TENTATIVE AGENDA
SCOTT COUNTY BOARD OF SUPERVISORS
February 23 - 27, 2015

Tuesday, February 24, 2015

Committee of the Whole - 8:00 am
Board Room, 1st Floor, Administrative Center

____ 1. Roll Call: Earnhardt, Kinzer, Hancock, Holst, Sunderbruch

Facilities & Economic Development

____ 2. Discussion of Public Hearing on the construction plans and specifications for the Secondary Roads Facility Expansion Project. (Item 2)

____ 3. Discussion of Public Hearing on the Construction Permit Application of Thomas Dittmer, dba Grandview Farms, Inc in the SW¼SW¼ Section 7, T79N, R3E (Sheridan Township) & SE¼SE¼ Section 12, T79N, R2E (Hickory Grove Township) for the expansion of a confined animal feeding operation located at 11872 & 12090 240th Street. (Item 3)

____ 4. Design Contract for Phase 3 and 4 of the Courthouse Renovation Project. (Item 4)

Human Resources

____ 5. Discussion of strategy of upcoming labor negotiations with the County's organized employees pursuant to Iowa Code Section 20.17(3). - CLOSED SESSION

Finance & Intergovernmental

____ 6. Budget amendment of the FY15 County Budget. (Item 6)

____ 7. Adopting the FY16 County Budget. (Item 7)

____ 8. FY15-16 Secondary Roads Budget and the 5 year construction program for the Department of Transportation. (Item 8)

____ 9. Classification and staffing adjustments as discussed during the fiscal year 2016 budget review process. (Item 9)

____ 10. Salary rate table for FY2015-2016 Z-Schedule of temporary and part-time staff. (Item 10)

____ 11. Adjustment in salary for non-represented county employees for fiscal year 2016. (Item 11)

____ 12. Fiscal year 2016 Compensation Schedule for county Elected Officials and Deputy Office Holders. (Item 12)

Other Items of Interest

____ 13. Board visits with various County Departments. (Item 13)

____ 14. Discussion of scheduling upcoming meetings with authorized agencies. (Item 14)

____ 15. Beer/liquor license renewal for Glynns Creek Golf Course.

____ 16. Adjourned.

Moved by _____ Seconded by _____
Ayes
Nays

Thursday, February 26, 2015

Regular Board Meeting - 5:00 pm
Board Room, 1st Floor, Administrative Center

Public Hearings

____ 1. Public hearing relative to an application for a state construction permit for the expansion of an existing confined animal feeding operation.

____ 2. Public Hearing relative to the Secondary Roads Facility Expansion Project.

Friday, February 27, 2015

Special Committee of the Whole - 10:30 am
Conference Room 605, 6th Floor, Administrative Center

____ 1. Roll Call: Earnhardt, Kinzer, Hancock, Holst, Sunderbruch

____ 2. Legislative Forum for State Legislators and Scott County Government.

____ 3. Other items of interest.

SCOTT COUNTY ENGINEER'S OFFICE
500 West Fourth Street
Davenport, Iowa 52801-1106

(563) 326-8640
FAX – (563) 326-8257
E-MAIL - engineer@scottcountyiowa.com
WEB SITE - www.scottcountyiowa.com

Item 02
02-24-15

JON R. BURGSTRUM, P.E.
County Engineer

BECKY WILKISON
Administrative Assistant

MEMO

TO: Dee F. Bruemmer
County Administrator

FROM: Jon Burgstrum, P.E.
County Engineer

SUBJ: PUBLIC HEARING – Facility Expansion Project

DATE: February 26, 2015

The Scott County Board of Supervisors will conduct a public hearing on Thursday, February 26, 2015 at 5:00 p.m., in the Board Room on the 1th Floor of the Administrative Center, 600 W. 4th St., Davenport, Iowa regarding the Secondary Road Facility Expansion Project. Plans and Specifications are on file in the County Engineer's Office and are available online. This hearing will be for the public and contractors to discuss the plans and specifications of the project. Estimated cost of the project is $2,200,000.

A resolution for approval will be on the Board's agenda following the public hearing.

THE COUNTY AUDITOR'S SIGNATURE CERTIFIES THAT THIS RESOLUTION HAS BEEN FORMALLY APPROVED BY THE BOARD OF SUPERVISORS ON _____.
DATE

_____
SCOTT COUNTY AUDITOR

R E S O L U T I O N

SCOTT COUNTY BOARD OF SUPERVISORS

FEBRUARY 26, 2015

A RESOLUTION APPROVING CONSTRUCTION PLANS & SPECIFICATIONS FOR EXPANSION OF THE SCOTT COUNTY MAINTENANCE FACILITY.

BE IT RESOLVED by the Scott County Board of Supervisors as follows:

Section 1. That the plans & specifications prepared by Kueny Architects, LLC, Pleasant Prairie, WI for expansion of the Scott County Maintenance Facility are hereby approved.

Section 2. That this resolution shall take effect immediately.

Item 03
02-24-15

PLANNING & DEVELOPMENT
500 West Fourth Street
Davenport, Iowa 52801-1106
E-mail: planning@scottcountyiowa.com
Office: (563) 326-8643 Fax: (563) 326-8257

Timothy Huey
Director

To: Dee F. Bruemmer, County Administrator

From: Timothy Huey, Planning Director

Date: February 17, 2015

Re: Public hearing on the Construction Permit Application of Thomas Dittmer, dba Grandview Farms, Inc in the SW¼SW¼ Section 7, T79N, R3E (Sheridan Township) and SE¼SE¼ Section 12, T79N, R2E (Hickory Grove Township) for the expansion of a confined animal feeding operation located at 12090 and 11872 240th Street.

On February 13th the above referenced application was submitted to Scott County prior to submission to the Iowa DNR. Scott County has 30 days from the date it is received by the DNR to submit comments and a recommendation on that application. The DNR will notify Scott County it has received this application. Notice of the receipt of this application will be published as a public notice on February 18th and 21st. Staff will also publish notice of a public hearing to be held on the application at the February 26th Board meeting. The Board will need to act on a recommendation at the Board meeting on March 12th so that the Board's recommendation can be submitted to the DNR within the required timeframe.

This request is for the expansion of an existing hog confinement operation in Sheridan Township that requires compliance with the standards of the Master Matrix.

The Health Department and Planning and Development staff will review of this request for compliance with the Master Matrix and CAFO standards. The Health Department will also review the manure management plan.

In addition to publishing public notice staff will also mail notice of the public hearing to property owners within 500 feet of the property. Staff will include any written comments and a summary of any verbal comments received at the public hearing with the Board's recommendation to the IDNR.

Staff will be accompanying the IDNR inspector from the Washington, Iowa district office on his inspection. Staff will report on that inspection and will also be ready to make a recommendation to the Board at the Committee of the Whole meeting on Tuesday, March 10th following review of the application and the site inspection visit.

PLANNING & DEVELOPMENT
500 West Fourth Street
Davenport, Iowa 52801-1106
E-mail: planning@scottcountyiowa.com
Office: (563) 326-8643 Fax: (563) 326-8257

Timothy Huey
Director

NOTICE OF PUBLIC HEARING TO BE HELD BY THE SCOTT COUNTY BOARD OF SUPERVISORS FOR THE REVIEW OF AN APPLICATION FOR A STATE CONSTRUCTION PERMIT FOR THE EXPANSION OF AN EXISTING CONFINED ANIMAL FEEDING OPERATION

Public Notice is hereby given that the Scott County Board of Supervisors will hold a public hearing on **Thursday, February 26, 2015**, in the Board Room in the Scott County Administrative Center, 600 West fourth Street, Davenport, Iowa, during their regular meeting which starts promptly at **5:00 p.m.**

The Scott County Board of Supervisors will review and hear public comments on the State of Iowa Construction Permit application of Thomas Dittmer, dba Grandview Farms, Inc in the SW¼SW¼ Section 7, T79N, R3E (Sheridan Township) & SE¼SE¼ Section 12, T79N, R2E (Hickory Grove Township) for the expansion of a confined animal feeding operation. The address of the subject property is 12090 240th Street & 11872 240th Street, Eldridge, Iowa 52748.

The existing confined animal feeding operation has a capacity of 5,277 animal unit (AU), the proposed expansion would reduce that capacity by 25 AU bringing the total animal unit capacity to 5,252 AU. The expansion will include the construction of a new 1200 head Gilt Grower Barn, two new Sow Gestation Barns, the conversion of four Wean to Finish Barns to Sow Gestation Barns, one new 480 head Farrowing Barn, the demolition of two existing barns built in 1979 & 1982, and the addition of 32 farrowing stalls to an existing Farrowing Barn. Both the new buildings and the expansion of existing building will use formed concrete manure storage structures of various depths beneath the buildings and additions. It also includes the capping and elimination of a existing well and the drilling of a new well at a different location on the property.

A copy of the application is on file with the Scott County Planning and Development Department is available for review prior to the hearing during normal working hours 8 AM to 4:30 PM, Monday through Friday. If you have questions or want further information please call or write the Planning and Development Department, County Courthouse Annex, 500 West Fourth Street, Davenport, Iowa 52801, 563-326-8643, or attend the hearing.

Written, faxed or emailed comments for the Board of Supervisors may be delivered or sent to the Scott County Planning and Development Department in advance of the public hearing. All comments will be forwarded to the Iowa Department of Natural Resources. The fax number for Scott County Planning and Development is 563-326-8257 and the email address is planning@scottcountyiowa.com

Timothy Huey
Director

PLANNING & DEVELOPMENT
500 West Fourth Street
Davenport, Iowa 52801-1106
E-mail: planning@scottcountyiowa.com
Office: (563) 326-8643 Fax: (563) 326-8257

Timothy Huey
Director

PUBLIC NOTICE TO ALLOW FOR REVIEW AND COMMENT ON AN APPLICATION FOR A STATE CONSTRUCTION PERMIT FOR THE EXPANSION OF AN EXISTING ANIMAL CONFINEMENT FEEDING OPERATION

The Scott County Board of Supervisors have on file an application for a State of Iowa construction permit that has been submitted to the Iowa Department of Natural Resources for the expansion of an existing animal (hog) confinement feeding operation in Scott County.

Name of Applicant:	Thomas Dittmer, D/B/A Grandview Farms, Inc.
Address	12090 240th Street & 11872 240th Street Eldridge, Iowa 52748
Location of operation	SW¼SW¼ Section 7, T79N, R3E (Sheridan Township) & SE¼SE¼ Section 12, T79N, R2E (Hickory Grove Township)
Description of application	The existing confined animal feeding operation has a capacity of 5,277 animal unit (AU), the proposed expansion would reduce that capacity by 25 AU bringing the total animal unit capacity to 5,252 AU. The expansion will include the construction of a new 1200 head Gilt Grower Barn, two new Sow Gestation Barns, the conversion of four Wean to Finish Barns to Sow Gestation Barns, one new 480 head Farrowing Barn, the demolition of two existing barns built in 1979 & 1982, and the addition of 32 farrowing stalls to an existing Farrowing Barn. Both the new buildings and the expansion of existing building will use formed concrete manure storage structures of various depths beneath the buildings and additions. It also includes the capping and elimination of a existing well and the drilling of a new well at a different location on the property.
Examination:	The application for a State Construction Permit and associated manure management plan is on file with the Scott County Planning and Development Department located at 500 West 4th Street, Davenport, Iowa and is available for review by the public during normal working hours 8 AM to 4:30 PM, Monday through Friday.
Comments:	Written, faxed or emailed comments for the Board of Supervisors may be delivered or sent to the Scott County Planning and Development Department until Friday, March 6, 2015 at 4:00 PM. All comments will be forwarded to the Iowa Department of Natural Resources. The fax number for Planning and Development is 563-326-8257 and the email address is planning@scottcountyiowa.com
Additional Information:	Timothy Huey, Planning Director 500 West 4th Street Davenport, Iowa 52801 563-326-8643

Grandview Farms, Inc.

Home Sow Farm

Master Matrix

February 2015

IOWA MASTER MATRIX SUPPLEMENT

Grandview Farms Sow Farm
SCOTT COUNTY

February 2015

This document will provide documentation, design information along with operation and maintenance (O&M) plans for items in the Master Matrix where points were gained.

Table 1. Summary table of matrix questions receiving points

Question #	Description	Actual
	Site Separation Distances	
2	public use area	>2 miles (Donahue)
3	school, church, business	>2 miles (Donahue)
4	Closest water source > 500'	~2443' to east
5	Proposed structure to thoroughfare >300'	~600'
6	critical public area	>2 miles (Donahue)
8	drainage wells, sinkholes, major water sources	>5 miles (Wapsi)
10	high quality/protected waters	>5 miles (Wapsi)
12	covered manure storage	design / O&M, CDS
16	compost enhancement	design / O & M
17	formed manure storage structure	design / O&M, CDS
19	Truck turnaround	design / O&M
20	No administrative orders	personal statement
22	Homestead Tax Exemption	personal statement
23	Family Farm tax credit	personal statement
25	Feed and water systems	design / O&M
26	Inject manure	see MMP
	Land Application Separation Distances	
32	school, church, business	200'
35	HQW or PWA	2900' (Wapsi)
40	Emergency action plan	see attachment

12. Covered Manure Storage
This facility has deep pits for manure storage which are formed manure storages structures directly beneath a floor where animals are housed in a confinement feeding operation. The design is based upon the attached building drawings and specs from the builder. The structure will be maintained to ensure its structural integrity for its useful life.

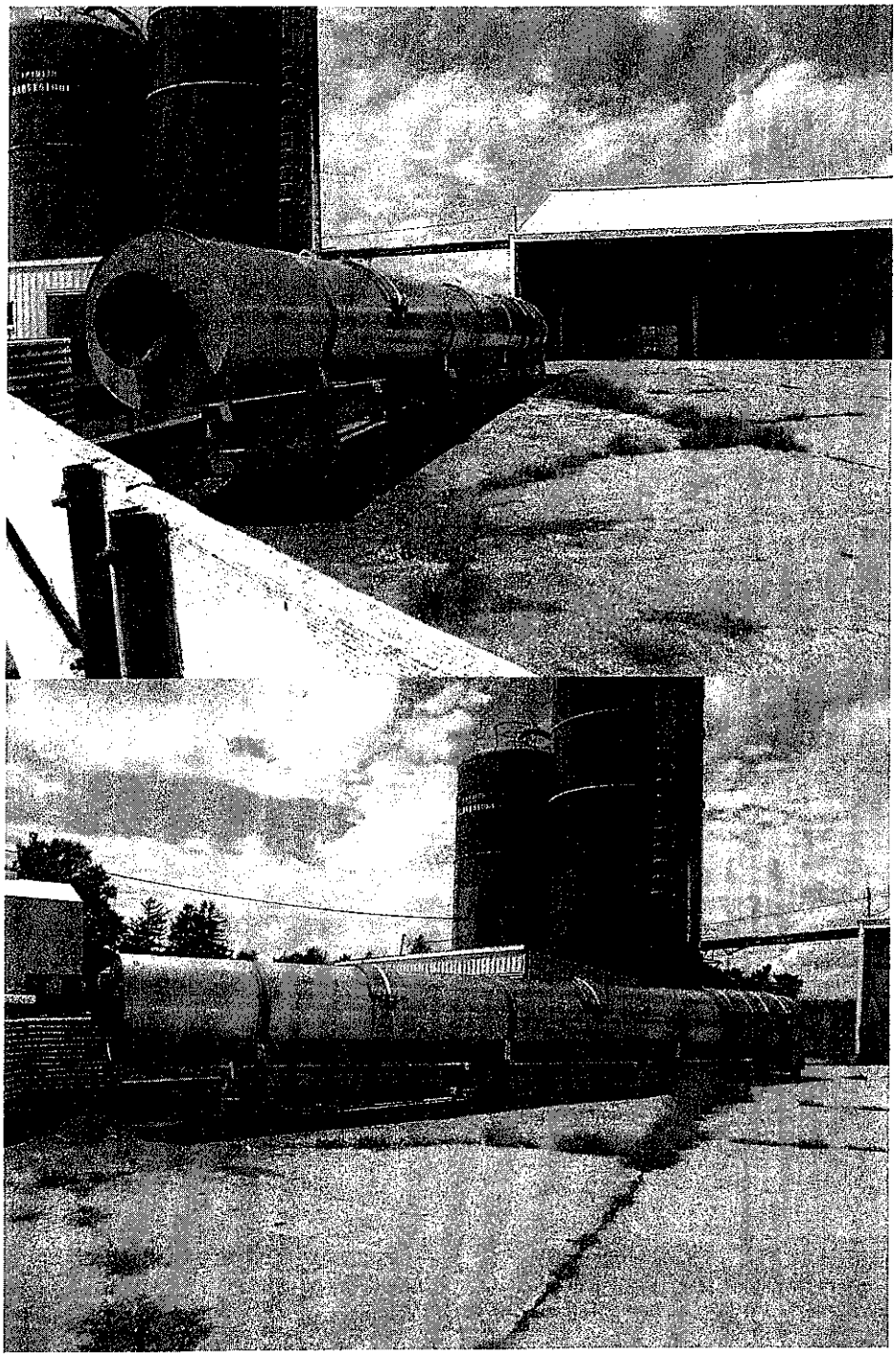
16. Compost Enhancement
This farm composts all mortalities and afterbirth. The larger sized mortalities are composted in the "Biovator"; a rotating enclosed vessel. The finished compost material that leaves the Biovator is stockpiled under roof until land application in the spring and fall. The small mortalities and afterbirth is composted under roof with wood shavings and finished compost from the Biovator. The entire compost system is housed on site to allow for optimal management.

Design: The device is a stationary composting vessel. The composting vessel consists of a slowly rotating steel drum that has steel paddles mounted on the inside walls. The paddles are mounted in a spiral shaped pattern with varying spacings to allow material to move in one direction at a certain speed inside the vessel. The vessel has loading, inspection and discharge openings. The loading openings are used for loading carcasses and bulking material. The vessel is supported on side nylon rollers and front pillow block. Nylon rollers are supported by a steel skid. The vessel rotates at a speed of 3 revolutions per hour (or 20 minutes per revolution approximately). Additional information on the design of the Biovator is in the manual provided.
The procedures, operation and maintenance manual for the Biovator is attached. The Biovator design can be found in the operation manual provided.

Operation: This farm composts all mortalities and afterbirth. The larger sized mortalities are composted in the "Biovator"; a rotating enclosed vessel. The finished compost material that leaves the Biovator is stockpiled under roof until land application in the spring and fall. The small mortalities and afterbirth is composted under roof with wood shavings and finished compost from the Biovator. The compost is held in a roofed shed with 6 bays that are approximately 6'wide by 20' deep. The entire compost system is housed on site to allow for optimal management. Additional information on the operation of the Biovator is in the manual provided.

Maintenance: As needed the Biovator mechanics will be checked and repaired to maintain optimum operation. Compost material will be moved away from the Biovator so to not impede operation. Other maintenance activities will be performed as described in the manual provided.

Pictures from Grandview Farms are shown below.



17. Formed Manure Storage Structure

The deep pit manure storage is designed to be below floor storage. The concrete design for the structure will adhere to the specs outlined in the building plans to insure the integrity of the structure.

- The storage structure will be measured for manure volume monthly to monitor the amount of manure being produced.
- The volume of manure will be recorded and records maintained on site.
- A visual inspection of the outer above ground perimeter will be made on a semi-annual basis to check for any structural challenges to the storage structure.
- The perimeter tile outside of the storage structure will be monitored monthly over 3 years to determine the average amount of water present.
- The drainage tile outside of the storage structure will be visually checked on a monthly basis to monitor for potential manure contamination by checking color.
- A sample of the water will be taken during the monthly check if the depth is significantly higher than average (1.5 times the average for the month).
- Foreign materials will not be added to the manure storage structure purposefully.
- Durable lids and caution signs will be used to cover the manure pumpouts located along the sides of the structure.
- Proper fit and placement of lids will be checked monthly.

19. Truck Turnaround

The truck turnaround is designed as shown on the site plan. It has a diameter of at least 120 ft to allow for safe truck turnaround. The turnaround is located over 300 ft from the thoroughfare and therefore creates a safer environment for the truck driver and others on the road.

- When there has been significant snowfall, the snow will be removed from the drive and turnaround to allow for safe entrance and exit of trucks.
- The structure of the turnaround will be maintained with aggregate 2" to 5" thick.

20. I have no history of Administrative Orders in the last five years related to environmental and worker protection.

23. I can lawfully claim a Family Farm Tax Credit for agricultural land where the proposed confinement operation is to be located pursuant to Iowa Code chapter 425A.

25. Feed and Water Systems

The feed and water systems to be used in this facility are intended to reduce feed and water wastage which could impact the manure storage. The feeders are dry feeders and the waterers are cup waterers.

- Feeders and waterers will be checked daily for proper operation.
- If the feeder or waterer is not in proper operation and is causing wasted feed or water it will be addressed appropriately by repair or adjustment.
- Measurement of manure volume in the storage pit will be used to track if there is an irregular amount of waste occurring.

I believe the statements here to be true and agree to adhere to the specifications.

Tom Dittmer - President Grandview Farms

Tom Dittmer of Grandview Farms, Inc.

Daily Checks

Feeders: _____ Checked and working appropriately
_____ Checked and adjustments made

Waterers: _____ Checked and working appropriately
_____ Checked and adjustments made

Monthly Checks

Date _____
Manure Depth _____
Drain Tile: Is water present? YES or NO
Approximate depth? _____ inches
Pumpout lids: Condition? GOOD FAIR NEEDS ATTENTION

Semi-annual Check

The outer above ground perimeter of manure storage:

_____ Normal as built
_____ Normal aging no problems
_____ Evidence of potential problems**
_____ Manure leakage**

**If either of these situations should occur, an engineer will be contacted to inspect for potential structural integrity issues. If there is evidence of manure leakage, DNR will be contacted.

Emergency Action Plans

Emergency action plans provide detailed information on what to do if you have an accident or emergency at your livestock facility, such as a manure spill. While Emergency Action Plans are not required, it is a good idea to keep a copy of the plan with your manure management plan or records, production records, or somewhere that is easily located by you, family members, or employees. A well-designed and implemented emergency action plan can reduce the severity of emergencies, the risk to humans and animals, the economic losses, and the potential of environmental pollution.

This fact sheet is designed to address emergency action plans in the event of a manure leak or spill. In addition to developing an emergency action plan to address manure management, you might consider developing additional plans to address mass animal mortalities; weather-related emergencies; or electrical, plumbing, or other mechanical failures.

An emergency action plan should contain four items:

1) a plan of action to prevent the release of manure or prevent environmental contamination

2) a detailed map of the site and application fields

3) a list of contact names and numbers included with the plan and posted near the phone

4) a clean-up plan

This fact sheet is not designed to be a "fill-in-the-blank" form. It is designed to give you the basic information needed to prepare an emergency action plan. The plan you design will be specific to your livestock facility and your management practices. You may want to work with your local emergency management coordinator when developing your emergency action plan. The coordinator can help you identify resources and file any necessary notifications needed in the response of an accident or spill.

PLAN OF ACTION

A plan of action should be developed for each livestock facility. Review the plan of action every six months and make sure all personnel involved with the livestock facility are familiar with the plan. Items to consider for a plan of action include:

- Assess the situation, know what factors are at risk (human health, animal welfare, the environment, livestock structures)
- Reduce risk through implementation of planned steps
  - Prevent spills or discharges by maintaining equipment and following plans
  - Eliminate the source of manure if spill or discharge occur
  - Contain the spill
- Contact appropriate authorities to report emergencies or accidents
- Assess damages

In the event of a manure spill or leak, every effort possible should be made to prevent movement of manure off-site. If necessary, contact neighbors or nearby contractors with earth-moving equipment available to assist with containment. If tile intakes are present, have devices on hand to prevent manure from entering the tile lines. Contact neighbors with manure handling equipment to land apply the manure. Prevent manure from entering bodies of water or other environmentally sensitive areas, such as sinkholes and ag drainage wells. For assistance, contact your local sheriffs department or other emergency response personnel in your county. **State law requires that you report manure spills or leaks to the Iowa Department of Natural Resources as soon as possible, but not later than 6 hours from onset or discovery of the problem (see *Contact Names and Numbers*).**

IOWA STATE UNIVERSITY
University Extension

Emergency Action Plans

SITE MAP

A good planning tool for emergency action plans is a site map of the livestock facility. A site map can be of assistance to new employees, delivery personnel, and emergency response personnel. A site map should include the following information:

- Facility address and location (including e911 address)
- Building locations
- Electrical service boxes
- Water main connections and shut-off valves
- Identification of the manure storage structure with associated pump-out ports, valves, pumps, etc...
- Location of wellheads
- Identification of nearby tile intakes, sinkholes, ag drainage wells, streams, lakes or other environmentally sensitive areas
- Drainage and water movement indications
- Identification of property boundaries
- First aid kit
- Fire extinguisher(s)

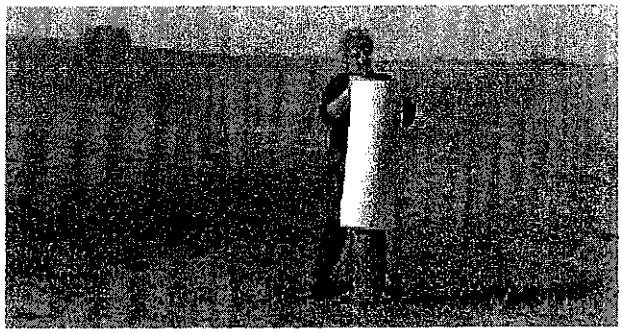
In addition to a site map for livestock facilities, copies of maps of fields for land application of manure should be included. If you already have these maps filed with your manure management plans, an extra set could be filed with your emergency action plan. These maps should include manure application setback distances, designated areas, watercourses, and property boundaries. It is also helpful to include the location of field access roads and gates. You may wish to file a site map with your DNR regional field office.

CONTACT NAMES AND NUMBERS

See attached sheets.

CLEAN-UP PLAN

A clean-up plan should include methods of proper manure removal and land application of manure at agronomic rates. Manure applications from a spill should also be recorded in your manure management plan if you are required to have one. You should consult DNR field staff for appropriate clean-up methods. You may be required to file a report following a manure spill, leak or other incident.



This fact sheet was developed by the Iowa Manure Management Action Group (IMMAG). Special thanks to Don Peterson and Paul Miller, NRCS; Karen Grimes and Kathie Lee, IDNR staff; and Jeff Lorimor and Angela Rieck-Hinz, ISU; for development of this material. Members of IMMAG include: Natural Resource Conservation Service (NRCS), Iowa Environmental Council, Agribusiness Association of Iowa, Iowa Farm Bureau, Iowa Pork Producers Association, Iowa Cattlemen's Association, Iowa Poultry Association, Conservation Districts of Iowa, Farm Credit Services of America, Iowa Department of Natural Resources (IDNR), Division of Soil Conservation of the Iowa Department of Agriculture and Land Stewardship (DSC-DALS), Iowa Beef Center, Iowa Pork Industry Center and Iowa State University Extension, and the College of Agriculture.

A special thanks to the IDNR field staff, Extension field staff, and State Emergency Response personnel for assistance.

...and justice for all The U.S. Department of Agriculture (USDA) prohibits discrimination in all its programs and activities on the basis of race, color, national origin, gender, religion, age, disability, political beliefs, sexual orientation, and marital or family status. (Not all prohibited bases apply to all programs.) Many materials can be made available in alternative formats for ADA clients. To file a complaint of discrimination, write USDA, Office of Civil Rights, Room 326-W, Whitten Building, 14th and Independence Avenue, SW, Washington, DC 20250-9410 or call 202-720-5964.

Issued in furtherance of Cooperative Extension work, Acts of May 8 and June 30, 1914, in cooperation with the U.S. Department of Agriculture. Stanley R. Johnson, director, Cooperative Extension Service, Iowa State University of Science and Technology, Ames, Iowa.

PM 1859 January 2001
File: Environmental Quality 4-1 [A]

IOWA STATE UNIVERSITY
University Extension

Contact Names and Numbers

A list of contact names and numbers should be filed with the emergency action plan and a copy posted by the phone for emergencies.

Site Name

Grandview Farms Inc. (Sow Farm)

Owner/Operator

Name: Tom Dittmer

Phone: 563-285-4006

Site Address (including e911 address)

12090 240th St

Eldridge IA 52748

Specific Directions to the Site

West of Eldridge on West

Lorraine Rd 4.3 miles

HUMAN INJURY

Explain that self-contained breathing apparatus may be required if someone has been overcome by gases.

Rescue Unit/Ambulance

Phone: 911

Doctor or Physician

Name: DR. Matt Neal

Phone: 563-285-7232

Hospital or Medical Clinic

Name: Genesis West

Phone: 563-421-1000

Fire Department

Phone: 911

County Sheriff

Name: Dennis Conard

Phone: 563-326-8625

County Health Official

Name: Larry Luxenburg

Phone: 563-326-8618

Poison Control Center

Phone: 1-800-222-1222

Others

Name:

Phone:

Name:

Phone:

Post by the telephone for reference.

IOWA STATE UNIVERSITY
University Extension

Contact Names and Numbers

Manure Leaks or Spills

IOWA DEPARTMENT OF NATURAL RESOURCES FIELD OFFICE

State law requires that you report manure spills or leaks to the Iowa Department of Natural Resources as soon as possible, but not later than 6 hours from onset or discovery of the problem (see *Contact Names and Numbers*).

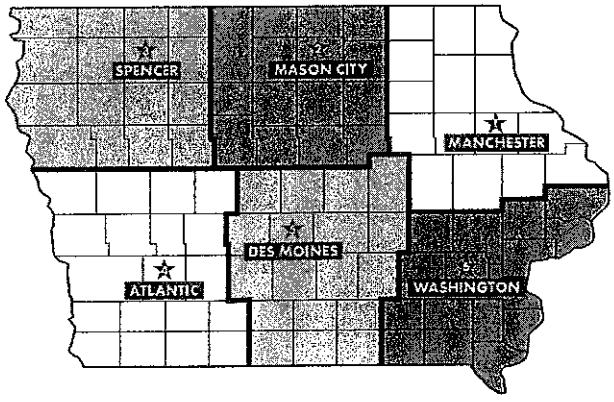
Work Days 8 a.m. - 4:30 p.m.

Phone: 319-653-2135

Weekends, Holidays, and After Business Hours

Phone: (515) 281-8694

FIELD OFFICE LOCATIONS
ENVIRONMENTAL PROTECTION DIVISION



FIELD OFFICE	LOCATION	PHONE NUMBER
1	909 W. Main, Suite 4 • Manchester, IA 52057	319-927-2640
2	2300 15th St. SW • Mason City, IA 50401	641-424-4073
3	1900 North Grand Ave. • Spencer, IA 51301	712-262-4177
4	1401 Sunnyside Lane • Atlantic, IA 50022	712-243-1934
5	401 SW 7th St., Suite I • Des Moines, IA 50309	515-725-0268
6	1004 West Madison • Washington, IA 52353	319-653-2135

COUNTY SHERIFF

Name: Dennis Conard

Phone: 563-326-8623

CONTRACTOR

Earth Moving

Name: Engelbrecht Brothers

Phone: 563-285-8281

Pumping Equipment

Name: Grandview Farms Inc

Phone: 563-285-4006

Hauling Equipment

Name: Grandview Farms Inc

Phone: 563-285-4006

Equipment Owners

Name: Tom Dittmer

Phone: 563-285-4006

County Engineer

Name: John Burgstrum

Phone: 563-326-8640

Others

Name:

Phone:

Post by the telephone for reference.

IOWA STATE UNIVERSITY
University Extension

Contact Names and Numbers

PARTIAL SYSTEM FAILURE

Equipment suppliers and technicians:

Electricity

Name: Central City Electric

Phone: 1-800-642-6676

Plumbing

Name: Latta Well

Phone: 1-800-354-3161

Ventilation

Name: Custom Builders

Phone: 1-800-657-8004

Heating

Name: Brian Brooks

Phone: 563-343-7598

Feed

Name: River Valley Co-op

Phone: 1-800-247-0797

Veterinarian

Name: Vet Group

Phone: 319-668-1111

Mortality Disposal

Name: Darling International

Phone: 1-800-462-6550

Insurance Carrier

Name: Grau/Meyer

Phone: 1-800-279-2081

Policy: _____

Other

_____

_____

_____

Post by the telephone for reference.

Grandview Farms

1.) PLAN OF ACTION FOR A MANURE SPILL

If a manure spill happens, immediately safely stop the leak, and call:

- Tom @ (563)320-1542;
- Mike @ (563)370-3361;
- Dave @ (563)320-7343.

We will then determine what action to take due to the situation.

If the spill is very sizeable, we need to stop the manure from flowing into the tile inlet by the following steps:

1. Cover the tile inlet with a solid PVC pipe to keep manure from going into the tile.
2. Get loader tractor and dam-up the manure run-off.
3. Get the manure to "pool" so it can be pumped into a tank and hauled to a field in the MMP.
4. If we need assistance with heavy equipment, call Cory Engelbrecht @ (563)529-1164; or Kevin Engelbrecht @ (563)529-8653. They have the earth moving equipment needed and are only 2 miles away.
5. Call DNR Emergency as soon as possible @ (515)281-8694.

2.)CLEAN UP PLAN AFTER THE SPILL

- Go to the "Manure Pool" and set pumps in and pump the manure into the manure tank.
- Spread the manure to field in MMP at 5000 gallons / acre. All fields around the sow farm are in the MMP.
- The dirt and dry manure can be loaded into the "Dry Manure Spread" and applied to the field in the MMP.

APPENDIX C
MASTER MATRIX

Proposed Site Characteristics

The following scoring criteria apply to the site of the proposed confinement feeding operation. Mark one score under each criterion selected by the applicant. The proposed site must obtain a minimum overall score of 440 and a score of 53.38 in the "air" subcategory, a score of 67.75 in the "water" subcategory and a score of 101.13 in the "community impacts" subcateogry.

1 Additional separation distance, above minimum requirements, from proposed confinement structure to the closest:
* Residence not owned by the owner of the confinement feeding operation,
* Hospital,
* Nursing home, or
* Licensed or registered child care facility.

	Score	Air	Water	Community
250 feet to 500 feet	25	16.25		8.75
501 feet to 750 feet	45	29.25		17.50
751 feet to 1,000 feet	65	42.25		22.75
1,001 feet to 1,250 feet	85	55.25		29.75
1,251 feet or more	100	65.00		35.00

(A) Refer to the construction permit application package to determine the animal unit capacity (or animal weight capacity if an expansion) of the proposed confinement feeding operation. Then refer to Table 6 of 567--Chapter 65 to determine minimum required separation distances.
(B) The department will award points only for the single building, of the four listed above, closest to the proposed confinement feeding operation.
(C) "Licensed child care center" -- a facility licensed by the department of human services providing child care or preschool services for seven or more children, except when the facility is registered as a child care home.
(D) "Registered child development homes" - child care providers certify that they comply with rules adopted by the department of human services. This process is voluntary for providers caring for five or fewer children and mandatory for providers caring for six or more children.
(E) A full listing of licensed and registered child care facilities is available at county offices of the department of human services.

2 Additional separation distance, above minimum requirements, from proposed confinement structure to the closest public use area.

	Score	Air	Water	Community
250 feet to 500 feet	5	2.00		3.00
501 feet to 750 feet	10	4.00		6.00
751 feet to 1,000 feet	15	6.00		9.00
1,001 feet to 1,250 feet	20	8.00		12.00
1,251 feet to 1,500 feet	25	10.00		15.00

1,501 feet or more	30	12.00		18.00

(A) Refer to the construction permit application package to determine the animal unit capacity (or animal weight capacity if an expansion) of the proposed confinement feeding operation. Then refer to Table 6 of 567--Chapter 65 to determine minimum required separation distances.
(B) "Public use area" - a portion of land owned by the United States, the state, or a political subdivision with facilities which attract the public to congregate and remain in the area for significant periods of time. Facilities include, but are not limited to, picnic grounds, campgrounds, cemeteries, lodges, shelter houses, playground equipment, lakes as listed in Table 2 of 567--Chapter 65, and swimming beaches. It does not include a highway, road right-of-way, parking areas, recreational trails or other areas where the public passes through, but does not congregate or remain in the area for significant periods of time.

3 Additional separation distance, above minimum requirements, from proposed confinement structure to the closest:
* Educational institution,
* Religious institution, or
* Commercial enterprise.

	Score	Air	Water	Community
250 feet to 500 feet	5	2.00		3.00
501 feet to 750 feet	10	4.00		6.00
751 feet to 1,000 feet	15	6.00		9.00
1,001 feet to 1,250 feet	20	8.00		12.00
1,251 feet to 1,500 feet	25	10.00		15.00
1,501 feet or more	30	12.00		18.00

(A) Refer to the construction permit application package to determine the animal unit capacity (or animal weight capacity if an expansion) of the proposed confinement feeding operation. Then refer to Table 6 of 567--Chapter 65 to determine minimum required separation distances.
(B) The department will award points only for the single building, of the three listed above, closest to the proposed confinement feeding operation.
(C) "Educational institution" - a building in which an organized course of study or training is offered to students enrolled in kindergarten through grade 12 and served by local school districts, accredited or approved nonpublic schools, area educational agencies, community colleges, institutions of higher education under the control of the state board of regents, and accredited independent colleges and universities.
(D) "Religious institution" - a building in which an active congregation is devoted to worship.
(E) "Commercial enterprise" - a building which is used as a part of a business that manufactures goods, delivers services, or sells goods or services, which is customarily and regularly used by the general public during the entire calendar year and which is connected to electric, water, and sewer systems. A commercial enterprise does not include a farm operation.

4 Additional separation distance, above minimum requirement of 500 feet, from proposed confinement structure to the closest water source.

	Score	Air	Water	Community
250 feet to 500 feet	5		5.00	
501 feet to 750 feet	10		10.00	
751 feet to 1,000 feet	15		15.00	
1,001 feet to 1,250 feet	20		20.00	
1,251 feet to 1,500 feet	25		25.00	
1,501 feet or more	30		30.00	

"Water source" - a lake, river, reservoir, creek, stream, ditch, or other body of water or channel having definite banks and a bed with water flow, except lakes or ponds without an outlet to which only one landowner is riparian.

5 Separation distance of 300 feet or more from the proposed confinement structure to the nearest thoroughfare.

	Score	Air	Water	Community
300 feet or more	30	9.00		21.00

(A) "Thoroughfare" - a road, street, bridge, or highway open to the public and constructed or maintained by the state or a political subdivision.
(B) The 300-foot distance includes the 100-foot minimum setback plus additional 200 feet.

6 Additional separation distance, above minimum requirements, from proposed confinement structure to the closest critical public area.

	Score	Air	Water	Community
500 feet or more	10	4.00		6.00

(A) All critical public areas as defined in 567--65.1(455B), are public use areas, and therefore subject to public use area minimum separation distances.
(B) Refer to the construction permit application package to determine the animal unit capacity (or animal weight capacity if an expansion) of the proposed confinement feeding operation. Then refer to Table 6 of 567--Chapter 65 to determine minimum required separation distances.

7 Proposed confinement structure is at least two times the minimum required separation distance from all private and public water wells.

	Score	Air	Water	Community
Two times the minimum separation distance	30		24.00	6.00

Refer to Table 6 of 567--Chapter 65 for minimum required separation distances to wells.

8 Additional separation distance, above the minimum requirement of 1,000 feet, from proposed confinement structure to the closest:
* Agricultural drainage well,
* Known sinkhole, or
* Major water source.

	Score	Air	Water	Community
250 feet to 500 feet	5	0.50	2.50	2.00
501 feet to 750 feet	10	1.00	5.00	4.00
751 feet to 1,000 feet	15	1.50	7.50	6.00
1,001 feet to 1,250 feet	20	2.00	10.00	8.00
1,251 feet to 1,500 feet	25	2.50	12.50	10.00
1,501 feet to 1,750 feet	30	3.00	15.00	12.00
1,751 feet to 2,000 feet	35	3.50	17.50	14.00
2,001 feet to 2,250 feet	40	4.00	20.00	16.00
2,251 feet to 2,500 feet	45	4.50	22.50	18.00
2,501 feet or more	50	5.00	25.00	20.00

(A) The department will award points only for the single item, of the three listed above, that is closest to the proposed confinement feeding operation.
(B) "Agricultural drainage wells" - include surface intakes, cisterns and wellheads of agricultural drainage wells.
(C) "Major water source" - a lake, reservoir, river or stream located within the territorial limits of the state, or any marginal river area adjacent to the state which can support a floating vessel capable of carrying one or more persons during a total of a six-month period in one out of ten years, excluding periods of flooding. Major water sources in the state are listed in Tables 1 and 2 in 567--Chapter 65.

9 Distance between the proposed confinement structure and the nearest confinement facility that has a submitted department manure management plan.

	Score	Air	Water	Community
Three-quarter of a mile or more (3,960 feet)	25	7.50	7.50	10.00

Confinement facilities include swine, poultry, and dairy and beef cattle.

10 Separation distance from proposed confinement structure to closest:
*High quality (HQ) waters,
* High quality resource (HQR) waters, or
* Protected water areas (PWA)
is at least two times the minimum required separation distance

	Score	Air	Water	Community
Two times the minimum separation distance	30		22.50	7.50

(A) The department will award points only for the single item, of the three listed above, closest to the proposed confinement feeding operation.
(B) HQ waters are identified in 567--Chapter 61.
(C) HQR waters are identified in 567--Chapter 61.
(D) A listing of PWAs is available at http://www.state.ia.us/government/dnr/organiza/ppd/prowater.htm#Location%20of%20PWA's%20in.

11 Air quality modeling results demonstrating an annoyance level less than 2 percent of the time for residences within two times the minimum separation distance.

	Score	Air	Water	Community
University of Minnesota OFFSET model results demonstrating an annoyance level less than 2 percent of the time	10	6.00		4.00

(A) OFFSET can be found at http://www.extension.umn.edu/distribution/livestocksystems/DI7680.html. For more information, contact Dr. Larry Jacobson, University of Minnesota, (612) 625-8288, jacob007@tc.umn.edu .
(B) A residence that has a signed waiver for the minimum separation distance cannot be included in the model.
(C) Only the OFFSET model is acceptable until the department recognizes other air quality models.

12 Liquid manure storage structure is covered.

	Score	Air	Water	Community
Covered liquid manure storage	30	27.00		3.00

(A) "Covered" - organic or inorganic material, placed upon an animal feeding operation structure used to store manure, which significantly reduces the exchange of gases between the stored manure and the outside air. Organic materials include, but are not limited to, a layer of chopped straw, other crop residue, or a naturally occurring crust on the surface of the stored manure. Inorganic materials include, but are not limited to, wood, steel, aluminum, rubber, plastic, or Styrofoam. The materials shall shield at least 90 percent of the surface area of the stored manure from the outside air. Cover shall include an organic or inorganic material which current scientific research shows reduces detectable odor by at least 75 percent. A formed manure storage structure directly beneath a floor where animals are housed in a confinement feeding operation is deemed to be covered.
(B) The design, operation and maintenance plan for the manure cover must be in the construction permit application and made a condition in the approved construction permit.

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13 Construction permit application contains design, construction, operation and maintenance plan for emergency containment area at manure storage structure pump-out area.

	Score	Air	Water	Community
Emergency containment	20		18.00	2.00

(A) The emergency containment area must be able to contain at least 5 percent of the total volume capacity of the manure storage structure.
(B) The emergency containment area must be constructed on soils that are fine-grained and have low permeability.
(C) If manure is spilled into the emergency containment area, the spill must be reported to the department within six hours of onset or discovery.
(D) The design, construction, operation and maintenance plan for the emergency containment area must be in the construction permit application and made a condition in the approved construction permit.

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14 Installation of a filter(s) designed to reduce odors from confinement building(s) exhaust fan(s).

	Score	Air	Water	Community
Installation of filter(s)	10	8.00		2.00

The design, operation and maintenance plan for the filter(s) must be in the construction permit application and made a condition in the approved construction permit.

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15 Utilization of landscaping around confinement structure.

	Score	Air	Water	Community
Utilization of landscaping	20	10.00		10.00

The design, operation and maintenance plan for the landscaping must be in the construction permit application and made a condition in the approved construction permit. The design should contain at least three rows of trees and shrubs, of both fast and slow-growing species that are well suited for the site.

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16 Enhancement, above minimum requirements, of structures used in stockpiling and composting activities, such as an impermeable pad and a roof or cover.

	Score	Air	Water	Community
Stockpile and compost facility enhancements	30	9.00	18.00	3.00

(A) The design, operation and maintenance plan for the stockpile or compost structure enhancements must be in the construction permit application and made a condition in the approved construction permit.
(B) The stockpile or compost structures must be located on land adjacent or contiguous to the confinement building.

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17 Proposed manure storage structure is formed

	Score	Air	Water	Community

Formed manure storage structure	30		27.00	3.00

(A) "Formed manure storage structure" - a covered or uncovered impoundment used to store manure from an animal feeding operation, which has walls and a floor constructed of concrete, concrete block, wood, steel, or similar materials. Similar materials may include, but are not limited to, plastic, rubber, fiberglass, or other synthetic materials. Materials used in a formed manure storage structure shall have the structural integrity to withstand expected internal and external load pressures.
(B) The design, operation and maintenance plan for the formed manure storage structure must be in the construction permit application and made a condition in the approved construction permit.

18 Manure storage structure is aerated to meet departmental standards as an aerobic structure, if aeration is not already required by the department.

	Score	Air	Water	Community
Aerated manure storage structure(s)	10	8.00		2.00

(A) Aerobic structure - an animal feeding operation structure other than an egg washwater storage structure which relies on aerobic bacterial action which is maintained by the utilization of air or oxygen and which includes aeration equipment to digest organic matter. Aeration equipment shall be used and shall be capable of providing oxygen at a rate sufficient to maintain an average of 2 milligrams per liter dissolved oxygen concentration in the upper 30 percent of the depth of manure in the structure at all times.
(B) The design, operation and maintenance plan for the aeration equipment must be in the construction permit application and made a condition in the approved construction permit.

19 Proposed confinement site has a suitable truck turnaround area so that semitrailers do not have to back into the facility from the road

	Score	Air	Water	Community
Truck turnaround	20			20.00

(A) The design, operation and maintenance plan for the truck turn around area must be in the construction permit application and made a condition in the approved construction permit.
(B) The turnaround area should be at least 120 feet in diameter and be adequately surfaced for traffic in inclement weather.

20 Construction permit applicant's animal feeding operation environmental and worker protection violation history for the last five years at all facilites in which the applicant has an interest.

	Score	Air	Water	Community
No history of Administrative Orders in last five years	30			30.00

(A) "Interest" - means ownership of a confinement feeding operation as a sole proprietor or a 10 percent or more ownership interest held by a person in a confinement feeding operation as a joint tenant, tenant in common, shareholder, partner, member, beneficiary or other equity interest holder. Ownership interest is an interest when it is held either directly, indirectly through a spouse or dependent child, or both.
(B) An environmental violation is a final Administrative Order (AO) from the department of natural resources or final court ruling against the construction permit applicant for environmental violations related to an animal feeding operation. A Notice of Violation (NOV) does not constitute a violation.

21 Construction permit applicant waives the right to claim a Pollution Control Tax Exemption for the life of the proposed confinement feeding operation structure.

	Score	Air	Water	Community

Permanent waiver of Pollution Control Tax Exemption	5			5.00

(A) Waiver of Pollution Control Tax Exemption is limited to the proposed structure(s) in the construction permit application.
(B) The department and county assessor will maintain a record of this waiver, and it must be in the construction permit application and made a condition in the approved construction permit.

22 Construction permit applicant can lawfully claim a Homestead Tax Exemption on the site where the proposed confinement structure is to be constructed
- OR -
the construction permit applicant is the closest resident to the proposed confinement structure.

	Score	Air	Water	Community
Site qualifies for Homestead Tax Exemption or permit applicant is closest resident to proposed structure	25			25.00

Proof of Homestead Tax Exemption is required as part of the construction permit application.
(A) Applicant include persons who have ownership interests. "Interest" - means ownership of a confinement feeding operation as a sole proprietor or a 10 percent or more ownership interest held by a person in a confinement feeding operation as a joint tenant, tenant in common, shareholder, partner, member, beneficiary or other equity interest holder. Ownership interest is an interest when it is held either directly, indirectly through a spouse or dependent child, or both.

23 Construction permit applicant can lawfully claim a Family Farm Tax Credit for agricultural land where the proposed confinement feeding operation is to be located pursuant to Iowa Code chapter 425A.

	Score	Air	Water	Community
Family Farm Tax Credit qualification	25			25.00

(A) Applicant include persons who have ownership interests. "Interest" - means ownership of a confinement feeding operation as a sole proprietor or a 10 percent or more ownership interest held by a person in a confinement feeding operation as a joint tenant, tenant in common, shareholder, partner, member, beneficiary or other equity interest holder. Ownership interest is an interest when it is held either directly, indirectly through a spouse or dependent child, or both.

