burs =k rate	Serial Noonds w-hr =	
Crops Irr	ECORDS: (Comp Electricity Meter Manufact Kwat Rate = Kr × 3 t Other Fuels Rate = Volume	Alsa) fa slete only if water use in Supplier turer t/rev r 1.6 = Type Nat usa	Typerevolutions	Year of record vailable) tseconds: burs =k rate	Serial Noonds w-hr =	
Crops Irr	ECORDS: (Comp Electricity Meter Manufact Kwat Rate = Kr × 3 t Other Fuels Rate = Volume	flete only if water use in Supplier turer t/rev Type Nat usa c (test) =	Typerevolutions	Year of record vailable) tseconds: burs =k rate	Serial Noonds w-hr =	dividual meter
Crops Irr	ECORDS: (Comp Electricity Meter Manufact Kwat Rate = Kr × 3 t Other Fuels Rate = Volume	flete only if water use in Supplier turer t/rev Type Nat usa c (test) =	Typerevolutions	Year of record vailable) tseconds: burs =k rate	Serial Noonds w-hr =	dividual meter
Crops Irr	ECORDS: (Comp Electricity Meter Manufact Kwat Rate = Kr × 3 t Other Fuels Rate = Volume	flete only if water use in Supplier turer t/rev Type Nat usa c (test) =	Typerevolutions	Year of record vailable) tseconds: burs =k rate	Serial Noonds w-hr =	WATER RESOURCE
Crops Irr	ECORDS: (Comp Electricity Meter Manufact Kwat Rate = Kr × 3 t Other Fuels Rate = Volume	flete only if water use in Supplier turer t/rev Type Nat usa c (test) =	Typerevolutions	Year of record vailable) tseconds: burs =k rate	Serial Noonds w-hr =	WATER RESOURCE
Crops Irr FUEL R	rigated: this year _ ECORDS: (Comp Electricity Meter Manufact Kwat Rate = Kr × 3 t Other Fuels Rate = Volume tim How was the test KS: See Allas	Alsa) fa slete only if water use in Supplier threv r S.6 = Type Natura c (test) = est volume determined? Aca sheet S	Typerevolutions w/hr Ho Gas_Suppl Not Deter	Year of record vailable) tsecond rate lier_Kansas minad Eng	Serial Noonds w-hr = - Nebraska ine not on ine year of t	WATER RESOURCE RECEIVED JUN 2 9 2015
Crops Irr FUEL R	ECORDS: (Comp Electricity Meter Manufact Kwat Rate = Kr × 3 t Other Fuels Rate = Volume tim How was the test KS: See A Has	Alsa) fa slete only if water use in Supplier turer t/rev Type Natusa c (test) = 1 st volume determined? Alsa sheet 5	Type	Year of record vailable) tsecond rate purs =k rate lier_Kansas oncheesir	Serial No onds whr = - Nebroska ine not on in year or r	WATER RESOURCE RECEIVED JUN 2 9 2015 KS DEPT OF AGRICULTUM Anager
Crops Irr FUEL R	ECORDS: (Comp Electricity Meter Manufact Kwat Rate = Kr × 3 t Other Fuels Rate = Volume tim How was the test KS: See A Has	Alsa) fa slete only if water use in Supplier turer t/rev Type Natusa c (test) = 1 st volume determined? Alsa sheet 5	Type	Year of record vailable) tsecond rate purs =k rate lier_Kansas oncheesir	Serial No onds whr = - Nebroska ine not on in year or r	WATER RESOURCE RECEIVED JUN 2 9 2015 KS DEPT OF AGRICULTUM Anager
REMARK Person pr Water Us Conducte	ECORDS: (Comp Electricity Meter Manufact Kwat Rate = Kr × 3 t Other Fuels Rate = Volume tim How was the test KS: See A Has	Alfa) fa slete only if water use in Supplier turer t/rev r S.6 = Type Natura e (test) = e st volume determined? Aca sheet Kent Naber Ly le Kolbeck Srag Eleck	Type	Year of record vailable) tsecond rate frate k rate k	Serial No onds whr = - Nebroska ine not on in year or r	WATER RESOURCE RECEIVED JUN 2 9 2015 KSDEPT OF AGRICULTUM Anager 5-2803

