

MEMORANDUM

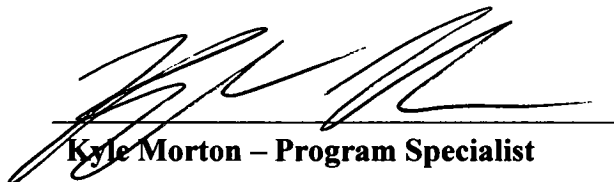
DATE: October 2, 2018
TO: AltEn LLC **FACILITY ID:** 84069
THRU: Todd Ellis
FROM: Kyle Morton
RE: Site visit - NEC 100118-KM-1119

On October 1, the Department received a Notification of Environmental Concern pertaining to the AltEn plant in Mead, Nebraska. The NEC was a compilation of fourteen email testimonials from residents of Mead complaining of health issues arising from AltEn's WDGS (wet distillers grains and solubles) piles stored on the north side of the facility property and recurring odor/fumes from this activity.

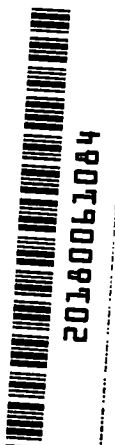
On October 2, David Adams and I, Kyle Morton, visited the site with a Jerome 631-X H₂S analyzer (S/N 1525 - see Attachment B for calibration sheet). During a previous site visit on August 13, the Jerome (S/N 1652) had measured elevated H₂S concentrations with peak concentration of 82 ppb. Data collected on October 2 showed peak H₂S concentration of 58 ppb. On both occasions, elevated H₂S concentrations tended to be routinely found when downwind of open waste lagoons shown on the overhead map in Attachment B. Sampling data for both dates is included in Attachment C.

Attachments

Attachment A – NEC-100118-KM-1119
Attachment B – Jerome 631-X calibration sheet – S/N 1525
Attachment C – Sampling locations map
Attachment D – Jerome H₂S Analyzer – Field Data Reports


Kyle Morton – Program Specialist

10/3/18
Date



Attachment A
Notification of Environmental Concern-100118-KM-1119



REPORT RECEIVED BY Kirk Morrow	DATE 10-01-2018	TIME 11:19 AM	REPORTED VIA E-mail	NOTIFICATION NUMBER 100118-KM-1119	NDEQ ID # 84069
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ANONYMOUS REPORT	CONFIDENTIAL REPORT No	KEEP REPORTING PARTY INFORMED Yes
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PROBLEM LOCATION

NAME	PROBLEM LOCATION	RESPONSIBLE PARTY	REPORTING PARTY
POSITION TITLE		Jim Stewart	Jody Weible
BUSINESS NAME	AltEn LLC	Vice President / Plant Manager	Resident (plus 13 others)
STREET OR PO BOX	1344 County Road 10	AltEn LLC	
ADDRESS LINE 2		1344 County Road 10	
CITY - STATE - ZIP	Mead NE 68041-4036	Mead NE 68041-4036	Mead
E-MAIL ADDRESS			jody_weible@yahoo.com
WORK PHONE			
CELL PHONE			
HOME PHONE			

COUNTY Saunders	DIRECTIONS From Airport,Hwy 92/77(Rd M)-3E,Rd 13-0.75S,W Side
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QUARTER N½, SW¼	SECTION 12	TOWNSHIP N 14	RANGE E 8	MARKER	MILE	ROAD NAME	LATITUDE 41.19714	LONGITUDE -96.48081
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LAKE ID	LAKE	RIVER BASIN (LAKE)
STREAM ID	STREAM	RIVER BASIN (STREAM)
HUC	HYDROLOGIC UNIT NAME	SUBDIVISION

OBSERVATIONS

WHAT IS THE PROBLEM?

form complaint 1 (of 14) - I have posted on Facebook asking people to contact me regarding toxic emissions from the composting at the ethanol plant. I will send you each response separately. ...

WHERE AT THE SITE IS THE PROBLEM?

DESCRIBE ANY APPARENT PATTERNS OVER TIME

really know if or how it affects my baby because he is pre-verbal and cannot voice his opinion yet. Thank you for your help in getting something done about stinky Mead!

FIRST OBSERVED	LAST OBSERVED	ONGOING SITUATION	HOW LONG	OCCURRING NOW	RESPONSE TIMEFRAME
07-12-2018 12:00 AM	09-29-2018 12:00 AM	Yes	6 Months		

AIR IMPACTED	LAND IMPACTED	WATER IMPACTED	SPILL OR RELEASE	FISH KILL	EVIDENCE OF ENVIRONMENTAL DAMAGE
Yes	Yes				

EVIDENCE OF ENVIRONMENTAL DAMAGE - EXPLANATION

Anna Stroebel, Levi Stroebel and children are adversely affected by the aroma coming from the composting because it gets into our trailer's AC unit and gets pumped throughout our home. It has led to headaches and upset stomachs in Levi and I and our older children (ages 6 and 3). I don't..

OTHER PERTINENT DETAILS

The complaints submitted via e-mail will be compiled and forwarded to the NDEQ Air and Land Division as well as the Water Permits Division for evaluation.