24 Facility size.

	Score	Air	Water	Community
1 to 2,000 animal unit capacity	20			20.00
2,001 to 3,000 animal unit capacity	10			10.00
3,001 animal unit capacity or more	0			0.00

(A) Refer to the construction permit application package to determine the animal unit capacity of the proposed confinement structure at the completion of construction.
(B) If the proposed structure is part of an expansion, animal unit capacity (or animal weight capacity) must include all animals confined in adjacent confinement structures.
(C) Two or more animal feeding operations under common ownership or management are deemed to be a single animal feeding operation if they are adjacent or utilize a common area or system for manure disposal. In addition, for purposes of determining whether two or more confinement feeding operations are adjacent, all of the following must apply:
(a) At least one confinement feeding operation structure must be constructed on and after May 21, 1998.
(b) A confinement feeding operation structure which is part of one confinement feeding operation is separated by less than a minimum required distance from a confinement feeding operation structure which is part of the other confinement feeding operation. The minimum required distance shall be as follows:
(1) 1,250 feet for confinement feeding operations having a combined animal unit capacity of less than 1,000 animal units.
(2) 2,500 feet for confinement feeding operations having a combined animal unit capacity of 1,000 animal units or more.

25 Construction permit application includes livestock feeding and watering systems that significantly reduce manure volume.

	Score	Air	Water	Community
Wet/dry feeders or other feeding and watering systems that significantly reduce manure volume	25		12.50	12.50

The design, operation and maintenance plan for the feeding system must be in the construction permit application and made a condition in the approved construction permit.

Proposed Site Operation and Manure Management Practices

The following scoring criteria apply to the operation and manure management characteristics of the proposed confinement feeding operation. Mark <u>one</u> score under each criterion that best reflects the characteristics of the submitted manure management plan.

26 Liquid or dry manure *(choose only one subsection from subsections "a" - "e" and mark one*

		Score	Air	Water	Community
a.	Bulk dry manure is sold under Iowa Code chapter 200A and surface-applied	15		15.00	
	Bulk dry manure is sold under Iowa Code chapter 200A and incorporated on the same date it is land-applied	30	12.00	12.00	6.00
b.	Dry manure is composted and land-applied under the requirements of a department manure management plan	10	4.00	4.00	2.00
	Dry manure is composted and sold so that no manure is applied under the requirements of a department manure management plan	30	12.00	12.00	6.00

c.	Methane digester is used to generate energy from manure and remaining manure is surface-applied under the requirements of an approved department manure management plan	10	3.00	3.00	4.00
	After methane digestion is complete, manure is injected or incorporated on the same date it is land-applied under the requirements of an approved department manure management plan	30	12.00	12.00	6.00
d.	Dry manure is completely burned to generate energy and no remaining manure is applied under the requirements of a manure management plan	30	9.00	9.00	12.00
	Some dry manure is burned to generate energy, but remaining manure is land-applied and incorporated on the same date it is land-applied	30	12.00	12.00	6.00
e.	Injection or incorporation of manure on the same date it is land-applied	30	12.00	12.00	6.00

(A) Choose only ONE line from subsection "a", "b," "c," "d," or "e" above and mark only one score in that subsection.
(B) The injection or incorporation of manure must be in the construction permit application and made a condition in the approved construction permit.
(C) If an emergency arises and injection or incorporation is not feasible, prior to land application of manure the applicant must receive a written approval for an emergency waiver from a department field office to surface-apply manure.
(D) Requirements pertaining to the sale of bulk dry manure under pursuant to Iowa Code chapter 200A must be incorporated into the construction permit application and made a condition of the approved construction permit.
(E) The design, operation and maintenance plan for utilization of manure as an energy source must be in the construction permit application and made a condition in the approved construction permit.
(F) The design, operation and maintenance plan for composting facilities must be in the construction permit application and made a condition in the approved construction permit.

27 Land application of manure is based on a two-year crop rotation phosphorus uptake level.

	Score	Air	Water	Community
Two-year phosphorus crop uptake application rate	10		10.00	

(A) Land application of manure cannot exceed phosphorus crop usage levels for a two-year crop rotation cycle.
(B) The phosphorus uptake application rates must be in the construction permit application and made a condition in the approved construction permit.

28 Land application of manure to farmland that has USDA Natural Resources Conservation Service (NRCS) approved buffer strips contiguous to all water sources traversing or adjacent to the fields listed in the manure management plan.

	Score	Air	Water	Community
Manure application on farmland with buffer strips	10		8.00	2.00

(A) The department may request NRCS maintenance agreements to ensure proper design, installation and maintenance of filter strips. If a filter strip is present but not designed by NRCS, it must meet NRCS standard specifications.
(B) The application field does not need to be owned by the confinement facility owner to receive points.
(C) On current and future manure management plans, the requirement for buffer strips on all land application areas must be in the construction permit application and made a condition in the approved construction permit.

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29 Land application of manure does not occur on highly erodible land (HEL), as classified by the USDA NRCS.

	Score	Air	Water	Community
No manure application on HEL farmland	10		10.00	

Manure application on non-HEL farmland must be in the construction permit application and made a condition in the approved construction permit.

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30 Additional separation distance, above minimum requirements (0 or 750 feet, see below), for the land application of manure to the closest:
*Residence not owned by the owner of the confinement feeding operation,
* Hospital,
* Nursing home, or
*Licensed or registered child care facility.

	Score	Air	Water	Community
Additional separation distance of 200 feet	5	3.25		1.75
Additional separation distance of 500 feet	10	6.50		3.50

(A) The department will award points only for the single building, of the four listed above, closest to the proposed confinement feeding operation.
(B) Minimum separation distance for land application of manure injected or incorporated on the same date as application: 0 feet.
(C) Minimum separation distance for land application of manure broadcast on soil surface: 750 feet.
(D) The additional separation distances must be in the construction permit application and made a condition in the approved construction permit.
(E) "Licensed child care center" – a facility licensed by the department of human services providing child care or preschool services for seven or more children, except when the facility is registered as a child care home.
(F) "Registered child development homes" - child care providers certify that they comply with rules adopted by the department of human services. This process is voluntary for providers caring for five or fewer children and mandatory for providers caring for six or more children.
(G) A full listing of licensed and registered child care facilities is available at county offices of the department of huma

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31 Additional separation distance, above minimum requirements (0 or 750 feet, see below), for land application of manure to closest public use area.

	Score	Air	Water	Community
Additional separation distance of 200 feet	5	2.00		3.00

(A) "Public use area" - a portion of land owned by the United States, the state, or a political subdivision with facilities which attract the public to congregate and remain in the area for significant periods of time. Facilities include, but are not limited to, picnic grounds, campgrounds, cemeteries, lodges, shelter houses, playground equipment, lakes as listed in Table 2 in 567--Dhapter 65, and swimming beaches. It does not include a highway, road right-of-way, parking areas, recreational trails or other areas where the public passes through, but does not congregate or remain in the area for significant periods of time.
(B) Minimum separation distance for land application of manure injected or incorporated on the same date as application: 0 feet.
(C) Minimum separation distance for land application of manure broadcast on soil surface: 750 feet.
(D) The additional separation distances must be in the construction permit application and made a condition in the approved construction permit.

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32 Additional separation distance, above minimum requirements (0 or 750 feet, see below), for the land application of manure to the closest:
* Educational institution,
* Religious institution, or
* Commercial enterprise.

	Score	Air	Water	Community
Additional separation distance of 200 feet	5	2.00		3.00

(A) Minimum separation distance for land application of manure broadcast on soil surface: 750 feet.
(B) Minimum separation distance for land application of manure injected or incorporated on same date as application: 0 feet.
(C) The additional separation distances must be in the construction permit application and made a condition in the approved construction permit.
(D) "Educational institution" - a building in which an organized course of study or training is offered to students enrolled in kindergarten through grade 12 and served by local school districts, accredited or approved nonpublic schools, area educational agencies, community colleges, institutions of higher education under the control of the state board of regents, and accredited independent colleges and universities.
(E) "Religious institution" - a building in which an active congregation is devoted to worship.
(F) "Commercial enterprise" - a building which is used as a part of a business that manufactures goods, delivers services, or sells goods or services, which is customarily and regularly used by the general public during the entire calendar year and which is connected to electric, water, and sewer systems. A commercial enterprise does not include a farm operation.

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33 Additional separation distance of 50 feet, above minimum requirements (0 or 200 feet, see below), for the land application of manure to the closest private drinking water well or public drinking water well
- OR -
well is properly closed under supervision of county health officials.

	Score	Air	Water	Community
Additional separation distance of 50 feet or well is properly closed	10		8.00	2.00

(A) Minimum separation distance for land application of manure injected or incorporated on the same date as application or 50-foot vegetation buffer exists around well and manure is not applied to the buffer: 0 feet.
(B) Minimum separation distance for land application of manure broadcast on soil surface: 200 feet.
(C) If applicant chooses to close the well, the well closure must be incorporated into the construction permit application and made a condition in the approved construction permit.

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34 Additional separation distance, above minimum requirements, for the land application of manure to the closest:

* Agricultural drainage well,
* Known sinkhole,
* Major water source, or
* Water source.

	Score	Air	Water	Community
Additional separation distance of 200 feet	5	0.50	2.50	2.00
Additional separation distance of 400 feet	10	1.00	5.00	4.00

(A) "Agricultural drainage wells" - include surface intakes, cisterns and wellheads of agricultiral drainage wells.
(B) "Major water source" - a lake, reservoir, river or stream located within the territorial limits of the state, or any marginal river area adjacent to the state, which can support a floating vessel capable of carrying one or more persons during a total of a six-month period in one out of ten years, excluding periods of flooding. Major water sources in the state are listed in Tables 1 and 2 in 567--Chapter 65.
(C) "Water source" - a lake, river, reservoir, creek, stream, ditch, or other body of water or channel having definite banks and a bed with water flow, except lakes or ponds without an outlet to which only one landowner is riparian.
(D) The additional separation distances must be in the construction permit application and made a condition in the approved construction permit.

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35 Additional separation distance above minimum requirements, for the land application of manure, to the closest:

* High quality (HQ) water,
* High quality resource (HQR) water, or
* Protected water area (PWA).

	Score	Air	Water	Community
Additional separation distance of 200 feet	5		3.75	1.25
Additional separation distance of 400 feet	10		7.50	2.50

(A) HQ waters are identified in 567--Chapter 61.
(B) HQR waters are identified in 567--Chapter 61.
(C) A listing of PWAs is available at http://www.state.ia.us/government/dnr/organiza/ppd/prowater.htm#Location%20of%20PWA's%20in

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36 Demonstrated community support.

	Score	Air	Water	Community
Written approval of 100% of the property oweners within a one mile radius.	20			20.00

37 Worker safety and protection plan is submitted with the construction permit application.

	Score	Air	Water	Community
Submission of worker safety and protection plan	10			10.00

(A) The worker safety and protection plan must be in the construction permit application and made a condition in the approved construction permit.
(B) The worker safety and protection plan and subsequent records must be kept on site with the manure management plan records.

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38 Applicant signs a waiver of confidentiality allowing public to view confidential manure management plan land application records

	Score	Air	Water	Community
Manure management plan confidentiality waiver	5			5.00

The waiver of confidentiality must be in the construction permit application and made a condition in the approved construction permit. The applicant may limit public inspection to reasonable times and places.

39 Added economic value based on quality job development (number of full time equivalent (FTE) positions), and salary equal to or above Iowa department of workforce development median (45-2093)

- OR -

the proposed structure increases commercial property tax base in the county.

	Score	Air	Water	Community
Economic value to local community	10			10.00

The Iowa department of workforce development regional profiles are available at http://www.iowaworkforce.org/centers/regionalsites.htm. Select the appropriate region and then select "Regional Profile."

40 Construction permit application contains an emergency action plan.

	Score	Air	Water	Community
Emergency action plan	5		2.50	2.50

(A) Iowa State University Extension publication PM 1859 lists the components of an emergency action plan. The emergency action plan submitted should parallel the components listed in the publication.
(B) The posting and implementation of an emergency action plan must be in the construction permit application and made a condition in the approved construction permit.
(C) The emergency action plan and subsequent records must be kept on site with the manure management plan records.

41 Construction permit application contains a closure plan.

	Score	Air	Water	Community
Closure plan	5		2.50	2.50

(A) The closure plan must be in the construction permit application and made a condition in the approved construction permit.
(B) The closure plan must be kept on site with the manure management plan records.

42 Adoption and implementation of an environmental management system (EMS) recognized by the department.

	Score	Air	Water	Community
EMS	15	4.50	4.50	6.00

(A) The EMS must be in the construction permit application and made a condition in the approved construction permit.
(B) The EMS must be recognized by the department as an acceptable EMS for use with confinement operations.

43 Adoption and implementation of NRCS approved Comprehensive Nutrient Management Plan (CNMP).

	Score	Air	Water	Community
CNMP	10	3.00	3.00	4.00

The implementation and continuation of a CNMP must be in the construction permit application and made a condition in the approved construction permit.

44 Groundwater monitoring wells installed near manure storage structure), and applicant agrees to provide data to the department.

	Score	Air	Water	Community
Groundwater monitoring	15		10.50	4.50

(A) Monitoring well location, sampling and data submission must meet department requirements.
(B) The design, operation and maintenance plan for the groundwater monitoring wells, and data transfer to the department, must be in the construction permit application and made a condition in the approved construction permit.

	Total Score	Air	Water	Community
	880	213.50	271.00	404.50
Score to pass	440	53.38	67.75	101.13

Grandview Farms Inc. Master Matrix Points	Total	Air	Water	Community
	475	92	157	226

Manure Management Plan Form
Animal Feeding Operation Information

Instructions: Complete this form for your animal feeding operation. Footnotes are provided on page 4.

The information within this form, and the attachments, describes my animal feeding operation, my manure storage and handling system, and my planned manure management system. I (we) will manage the manure, and the nutrients it contains, as described within this manure management plan (MMP) and any revisions of the plan, individual field information, and field summary sheet, and in accordance with current rules and regulations. Deviations permitted by Iowa law will be documented and maintained in my records.

Signed: Grandview Farms Inc by Tom Dittmer (Signature) Grandview Farms Inc by Tom Dittmer (Print name) **Date:** 2-12-15

Name of operation: Grandview Farms Sow Farm **Facility ID No.** 59556

Location of the operation*: 12090 - 240th St. (911 Address)

Eldridge (Town) Iowa (State) 52748 (Zip Code)

SW ¼ (¼ ¼) of the SW ¼ (¼) of Sec 7 (Section) T 79N (Tier & Range) R 3E

Sheridan (Township Name) Scott (County)

Owner and Contacts of the animal feeding operation:

Owner Grandview Farms, Inc. Phone 563-285-4006

Address 12090 - 240th Street, Eldridge, Iowa 52748

Email address (optional) _____ Cell phone (optional) _____

Contact person (if different than owner) **Tom Dittmer** Phone **563-285-4006**

Address **12090 - 240th Street, Eldridge, Iowa 52748**

Email address (optional) **tadittmer@aol.com** Cell phone (optional) _____

Contract Company (if applicable) _____ Phone _____

Address _____

This manure management plan is for: (check one)

___ existing operation, not expanding _X_ existing operation, expanding ___ existing operation, new owner ___ new operation

Construction and Expansion Dates: 1979 date of initial construction

82, 83, 84 91, 93, 2001 05, 06,10,12 and date(s) of all expansion(s)

Table 1. Information about livestock production and manure management system

1	2	3	4	5	6	7	8
Animal Type/ Production phase [a]	Max. Number of Animals Confined (head)	Manure Storage Structure [b]	N [c] lb/1000 gal or lb/ton	P_2O_5 [c] lb/1000 gal or lb/ton	gal/space/day or ton/space/year [d]	Days/yr Facility Occupied	Annual Manure Produced [e] (gal or tons)
Gestation/boars	**5461**	**Pit**	**25**	**25**	**3.9**	**365**	**7,773,734**
Farrowing	**1158**	**Pit/tank**	**25**	**25**	**3.9**	**365**	**1,648,413**
Finish	**3910**	**Pit**	**38**	**33**	**0.94**	**365**	**1,427,150**
Nursery	**400**	**Pit**	**38**	**33**	**0.2**	**365**	**29,200**
						Total Gallons	**10,878,497**
						Total Tons	

Estimate of Annual Animal Production [f]: **75,000** animals/year

Source of Nutrient Content Data (columns 4, 5): standard tables, analysis of manure samples, other: _____

Actual manure analysis were used, except for the nursery manure.

* An example of a legal description is available on page 3 of the Introduction and Instructions.

Manure Management Plan Form
Animal Feeding Operation Information

Instructions: Complete this form for your animal feeding operation. Footnotes are provided on page 4.

The information within this form, and the attachments, describes my animal feeding operation, my manure storage and handling system, and my planned manure management system. I (we) will manage the manure, and the nutrients it contains, as described within this manure management plan (MMP) and any revisions of the plan, individual field information, and field summary sheet, and in accordance with current rules and regulations. Deviations permitted by Iowa law will be documented and maintained in my records.

Signed: _____ **Date:** _____
(Signature) (Print name)

Name of operation: Grandview Farms West Sow (Home W/F) **Facility ID No.** 58145

Location of the operation*: 12090 - 240th St.
(911 Address)

Eldridge Iowa 52748
(Town) (State) (Zip Code)

E1/2 (¼ ¼) of the SE (¼) ¼ of Sec 12 (Section) T 79N (Tier & Range) R 2 E Hickory Grove (Township Name) Scott (County)

Owner and Contacts of the animal feeding operation:

Owner Grandview Farms, Inc. Phone 563-285-4006

Address 12090 - 240th Street, Eldridge, Iowa 52748

Email address (optional) _____ Cell phone (optional) _____

Contact person (if different than owner) **Tom Dittmer** Phone **563-285-4006**

Address **12090 - 240th Street, Eldridge, Iowa 52748**

Email address (optional) **tadittmer@aol.com** Cell phone (optional) _____

Contract Company (if applicable) _____ Phone _____

Address _____

This manure management plan is for: (check one)
___ existing operation, not expanding _X_ existing operation, expanding ___ existing operation, new owner ___ new operation

Construction and Expansion Dates: 1997 date of initial construction
and date(s) of all expansion(s)
_____ _____ _____

Table 1. Information about livestock production and manure management system

1	2	3	4	5	6	7	8
Animal Type/ Production phase [a]	Max. Number of Animals Confined (head)	Manure Storage Structure [b]	N^c lb/1000 gal	P_2O_5 [c] lb/ton	gal/space/day or ton/space/year [d]	Days/yr Facility Occupied	Annual Manure Produced [e] (gal or tons)
Gestation/boars	**2022**	**Pit**	**25**	**25**	**3.9**	**365**	**2,878,317**
Farrowing	**480**	**Pit**	**25**	**25**	**3.9**	**365**	**683,280**
						Total Gallons	**3,561,597**
						Total Tons	

Estimate of Annual Animal Production [f]: **50,000** animals/year

Source of Nutrient Content Data (columns 4, 5): standard tables, analysis of manure samples, other: _____
Actual manure analysis were used, except for the nursery manure.

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* An example of a legal description is available on page 3 of the Introduction and Instructions.

Manure Management Plan Form
Determining Maximum Allowable Manure Application Rates

Instructions: Complete a worksheet for each unique combination of the following factors (crop rotation, optimum crop yield, manure nutrient concentration, remaining crop N need, method of application) that occurs at this operation. Complete form by fillin

Management Identification (Mgt ID)[g] A1) Corn-Corn

(identify this application scenario by letter)

Method to determine optimum crop yield[h] USDA Iowa Ag Statistics County yields

Timing of application fall/spring

Method of application[i] Knifed in or soil injection of liquid manure

Application loss factor 0.98

If spray irrigation is used, identify method

Table 2. Manure nutrient concentration

Manure Nutrient Content (lbs/1000gal or lbs/ton)					
Manure Storage Structure(s) [k]	Gestation/Farrowing pits				
Total N [l]	25		**P_2O_5**	25	
%TN Available 1st year	100%	**2nd year**		**3rd year**	
Available N 1st year[m]	24.5	**2nd year[n]**	0.0	**3rd year[o]**	0.0

Table 3. Crop usage rates[p]

lb/bu or lb/ton	N	P_2O_5
Corn	1.2	0.375
Soybean	3.8	0.8
Alfalfa	50	12.5
Other crop	0	0

*Use blank space above to add crop not listed.

Table 4. Calculations for rate based on nitrogen (always required)

1	**Applying Manure For** (crop to be grown) [q]		Corn	Corn	Corn	Corn
2	**Optimum Crop Yield [h]**	bu or ton/acre	179	179	179	179
3	**P_2O_5 removed with crop by harvest [r]**	lb/acre	67.1	67.1	67.1	67.1
4	**Crop N utilization [s]**	lb/acre	215	215	215	215
5a	**Legume N credit [t]**	lb/acre		0	0	0
5b	**Commercial N planned[u]**	lb/acre	85	85	85	85
5c	**Manure N carryover credit [v]**	lb/acre		0.0	0.0	0.0
6	**Remaining crop N need [w]**	lb/acre	130	130	130	130
7	**Manure rate to supply remaining N [x]**	gal/acre	5298	5298	5298	5298
8	**P_2O_5 applied with N-based rate [y]**	lb/acre	132	132	132	132

Table 5. Calculations for rate based on phosphorus (fill out only if P-based rates are planned)

9	**Commercial P_2O_5 planned [z]**	lb/acre				
10	**Manure rate to supply P removal [aa]**	gal/acre	2685	2685	2685	2685
11	**Manure rate for P based plan [bb]**	gal/acre				
12	**Manure N applied with P-based plan [cc]**	lb/acree	0	0	0	0

Table 6. Application rates that will be carried over to page 3

13	**Planned manure application rate [dd]**	gal/acre	5300	5300	5300	5300

When applicable, manure application rates must be based on the P index value as follows:
(0-2) N-based manure management.
(>2-5) N-based manure management but P application rate cannot exceed two times the P removal rate of the crop schedule.
(>5-10) Until December 31, 2008, P-based manure management while adopting practices to reduce P index to 5 or below.
(>10) No manure application until practices are adopted to reduce P index to 5 or below

Manure Management Plan Form
Determining Maximum Allowable Manure Application Rates

Instructions: Complete a worksheet for each unique combination of the following factors (crop rotation, optimum crop yield, manure nutrient concentration, remaining crop N need, method of application) that occurs at this operation. Complete form by fillin

Management Identification (Mgt ID)[g] A1) Corn-Corn

(identify this application scenario by letter)

Method to determine optimum crop yield[h] USDA Iowa Ag Statistics County yields

Timing of application fall/spring

Method of application[i] Knifed in or soil injection of liquid manure

Application loss factor 0.98

If spray irrigation is used, identify method

Table 2. Manure nutrient concentration

Manure Nutrient Content (lbs/1000gal or lbs/ton)					
Manure Storage Structure(s) [k]	Gestation/Farrowing pits				
Total N [l]	25		**P_2O_5**	25	
%TN Available 1st year	100%	**2nd year**		**3rd year**	
Available N 1st year[m]	24.5	**2nd year[n]**	0.0	**3rd year[o]**	0.0

Table 3. Crop usage rates[p]

lb/bu or lb/ton	N	P_2O_5
Corn	1.2	0.375
Soybean	3.8	0.8
Alfalfa	50	12.5
Other crop	0	0

*Use blank space above to add crop not listed.

Table 4. Calculations for rate based on nitrogen (always required)

1	**Applying Manure For** (crop to be grown) [q]		Corn	Corn	Corn	Corn
2	**Optimum Crop Yield [h]**	bu or ton/acre	179	179	179	179
3	**P_2O_5 removed with crop by harvest [r]**	lb/acre	67.1	67.1	67.1	67.1
4	**Crop N utilization [s]**	lb/acre	215	215	215	215
5a	**Legume N credit [t]**	lb/acre		0	0	0
5b	**Commercial N planned[u]**	lb/acre	30	30	30	30
5c	**Manure N carryover credit [v]**	lb/acre		0.0	0.0	0.0
6	**Remaining crop N need [w]**	lb/acre	185	185	185	185
7	**Manure rate to supply remaining N [x]**	gal/acre	7543	7543	7543	7543
8	**P_2O_5 applied with N-based rate [y]**	lb/acre	189	189	189	189

Table 5. Calculations for rate based on phosphorus (fill out only if P-based rates are planned)

9	**Commercial P_2O_5 planned [z]**	lb/acre				
10	**Manure rate to supply P removal [aa]**	gal/acre	2685	2685	2685	2685
11	**Manure rate for P based plan [bb]**	gal/acre				
12	**Manure N applied with P-based plan [cc]**	lb/acree	0	0	0	0

Table 6. Application rates that will be carried over to page 3

13	**Planned manure application rate [dd]**	gal/acre	7500	7500	7500	7500

When applicable, manure application rates must be based on the P index value as follows:
(0-2) N-based manure management.
(>2-5) N-based manure management but P application rate cannot exceed two times the P removal rate of the crop schedule.
(>5-10) Until December 31, 2008, P-based manure management while adopting practices to reduce P index to 5 or below.
(>10) No manure application until practices are adopted to reduce P index to 5 or below

Manure Management Plan Form
Determining Maximum Allowable Manure Application Rates

Instructions: Complete a worksheet for each unique combination of the following factors (crop rotation, optimum crop yield, manure nutrient concentration, remaining crop N need, method of application) that occurs at this operation. Complete form by fillin

Management Identification (Mgt ID)[g] A2) Corn-Soybean

(identify this application scenario by letter)

Method to determine optimum crop yield[h] USDA Iowa Ag Statistics County yields

Timing of application fall/spring

Method of application[i] Knifed in or soil injection of liquid manure

Application loss factor 0.98

If spray irrigation is used, identify method

Table 2. Manure nutrient concentration

Manure Nutrient Content (lbs/1000gal or lbs/ton)					
Manure Storage Structure(s) [k]	Gestation/Farrowing pits				
Total N [l]	25		**P_2O_5**	25	
%TN Available 1st year	100%	**2nd year**		**3rd year**	
Available N 1st year[m]	24.5	**2nd year[n]**	0.0	**3rd year[o]**	0.0

Table 3. Crop usage rates[p]

lb/bu or lb/ton	N	P_2O_5
Corn	1.2	0.375
Soybean	3.8	0.8
Alfalfa	50	12.5
Other crop	0	0

*Use blank space above to add crop not listed.

Table 4. Calculations for rate based on nitrogen (always required)

1	**Applying Manure For** (crop to be grown) [q]		Corn	Soybean	Corn	Soybean
2	**Optimum Crop Yield [h]**	bu or ton/acre	179	60	179	60
3	**P_2O_5 removed with crop by harvest [r]**	lb/acre	67.1	48.0	67.1	48.0
4	**Crop N utilization [s]**	lb/acre	215	228	215	228
5a	**Legume N credit [t]**	lb/acre	50.00	0	50	0
5b	**Commercial N planned[u]**	lb/acre				
5c	**Manure N carryover credit [v]**	lb/acre		0.0	0.0	0.0
6	**Remaining crop N need [w]**	lb/acre	165	228	165	228
7	**Manure rate to supply remaining N [x]**	gal/acre	6727	9306	6727	9306
8	**P_2O_5 applied with N-based rate [y]**	lb/acre	168	233	168	233

Table 5. Calculations for rate based on phosphorus (fill out only if P-based rates are planned)

9	**Commercial P_2O_5 planned [z]**	lb/acre				
10	**Manure rate to supply P removal [aa]**	gal/acre	2685	1920	2685	1920
11	**Manure rate for P based plan [bb]**	gal/acre				
12	**Manure N applied with P-based plan [cc]**	lb/acree	0	0	0	0

Table 6. Application rates that will be carried over to page 3

13	**Planned manure application rate [dd]**	gal/acre	6700		6700	

When applicable, manure application rates must be based on the P index value as follows:
(0-2) N-based manure management.
(>2-5) N-based manure management but P application rate cannot exceed two times the P removal rate of the crop schedule.
(>5-10) Until December 31, 2008, P-based manure management while adopting practices to reduce P index to 5 or below.
(>10) No manure application until practices are adopted to reduce P index to 5 or below

Manure Management Plan Form
Determining Maximum Allowable Manure Application Rates

Instructions: Complete a worksheet for each unique combination of the following factors (crop rotation, optimum crop yield, manure nutrient concentration, remaining crop N need, method of application) that occurs at this operation. Complete form by fillin

Management Identification (Mgt ID)[g] A3) Corn-Corn-Soybean
(identify this application scenario by letter)

Method to determine optimum crop yield[h] USDA Iowa Ag Statistics County yields

Timing of application fall/spring

Method of application[i] Knifed in or soil injection of liquid manure

Application loss factor 0.98

If spray irrigation is used, identify method

Table 2. Manure nutrient concentration

Manure Nutrient Content (lbs/1000gal or lbs/ton)					
Manure Storage Structure(s) [k]	Gestation/Farrowing pits				
Total N [l]	25		**P_2O_5**	25	
%TN Available 1st year	100%	**2nd year**		**3rd year**	
Available N 1st year[m]	24.5	**2nd year[n]**	0.0	**3rd year[o]**	0.0

Table 3. Crop usage rates[p]

lb/bu or lb/ton	N	P_2O_5
Corn	1.2	0.375
Soybean	3.8	0.8
Alfalfa	50	12.5
Other crop	0	0

*Use blank space above to add crop not listed.

Table 4. Calculations for rate based on nitrogen (always required)

1	**Applying Manure For** (crop to be grown) [q]		Corn	Corn	Soybean	Corn
2	**Optimum Crop Yield [h]**	bu or ton/acre	179	179	60	179
3	**P_2O_5 removed with crop by harvest [r]**	lb/acre	67.1	67.1	48.0	67.1
4	**Crop N utilization [s]**	lb/acre	215	215	228	215
5a	**Legume N credit [t]**	lb/acre	50.00	0	0	50
5b	**Commercial N planned[u]**	lb/acre				
5c	**Manure N carryover credit [v]**	lb/acre		0.0	0.0	0.0
6	**Remaining crop N need [w]**	lb/acre	165	215	228	165
7	**Manure rate to supply remaining N [x]**	gal/acre	6727	8767	9306	6727
8	**P_2O_5 applied with N-based rate [y]**	lb/acre	168	219	233	168

Table 5. Calculations for rate based on phosphorus (fill out only if P-based rates are planned)

9	**Commercial P_2O_5 planned [z]**	lb/acre				
10	**Manure rate to supply P removal [aa]**	gal/acre	2685	2685	1920	2685
11	**Manure rate for P based plan [bb]**	gal/acre				
12	**Manure N applied with P-based plan [cc]**	lb/acree	0	0	0	0

Table 6. Application rates that will be carried over to page 3

13	**Planned manure application rate [dd]**	gal/acre	6700	7500		6700

When applicable, manure application rates must be based on the P index value as follows:
(0-2) N-based manure management.
(>2-5) N-based manure management but P application rate cannot exceed two times the P removal rate of the crop schedule.
(>5-10) Until December 31, 2008, P-based manure management while adopting practices to reduce P index to 5 or below.
(>10) No manure application until practices are adopted to reduce P index to 5 or below

Manure Management Plan Form
Determining Maximum Allowable Manure Application Rates

Instructions: Complete a worksheet for each unique combination of the following factors (crop rotation, optimum crop yield, manure nutrient concentration, remaining crop N need, method of application) that occurs at this operation. Complete form by fillin

Management Identification (Mgt ID)[g]

C1) Corn-Corn

(identify this application scenario by letter)

Method to determine optimum crop yield[h] USDA Iowa Ag Statistics County yields

Timing of application fall/spring

Method of application[i] Knifed in or soil injection of liquid manure

Application loss factor 0.98

If spray irrigation is used, identify method

Table 2. Manure nutrient concentration

Manure Nutrient Content (lbs/1000gal or lbs/ton)					
Manure Storage Structure(s) [k]	Gilt developer/breeding/nursery				
Total N [l]	38		**P_2O_5**	33	
%TN Available 1st year	100%	**2nd year**		**3rd year**	
Available N 1st year[m]	37.2	**2nd year**[n]	0.0	**3rd year**[o]	0.0

Table 3. Crop usage rates[p]

lb/bu or lb/ton	N	P_2O_5
Corn	1.2	0.375
Soybean	3.8	0.8
Alfalfa	50	12.5
Other crop	0	0

*Use blank space above to add crop not listed.

Table 4. Calculations for rate based on nitrogen (always required)

1	**Applying Manure For** (crop to be grown) [q]		Corn	Corn	Corn	Corn
2	**Optimum Crop Yield** [h]	bu or ton/acre	179	179	179	179
3	**P_2O_5 removed with crop by harvest** [r]	lb/acre	67.1	67.1	67.1	67.1
4	**Crop N utilization** [s]	lb/acre	215	215	215	215
5a	**Legume N credit** [t]	lb/acre		0	0	0
5b	**Commercial N planned**[u]	lb/acre	65	65	65	65
5c	**Manure N carryover credit** [v]	lb/acre		0.0	0.0	0.0
6	**Remaining crop N need** [w]	lb/acre	150	150	150	150
7	**Manure rate to supply remaining N** [x]	gal/acre	4023	4023	4023	4023
8	**P_2O_5 applied with N-based rate** [y]	lb/acre	133	133	133	133

Table 5. Calculations for rate based on phosphorus (fill out only if P-based rates are planned)

9	**Commercial P_2O_5 planned** [z]	lb/acre				
10	**Manure rate to supply P removal** [aa]	gal/acre	2034	2034	2034	2034
11	**Manure rate for P based plan** [bb]	gal/acre				
12	**Manure N applied with P-based plan** [cc]	lb/acree	0	0	0	0

Table 6. Application rates that will be carried over to page 3

13	**Planned manure application rate** [dd]	gal/acre	4000	4000	4000	4000

When applicable, manure application rates must be based on the P index value as follows:
(0-2) N-based manure management.
(>2-5) N-based manure management but P application rate cannot exceed two times the P removal rate of the crop schedule.
(>5-10) Until December 31, 2008, P-based manure management while adopting practices to reduce P index to 5 or below.
(>10) No manure application until practices are adopted to reduce P index to 5 or below

Manure Management Plan Form
Determining Maximum Allowable Manure Application Rates

Instructions: Complete a worksheet for each unique combination of the following factors (crop rotation, optimum crop yield, manure nutrient concentration, remaining crop N need, method of application) that occurs at this operation. Complete form by fillin

Management Identification (Mgt ID)[g] C1) Corn-Corn

(identify this application scenario by letter)

Method to determine optimum crop yield[h] USDA Iowa Ag Statistics County yields

Timing of application fall/spring

Method of application[i] Knifed in or soil injection of liquid manure

Application loss factor 0.98

If spray irrigation is used, identify method

Table 2. Manure nutrient concentration

Manure Nutrient Content (lbs/1000gal or lbs/ton)					
Manure Storage Structure(s) [k]	Gilt developer/breeding/nursery				
Total N [l]	38		**P_2O_5**	33	
%TN Available 1st year	100%	**2nd year**		**3rd year**	
Available N 1st year[m]	37.2	**2nd year[n]**	0.0	**3rd year[o]**	0.0

Table 3. Crop usage rates[p]

lb/bu or lb/ton	N	P_2O_5
Corn	1.2	0.375
Soybean	3.8	0.8
Alfalfa	50	12.5
Other crop	0	0

*Use blank space above to add crop not listed.

Table 4. Calculations for rate based on nitrogen (always required)

1	**Applying Manure For** (crop to be grown) [q]		Corn	Corn	Corn	Corn
2	**Optimum Crop Yield [h]**	bu or ton/acre	179	179	179	179
3	**P_2O_5 removed with crop by harvest [r]**	lb/acre	67.1	67.1	67.1	67.1
4	**Crop N utilization [s]**	lb/acre	215	215	215	215
5a	**Legume N credit [t]**	lb/acre		0	0	0
5b	**Commercial N planned[u]**	lb/acre				
5c	**Manure N carryover credit [v]**	lb/acre		0.0	0.0	0.0
6	**Remaining crop N need [w]**	lb/acre	215	215	215	215
7	**Manure rate to supply remaining N [x]**	gal/acre	5768	5768	5768	5768
8	**P_2O_5 applied with N-based rate [y]**	lb/acre	190	190	190	190

Table 5. Calculations for rate based on phosphorus (fill out only if P-based rates are planned)

9	**Commercial P_2O_5 planned [z]**	lb/acre				
10	**Manure rate to supply P removal [aa]**	gal/acre	2034	2034	2034	2034
11	**Manure rate for P based plan [bb]**	gal/acre				
12	**Manure N applied with P-based plan [cc]**	lb/acree	0	0	0	0

Table 6. Application rates that will be carried over to page 3

13	**Planned manure application rate [dd]**	gal/acre	5700		5700	

When applicable, manure application rates must be based on the P index value as follows:
(0-2) N-based manure management.
(>2-5) N-based manure management but P application rate cannot exceed two times the P removal rate of the crop schedule.
(>5-10) Until December 31, 2008, P-based manure management while adopting practices to reduce P index to 5 or below.
(>10) No manure application until practices are adopted to reduce P index to 5 or below

Manure Management Plan Form
Determining Maximum Allowable Manure Application Rates

Instructions: Complete a worksheet for each unique combination of the following factors (crop rotation, optimum crop yield, manure nutrient concentration, remaining crop N need, method of application) that occurs at this operation. Complete form by fillin

Management Identification (Mgt ID)[g] C2) Corn-Soybean

(identify this application scenario by letter)

Method to determine optimum crop yield[h] USDA Iowa Ag Statistics County yields

Timing of application fall/spring

Method of application[i] Knifed in or soil injection of liquid manure

Application loss factor 0.98

If spray irrigation is used, identify method

Table 2. Manure nutrient concentration

Manure Nutrient Content (lbs/1000gal or lbs/ton)					
Manure Storage Structure(s) [k]	Gilt developer/breeding/nursery				
Total N [l]	38		**P_2O_5**	33	
%TN Available 1st year	100%	**2nd year**		**3rd year**	
Available N 1st year[m]	37.2	**2nd year[n]**	0.0	**3rd year[o]**	0.0

Table 3. Crop usage rates[p]

lb/bu or lb/ton	N	P_2O_5
Corn	1.2	0.375
Soybean	3.8	0.8
Alfalfa	50	12.5
Other crop	0	0

*Use blank space above to add crop not listed.

Table 4. Calculations for rate based on nitrogen (always required)

1	**Applying Manure For** (crop to be grown) [q]		Corn	Soybean	Corn	Soybean
2	**Optimum Crop Yield [h]**	bu or ton/acre	179	60	179	60
3	**P_2O_5 removed with crop by harvest [r]**	lb/acre	67.1	48.0	67.1	48.0
4	**Crop N utilization [s]**	lb/acre	215	228	215	228
5a	**Legume N credit [t]**	lb/acre	50.00	0	50	0
5b	**Commercial N planned[u]**	lb/acre				
5c	**Manure N carryover credit [v]**	lb/acre		0.0	0.0	0.0
6	**Remaining crop N need [w]**	lb/acre	165	228	165	228
7	**Manure rate to supply remaining N [x]**	gal/acre	4425	6122	4425	6122
8	**P_2O_5 applied with N-based rate [y]**	lb/acre	146	202	146	202

Table 5. Calculations for rate based on phosphorus (fill out only if P-based rates are planned)

9	**Commercial P_2O_5 planned [z]**	lb/acre				
10	**Manure rate to supply P removal [aa]**	gal/acre	2034	1455	2034	1455
11	**Manure rate for P based plan [bb]**	gal/acre				
12	**Manure N applied with P-based plan [cc]**	lb/acree	0	0	0	0

Table 6. Application rates that will be carried over to page 3

13	**Planned manure application rate [dd]**	gal/acre	4400		4400	

When applicable, manure application rates must be based on the P index value as follows:
(0-2) N-based manure management.
(>2-5) N-based manure management but P application rate cannot exceed two times the P removal rate of the crop schedule.
(>5-10) Until December 31, 2008, P-based manure management while adopting practices to reduce P index to 5 or below.
(>10) No manure application until practices are adopted to reduce P index to 5 or below

Manure Management Plan Form
Determining Maximum Allowable Manure Application Rates

Instructions: Complete a worksheet for each unique combination of the following factors (crop rotation, optimum crop yield, manure nutrient concentration, remaining crop N need, method of application) that occurs at this operation. Complete form by fillin

Management Identification (Mgt ID)[g] C3) Corn-Corn-Beans

(identify this application scenario by letter)

Method to determine optimum crop yield[h] USDA Iowa Ag Statistics County yields

Timing of application fall/spring

Method of application[i] Knifed in or soil injection of liquid manure

Application loss factor 0.98

If spray irrigation is used, identify method

Table 2. Manure nutrient concentration

Manure Nutrient Content (lbs/1000gal or lbs/ton)					
Manure Storage Structure(s) [k]	Gilt developer/breeding/nursery				
Total N [l]	38		**P_2O_5**	33	
%TN Available 1st year	100%	**2nd year**		**3rd year**	
Available N 1st year[m]	37.2	**2nd year[n]**	0.0	**3rd year[o]**	0.0

Table 3. Crop usage rates[p]

lb/bu or lb/ton	N	P_2O_5
Corn	1.2	0.375
Soybean	3.8	0.8
Alfalfa	50	12.5
Other crop	0	0

*Use blank space above to add crop not listed.

Table 4. Calculations for rate based on nitrogen (always required)

1	**Applying Manure For** (crop to be grown) [q]		Corn	Corn	Soybean	Corn
2	**Optimum Crop Yield [h]**	bu or ton/acre	179	179	60	179
3	**P_2O_5 removed with crop by harvest [r]**	lb/acre	67.1	67.1	48.0	67.1
4	**Crop N utilization [s]**	lb/acre	215	215	228	215
5a	**Legume N credit [t]**	lb/acre	50.00	0	0	50
5b	**Commercial N planned[u]**	lb/acre				
5c	**Manure N carryover credit [v]**	lb/acre		0.0	0.0	0.0
6	**Remaining crop N need [w]**	lb/acre	165	215	228	165
7	**Manure rate to supply remaining N [x]**	gal/acre	4425	5768	6122	4425
8	**P_2O_5 applied with N-based rate [y]**	lb/acre	146	190	202	146

Table 5. Calculations for rate based on phosphorus (fill out only if P-based rates are planned)

9	**Commercial P_2O_5 planned [z]**	lb/acre				
10	**Manure rate to supply P removal [aa]**	gal/acre	2034	2034	1455	2034
11	**Manure rate for P based plan [bb]**	gal/acre				
12	**Manure N applied with P-based plan [cc]**	lb/acree	0	0	0	0

Table 6. Application rates that will be carried over to page 3

13	**Planned manure application rate [dd]**	gal/acre	4400	5700		4400

When applicable, manure application rates must be based on the P index value as follows:
(0-2) N-based manure management.
(>2-5) N-based manure management but P application rate cannot exceed two times the P removal rate of the crop schedule.
(>5-10) Until December 31, 2008, P-based manure management while adopting practices to reduce P index to 5 or below.
(>10) No manure application until practices are adopted to reduce P index to 5 or below

Manure Management Plan Form

Year by Year Manure Management Plan Summary

Instructions: Complete this form for each of the next four growing seasons, to demonstrate sufficient land base to apply manure over multiple crop years. If this page is identical for multiple years (e.g. every other year), submit only once for the identical years, and indicate which years the form represents. Footnotes are given on page 6.

Crop year(s): 2015 - 1

1	2	3	4	5	6	7	8	9	10	11
Field Designation [ee]	Field Location ___1/4 of the___ 1/4 Sec___ T___ R___ Townsip Name_____, County Name _____	Mgt Id [ff]	Planned Crop	Acres receiving manure[gg]	Own, rent, agreement (include length of agreement) [hh]	P index value [ii]	HEL (Y/N)[jj]	Planned Application		Correct Soil Test for P[ll] (Yes or No)
								gal/acre	gal/field [kk]	
Curtis 80	E1/2 NW 1 79N 2E Hickory Grove, Scott	1	Corn	76	Agment(evergreen)	2.20	N	5300	402800	Yes
Curtis 142	NE 1 79N 2E Hickory Grove, Scott	1	Corn	142	Agment(evergreen)	1.52	N	7500	1065000	Yes
Neufeld NE	SE 2 79N 2E Hickory Grove, Scott	1	Corn	28.2	Agment(evergreen)	2.43	Y	5300	149460	Yes
Newfeld NW	SE 2 79N 2E Hickory Grove, Scott	1	Corn	10	Agment(evergreen)	3.72	Y	5300	53000	Yes
Newfeld SW	SE 2 79N 2E Hickory Grove, Scott	1	Corn	29.2	Agment(evergreen)	2.20	Y	5300	154760	Yes
Neufeld SE	SE 2 79N 2E Hickory Grove, Scott	1	Corn	79.3	Agment(evergreen)	2.19	Y	5300	420290	Yes
									0	
Rose	E1/2 NW 32 79N 3E Sheridan, Scott	1	Corn	40	Agment(evergreen)	0.65	Y	7500	300000	Yes
Gehrls a	NE 79N 2E Hick. Gv.&S1/2 SE 35 Alns Gv, Scott	1	Corn	165.1	Agment(evergreen)	2.28	Y	5300	875030	Yes
Gehrls b	NE 79N 2E Hickory Grove, Scott	1	Corn	15.4	Agment(evergreen)	2.98	Y	5300	81620	Yes
Rivaldd N	E1/2 NE 14 & W1/2 NW 13 79N 2E Hick. Gv, Scott	3	Corn 2	76.2	Agment(evergreen)	2.54	Y	7500	571500	Yes
Rivaldd S	E1/2 NE 14 & W1/2 NW 13 79N 2E Hick. Gv, Scott	3	Corn 1	82	Agment(evergreen)	3.35	Y	4400	360800	Yes
Quinn N	E1/2 NE 13 79N 2E Hickory Grove, Scott	3	Corn 2	76.1	Agment(evergreen)	2.75	N	7500	570750	Yes
Quinn S	SW NE 13 79N 2E Hickory Grove, Scott	3	Corn 2	26.4	Agment(evergreen)	2.51	N	7500	198000	Yes
Quinn W	SE NW 13 79N 2E Hickory Grove, Scott	3	Corn 2	35.6	Agment(evergreen)	2.66	Y	7500	267000	Yes
Keppy NN	E1/2 NW & N1/2 SW 18 79N 3E Sheridan, Scott	3	Soybean	103.5	Agment(evergreen)	3.85	Y		0	Yes
East 80	SW 1/4 7 79N 3E Sheridan, Scott	1	Corn	77.7	Own	2.89	Y	5300	411810	Yes
North 64	SW 1/4 7 79N 3E Sheridan, Scott	1	Corn	63.8	Own	2.84	N	5300	338140	Yes
Tom's 80	W1/2 SE1/4 7 79N 3E Sheridan, Scott	1	Corn	73.2	Own	2.34	Y	5300	387960	Yes
South 53	N1/2 NE 1/4 18 79N 3E Sheridan, Scott	1	Corn	53	Own	2.19	Y	5300	280900	Yes
West 80	E1/2 SE1/4 12 79N 2E Hickory Grove, Scott	1	Corn	79.4	Own	2.48	N	5300	420820	Yes
Toms 55	SE SE & E1/2 SW SE 4 79N 3E Sheridan, Scott	1	Corn	54.7	Own	2.39	Y	5300	289910	Yes
	Total acres available for manure application			1386.8	**Total gallons that could be applied**				7599550	

Manure Management Plan Form

Year by Year Manure Management Plan Summary

Instructions: Complete this form for each of the next four growing seasons, to demonstrate sufficient land base to apply manure over multiple crop years. If this page is identical for multiple years (e.g. every other year), submit only once for the identical years, and indicate which years the form represents. Footnotes are given on page 6.