Kansas State Board of Agriculture Division of Water Resources

ADMINISTRATIVE POLICY No.86-8

Subject:

Allowable Rates of Diversion and Maximum Annual Quantities for

Irrigation Use - Permits and Approvals

Reference:

K.S.A. 82a-708a and K.A.R. 5-3-1

Date:

November 5, 1986

History:

Effective November 5, 1986

Approved by:

David L. Pope

Chief Engineer

During the review of an APPLICATION FOR PERMIT TO APPROPRIATE WATER FOR BENEFICIAL USE for irrigation purposes the following guidelines shall be considered in determining the maximum reasonable rate of diversion to be allowed under any APPROVAL OF APPLICATION AND PERMIT TO PROCEED:

Area, Place of use

Max. Allowable Rate

	10 a		5
10 -	40 ac	res	
40 -	120 a	cres	5
more	than	120	acres

450	450
450 g.p.m.	900
(+) 450 g.p.m.	550 + 8X
(+) 450 g.p.m. (+) 8 g.p.m./acre (+) 7 g.p.m./acre	700+7X

EXAMPLES:

- A. 37 acres requested; since this area is less than 40 acres, a rate of up to 900
- B. 83 acres requested;

A further limiting factor of this procedure is the availability of water from the proposed source of supply. In those instances whereby the source of supply is incapable of yielding a reasonably, sustainable (computed) rate, then the sourcey becomes a further limiting factor.

A further limiting factor is well design and equipment, which shall be reasonable to divert the requested rate.

WATER RESOURCES
RECEIVED

Administrative Policy No. 86-8 Page 2

Further, the rate authorized should not impair senior water rights in the area, including domestic rights.

In reviewing an APPLICATION FOR PERMIT TO APPROPRIATE WATER FOR BENEFICIAL USE for irrigation purposes, the following guidelines shall be considered when determining a maximum allowable annual quantity of water request:

In that area of Kansas located between the Kansas/Missouri border and the Range 5 East/Range 6 East line, the maximum allowable quantity shall not exceed an average of 1.00 acre-foot per acre to be irrigated.

In that area of Kansas located between the Range 5 East/Range 6 East Line and the Range 20 West/Range 21 West line, the maximum allowable quantity shall not exceed an average of 1.50 acre-feet per acre irrigated.

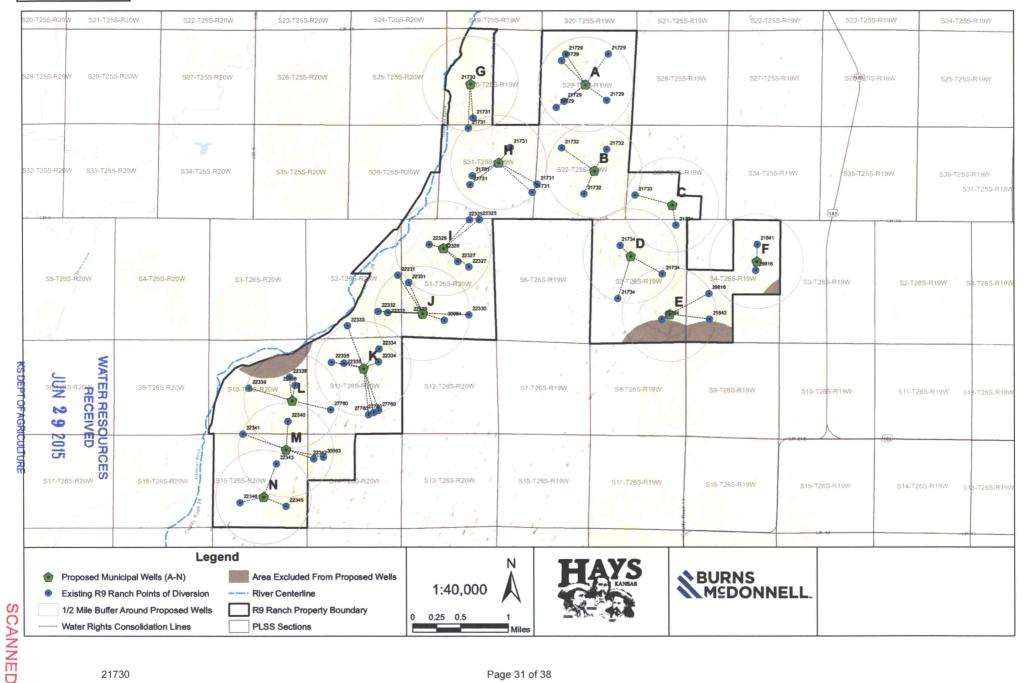
In that area of Kansas located between the Range 20 West/Range 21 West line and the Kansas/Colorado border, the maximum allowable quantity shall not exceed an average of 2.00 acre-feet per acre irrigated.