WHO ELSE DID THE REPORTING PARTY CONTACT ABOUT THIS PROBLEM?

NDEQ notification records have two previous records from citizens provided in April and July of 2018.

NDEQ PROGRAM REFERRALS

LEAD	PROGRAM ISSUE	PROG	PROGRAM ID	DATE CLOSED	REASON CLOSED	FIELD OFFICE
Yes	Dumping Waste	IWM				
	Air Emissions	AIR				
	Animal Feeding Operation	LWC		10-01-2018	No Jurisdiction	

OTHER AGENCIES NOTIFIED

DATE	AGENCY	DIVISION	PROGRAM	REFERENCE #
10-01-2018	HEALTH			DHHS HealthHazards-DHHS HealthHa
10-01-2018	HHSS	Regulation and Licensure	Indoor Air Quality	

Attachment B
Jerome 631-X – S/N 1525 calibration sheet



AMETEK ARIZONA INSTRUMENT
800.528.7411 | (f) 602.281.1745 | www.azic.com
Exclusive Manufacturer of Computrac® Moisture Analyzers
and Jerome® Mercury & Hydrogen Sulfide Analyzers

Certification of Instrument Calibration

AMETEK Arizona Instrument - Capital Equipment
3375 N. Delaware St.
Chandler, AZ 85225

RMA # 2579560

This is to certify that the Jerome X631 0101 Gold Film Hydrogen Sulfide Analyzer, Serial Number 1525, with Sensor Number 17-7-11-V2AS, was calibrated with standard units traceable to NIST.

Calibration Status as Received: N/A

		Actual	Calibration Gas	Allowable Range
Incoming:	Range 1	ppm H2S	ppm H2S	+/- 6%
	RSD %			<5%
Outgoing:	Range 1	0.490 ppm H2S	0.500 ppm H2S	+/- 6%
	RSD %	1.77		<5%

COPY

Calibration Status as Left: In Calibration

Estimated Uncertainty of Calibration System: 2.8%

Calibration Date: 03-Aug-2018 Recalibration Date: 02-Aug-2019

Temperature °F: 76.20 % Relative Humidity: 49.70

Approved By: Cheryl Hradek
Title: Cheryl Hradek - Quality Control

Date Approved: 08-Aug-2018

Equipment Used:

H2S Calibration Standard: CC-230020 NIST#: 1417575
Calibration Date: 30-May-2017 Calibration Date Due: 31-May-2020

Mass Flow Controller B: 124604 NIST#: 178012
Calibration Date: 13-Nov-2017 Calibration Date Due: 13-Nov-2018

Mass Flow Controller D: 124602 NIST#: 178002
Calibration Date: 13-Nov-2017 Calibration Date Due: 13-Nov-2018

Digital Multimeter: 66961028 NIST#: 7003079
Calibration Date: 16-Feb-2018 Calibration Date Due: 16-Feb-2019

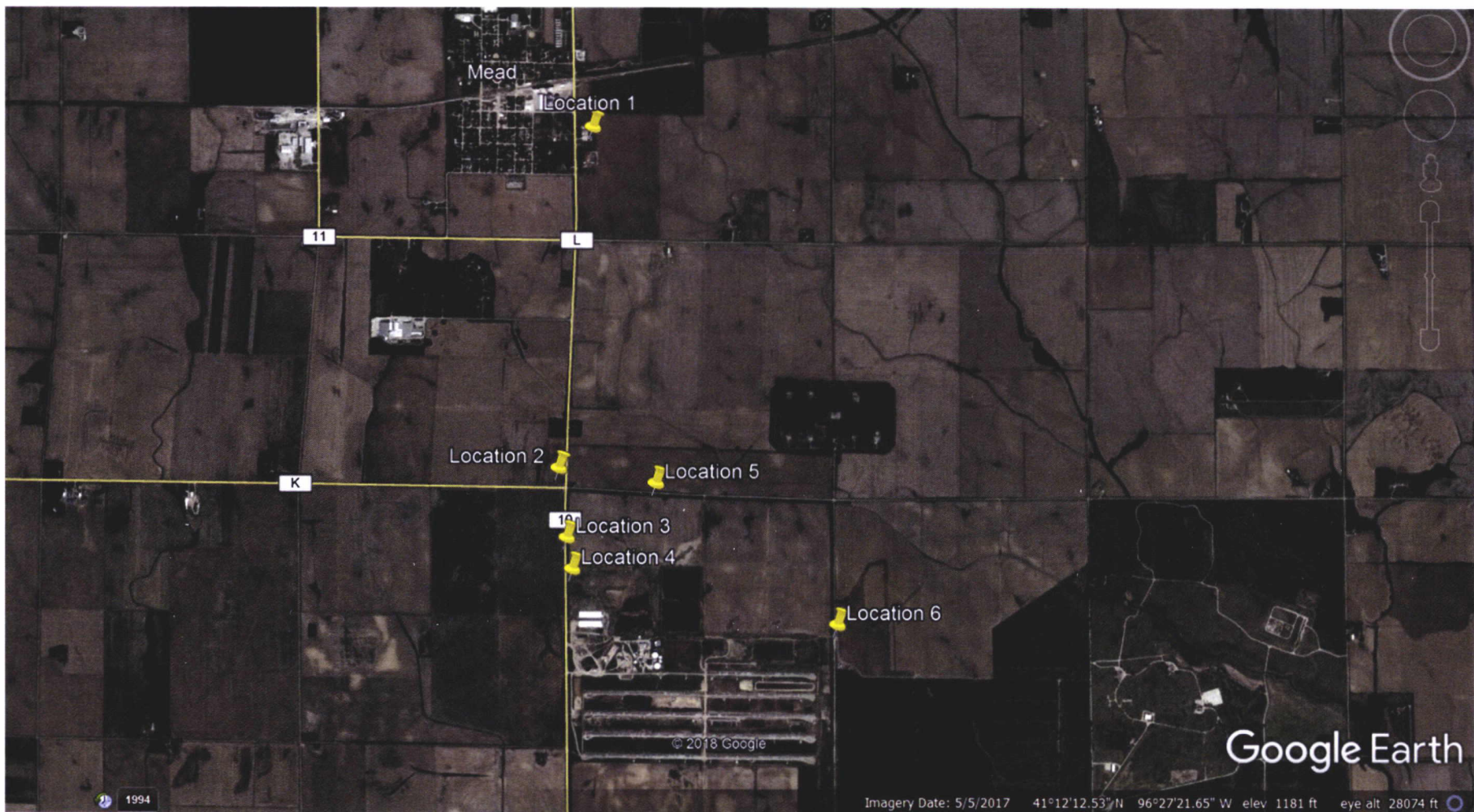
Flowmeter: US16G65993 NIST#: 1813; 1817; 1796
Calibration Date: 20-Oct-2017 Calibration Date Due: 21-Oct-2018