Crop year(s): 2015 - 2

1	2	3	4	5	6	7	8	9	10	11
Field Designation [ee]	Field Location ___1/4 of the___ 1/4 Sec___ T___ R___ Townsip Name_____, County Name _____	Mgt Id [ff]	Planned Crop	Acres receiving manure[gg]	Own, rent, agreement (include length of agreement) [hh]	P index value [ii]	HEL (Y/N)[jj]	Planned Application		Correct Soil Test for P[ll] (Yes or No)
								gal/acre	gal/field [kk]	
Unteidt West	W1/2 SW 35 80N 2E Allens Grove, Scott	2	Corn	42.7	Agment(evergreen)	1.43	N	4400	187880	Yes
Unteidt North	N1/2 SW 35 80N 2E Allens Grove, Scott	2	Corn	73.8	Agment(evergreen)	2.50	N	4400	324720	Yes
Unteidt South	SE SW 35 80N 2E Allens Grove, Scott	2	Beans	30	Agment(evergreen)	1.52	N		0	Yes
Kundel 80	S1/2 SW 18 79N 3E Sheridan, Scott	1	Corn	75.6	Own	1.89	N	7500	567000	Yes
Kundel N-40	SE SE 13 79N 2E Hickory Grove, Scott	1	Corn	42.5	Own	1.94	N	7500	318750	Yes
Kundel S-40	NE NE 24 79N 2E Hickory Grove, Scott	1	Corn	28.8	Own	0.92	N	7500	216000	Yes
Cline	NW NW 13 79N 2E Hickory Grove, Scott	1	Con	7	Own	2.12	N	5300	37100	Yes
									0	
									0	
									0	
									0	
									0	
									0	
									0	
ullivan West/Wies	E1/2 NE 35 80N 2E Allens Grove, Scott	2	beans	73.3	Agment(evergreen)	2.58	Y		0	Yes
									0	
Amy's Place	N1/2 SW 36 80N 2E Allens Grove, Scott	2	Corn	54	Agment(evergreen)	1.19	N		0	Yes
									0	
Puck E	N1/2 SW & SE NW 12 79N 2E Hickory Grove, Scot	3	Corn1	104.3	Agment(evergreen)	2.41	Y		0	Yes
Puck W	NE SE 11 & NW SW 12 79N 2E Hkry Gv, Scott	3	Corn1	41.7	Agment(evergreen)	4.98	Y		0	Yes
									0	
									0	
	Total acres available for manure application			573.7	**Total gallons that could be applied**				1651450	

Manure Management Plan Form

Year by Year Manure Management Plan Summary

Instructions: Complete this form for each of the next four growing seasons, to demonstrate sufficient land base to apply manure over multiple crop years. If this page is identical for multiple years (e.g. every other year), submit only once for the identical years, and indicate which years the form represents. Footnotes are given on page 6.

Crop year(s): 2015 - 3

1	2	3	4	5	6	7	8	9	10	11
Field Designation [ee]	Field Location ___1/4 of the___ 1/4 Sec___ T___ R___ Townsip Name_____, County Name _____	Mgt Id [ff]	Planned Crop	Acres receiving manure[gg]	Own, rent, agreement (include length of agreement) [hh]	P index value [ii]	HEL (Y/N)[jj]	Planned Application		Correct Soil Test for P[ll] (Yes or No)
								gal/acre	gal/field [kk]	
Engelbrechts	NE 19 79N 3E Sheridan, Scott	2	Beans	169	Agment(evergreen)	0.81	N		0	Yes
Darin Engel.	SE SW 8 79N 3E Sheridan, Scott	2	Beans	40	Agment(evergreen)	4.27	N		0	Yes
									0	
Carey	NE 20 79N 3E Sheridan, Scott	2	Corn	116.2	Agment(evergreen)	2.34	N	6700	778540	Yes
Dad's Home 120	NW 7 79N 3E Sheridan, Scott	2	Beans	118.4	Agment(evergreen)	1.82	N		0	Yes
Dad's Home 42	E1/4 NW 7 79N 3E Sheridan, Scott	2	Beans	39.9	Agment(evergreen)	1.65	N		0	Yes
Smith	SE SE 7 79N 3E Sheridan, Scott	2	Beans	37.7	Agment(evergreen)	2.33	Y		0	Yes
Mngls S/Muhs S	NW & N1/2 SW 21 79N 3E Sheridan, Scott	2	Corn	135.12	Agment(evergreen)	2.36	N	6700	905304	Yes
Mangels N	SE NW 21 79N 3E Sheridan, Scott	2	Beans	17.23	Agment(evergreen)	1.58	N		0	Yes
Muhs N	SW 16 & N1/2 NW 21 79N 3E Sheridan, Scott	2	Beans	207.42	Agment(evergreen)	1.67	N		0	Yes
Harlan Meier 1	SW SW 12 79N 2E Hickory Grove, Scott	2	beans	63.9	Agment(evergreen)	2.94	N		0	Yes
Harlan Meier 2	S1/2 SW 12 & NE NW 13 79N 2E Hkry Grv, Scott	2	corn	71.1	Agment(evergreen)	2.79	Y	6700	476370	Yes
Harlan Meier 3	NW NE 13 79N 2E Hickory Grove, Scott	2	corn	36	Agment(evergreen)	2.58	Y		0	Yes
Harlan Meier 4	SW SE 12 79N 2E Hickory Grove, Scott	2	beans	17.2	Agment(evergreen)	2.61	Y		0	Yes
									0	
									0	
									0	
Schneckloth	SW 9 79N 3E Sheridan, Scott	2	Beans	151.4	Agment(evergreen)	3.01	N		0	Yes
Dale Moore E	E1/2 NW 19 79N 3E Sheridan, Scott	2	Corn	106	Agment(evergreen)	1.73	N		0	Yes
Dale Moore W	W1/2 NW 19 79N 3E Sheridan, Scott	2	Beans	63	Agment(evergreen)	1.73	N		0	Yes
Dale Moore S	NE SE 24 79N 2E Hickory Grove, Scott	2	Beans	35	Agment(evergreen)	1.44	N		0	Yes
									0	
	Total acres available for manure application			1424.57	**Total gallons that could be applied**				2160214	

Manure Management Plan Form

Year by Year Manure Management Plan Summary

Instructions: Complete this form for each of the next four growing seasons, to demonstrate sufficient land base to apply manure over multiple crop years. If this page is identical for multiple years (e.g. every other year), submit only once for the identical years, and indicate which years the form represents. Footnotes are given on page 6.

Crop year(s): 2015 - 4

1	2	3	4	5	6	7	8	9	10	11
Field Designation [ee]	Field Location ___1/4 of the___ 1/4 Sec___ T___ R___ Townsip Name_____, County Name _____	Mgt Id [ff]	Planned Crop	Acres receiving manure[gg]	Own, rent, agreement (include length of agreement) [hh]	P index value [ii]	HEL (Y/N)[jj]	Planned Application		Correct Soil Test for P[ll] (Yes or No)
								gal/acre	gal/field [kk]	
Murphy N	N1/2 SW 2 79N 2E Hickory Grove, Scott	2	Corn	60.8	Agment(evergreen)	2.92	N	4400	267520	Yes
Murphy S	SE SW 2 & NE NW 11 79N 2E Hcky Gv, Scott	2	Corn	72	Agment(evergreen)	2.38	N	4400	316800	Yes
Don Henzen N	SW SE 11 79N 2E Hickory Grove, Scott	2	Corn	29.6	Agment(evergreen)	3.87	N	4400	130240	Yes
Don Henzen M	SW SE 11 & W1/2 NE 14 79N 2E Hcky Gv, Scott	2	Corn	80.5	Agment(evergreen)	2.80	N	4400	354200	Yes
Don Henzen S	SW NE 14 79N 2E Hickory Grove, Scott	2	Corn	8.5	Agment(evergreen)	4.97	N	4400	37400	Yes
Bob Henzen E	SW NW 35 & SE NE 34 80N 2E Allens Grove, Scot	2	Soybean	62	Agment(evergreen)	2.50	N		0	Yes
Bob Henzen W	SE NE 34 80N 2E Allens Grove, Scott	2	Soybean	3.1	Agment(evergreen)	4.30	N		0	Yes
									0	
									0	
Amhof	S1/2 SE 20 80N 3E Winfield, Scott	2	Soybean	60	Agment(evergreen)	2.57	N		0	Yes
									0	
Engelbrt-corey S	SE SW & SW SE 17 79N 3E Sheridan, Scott	2	Corn	38	Agment(evergreen)	3.89	N	6700	254600	Yes
Engelbrt-corey N	SE SW & SW SE 17 79N 3E Sheridan, Scott	2	Soybean	28	Agment(evergreen)	2.02	N		0	Yes
Marten Farm	NE 6 79N 3E Sheridan, Scott	2	Corn	145	Agment(evergreen)	3.28	N	6700	971500	Yes
									0	
Dennis Mohr 1	S1/2 NW 17 79N 3E Sheridan, Scott	2	Soybean	35	Agment(evergreen)	3.88	Y		0	Yes
Dennis Mohr 2	SE NW & SW NE 17 79N 3E Sheridan, Scott	2	Corn	32	Agment(evergreen)	3.19	Y	6700	214400	Yes
Dennis Mohr 3	W1/2 SW 17 79N 3E Sheridan, Scott	2	Corn	65	Agment(evergreen)	2.17	N	6700	435500	Yes
Dennis Mohr 4-5	NE SW & NW SE 17 79N 3E Sheridan, Scott	2	Soybean	55	Agment(evergreen)	2.85	Y		0	Yes
Dennis Mohr 6	SW SW 17 79N 3E Sheridan, Scott	2	Soybean	13	Agment(evergreen)	4.05	Y		0	Yes
Dexter	N1/2 NW 16 79N 3E Sheridan, Scott	2	Corn	84	Agment(evergreen)	2.14	Y	6700	562800	Yes
									0	
	Total acres available for manure application			871.5	**Total gallons that could be applied**				3544960	

Manure Management Plan Form

Year by Year Manure Management Plan Summary

Instructions: Complete this form for each of the next four growing seasons, to demonstrate sufficient land base to apply manure over multiple crop years. If this page is identical for multiple years (e.g. every other year), submit only once for the identical years, and indicate which years the form represents. Footnotes are given on page 6.

Crop year(s): 2015 - 5

1	2	3	4	5	6	7	8	9	10	11
Field Designation [ee]	Field Location ___1/4 of the___ 1/4 Sec___ T___ R___ Townsip Name_____, County Name _____	Mgt Id [ff]	Planned Crop	Acres receiving manure[gg]	Own, rent, agreement (include length of agreement) [hh]	P index value [ii]	HEL (Y/N)[jj]	Planned Application		Correct Soil Test for P[ll] (Yes or No)
								gal/acre	gal/field [kk]	
Keppy NS	E1/2 NW&N1/2 SW 18 79N 3E Sheridan, Scott	3	Soybeans	22	Agment(evergreen)	4.99	N		0	Yes
Meggers	S1/2 SE 6 79N 3E Sheridan, Scott	2	Corn	69	Agment(evergreen)	2.56	N	6700	462300	Yes
Bens N	NW SW 18 79N 3E Sheridan, Scott	1	Corn	7	own	2.10	Y	5300	37100	Yes
Bens S	NE SE 13 79N 2E Hickory Grove, Scott	1	Corn	43	own	1.84	Y	7500	322500	Yes
Copley N	SW 1 79N 2E Hickory Grove, Scott	2	Soybeans	135	Agment(evergreen)	2.66	Y		0	Yes
Copley S	SW SW 1&NE NW 12 79N 2E H.G., Scott	2	Soybeans	49	Agment(evergreen)	3.59	Y		0	Yes
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
Total acres available for manure application				325	**Total gallons that could be applied**				821900	

Manure Management Plan Form

Year by Year Manure Management Plan Summary

Instructions: Complete this form for each of the next four growing seasons, to demonstrate sufficient land base to apply manure over multiple crop years. If this page is identical for multiple years (e.g. every other year), submit only once for the identical years, and indicate which years the form represents. Footnotes are given on page 6.

Crop year(s): 2016-1

1	2	3	4	5	6	7	8	9	10	11
Field Designation [ee]	Field Location ___1/4 of the___ 1/4 Sec___ T___ R___ Townsip Name_____, County Name _____	Mgt Id [ff]	Planned Crop	Acres receiving manure[gg]	Own, rent, agreement (include length of agreement) [hh]	P index value [ii]	HEL (Y/N)[jj]	Planned Application		Correct Soil Test for P[ll] (Yes or No)
								gal/acre	gal/field [kk]	
Curtis 80	E1/2 NW 1 79N 2E Hickory Grove, Scott	1	Corn	76	Agment(evergreen)	2.20	N	5300	402800	Yes
Curtis 142	NE 1 79N 2E Hickory Grove, Scott	1	Corn	142	Agment(evergreen)	1.52	N	7500	1065000	Yes
Neufeld NE	SE 2 79N 2E Hickory Grove, Scott	1	Corn	28.2	Agment(evergreen)	2.43	Y	5300	149460	Yes
Newfeld NW	SE 2 79N 2E Hickory Grove, Scott	1	Corn	10	Agment(evergreen)	3.72	Y	5300	53000	Yes
Newfeld SW	SE 2 79N 2E Hickory Grove, Scott	1	Corn	29.2	Agment(evergreen)	2.20	Y	5300	154760	Yes
Neufeld SE	SE 2 79N 2E Hickory Grove, Scott	1	Corn	79.3	Agment(evergreen)	2.19	Y	5300	420290	Yes
									0	
Rose	E1/2 NW 32 79N 3E Sheridan, Scott	1	Corn	40	Agment(evergreen)	0.65	Y	7500	300000	Yes
Gehrls a	NE 79N 2E Hick. Gv.&S1/2 SE 35 Alns Gv, Scott	1	Corn	165.1	Agment(evergreen)	2.28	Y	5300	875030	Yes
Gehrls b	NE 79N 2E Hickory Grove, Scott	1	Corn	15.4	Agment(evergreen)	2.98	Y	5300	81620	Yes
Rivaldd N	E1/2 NE 14 & W1/2 NW 13 79N 2E Hick. Gv, Scott	3	Soybean	76.2	Agment(evergreen)	2.54	Y		0	Yes
Rivaldd S	E1/2 NE 14 & W1/2 NW 13 79N 2E Hick. Gv, Scott	3	Corn2	82	Agment(evergreen)	3.35	Y	5700	467400	Yes
Quinn N	E1/2 NE 13 79N 2E Hickory Grove, Scott	3	Soybean	76.1	Agment(evergreen)	2.75	N		0	Yes
Quinn S	SW NE 13 79N 2E Hickory Grove, Scott	3	Soybean	26.4	Agment(evergreen)	2.51	N		0	Yes
Quinn W	SE NW 13 79N 2E Hickory Grove, Scott	3	Soybean	35.6	Agment(evergreen)	2.66	Y		0	Yes
Keppy NN	E1/2 NW & N1/2 SW 18 79N 3E Sheridan, Scott	3	Corn1	103.5	Agment(evergreen)	3.85	Y		0	Yes
East 80	SW 1/4 7 79N 3E Sheridan, Scott	1	Corn	77.7	Own	2.89	Y	5300	411810	Yes
North 64	SW 1/4 7 79N 3E Sheridan, Scott	1	Corn	63.8	Own	2.84	N	5300	338140	Yes
Tom's 80	W1/2 SE1/4 7 79N 3E Sheridan, Scott	1	Corn	73.2	Own	2.34	Y	5300	387960	Yes
South 53	N1/2 NE 1/4 18 79N 3E Sheridan, Scott	1	Corn	53	Own	2.19	Y	5300	280900	Yes
West 80	E1/2 SE1/4 12 79N 2E Hickory Grove, Scott	1	Corn	79.4	Own	2.48	N	5300	420820	Yes
Toms 55	SE SE & E1/2 SW SE 4 79N 3E Sheridan, Scott	1	Corn	54.7	Own	2.39	Y	5300	289910	Yes
	Total acres available for manure application			1386.8	**Total gallons that could be applied**				6098900	

Manure Management Plan Form

Year by Year Manure Management Plan Summary

Instructions: Complete this form for each of the next four growing seasons, to demonstrate sufficient land base to apply manure over multiple crop years. If this page is identical for multiple years (e.g. every other year), submit only once for the identical years, and indicate which years the form represents. Footnotes are given on page 6.

Crop year(s): 2016-2

1	2	3	4	5	6	7	8	9	10	11
Field Designation [ee]	Field Location ___1/4 of the___ 1/4 Sec___ T___ R___ Townsip Name_____, County Name _____	Mgt Id [ff]	Planned Crop	Acres receiving manure[gg]	Own, rent, agreement (include length of agreement) [hh]	P index value [ii]	HEL (Y/N)[jj]	Planned Application		Correct Soil Test for P[ll] (Yes or No)
								gal/acre	gal/field [kk]	
Unteidt West	W1/2 SW 35 80N 2E Allens Grove, Scott	2	Soybean	42.7	Agment(evergreen)	1.43	N		0	Yes
Unteidt North	N1/2 SW 35 80N 2E Allens Grove, Scott	2	Soybean	73.8	Agment(evergreen)	2.50	N		0	Yes
Unteidt South	SE SW 35 80N 2E Allens Grove, Scott	2	Corn	30	Agment(evergreen)	1.52	N	4400	132000	Yes
Kundel 80	S1/2 SW 18 79N 3E Sheridan, Scott	1	Corn	75.6	Own	1.89	N	7500	567000	Yes
Kundel N-40	SE SE 13 79N 2E Hickory Grove, Scott	1	Corn	42.5	Own	1.94	N	7500	318750	Yes
Kundel S-40	NE NE 24 79N 2E Hickory Grove, Scott	1	Corn	28.8	Own	0.92	N	7500	216000	Yes
Cline	NW NW 13 79N 2E Hickory Grove, Scott	1	Con	7	Own	2.12	N	5300	37100	Yes
									0	
									0	
									0	
									0	
									0	
									0	
									0	
ullivan West/Wies	E1/2 NE 35 80N 2E Allens Grove, Scott	2	Corn	73.3	Agment(evergreen)	2.58	Y	4400	322520	Yes
									0	
Amy's Place	N1/2 SW 36 80N 2E Allens Grove, Scott	2	Soybean	54	Agment(evergreen)	1.19	N		0	Yes
									0	
Puck E	N1/2 SW & SE NW 12 79N 2E Hickory Grove, Scot	3	Corn2	104.3	Agment(evergreen)	2.41	Y		0	Yes
Puck W	NE SE 11 & NW SW 12 79N 2E Hkry Gv, Scott	3	Corn2	41.7	Agment(evergreen)	4.98	Y		0	Yes
									0	
									0	
	Total acres available for manure application			573.7	**Total gallons that could be applied**				1593370	

Manure Management Plan Form

Year by Year Manure Management Plan Summary

Instructions: Complete this form for each of the next four growing seasons, to demonstrate sufficient land base to apply manure over multiple crop years. If this page is identical for multiple years (e.g. every other year), submit only once for the identical years, and indicate which years the form represents. Footnotes are given on page 6.

Crop year(s): 2016-3

1	2	3	4	5	6	7	8	9	10	11
Field Designation [ee]	Field Location ___1/4 of the___ 1/4 Sec___ T___ R___ Townsip Name_____, County Name _____	Mgt Id [ff]	Planned Crop	Acres receiving manure[gg]	Own, rent, agreement (include length of agreement) [hh]	P index value [ii]	HEL (Y/N)[jj]	Planned Application		Correct Soil Test for P[ll] (Yes or No)
								gal/acre	gal/field [kk]	
Engelbrechts	NE 19 79N 3E Sheridan, Scott	2	Corn	169	Agment(evergreen)	0.81	N	4400	743600	Yes
Darin Engel.	SE SW 8 79N 3E Sheridan, Scott	2	Corn	40	Agment(evergreen)	4.27	N	4400	176000	Yes
									0	
Carey	NE 20 79N 3E Sheridan, Scott	2	Soybeans	116.2	Agment(evergreen)	2.34	N		0	Yes
Dad's Home 120	NW 7 79N 3E Sheridan, Scott	2	Corn	118.4	Agment(evergreen)	1.82	N	6700	793280	Yes
Dad's Home 42	E1/4 NW 7 79N 3E Sheridan, Scott	2	Corn	39.9	Agment(evergreen)	1.65	N	6700	267330	Yes
Smith	SE SE 7 79N 3E Sheridan, Scott	2	Corn	37.7	Agment(evergreen)	2.33	Y	6700	252590	Yes
Mngls S/Muhs S	NW & N1/2 SW 21 79N 3E Sheridan, Scott	2	Soybeans	135.12	Agment(evergreen)	2.36	N		0	Yes
Mangels N	SE NW 21 79N 3E Sheridan, Scott	2	Corn	17.23	Agment(evergreen)	1.58	N	6700	115441	Yes
Muhs N	SW 16 & N1/2 NW 21 79N 3E Sheridan, Scott	2	Corn	207.42	Agment(evergreen)	1.67	N	6700	1389714	Yes
Harlan Meier 1	SW SW 12 79N 2E Hickory Grove, Scott	2	Corn	63.9	Agment(evergreen)	2.94	N	6700	428130	Yes
Harlan Meier 2	S1/2 SW 12 & NE NW 13 79N 2E Hkry Grv, Scott	2	Soybeans	71.1	Agment(evergreen)	2.79	Y		0	Yes
Harlan Meier 3	NW NE 13 79N 2E Hickory Grove, Scott	2	Soybeans	36	Agment(evergreen)	2.58	Y		0	Yes
Harlan Meier 4	SW SE 12 79N 2E Hickory Grove, Scott	2	Corn	17.2	Agment(evergreen)	2.61	Y		0	Yes
									0	
									0	
									0	
Schneckloth	SW 9 79N 3E Sheridan, Scott	2	Corn	151.4	Agment(evergreen)	3.01	N	6700	1014380	Yes
Dale Moore E	E1/2 NW 19 79N 3E Sheridan, Scott	2	Soybeans	106	Agment(evergreen)	1.73	N		0	Yes
Dale Moore W	W1/2 NW 19 79N 3E Sheridan, Scott	2	Corn	63	Agment(evergreen)	1.73	N	6700	422100	Yes
Dale Moore S	NE SE 24 79N 2E Hickory Grove, Scott	2	Corn	35	Agment(evergreen)	1.44	N	6700	234500	Yes
									0	
	Total acres available for manure application			1424.57	**Total gallons that could be applied**				5837065	

Manure Management Plan Form

Year by Year Manure Management Plan Summary

Instructions: Complete this form for each of the next four growing seasons, to demonstrate sufficient land base to apply manure over multiple crop years. If this page is identical for multiple years (e.g. every other year), submit only once for the identical years, and indicate which years the form represents. Footnotes are given on page 6.

Crop year(s): 2016-4

1	2	3	4	5	6	7	8	9	10	11
Field Designation [ee]	Field Location ___1/4 of the___ 1/4 Sec___ T___ R___ Townsip Name_____, County Name _____	Mgt Id [ff]	Planned Crop	Acres receiving manure[gg]	Own, rent, agreement (include length of agreement) [hh]	P index value [ii]	HEL (Y/N)[jj]	Planned Application		Correct Soil Test for P[ll] (Yes or No)
								gal/acre	gal/field [kk]	
Murphy N	N1/2 SW 2 79N 2E Hickory Grove, Scott	2	Soybean	60.8	Agment(evergreen)	2.92	N		0	Yes
Murphy S	SE SW 2 & NE NW 11 79N 2E Hcky Gv, Scott	2	Soybean	72	Agment(evergreen)	2.38	N		0	Yes
Don Henzen N	SW SE 11 79N 2E Hickory Grove, Scott	2	Soybean	29.6	Agment(evergreen)	3.87	N		0	Yes
Don Henzen M	SW SE 11 & W1/2 NE 14 79N 2E Hcky Gv, Scott	2	Soybean	80.5	Agment(evergreen)	2.80	N		0	Yes
Don Henzen S	SW NE 14 79N 2E Hickory Grove, Scott	2	Soybean	8.5	Agment(evergreen)	4.97	N		0	Yes
Bob Henzen E	SW NW 35 & SE NE 34 80N 2E Allens Grove, Scot	2	Corn	62	Agment(evergreen)	2.50	N		0	Yes
Bob Henzen W	SE NE 34 80N 2E Allens Grove, Scott	2	Corn	3.1	Agment(evergreen)	4.30	N		0	Yes
									0	
									0	
Amhof	S1/2 SE 20 80N 3E Winfield, Scott	2	Corn	60	Agment(evergreen)	2.57	N		0	Yes
									0	
Engelbrt-corey S	SE SW & SW SE 17 79N 3E Sheridan, Scott	2	Soybean	38	Agment(evergreen)	3.89	N		0	Yes
Engelbrt-corey N	SE SW & SW SE 17 79N 3E Sheridan, Scott	2	Corn	28	Agment(evergreen)	2.02	N	6700	187600	Yes
Marten Farm	NE 6 79N 3E Sheridan, Scott	2	Soybean	145	Agment(evergreen)	3.28	N		0	Yes
									0	
Dennis Mohr 1	S1/2 NW 17 79N 3E Sheridan, Scott	2	Corn	35	Agment(evergreen)	3.88	Y	6700	234500	Yes
Dennis Mohr 2	SE NW & SW NE 17 79N 3E Sheridan, Scott	2	Soybean	32	Agment(evergreen)	3.19	Y		0	Yes
Dennis Mohr 3	W1/2 SW 17 79N 3E Sheridan, Scott	2	Soybean	65	Agment(evergreen)	2.17	N		0	Yes
Dennis Mohr 4-5	NE SW & NW SE 17 79N 3E Sheridan, Scott	2	Corn	55	Agment(evergreen)	2.85	Y	4400	242000	Yes
Dennis Mohr 6	SW SW 17 79N 3E Sheridan, Scott	2	Corn	13	Agment(evergreen)	4.05	Y	4400	57200	Yes
Dexter	N1/2 NW 16 79N 3E Sheridan, Scott	2	Soybean	84	Agment(evergreen)	2.14	Y		0	Yes
									0	
	Total acres available for manure application			871.5	**Total gallons that could be applied**				721300	

Manure Management Plan Form

Year by Year Manure Management Plan Summary

Instructions: Complete this form for each of the next four growing seasons, to demonstrate sufficient land base to apply manure over multiple crop years. If this page is identical for multiple years (e.g. every other year), submit only once for the identical years, and indicate which years the form represents. Footnotes are given on page 6.

Crop year(s): 2016-5

1	2	3	4	5	6	7	8	9	10	11
Field Designation [ee]	Field Location ___1/4 of the___ 1/4 Sec___ T___ R___ Townsip Name_____, County Name _____	Mgt Id [ff]	Planned Crop	Acres receiving manure[gg]	Own, rent, agreement (include length of agreement) [hh]	P index value [ii]	HEL (Y/N)[jj]	Planned Application		Correct Soil Test for P[ll] (Yes or No)
								gal/acre	gal/field [kk]	
Keppy NS	E1/2 NW&N1/2 SW 18 79N 3E Sheridan, Scott	3	Corn1	22	Agment(evergreen)	4.99	N	4400	96800	Yes
Meggers	S1/2 SE 6 79N 3E Sheridan, Scott	2	Soybeans	69	Agment(evergreen)	2.56	N		0	Yes
Bens N	NW SW 18 79N 3E Sheridan, Scott	1	Corn	7	own	2.10	Y	5300	37100	Yes
Bens S	NE SE 13 79N 2E Hickory Grove, Scott	1	Corn	43	own	1.84	Y	7500	322500	Yes
Copley N	SW 1 79N 2E Hickory Grove, Scott	2	Corn	135	Agment(evergreen)	2.66	Y	6700	904500	Yes
Copley S	SW SW 1&NE NW 12 79N 2E H.G., Scott	2	Corn	49	Agment(evergreen)	3.59	Y	6700	328300	Yes
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
Total acres available for manure application				325	**Total gallons that could be applied**				1689200	

Manure Management Plan Form

Year by Year Manure Management Plan Summary

Instructions: Complete this form for each of the next four growing seasons, to demonstrate sufficient land base to apply manure over multiple crop years. If this page is identical for multiple years (e.g. every other year), submit only once for the identical years, and indicate which years the form represents. Footnotes are given on page 6.

Crop year(s): 2017-1

1	2	3	4	5	6	7	8	9	10	11
Field Designation [ee]	Field Location ___1/4 of the___ 1/4 Sec___ T___ R___ Townsip Name_____, County Name _____	Mgt Id [ff]	Planned Crop	Acres receiving manure[gg]	Own, rent, agreement (include length of agreement) [hh]	P index value [ii]	HEL (Y/N)[jj]	Planned Application		Correct Soil Test for P[ll] (Yes or No)
								gal/acre	gal/field [kk]	
Curtis 80	E1/2 NW 1 79N 2E Hickory Grove, Scott	1	Corn	76	Agment(evergreen)	2.20	N	5300	402800	Yes
Curtis 142	NE 1 79N 2E Hickory Grove, Scott	1	Corn	142	Agment(evergreen)	1.52	N	7500	1065000	Yes
Neufeld NE	SE 2 79N 2E Hickory Grove, Scott	1	Corn	28.2	Agment(evergreen)	2.43	Y	5300	149460	Yes
Newfeld NW	SE 2 79N 2E Hickory Grove, Scott	1	Corn	10	Agment(evergreen)	3.72	Y	5300	53000	Yes
Newfeld SW	SE 2 79N 2E Hickory Grove, Scott	1	Corn	29.2	Agment(evergreen)	2.20	Y	5300	154760	Yes
Neufeld SE	SE 2 79N 2E Hickory Grove, Scott	1	Corn	79.3	Agment(evergreen)	2.19	Y	5300	420290	Yes
									0	
Rose	E1/2 NW 32 79N 3E Sheridan, Scott	1	Corn	40	Agment(evergreen)	0.65	Y	7500	300000	Yes
Gehrls a	NE 79N 2E Hick. Gv.&S1/2 SE 35 Alns Gv, Scott	1	Corn	165.1	Agment(evergreen)	2.28	Y	5300	875030	Yes
Gehrls b	NE 79N 2E Hickory Grove, Scott	1	Corn	15.4	Agment(evergreen)	2.98	Y	5300	81620	Yes
Rivaldd N	E1/2 NE 14 & W1/2 NW 13 79N 2E Hick. Gv, Scott	3	Corn1	76.2	Agment(evergreen)	2.54	Y	4400	335280	Yes
Rivaldd S	E1/2 NE 14 & W1/2 NW 13 79N 2E Hick. Gv, Scott	3	Soybean	82	Agment(evergreen)	3.35	Y		0	Yes
Quinn N	E1/2 NE 13 79N 2E Hickory Grove, Scott	3	Corn1	76.1	Agment(evergreen)	2.75	N	6700	509870	Yes
Quinn S	SW NE 13 79N 2E Hickory Grove, Scott	3	Corn1	26.4	Agment(evergreen)	2.51	N	6700	176880	Yes
Quinn W	SE NW 13 79N 2E Hickory Grove, Scott	3	Corn1	35.6	Agment(evergreen)	2.66	Y	6700	238520	Yes
Keppy NN	E1/2 NW & N1/2 SW 18 79N 3E Sheridan, Scott	3	Corn2	103.5	Agment(evergreen)	3.85	Y	7500	776250	Yes
East 80	SW 1/4 7 79N 3E Sheridan, Scott	1	Corn	77.7	Own	2.89	Y	5300	411810	Yes
North 64	SW 1/4 7 79N 3E Sheridan, Scott	1	Corn	63.8	Own	2.84	N	5300	338140	Yes
Tom's 80	W1/2 SE1/4 7 79N 3E Sheridan, Scott	1	Corn	73.2	Own	2.34	Y	5300	387960	Yes
South 53	N1/2 NE 1/4 18 79N 3E Sheridan, Scott	1	Corn	53	Own	2.19	Y	5300	280900	Yes
West 80	E1/2 SE1/4 12 79N 2E Hickory Grove, Scott	1	Corn	79.4	Own	2.48	N	5300	420820	Yes
Toms 55	SE SE & E1/2 SW SE 4 79N 3E Sheridan, Scott	1	Corn	54.7	Own	2.39	Y	5300	289910	Yes
	Total acres available for manure application			1386.8	**Total gallons that could be applied**				7668300	

Manure Management Plan Form

Year by Year Manure Management Plan Summary

Instructions: Complete this form for each of the next four growing seasons, to demonstrate sufficient land base to apply manure over multiple crop years. If this page is identical for multiple years (e.g. every other year), submit only once for the identical years, and indicate which years the form represents. Footnotes are given on page 6.

Crop year(s): 2017-2

1	2	3	4	5	6	7	8	9	10	11
Field Designation [ee]	Field Location ___1/4 of the___ 1/4 Sec___ T___ R___ Townsip Name_____, County Name _____	Mgt Id [ff]	Planned Crop	Acres receiving manure[gg]	Own, rent, agreement (include length of agreement) [hh]	P index value [ii]	HEL (Y/N)[jj]	Planned Application		Correct Soil Test for P[ll] (Yes or No)
								gal/acre	gal/field [kk]	
Unteidt West	W1/2 SW 35 80N 2E Allens Grove, Scott	2	Corn	42.7	Agment(evergreen)	1.43	N	6700	286090	Yes
Unteidt North	N1/2 SW 35 80N 2E Allens Grove, Scott	2	Corn	73.8	Agment(evergreen)	2.50	N	6700	494460	Yes
Unteidt South	SE SW 35 80N 2E Allens Grove, Scott	2	Soybean	30	Agment(evergreen)	1.52	N		0	Yes
Kundel 80	S1/2 SW 18 79N 3E Sheridan, Scott	1	Corn	75.6	Own	1.89	N	7500	567000	Yes
Kundel N-40	SE SE 13 79N 2E Hickory Grove, Scott	1	Corn	42.5	Own	1.94	N	7500	318750	Yes
Kundel S-40	NE NE 24 79N 2E Hickory Grove, Scott	1	Corn	28.8	Own	0.92	N	7500	216000	Yes
Cline	NW NW 13 79N 2E Hickory Grove, Scott	1	Con	7	Own	2.12	N	5300	37100	Yes
									0	
									0	
									0	
									0	
									0	
									0	
									0	
ullivan West/Wies	E1/2 NE 35 80N 2E Allens Grove, Scott	2	Soybean	73.3	Agment(evergreen)	2.58	Y		0	Yes
									0	
Amy's Place	N1/2 SW 36 80N 2E Allens Grove, Scott	2	Corn	54	Agment(evergreen)	1.19	N		0	Yes
									0	
Puck E	N1/2 SW & SE NW 12 79N 2E Hickory Grove, Scot	3	Soybean	104.3	Agment(evergreen)	2.41	Y		0	Yes
Puck W	NE SE 11 & NW SW 12 79N 2E Hkry Gv, Scott	3	Soybean	41.7	Agment(evergreen)	4.98	Y		0	Yes
									0	
									0	
	Total acres available for manure application			573.7	**Total gallons that could be applied**				1919400	

Manure Management Plan Form

Year by Year Manure Management Plan Summary

Instructions: Complete this form for each of the next four growing seasons, to demonstrate sufficient land base to apply manure over multiple crop years. If this page is identical for multiple years (e.g. every other year), submit only once for the identical years, and indicate which years the form represents. Footnotes are given on page 6.

Crop year(s): 2017-3

1	2	3	4	5	6	7	8	9	10	11
Field Designation [ee]	Field Location ___1/4 of the___ 1/4 Sec___ T___ R___ Townsip Name_____, County Name _____	Mgt Id [ff]	Planned Crop	Acres receiving manure[gg]	Own, rent, agreement (include length of agreement) [hh]	P index value [ii]	HEL (Y/N)[jj]	Planned Application		Correct Soil Test for P[ll] (Yes or No)
								gal/acre	gal/field [kk]	
Engelbrechts	NE 19 79N 3E Sheridan, Scott	2	Soybeans	169	Agment(evergreen)	0.81	N		0	Yes
Darin Engel.	SE SW 8 79N 3E Sheridan, Scott	2	Soybeans	40	Agment(evergreen)	4.27	N		0	Yes
									0	
Carey	NE 20 79N 3E Sheridan, Scott	2	Corn	116.2	Agment(evergreen)	2.34	N	6700	778540	Yes
Dad's Home 120	NW 7 79N 3E Sheridan, Scott	2	Soybeans	118.4	Agment(evergreen)	1.82	N		0	Yes
Dad's Home 42	E1/4 NW 7 79N 3E Sheridan, Scott	2	Soybeans	39.9	Agment(evergreen)	1.65	N		0	Yes
Smith	SE SE 7 79N 3E Sheridan, Scott	2	Soybeans	37.7	Agment(evergreen)	2.33	Y		0	Yes
Mngls S/Muhs S	NW & N1/2 SW 21 79N 3E Sheridan, Scott	2	Corn	135.12	Agment(evergreen)	2.36	N	6700	905304	Yes
Mangels N	SE NW 21 79N 3E Sheridan, Scott	2	Soybeans	17.23	Agment(evergreen)	1.58	N		0	Yes
Muhs N	SW 16 & N1/2 NW 21 79N 3E Sheridan, Scott	2	Soybeans	207.42	Agment(evergreen)	1.67	N		0	Yes
Harlan Meier 1	SW SW 12 79N 2E Hickory Grove, Scott	2	Soybeans	63.9	Agment(evergreen)	2.94	N		0	Yes
Harlan Meier 2	S1/2 SW 12 & NE NW 13 79N 2E Hkry Grv, Scott	2	Corn	71.1	Agment(evergreen)	2.79	Y	6700	476370	Yes
Harlan Meier 3	NW NE 13 79N 2E Hickory Grove, Scott	2	Corn	36	Agment(evergreen)	2.58	Y	6700	241200	Yes
Harlan Meier 4	SW SE 12 79N 2E Hickory Grove, Scott	2	Soybeans	17.2	Agment(evergreen)	2.61	Y		0	Yes
									0	
									0	
									0	
Schneckloth	SW 9 79N 3E Sheridan, Scott	2	Soybeans	151.4	Agment(evergreen)	3.01	N		0	Yes
Dale Moore E	E1/2 NW 19 79N 3E Sheridan, Scott	2	Corn	106	Agment(evergreen)	1.73	N	4400	466400	Yes
Dale Moore W	W1/2 NW 19 79N 3E Sheridan, Scott	2	Soybeans	63	Agment(evergreen)	1.73	N		0	Yes
Dale Moore S	NE SE 24 79N 2E Hickory Grove, Scott	2	Soybeans	35	Agment(evergreen)	1.44	N		0	Yes
									0	
Total acres available for manure application				1424.57	**Total gallons that could be applied**				2867814	

Manure Management Plan Form

Year by Year Manure Management Plan Summary

Instructions: Complete this form for each of the next four growing seasons, to demonstrate sufficient land base to apply manure over multiple crop years. If this page is identical for multiple years (e.g. every other year), submit only once for the identical years, and indicate which years the form represents. Footnotes are given on page 6.

Crop year(s): 2017-4

1	2	3	4	5	6	7	8	9	10	11
Field Designation [ee]	Field Location ___1/4 of the___ 1/4 Sec___ T___ R___ Townsip Name_____, County Name _____	Mgt Id [ff]	Planned Crop	Acres receiving manure[gg]	Own, rent, agreement (include length of agreement) [hh]	P index value [ii]	HEL (Y/N)[jj]	Planned Application		Correct Soil Test for P[ll] (Yes or No)
								gal/acre	gal/field [kk]	
Murphy N	N1/2 SW 2 79N 2E Hickory Grove, Scott	2	Corn	60.8	Agment(evergreen)	2.92	N		0	Yes
Murphy S	SE SW 2 & NE NW 11 79N 2E Hcky Gv, Scott	2	Corn	72	Agment(evergreen)	2.38	N		0	Yes
Don Henzen N	SW SE 11 79N 2E Hickory Grove, Scott	2	Corn	29.6	Agment(evergreen)	3.87	N		0	Yes
Don Henzen M	SW SE 11 & W1/2 NE 14 79N 2E Hcky Gv, Scott	2	Corn	80.5	Agment(evergreen)	2.80	N		0	Yes
Don Henzen S	SW NE 14 79N 2E Hickory Grove, Scott	2	Corn	8.5	Agment(evergreen)	4.97	N		0	Yes
Bob Henzen E	SW NW 35 & SE NE 34 80N 2E Allens Grove, Scot	2	Soybean	62	Agment(evergreen)	2.50	N		0	Yes
Bob Henzen W	SE NE 34 80N 2E Allens Grove, Scott	2	Soybean	3.1	Agment(evergreen)	4.30	N		0	Yes
									0	
									0	
Amhof	S1/2 SE 20 80N 3E Winfield, Scott	2	Soybean	60	Agment(evergreen)	2.57	N		0	Yes
									0	
Engelbrt-corey S	SE SW & SW SE 17 79N 3E Sheridan, Scott	2	Corn	38	Agment(evergreen)	3.89	N	4400	167200	Yes
Engelbrt-corey N	SE SW & SW SE 17 79N 3E Sheridan, Scott	2	Soybean	28	Agment(evergreen)	2.02	N		0	Yes
Marten Farm	NE 6 79N 3E Sheridan, Scott	2	Corn	145	Agment(evergreen)	3.28	N		0	Yes
									0	
Dennis Mohr 1	S1/2 NW 17 79N 3E Sheridan, Scott	2	Soybean	35	Agment(evergreen)	3.88	Y		0	Yes
Dennis Mohr 2	SE NW & SW NE 17 79N 3E Sheridan, Scott	2	Corn	32	Agment(evergreen)	3.19	Y	4400	140800	Yes
Dennis Mohr 3	W1/2 SW 17 79N 3E Sheridan, Scott	2	Corn	65	Agment(evergreen)	2.17	N	4400	286000	Yes
Dennis Mohr 4-5	NE SW & NW SE 17 79N 3E Sheridan, Scott	2	Soybean	55	Agment(evergreen)	2.85	Y		0	Yes
Dennis Mohr 6	SW SW 17 79N 3E Sheridan, Scott	2	Soybean	13	Agment(evergreen)	4.05	Y		0	Yes
Dexter	N1/2 NW 16 79N 3E Sheridan, Scott	2	Corn	84	Agment(evergreen)	2.14	Y	4400	369600	Yes
									0	
	Total acres available for manure application			871.5	**Total gallons that could be applied**				963600	

Manure Management Plan Form

Year by Year Manure Management Plan Summary

Instructions: Complete this form for each of the next four growing seasons, to demonstrate sufficient land base to apply manure over multiple crop years. If this page is identical for multiple years (e.g. every other year), submit only once for the identical years, and indicate which years the form represents. Footnotes are given on page 6.

Crop year(s): 2017-5

1	2	3	4	5	6	7	8	9	10	11
Field Designation [ee]	Field Location ___1/4 of the___ 1/4 Sec___ T___ R___ Townsip Name_____, County Name _____	Mgt Id [ff]	Planned Crop	Acres receiving manure[gg]	Own, rent, agreement (include length of agreement) [hh]	P index value [ii]	HEL (Y/N)[jj]	Planned Application		Correct Soil Test for P[ll] (Yes or No)
								gal/acre	gal/field [kk]	
Keppy NS	E1/2 NW&N1/2 SW 18 79N 3E Sheridan, Scott	3	Corn2	22	Agment(evergreen)	4.99	N	7500	165000	Yes
Meggers	S1/2 SE 6 79N 3E Sheridan, Scott	2	Corn	69	Agment(evergreen)	2.56	N		0	Yes
Bens N	NW SW 18 79N 3E Sheridan, Scott	1	Corn	7	own	2.10	Y	5300	37100	Yes
Bens S	NE SE 13 79N 2E Hickory Grove, Scott	1	Corn	43	own	1.84	Y	4000	172000	Yes
Copley N	SW 1 79N 2E Hickory Grove, Scott	2	Soybeans	135	Agment(evergreen)	2.66	Y		0	Yes
Copley S	SW SW 1&NE NW 12 79N 2E H.G., Scott	2	Soybeans	49	Agment(evergreen)	3.59	Y		0	Yes
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
Total acres available for manure application				325	**Total gallons that could be applied**				374100	

Manure Management Plan Form

Year by Year Manure Management Plan Summary

Instructions: Complete this form for each of the next four growing seasons, to demonstrate sufficient land base to apply manure over multiple crop years. If this page is identical for multiple years (e.g. every other year), submit only once for the identical years, and indicate which years the form represents. Footnotes are given on page 6.

Crop year(s): 2018-1

1	2	3	4	5	6	7	8	9	10	11
Field Designation [ee]	Field Location ___1/4 of the___ 1/4 Sec___ T___ R___ Townsip Name_____, County Name _____	Mgt Id [ff]	Planned Crop	Acres receiving manure[gg]	Own, rent, agreement (include length of agreement) [hh]	P index value [ii]	HEL (Y/N)[jj]	Planned Application		Correct Soil Test for P[ll] (Yes or No)
								gal/acre	gal/field [kk]	
Curtis 80	E1/2 NW 1 79N 2E Hickory Grove, Scott	1	Corn	76	Agment(evergreen)	2.20	N	5300	402800	Yes
Curtis 142	NE 1 79N 2E Hickory Grove, Scott	1	Corn	142	Agment(evergreen)	1.52	N	7500	1065000	Yes
Neufeld NE	SE 2 79N 2E Hickory Grove, Scott	1	Corn	28.2	Agment(evergreen)	2.43	Y	5300	149460	Yes
Newfeld NW	SE 2 79N 2E Hickory Grove, Scott	1	Corn	10	Agment(evergreen)	3.72	Y	5300	53000	Yes
Newfeld SW	SE 2 79N 2E Hickory Grove, Scott	1	Corn	29.2	Agment(evergreen)	2.20	Y	5300	154760	Yes
Neufeld SE	SE 2 79N 2E Hickory Grove, Scott	1	Corn	79.3	Agment(evergreen)	2.19	Y	5300	420290	Yes
									0	
Rose	E1/2 NW 32 79N 3E Sheridan, Scott	1	Corn	40	Agment(evergreen)	0.65	Y	7500	300000	Yes
Gehrls a	NE 79N 2E Hick. Gv.&S1/2 SE 35 Alns Gv, Scott	1	Corn	165.1	Agment(evergreen)	2.28	Y	5300	875030	Yes
Gehrls b	NE 79N 2E Hickory Grove, Scott	1	Corn	15.4	Agment(evergreen)	2.98	Y	5300	81620	Yes
Rivaldd N	E1/2 NE 14 & W1/2 NW 13 79N 2E Hick. Gv, Scott	3	Corn2	76.2	Agment(evergreen)	2.54	Y	5700	434340	Yes
Rivaldd S	E1/2 NE 14 & W1/2 NW 13 79N 2E Hick. Gv, Scott	3	Corn1	82	Agment(evergreen)	3.35	Y	6700	549400	Yes
Quinn N	E1/2 NE 13 79N 2E Hickory Grove, Scott	3	Corn2	76.1	Agment(evergreen)	2.75	N	7500	570750	Yes
Quinn S	SW NE 13 79N 2E Hickory Grove, Scott	3	Corn2	26.4	Agment(evergreen)	2.51	N	7500	198000	Yes
Quinn W	SE NW 13 79N 2E Hickory Grove, Scott	3	Corn1	35.6	Agment(evergreen)	2.66	Y	6700	238520	Yes
Keppy NN	E1/2 NW & N1/2 SW 18 79N 3E Sheridan, Scott	3	Soybeans	103.5	Agment(evergreen)	3.85	Y		0	Yes
East 80	SW 1/4 7 79N 3E Sheridan, Scott	1	Corn	77.7	Own	2.89	Y	5300	411810	Yes
North 64	SW 1/4 7 79N 3E Sheridan, Scott	1	Corn	63.8	Own	2.84	N	5300	338140	Yes
Tom's 80	W1/2 SE1/4 7 79N 3E Sheridan, Scott	1	Corn	73.2	Own	2.34	Y	5300	387960	Yes
South 53	N1/2 NE 1/4 18 79N 3E Sheridan, Scott	1	Corn	53	Own	2.19	Y	5300	280900	Yes
West 80	E1/2 SE1/4 12 79N 2E Hickory Grove, Scott	1	Corn	79.4	Own	2.48	N	5300	420820	Yes
Toms 55	SE SE & E1/2 SW SE 4 79N 3E Sheridan, Scott	1	Corn	54.7	Own	2.39	Y	5300	289910	Yes
	Total acres available for manure application			1386.8	**Total gallons that could be applied**				7622510	

Manure Management Plan Form

Year by Year Manure Management Plan Summary

Instructions: Complete this form for each of the next four growing seasons, to demonstrate sufficient land base to apply manure over multiple crop years. If this page is identical for multiple years (e.g. every other year), submit only once for the identical years, and indicate which years the form represents. Footnotes are given on page 6.