A further limiting factor to maximum allowable quantity is the availability of water from the proposed source of supply. If the source of supply is incapable of yielding a reasonably, sustainable (computed) quantity during the irrigation season in that area of the state, then the source becomes a further limiting factor.

That if an applicant can show that his or her system design is reasonable for the use intended and approval of the proposed rate and/or maximum annual quantity will not impair any senior water right or prejudicially and unreasonably affect the public interest, the Chief Engineer may waive the above guidelines. Documentation shall be placed in the file clearly demonstrating any exceptions to the above policy.

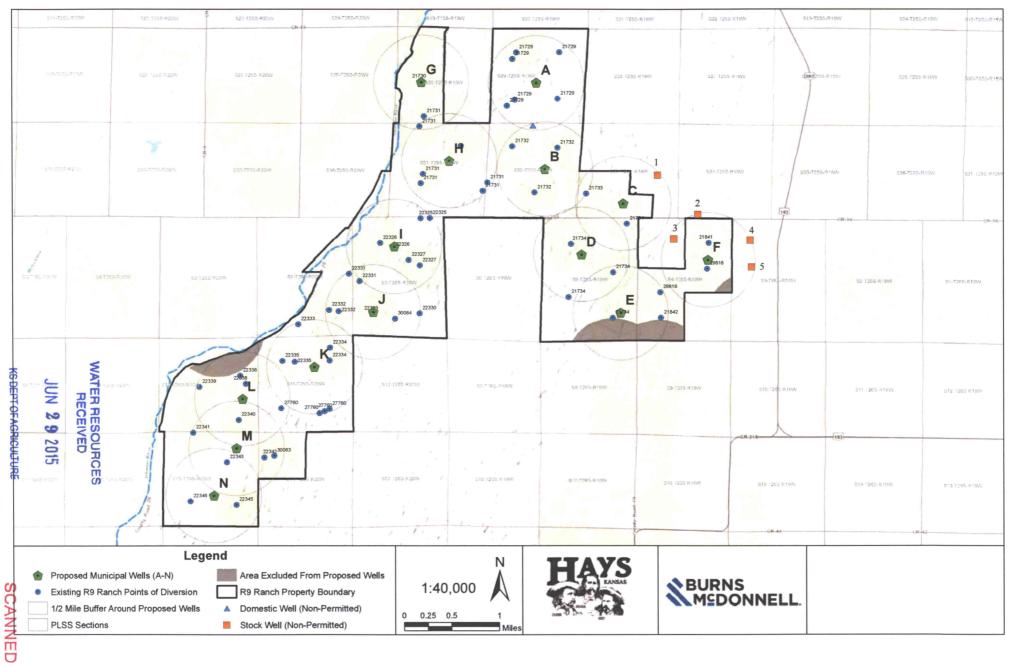
WATER RESOURCES
RECEIVED

SCANNED JUN 2 9 2015



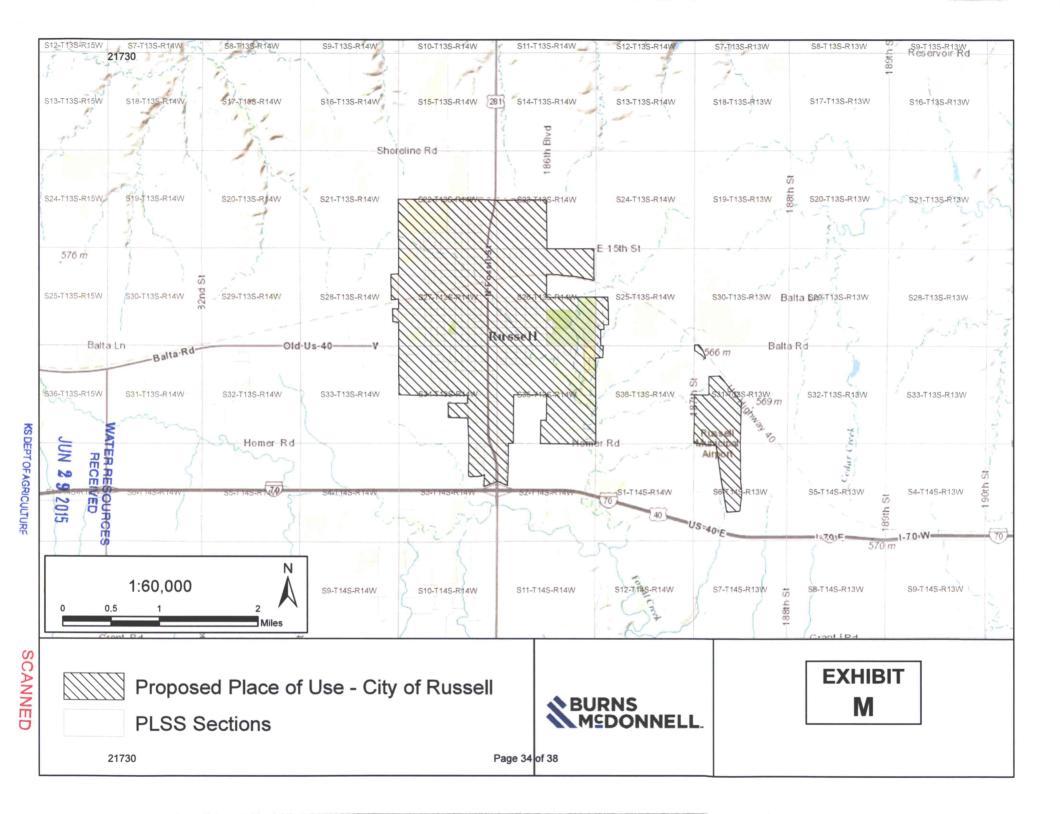
21730 Page 31 of 38





21730 Page 32 of 38

SCANNED



21730 Applicant's Name	City Of Hays KS	
	(Please Print)	

MUNICIPAL (PUBLIC WATER SUPPLY) APPLICATION SUPPLEMENTAL INFORMATION SHEET

Application File Number

(assigned by DWR)

SECTION 1: PRESENT WATER USE SUMMARY (IF NO PREVIOUS MUNICIPAL WATER USE HAS BEEN UTILIZED, PROCEED TO SECTION 3) NOTE: WORKSHEET FOR WATER PUMPED, PURCHASED, AND SOLD BY YOUR WATER DISTRIBUTION SYSTEM.

Column 1	Column 2	Column 3	Column 4	Column 5 Water Sold to Your	Column 6	Column 7	