Calibration Procedure Used: 730-0032

AMETEK Arizona Instrument certifies that the above listed instrument meets or exceeds all published specifications and has been calibrated using standards whose accuracy are traceable to the NATIONAL INSTITUTE OF STANDARDS AND TECHNOLOGY within the limitations of the Institute's calibration services, or have been derived from accepted values of natural physical constants, or have been derived by the ratio type of self-calibration techniques.
Disclaimer: Any unauthorized adjustments, removal or breaking of QC seals, or other customer modifications on your Jerome Analyzer WILL VOID this factory calibration. Because any of the above acts could affect the calibration and readings of the instrument, their certification will no longer be valid and, further, AMETEK Arizona Instrument WILL NOT be responsible for any liabilities created as a result of using the instrument after such adjustments, seal removal, or modifications.
As long as a functional test is within range, according to the procedure outlined in the Operator's Manual, the instrument is performing correctly.

This document shall not be reproduced, except in full, without the written approval of AMETEK Arizona Instrument.

Attachment C
Sampling locations map



Attachment D
Jerome H₂S Analyzer – Field Data Reports

Appendix A- Jerome H₂S Analyzer - Field Data Report

Date: 8/13/18 **Sampler's Name:** Kyle Morton

Investigation Area: Mead, NE – adjacent to AltEn property

Jerome Analyzer SN: 1652 **Date of Calibration Check:** 12/29/2016

Wind Direction and Approximate Velocity: East-southeast ~5-10 mph

Recon Summary: Noticeable odor in adjacent to and downwind from outdoor wet cake storage piles on northern AltEn property

Date & Time of Analyzer Regenerations: Last Prior & any this day run of this day:
10:30AM – 8/13/18

Date & Time & Results from Field response Checks: n/a

Survey Results (1-minute average H₂S concentration estimation)

Site Location & Start Time # of sites surveyed: <u>1</u>	Individual H ₂ S Readings (ppm) (minimum 2 required)								Maximum
West side of County Road 10 – 5:00PM	0.069	0.067	0.082	0.059	0.061	0.060	0.036	0.070	0.082
	0.069	0.068	0.036	0.049	0.069	0.063	0.064	0.064	
	0.059	0.075	0.070	0.035	0.047	0.040	0.049	0.024	

Site Location & Start Time # of sites surveyed: <u> 6 </u>	Individual H2S Readings (ppm) (minimum 2 required)								Maximum
Location 1 – 8:55AM - parking lot off of Co Rd 10(background)	0.000	0.000							0.000
Location 2 –9:00AM – intersection Co Rds 10 & K	0.000	0.000							0.000
Location 3 – 9:05 – west side of Co Rd 10 at end of treeline	0.013	0.058	0.043	0.026	0.032	0.020	0.032	0.050	0.058
Location 4 – 9:10 – east side of Co Rd 10 adjacent to waste piles	0.029	0.014	0.007	0.005					0.029
Location 5 – 9:15 – Co Rd K next to water tower	0.003	0.000	0.000	0.000					0.003
Location 6 – 9:20 – service road east of property	0.000	0.000	0.000	0.000					0.000