Crop year(s): 2018-2

1	2	3	4	5	6	7	8	9	10	11
Field Designation [ee]	Field Location ___1/4 of the___ 1/4 Sec___ T___ R___ Townsip Name_____, County Name _____	Mgt Id [ff]	Planned Crop	Acres receiving manure[gg]	Own, rent, agreement (include length of agreement) [hh]	P index value [ii]	HEL (Y/N)[jj]	Planned Application		Correct Soil Test for P[ll] (Yes or No)
								gal/acre	gal/field [kk]	
Unteidt West	W1/2 SW 35 80N 2E Allens Grove, Scott	2	Soybean	42.7	Agment(evergreen)	1.43	N		0	Yes
Unteidt North	N1/2 SW 35 80N 2E Allens Grove, Scott	2	Soybean	73.8	Agment(evergreen)	2.50	N		0	Yes
Unteidt South	SE SW 35 80N 2E Allens Grove, Scott	2	Corn	30	Agment(evergreen)	1.52	N	6700	201000	Yes
Kundel 80	S1/2 SW 18 79N 3E Sheridan, Scott	1	Corn	75.6	Own	1.89	N	7500	567000	Yes
Kundel N-40	SE SE 13 79N 2E Hickory Grove, Scott	1	Corn	42.5	Own	1.94	N	7500	318750	Yes
Kundel S-40	NE NE 24 79N 2E Hickory Grove, Scott	1	Corn	28.8	Own	0.92	N	7500	216000	Yes
Cline	NW NW 13 79N 2E Hickory Grove, Scott	1	Con	7	Own	2.12	N	5300	37100	Yes
									0	
									0	
									0	
									0	
									0	
									0	
									0	
ullivan West/Wies	E1/2 NE 35 80N 2E Allens Grove, Scott	2	Corn	73.3	Agment(evergreen)	2.58	Y		0	Yes
									0	
Amy's Place	N1/2 SW 36 80N 2E Allens Grove, Scott	2	Soybean	54	Agment(evergreen)	1.19	N		0	Yes
									0	
Puck E	N1/2 SW & SE NW 12 79N 2E Hickory Grove, Scot	3	Corn1	104.3	Agment(evergreen)	2.41	Y	6700	698810	Yes
Puck W	NE SE 11 & NW SW 12 79N 2E Hkry Gv, Scott	3	Corn1	41.7	Agment(evergreen)	4.98	Y	6700	279390	Yes
									0	
									0	
	Total acres available for manure application			573.7	**Total gallons that could be applied**				2318050	

Manure Management Plan Form

Year by Year Manure Management Plan Summary

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Crop year(s): 2018-3

1	2	3	4	5	6	7	8	9	10	11
Field Designation [ee]	Field Location ___1/4 of the___ 1/4 Sec___ T___ R___ Townsip Name_____, County Name _____	Mgt Id [ff]	Planned Crop	Acres receiving manure[gg]	Own, rent, agreement (include length of agreement) [hh]	P index value [ii]	HEL (Y/N)[jj]	Planned Application		Correct Soil Test for P[ll] (Yes or No)
								gal/acre	gal/field [kk]	
Engelbrechts	NE 19 79N 3E Sheridan, Scott	2	Corn	169	Agment(evergreen)	0.81	N	6700	1132300	Yes
Darin Engel.	SE SW 8 79N 3E Sheridan, Scott	2	Corn	40	Agment(evergreen)	4.27	N	6700	268000	Yes
									0	
Carey	NE 20 79N 3E Sheridan, Scott	2	Soybeans	116.2	Agment(evergreen)	2.34	N		0	Yes
Dad's Home 120	NW 7 79N 3E Sheridan, Scott	2	Corn	118.4	Agment(evergreen)	1.82	N	6700	793280	Yes
Dad's Home 42	E1/4 NW 7 79N 3E Sheridan, Scott	2	Corn	39.9	Agment(evergreen)	1.65	N	6700	267330	Yes
Smith	SE SE 7 79N 3E Sheridan, Scott	2	Corn	37.7	Agment(evergreen)	2.33	Y	6700	252590	Yes
Mngls S/Muhs S	NW & N1/2 SW 21 79N 3E Sheridan, Scott	2	Soybeans	135.12	Agment(evergreen)	2.36	N		0	Yes
Mangels N	SE NW 21 79N 3E Sheridan, Scott	2	Corn	17.23	Agment(evergreen)	1.58	N	6700	115441	Yes
Muhs N	SW 16 & N1/2 NW 21 79N 3E Sheridan, Scott	2	Corn	207.42	Agment(evergreen)	1.67	N	6700	1389714	Yes
Harlan Meier 1	SW SW 12 79N 2E Hickory Grove, Scott	2	Corn	63.9	Agment(evergreen)	2.94	N	6700	428130	Yes
Harlan Meier 2	S1/2 SW 12 & NE NW 13 79N 2E Hkry Grv, Scott	2	Soybeans	71.1	Agment(evergreen)	2.79	Y		0	Yes
Harlan Meier 3	NW NE 13 79N 2E Hickory Grove, Scott	2	Soybeans	36	Agment(evergreen)	2.58	Y		0	Yes
Harlan Meier 4	SW SE 12 79N 2E Hickory Grove, Scott	2	Corn	17.2	Agment(evergreen)	2.61	Y	6700	115240	Yes
									0	
									0	
									0	
Schneckloth	SW 9 79N 3E Sheridan, Scott	2	Corn	151.4	Agment(evergreen)	3.01	N	6700	1014380	Yes
Dale Moore E	E1/2 NW 19 79N 3E Sheridan, Scott	2	Soybeans	106	Agment(evergreen)	1.73	N		0	Yes
Dale Moore W	W1/2 NW 19 79N 3E Sheridan, Scott	2	Corn	63	Agment(evergreen)	1.73	N		0	Yes
Dale Moore S	NE SE 24 79N 2E Hickory Grove, Scott	2	Corn	35	Agment(evergreen)	1.44	N		0	Yes
									0	
	Total acres available for manure application			1424.57	**Total gallons that could be applied**				5776405	

Manure Management Plan Form

Year by Year Manure Management Plan Summary

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Crop year(s): 2018-4

1	2	3	4	5	6	7	8	9	10	11
Field Designation [ee]	Field Location ___1/4 of the___ 1/4 Sec___ T___ R___ Townsip Name_____, County Name _____	Mgt Id [ff]	Planned Crop	Acres receiving manure[gg]	Own, rent, agreement (include length of agreement) [hh]	P index value [ii]	HEL (Y/N)[jj]	Planned Application		Correct Soil Test for P[ll] (Yes or No)
								gal/acre	gal/field [kk]	
Murphy N	N1/2 SW 2 79N 2E Hickory Grove, Scott	2	Soybean	60.8	Agment(evergreen)	2.92	N		0	Yes
Murphy S	SE SW 2 & NE NW 11 79N 2E Hcky Gv, Scott	2	Soybean	72	Agment(evergreen)	2.38	N		0	Yes
Don Henzen N	SW SE 11 79N 2E Hickory Grove, Scott	2	Soybean	29.6	Agment(evergreen)	3.87	N		0	Yes
Don Henzen M	SW SE 11 & W1/2 NE 14 79N 2E Hcky Gv, Scott	2	Soybean	80.5	Agment(evergreen)	2.80	N		0	Yes
Don Henzen S	SW NE 14 79N 2E Hickory Grove, Scott	2	Soybean	8.5	Agment(evergreen)	4.97	N		0	Yes
Bob Henzen E	SW NW 35 & SE NE 34 80N 2E Allens Grove, Scot	2	Corn	62	Agment(evergreen)	2.50	N		0	Yes
Bob Henzen W	SE NE 34 80N 2E Allens Grove, Scott	2	Corn	3.1	Agment(evergreen)	4.30	N		0	Yes
									0	
									0	
Amhof	S1/2 SE 20 80N 3E Winfield, Scott	2	Corn	60	Agment(evergreen)	2.57	N		0	Yes
									0	
Engelbrt-corey S	SE SW & SW SE 17 79N 3E Sheridan, Scott	2	Soybean	38	Agment(evergreen)	3.89	N		0	Yes
Engelbrt-corey N	SE SW & SW SE 17 79N 3E Sheridan, Scott	2	Corn	28	Agment(evergreen)	2.02	N	4400	123200	Yes
Marten Farm	NE 6 79N 3E Sheridan, Scott	2	Soybean	145	Agment(evergreen)	3.28	N		0	Yes
									0	
Dennis Mohr 1	S1/2 NW 17 79N 3E Sheridan, Scott	2	Corn	35	Agment(evergreen)	3.88	Y	4400	154000	Yes
Dennis Mohr 2	SE NW & SW NE 17 79N 3E Sheridan, Scott	2	Soybean	32	Agment(evergreen)	3.19	Y		0	Yes
Dennis Mohr 3	W1/2 SW 17 79N 3E Sheridan, Scott	2	Soybean	65	Agment(evergreen)	2.17	N		0	Yes
Dennis Mohr 4-5	NE SW & NW SE 17 79N 3E Sheridan, Scott	2	Corn	55	Agment(evergreen)	2.85	Y	4400	242000	Yes
Dennis Mohr 6	SW SW 17 79N 3E Sheridan, Scott	2	Corn	13	Agment(evergreen)	4.05	Y	4400	57200	Yes
Dexter	N1/2 NW 16 79N 3E Sheridan, Scott	2	Soybean	84	Agment(evergreen)	2.14	Y		0	Yes
									0	
	Total acres available for manure application			871.5	**Total gallons that could be applied**				576400	

Manure Management Plan Form

Year by Year Manure Management Plan Summary

Instructions: Complete this form for each of the next four growing seasons, to demonstrate sufficient land base to apply manure over multiple crop years. If this page is identical for multiple years (e.g. every other year), submit only once for the identical years, and indicate which years the form represents. Footnotes are given on page 6.

Crop year(s): 2018-5

1	2	3	4	5	6	7	8	9	10	11
Field Designation [ee]	Field Location ___1/4 of the___ 1/4 Sec___ T___ R___ Townsip Name_____, County Name _____	Mgt Id [ff]	Planned Crop	Acres receiving manure[gg]	Own, rent, agreement (include length of agreement) [hh]	P index value [ii]	HEL (Y/N)[jj]	Planned Application		Correct Soil Test for P[ll] (Yes or No)
								gal/acre	gal/field [kk]	
Keppy NS	E1/2 NW&N1/2 SW 18 79N 3E Sheridan, Scott	3	Soybeans	22	Agment(evergreen)	4.99	N		0	Yes
Meggers	S1/2 SE 6 79N 3E Sheridan, Scott	2	Soybeans	69	Agment(evergreen)	2.56	N		0	Yes
Bens N	NW SW 18 79N 3E Sheridan, Scott	1	Corn	7	own	2.10	Y	4000	28000	Yes
Bens S	NE SE 13 79N 2E Hickory Grove, Scott	1	Corn	43	own	1.84	Y	4000	172000	Yes
Copley N	SW 1 79N 2E Hickory Grove, Scott	2	Corn	135	Agment(evergreen)	2.66	Y	4400	594000	Yes
Copley S	SW SW 1&NE NW 12 79N 2E H.G., Scott	2	Corn	49	Agment(evergreen)	3.59	Y	4400	215600	Yes
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
Total acres available for manure application				325	**Total gallons that could be applied**				1009600	

Manure Management Plan Form

Year by Year Manure Management Plan Summary

Instructions: Complete this form for each of the next four growing seasons, to demonstrate sufficient land base to apply manure over multiple crop years. If this page is identical for multiple years (e.g. every other year), submit only once for the identical years, and indicate which years the form represents. Footnotes are given on page 6.

Crop year(s): 2019-1

1	2	3	4	5	6	7	8	9	10	11
Field Designation [ee]	Field Location ___1/4 of the___ 1/4 Sec___ T___ R___ Townsip Name_____, County Name _____	Mgt Id [ff]	Planned Crop	Acres receiving manure[gg]	Own, rent, agreement (include length of agreement) [hh]	P index value [ii]	HEL (Y/N)[jj]	Planned Application		Correct Soil Test for P[ll] (Yes or No)
								gal/acre	gal/field [kk]	
Curtis 80	E1/2 NW 1 79N 2E Hickory Grove, Scott	1	Corn	76	Agment(evergreen)	2.20	N	5300	402800	Yes
Curtis 142	NE 1 79N 2E Hickory Grove, Scott	1	Corn	142	Agment(evergreen)	1.52	N	7500	1065000	Yes
Neufeld NE	SE 2 79N 2E Hickory Grove, Scott	1	Corn	28.2	Agment(evergreen)	2.43	Y	5300	149460	Yes
Newfeld NW	SE 2 79N 2E Hickory Grove, Scott	1	Corn	10	Agment(evergreen)	3.72	Y	5300	53000	Yes
Newfeld SW	SE 2 79N 2E Hickory Grove, Scott	1	Corn	29.2	Agment(evergreen)	2.20	Y	5300	154760	Yes
Neufeld SE	SE 2 79N 2E Hickory Grove, Scott	1	Corn	79.3	Agment(evergreen)	2.19	Y	5300	420290	Yes
									0	
Rose	E1/2 NW 32 79N 3E Sheridan, Scott	1	Corn	40	Agment(evergreen)	0.65	Y	7500	300000	Yes
Gehrls a	NE 79N 2E Hick. Gv.&S1/2 SE 35 Alns Gv, Scott	1	Corn	165.1	Agment(evergreen)	2.28	Y	5300	875030	Yes
Gehrls b	NE 79N 2E Hickory Grove, Scott	1	Corn	15.4	Agment(evergreen)	2.98	Y	5300	81620	Yes
Rivaldd N	E1/2 NE 14 & W1/2 NW 13 79N 2E Hick. Gv, Scott	3	Soybeans	76.2	Agment(evergreen)	2.54	Y		0	Yes
Rivaldd S	E1/2 NE 14 & W1/2 NW 13 79N 2E Hick. Gv, Scott	3	Corn2	82	Agment(evergreen)	3.35	Y	7500	615000	Yes
Quinn N	E1/2 NE 13 79N 2E Hickory Grove, Scott	3	Soybeans	76.1	Agment(evergreen)	2.75	N		0	Yes
Quinn S	SW NE 13 79N 2E Hickory Grove, Scott	3	Soybeans	26.4	Agment(evergreen)	2.51	N		0	Yes
Quinn W	SE NW 13 79N 2E Hickory Grove, Scott	3	Corn2	35.6	Agment(evergreen)	2.66	Y	7500	267000	Yes
Keppy NN	E1/2 NW & N1/2 SW 18 79N 3E Sheridan, Scott	3	Corn1	103.5	Agment(evergreen)	3.85	Y	6700	693450	Yes
East 80	SW 1/4 7 79N 3E Sheridan, Scott	1	Corn	77.7	Own	2.89	Y	5300	411810	Yes
North 64	SW 1/4 7 79N 3E Sheridan, Scott	1	Corn	63.8	Own	2.84	N	5300	338140	Yes
Tom's 80	W1/2 SE1/4 7 79N 3E Sheridan, Scott	1	Corn	73.2	Own	2.34	Y	5300	387960	Yes
South 53	N1/2 NE 1/4 18 79N 3E Sheridan, Scott	1	Corn	53	Own	2.19	Y	5300	280900	Yes
West 80	E1/2 SE1/4 12 79N 2E Hickory Grove, Scott	1	Corn	79.4	Own	2.48	N	5300	420820	Yes
Toms 55	SE SE & E1/2 SW SE 4 79N 3E Sheridan, Scott	1	Corn	54.7	Own	2.39	Y	5300	289910	Yes
	Total acres available for manure application			1386.8	**Total gallons that could be applied**				7206950	

Manure Management Plan Form

Year by Year Manure Management Plan Summary

Instructions: Complete this form for each of the next four growing seasons, to demonstrate sufficient land base to apply manure over multiple crop years. If this page is identical for multiple years (e.g. every other year), submit only once for the identical years, and indicate which years the form represents. Footnotes are given on page 6.

Crop year(s): 2019-2

1	2	3	4	5	6	7	8	9	10	11
Field Designation [ee]	Field Location ___1/4 of the___ 1/4 Sec___ T___ R___ Townsip Name_____, County Name _____	Mgt Id [ff]	Planned Crop	Acres receiving manure[gg]	Own, rent, agreement (include length of agreement) [hh]	P index value [ii]	HEL (Y/N)[jj]	Planned Application		Correct Soil Test for P[ll] (Yes or No)
								gal/acre	gal/field [kk]	
Unteidt West	W1/2 SW 35 80N 2E Allens Grove, Scott	2	Corn	42.7	Agment(evergreen)	1.43	N	6700	286090	Yes
Unteidt North	N1/2 SW 35 80N 2E Allens Grove, Scott	2	Corn	73.8	Agment(evergreen)	2.50	N	6700	494460	Yes
Unteidt South	SE SW 35 80N 2E Allens Grove, Scott	2	Soybean	30	Agment(evergreen)	1.52	N		0	Yes
Kundel 80	S1/2 SW 18 79N 3E Sheridan, Scott	1	Corn	75.6	Own	1.89	N	7500	567000	Yes
Kundel N-40	SE SE 13 79N 2E Hickory Grove, Scott	1	Corn	42.5	Own	1.94	N	7500	318750	Yes
Kundel S-40	NE NE 24 79N 2E Hickory Grove, Scott	1	Corn	28.8	Own	0.92	N	7500	216000	Yes
Cline	NW NW 13 79N 2E Hickory Grove, Scott	1	Corn	7	Own	2.12	N	5300	37100	Yes
									0	
									0	
									0	
									0	
									0	
									0	
									0	
ullivan West/Wies	E1/2 NE 35 80N 2E Allens Grove, Scott	2	Soybean	73.3	Agment(evergreen)	2.58	Y		0	Yes
									0	
Amy's Place	N1/2 SW 36 80N 2E Allens Grove, Scott	2	Corn	54	Agment(evergreen)	1.19	N		0	Yes
									0	
Puck E	N1/2 SW & SE NW 12 79N 2E Hickory Grove, Scot	3	Corn2	104.3	Agment(evergreen)	2.41	Y	7500	782250	Yes
Puck W	NE SE 11 & NW SW 12 79N 2E Hkry Gv, Scott	3	Corn2	41.7	Agment(evergreen)	4.98	Y	7500	312750	Yes
									0	
									0	
	Total acres available for manure application			573.7	**Total gallons that could be applied**				3014400	

Manure Management Plan Form

Year by Year Manure Management Plan Summary

Instructions: Complete this form for each of the next four growing seasons, to demonstrate sufficient land base to apply manure over multiple crop years. If this page is identical for multiple years (e.g. every other year), submit only once for the identical years, and indicate which years the form represents. Footnotes are given on page 6.

Crop year(s): 2019-3

1	2	3	4	5	6	7	8	9	10	11
Field Designation [ee]	Field Location ___1/4 of the___ 1/4 Sec___ T___ R___ Townsip Name_____, County Name _____	Mgt Id [ff]	Planned Crop	Acres receiving manure[gg]	Own, rent, agreement (include length of agreement) [hh]	P index value [ii]	HEL (Y/N)[jj]	Planned Application		Correct Soil Test for P[ll] (Yes or No)
								gal/acre	gal/field [kk]	
Engelbrechts	NE 19 79N 3E Sheridan, Scott	2	Soybeans	169	Agment(evergreen)	0.81	N		0	Yes
Darin Engel.	SE SW 8 79N 3E Sheridan, Scott	2	Soybeans	40	Agment(evergreen)	4.27	N		0	Yes
									0	
Carey	NE 20 79N 3E Sheridan, Scott	2	Corn	116.2	Agment(evergreen)	2.34	N	6700	778540	Yes
Dad's Home 120	NW 7 79N 3E Sheridan, Scott	2	Soybeans	118.4	Agment(evergreen)	1.82	N		0	Yes
Dad's Home 42	E1/4 NW 7 79N 3E Sheridan, Scott	2	Soybeans	39.9	Agment(evergreen)	1.65	N		0	Yes
Smith	SE SE 7 79N 3E Sheridan, Scott	2	Soybeans	37.7	Agment(evergreen)	2.33	Y		0	Yes
Mngls S/Muhs S	NW & N1/2 SW 21 79N 3E Sheridan, Scott	2	Corn	135.12	Agment(evergreen)	2.36	N	6700	905304	Yes
Mangels N	SE NW 21 79N 3E Sheridan, Scott	2	Soybeans	17.23	Agment(evergreen)	1.58	N		0	Yes
Muhs N	SW 16 & N1/2 NW 21 79N 3E Sheridan, Scott	2	Soybeans	207.42	Agment(evergreen)	1.67	N		0	Yes
Harlan Meier 1	SW SW 12 79N 2E Hickory Grove, Scott	2	Soybeans	63.9	Agment(evergreen)	2.94	N		0	Yes
Harlan Meier 2	S1/2 SW 12 & NE NW 13 79N 2E Hkry Grv, Scott	2	Corn	71.1	Agment(evergreen)	2.79	Y	6700	476370	Yes
Harlan Meier 3	NW NE 13 79N 2E Hickory Grove, Scott	2	Corn	36	Agment(evergreen)	2.58	Y	6700	241200	Yes
Harlan Meier 4	SW SE 12 79N 2E Hickory Grove, Scott	2	Soybeans	17.2	Agment(evergreen)	2.61	Y		0	Yes
									0	
									0	
									0	
Schneckloth	SW 9 79N 3E Sheridan, Scott	2	Soybeans	151.4	Agment(evergreen)	3.01	N		0	Yes
Dale Moore E	E1/2 NW 19 79N 3E Sheridan, Scott	2	Corn	106	Agment(evergreen)	1.73	N		0	Yes
Dale Moore W	W1/2 NW 19 79N 3E Sheridan, Scott	2	Soybeans	63	Agment(evergreen)	1.73	N		0	Yes
Dale Moore S	NE SE 24 79N 2E Hickory Grove, Scott	2	Soybeans	35	Agment(evergreen)	1.44	N		0	Yes
									0	
	Total acres available for manure application			1424.57	**Total gallons that could be applied**				2401414	

Manure Management Plan Form

Year by Year Manure Management Plan Summary

Instructions: Complete this form for each of the next four growing seasons, to demonstrate sufficient land base to apply manure over multiple crop years. If this page is identical for multiple years (e.g. every other year), submit only once for the identical years, and indicate which years the form represents. Footnotes are given on page 6.

Crop year(s): 2019-4

1	2	3	4	5	6	7	8	9	10	11
Field Designation [ee]	Field Location ___1/4 of the___ 1/4 Sec___ T___ R___ Townsip Name_____, County Name _____	Mgt Id [ff]	Planned Crop	Acres receiving manure[gg]	Own, rent, agreement (include length of agreement) [hh]	P index value [ii]	HEL (Y/N)[jj]	Planned Application		Correct Soil Test for P[ll] (Yes or No)
								gal/acre	gal/field [kk]	
Murphy N	N1/2 SW 2 79N 2E Hickory Grove, Scott	2	Corn	60.8	Agment(evergreen)	2.92	N		0	Yes
Murphy S	SE SW 2 & NE NW 11 79N 2E Hcky Gv, Scott	2	Corn	72	Agment(evergreen)	2.38	N		0	Yes
Don Henzen N	SW SE 11 79N 2E Hickory Grove, Scott	2	Corn	29.6	Agment(evergreen)	3.87	N		0	Yes
Don Henzen M	SW SE 11 & W1/2 NE 14 79N 2E Hcky Gv, Scott	2	Corn	80.5	Agment(evergreen)	2.80	N		0	Yes
Don Henzen S	SW NE 14 79N 2E Hickory Grove, Scott	2	Corn	8.5	Agment(evergreen)	4.97	N		0	Yes
Bob Henzen E	SW NW 35 & SE NE 34 80N 2E Allens Grove, Scot	2	Soybean	62	Agment(evergreen)	2.50	N		0	Yes
Bob Henzen W	SE NE 34 80N 2E Allens Grove, Scott	2	Soybean	3.1	Agment(evergreen)	4.30	N		0	Yes
									0	
									0	
Amhof	S1/2 SE 20 80N 3E Winfield, Scott	2	Soybean	60	Agment(evergreen)	2.57	N		0	Yes
									0	
Engelbrt-corey S	SE SW & SW SE 17 79N 3E Sheridan, Scott	2	Corn	38	Agment(evergreen)	3.89	N	4400	167200	Yes
Engelbrt-corey N	SE SW & SW SE 17 79N 3E Sheridan, Scott	2	Soybean	28	Agment(evergreen)	2.02	N		0	Yes
Marten Farm	NE 6 79N 3E Sheridan, Scott	2	Corn	145	Agment(evergreen)	3.28	N	4400	638000	Yes
									0	
Dennis Mohr 1	S1/2 NW 17 79N 3E Sheridan, Scott	2	Soybean	35	Agment(evergreen)	3.88	Y		0	Yes
Dennis Mohr 2	SE NW & SW NE 17 79N 3E Sheridan, Scott	2	Corn	32	Agment(evergreen)	3.19	Y	4400	140800	Yes
Dennis Mohr 3	W1/2 SW 17 79N 3E Sheridan, Scott	2	Corn	65	Agment(evergreen)	2.17	N	4400	286000	Yes
Dennis Mohr 4-5	NE SW & NW SE 17 79N 3E Sheridan, Scott	2	Soybean	55	Agment(evergreen)	2.85	Y		0	Yes
Dennis Mohr 6	SW SW 17 79N 3E Sheridan, Scott	2	Soybean	13	Agment(evergreen)	4.05	Y		0	Yes
Dexter	N1/2 NW 16 79N 3E Sheridan, Scott	2	Corn	84	Agment(evergreen)	2.14	Y	4400	369600	Yes
									0	
	Total acres available for manure application			871.5	**Total gallons that could be applied**				1601600	

Manure Management Plan Form

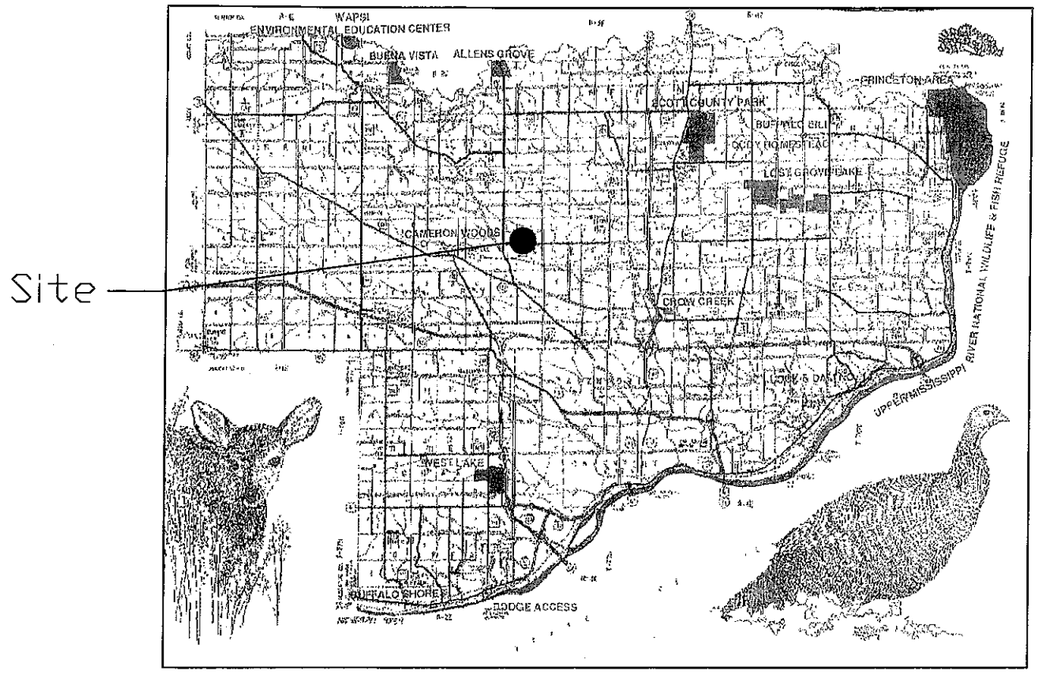
Year by Year Manure Management Plan Summary

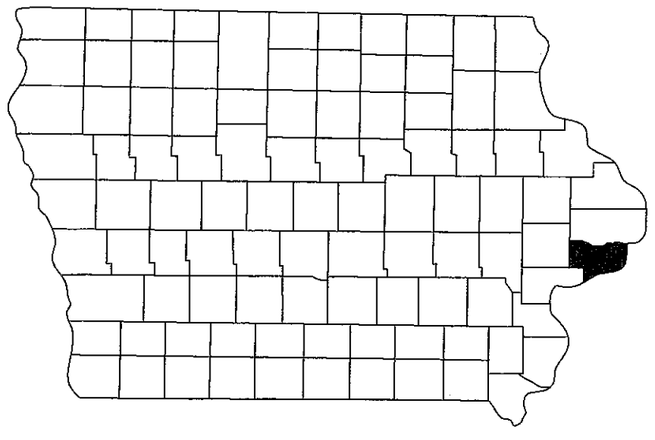
Instructions: Complete this form for each of the next four growing seasons, to demonstrate sufficient land base to apply manure over multiple crop years. If this page is identical for multiple years (e.g. every other year), submit only once for the identical years, and indicate which years the form represents. Footnotes are given on page 6.

Crop year(s): 2019-5

1	2	3	4	5	6	7	8	9	10	11
Field Designation [ee]	Field Location ___1/4 of the___ 1/4 Sec___ T___ R___ Townsip Name_____, County Name _____	Mgt Id [ff]	Planned Crop	Acres receiving manure[gg]	Own, rent, agreement (include length of agreement) [hh]	P index value [ii]	HEL (Y/N)[jj]	Planned Application		Correct Soil Test for P[ll] (Yes or No)
								gal/acre	gal/field [kk]	
Keppy NS	E1/2 NW&N1/2 SW 18 79N 3E Sheridan, Scott	3	Corn1	22	Agment(evergreen)	4.99	N	6700	147400	Yes
Meggers	S1/2 SE 6 79N 3E Sheridan, Scott	2	Corn	69	Agment(evergreen)	2.56	N		0	Yes
Bens N	NW SW 18 79N 3E Sheridan, Scott	1	Corn	7	own	2.10	Y	5300	37100	Yes
Bens S	NE SE 13 79N 2E Hickory Grove, Scott	1	Corn	43	own	1.84	Y	7500	322500	Yes
Copley N	SW 1 79N 2E Hickory Grove, Scott	2	Soybeans	135	Agment(evergreen)	2.66	Y		0	Yes
Copley S	SW SW 1&NE NW 12 79N 2E H.G., Scott	2	Soybeans	49	Agment(evergreen)	3.59	Y		0	Yes
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
									0	
Total acres available for manure application				325	**Total gallons that could be applied**				507000	

Plot Date & Time:12 February 2015 8:52 AM





GRANDVIEW FARMS, INC.
2015 SITE EXPANSION
SHERIDAN TOWNSHIP
SCOTT COUNTY

SW 1/4
SECTION 7
T-79-N R-3-E

ESTIMATED 100 YR. FLOOD ELEV. = 710.0
SITE TOP OF SLAT ELEV. = 773.0

SEPERATION DISTANCES:

THERE ARE NO RESIDENCES WITHIN 1000 FT. OF THE PROPOSED FACILITY.
THERE ARE NO COMERCIAL ENTERPRISES WITHIN 1000 FT. OF THE PROPOSED FACILITY.
THERE ARE NO RELIGIOUS INSTITUTIONS WITHIN 1000 FT. OF THE PROPOSED FACILITY.
THERE ARE NO EDUCATIONAL INSTITUTIONS WITHIN 1000 FT. OF THE PROPOSED FACILITY.
THERE ARE NO PUBLIC USE AREAS WITHIN 1875 FT. OF THE PROPOSED FACILITY.
THERE ARE NO PRIVATE WELLS WITHIN 100 FT. OF THE PROPOSED FACILITY.
THERE ARE NO SURFACE INTAKES OF AG. DRAINAGE WELLS OR WATER SOURCES WITHIN 500 FT. OF THE PROPOSED FACILITY.
THERE ARE NO MAJOR WATER SOURCES, CISTERN OF AN AG. DRAINAGE WELL OR KNOWN SINKHOLES WITHIN 1000 FT. OF THE PROPOSED FACILITY.

THE STRUCTURES COMPLY WITH THE REQUIRED SEPARATION REQUIREMENTS.

ENGINEER NOTE:

THE LICENSED PROFESSIONAL ENGINEER, OR A DISIGNEE, SHALL SUPERVISE THE CONSTRUCTION DURING CRITICAL POINTS OF THE CONSTRUCTION. A CONSTRUCTION CERTIFICATION REPORT SHALL BE SUBMITTED TO THE DNR PRIOR TO THE UTILIZATION OF THE CONSTRUCTED STRUCTURES.

CERTIFICATION SEAL

LICENSED PROFESSIONAL ENGINEER
DENNIS JOHNSON
10640
IOWA

I HEREBY CERTIFY THAT THIS PLAN, SPECIFICATION, OR REPORT WAS PREPARED BE ME OR UNDER MY DIRECT SUPERVISION AND THAT I AM A DULY LICENSED PROFESSIONAL ENGINEER UNDER THE LAWS OF THE STATE OF IOWA.

DENNIS J. JOHNSON 2/12/2015

LICENSE NUMBER 10640
LICENSE RENEWAL DATE IS DECEMBER 31, 2016

REV	REVISION DESCRIPTION	DWN	APP	REV DATE

SEAL

SUB CONSULTANT

PRIME CONSULTANT
WENCK ASSOCIATES
Responsive partner. Exceptional outcomes.
1012 5th Ave., Suite 1B, Windom, MN 56101
(507) 831-2703
(507) 831-5271

PROJECT TITLE
2015 Site Expansion
Grandview Farms, Inc.
12090 West 240th Street
Eldridge, IA 52748

SHEET TITLE
Cover Sheet

DWN BY	CHK'D	APP'D	DWG DATE
TNT	DJJ	DJJ	2/12/2015

SCALE 1/4" = 1'-0"

PROJECT NO.	SHEET NO.	REV NO.
1773-04	G-101	

R:\Drafting\1773 Grandview\04 2015 Expansion\CAD\GEN\G-101.dwg

Plot Date & Time: 13 February 2015 8:22 AM

NOTE: EXISTING WELL #1 BY THE SW CORNER OF BARN #5 TO BE PROFESSIONALLY CAPPED.
NEW WELL PROPOSED NEAR SW CORNER OF BARN #2 AND EXISTING WELL HOUSE.

BARNS 4,5 & 6 TO HAVE PERIMETER TILE. TIE INTO EXISTING TILE LINES OF EXISTING BARNS

REV	REVISION DESCRIPTION	DWN	APP	REV DATE

SEAL

PRIME CONSULTANT

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Consulting Engineers

Web Site: www.wenck.com

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Windom, MN 56101

(507) 831-2703
(507) 831-5271

PROJECT TITLE
2015 Site Expansion

Grandview Farms, Inc.
12090 West 240th Street

Eldridge, IA 52748

SHEET TITLE
Overall Site Plan

DWN BY	CHK'D	APP'D	DWG DATE	2/11/2015
TNT	DJJ	DJJ	SCALE	1" = 200'

PROJECT NO.	SHEET NO.	REV NO.
1773-04	C-101	

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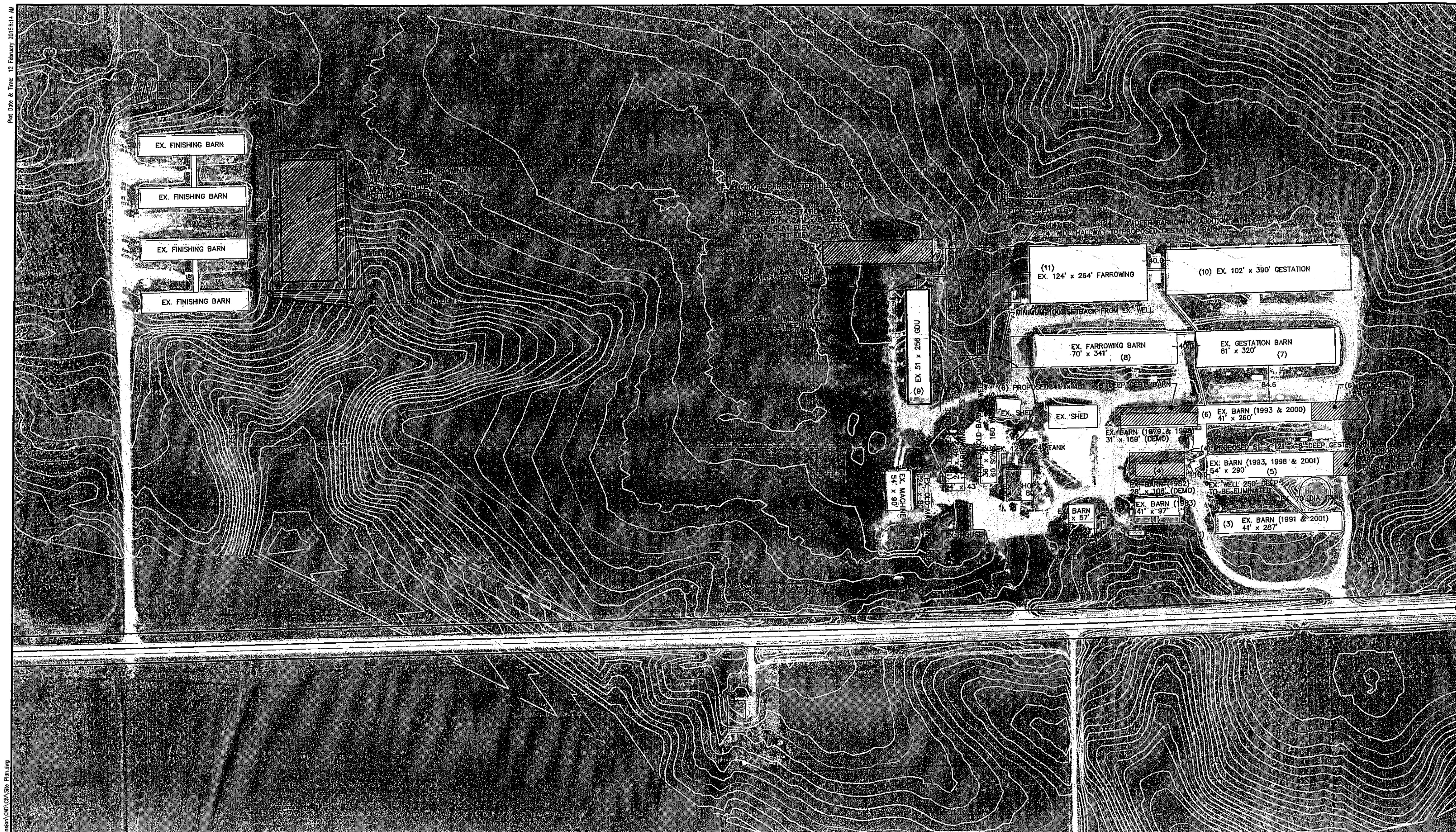
Plot Date & Time: 12 February 2015 8:14 AM



NOTE: EXISTING WELL #1 BY THE SW CORNER OF BARN #5 TO BE PROFESSIONALLY CAPPED. NEW WELL PROPOSED NEAR SW CORNER OF BARN #2 AND EXISTING WELL HOUSE.

BARNS 4,5 & 6 TO HAVE PERIMETER TILE. TIE INTO EXISTING TILE LINES OF EXISTING BARNS

REV	REVISION DESCRIPTION	DWN	APP	REV DATE

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PROJECT TITLE
2015 Site Expansion

Grandview Farms, Inc.
12090 West 240th Street

Eldridge, IA 52748

SHEET TITLE
Overall Site Plan

DWN BY	CHK'D	APP'D	DWG DATE 2/11/2015
TNT	DJJ	DJJ	SCALE 1" = 200'

PROJECT NO.	SHEET NO.	REV NO.
1773-04	C-101	

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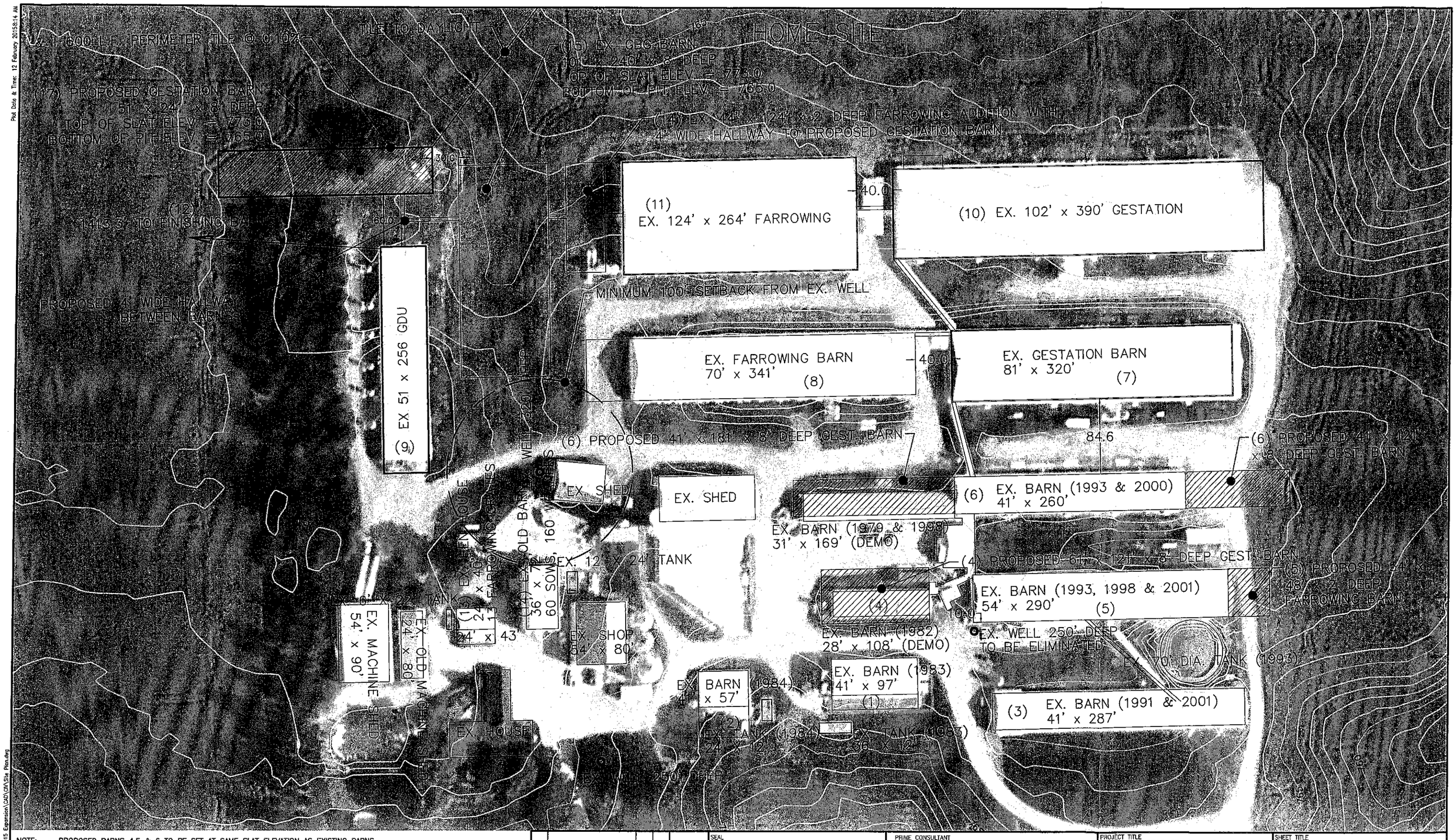
Plot Date & Time: 12 February 2015@8:14 AM



NOTE: PROPOSED BARNS 4,5 & 6 TO BE SET AT SAME SLAT ELEVATION AS EXISTING BARNS.
PROPOSED BARN #17 TO HAVE A TOP OF SLAT ELEV. = 773.0
TOP OF PIT FLOOR TO BE 765.0

REV	REVISION DESCRIPTION	DWN	APP	REV DATE

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PROJECT TITLE
2015 Site Expansion

Grandview Farms, Inc.
12090 West 240th Street

Eldridge, IA 52748

SHEET TITLE
Home Site Layout

DWN BY	CHK'D	APP'D	DWG DATE
TNT	DJJ	DJJ	2/11/2015

SCALE 1" = 100'

PROJECT NO. 1773-04
SHEET NO. C-102
REV NO.

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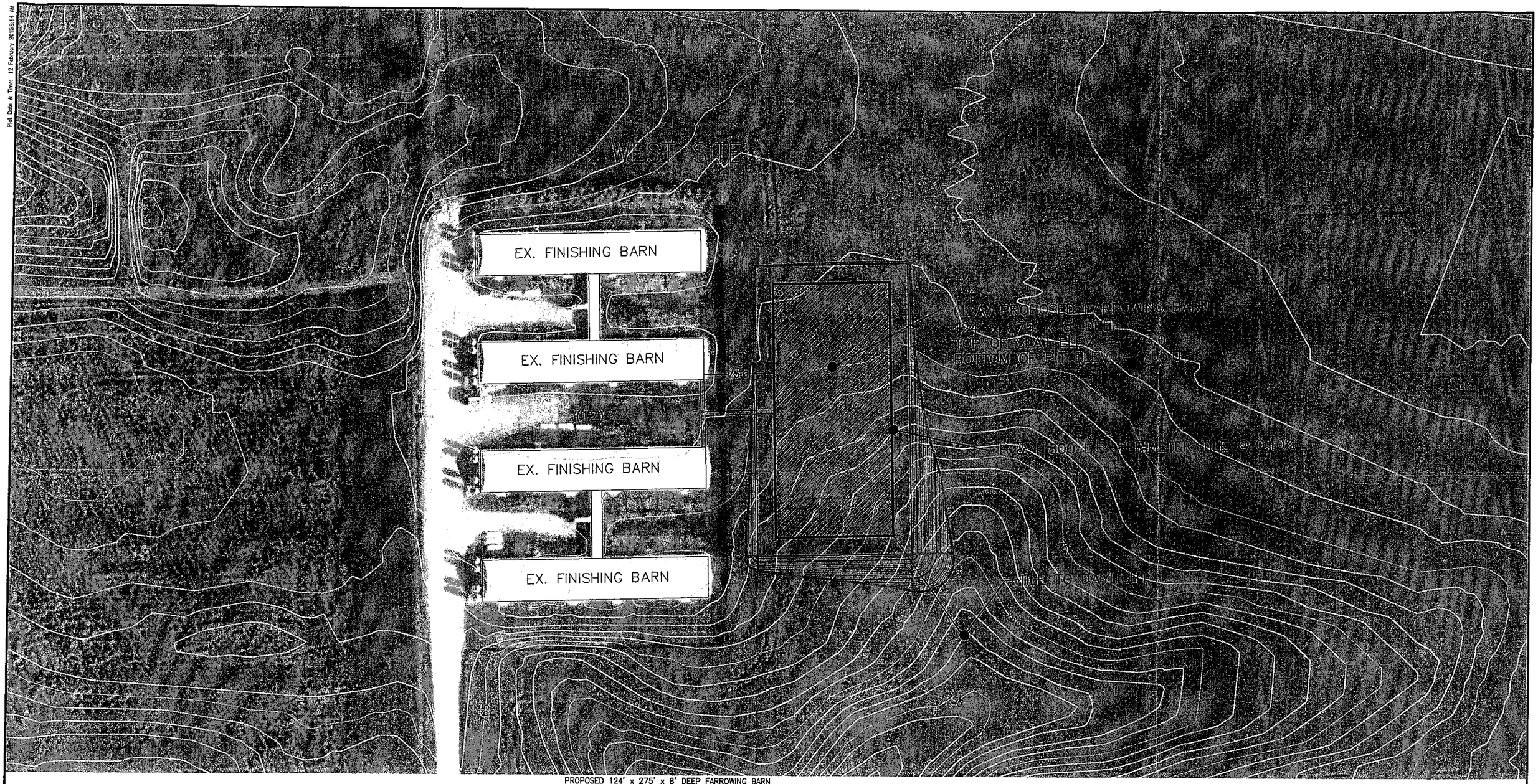
Plot Date & Time: 12 February 2015 8:14 AM



PROPOSED 124' x 275' x 8' DEEP FARROWING BARN
TOP OF SLAT ELEV. = 773.0
BOTTOM OF PIT ELEV. = 765.0

Name	Fill Factor	2d Area(Sq. Ft.)	Cut(adjusted)(Cu. Yd.)	Fill(adjusted)(Cu. Yd.)	Net(adjusted)(Cu. Yd.)
EG-FG B12A	1.350	64375.97	5190.85	4731.72	459.13<Cut>

NOTE: THE SOUTHEAST CORNER OF BARN REQUIRES FILL UNDER PIT FLOOR. REMOVE ALL TOPSOIL MATERIAL AND BUILD BASE IN 6" LIFTS. BASE WILL REQUIRE COMPACTION TO 95% OF STANADARD PROCTOR.
SLOPES PROJECTED OFF BUILDING AT 4:1 SLOPE. USE ANY EXCESS SOIL MATERIAL INSURE PROPER SURFACE RUNOFF..

REV	REVISION DESCRIPTION	DWN	APP	REV DATE

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PROJECT TITLE

2015 Site Expansion

Grandview Farms, Inc.
12090 West 240th Street

Eldridge, IA 52748

SHEET TITLE

West Site Layout

DWN BY	CHK'D	APP'D	DWG DATE
TNT	DJJ	DJJ	2/11/2015

SCALE 1" = 100'

PROJECT NO.	SHEET NO.	REV NO.
1773-04	C-103	

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Plot Date & Time: 11 February 2015 9:20 AM

Grandview Farms, Inc.