Raw Water Diverted Under Your Rights	Water Purchased From All Sources	Water Sold to Other Public Water Suppliers	Water Sold to Your Industrial, Stock, and Bulk Customers	Industrial, Stock, and	Residential and Commercial Customers	Other Metered Water	Remaining Water Used (See Below Explanation)
684,559,000			10,806,000	595,254,000	16,327,000	62,172,000	
TOTAL WATER = Columns 1 + 2 ACCO			ACCOUNTED FOR WATER	= Columns 3 + 4 + 5 + 6		UNACCOUNTED FOR WATER	

UNACCOUNTED FOR WATER = TOTAL WATER - ACCOUNTED FOR WATER

- Column 1: The amount of raw water diverted from all of your points of diversion.
- Column 2: The amount of water purchased wholesale from all other public water supply systems or the Kansas Water Office.
- Column 3: The amount of water sold wholesale to all other public water supply systems.
- Column 4: The amount of water sold retail to all industrial, pasture, stockwater, feedlot, and bulk water service connections. Include the amount of water sold to all farmsteads using at least 200,000 gallons of water per year.
- Column 5: The amount of water sold retail to your residential and commercial customers and to industries and farmsteads using less than 200,000 gallons of water per year.
- Column 6: The amount of water used that is metered at individual service connections and supplied free, such as for public service, treatment processes, and connections receiving free water.
- Column 7: The amount of remaining water used. The gallons reported in this column are found by adding the numbers in Columns 1 and 2 and subtracting the numbers in Columns 3, 4, 5, and 6.