Table 1. Animal Number Detail

No.	Building	Type	Storage	Animal Numbers	2011	2015	Manure Storage Needed (Gal./Year)	Manure Storage Provided (Gal./Year)
1	Existing 1983	Open lot	Covered tank 36' x 12'	100	na	0	0	0
2	Existing 1984	Open lot	Covered tank 24' x 12'	60	na	0	0	0
3	South Gestation	confinement	circular tank & deep pit	541	561	561	531,611	186,940
4	Small Farrowing	confinement	deep pit	52	52	**310**	**293,760**	**370,761**
5	South Farrowing	confinement	circular tank & deep pit	192	192	**224**	**636,796**	**219,882**
6	Center Gestation (includes 10 boars)	confinement	deep pit	852	521	**746**	**706,919**	**1,156,976**
7	North Gestation	confinement	deep pit	1344	1344	1344	1,273,592	1,329,338
8	North Farrowing	confinement	pit to N. gestation	353	374	374	1,063,222	174,471
9	Gilt Developer-Fin.	confinement	deep pit	1640	1120	1400	766,500	662,324
	Nursery	confinement	deep pit		320	400	43,800	
10	New Gestation	confinement	deep pit	2000	2000	2000	1,895,226	2,070,112
11	New Farrowing	confinement	pit to new gestation	480	480	480	1,364,563	248,875
13	Old Finisher	confinement	deep pit	13	250	400	219,000	6,560
14	Old Barn	confinement	deep pit	60	100	100	94,761	128,289
15	Gilt Breeding Barn	confinement	deep pit	na	1240	1310	717,225	1,245,555
16	Farrowing- phase II	confinement	deep pit	na	80	80	227,427	40,429
17	Gilt Developer	confinement	deep pit			**1200**	**657,000**	**623,316**
			TOTAL	7687	8634	10929	**10,491,402**	**7,840,512**
12	Wean-Finish barns	confinement	deep pit	4800		2022	1,916,074	1,991,296
12a	West Farrowing	confinement	deep pit			**480**	**1,364,563**	**1,753,058**
	No. 12 are barns with a separate MMP		**TOTAL**			**2,502**	**3,280,637**	**3,744,354**

Home - 272 Days of Storage Provided
West - 468 Days of Storage Provided

Changes for 2015 are in bold in Table 1 and are described below:

(4) This barn will be demolished and replaced with a 60'x100'x8' deep pit, 300hd gestation barn.
(5) An additional 48 ft will be added to the east, adding 32 farrowing spaces with a 2' deep pit with scraper to existing circular tank.
(6) 1993 and 2000 construcation - 40x120x8 will be added for 250 gestation stalls.
(9) GDU and nursery is not expanding, but animal numbers increased due to increased stocking density.
(12) Remodel existing wean/finish barns to gestation barns, 504 stalls each.
(12a) Construct new 124'x270' farrowing barn with 480 crates.
(13) 1978 and 1998 construction attached to (6) will be demolished and replaced with 40x180x8 deep pit building for 400 cull sow spaces.
(17) Construct new 50'x240'x8' deep pit, 1200hd gilt grower barn (GDU-Finisher)

Barn Manure Storage Calculations

Barn #	Desc.	Width	Length	Depth	Volume C.F.	Volume Gal.
1	Conc. Tank	10.67	34.67	7	0	0
2	Conc. Tank	10.67	22.67	7	0	0
3	Ex. Barn	39.67	90	7	24,992	186,940
4	Proposed Barn	59.67	118.67	7	49,567	370,761
5	Proposed Add.	52.67	46.67	1	2,458	18,386
5	Conc. Tank	1225	3.1415	7	26,938	201,496
6	Ex. Barn	39.67	258.67	7	71,830	537,288
6	Proposed Barn	39.67	179.67	7	49,893	373,200
6	Proposed Barn	39.67	118.67	7	32,953	246,488
7	Ex. Barn	79.67	318.67	7	177,719	1,329,338
8	Ex. Barn	68.67	339.67	1	23,325	174,471
9	Ex. Barn	49.67	254.67	7	88,546	662,324
10	Ex. Barn	99.67	396.67	7	276,753	2,070,112
11	Ex. Barn	126.67	262.67	1	33,272	248,875
13	Ex. Barn	22.67	38.67	1	877	6,560
14	Ex. Barn	34.67	70.67	7	17,151	128,289
15	Ex. Barn	99.67	238.67	7	166,518	1,245,555
16	Ex. Barn	42.67	126.67	1	5,405	40,429
17	Ex. Barn	49.67	239.67	7	83,331	623,316
Totals					**1,048,197**	**7,840,512**
12_1	Ex. Barn	39.67	239.67	7	66,554	497,824
12_2	Ex. Barn	39.67	239.67	7	66,554	497,824
12_3	Ex. Barn	39.67	239.67	7	66,554	497,824
12_4	Ex. Barn	39.67	239.67	7	66,554	497,824
12a	Proposed Barn	122.34	273.67	7	234,366	1,753,058
Totals					**500,582**	**3,744,354**

Notes:
(1) Concrete tank and existing barn to be demolished.
(2) Concrete tank and existing barn to be demolished.
(4) Existing barn 4 to be demolished and replaced with new barn
(5) Existing barn 5 to have addition added to east end.
(6) Existing barn 6 to have additions on west and east ends
(12) Existing 4 finishing barns to be converted into gestation barns.
(12a) New barn to be added to existing set of 4 finishing barns.
(17) New barn to be added north of existing barn 9.

REV	REVISION DESCRIPTION	DWN	APP	REV DATE

SEAL

PRIME CONSULTANT
Wenck
© Wenck Associates, Inc. Consulting Engineers
Web Site: www.wenck.com
1012 5th Ave., Suite 1B
Windom, MN 56101
(507) 831-2703
(507) 831-5271

PROJECT TITLE
2015 Site Expansion
Grandview Farms, Inc.
12090 West 240th Street
Eldridge, IA 52748

SHEET TITLE
Animal Numbers & Waste Calculations

DWN BY	CHK'D	APP'D	DWG DATE
TNT	DJJ	DJJ	2/11/2015

SCALE Not to Scale
PROJECT NO. 1773-04
SHEET NO. C-104
REV NO.

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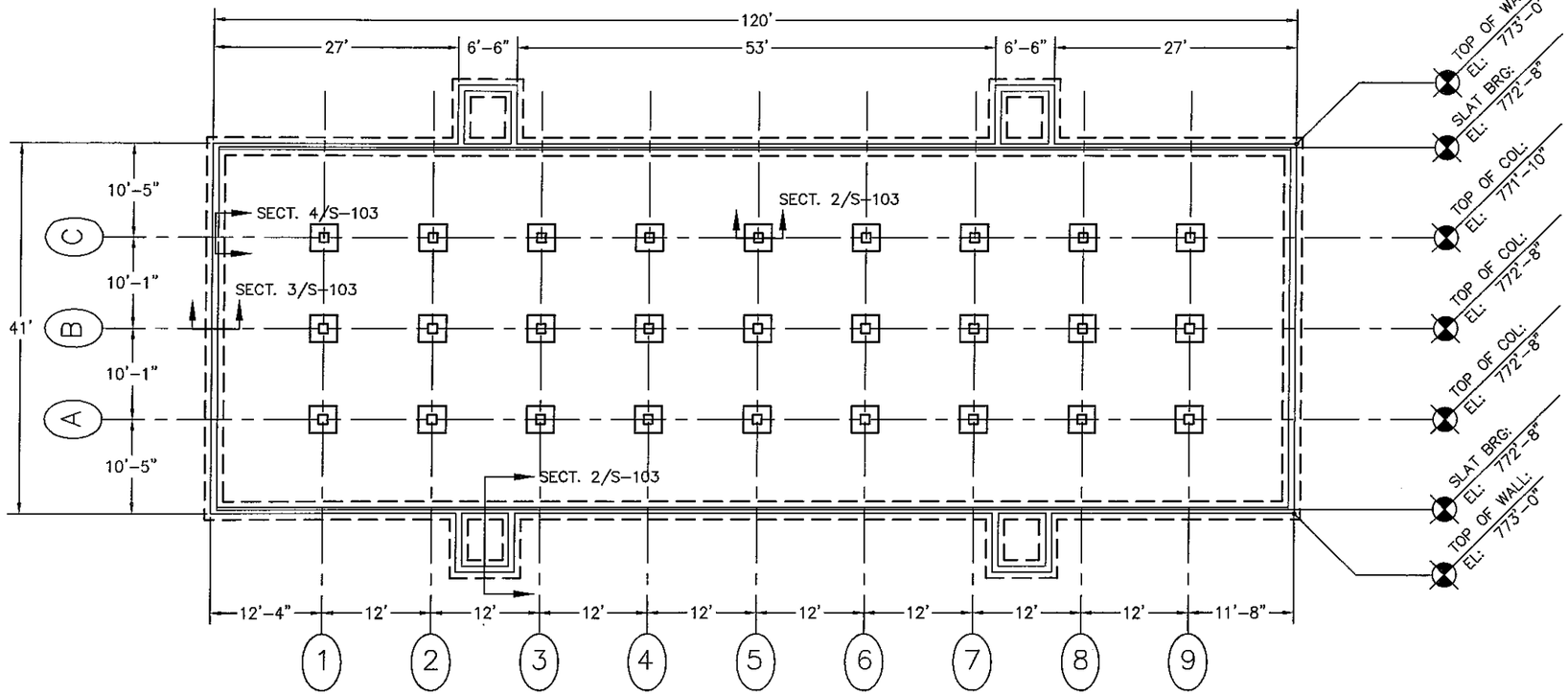

Footing/Foundation Plan

SCALE: 1/16" = 1'-0"

General Notes:

1: ASSUMED SOIL BEARING CAPACITY: 2500 p.c.f.
ASSUMED EQUIVALENT FLUID PRESSURE: 100 p.c.f.

2: CONCRETE, 28 DAY STRENGTH:

ALL WALLS & COLUMNS: 4000 PSI.
ALL FLOOR SLABS & FOOTINGS: 4000 PSI.

3: RE-BAR: GRADE 60.

4: ANCHOR BOLTS @ 4' O.C.: A307 (MILD STEEL).

5: PUMPOUT LOCATIONS MUST BE VERIFIED BY OWNER REPRESENTATIVE

6: PUMPOUT FLOORS MUST BE POURED INTEGRAL WITH MAIN FLOOR

7: EXPANSION JOINTS IN WALLS SHALL BE BEHIND DIVIDER WALLS
1/2 OF HORIZ. STEEL SHALL GO THROUGH JOINT
JOINT SHALL HAVE WATERSTOP AND SEALED AT OUTSIDE JOINTS

8: AFTER COMPLETION, FLOORS & WALLS WILL BE INSPECTED FOR ANY CRACKS. ALL CRACKS OVER 0.03" WILL BE ROUTED AND SEALED WITH SIKA CJ OR EQUIVALENT.

9: DESIGNED ACCORDING TO ACI 318 STANDARDS

REV	REVISION DESCRIPTION	DWN	APP	REV DATE

SEAL

SUB CONSULTANT

PRIME CONSULTANT

WENCK ASSOCIATES

Responsive partner. Exceptional outcomes.

1012 5th Ave., Suite 18
Windom, MN 56101

(507) 831-2703
(507) 831-5271

PROJECT TITLE
2015 Site Expansion

Grandview Farms, Inc.
12090 West 240th Street

Eldridge, IA 52748

SHEET TITLE
Gestation Barn #6 (East End Exp.)
41' x 120' x 8' Deep
Footing/Foundation Plan

DWN BY	CHK'D	APP'D	DWG DATE
TNT	DJJ	DJJ	2/9/2015

SCALE 1/16" = 1'-0"

PROJECT NO.	SHEET NO.	REV NO.
1773-04	S-201	

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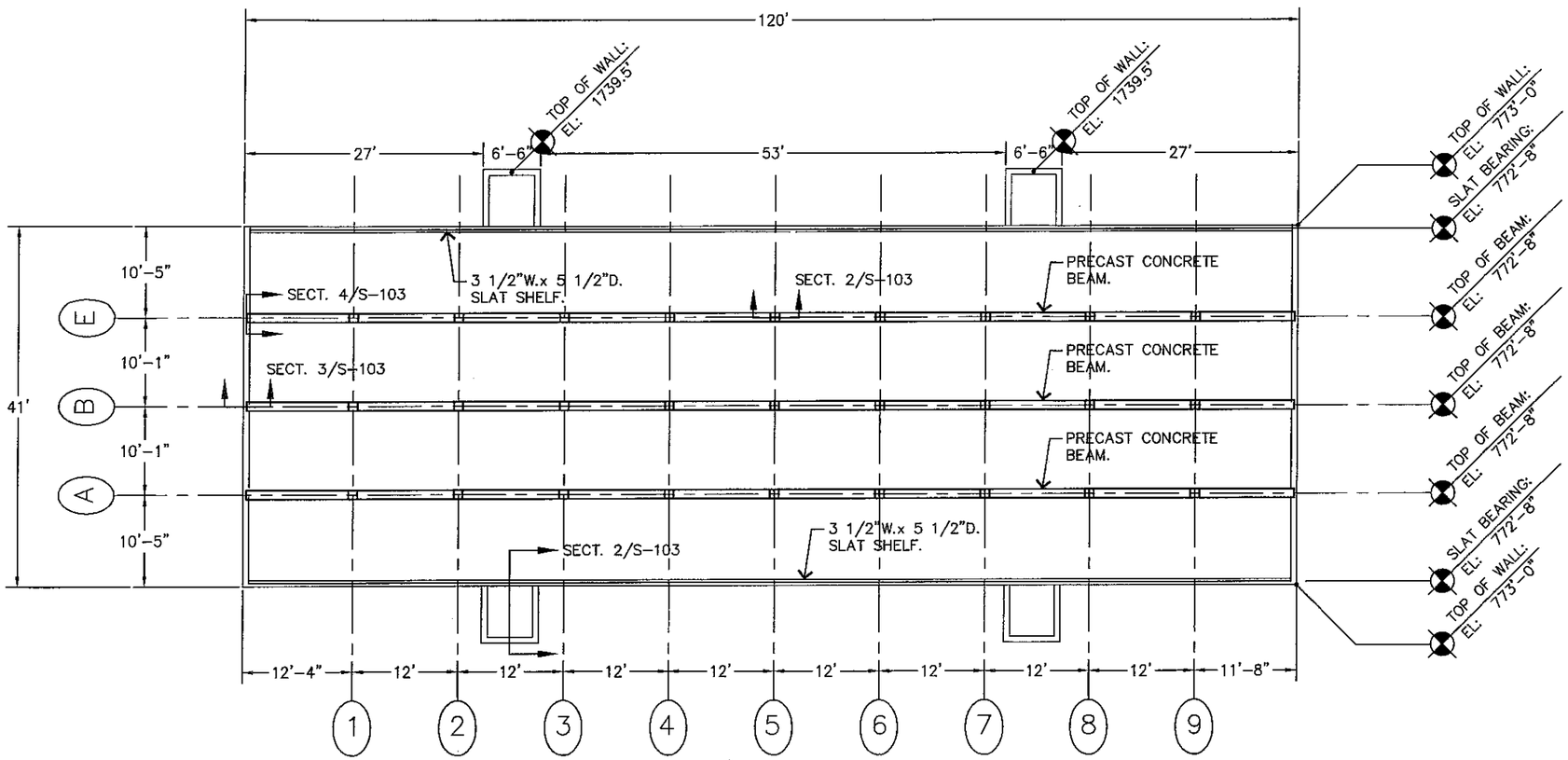
Plot Date & Time: 11 February 2015 2:43 PM



Concrete Framing Plan

SCALE: 1/16" = 1'-0"

General Notes:

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REV	REVISION DESCRIPTION	DWN	APP	REV DATE

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12090 West 240th Street
Eldridge, IA 52748

SHEET TITLE
Gestation Barn #6 (East End Exp.)
41' x 120' x 8' Deep
Concrete Framing Plan

DWN BY	CHK'D	APP'D	DWG DATE
TNT	DJJ	DJJ	2/9/2015

SCALE 1/16" = 1'-0"

PROJECT NO.	SHEET NO.	REV NO.
1773-04	S-202	

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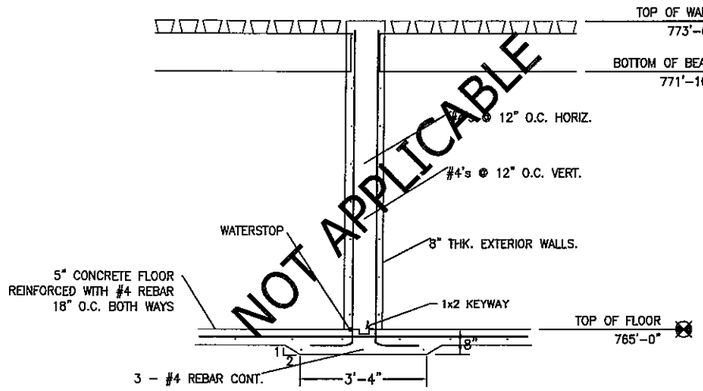
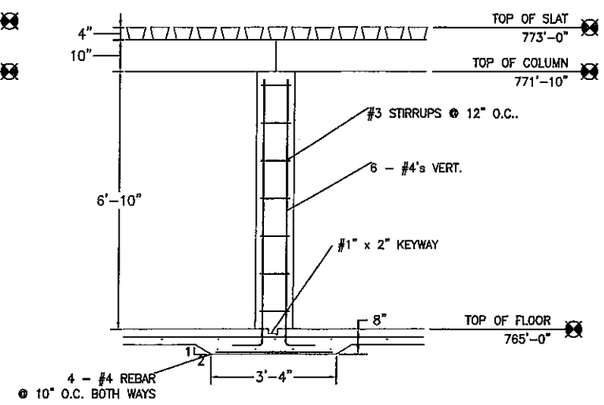
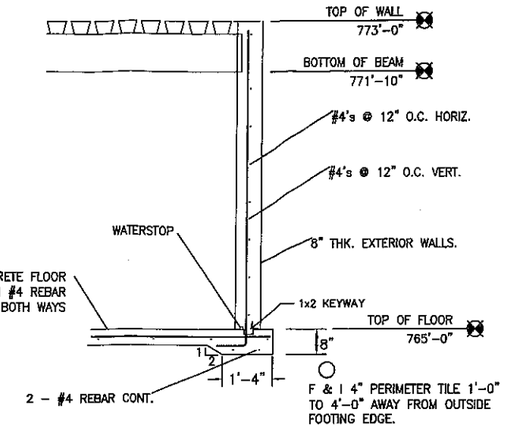
Plot Date & Time: 11 February 2015 2:43 PM



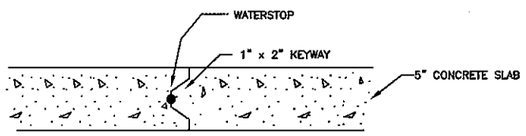
1/S103 X-SECTION INTERIOR WALL
SCALE: 1/4" = 1'-0"



2/S103 X-SECTION PIT COLUMN
SCALE: 1/4" = 1'-0"



3/S103 X-SECTION EXTERIOR WALL
SCALE: 1/4" = 1'-0"



CONSTRUCTION JOINT DETAIL
SCALE: NOT TO SCALE

THE JUNCTION OF TWO SUCCESIVE PLACEMENTS OF CONCRETE

General Notes:

1: ASSUMED SOIL BEARING CAPACITY: 2500 p.c.f.
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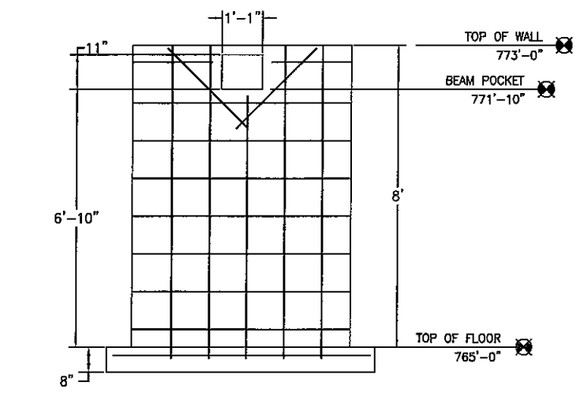
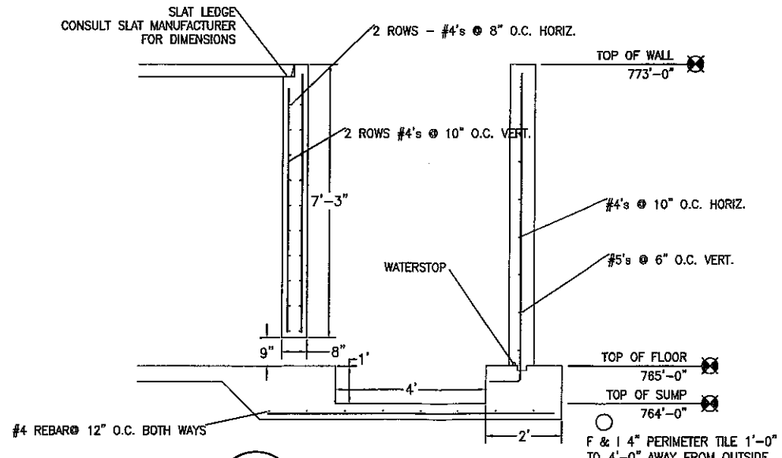
9: DESIGNED ACCORDING TO ACI 318 STANDARDS



4/S103 DETAIL - BEAM POCKET
SCALE: 1/4" = 1'-0"



5/S103 X-SECTION PUMPOUT PIT
SCALE: 1/4" = 1'-0"

REV	REVISION DESCRIPTION	DWN	APP	REV DATE

SEAL

SUB CONSULTANT

PRIME CONSULTANT
WENCK ASSOCIATES
Responsive partner. Exceptional outcomes.
1012 5th Ave., Suite 1B, Windom, MN 56101
(507) 831-2703
(507) 831-5271

PROJECT TITLE
2015 Site Expansion

Grandview Farms, Inc.
12090 West 240th Street
Eldridge, IA 52748

SHEET TITLE
Gestation Barn #6 (East End Exp.)
41' x 120' x 8' Deep
Structural Details

DWN BY	CHK'D	APP'D	DWG DATE
TNT	DJJ	DJJ	2/9/2015

SCALE 1/4" = 1'-0"

PROJECT NO.	SHEET NO.	REV NO.
1773-04	S-203	

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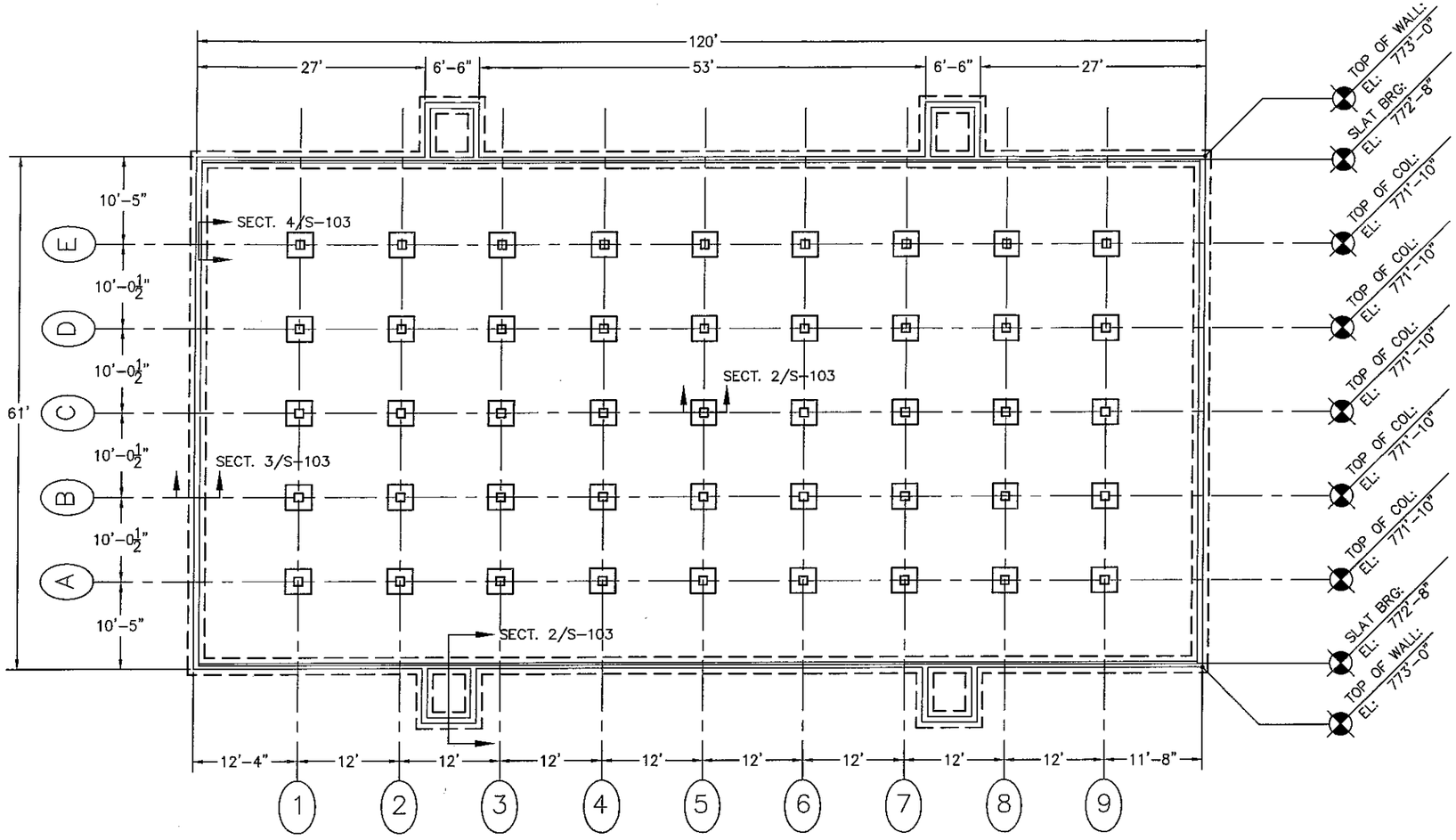
Plot Date & Time: 11 February 2015 11:39 AM



Footing/Foundation Plan

SCALE: 1/16" = 1'-0"

General Notes:

1: ASSUMED SOIL BEARING CAPACITY: 2500 p.c.f.
ASSUMED EQUIVALENT FLUID PRESSURE: 100 p.c.f.

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9: DESIGNED ACCORDING TO ACI 318 STANDARDS

REV	REVISION DESCRIPTION	DWN	APP	REV DATE

SEAL

SUB CONSULTANT

PRIME CONSULTANT
WENCK ASSOCIATES
Responsive partner. Exceptional outcomes.
1012 5th Ave., Suite 1B, Windom, MN 56101 (507) 831-2703 (507) 831-5271

PROJECT TITLE
2015 Site Expansion
Grandview Farms, Inc.
12090 West 240th Street
Eldridge, IA 52748

SHEET TITLE
Gestation Barn #4
61' x 120' x 8' Deep
Footing/Foundation Plan

DWN BY	CHK'D	APP'D	DWG DATE	SCALE
TNT	DJJ	DJJ	2/9/2015	1/16" = 1'-0"

PROJECT NO. 1773-04
SHEET NO. S-201
REV NO.

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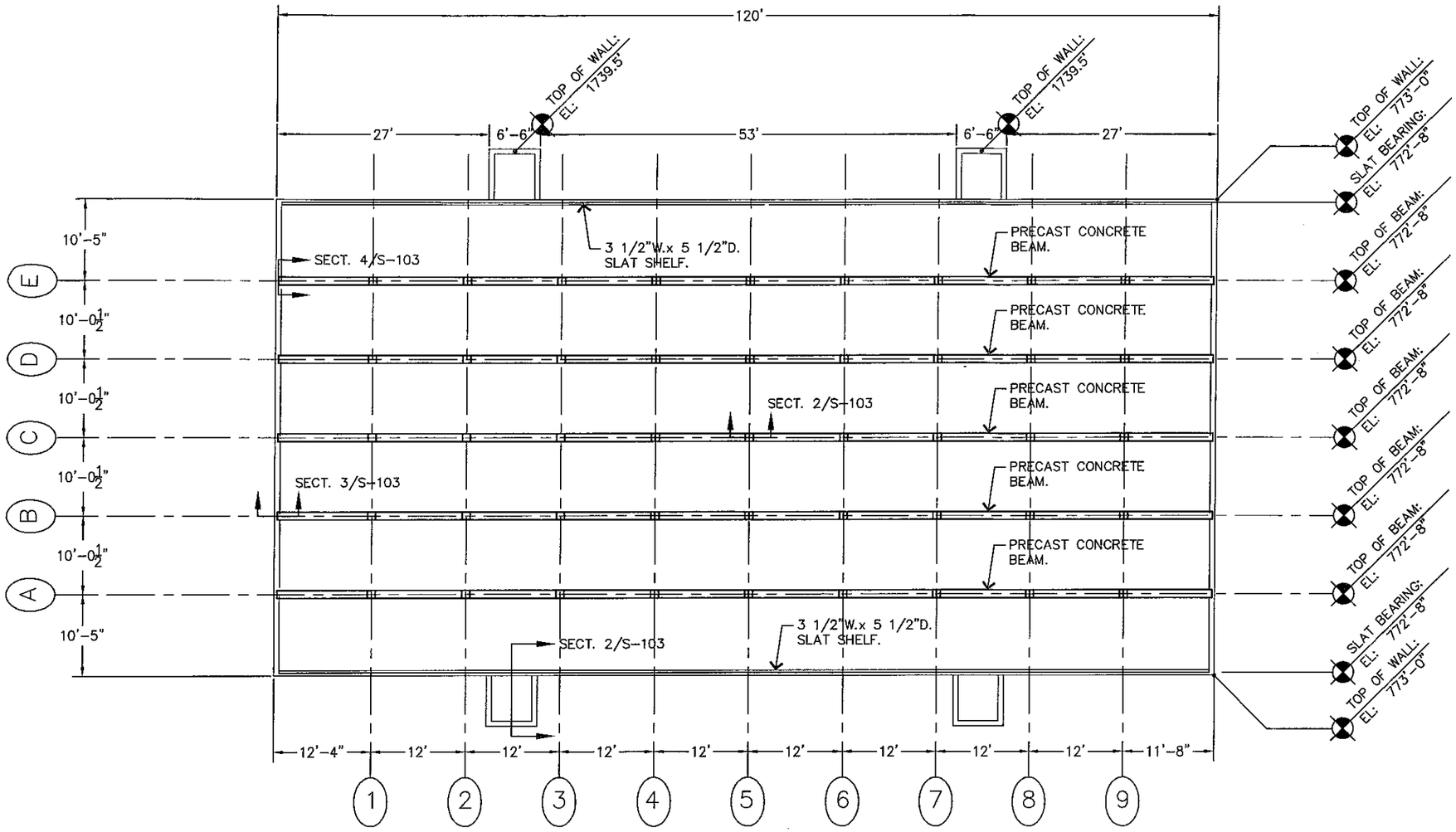

Concrete Framing Plan

SCALE: 1/16" = 1'-0"

General Notes:

1: ASSUMED SOIL BEARING CAPACITY: 2500 p.c.f.
ASSUMED EQUIVALENT FLUID PRESSURE: 100 p.c.f.

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9: DESIGNED ACCORDING TO ACI 318 STANDARDS

REV	REVISION DESCRIPTION	DWN	APP	REV DATE

SEAL

SUB CONSULTANT

PRIME CONSULTANT

WENCK ASSOCIATES
Responsive partner. Exceptional outcomes.
1012 5th Ave., Suite 1B
Windom, MN 56101
(507) 831-2703
(507) 831-5271

PROJECT TITLE
2015 Site Expansion

Grandview Farms, Inc.
12090 West 240th Street
Eldridge, IA 52748

SHEET TITLE
Gestation Barn #4
61' x 120' x 8' Deep
Concrete Framing Plan

DWN BY	CHK'D	APP'D	DWG DATE
TNT	DJJ	DJJ	2/9/2015

SCALE 1/16" = 1'-0"

PROJECT NO.	SHEET NO.	REV NO.
1773-04	S-202	

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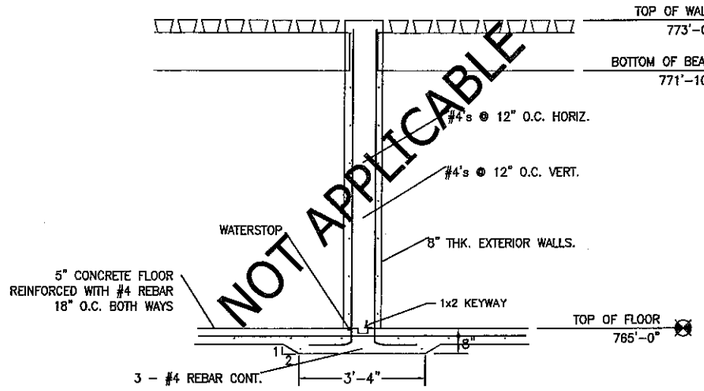
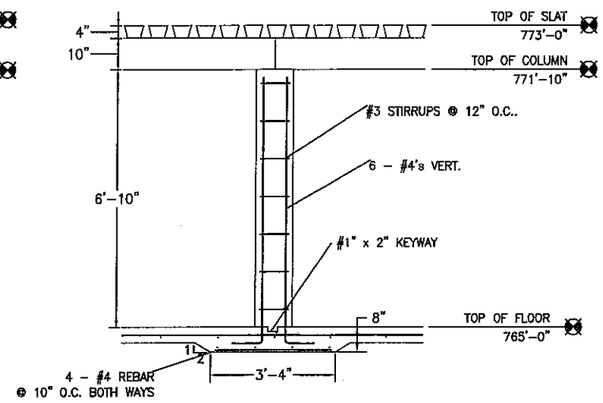
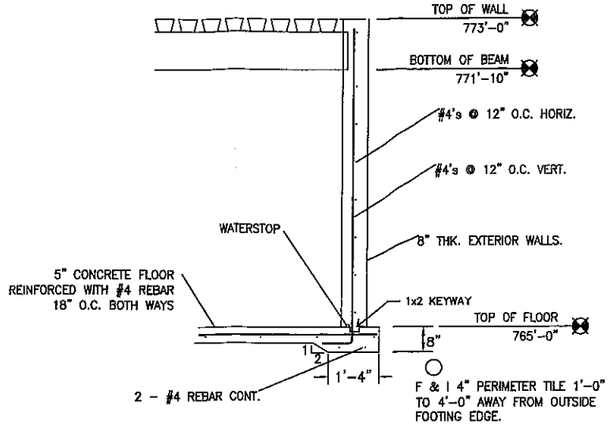


NOT APPLICABLE

1/S103 X-SECTION INTERIOR WALL
SCALE: 1/4" = 1'-0"



2/S103 X-SECTION PIT COLUMN
SCALE: 1/4" = 1'-0"



3/S103 X-SECTION EXTERIOR WALL
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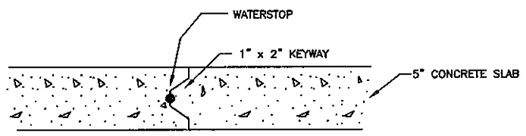

CONSTRUCTION JOINT DETAIL
SCALE: NOT TO SCALE
THE JUNCTION OF TWO SUCCESIVE
PLACEMENTS OF CONCRETE

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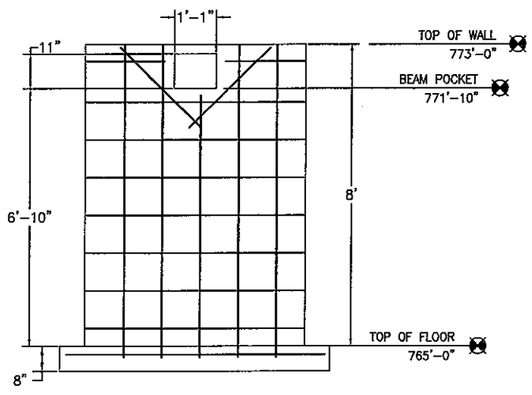
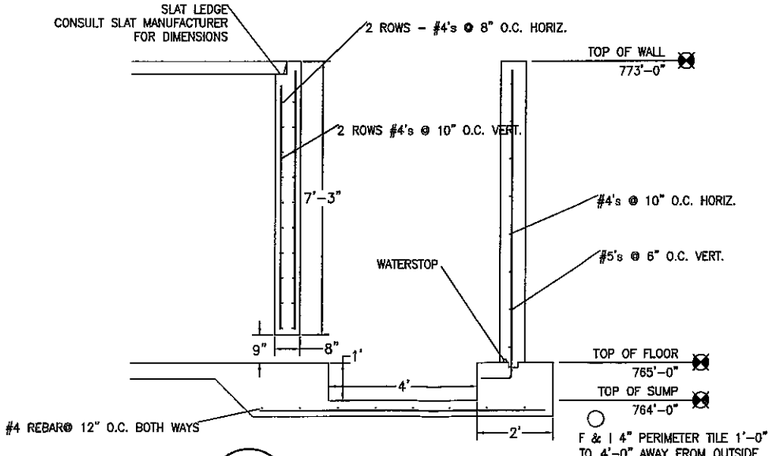


4/S103 DETAIL - BEAM POCKET
SCALE: 1/4" = 1'-0"



5/S103 X-SECTION PUMPOUT PIT
SCALE: 1/4" = 1'-0"

REV	REVISION DESCRIPTION	DWN	APP	REV DATE

SEAL

SUB CONSULTANT

PRIME CONSULTANT
WENCK
Responsive partner. Exceptional outcomes.
1012 5th Ave., Suite 1B, Windom, MN 56101
(507) 831-2703
(507) 831-5271

PROJECT TITLE
2015 Site Expansion
Grandview Farms, Inc.
12090 West 240th Street
Eldridge, IA 52748

SHEET TITLE
Gestation Barn #4
61' x 120' x 8' Deep
Structural Details

DWN BY	CHK'D	APP'D	DWG DATE
TNT	DJJ	DJJ	2/9/2015

SCALE 1/4" = 1'-0"

PROJECT NO.	SHEET NO.	REV NO.
1773-04	S-203	

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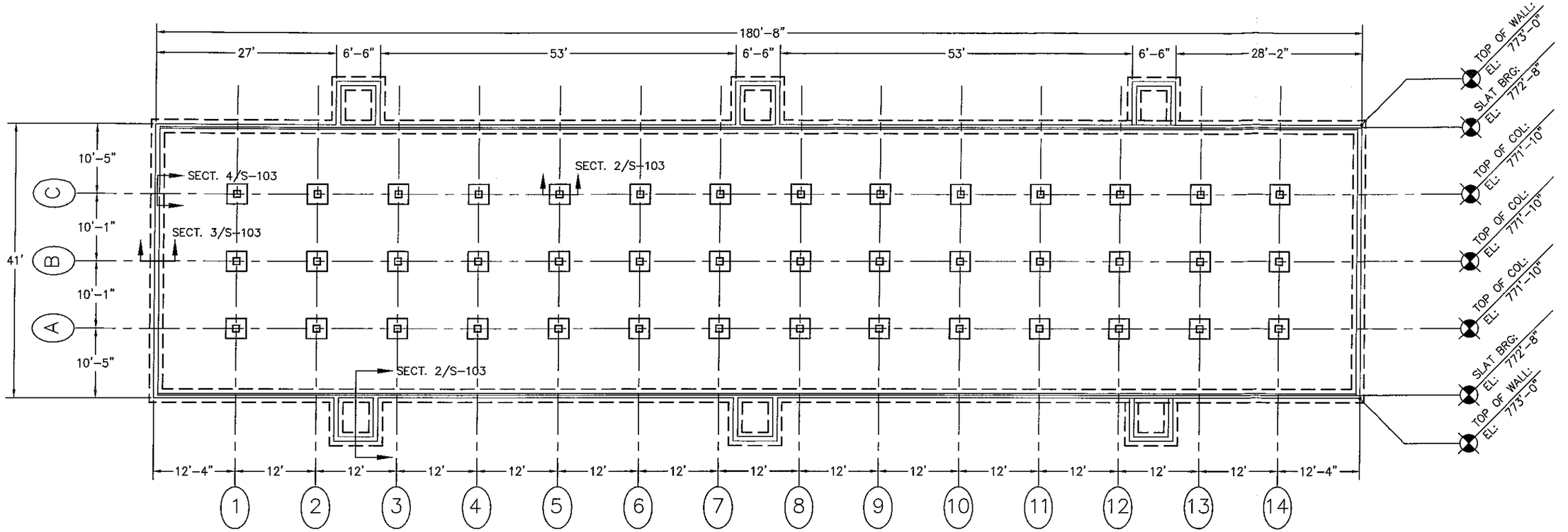

Footing/Foundation Plan

SCALE: 1/16" = 1'-0"

General Notes:

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REV	REVISION DESCRIPTION	DWN	APP	REV DATE

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PROJECT TITLE
2015 Site Expansion

Grandview Farms, Inc.
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Eldridge, IA 52748

SHEET TITLE
Gestation Barn #6 (West End Exp.)
41' x 180'-8" x 8' Deep
Footing/Foundation Plan

DWN BY	CHK'D	APP'D	DWG DATE
TNT	DJJ	DJJ	2/9/2015

SCALE 1/16" = 1'-0"

PROJECT NO.	SHEET NO.	REV NO.
1773-04	S-301	

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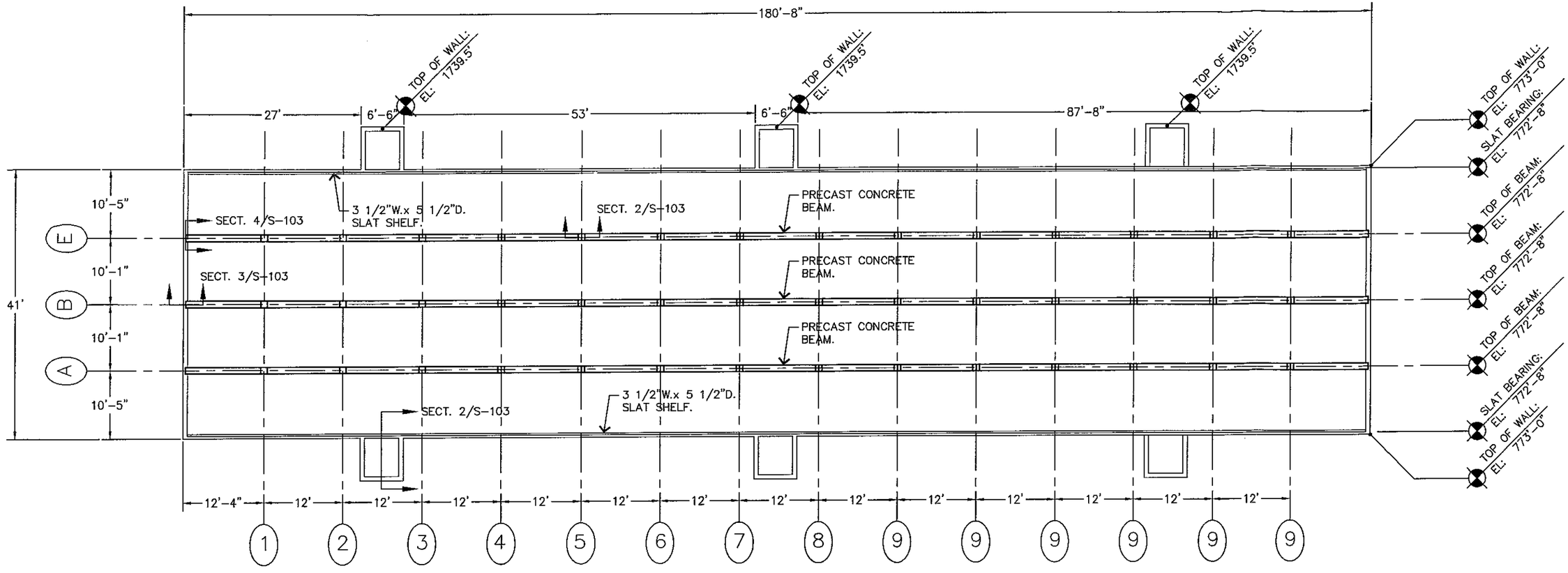

Concrete Framing Plan

SCALE: 1/16" = 1'-0"

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REV	REVISION DESCRIPTION	DWN	APP	REV DATE

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PROJECT TITLE
2015 Site Expansion

Grandview Farms, Inc.
12090 West 240th Street

Eldridge, IA 52748

SHEET TITLE
Gestation Barn #6 (West End Exp.)
41' x 180'-8" x 8' Deep
Concrete Framing Plan

DWN BY	CHK'D	APP'D	DWG DATE
TNT	DJJ	DJJ	2/9/2015

SCALE 1/16" = 1'-0"

PROJECT NO.	SHEET NO.	REV NO.
1773-04	S-302	

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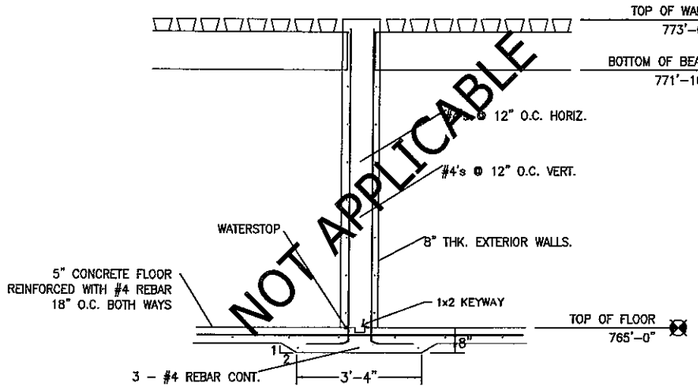
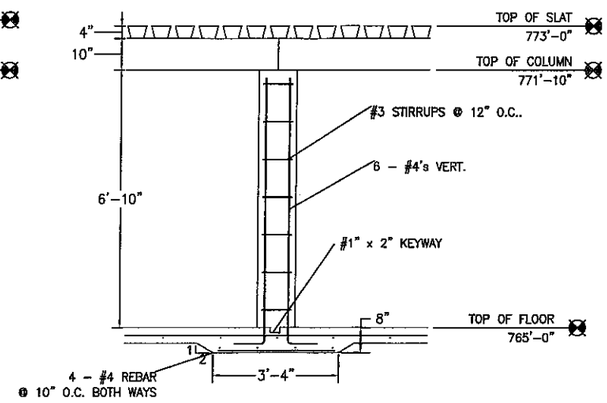
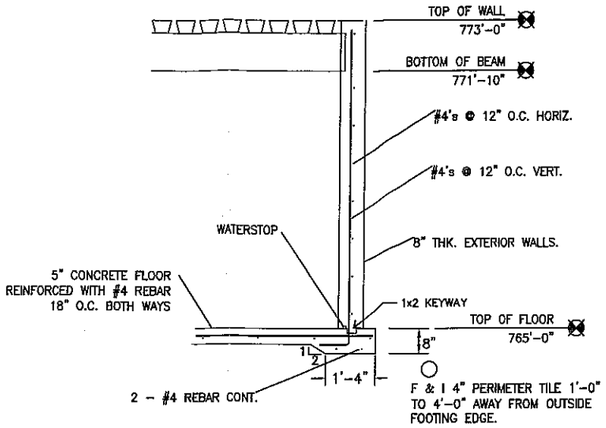
Plot Date & Time: 11 February 2015 9:51 AM



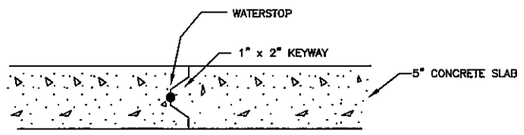
1/S103 X-SECTION INTERIOR WALL
SCALE: 1/4" = 1'-0"



2/S103 X-SECTION PIT COLUMN
SCALE: 1/4" = 1'-0"



3/S103 X-SECTION EXTERIOR WALL
SCALE: 1/4" = 1'-0"



CONSTRUCTION JOINT DETAIL
SCALE: NOT TO SCALE

THE JUNCTION OF TWO SUCCESIVE
PLACEMENTS OF CONCRETE

General Notes:

1: ASSUMED SOIL BEARING CAPACITY: 2500 p.c.f.
ASSUMED EQUIVALENT FLUID PRESSURE: 100 p.c.f.

2: CONCRETE, 28 DAY STRENGTH:
ALL WALLS & COLUMNS: 4000 PSI.
ALL FLOOR SLABS & FOOTINGS: 4000 PSI.

3: RE-BAR: GRADE 60.

4: ANCHOR BOLTS @ 4' O.C.: A307 (MILD STEEL).