UNACCOUNTED FOR WATER

Use the following to calculate your distribution system's Unaccounted For Water:

Start with the amount in Column 1 and add the amount in Column 2, then subtract the amounts in Column 3, 4, 5, and 6 leaving an amount of water representing your unaccounted for water to enter in Column 7.

Use the following to calculate the percent Unaccounted For Water versus the Total Water of your system:

Percent Unaccounted = <u>Unaccounted For Water</u> x 100

For Water Total Water (Columns 1,2)
If this number exceeds 20%, please explain the large amount of unaccounted for water and describe any steps being taken to reduce it.

EXHIBIT **N**

SECTION 2: PAST WATER USE

COMPLETE THE FOLLOWING TABLE FROM YOUR PAST WATER USE RECORDS.

Z	22 22	Om LLIL IIILI OLLO	WING TABLE FROM	NOM FOR FACE WATER SEE RESORDS.					
29	RES	Column 1	Column 2	Column 3	Column 4 Water Sold to Your	Column 5 Water Sold to Your	Column 6	Column 7	
20	VED	Raw Water Diverted Under Your Rights	Water Purchased From All Sources	Water Sold to Other Public Water Suppliers	Industrial, Stock, and Bulk Customers	Residential and Commercial Customers	Other Metered Water	Remaining Water Used (See Above Explanation)	
<u>ت</u> 20) years)ago	592,323,000			5,029,000	469,314,000	5,155,000	112,825,000	
1:	years)ago	780,527,000			10,619,000	587,965,000	10,470,000	171,473,000	
10) years ago	706,926,000			7,103,000	639,222,000	20,861,000	39,740,000	
5 years ago 693,90		693,966,000			13,537,000	581,900,000	19,362,000	114,383,000	
		TOTAL WATER	= Columns 1 + 2	A	CCOUNTED FOR WATER	= Columns 3 + 4 + 5 + 6		UNACCOUNTED FOR WATER	

2 9 2015

217	30			
SECTION 3:	30 PROJECTED	FUTURE	WATER N	REEDS

	PLEASE COMPLETE THE	FOLLOWING TABLE	DWING TABLE SHOWING YOUR FUTURE WATER REQUIREMENTS FOR THE NEXT 20 YEARS:					
	Column 1	Column 2	Column 3	Column 4	Column 5	Column 6	Column 7	
	1			Water Sold to Your	Water Sold to Your			
	Raw Water Diverted	Water Purchased	Water Sold to Other	Industrial, Stock, and	Residential and	Other	Remaining Water Used	
	Under Your Rights	From All Sources	Public Water Suppliers	Bulk Customers	Commercial Customers	Metered Water	(See Explanation on other side)	
Year 5	753,014,900			11,886,600	654,779,400	17,959,700	68,389,200	
Year 10	828,316,390			13,075,260	720,257,340	19,755,670	75,228,120	
Year 15	911,148,029			14,382,786	792,283,074	21,731,237	82,750,932	
Year 20	1,002,262,832			15,821,065	871,511,381	23,904,361	91,026,025	
	TOTAL WATER =	Columns 1 + 2	ACCOUNTED FOR WATER = Columns 3 + 4 + 5 + 6			UNACCOUNTED FOR WATER		

SECTION 4: POPULATION AND SERVICE CONNECTIONS ESTIMATE THE NUMBER OF PERSONS DIRECTLY SERVED BY YOUR WATER DISTRIBUTION SYSTEM

PAST POPULATION - PROVIDE INFORMATION BELOW: (CENSUS BUREAU INFORMATION)

LAST 20 YEARS	POPULATION		
20 years ago	17,636		
15 years ago	18,750		
10 years ago	20,013		
5 years ago	20,106		
Last Year	21,038		

PROJECTED FUTURE POPULATION ESTIMATE FUTURE POPULATION AND SUBSTANTIATE NUMBERS ON SEPARATE ATTACHMENTS

NEXT 20 YEARS	POPULATION
Year 5	23,142
Year 10	25,456
Year 15	28,002
Year 20	30,802

Provide number o	f current a	ctive servic	e connecti	ons
------------------	-------------	--------------	------------	-----

6,824	Residential	2	Industrial		Other (specify)
1,256	Commercial		Pasture/	8,082	Total
			Stockwater/ Feedlot		

SECTION 5: PRESENT GALLONS PER PERSON PER DAY

CALCULATE YOUR GALLONS PER PERSON PER DAY

Water in Columns 5, 6, and 7 + Population + 365 Days/Year = Gallons per Person per Day

Year of Section 4

RECEIVED 673,753,000 ÷ 365 Days/Year = 88 GALLONS PER PERSON PER DAY. Amount of water in **Population from Last**

SECTION 6: AREA TO BE SERVED

Columns 5, 6, and 7

of Section 1

Describe the area to be served or provide the legal description of the location where the water is to be used including any other city of water supply system (i.e. Rural Water District): City of Hays, KS Municipal Water Supply

2013 is year one and 2033 will be year twenty. 2 percent growth is used for estimate. Hays had a reasonable 9.1 percent unaccounted water in 2013.

You may attach additional information you believe will assist in informing the Division of the need for your request.

21730

•
T
111
U
_
0
\mathbf{T}
7
-
ഗ
77
~
C
-
-
~
\mathbf{m}

7 Ippilodilito Italiio	(Please Print)	
Applicant's Name	City of Russell	
21730		

MUNICIPAL (PUBLIC WATER SUPPLY) APPLICATION SUPPLEMENTAL INFORMATION SHEET

Application	File	Number	
(assigned	1 by I	NWR)	

EXHIBIT

SECTION 1: PRESENT WATER USE SUMMARY (IF NO PREVIOUS MUNICIPAL WATER USE HAS BEEN UTILIZED, PROCEED TO SECTION 3) NOTE: WORKSHEET FOR WATER PUMPED, PURCHASED, AND SOLD BY YOUR WATER DISTRIBUTION SYSTEM.

Column 1	Column 2	Column 3	Column 4	Column 5	Column 6	Column 7
Raw Water Diverted	Water Purchased	Water Sold to Other	Water Sold to Your Industrial, Stock, and	Water Sold to Your Residential and	Other	Remaining Water Used
Under Your Rights	From All Sources	Public Water Suppliers	Bulk Customers	Commercial Customers	Metered Water	(See Below Explanation)
327,288,100	0	0	105,295,000	108,743,000	19,944,000	93,306,100
TOTAL WATER =	Columns 1 + 2		ACCOUNTED FOR WATER	t = Columns 3 + 4 + 5 + 6		UNACCOUNTED FOR WATER

UNACCOUNTED FOR WATER = TOTAL WATER - ACCOUNTED FOR WATER

- The amount of raw water diverted from all of your points of diversion.
- Column 2: The amount of water purchased wholesale from all other public water supply systems or the Kansas Water Office.
- The amount of water sold wholesale to all other public water supply systems. Column 3:
- The amount of water sold retail to all industrial, pasture, stockwater, feedlot, and bulk water service connections. Include the amount of water sold to all farmsteads using at least 200,000 gallons of Column 4:
- Column 5: The amount of water sold retail to your residential and commercial customers and to industries and farmsteads using less than 200,000 gallons of water per year.
- The amount of water used that is metered at individual service connections and supplied free, such as for public service, treatment processes, and connections receiving free water.
- Column 7: The amount of remaining water used. The gallons reported in this column are found by adding the numbers in Columns 1 and 2 and subtracting the numbers in Columns 3, 4, 5, and 6.

UNACCOUNTED FOR WATER

Use the following to calculate your distribution system's Unaccounted For Water:

Start with the amount in Column 1 and add the amount in Column 2, then subtract the amounts in Column 3, 4, 5, and 6 leaving an amount of water representing your unaccounted for water to enter in Column 7.

Use the following to calculate the percent Unaccounted For Water versus the Total Water of your system:

Recent Unaccounted = Unaccounted For Water x 100 For Water Total Water (Columns 1,2)

If this number exceeds 20%, please explain the large amount of unaccounted for water and describe any steps being taken to reduce it.