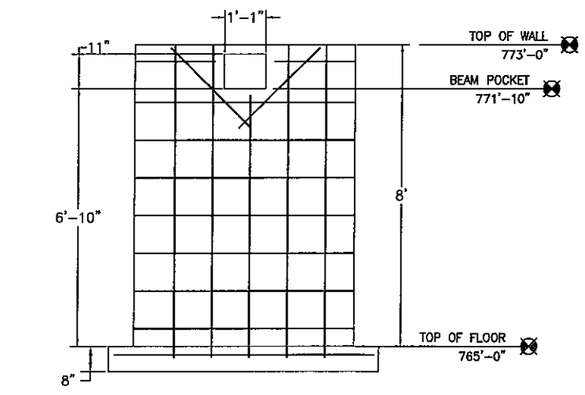
5: PUMPOUT LOCATIONS MUST BE VERIFIED BY OWNER REPRESENTATIVE

6: PUMPOUT FLOORS MUST BE POURED INTEGRAL
WITH MAIN FLOOR

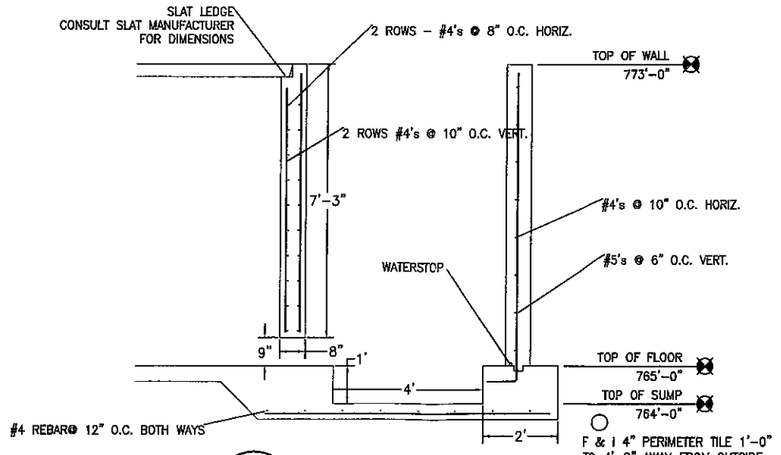
7: EXPANSION JOINTS IN WALLS SHALL BE BEHIND DIVIDER WALLS
1/2 OF HORIZ. STEEL SHALL GO THROUGH JOINT
JOINT SHALL HAVE WATERSTOP AND SEALED AT OUTSIDE JOINTS

8: AFTER COMPLETION, FLOORS & WALLS WILL BE
INSPECTED FOR ANY CRACKS. ALL CRACKS OVER 0.03" WILL BE
ROUTED AND SEALED WITH SIKA CJ OR EQUIVALENT.

9: DESIGNED ACCORDING TO ACI 318 STANDARDS



4/S103 DETAIL - BEAM POCKET
SCALE: 1/4" = 1'-0"



5/S103 X-SECTION PUMPOUT PIT
SCALE: 1/4" = 1'-0"

REV	REVISION DESCRIPTION	DWN	APP	REV DATE

SEAL

SUB CONSULTANT

PRIME CONSULTANT
WENCK ASSOCIATES
Responsive partner. Exceptional outcomes.
1012 5th Ave., Suite 1B
Windom, MN 56101
(507) 831-2703
(507) 831-5271

PROJECT TITLE
2015 Site Expansion

Grandview Farms, Inc.
12090 West 240th Street

Eldridge, IA 52748

SHEET TITLE
Gestation Barn #6 (West End Exp.)
41' x 180'-8" x 8' Deep
Structural Details

DWN BY	CHK'D	APP'D	DWG DATE	2/9/2015
TNT	DJJ	DJJ	SCALE	1/4" = 1'-0"

PROJECT NO. 1773-04
SHEET NO. S-303
REV NO.

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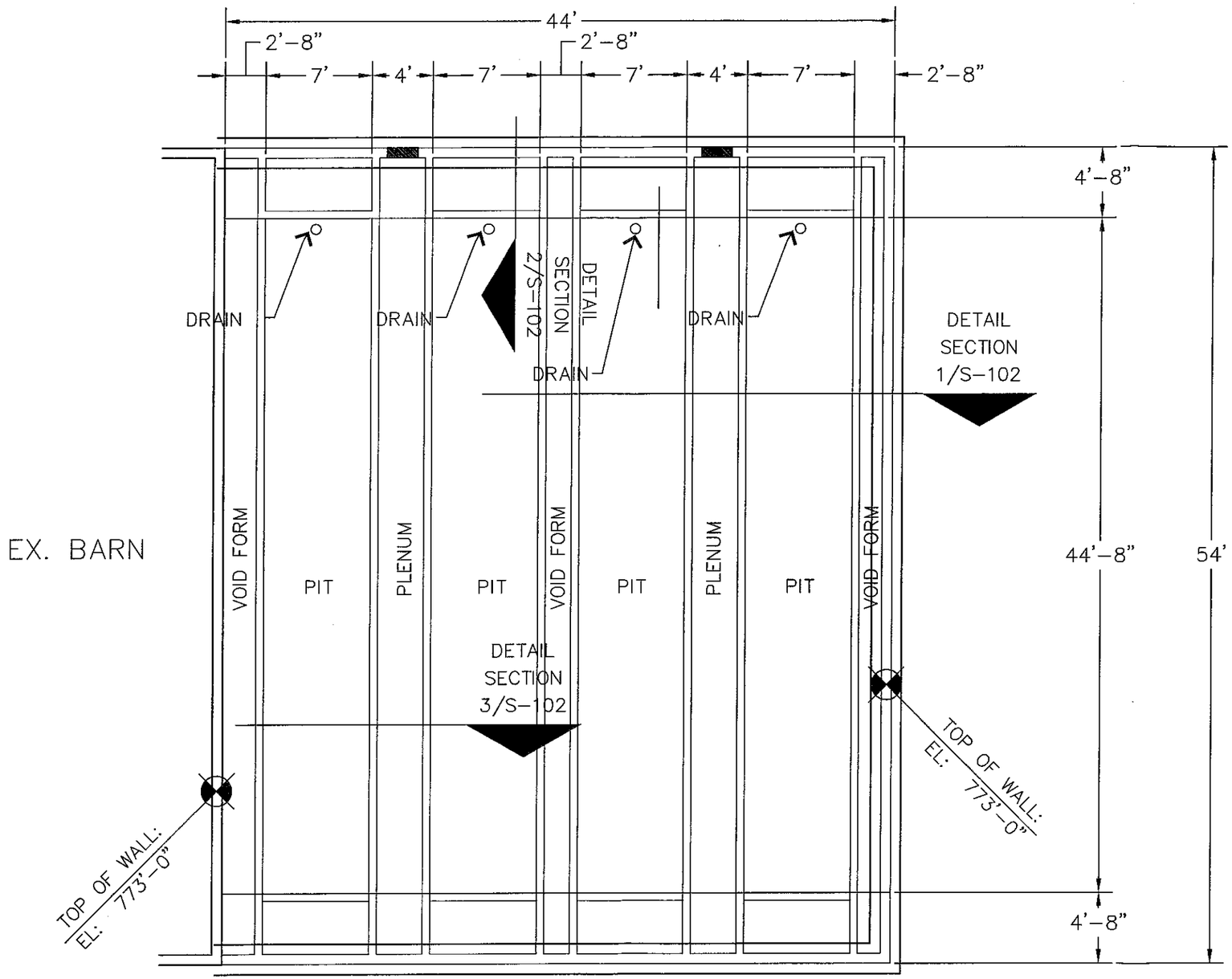
Plot Date & Time: 12 February 2015 11:28 AM



EX. BARN

Footing/Foundation & Pit Plan

SCALE: 1/8" = 1'-0"

REV	REVISION DESCRIPTION	DWN	APP	REV DATE

SEAL

SUB CONSULTANT

PRIME CONSULTANT

WENCK ASSOCIATES

Responsive partner. Exceptional outcomes.

1012 5th Ave., Suite 1B
Windom, MN 56101

(507) 831-2703
(507) 831-5271

PROJECT TITLE
2015 Site Expansion

Grandview Farms, Inc.
12090 West 240th Street

Eldridge, IA 52748

SHEET TITLE
Farrowing Barn #5 (East End Exp.)
54' x 44' x 2' Deep
Footing/Foundation Plan

DWN BY	CHK'D	APP'D	DWG DATE
TNT	DJJ	DJJ	2/10/2015

SCALE 1/8" = 1'-0"

PROJECT NO.	SHEET NO.	REV NO.
1773-04	S-401	

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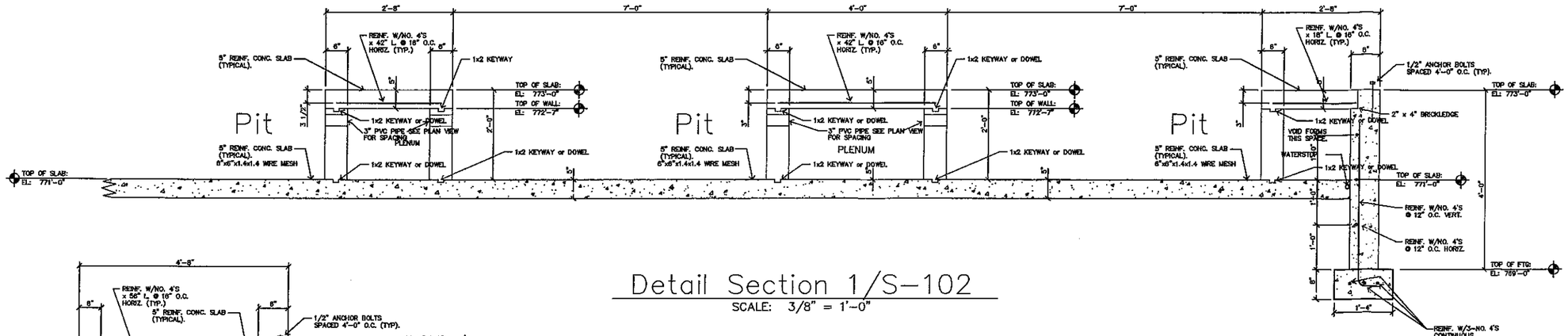
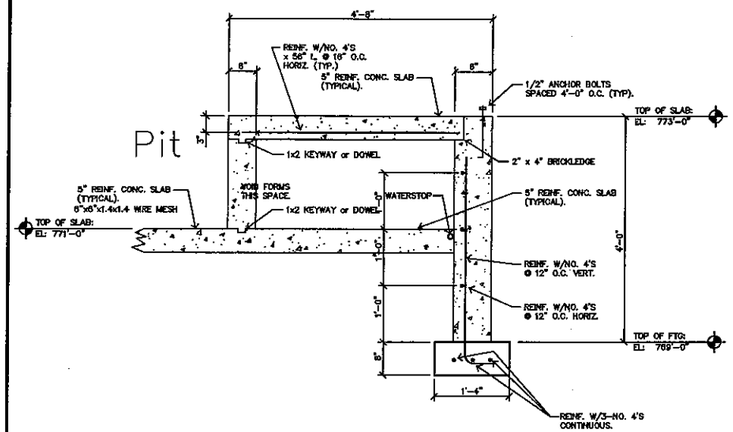
Plot Date & Time: 12, February 2015@8:26 AM



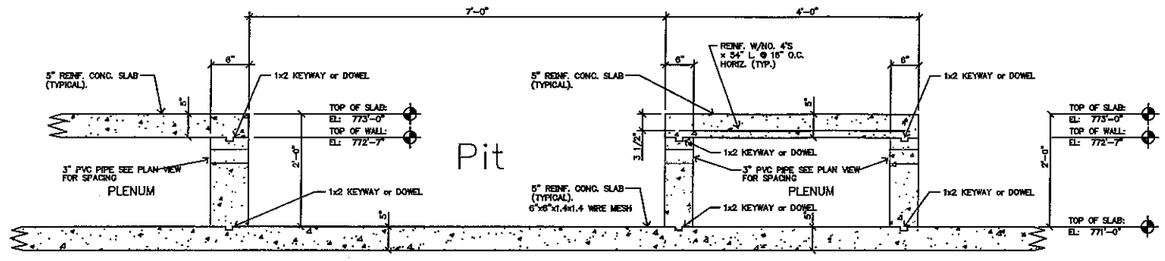
Detail Section 1/S-102

SCALE: 3/8" = 1'-0"



Detail Sec. 2/S-102

SCALE: 3/8" = 1'-0"



Detail Section 3/S-102

SCALE: 3/8" = 1'-0"

General Notes:

1: ASSUMED SOIL BEARING CAPACITY: 2500 p.s.f.
ASSUMED EQUIVALENT FLUID PRESSURE: 100 p.c.f.

2: CONCRETE, 28 DAY STRENGTH:

ALL WALLS & COLUMNS: 4000 PSI.
ALL FLOOR SLABS & FOOTINGS: 4000 PSI.

3: NOTE: ALL FLOOR SLAB CONCRETE TO HAVE #4'S @ 18" O.C. BOTH WAYS
ALL JOINTS TO BE WATER TIGHT
SAW JOINTS SHALL BE WATERTIGHT WITH SIKA CJ EPOXY SEALANT OR EQUIVELANT
ALL 2' PITS CAN BE REINFORCED WITH 6x6x1.4x1.4 WIRE MESH

4: CURING – MOIST CURE FOR 7 DAYS OR SEAL WITH CURING COMPOUND.

5: RE-BAR: GRADE 60.

6: ANCHOR BOLTS @ 4' O.C.: A307 (MILD STEEL).

7: 8" OUTSIDE WALLS TO HAVE #4 @ 12" O.C. BOTH WAYS
6" INTERIOR WALLS TO HAVE #4 @ 18" O.C. BOTH WAYS

8: 28 DAYS AFTER COMPLETION FLOORS & WALLS WILL BE INSPECTED FOR ANY CRACKS. ALL CRACKS WILL BE ROUTED AND SEALED WITH SIKA CJ OR EQUIVALENT.

9: DESIGNED ACCORDING TO ACI 318 STANDARDS

REV	REVISION DESCRIPTION	DWN	APP	REV DATE

SEAL

SUB CONSULTANT

PRIME CONSULTANT
WENCK ASSOCIATES
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(507) 831-2703
(507) 831-5271

PROJECT TITLE
2015 Site Expansion

Grandview Farms, Inc.
12090 West 240th Street
Eldridge, IA 52748

SHEET TITLE
Farrowing Barn #5 (East End Exp.)
54' x 44' x 2' Deep
Structural Details

DWN BY	CHK'D	APP'D	DWG DATE
TNT	DJJ	DJJ	2/10/2015

SCALE 1/16" = 1'-0"

PROJECT NO. 1773-04
SHEET NO. S-402
REV NO.

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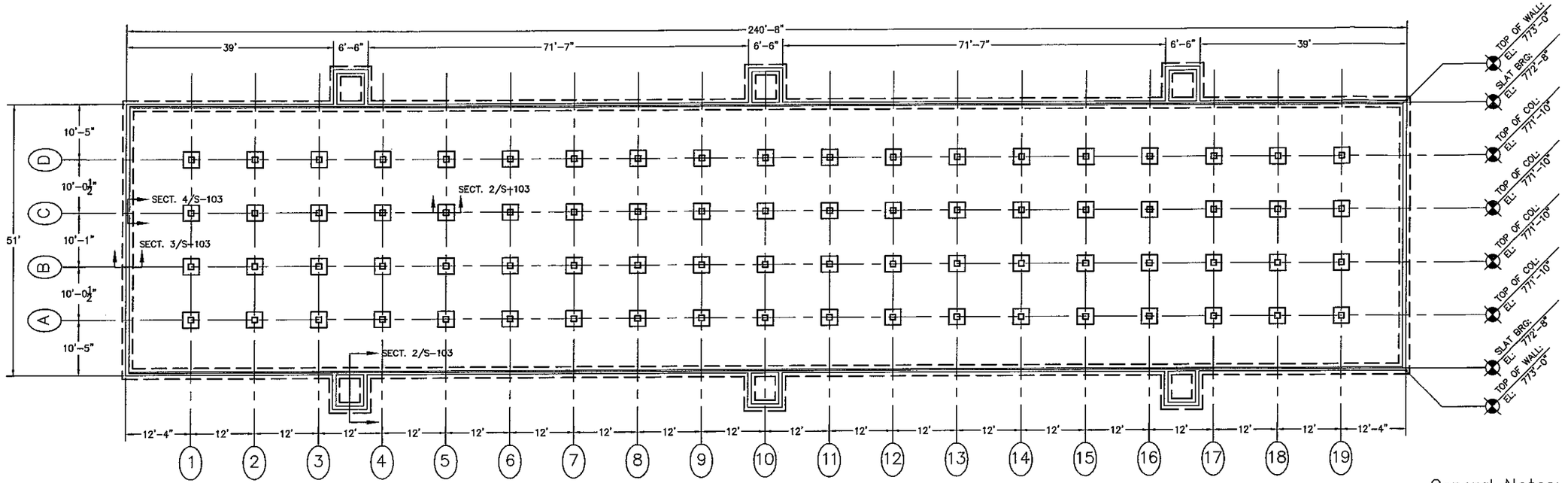
Plot Date & Time: 11 February 2015 11:39 AM



Footing/Foundation Plan

SCALE: 3/64" = 1'-0"

General Notes:

1: ASSUMED SOIL BEARING CAPACITY: 2500 p.c.f.
ASSUMED EQUIVALENT FLUID PRESSURE: 100 p.c.f.

2: CONCRETE, 28 DAY STRENGTH:
ALL WALLS & COLUMNS: 4000 PSI.
ALL FLOOR SLABS & FOOTINGS: 4000 PSI.

3: RE-BAR: GRADE 60.

4: ANCHOR BOLTS @ 4' O.C.: A307 (MILD STEEL).

5: PUMPOUT LOCATIONS MUST BE VERIFIED BY OWNER REPRESENTATIVE

6: PUMPOUT FLOORS MUST BE POURED INTEGRAL WITH MAIN FLOOR

7: EXPANSION JOINTS IN WALLS SHALL BE BEHIND DIVIDER WALLS
1/2 OF HORIZ. STEEL SHALL GO THROUGH JOINT
JOINT SHALL HAVE WATERSTOP AND SEALED AT OUTSIDE JOINTS

8: AFTER COMPLETION, FLOORS & WALLS WILL BE INSPECTED FOR ANY CRACKS. ALL CRACKS OVER 0.03" WILL BE ROUTED AND SEALED WITH SIKA CJ OR EQUIVALENT.

9: DESIGNED ACCORDING TO ACI 318 STANDARDS

REV	REVISION DESCRIPTION	DWN	APP	REV DATE

SEAL

SUB CONSULTANT

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WENCK ASSOCIATES
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(507) 831-5271

PROJECT TITLE
2015 Site Expansion

Grandview Farms, Inc.
12090 West 240th Street

Eldridge, IA 52748

SHEET TITLE
GDU Barn #17
51' x 240'-8" x 8' Deep
Footing/Foundation Plan

DWN BY	CHK'D	APP'D	DWG DATE
TNT	DJJ	DJJ	2/10/2015

SCALE 3/64" = 1'-0"

PROJECT NO.	SHEET NO.	REV NO.
1773-04	S-501	

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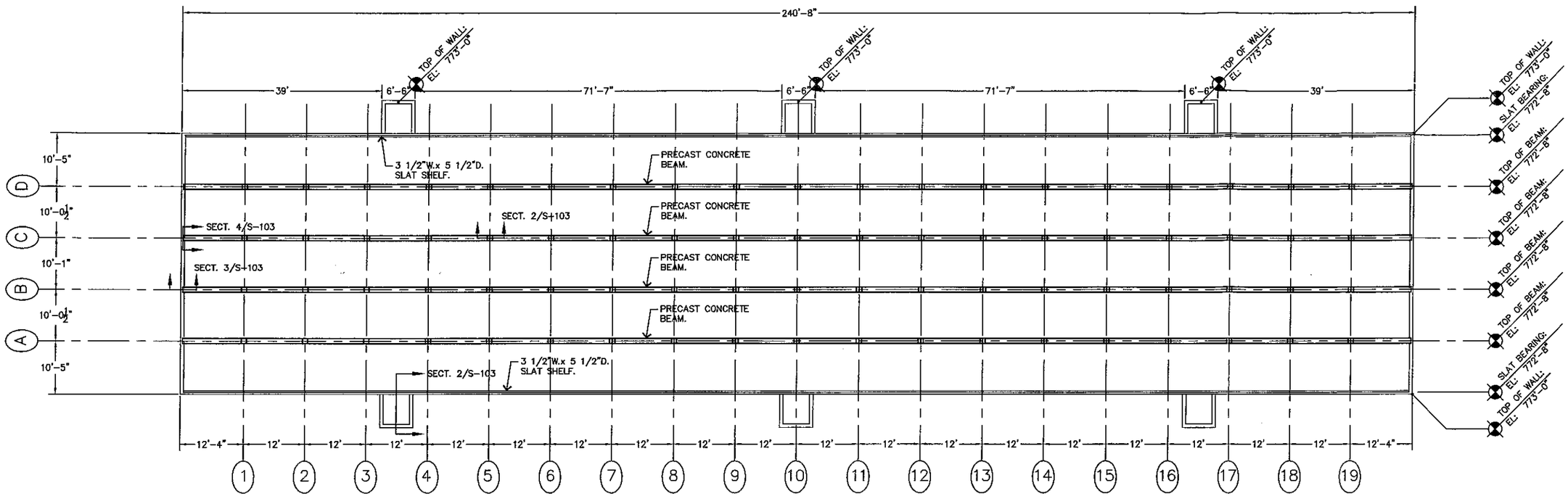
Plot Date & Time: 11 February 2015 11:39 AM



Concrete Framing Plan

SCALE: 1/16" = 1'-0"

General Notes:

1: ASSUMED SOIL BEARING CAPACITY: 2500 p.c.f.
ASSUMED EQUIVALENT FLUID PRESSURE: 100 p.c.f.

2: CONCRETE, 28 DAY STRENGTH:
ALL WALLS & COLUMNS: 4000 PSI.
ALL FLOOR SLABS & FOOTINGS: 4000 PSI.

3: RE-BAR: GRADE 60.

4: ANCHOR BOLTS @ 4' O.C.: A307 (MILD STEEL).

5: PUMPOUT LOCATIONS MUST BE VERIFIED BY OWNER REPRESENTATIVE

6: PUMPOUT FLOORS MUST BE POURED INTEGRAL WITH MAIN FLOOR

7: EXPANSION JOINTS IN WALLS SHALL BE BEHIND DIVIDER WALLS
1/2 OF HORIZ. STEEL SHALL GO THROUGH JOINT
JOINT SHALL HAVE WATERSTOP AND SEALED AT OUTSIDE JOINTS

8: AFTER COMPLETION, FLOORS & WALLS WILL BE INSPECTED FOR ANY CRACKS. ALL CRACKS OVER 0.03" WILL BE ROUTED AND SEALED WITH SIKA CJ OR EQUIVALENT.

9: DESIGNED ACCORDING TO ACI 318 STANDARDS

REV	REVISION DESCRIPTION	DWN	APP	REV DATE

SEAL

SUB CONSULTANT

PRIME CONSULTANT

WENCK ASSOCIATES

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1012 5th Ave., Suite 1B
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(507) 831-2703
(507) 831-5271

PROJECT TITLE
2015 Site Expansion

Grandview Farms, Inc.
12090 West 240th Street

Eldridge, IA 52748

SHEET TITLE
GDU Barn #17
51' x 240'-8" x 8' Deep
Concrete Framing Plan

DWN BY	CHK'D	APP'D	DWG DATE
TNT	DJJ	DJJ	2/10/2015

SCALE 3/64" = 1'-0"

PROJECT NO.	SHEET NO.	REV NO.
1773-04	S-502	

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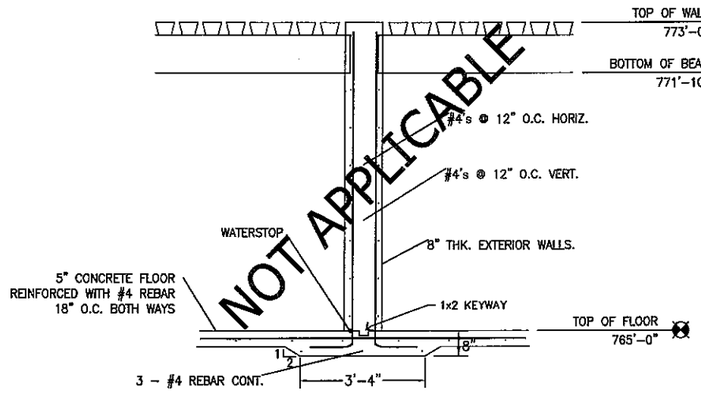
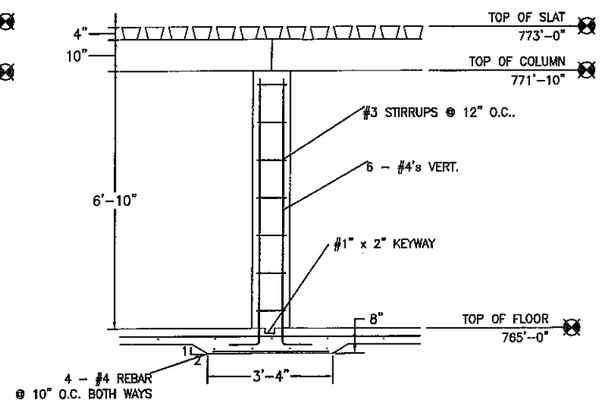
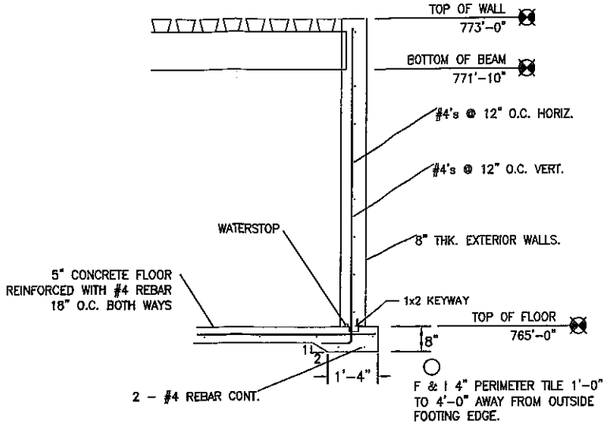
Plot Date & Time: 11 February 2015 11:39 AM



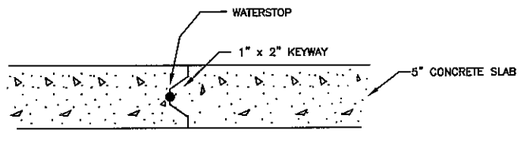
1/S103 X-SECTION INTERIOR WALL
SCALE: 1/4" = 1'-0"



2/S103 X-SECTION PIT COLUMN
SCALE: 1/4" = 1'-0"



3/S103 X-SECTION EXTERIOR WALL
SCALE: 1/4" = 1'-0"



CONSTRUCTION JOINT DETAIL
SCALE: NOT TO SCALE

THE JUNCTION OF TWO SUCCESIVE PLACEMENTS OF CONCRETE

General Notes:

1: ASSUMED SOIL BEARING CAPACITY: 2500 p.c.f.
ASSUMED EQUIVALENT FLUID PRESSURE: 100 p.c.f.

2: CONCRETE, 28 DAY STRENGTH:
ALL WALLS & COLUMNS: 4000 PSI.
ALL FLOOR SLABS & FOOTINGS: 4000 PSI.

3: RE-BAR: GRADE 60.

4: ANCHOR BOLTS @ 4' O.C.: A307 (MILD STEEL).

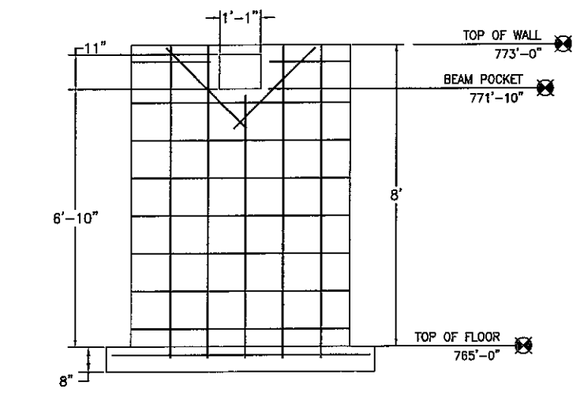
5: PUMPOUT LOCATIONS MUST BE VERIFIED BY OWNER REPRESENTATIVE

6: PUMPOUT FLOORS MUST BE POURED INTEGRAL WITH MAIN FLOOR

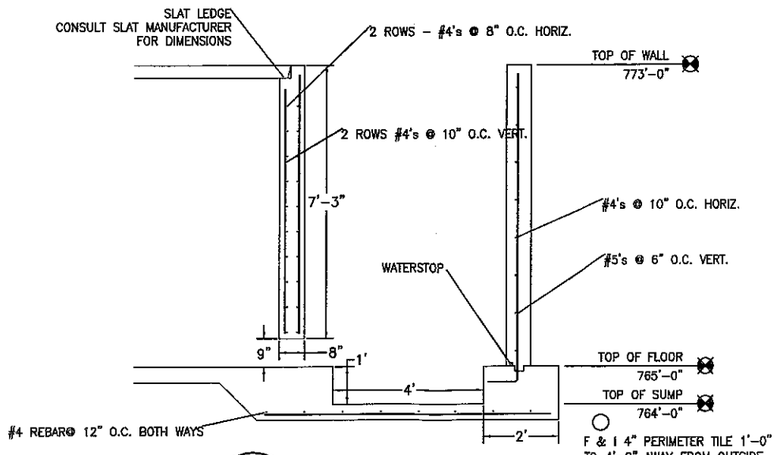
7: EXPANSION JOINTS IN WALLS SHALL BE BEHIND DIVIDER WALLS 1/2 OF HORIZ. STEEL SHALL GO THROUGH JOINT
JOINT SHALL HAVE WATERSTOP AND SEALED AT OUTSIDE JOINTS

8: AFTER COMPLETION, FLOORS & WALLS WILL BE INSPECTED FOR ANY CRACKS. ALL CRACKS OVER 0.03" WILL BE ROUTED AND SEALED WITH SIKA CJ OR EQUIVALENT.

9: DESIGNED ACCORDING TO ACI 318 STANDARDS



4/S103 DETAIL - BEAM POCKET
SCALE: 1/4" = 1'-0"



5/S103 X-SECTION PUMPOUT PIT
SCALE: 1/4" = 1'-0"

REV	REVISION DESCRIPTION	DWN	APP	REV DATE

SEAL

SUB CONSULTANT

PRIME CONSULTANT
WENCK ASSOCIATES
Responsive partner. Exceptional outcomes.
1012 5th Ave., Suite 1B, Windom, MN 56101
(507) 831-2703
(507) 831-5271

PROJECT TITLE
2015 Site Expansion
Grandview Farms, Inc.
12090 West 240th Street
Eldridge, IA 52748

SHEET TITLE
GDU Barn #17
51' x 240'-8" x 8' Deep
Structural Details

DWN BY	CHK'D	APP'D	DWG DATE
TNT	DJJ	DJJ	2/10/2015

SCALE 1/4" = 1'-0"

PROJECT NO.	SHEET NO.	REV NO.
1773-04	S-503	

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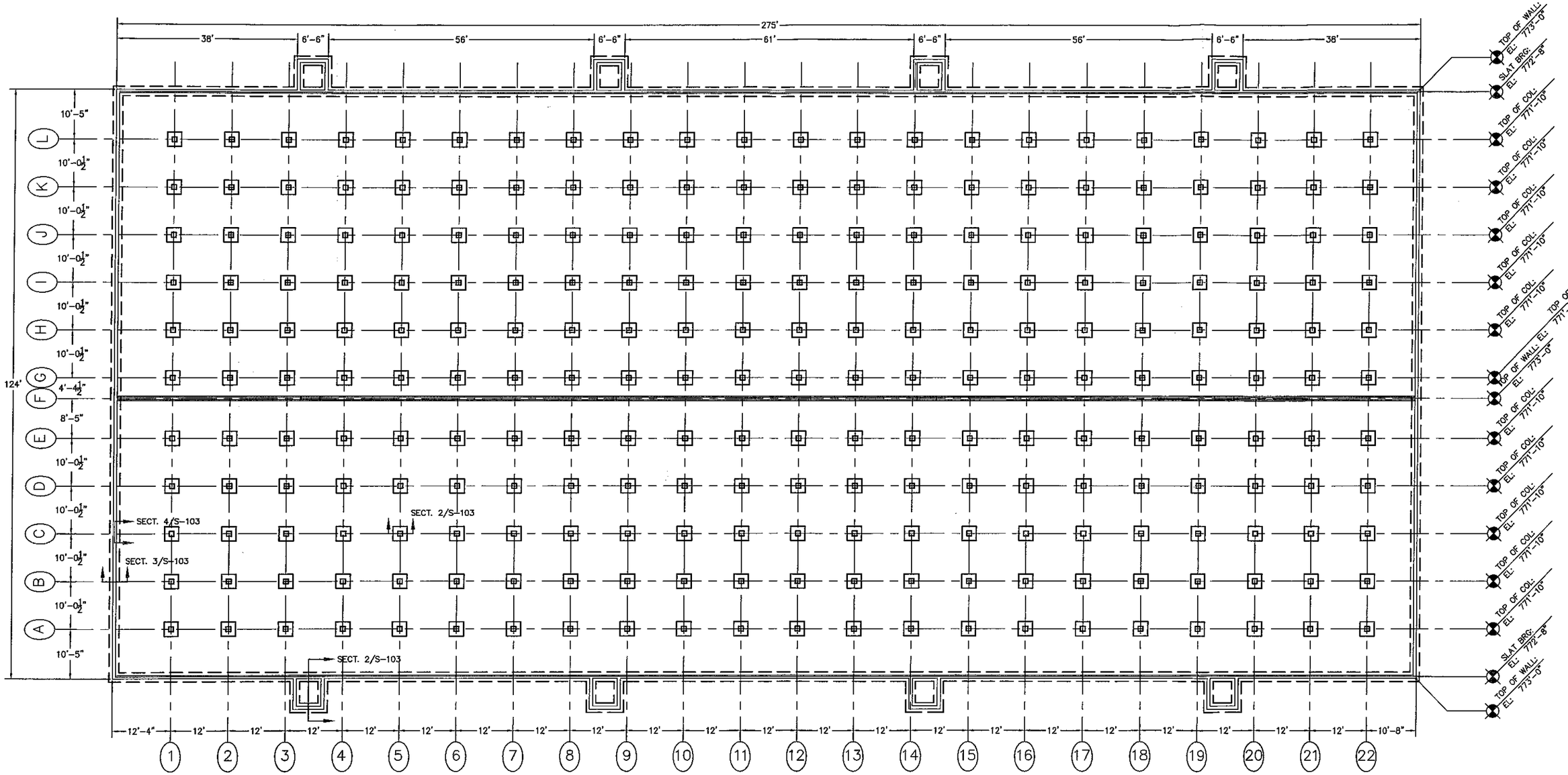
Plot Date & Time: 12 February 2015@4:44 AM



Footing/Foundation Plan

SCALE: 3/64" = 1'-0"

REV	REVISION DESCRIPTION	DWN	APP	REV DATE

SEAL

SUB CONSULTANT

PRIME CONSULTANT

WENCK ASSOCIATES

Responsive partner. Exceptional outcomes.

1012 5th Ave., Suite 1B
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(507) 831-2703
(507) 831-5271

PROJECT TITLE

2015 Site Expansion

Grandview Farms, Inc.
12090 West 240th Street

Eldridge, IA 52748

SHEET TITLE

Farrowing Barn #12A
124' x 275' x 8' Deep
Footing/Foundation Plan

DWN BY	CHK'D	APP'D	DWG DATE
TNT	DJJ	DJJ	2/10/2015

SCALE 3/64" = 1'-0"

PROJECT NO.	SHEET NO.	REV NO.
1773-04	S-601	

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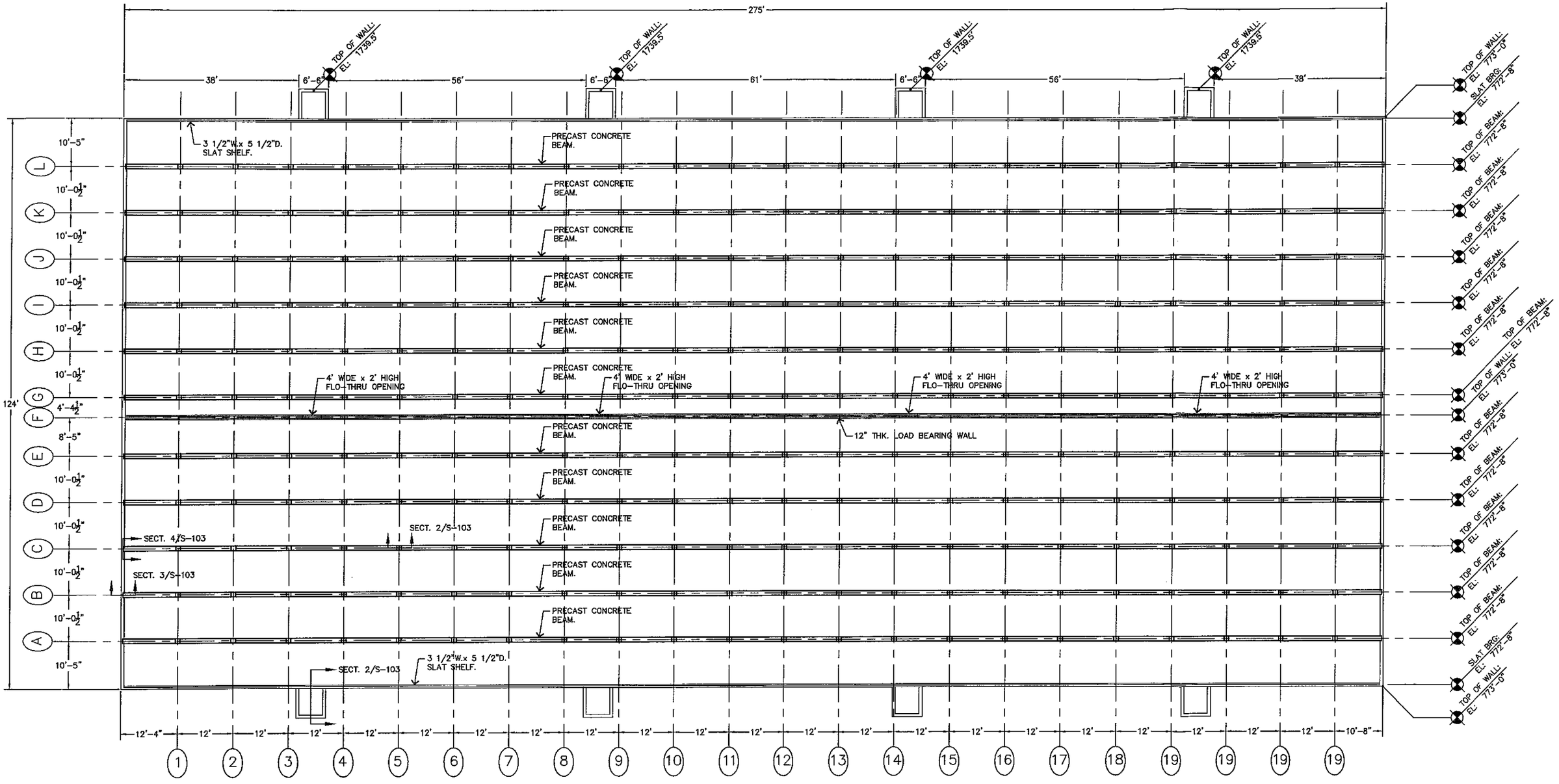

Concrete Framing Plan

SCALE: 1/16" = 1'-0"

REV	REVISION DESCRIPTION	DWN	APP	REV DATE

SEAL

SUB CONSULTANT

PRIME CONSULTANT

WENCK ASSOCIATES

Responsive partner. Exceptional outcomes.

1012 5th Ave., Suite 1B
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(507) 831-2703
(507) 831-5271

PROJECT TITLE

2015 Site Expansion

Grandview Farms, Inc.
12090 West 240th Street

Eldridge, IA 52748

SHEET TITLE

Farrowing Barn #12A
124' x 275'" x 8' Deep
Concrete Framing Plan

DWN BY	CHK'D	APP'D	DWG DATE
TNT	DJJ	DJJ	2/10/2015

SCALE 3/64" = 1'-0"

PROJECT NO.	SHEET NO.	REV NO.
1773-04	S-602	

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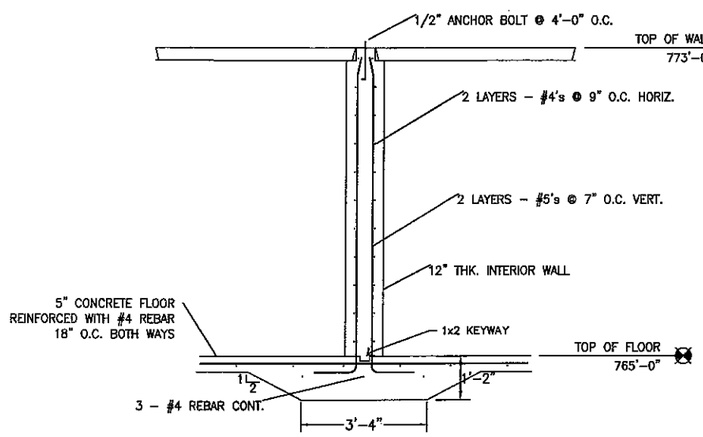
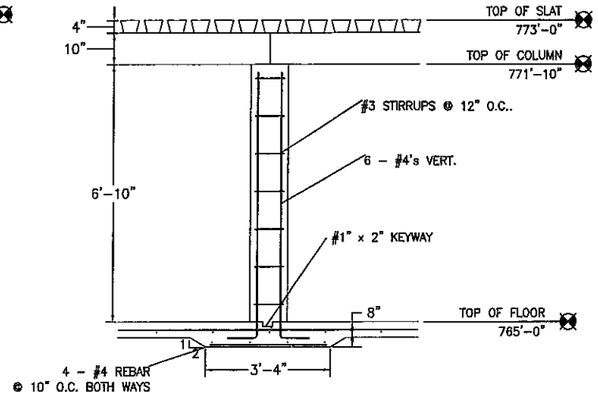
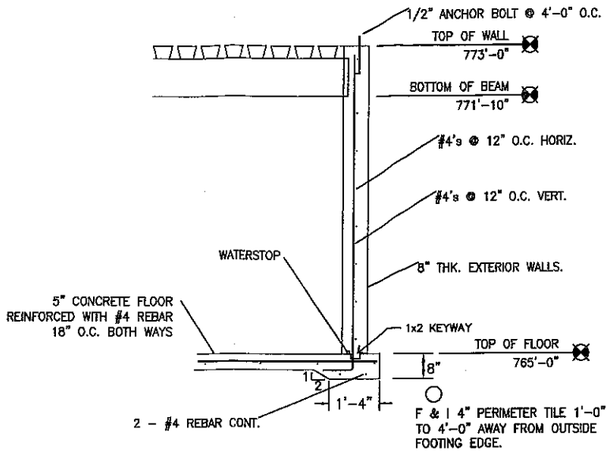


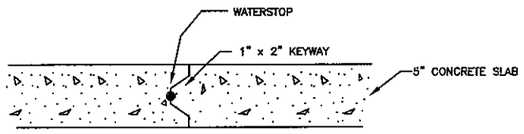
1/S103 X-SECTION INTERIOR WALL
SCALE: 1/4" = 1'-0"



2/S103 X-SECTION PIT COLUMN
SCALE: 1/4" = 1'-0"



3/S103 X-SECTION EXTERIOR WALL
SCALE: 1/4" = 1'-0"



CONSTRUCTION JOINT DETAIL
SCALE: NOT TO SCALE

THE JUNCTION OF TWO SUCCESIVE
PLACEMENTS OF CONCRETE

General Notes:

1: ASSUMED SOIL BEARING CAPACITY: 2500 p.c.f.
ASSUMED EQUIVALENT FLUID PRESSURE: 100 p.c.f.

2: CONCRETE, 28 DAY STRENGTH:
ALL WALLS & COLUMNS: 4000 PSI.
ALL FLOOR SLABS & FOOTINGS: 4000 PSI.

3: RE-BAR: GRADE 60.

4: ANCHOR BOLTS @ 4' O.C.: A307 (MILD STEEL).

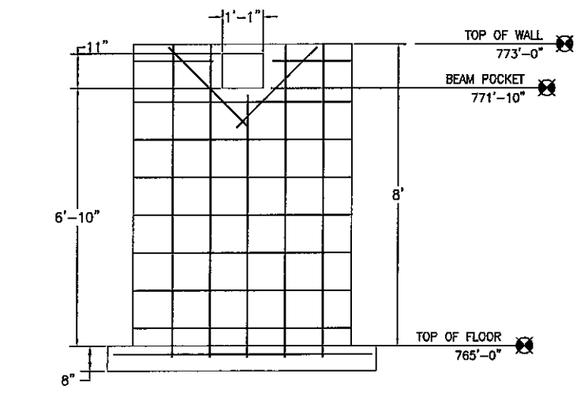
5: PUMPOUT LOCATIONS MUST BE VERIFIED BY OWNER REPRESENTATIVE

6: PUMPOUT FLOORS MUST BE POURED INTEGRAL
WITH MAIN FLOOR

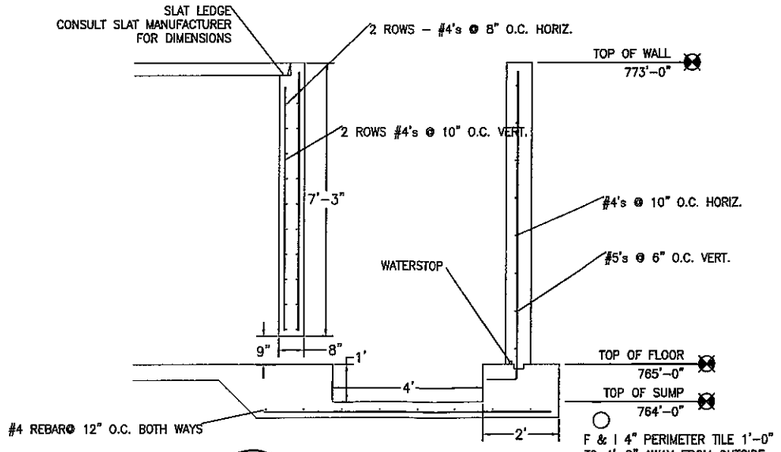
7: EXPANSION JOINTS IN WALLS SHALL BE BEHIND DIVIDER WALLS
1/2 OF HORIZ. STEEL SHALL GO THROUGH JOINT
JOINT SHALL HAVE WATERSTOP AND SEALED AT OUTSIDE JOINTS

8: AFTER COMPLETION, FLOORS & WALLS WILL BE
INSPECTED FOR ANY CRACKS. ALL CRACKS OVER 0.03" WILL BE
ROUTED AND SEALED WITH SIKA CJ OR EQUIVALENT.

9: DESIGNED ACCORDING TO ACI 318 STANDARDS



4/S103 DETAIL - BEAM POCKET
SCALE: 1/4" = 1'-0"



5/S103 X-SECTION PUMPOUT PIT
SCALE: 1/4" = 1'-0"

REV	REVISION DESCRIPTION	DWN	APP	REV DATE

SEAL

SUB CONSULTANT

PRIME CONSULTANT
WENCK ASSOCIATES
Responsive partner. Exceptional outcomes.
1012 5th Ave., Suite 1B, Windom, MN 56101
(507) 831-2703
(507) 831-5271

PROJECT TITLE
2015 Site Expansion

Grandview Farms, Inc.
12090 West 240th Street

Eldridge, IA 52748

SHEET TITLE
Farrowing Barn #12A
124' x 275' x 8' Deep
Structural Details

DWN BY	CHK'D	APP'D	DWG DATE
TNT	DJJ	DJJ	2/10/2015

SCALE 1/4" = 1'-0"

PROJECT NO.	SHEET NO.	REV NO.
1773-04	S-603	

Plot Date & Time: 12 February 2015@4:44 AM

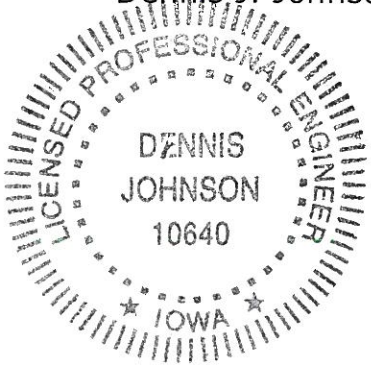
R:\Drafting\1773 Grandview\04 2015 Expansion\240\STR\124x275x8 Farrow Barn\124x275x8 Farrow.dwg

PROJECT MANUAL

I hereby certify that this engineering document was prepared by me or under my direct personal supervision and that I am a duly licensed Professional Engineer under the Laws of the State of Iowa

Date: 2/12/15

Dennis J. Johnson, P.E. Reg.No.10640



Wenck File #1773-04

Prepared for:

GRANDVIEW FARMS, INC.
12090 WEST 240TH STREET
ELDRIDGE, IA 52748

Prepared by:

WENCK ASSOCIATES, INC.
1012 5th Avenue
P.O. Box 453
Windom, Minnesota 56101
(507) 831-2703

GRANDVIEW FARMS
2015 EXPANSION

SHERIDAN TOWNSHIP

SCOTT COUNTY

SW ¼ of SW ¼
SECTION 7
T-79-N R-03-E

FEBRUARY 2015

WENCK
ASSOCIATES

Responsive partner.
Exceptional outcomes.