SECTION 2: PAST WATER USE COMPLETE THE

COMPLETE THE FOLLOWING TARLE FROM YOUR DAST WATER USE RECORDS

	OMPLETE THE FOLLOWING TABLE PROM TOUR PAST WATER USE RECORDS.						
NED /ED	Column 1	Column 2	Column 3	Column 4 Water Sold to Your	Column 5 Water Sold to Your	Column 6	Column 7
- R	Raw Water Diverted	Water Purchased	Water Sold to Other Public	Industrial, Stock, and Bulk	Residential and Commercial	Other	Remaining Water Used
П	Under Your Rights	From All Sources	Water Suppliers	Customers	Customers	Metered Water	(See Above Explanation)
20 years ago							
15 years ago	373,757,000	0	0	171,928,220	115,864,670	18,687,850	67,276,260
10 years ago	477,486,000	0	0	222,781,000	147,340,000	19.483,000	87,882,000
5 years ago	375,790,000	0	0	144,277,000	123,343,000	18,907,000	89,263,000
TOTAL WATER = Columns 1 + 2			A	CCOUNTED FOR WATER	= Columns 3 + 4 + 5 + 6		UNACCOUNTED FOR WATER

9 2015

SECTION 3: PROJECTED	
SECTION 3: PROJECTED	FUTURE WATER NEEDS

PLEASE COMPLETE THE FOLLOWING T	ABLE SHOWING YOUR FUTURE WATER REQUIREMENTS FOR THE NEXT 20	YEARS.

	LEASE COMPLETE THE FOLLOWING TABLE SHOWING YOUR FUTURE WATER REQUIREMENTS FOR THE NEXT 20 YEARS:						
	Column 1	Column 2	Column 3	Column 4	Column 5	Column 6	Column 7
				Water Sold to Your	Water Sold to Your		
	Raw Water Diverted	Water Purchased	Water Sold to Other	Industrial, Stock, and	Residential and	Other	Remaining Water Used
	Under Your Rights	From All Sources	Public Water Suppliers	Bulk Customers	Commercial Customers	Metered Water	(See Explanation on other side)
Year 5	386,346,512	0	0	177,719,396	119,767,419	15,453,861	73,405,836
Year 10	405,513,682	0	0	186,536,377	125,709,241	16,220,547	77,047,517
Year 15	426,310,852	0	0	196,102,992	132,156,364	17,052,434	80,999,062
Year 20	443,848,022	0	0	204,170,090	137,592,887	17,753,921	84,331,124
	TOTAL WATER = Columns 1 + 2 ACCOUNTED FOR WATER = Columns 3 + 4 + 5 + 6					UNACCOUNTED FOR WATER	

SECTION 4: POPULATION AND SERVICE CONNECTIONS ESTIMATE THE NUMBER OF PERSONS DIRECTLY SERVED BY YOUR WATER DISTRIBUTION SYSTEM

PAST POPULATION - PROVIDE INFORMATION BELOW: (CENSUS BUREAU INFORMATION)

LAST 20 YEARS	POPULATION		
20 years ago			
5 years ago	4,710		
0 years ago	4,696		
years ago	4,506		
ast Year	4,475		

PROJECTED FUTURE POPULATION ESTIMATE FUTURE POPULATION AND SUBSTANTIATE NUMBERS ON SEPARATE ATTACHMENTS

NEXT 20 YEARS	POPULATION		
Year 5	4,596		
Year 10	4,605		
Year 15	4,651		
Year 20	4,698		

Provide number of current active service connections:

	2,049	Residential	9	Industrial	30	Other (specify)	Free Service
	360	Commercial	0	Pasture/	2448	Total	
8				Stockwater/ Feedlot			

SECTION 5: PRESENT GALLONS PER PERSON PER DAY
CALCULATE YOUR GALLONS PER PERSON CALCULATE YOUR GALLONS PER PERSON PER DAY

Water in Columns 5, 6, and 7 + Population + 365 Days/Year = Gallons per Person per Day

 \div 365 Days/Year = 135.9 GALLONS PER PERSON PER DAY. Amount of water in Population from Last Columns 5, 6, and 7 Year of Section 4

SECTION 6: AREA TO BE SERVED

of Section 1

Describe the area to be served or provide the legal description of the location where the water is to be used including any other city of water supply system (i.e. Rural Water District): City of Russell Note that the actual quantity of "Unaccounted for Water" is lower than shown here. Large quantities diverted from the Pfeifer Wells are returned to the aquifer in the "Collector Well." See detailed explanation in the cover letter accompanying this application. Projected future water needs include losses in the collector well but when repaired or replaced, total raw water diversion will be reduced.