GRANDVIEW FARMS – 2015 EXPANSION

SCOTT COUNTY, SHERIDAN TOWNSHIP, IOWA

SECTION 7 – SW ¼ of SW 1/4, T79N, R03E

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GRANDVIEW FARMS – 2015 EXPANSION

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Please staple check here

Iowa Department of Natural Resources

Construction Permit Application Form

Confinement Feeding Operations

INSTRUCTIONS:

Prior to constructing, installing, modifying or expanding a confinement feeding operation structure[1], answer questions 1-8 on Item 3, Section A (page 2), to determine if a construction permit is required. To calculate the animal unit capacity (AUC) of the operation, complete Table 1 (page 4.) If a construction permit is required, complete the rest of the form, have the owner(s) sign it on pages 5 and 6. Mail to the DNR (see address on page 5) this application form, documents and fees requested in Checklist No. 1 or 2 (pages 10-16). See item 5 (page 5), to determine which checklist to use.

If a construction permit is not needed, some pre-construction requirements may still apply prior to the construction of a formed manure storage structure[2]. See page 5 for additional DNR contact information.

THIS APPLICATION IS FOR:

1. ☐ **A new confinement feeding operation**
2. ☒ **An existing confinement feeding operation** *(answer all of the following questions):*
   a. Facility ID No. (5 digit number): 59556
   b. Date when the operation was first constructed: 1979
   c. Date when the last construction, expansion or modification was completed: 2011.
   (Not needed if the confinement operation has previously received a construction permit from DNR.)
   d. Is this also an ownership change? ☐ Yes. ☒ No.

ITEM 1 – LOCATION AND CONTACT INFORMATION (*See page 17 for instructions and an example*):

A) Name of operation: Grandview Farms - Sow site

Location:	SW	SW	07	79N 3E	Sheridan	Scott
	(1/4 1/4)	(1/4)	(Section)	(Tier & Range)	(Name of Township)	(County)
	SE	SE	12	79N, 2E	Hickory Grove	Scott

B) Owner information:

Name: Grandview Farms, Inc. Title: Owner

Address: 12090 West 240th Street, Eldridge, IA 52748

Telephone: 563-285-4006 Fax: 563-285-4014 Email: tadittmer@aol.com

C) Person to contact with questions about this application (if different than owner):

Name: Thomas Dittmer Title: Agent

Address: 12090 West 240th Street, Eldridge, IA 52748

Telephone: 563-285-4006 Fax: 563-285-4014 Email: tadittmer@aol.com

☒ Enclose aerial photo or engineering drawing showing the proposed location of the confinement feeding operation structure[1] and all applicable separation distances, as requested in Attachment 1 (pages 11 or 14). See example of aerial photo on pages 18 to 19, at the end of this form.

☐ I manage or am the majority owner of another confinement feeding operation located within 2,500 feet of the proposed site. Please contact the DNR-AFO Program staff at (515) 281-8941 to verify site adjacency requirements.

[1] Confinement feeding operation structure = animal feeding operation structure (confinement building, manure storage structure or egg washwater storage structure) that is part of a confinement feeding operation. Manure storage structures include formed and unformed manure storage structures.

[2] Formed manure storage structure = covered or uncovered concrete or steel tanks, and concrete pits below the building.

ITEM 2 – SITING INFORMATION:

A) Karst Determination: Go to www.IowaDNR.gov select the link to 'Mapping (GIS Interactive)', then check the AFO Siting Atlas. If the site is not located in karst or potential karst, print and enclose the map with the name and location of the site clearly marked. If the site is in karst or potential karst, if you cannot access the map, or if you have questions about this issue, contact a DNR geologist at (515) 242-6848. Check one of the following:

☒ The site is not in karst or potential karst. Include documentation requested in checklist 1 or 2 (pages 10 or 13).

☐ The DNR geologist has verified that the site is in karst. The upgraded concrete standards of 567 IAC 65.15(14)"c" must be used.

B) Alluvial Soils Determination: Go to www.IowaDNR.gov, select the link to 'Mapping (GIS Interactive)', then check the AFO Siting Atlas. If the site is not in potential alluvial soils, print and enclose the map with the name and location of the site clearly marked. If the site is in potential alluvial soils, if you cannot access the map, or if you have questions about this issue, contact a DNR geologist at (515) 242-6848. Check one of the following:

☒ The site is not in alluvial soils. Include documentation requested in checklist 1 or 2 (pages 10 or 13).

☐ The DNR geologist has verified that the site is in alluvial soils. Check one of the following:

- ☐ Not in 100-year floodplain or does not require a floodplain permit. Include correspondence from the DNR.
- ☐ Requires floodplain permit. Include Floodplain Permit.

ITEM 3 – OPERATION INFORMATION:

A) A construction permit is required prior to any of the following:

1. ☐ Constructing or modifying any unformed manure storage structure[3], or constructing or modifying a confinement building that uses an unformed manure storage structure[3].
2. ☒ Constructing, installing or modifying a confinement building or a formed manure storage structure[2] at a confinement feeding operation if, after construction, installation or expansion, the AUC of the operation is 1,000 animal units (AU) or more. This also applies to confinement feeding operations that store manure exclusively in a dry form.
3. ☐ Initiating a change that would result in an increase in the volume of manure or a modification in the manner in which manure is stored in any unformed manure storage structure[3], even if no construction or physical alteration is necessary. Increases in the volume of manure due to an increase in animal capacity, animal weight capacity or AUC up to the limits specified in a previously issued construction permit do not require a new construction permit.
4. ☐ Initiating a change, even if no construction or physical alteration is necessary, that would result in an increase in the volume of manure or a modification in the manner in which manure is stored in a formed manure storage structure[2] if, after the change, the AUC of the operation is 1,000 AU or more. Increases in the volume of manure due to an increase in animal capacity, animal weight capacity or AUC up to the limits specified in a previously issued construction permit do not require a new construction permit.
5. ☐ Constructing or modifying any egg washwater storage structure or a confinement building at a confinement feeding operation that includes an egg washwater storage structure.
6. ☐ Initiating a change that would result in an increase in the volume of egg washwater or a modification in the manner in which egg washwater is stored, even if no construction or physical alteration is necessary. Increases in the volume of egg washwater due to an increase in animal capacity, animal weight capacity or AUC up to the limits specified in a previously issued construction permit do not require a new construction permit.
7. ☐ Repopulating a confinement feeding operation if it was closed for 24 months or more and if any of the following apply:
   1. ☐ The confinement feeding operation uses an unformed manure storage structure[3] or egg washwater storage structure;
   2. ☐ The confinement feeding operation includes only confinement buildings and formed manure storage structures[2] and has an AUC of 1,000 AU or more.
8. ☐ Installing a permanent manure transfer piping system, unless the department determines that a construction permit is not required.

[3] Unformed manure storage structure = covered or uncovered anaerobic lagoon, earthen manure storage basin, aerobic earthen structure.

B) In your own words, describe in detail, the proposed construction, expansion, installation, modification or repair being proposed in this project. Attach additional pages if necessary:

Remove and replace existing Barn #4 with 61'x120' barn. Barn #5 44'x 54' expansion on east end.

Barn #6 remove west 1/2 and replace with 41' x 181 expansion and a 44' x 121' expansion on east end.

Barn #17 will be a new barn. Barn #12A which will be a 124' x 275' farrowing barn will be a new barn.

The four barns that are barns #12 will be converted from finishing to gestation barns.

C) Master Matrix *(must check one)***.** If any of boxes 1 to 3 are checked, the operation is required to be evaluated with the master matrix if the county, where the confinement feeding operation structure[1] is or would be located, has adopted a 'Construction Evaluation Resolution' (CER). Select the one that best describes your confinement feeding operation:

1. ☐ A new confinement feeding operation proposed in a county that has adopted a CER.
2. ☐ An existing operation constructed on or after April 1, 2002, in a county that has adopted a CER.
3. ☒ An existing operation constructed prior to April 1, 2002, with a current or proposed AUC of 1,667 AU or more, in a county that has adopted a CER.
4. ☐ None of the above. Therefore, the master matrix evaluation is not required.

D) Qualified Operation *(must check one)***.** If any of boxes 1 to 4 are checked, the operation is also a 'qualified operation'. A qualified operation is required to use a manure storage structure that employs bacterial action which is maintained by the utilization of air or oxygen, and which shall include aeration equipment. However, this requirement does not apply if box 5 is checked. Select the one that best describes your confinement feeding operation:

1. ☐ A swine farrowing and gestating operation with an AUC of 2,500 AU or more.
2. ☐ A swine farrow-to-finish operation with an AUC of 5,400 AU or more.
3. ☐ A cattle confinement feeding operation (including dairies) with an AUC of 8,500 AU or more.
4. ☐ Other confinement feeding operations with an AUC of 5,333 AU or more.
5. ☒ This is not a qualified operation because:
   a. ☐ It is below the limits shown on boxes 1 to 4.
   b. ☒ It includes a confinement feeding operation structure[1] constructed prior to May 31, 1995.
   c. ☐ It handles manure exclusively on a dry form.

ITEM 4 – ANIMAL UNIT CAPACITY (AUC) and, if applicable, ANIMAL WEIGHT CAPACITY (AWC):

A) Calculating AUC – Required for all operations

For each animal species, multiply the maximum number of animals that you would ever confine at one time by the appropriate factor, then add all AU together on Table 1 (page 4). Use the maximum market weight for the appropriate animal species to select the AU factor.

You must complete all applicable columns in Table 1. Use column a) to calculate the existing AUC, before permit for existing operations only. Use column b) to calculate the 'Total proposed AUC' (after a permit is issued) including new operations. The number obtained in column b) is the AUC of the operation and must be used to determine permit requirements. Use column c) to calculate the 'New AU' to be added to an existing operation. To calculate the indemnity fee (see page 7), also use column c), however, if the "Existing AUC" (column a) is 500 AU or less, enter the "Total proposed AUC" (column b) in the "New AU" (column c).

In calculating the AUC of a confinement feeding operation, you must include the AUC of all confinement buildings which are part of the confinement feeding operation, unless a confinement building has been abandoned. A confinement feeding operation structure[1] is abandoned if the confinement feeding operation structure[1] has been razed, removed from the site of a confinement feeding operation, filled in with earth, or converted to uses other than a confinement feeding operation structure[1] so that it cannot be used as a confinement feeding operation structure[1] without significant reconstruction. Therefore, in Table 1, enter the animal unit capacity of all the confinement buildings, including those that are from an "adjacent" operation located within 2,500 feet. For more information, contact the AFO Program at (515) 281-8941.

Table 1. Animal Unit Capacity (AUC): (No. HEAD) x (FACTOR) = AUC

Animal Species	a) Existing AUC (Before permit)			b) Total Proposed AUC (After permit)		
	(No. Head)	x (Factor)	= AUC	(No. Head)	x (Factor)	= AUC
Slaughter or feeder cattle		1.0			1.0	
Immature dairy cattle		1.0			1.0	
Mature dairy cattle		1.4			1.4	
Gestating sows	4766	0.4	1906	7467	0.4	2987
Farrowing sows & litter	1178	0.4	471	1638	0.4	655
Boars	10	0.4	4	16	0.4	6
Gilts	2360	0.4	944	3910	0.4	1564
Finished (Market) hogs	4800	0.4	1920	0	0.4	0
Nursery pigs 15 lbs to 55 lbs	320	0.1	32	400	0.1	40
Sheep and lambs		0.1			0.1	
Horses		2.0			2.0	
Turkeys 7lbs or more		0.018			0.018	
Turkeys less than 7 lbs		0.0085			0.0085	
Broiler/Layer chickens 3 lbs or more		0.01			0.01	
Broiler/Layer chickens less than 3 lbs		0.0025			0.0025	

Note: If the "Existing AUC" (column a) is 500 AU or less, enter the "Total proposed AUC" (column b) in the "New AU" (column c)

c) New AU = b) - a):

TOTALS:	**a) Existing AUC:**	5277	**b) Total proposed AUC:**	5252	-25

(*This is the AUC of the operation*)

B) Calculating AWC - Only for operations first constructed prior to March 1, 2003

`

The AWC is needed for an operation that was first constructed prior to March 1, 2003, to determine some of the minimum separation distance requirements for construction or expansion.

The AWC is the product of multiplying the maximum number of animals that you would ever confine at any one time by their average weight (lbs) during the production cycle. Then add the AWC if more than one animal species is present (examples on how to determine the AWC are provided in 567 IAC 65.1(455B).)

If the operation was first constructed prior to March 1, 2003, you must complete all applicable columns in Table 2:

Table 2. Animal Weight Capacity (AWC): (No. head) * (Avg. weight, lbs) = AWC, lbs

Animal Species	a) Existing AWC (Before Permit)			b) Proposed AWC (After permit)		
	(No. head) x	avg weight	= AWC	(No. head) x	avg weight	= AWC
Slaughter or feeder cattle						
Immature dairy cattle						
Mature dairy cattle						
Gestating sows	4766	375	1787250	7467	375	2800125
Farrowing sows & litter	1178	375	441750	1638	375	614250
Boars	10	350	3500	16	350	5600
Gilts	2360	200	472000	3910	200	782000
Finished (Market) hogs	4800	150	720000	0	150	0
Nursery pigs 15 lbs to 55 lbs	320	35	11200	400	35	14000
Sheep and lambs						
Horses						
Turkeys 7lbs or more						
Turkeys less than 7 lbs						
Broiler/Layer chickens 3 lbs or more						
Broiler/Layer chickens less than 3 lbs						

c) New AWC = b) - a):

TOTALS:	**a) Existing AWC:**	3435700	**b) Total proposed AWC:**	4215975	780275

(This is the AWC of the operation)

ITEM 5 – SUBMITTAL REQUIREMENTS Checklists No. 1 or 2 (pages 10-16) describe the submittal requirements, which are based on the type of confinement feeding operation structure[1] and AUC proposed. To determine which checklist to use, choose the option that best describes your confinement feeding operation:

A) ☐ **Formed manure storage structures[2]**: The proposed confinement feeding operation structure[1] will be or will use a formed manure storage structure[2]. Check one of the following boxes:

1. ☐ A swine farrowing and gestating operation with an AUC of 1,250 AU or more. Use submittal checklist No. 2 (page 13.)
2. ☒ A swine farrow-to-finish operation with an AUC of 2,750 AU or more. Use submittal checklist No. 2 (page 13.)
3. ☐ A cattle confinement feeding operation (including dairies) with an AUC of 4,000 AU or more. Use submittal checklist No. 2 (page 13.)
4. ☐ Other confinement feeding operations with an AUC of 3,000 AU or more. Use submittal checklist No. 2 (page 13.)
5. ☐ None of the above. Use Submittal Checklist No. 1 (page 10.)

If any of boxes 1 to 4 are checked, the operation meets the threshold requirements for an engineer[4] and a Professional Engineer (PE), licensed in Iowa, is required. For these cases, use Submittal Checklist No. 2 (pages 13-15.)

If you checked box 5, your operation is below threshold requirements for an engineer[4] and a Professional Engineer (PE) is not required. Use Submittal Checklist No. 1 (pages 10-12).

B) ☐ **Unformed manure storage structure[3]**: The proposed confinement feeding operation structure[1], will be or will use an unformed manure storage structure[3] or an egg washwater storage structure. A Professional Engineer (PE) licensed in Iowa must design and sign the engineering documents for any size of operation. Use Submittal Checklist No. 2 (pages 13-15) and Addendum "A" (page 16).

ITEM 6 – SIGNATURE:

I hereby certify that the information contained in this application is complete and accurate.

Signature of Owner(s): _____ Date: _____

_____ _____

MAILING INSTRUCTIONS:

To expedite the application process, follow the submittal requirements explained in Checklist No. 1 or 2 (pages 10 to 16), whichever applies. Page 1 of this form should be the first page of the package. Mail all documents and fees to:

Iowa DNR
AFO Program
502 East 9th St.
Des Moines, IA 50319-0034

(Note: Incomplete applications will be returned to the sender. Application documents submitted to the Field Office will delay the application process).

Questions

Questions about construction permit requirements or regarding this form should be directed to an engineer of the animal feeding operations (AFO) Program at (515) 281-8941 or go to http://www.iowadnr.gov (select the link to "Animal Feeding Operations"). To contact the appropriate DNR Field Office, go to http://www.iowadnr.gov/fo/index.html.

[4] Threshold requirements for an engineer apply to the construction of a formed manure storage structure[2]. Operations that meet or exceed the threshold requirements for an engineer, are required to submit engineering documents signed by a professional engineer licensed in the state of Iowa. Please refer to Checklist No. 2 (pages 13 to 15.)

ITEM 7

Interested Parties Form
Confinement Feeding Operation

Interest means ownership of a confinement feeding operation as a sole proprietor or a 10 percent or more ownership interest held by a person in a confinement feeding operation as a joint tenant, tenant in common, shareholder, partner, member, beneficiary or other equity interest holder. Ownership interest is an interest when it is held either directly or indirectly through a spouse or dependent child, or both.

INSTRUCTIONS:

Please list all persons (including corporations, partnerships, etc.) who have an interest in any part of the confinement feeding operation covered by this permit application.

Full Name	Address	City/State	Zip
Grandview Farms, Inc.	12090 West 240th Street	Eldridge, IA	52748
Tom Dittmer	12090 West 240th Street	Eldridge, IA	52748

For each name above, please list below all other confinement feeding operations in Iowa in which that person has an interest. Check box "**None**", below, if there are no other confinement feeding operations in Iowa in which the above listed person has an interest.

Operation Name	Location (1/4 1/4, 1/4, Section, Tier, Range, Township, County)	City
☐ **None** [There are no other confinements in Iowa in which the above listed person(s) has or have an interest].		
Grandview Farms Home Wean to finish Farm	E1/2 SE 1/4 Sec. 12, T79N R2E, Hickory Grove, Scott	Eldridge
Walcott Wean Finish Farm	NW 1/4 SW 1/4, Sec. 10, T78N R2E, Blue Grass, Scott	Walcott
T/J Wean-Finish Farm	NW1/4 NW1/4, Sec. 13, T79N R2E, Hickory Grove, Scott	Eldridge
DeWulf Site	SE1/4 SW1/4 , Sec. 17, T80N R3W, Winfield, Scott	Eldridge
Engler Site	SE1/4 NW1/4 Sec. 4, T79N R3E, Sheridan, Scott	Long Grove
T/J West	NW1/4 NE1/4 Sec. 24, 79N 1W, Farmington, Cedar	Durant

I hereby certify that the information provided on this form is complete and accurate.

Signature of Owner(s): _____ Date: _____

_____ _____

ITEM 8

Manure Storage Indemnity Fee Form for Construction Permits

CASHIER'S USE ONLY
0474-542-474A-0431
Facility ID #
County

Credit fees to: Grandview Farms, Inc.

Name of operation: Grandview Farms Sow Farm

NSTRUCTIONS:

1) Use the 'Total Proposed AUC' from column b), Table 1 (page 4), to select the appropriate fee line in the table below. The 'Total Proposed AUC' is the AUC of the operation.

2) Select the animal specie and row number (see examples). Enter the 'New AU' from column c), Table 1 (page 4). The 'New AU' is the number of AU to be added to an existing operation or being proposed with a new operation. **Note**: If the "Existing AUC" (column a) is 500 AU or less, enter the "Total proposed AUC" (column b) in "New AU" (column c).

3) Multiply the 'New AU' by the appropriate 'Fee per AU'. The resulting number is the indemnity fee due.

- **Example 1**: An existing swine operation is expanding from an 'Existing AUC' of 1,000 AU to a 'Total Proposed AUC' of 1,800 AU, and has previously paid an indemnity fee for the existing 1,000 AU. Calculate the indemnity fee as follows: The 'Total Proposed AUC' is between 1,000 AU and 3,000 AU; the animal specie is other than poultry; enter 800 AU in the 'New AU' column, row 4, and multiply it by $ 0.15:
  (800 AU) x ($ 0.15 per AU) = $ 120.00

- **Example 2**: An existing poultry operation is expanding from an 'Existing AUC' of 250 AU to a 'Total Proposed AUC' of 2,000 AU and has not paid the indemnity fee for animals housed in the existing buildings. Calculate the indemnity fee as follows: The 'Total Proposed AUC' is between 1,000 AU and 3,000 AU; the animal specie is poultry and the indemnity fee has not previously been paid, enter 2,000 AU in the 'New AU' column on row 3, and multiply it by $0.06:
  (2,000 AU) x ($ 0.06 per AU) = $ 120.00

- **Example 3**: If you are proposing a new swine confinement feeding operation with a 'Total Proposed AUC' of 3,500 AU, enter 3,500 AU in the 'New AU' column, row 6 and multiply it by $ 0.20:
  (3,500 AU) x ($ 0.20 per AU) = $ 700.00

- **Example 4**: If you are applying for a construction permit but you are not increasing the AUC of the operation, and has previously paid the applicable indemnity for the animals housed in the existing buildings, there is no indemnity fee due ($ 0.00). If no indemnity fee is due, do not submit this page.

Indemnity Fee Table:

Total Proposed AUC - (After permit) from column b), Table 1	Row	Animal species	New AU - from column c), Table 1	x	Fee per AU	Indemnity Fee
Less than 1,000 AU	1	Poultry		x	$ 0.04 =	
	2	Other		x	$ 0.10 =	
1,000 AU or more to less than 3,000 AU	3	Poultry		x	$ 0.06 =	
	4	Other		x	$ 0.15 =	
3,000 AU or more	5	Poultry		x	$ 0.08 =	
	6	Other	0	x	$ 0.20 =	0

ITEM 8 (Cont.)

Filing Fees Form for Construction Permits

CASHIER'S USE ONLY
0473-542-473A-0431
0474-542-474A-0431
Facility ID #
County

Credit fees to: Grandview Farms, Inc.

Name of operation: Grandview Farms Sow Farm

INSTRUCTIONS:

1. If the operation is applying for a construction permit enclose a payment for the following:

   ☒ Construction application fee $ 250.00.
   (Note: This fee is non-refundable)

2. A manure management plan must be submitted and you must also pay the following:

   ☒ Manure management plan filing fee $ 250.00
   (Note: This fee is non-refundable)

3. Total filing fees: Add the fees paid in items 1 and 2 (above): $ 500.00

SUMMARY:

- Manure Storage Indemnity Fee (see previous page) to be deposited in the Manure Storage Indemnity Fee Fund (474)	$	0
- Total filing fees (see item 3 on this page) to be deposited in the Animal Agriculture Compliance Fund (473)	$	500.00
TOTAL DUE:	$	500.00

4. Make check payable to: Iowa Department of Natural Resources or Iowa DNR; and send it along with the construction application documents (See submittal checklist No. 1 or 2, pages 10-15.) Note: Do not send this fee to the county.

ITEM 9

COUNTY VERIFICATION RECEIPT OF DNR CONSTRUCTION PERMIT APPLICATION

This form provides proof that the County Board of Supervisors has been provided with a complete copy of the construction permit application documents (everything except the fees) for the confinement feeding operation:

Owner: Grandview Farms, Inc. Telephone: 563-285-4006

Name of operation: Grandview Farms Sow Farm

Location:	SW	SW	7	T79N,R3E	Sheridan	Scott
	(1/4 1/4)	(1/4)	(Section)	(Tier & Range)	(Name of Township)	(County)
	SE	SE	12	T79N, R2E	Hickory Grove	Scott

Documents being submitted to the county:

- ☒ Construction permit application form: submit items 1 to 9 (see Submittal Checklist No. 1 or 2)
- ☒ Attachment 1 - Aerial photos: Must clearly show the location of the proposed confinement feeding operation structure[1] and that all the separation distances are met, including those claimed for points in the master matrix (if applicable).
- ☒ Attachment 2 - Statement of design certification, submit any of the following (see Checklist No. 1 or 2):
  - ☒ Construction Design Statement form
  - ☒ Professional Engineer (PE) Design Certification form
  - ☒ Engineering report, construction plans and technical specifications
  - ☐ In addition, if proposing an unformed manure storage structure[3] or an egg washwater storage structure submit documentation required in Addemdum "A" of this construction application form.
- ☒ Attachment 3 - Manure management plan.
- ☒ Attachment 4 - Master Matrix (if required). You must include supporting documents (see Checklist No. 1 or 2)

THIS SECTION IS RESERVED FOR THE COUNTY

As soon as DNR receives a construction permit application, the DNR will fax your County Auditor a "Courtesy reminder letter" explaining what actions your County Board of Supervisors must complete and the deadlines.

Public Notice is required for **all** construction permit applications, including those applications not required to be evaluated with the master matrix and applications in counties not participating in the Master matrix.

Counties participating in the master matrix: the county's master matrix evaluation and county's recommendation is required for the following cases:

- A new confinement feeding operation that is applying for a construction permit
- An existing confinement feeding operation that was first constructed on or after April 1, 2002 that is applying for a construction permit.
- An existing confinement feeding operation that was first constructed prior to April 1, 2002 that is applying for a construction permit with an animal unit capacity (AUC) is 1,667 animal units (AU) or more.

I have read and acknowledge the county's duty with this construction permit application, as specified in 567 IAC 65.10(455B) and Iowa Code 459.304. On behalf of the Board of Supervisors for:

COUNTY: _____

NAME: _____

TITLE: _____

(Member of the County Board of Supervisors or its designated official/employee)

Date: _____, 20____.

If you do not receive the courtesy reminder letter within a reasonable time, or if you have any questions, please contact the animal feeding operations (AFO) Program at (515) 281-8941 or visit www.IowaDNR.gov

ENGINEERING REPORT

GRANDVIEW FARMS – 2015 EXPANSION

*REVISED ON 2/5/2015

The present site was built in 1950 and has been changed numerous times since 1979. The original site was a 2000 head farrow to finish facility with pasture lots. The changes began in 1979 and are as follows:

Building 6	1979	Finishing Barn	600 head	30' x 170' building	160'x12'x8' deep pit
Building 4	1982	Nursery-grower	600 head	28' x 108' building	72'x28'x8' deep pit
Building 13	1982*	Hen House	13 farrowing		6’ x 22’ x 8’building
Building 14	1982*	Old Barn	60 gestation		12’x24’x 8’building
Building 1	1983	Gestation Barn	200 head	41' x 96' building	36'x12'x8' deep pit
Building 2	1984	Gestation Barn	120 head	41' x 56' building	24'x12'x8' deep pit
Building 3	1991	Gestation Barn	365 head	41' x 190' building	70' dia x 8' deep tank
Building 5	1993	Farrowing-Nursery 64 farrowing	640 nursery	50' x 150' building	50'x150'x8' deep pit
Building 6	1993*	Finishing	1140 head	41' x 240' building	41'x240'x8' deep pit
Building 4	1996	Nursery	600 head	Converted 1982 building to all nursery	
Building 6	1998	Gilt breeding	600 head	Converted 1979 building to gilt breeding	
Building 5	1998*	Farrowing	51 head	Converted 1993 building to farrowing	
Building 5	1998	Farrowing	32 farrowing	Added on to 1993 building	
Building 14	1999	Farrowing	32 farrowing	Converted 1982 building to farrowing	
Building 6	2000	Gestation	496 head	Converted 1993 building to gestation	
Building 3	2001	Gestation	176 head	Added on to 1991 building	
Building 5	2001	Farrowing	32 farrowing	Added on to 1993 building	
Building 7	2005	Gestation	1250 gestating	81' x 320' building	81' x 320' x 10' deep pit
Building 8	2005	Farrowing	500 farrowing	70' x 252.8' building	70' x 252.8' x 2' pit

In the 2005 addition, the improvement included a gestation barn with dimensions of 81' x 320' (Building 7) and a farrowing barn with dimensions of 70' x 252.8' (Building 8). The gestation barn has 10' deep pits and the farrowing barn has 2' pits. The total animals on the farm was 2,750 gestating sows and 530 farrowing, 400 gilts, and 25 boars. The total animal weight in all the barns was 1,942,000 lbs. The manure produced by the 2750 gestating and 530 farrowing sows, 400 gilts and 25 boars was anticipated to be 490,560 c.f. and 2600 c.f. of rainwater on the existing open tank for a total of 493,160 c.f. The capacity of all the barns was 380,405 c.f., so there was about 9 months of storage. The manure from the deep pits and tank was injected.

The 2006 addition included a 121'- 4" x 51'-10" x 8' deep gilt development unit. The proposed increase in animals was 240 nursery and 720 finishers. This brought the total on the farm to 2,750 gestation, 530 farrowing, 400 gilts, 25 boars, 240 nursery and 720 finishing animals.

The manure produced in the GDU was to be 45,114 cf/yr with a capacity of 51,107 cf. The manure was injected.

The 2010 addition included a 121'- 4" x 51'-10" x 8' deep gilt development unit, a 70’ x 72’ x 2’ (Building 8) farrowing addition, a 422’ x 101’ x 10’ (Building 10) deep gestation barn, and a 124’ x 263’ x 2’ deep farrowing barn. This will bring the total on the farm to 4800 gestation, 1077 farrowing, 1,800 gilts, 10 boars, and 4800 finishing animals.

The 2012 addition included a 14’ x 51’ x 2’ (Building 9) deep nursery, 44’ x 70’ x 2’ (Building 8) deep farrowing addition, 44’ x 128’ x 2’ deep farrowing addition and 101’ x 240’ x 8’ (Building 15) deep gestation

barn. This will bring the total on the farm to 4766 gestation, 1178 farrowing, 10 boars, 2360 gilts, 4800 finishers, 320 nursery.

A nearby 4800 head wean to finish farm (Building 12) is adjacent and has been included for permit purposes only.

The 2015 expansion will include

- Building a new 1200 head Gilt Grower Barn (GDU Finisher)(Building 17), 51'x241'8' deep Manure Storage Pit with 3 pumpouts on each side. It will be built west and north of the present GDU, which is listed as #9 or straight west of the NW corner of the Gilt in 2012.
- Tear down the west 31'x169' of Barn #6 that was built in 1979. Build a new 41'x181'x8' deep pit 400 head Sow Gestation Barn with 2 pumpouts on each side (Building 6). Add onto east end of #6, 41'x121'x8' deep pit 250 head Sow Gestation Barn.
- Tear down #4, 28'x108' 1982 42 head farrowing barn. Build a new 61'x120'x8' deep pit 300 head Sow Gestation Barn (Building 4).
- Add 48' onto the east end of #5, 32 farrowing spaces. It will have a 2' deep scraper pit that will flow manure into the existing round 70' diameter manure tank (Building 5).
- Plan to cap and eliminate existing well #1 located off the SW corner of barn #5. It was drilled in 1993 and grandfathered in, but with the new 61'x101'x8' deep pit Sow Gestation Barn planned to be build, the well will be an issue. We will drill a new well about 40' east of the existing well (#2) and well house that is located just east of the house.

West New Sow Farm – converting the existing 4800 head Wean Finish Site.

- Convert the 4-W-F Barns to 504 head Sow Gestation per barn (Buildings 12).
- Build a new 480 head Farrowing Barn. 124'x275'x8' deep. Located 75' east of the 4 existing barns.

The total manure produced will be 973,179 c.f. and West Sow Farm is 109,881 c.f. The manure will be injected.

The Facility is not in the 100 year flood zone. The soil indicates the seasonal high water table to be about 3-4' which will require a tile.

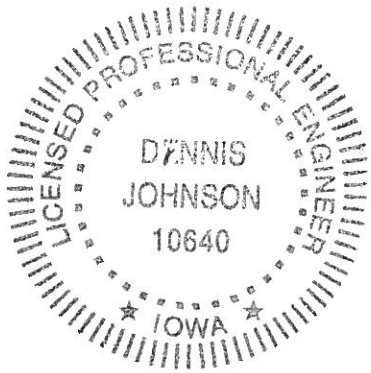
A nearby 4800 head wean to finish farm is adjacent and has been included for permit purposes only.

It is our opinion that the proposed concrete tanks would meet the requirements of Iowa Code 459, Subpart 111 and 567 Iowa Administrative Code 65.

WENCK ASSOCIATES, INC. 2/12/15

(SEAL)

Dennis J. Johnson, P.E.



SECTION 03310 - CONCRETE WORK

PART 1 - GENERAL

1.01 RELATED DOCUMENTS

A. Drawings and General Provisions of Contract, including General & Supplementary Conditions and Division 1 Specification sections and Iowa Department of Transportation apply to work of this section.

1.02 SUMMARY

A. Extent of concrete work is shown on drawings.
B. Concrete paving and walks are shown on drawings.

1.03 SUBMITTALS

A. Product Data: Submit data for proprietary materials and items, including reinforcement and forming accessories, admixtures, patching compounds, water-stops, joint systems, curing compounds, dry-shake finish materials, and others as requested by architect/engineer.

B. Laboratory Test Reports: Submit laboratory test reports for concrete materials and mix design test.

C. Materials Certificates: Provide materials certificates in lieu of materials laboratory test reports when permitted by architect/engineer. Materials certificates shall be signed by manufacturer and contractor, certifying that each material item complies with, or exceeds, specified requirements. Provide certification from admixture manufacturers that chloride content complies with specification requirements.

1.04 PROJECT CONDITIONS

A. Protection of Footings Against Freezing: Cover completed work at footing level with sufficient temporary or permanent cover as required to protect footings and adjacent subgrade against possibility of freezing; maintain cover for time period as necessary.

Protect adjacent finish materials against spatter during concrete placement.

PART 2 - PRODUCTS

SECTION 03310 – CONCRETE WORK

2.01 FORM MATERIALS

A. Forms for Exposed Finish Concrete: Plywood, metal, metal-framed plywood faced, or other acceptable panel-type materials, to provide continuous, straight, smooth, exposed surfaces. Furnish in largest practicable sizes to minimize number of joints and to conform to joint system shown on drawings.

B. Forms for Textured Finish Concrete: Units of face design, size, arrangement, and configuration to match architect/engineer's control sample. Provide solid backing and form supports to ensure stability of textured form liners.

C. Form Coatings: Provide commercial formulation form coating compounds that will not bond with, stain, nor adversely affect concrete surfaces, and will not impair subsequent treatments of concrete surfaces.

D. Form Ties: Factory-fabricated, adjustable-length, removable or snapoff metal form ties, designed to prevent form deflection and to prevent spalling concrete upon removal. Provide units which will leave no metal closer than 1-1/2 inches to surface.

2.02 REINFORCING MATERIALS

A. Reinforcing Bars: ASTM A-615, Grade 60, deformed.

2.03 CONCRETE MATERIALS

A. Portland Cement: ASTM C-150, Type I.

Use one brand of cement throughout project, unless otherwise acceptable to engineer.

B. Fly Ash: ASTM C-618, Type C or Type F.

C. Normal Weight Aggregates: ASTM C-33 or Iowa Department of Transportation 4110 and 4115 and as herein specified. Provide aggregates from a single source for exposed concrete. The maximum aggregate size shall be 1 1/2 inches.

For exterior exposed surfaces, do not use fine or coarse aggregates containing spalling-causing deleterious substances.

D. Water: Drinkable.

E. Air-Entraining Admixture: ASTM C-260, certified by manufacturer to be compatible with other required admixtures.

F. Water Reducing Admixture: ASTM C-494, Type A, and containing not more than 0.1 percent chloride ions.

2.04 RELATED MATERIALS

A. Granular Base: Evenly graded mixture of fine and coarse aggregates to provide, when compacted, a smooth and even surface below slabs on grade meeting requirements of Iowa Department of Transportation.

B. Non-Shrink Grout: CRD-C 621, factory pre-mixed grout.

C. Liquid Membrane-Forming Curing Compound: Liquid type membrane forming curing compound complying with ASTM C-309, Type I, Class A. Moisture loss not more than 0.055 gr/sq cm. when applied at 200 sq. ft./gal.

D. Epoxy Adhesive: ASTM C-881, two component material suitable for use on dry or damp surfaces. Provide material "Type", "Grade", and "Class" to suit project requirements. Epoxy shall be Sikadur Hi-Mod, Sika Chemical Company or equal.

E. Waterstop shall be of one of the following:

1) PVC waterstops shall be 3/16" x 4".
2) Waterstop Plus TM or equal.

F. Joint sealant shall be one of the following or equal.

1) Sikadur CJR.
2) Sikadur 51 NS/SL
3) Unitex Pro-Flex Flexible Epoxy Control Joint Sealer
4) Sonneborn Epolith-P
5) Sonneborn Epolith-G

Expansion joints shall be 1/2" inch Sonoflex-F (polyethelene foam expansion joint filler or equal).

2.05 PROPORTIONING AND DESIGN OF MIXES

A. Prepare design mixes for each type and strength of concrete by either laboratory Trial batch or field experience methods as specified in ACI-301. If trial batch Method used, use an independent testing facility acceptable to architect/engineer for preparing and reporting proposed mix designs. The testing facility shall not be the same as used for field quality control

Submit written reports to architect/engineer of each proposed mix for each class of concrete at least 15 days prior to start of work. Do not begin concrete production until mixes have been reviewed by architect/engineer.

Design mixes to provide normal weight concrete with the following properties, as indicated on drawings and schedules:

1) 4000 psi 28-day compressive strength; W/C ratio as below, air content as below, or Iowa Dept. of Transportation.

B. Adjustment to Concrete Mixes: Mix design adjustments may be requested by contractor when characteristics of materials, job conditions, weather, test results, or other circumstances warrant; at no additional cost to Owner and as accepted by architect/engineer. Laboratory test data for revised mix design and strength results must be submitted to and accepted by architect/engineer before using in work.

C. Admixtures: Use water-reducing admixture or high range water reducing admixture (super plasticizer) in concrete as required for placement and workability.

Use air-entraining admixture in exterior exposed concrete, unless otherwise indicated. Add air-entraining admixture at manufacturer's prescribed rate to result in concrete at point of placement having total air content with a tolerance of plus-or-minus 1-1/2 percent within the following limits:

Concrete structures and slabs exposed to freezing and thawing, deicer chemicals, or subjected to hydraulic pressure:

1) 5.0 percent (moderate exposure); 6.0 percent (severe exposure) 3/4 inch max. aggregate.

D. Water-Cement Ratio: Provide concrete for following conditions with maximum

water-cement (W/C) ratios as follows:

1) Subjected to deicers/watertight; W/C 0.45

E. Slump Limits: Proportion and design mixes to result in concrete slump at point of placement as follows:

1) Ramps, slabs, and sloping surfaces: Not more than 3 inches.

2) Other concrete: Not less than 1 inch nor more than 5 inches.

2.06 CONCRETE MIXING

A. Ready-Mix Concrete: Comply with requirements of ASTM C-94, and as herein specified.

During hot weather, or under conditions contributing to rapid setting of concrete, a shorter mixing time than specified in ASTM C-94 may be required.

PART 3 - EXECUTION

3.01 GENERAL

A. Coordinate the installation of joint materials and vapor retarders with placement of forms and reinforcing steel.

3.02 FORMS

A. Design, erect, support, brace, and maintain formwork to support vertical and lateral, static, and dynamic loads that might be applied until such loads can be supported by concrete structure. Construct formwork so concrete members and structures are of correct size, shape, alignment, elevation, and position. Maintain formwork construction tolerances complying with ACI 347.

Design formwork to be readily removable without impact, shock, or damage to cast-in-place concrete surfaces and adjacent materials.

Construct forms to sizes, shapes, lines, and dimensions shown, and to obtain accurate alignment, location, grades, level and plumb work in finished structures. Provide for

openings, offsets, sinkages, keyways, recesses, moldings, rustications, reglets, chamfers, blocking, screeds, bulkheads, anchorages and inserts, and other features required in work. Use selected materials to obtain required finishes. Solidly butt joints and provide back-up at joints to prevent leakage of cement paste.

Fabricate forms for easy removal without hammering or prying against concrete surfaces. Provide crush plates or wrecking plates where stripping may damage cast concrete surfaces. Provide top forms for inclined surfaces where slope is too steep to place concrete with bottom forms only. Kerf wood inserts for forming keyways, reglets, recesses, and the like to prevent swelling and for easy removal.

Cleaning and Tightening: Thoroughly clean forms and adjacent surfaces to receive concrete. Remove chips, wood, sawdust, dirt, or other debris just before concrete is placed. Retightening forms and bracing after concrete placement is required to eliminate mortar leaks and maintain proper alignment.

3.03 PLACING REINFORCEMENT

A. Comply with Concrete Reinforcing Steel Institutes recommended practice for "Placing Reinforcing Bars", for details and methods of reinforcement placement and supports, and as herein specified.

1) Avoiding cutting or puncturing vapor retarder during reinforcement placement and concreting operations.

2) Clean reinforcement of loose rust and mill scale, earth, ice, and other materials which reduce or destroy bond with concrete.

3) Accurately position, support, and secure reinforcement against displacement by formwork, construction, or concrete placement operations. Locate and support reinforcing by metal chairs, runners, bolsters, spacers, and hangers, as required.

4) Place reinforcement to obtain at least minimum coverages for concrete protection. Arrange, space, and securely tie bars and bar supports to hold reinforcement in position during concrete placement operations. Set wire ties so ends are directed into concrete, not toward exposed concrete surfaces.

3.04 JOINTS

A. Construction Joints: Locate and install construction joints as indicated or, if not indicated, locate so as not to impair strength and appearance of the structure, as acceptable to architect/engineer.

Place construction joints perpendicular to main reinforcement. Continue reinforcement across construction joints, except as otherwise indicated.

B. Isolation Joints in Slab-On Ground: Construct isolation joints in slab-on-ground at points of contact between slabs-on-ground and vertical surfaces, such as column pedestals, foundation walls, grade beams, and elsewhere as indicated.

1) Joint filler and sealant materials shall be used according to manufacturer's instructions.

C. Contraction (Control) Joints in Slabs-On-Ground: Construct contraction joints in slabs-on-ground to form panels of patterns as shown. Use saw cuts 1/8" x 1/4 slab depth or inserts 1/4" wide x 1/4 of slab depth, unless otherwise indicated.

Form contraction joints by inserting premolded plastic, hardboard or fiberboard strip into fresh concrete until top surface of strip is flush with slab surface. Tool slab edges round on each side of insert. After concrete has cured, remove inserts and clean groove of loose debris.

Contraction joints in unexposed floor slabs may be formed by saw cuts as soon as possible after slab finishing as may be safely done without dislodging aggregate.

If joint pattern not shown, provide joints not exceeding 20 feet in either direction and located to conform to bay spacing wherever possible (at column centerlines, half bays, third-bays).

1) Joint sealant shall be installed according to manufacturer's instructions.

3.05 PREPARATION OF FORM SURFACES

1) Clean re-used forms of concrete matrix residue, repair and patch as required to return forms to acceptable surface condition.

2) Coat contact surfaces of forms with a form-coating compound before reinforcement is placed.

3) Thin form-coating compounds only with thinning agent of type, amount, and under conditions of form-coating compound manufacturer's directions. Do not allow excess form-coating material to accumulate in forms or to come into contact with inplace concrete surfaces against which fresh concrete will be placed. Apply in compliance with manufacturer's instructions.

4) Coat steel forms with a non-staining, rust-preventative form oil or otherwise protect against rusting. Rust-stained steel formwork is not acceptable.

3.06 CONCRETE PLACEMENT

A. Preplacement Inspection: Before placing concrete, inspect and complete formwork installation, reinforcing steel, and items to be embedded or cast-in. Notify other crafts to permit installation of their work; cooperate with other trades in setting such work. Moisten wood forms immediately before placing concrete where form coatings are not used.

Apply temporary protective covering to lower 2 feet of finished walls adjacent to poured floor slabs and similar conditions, and guard against spattering during placement.

B. General: Comply with ACI 304 "Recommended Practice for Measuring, Mixing, Transporting, and Placing Concrete", and as herein specified.

Deposit concrete continuously or in layers of such thickness that no concrete will be placed on concrete which has hardened sufficiently to cause the formation of seams or planes of weakness. If a section cannot be placed continuously, provide construction joints as herein specified. Deposit concrete as nearly as practicable to its final location to avoid segregation.

C. Placing Concrete in Forms: Deposit concrete in forms in horizontal layers not deeper than 24 inches and in a manner to avoid inclined construction joints. Where placement consists of several layers, place each layer while preceding layer is still plastic to avoid cold joints.

Consolidate placed concrete by mechanical vibrating equipment supplemented by hand-spading, rodding, or tamping. Use equipment and procedures for consolidation of concrete in accordance with ACI 309.

D. Placing Concrete Slabs: Deposit and consolidate concrete slabs in a continuous operation, within limits of construction joints, until the placing of a panel or section is completed.

Consolidate concrete during placing operations so that concrete is thoroughly worked around reinforcement and other embedded items and into corners.

Bring slab surfaces to correct level with straightedge and strikeoff. Use bull floats or darbies to smooth surface, free of humps or hollows. Do not disturb slab surfaces prior to beginning finishing operations.

Maintain reinforcing in proper position during concrete placement operations.

E. Hot Weather Placing: When hot weather conditions exist that would seriously impair quality and strength of concrete, place concrete in compliance with ACI 305 and as here-in specified.

1) Cool ingredients before mixing to maintain concrete temperature at time of placement below 90 degrees F (32 degrees C). Mixing water may be chilled, or chopped ice may be used to control temperature provided water equivalent of ice is calculated to total amount of mixing water. Use of liquid nitrogen to cool concrete is contractor's option.

2) Cover reinforcing steel with water-soaked burlap if it becomes too hot, so that steel temperature will not exceed the ambient air temperature immediately before embedment in concrete.

3) Fog spray forms, reinforcing steel, and subgrade just before concrete is placed.

F. Cold Weather Placing: When cold weather conditions exist that would seriously impair quality and strength of concrete, place concrete in compliance with ACI 306 and as herein specified:

1) Warm water or aggregate before mixing to maintain concrete temperature at time of placement above 40 degrees F. The temperature of the water shall be below 165 degrees F.

2) Before placing concrete at low temperatures, all subgrade, forms, or reinforcement surfaces with which the concrete may come in contact, should be heated to remove any ice or snow and to prevent freezing of the concrete.

3) The concrete shall be kept above 32 degrees F for a minimum of 24 hours. Corners and edges are very critical.

3.07 FINISH OF FORMED SURFACES

A. Smooth Form Finish: For formed concrete surfaces exposed-to-view, or that are to be covered with a coating material applied directly to concrete, or a covering material applied directly to concrete, such as waterproofing, dampproofing, veneer plaster, painting, or other similar system. This is as-cast concrete surface obtained with selected form facing material, arranged orderly and symmetrically with a minimum of seams. Repair and patch defective areas with fins or other projections completely removed and smooth.

3.08 MONOLITHIC SLAB FINISHES

A. Non-Slip Broom Finish: Apply non-slip broom finish to exterior concrete platforms, steps and ramps, and elsewhere as indicated.

Immediately after float finishing, slightly roughen concrete surface by brooming with fiber bristle broom perpendicular to main traffic route. Coordinate required final finish with architect/engineer before application.

B. Non-Slip Aggregate Finish: Apply non-slip aggregate finish to concrete stair treads, platforms, ramps, sloped walks, and elsewhere as indicated.

After completion of float finishing, and before starting trowel finish, uniformly spread 25 lbs. of dampened non-slip aggregate per 100 sq. ft. of surface. Tamp aggregate flush with surface using a steel trowel, but do not force below surface. After broadcasting and tamping, apply trowel finishing as herein specified.

After curing, lightly work surface with a steel wire brush, or an abrasive stone, and water to expose non-slip aggregate.

3.09 CONCRETE CURING AND PROTECTION

A. General: Protect freshly placed concrete from premature drying and excessive cold or hot temperatures.

Start initial curing as soon as free water has disappeared from concrete surface after placing and finishing. Weather permitting, keep continuously moist for not less than 7- days.

Begin final curing procedures immediately following initial curing and before concrete has dried. Continue final curing for at least 7 days in accordance with ACI 301 procedures. Avoid rapid drying at end of final curing period.

B. Curing Methods: Perform curing of concrete by curing and sealing compound, by moist curing, by moisture-retaining cover curing, and by combinations thereof, as herein specified.

Provide curing and sealing compound to exposed interior slabs and to exterior slabs, walks, and curbs, as follows:

1) Apply specified curing and sealing compound to concrete slabs as soon as final finishing operations are complete (within 2 hours). Apply uniformly in continuous operation by power-spray or roller in accordance with manufacturer's directions. Recoat areas subjected to heavy rainfall within 3 hours after initial application. Maintain continuity of coating and repair damage during curing period.

3.10 REMOVAL OF FORMS

A. Formwork not supporting weight of concrete, such as sides of walls, walks and similar parts of the work, may be removed after cumulatively curing at not less than 50-deg. F (10 deg. C) for 24 hours after placing concrete, provided concrete is sufficiently hard to not be damaged by form removal operations, and provided curing and protection operations are maintained.

3.11 RE-USE OF FORMS

A. Clean and repair surfaces of forms to be re-used in work. Split, frayed, delaminated, or otherwise damaged form facing material will not be acceptable for exposed surfaces.

Apply new form coating compound as specified for new formwork.

When forms are extended for successive concrete placement, thoroughly clean surfaces, remove fins and laitance, and tighten forms to close joints. Align and secure joint to avoid offsets.

Do not use "patched" forms for exposed concrete surfaces, except as acceptable to architect/engineer.

3.12 MISCELLANEOUS CONCRETE ITEMS

A. Filling-In: Fill-in holes and openings left in concrete structures for passage of work by other trades, unless otherwise shown or directed, after work of other trades is in place. Mix, place, and cure concrete as herein specified, to blend with inplace construction. Provide other miscellaneous concrete filling shown or required to complete work.

B. Equipment Bases and Foundations: Grout base plates and foundations as indicated, concrete repair area, using specified non-shrink grout. Use non-metallic grout for exposed conditions, unless otherwise indicated.

3.13 CONCRETE SURFACE REPAIRS

A. Patching Defective Areas: Repair and patch defective areas with cement mortar immediately after removal of forms, when acceptable to architect/engineer.

Cut out honeycomb, rock pockets, voids over 1/4-inch in any dimension, and holes left by tie rods and bolts, down to solid concrete but, in no case to a depth of less than 1-inch. Make edges of cuts perpendicular to the concrete surface. Thoroughly clean, dampen with water, and brushcoat the area to be patched with specified bonding agent. Place patching mortar after bonding compound has dried.

For exposed-to-view surfaces, blend white portland cement and standard portland cement so that, when dry, patching mortar will match color surrounding. Provide test areas at inconspicuous location to verify mixture and color match before proceeding with patching. Compact mortar inplace and strike-off slightly higher than surrounding surface.

B. Repair of Formed Surfaces: Remove and replace concrete having defective surfaces if defects cannot be repaired to satisfaction of architect/engineer. Surface defects, as such,

include color and texture irregularities, cracks, spalls, air bubbles, honeycomb, rock pockets; fins and other projections on surface; and stains and other discolorations that cannot be removed by cleaning.. Flush out form tie holes, fill with dry pack mortar, or precast cement cone plugs secured in place with bonding agent.

C. Repair of Unformed Surfaces: Repair finished unformed surfaces that contain defects which affect durability of concrete. Surface defects, as such, include crazing, cracks in excess of 0.01 inches wide or which penetrate to reinforcement or completely through non-reinforced sections regardless of width, spalling, pop-outs, honeycomb, rock pockets, and other objectionable conditions.

Repair defective areas, except random cracks and single holes not exceeding 1- inch diameter, by cutting out and replacing with fresh concrete. Remove defective areas to sound concrete with clean, square cuts and expose reinforcing steel with at least 3/4-inch clearance all around.

Dampen concrete surfaces in contact with patching concrete and apply bonding compound. Mix patching concrete of same materials to provide concrete of same type or class as original concrete. Place, compact, and finish to blend with adjacent finished concrete. Cure in same manner as adjacent concrete.

Repair isolated random cracks and single holes not over 1- inch in diameter by dry-pack method. Groove top of cracks and cut-out holes to sound concrete and clean of dust, dirt, and loose particles.

Dampen cleaned concrete surfaces and apply bonding compound. Mix dry-pack, consisting of 1-part portland cement to 2-1/2 parts fine aggregate passing a No. 16 mesh sieve, using only enough water as required for handling and placing. Place dry-pack after bonding compound has dried. Compact dry-pack mixture in place and finish to match adjacent concrete. Keep patched area continuously moist for not less than 72 hours.

AG WASTE MANAGEMENT SYSTEM

OPERATION AND MAINTENANCE PLAN

GRANDVIEW FARMS – 2015 EXPANSION

You, as owner are responsible for maintaining this conservation practice to assure that it continues to serve the purpose for which it was intended. The practice must be inspected periodically to enable proper operation and maintenance. To assist you in making these inspections, the following guidelines have been prepared for your use.

A) CONFINED SPACES:

Your Waste Management System may include structures that are considered "confined spaces" by Department of Labor and Industry Rules. Entry into a confined space is hazardous and must only be done by a trained person using proper safety procedures.

It is generally known that tanks, pits, sumps, etc., that contain manure are likely to contain dangerous gases and should not be entered without proper safety precautions. Other structures such as sumps that have no water or only clean water are also subject to developing dangerous air conditions.

For your information, this Operation and Maintenance Plan includes a copy of the current rules on confined spaces. These rules are being provided to you for your information and safety.

NEVER ENTER CONFINED SPACES SUCH AS RECEPTION AND STORAGE PITS AND TANKS, PUMPING SUMPS, ETC. WITHOUT FIRST TESTING FOR POISONOUS GASES, ESTABLISHING AND MAINTAINING POSITIVE VENTILATION TO THE SPACE AT ALL TIMES, AND USING SPOTTERS AND PERSONAL SAFETY LINES FOR EACH PERSON ENTERING THE CONFINED AREA.

Your plan also includes the requirement that warning signs be prominently placed at all entrances to confined spaces. The warning signs should read:

DANGER
TOXIC GAS OR SUFFOCATION
HAZARD
KEEP OUT

The letters shall be a minimum of 1 1/2" in height and 1/4" in width. The warning signs must be kept in good condition.

OPERATION AND MAINTENANCE PLAN

B) OUTDOOR COMPONENTS OF THE SYSTEM:

1. Inspect embankments, water course channels and ridges regularly, especially following heavy rains and spring runoff. Repair damage as soon as conditions allow with compacted earth fill, reshaping, staked sod, reseeding and/or mulch as needed.

2. Control brush, weed and tree growth. Use herbicides that do not harm the grass sod, or mow and clip where possible.

C) WASTE STORAGE STRUCTURES:

1. Empty storage structures according to the waste utilization plan schedule.

   a) Concrete storage pits - once per year or as needed.

2. Agitate pits only at pumpout locations. Provide temporary fencing during this operation so the drowning danger is reduced. Always perform pumpout operation with teams of 2-people minimum. Use safety ropes when near pumpouts. Also, utilize an air monitor during agitation and pumpout.

3. After complete removal of solid waste in barns, wash off joints and check sealants. If loose, change existing sealant and follow manufacturer's recommendations for cleaning & installation. Use a gas monitor and safety ropes if entering a confined space.

D) VENTILATION AND EXHAUST:

The exhaust ventilation system has both mechanical and curtain type ventilators. All fans should be visually inspected on a daily basis and lubricated as outlined by the manufacturer.

There should be a pit air quality monitor installed. This should be checked on a routine basis according to manufacturer's recommendations.

E) OTHER PRACTICES AND APPURTENANCES:

a. Maintain any fences in good condition; repairing broken wires, gates and posts to insure that the safety intent of the fencing is not compromised.

OPERATION AND MAINTENANCE PLAN

E) OTHER PRACTICES AND APPURTENANCES (CONTINUED):

b. Maintain all mechanical diversions (concrete and/or treated plank) as originally installed.

c. Maintain commercially manufactured mechanical manure delivery systems (ram pumps, liquid pumps, gutter scrapers, etc) in good operating condition according to manufacturer's specifications and recommendations.

F) CALL YOUR ENGINEER FOR GUIDANCE IF YOU SEE:

1. Evidence of holding pond leakage such as:

   a. Seepage from the drain tile system. This should be checked on a daily basis. This outlet should also be checked for smell on a daily basis and records kept.

   b. Failure of the pit to fill up (water level remains constant over extended time periods or raises after significant rains and then drops).

   c. A sudden drop in the water level.

2. Evidence of significant waterway or diversion channel erosion.

3. Evidence of water running over diversion ridges.

G) ROAD SURFACE MAINTENANCE:

1. Provide crushed rock (approximately 6 inches) on subgrade and add sufficient gravel for passable surface (approximately 6 inches).

2. EVIDENCE OF ROAD SURFACE DISTRESS:
   a. Soft spots with subgrade "pumping" through gravel.
   b. "Washboarding" of surface.
   c. Rough surface

3. Maintenance for each distress would be as follows:
   a. Excavate the soft spot to a depth of about 6" below the soft subgrade. Install crushed rock to a depth of 6" below the surface. Install gravel to finish surface.
   b. Grade surface to shed water and repack after rain.
   c. Add gravel and blade to shed water.

OPERATION AND MAINTENANCE PLAN

H) WATER SYSTEM:

1. The water system consists of stainless steel troughs, connected together in front of the sow crates. The troughs are filled with the use of a timer which energizes a selanoid valve to allow water to flow. There is a float switch which will not let the trough overflow.

2. The water system should be checked daily for signs of leaks or timer malfunction. The timer should be adjusted so there is no overflow. The selanoid valves and float switch should be checked daily for proper function.

OPERATION AND MAINTENANCE INSPECTION GUIDELINES

Production Function -

Element to Check	How to Check	Recommended Action
Volume produced	Compare actual number of animals, weights of animals, bedding used, areas producing polluted runoff, and other sources of wastewater to those assumed in design.	If actual volume produced is greater and will result in early filling of storage\ treatment facilities, check waterers, number of animals and other sources of water.
Clean water exclusion	See that clean water exclusion practices, such as diversion channels, roof gutters and downspouts, and curbs, are functional and in good condition.	Maintenance should be performed to correct deficiencies found.
Slatted floors	See that ventilation is provided beneath slatted floors. Check structural integrity of slats.	Provide ventilation if not found. Replace or repair slat if necessary.

Waste Storage Structure – Tank -

Rate of filling	Use established method for determining depth of waste in the tank that will permit determination of volume of waste and allow calculation of volume per unit of time, e.g., cubic feet per month. This rate can be compared to rate of filling assumed in design. The rate can also be used as a basis for planning/ design of subsequent AWMS's.	Make adjustment to reduce filling rate if it exceeds assumed rate.
Agitation	During agitation observe that dry crusts that may have formed on the surface and heavy solids	Improve methods used in agitation if it is adequate.

Waste Storage Structure – Tank (continued)

	that may have settled to the tank are put into suspension.	
Emptying	Confirm that tank is pumped out in accordance with established utilization plan and that records are kept of when and how much is removed from the tank.	
Structural integrity	For reinforced concrete structures, inspect for excessive cracking and concrete deterioration.	Consult with concrete repair specialist for recommended repairs.
	For steel tanks check for corrosion around bolts and deterioration of protective coatings.	Repair, if found.
	Observe differential or excessive settlement.	If found, consult an Engineer for action needed.
Water table control drains	See that drains are properly functioning to maintain water table to level required for structure loadings assumed in design.	Repair blockages as necessary.
Safety measure	Assure that warning signs are visible and in good condition, and that protective grates and covers are in place. Confirm that an emergency action plan is in place to deal with accidental tank entry or other crisis.	Assist in development of a plan if one has not been developed.
Reception Pits -		
Structural integrity	For concrete and concrete block structures, inspect for excessive cracking and concrete deterioration.	Consult with concrete repair specialist for recommended repairs.
Foreign material	Check for excessive debris that will impair function of pit.	Remove debris remotely from outside the pit.

Reception Pits (continued)

Safety	Assure that protective grates are installed in good condition.	Repair grates as necessary.
	Assure that pits enclosed in buildings are properly vented to prevent accumulation of gases.	Provide necessary venting.
Gravity Pipelines -		
Outlet	See that outlet is free flowing and is not causing erosion.	Clean outlet.
Safety	Note that pipeline inlets located within buildings are properly vented so gases do not accumulate.	
Equipment -		
Proper operation and maintenance	Verify that equipment is operated and maintained in accordance with manufacturer's recommendations. Records of use should be kept.	Perform maintenance at recommended intervals.
Safety	Assure that safety devices and equipment is in good repair and being used as appropriate.	
	Assure that tractors are matched with hauling equipment being pulled.	
	Assure that public safety is protected when hauling equipment uses public roads	Use proper signage and clean up spilled materials.
Land Application -		
Amount applied	Measure the amount of waste actually being applied. Estimate the amount of nutrients being applied by considering	If nutrients being applied are found excessive or crop

	nutrient losses involved to the point of application. A laboratory analysis to determine nutrient content of the waste applied allows a more precise estimate. Compare actual amount of waste and nutrients being applied to the recommendations in the nutrient management plan.	condition indicates over-application, reduce future application amounts. This may require that additional fields receive waste or that waste treatment be included in the AWMS to reduce nutrient content of the waste.
	Observe the condition of the crop. For example, yellowing might indicate that not enough nutrients are being applied. On the other hand, burned leaves might indicate that too many nutrients are being applied.	If nutrients being applied are found insufficient for optimum production or the crop condition indicates under-application of nutrients, consider supplementing with commercial fertilizer. Recommend calibrating application equipment.
Method of application	Observe method being used to apply waste. Compare method being used with the method assumed in computing nutrient losses for the nutrient management plan.	If a different method is being used, it may be necessary to adjust to the amount of the waste applied. For example, if in the nutrient management plan it was assumed a surface application method and an injection method is being used, nitrogen loss may be less than

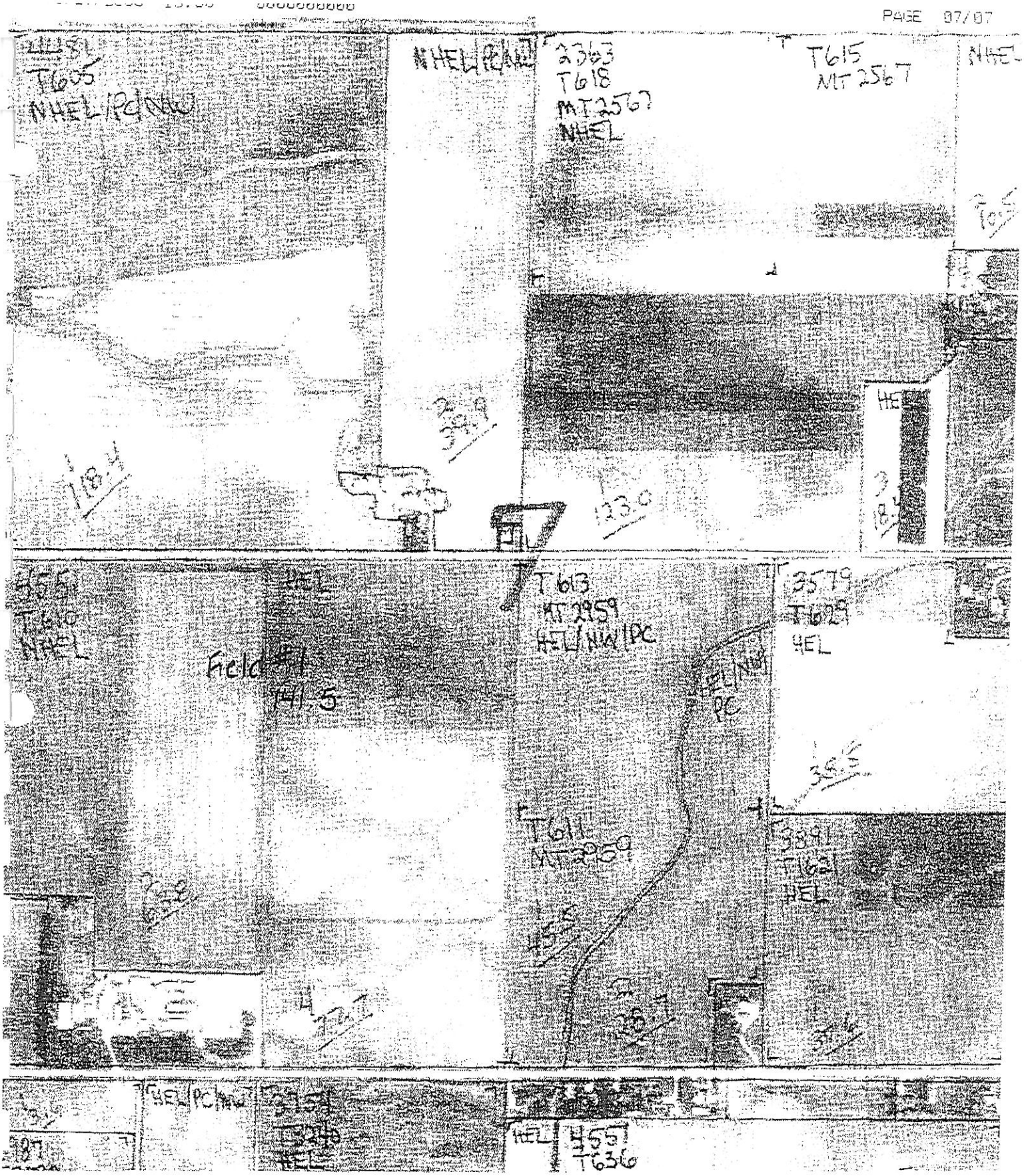
		assumed, so more nutrient are actually being applied to the crop than planned. This may make the nutrient application excessive.
Placement of waste	Observe how the waste is being placed and its distribution on the farm. Check for field runoff during application.	Compare fields to which waste is being distributed to those planned to receive waste in the nutrient management plan. Recommend appropriate modification if they are found different. If waste application is not evenly distributed or is causing runoff, recommend adjustment to equipment itself or in the way equipment is being used.
Timing of application	Observe when waste is being applied.	Compare actual timing with timing recommended in the nutrient management plan. Consider the environmental consequences if actual timing of application and recommended timing differ. Consequences, such as increased runoff and leaching losses, and inability of crop to use available nutrients should be considered. Recommend modification to timing of application if appropriate.
Safety	Observe unsafe actions or conditions, such as unshielded moving parts that could be injurious.	Recommend appropriate modification to unsafe activities or correct unsafe conditions (see 651.1303).

CAUTION SIGN FOR ALL STORAGE PROJECTS

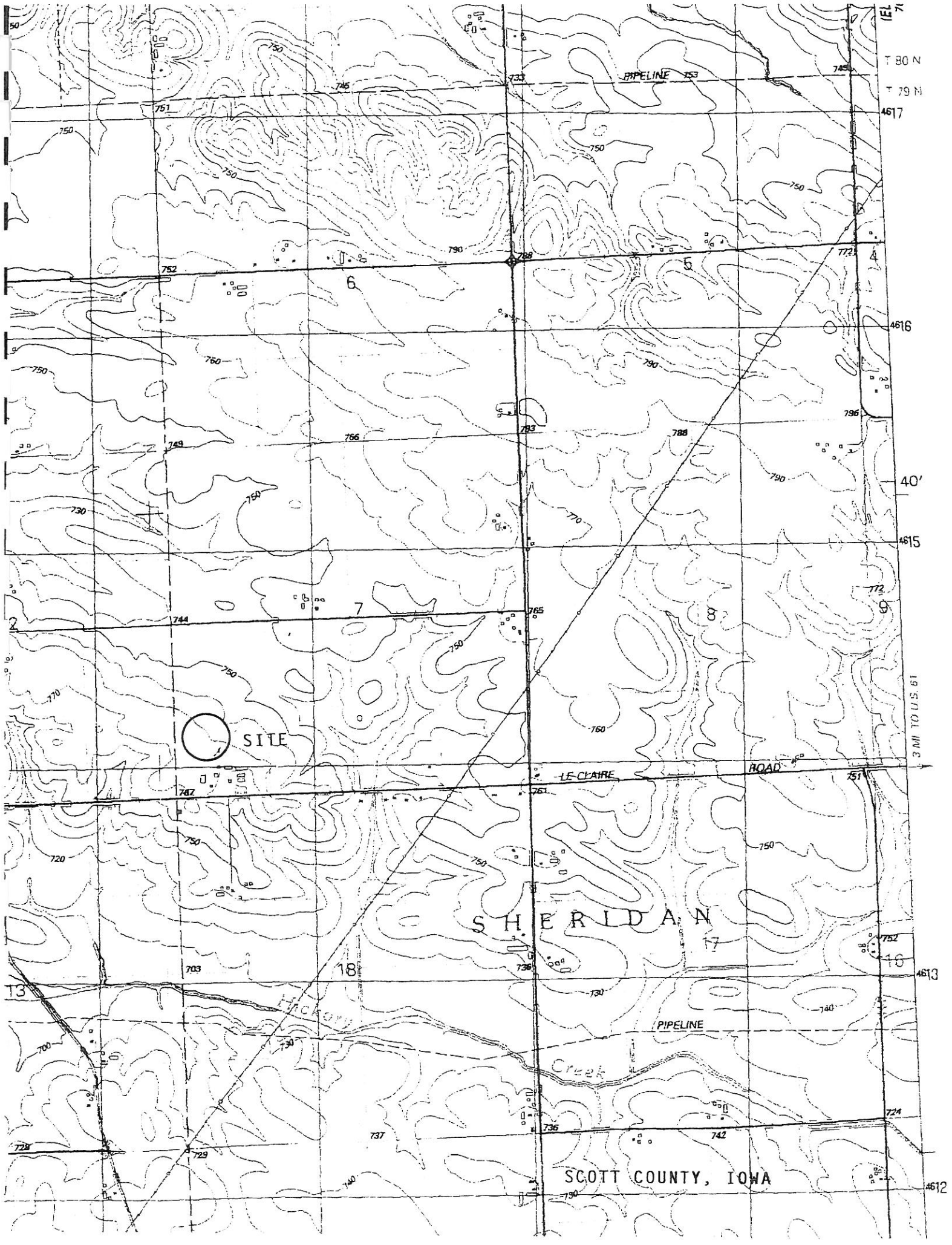
CAUTION

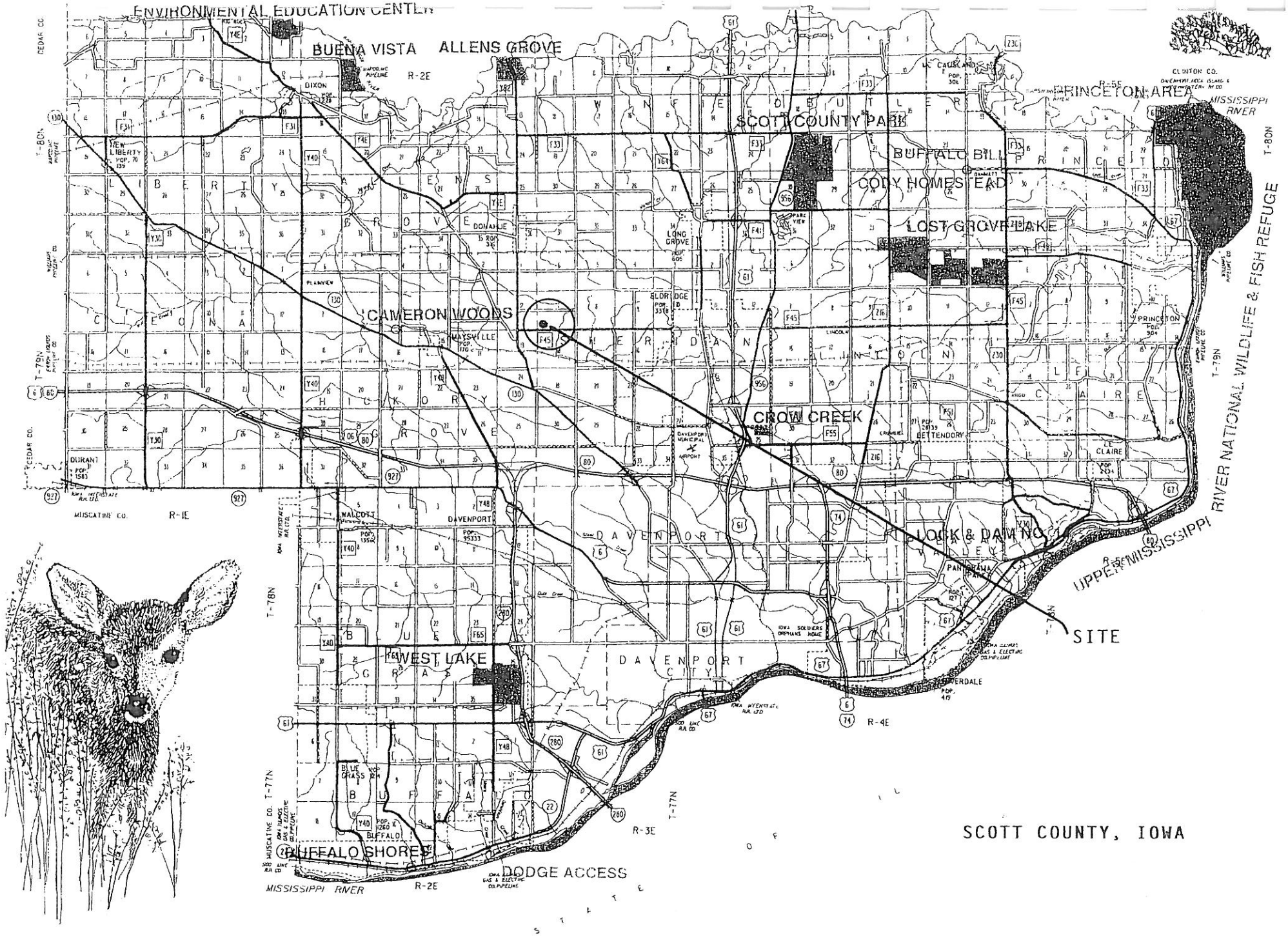
DEEP WATER

ALL LETTERING SHALL BE 2 INCHES WITH RED LETTERS ON A WHITE BACKROUND. ONE (1) SIGN SHALL BE PLACED ON EACH SIDE OF STORAGE FENCING.



NOT TO SCALE (1994 FLIGHT) SCOTT COUNTY -CROP YEAR _____ H-5


T 80 N
T 79 N
PIPELINE
SITE
LE CLAIRE ROAD
3 MI TO U.S. 61
SHERIDAN
PIPELINE
Creek
SCOTT COUNTY, IOWA
40'


ENVIRONMENTAL EDUCATION CENTER
BUENA VISTA
ALLENS GROVE
DIXON
NEW LIBERTY
LIBERTY
ALLENS GROVE
DONAHUE
LONG GROVE
PLAINVIEW
CAMERON WOODS
MAYSVILLE
HICKORY GROVE
DURANT
MUSCATINE CO.
R-1E
R-2E
WALCOTT
DAVENPORT
WEST LAKE
BLUE GRASS
BUFFALO
BUFFALO SHORES
MISSISSIPPI RIVER
DODGE ACCESS
SCOTT COUNTY PARK
WINFIELD
BUTLER
BUFFALO BILL
COLY HOMESTEAD
LOST GROVE LAKE
CROW CREEK
ELDRIDGE
LINCOLN
DAVENPORT MUNICIPAL AIRPORT
BETTENDORF
LE CLAIRE
PRINCETON
PRINCETON AREA
CLINTON CO.
MISSISSIPPI RIVER
LOCK & DAM NO. 1
PANORAMA PARK
DAVENPORT
DAVENPORT CITY
VALLEY
IOWA SOLDIERS ORPHANS HOME
RIVERDALE
R-4E
R-3E
T-80N
T-79N
T-78N
T-77N
SITE
UPPER MISSISSIPPI RIVER NATIONAL WILDLIFE & FISH REFUGE
SCOTT COUNTY, IOWA

THERE ARE NO KNOWN SINKHOLES IN AREA OF CONSTRUCTION.

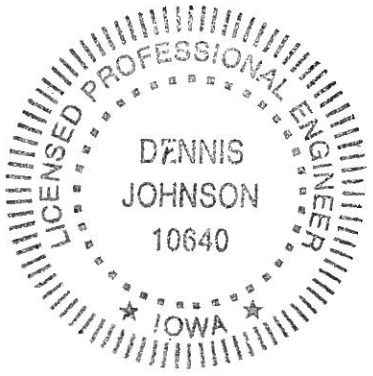
DRAINAGE TILE LINE CERTIFICATION

"I hereby certify that I am a licensed Engineer in the State of Iowa. To the best of my knowledge, information and belief, the construction of the animal feeding operation structures proposed by GRANDVIEW FARMS , SCOTT COUNTY, SHERIDAN TOWNSHIP, SECTION 7, SW ¼ of SW 1/4, T79N, R03E will not impede the drainage of established tile lines which cross their property lines and if construction disturbs drainage tile lines, I will recommend the necessary measures to be taken to reestablish drainage and, upon completion of construction, file a statement that those measures were taken to reestablish drainage."

Dennis J. Johnson, P.E. Date: 2/12/15

Iowa Registration No. 10640

(SEAL)



For unpermitted and permitted confinement feeding operations

Professional Engineer[1] (PE) Design Certification

This form is to be used in lieu of a Construction Design Statement (CDS) for confinement feeding operations with an Animal Unit Capacity (AUC)[2] of more than 500 Animal Units (AU), not required to have a PE, that are constructing a formed manure storage structure[3] with a site-specific design sealed by a PE. For more information contact the Department of Natural Resources (DNR) (see page 2 for contact information).

Name of operation: Grandview Farms Facility ID No. : _____

Location: SW (¼ ¼) SW (¼) 7 (Section) T79N, R3E (Tier & Range) Sheridan (Name of Township) Scott (County)

Describe the proposed confinement feeding operation structures: 54' x 48' x 2' Deep, Belowground, Covered, Concrete Pit Foundation (Add-on to existing 54' x 290' pit)

Design Certification: Pursuant to 567 Iowa Administrative Code (IAC) 65.15(14)"a" or "b", I prepared an engineering report, plans and specifications for the operation referenced above. Design considerations were in conformance with the following design methods:

American Concrete Institute (ACI):	Portland Cement Association (PCA):	MidWest Plan Service (MWPS):
■ ACI 318	☐ EB 075	☐ MWPS 36
☐ ACI 360	☐ EB 001	☐ MWPS TR9
☐ ACI 350	☐ IS0 72	

In addition, for non-dry manure the following additional requirements of 567 IAC 65.15(14)"a"(1) will be met:

■ 1. The floors shall be a minimum of 5 inches thick. Nondestructive methods to verify the floor slab thickness may be required by the DNR. The results shall indicate that at least 95 percent of the floor slab area meets the minimum required thickness. In no case shall the floor slab thickness be less than 4.5 inches.

■ 2. Wire mesh shall not be used as primary reinforcement for a formed manure storage structure with a depth of 4 feet or more. Fiber shall not be used as reinforcement.

■ 3. Waterstops shall be installed in all areas where fresh concrete meets hardened concrete. Waterstops shall be made of plastic, rolled bentonite or similar materials approved by the department.

■ 4. The vertical steel of all walls shall be extended into the footing and be bent at 90° or a separate dowel shall be installed. As an alternate to the 90° bend, the dowel may be extended at least 12 inches into the footing, with a minimum concrete cover of 3 inches at the bottom. In lieu of dowels, mechanical means or alternate methods may be used as anchorage of interior walls to footings.

Karst Determination: Go to www.IowaDNR.gov, select the link to "Environment" then click on Mapping and GIS, then click on the AFO Siting Atlas. Click on the red push pin icon to enter a legal description of the proposed location. Make sure the karst box is checked in the left legend. If you cannot access the map or if you have questions about this issue, contact the AFO Engineer at 712-262-4177. Check one of the following:

■ The site is not in karst or potential karst. Print and enclose the map with the name and location of the site clearly marked.

☐ The Siting Atlas has indicated that the site is in karst. The upgraded concrete standards of 567 IAC 65.15(14)"c" are used:

567 IAC 65.15(14)"c." Karst terrain—upgraded standards. If the site of the proposed formed manure storage structure is located in an area that exhibits karst terrain or an area that drains into a known sinkhole, the minimum concrete standards set forth in 65.15(14)"a" or "b" shall apply. In addition, the following requirements apply to all formed manure storage structures that store nondry or dry manure:

■ (1) A minimum 5-foot vertical separation distance between the bottom of a formed manure storage structure and limestone, dolomite, or other soluble rock is required if the formed manure storage structure is not designed by a PE or an NRCS engineer.

☐ (2) If the vertical separation distance between the bottom of the proposed formed manure storage structure and limestone, dolomite, or other soluble rock is less than 5 feet, the structure shall be designed and sealed by a PE or an NRCS engineer who certifies the structural integrity of the structure and a 2-foot-thick layer of compacted clay liner material shall be constructed underneath the floor of the formed manure storage structure.

☐ (3) In addition, in an area that exhibits karst terrain or an area that drains into a known sinkhole, a PE, a Natural Resources Conservation Service(NRCS) engineer or a qualified organization shall submit a soil exploration study based on the results from soil borings or test pits to determine the vertical separation between the bottom of the formed structure and limestone, dolomite or other soluble rock. A minimum of two soil borings or two test pits, equally spaced within each formed structure, are required. After soil exploration is completed, each soil boring and pit shall be properly plugged with concrete grout, bentonite or similar materials.

[1] PE includes a professional engineer licensed in the state of Iowa or an NRCS Engineer.

[2] To determine the Animal Unit Capacity (AUC) see the "Manure Storage Indemnity Fee" (DNR Form 5424021) or the "Construction Permit Application" (DNR Form 542-1428) or contact the DNR (see page 2 for contact information).

[3] Formed manure storage structure = covered or uncovered concrete or steel tank, and concrete pit below the building.

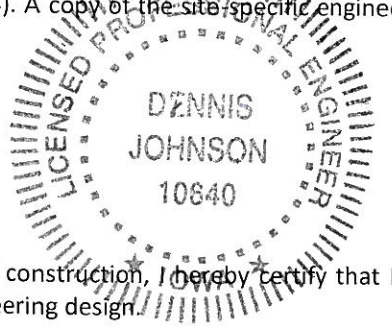
☐ (4) Groundwater monitoring shall be performed as specified by the DNR.
☐ (5) Backfilling shall not start until the floor slats have been placed or permanent bracing has been installed, and shall be performed with material free of vegetation, large rocks, or debris.

Alluvial Soils Determination: Go to www.IowaDNR.gov, select the link to "Environment" then "Mapping and GIS," then click on the AFO Siting Atlas. Click on the red push pin icon to enter a legal description of the proposed location. Make sure the alluvial box is checked in the left legend. If the site is in potential alluvial soils, if you cannot access the map, or if you have questions about this issue, contact the DNR Flood Plain section at 866-849-0321. Check one of the following:

☒ The site is not in alluvial soils. Print and enclose the map with the name and location of the site clearly marked.
☐ If the site is in alluvial soils contact the DNR Flood Plain section at 866-849-0321. You will be required to submit a petition for a declaratory order if less than 1,000 AUC or request a Flood Plain determination if 1,000 AUC or greater. Submit one of the following:
  ☐ Include correspondence from the DNR showing the site is not in the 100-year floodplain or does not require a floodplain permit.
  ☐ Include a copy of the Floodplain Permit if a floodplain permit is required.

Groundwater separation requirements: (check one of the following boxes):
☒ A drain tile shall be installed along the footings to artificially lower the groundwater table, pursuant to 65.15(7)"b".
☐ The drain tiles will have a device to allow shut off and monitoring, if the drain tiles do not have a surface outlet accessible in the property, as required in 65.15(7)"b".
☐ In lieu of the drain tile, a certification signed by a PE, a groundwater professional certified pursuant to 567 IAC Chapter 134, a qualified staff from NRCS or a qualified organization is being submitted indicating that the groundwater elevation, measured according to 567 IAC 65.15(7)"c," is below the bottom of the formed structure.

Engineer's Certification: I hereby certify that I have prepared a site-specific design for the formed manure storage structure[3](s) referenced above that complies with the minimum concrete standards of 567 IAC 65.15(14). A copy of the site-specific engineering report, plans and specifications will be available on site for the DNR's inspection.
(Include PE engineering seal, stamp, signature in contrasting color ink and date.)



2/12/15

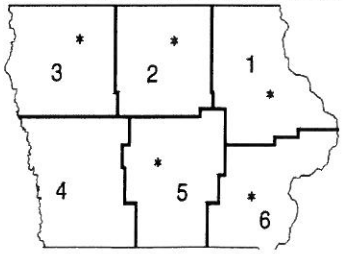
Company:	Wenck Associates, Inc.
Address:	1012 5th Avenue, Windom, MN 56101
Phone No.	507-831-2703
Fax No.	507-831-5271

Contractor's Certification If the PE will not be present on site observing critical points of construction, I hereby certify that I will construct the formed manure storage structure(s) referenced above according to the engineering design.

(Print Contractor's Name)	(Contractor's Signature)	(Date)
(Company)	209 W. South St., Tipton, IA 52772 (Address)	563-886-6196 (Phone No.)

Mailing Instructions: Mail this "PE Design Certification" according to the following:

1. Operations with an AUC between 501 and 999 AU and constructing a formed manure storage structure, required to submit a manure management plan (MMP), prior to beginning construction must file this "PE Design Certification," the karst and alluvial soils documentation requested in pages 1 and 2, the MMP and fees to the nearest DNR Field Office:



Field Office 1 909 W Main St Ste 4 Manchester, IA 52057 (563) 927-2640	Field Office 3 1900 N Grand Ave Spencer, IA 51301 (712) 262-4177	Field Office 5 7900 Hickman Rd Ste 200 Windsor Heights, IA 50324 (515) 725-0268
Field Office 2 2300 15th St SW Mason City, IA 50401 (641) 424-4073	Field Office 4 1401 Sunnyside Ln Atlantic, IA 50022 (712) 243-1934	Field Office 6 1023 W Madison Washington, IA 52353 (319) 653-2135

2. If a construction permit is required (AUC = 1,000 AU or more and constructing a formed manure storage structure), mail this form as required in the construction permit application form (DNR Form 542-1428).

If you have any questions regarding the concrete standards requirements and this PE Design Certification, contact an engineer of the AFO- Program at 712-262-4177, the nearest DNR Field Office, or visit www.IowaDNR.gov/afo.

For unpermitted and permitted confinement feeding operations

Professional Engineer[1] (PE) Design Certification

This form is to be used in lieu of a Construction Design Statement (CDS) for confinement feeding operations with an Animal Unit Capacity (AUC)[2] of more than 500 Animal Units (AU), not required to have a PE, that are constructing a formed manure storage structure[3] with a site-specific design sealed by a PE. For more information contact the Department of Natural Resources (DNR) (see page 2 for contact information).

Name of operation: Grandview Farms Facility ID No. : _____

Location: SW (¼ ¼) SW (¼) 7 (Section) T79N, R3E (Tier & Range) Sheridan (Name of Township) Scott (County)

Describe the proposed confinement feeding operation structures: 41' x 181' x 8' Deep, Belowground, Covered, Concrete Pit Foundation (Add-on to west end of existing 41' x 260' pit)

Design Certification: Pursuant to 567 Iowa Administrative Code (IAC) 65.15(14)"a" or "b", I prepared an engineering report, plans and specifications for the operation referenced above. Design considerations were in conformance with the following design methods:

American Concrete Institute (ACI):	Portland Cement Association (PCA):	MidWest Plan Service (MWPS):
☒ ACI 318	☐ EB 075	☐ MWPS 36
☐ ACI 360	☐ EB 001	☐ MWPS TR9
☐ ACI 350	☐ ISO 72	

In addition, for non-dry manure the following additional requirements of 567 IAC 65.15(14)"a"(1) will be met:

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☒ 2. Wire mesh shall not be used as primary reinforcement for a formed manure storage structure with a depth of 4 feet or more. Fiber shall not be used as reinforcement.

☒ 3. Waterstops shall be installed in all areas where fresh concrete meets hardened concrete. Waterstops shall be made of plastic, rolled bentonite or similar materials approved by the department.

☒ 4. The vertical steel of all walls shall be extended into the footing and be bent at 90° or a separate dowel shall be installed. As an alternate to the 90° bend, the dowel may be extended at least 12 inches into the footing, with a minimum concrete cover of 3 inches at the bottom. In lieu of dowels, mechanical means or alternate methods may be used as anchorage of interior walls to footings.

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[3] Formed manure storage structure = covered or uncovered concrete or steel tank, and concrete pit below the building.

☐ (4) Groundwater monitoring shall be performed as specified by the DNR.
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☒ The site is not in alluvial soils. Print and enclose the map with the name and location of the site clearly marked.
☐ If the site is in alluvial soils contact the DNR Flood Plain section at 866-849-0321. You will be required to submit a petition for a declaratory order if less than 1,000 AUC or request a Flood Plain determination if 1,000 AUC or greater. Submit one of the following:
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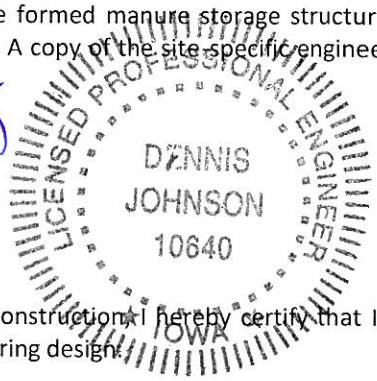
☐ In lieu of the drain tile, a certification signed by a PE, a groundwater professional certified pursuant to 567 IAC Chapter 134, a qualified staff from NRCS or a qualified organization is being submitted indicating that the groundwater elevation, measured according to 567 IAC 65.15(7)"c," is below the bottom of the formed structure.

Engineer's Certification: I hereby certify that I have prepared a site-specific design for the formed manure storage structure[3](s) referenced above that complies with the minimum concrete standards of 567 IAC 65.15(14). A copy of the site-specific engineering report, plans and specifications will be available on site for the DNR's inspection.
(Include PE engineering seal, stamp, signature in contrasting color ink and date.)



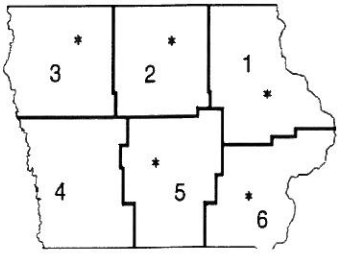
Company:	Wenck Associates, Inc.
Address:	1012 5th Avenue, Windom, MN 56101
Phone No.	507-831-2703
Fax No.	507-831-5271

Contractor's Certification If the PE will not be present on site observing critical points of construction, I hereby certify that I will construct the formed manure storage structure(s) referenced above according to the engineering design.

(Print Contractor's Name)	(Contractor's Signature)	(Date)
(Company)	209 W. South St., Tipton, IA 52772 (Address)	563-886-6196 (Phone No.)

Mailing Instructions: Mail this "PE Design Certification" according to the following:

1. Operations with an AUC between 501 and 999 AU and constructing a formed manure storage structure, required to submit a manure management plan (MMP), prior to beginning construction must file this "PE Design Certification," the karst and alluvial soils documentation requested in pages 1 and 2, the MMP and fees to the nearest DNR Field Office:



Field Office 1 909 W Main St Ste 4 Manchester, IA 52057 (563) 927-2640	Field Office 3 1900 N Grand Ave Spencer, IA 51301 (712) 262-4177	Field Office 5 7900 Hickman Rd Ste 200 Windsor Heights, IA 50324 (515) 725-0268
Field Office 2 2300 15th St SW Mason City, IA 50401 (641) 424-4073	Field Office 4 1401 Sunnyside Ln Atlantic, IA 50022 (712) 243-1934	Field Office 6 1023 W Madison Washington, IA 52353 (319) 653-2135

2. If a construction permit is required (AUC = 1,000 AU or more and constructing a formed manure storage structure), mail this form as required in the construction permit application form (DNR Form 542-1428).

If you have any questions regarding the concrete standards requirements and this PE Design Certification, contact an engineer of the AFO- Program at 712-262-4177, the nearest DNR Field Office, or visit www.IowaDNR.gov/afo.

For unpermitted and permitted confinement feeding operations

Professional Engineer[1] (PE) Design Certification

This form is to be used in lieu of a Construction Design Statement (CDS) for confinement feeding operations with an Animal Unit Capacity (AUC)[2] of more than 500 Animal Units (AU), not required to have a PE, that are constructing a formed manure storage structure[3] with a site-specific design sealed by a PE. For more information contact the Department of Natural Resources (DNR) (see page 2 for contact information).

Name of operation: Grandview Farms Facility ID No. :

Location: SW (¼ ¼) SW (¼) 7 (Section) T79N, R3E (Tier & Range) Sheridan (Name of Township) Scott (County)

Describe the proposed confinement feeding operation structures: 61' x 121' x 8' Deep, Belowground, Covered, Concrete Pit Foundation (Tear down existing 28' x 108' and build it its place)

Design Certification: Pursuant to 567 Iowa Administrative Code (IAC) 65.15(14)"a" or "b", I prepared an engineering report, plans and specifications for the operation referenced above. Design considerations were in conformance with the following design methods:

American Concrete Institute (ACI):	Portland Cement Association (PCA):	MidWest Plan Service (MWPS):
☒ ACI 318	☐ EB 075	☐ MWPS 36
☐ ACI 360	☐ EB 001	☐ MWPS TR9
☐ ACI 350	☐ IS0 72	

In addition, for non-dry manure the following additional requirements of 567 IAC 65.15(14)"a"(1) will be met:

☒ 1. The floors shall be a minimum of 5 inches thick. Nondestructive methods to verify the floor slab thickness may be required by the DNR. The results shall indicate that at least 95 percent of the floor slab area meets the minimum required thickness. In no case shall the floor slab thickness be less than 4.5 inches.

☒ 2. Wire mesh shall not be used as primary reinforcement for a formed manure storage structure with a depth of 4 feet or more. Fiber shall not be used as reinforcement.

☒ 3. Waterstops shall be installed in all areas where fresh concrete meets hardened concrete. Waterstops shall be made of plastic, rolled bentonite or similar materials approved by the department.

☒ 4. The vertical steel of all walls shall be extended into the footing and be bent at 90° or a separate dowel shall be installed. As an alternate to the 90° bend, the dowel may be extended at least 12 inches into the footing, with a minimum concrete cover of 3 inches at the bottom. In lieu of dowels, mechanical means or alternate methods may be used as anchorage of interior walls to footings.

Karst Determination: Go to www.IowaDNR.gov, select the link to "Environment" then click on Mapping and GIS, then click on the AFO Siting Atlas. Click on the red push pin icon to enter a legal description of the proposed location. Make sure the karst box is checked in the left legend. If you cannot access the map or if you have questions about this issue, contact the AFO Engineer at 712-262-4177. Check one of the following:

☒ The site is not in karst or potential karst. Print and enclose the map with the name and location of the site clearly marked.

☐ The Siting Atlas has indicated that the site is in karst. The upgraded concrete standards of 567 IAC 65.15(14)"c" are used:

567 IAC 65.15(14)"c." Karst terrain—upgraded standards. If the site of the proposed formed manure storage structure is located in an area that exhibits karst terrain or an area that drains into a known sinkhole, the minimum concrete standards set forth in 65.15(14)"a" or "b" shall apply. In addition, the following requirements apply to all formed manure storage structures that store nondry or dry manure:

☒ (1) A minimum 5-foot vertical separation distance between the bottom of a formed manure storage structure and limestone, dolomite, or other soluble rock is required if the formed manure storage structure is not designed by a PE or an NRCS engineer.

☐ (2) If the vertical separation distance between the bottom of the proposed formed manure storage structure and limestone, dolomite, or other soluble rock is less than 5 feet, the structure shall be designed and sealed by a PE or an NRCS engineer who certifies the structural integrity of the structure and a 2-foot-thick layer of compacted clay liner material shall be constructed underneath the floor of the formed manure storage structure.

☐ (3) In addition, in an area that exhibits karst terrain or an area that drains into a known sinkhole, a PE, a Natural Resources Conservation Service(NRCS) engineer or a qualified organization shall submit a soil exploration study based on the results from soil borings or test pits to determine the vertical separation between the bottom of the formed structure and limestone, dolomite or other soluble rock. A minimum of two soil borings or two test pits, equally spaced within each formed structure, are required. After soil exploration is completed, each soil boring and pit shall be properly plugged with concrete grout, bentonite or similar materials.

[1] PE includes a professional engineer licensed in the state of Iowa or an NRCS Engineer.

[2] To determine the Animal Unit Capacity (AUC) see the "Manure Storage Indemnity Fee" (DNR Form 5424021) or the "Construction Permit Application" (DNR Form 542-1428) or contact the DNR (see page 2 for contact information).

[3] Formed manure storage structure = covered or uncovered concrete or steel tank, and concrete pit below the building.

☐ (4) Groundwater monitoring shall be performed as specified by the DNR.
☐ (5) Backfilling shall not start until the floor slats have been placed or permanent bracing has been installed, and shall be performed with material free of vegetation, large rocks, or debris.

Alluvial Soils Determination: Go to www.IowaDNR.gov, select the link to "Environment" then "Mapping and GIS," then click on the AFO Siting Atlas. Click on the red push pin icon to enter a legal description of the proposed location. Make sure the alluvial box is checked in the left legend. If the site is in potential alluvial soils, if you cannot access the map, or if you have questions about this issue, contact the DNR Flood Plain section at 866-849-0321. Check one of the following:

☒ The site is not in alluvial soils. Print and enclose the map with the name and location of the site clearly marked.
☐ If the site is in alluvial soils contact the DNR Flood Plain section at 866-849-0321. You will be required to submit a petition for a declaratory order if less than 1,000 AUC or request a Flood Plain determination if 1,000 AUC or greater. Submit one of the following:
  ☐ Include correspondence from the DNR showing the site is not in the 100-year floodplain or does not require a floodplain permit.
  ☐ Include a copy of the Floodplain Permit if a floodplain permit is required.

Groundwater separation requirements: (check one of the following boxes):
☒ A drain tile shall be installed along the footings to artificially lower the groundwater table, pursuant to 65.15(7)"b".
☐ The drain tiles will have a device to allow shut off and monitoring, if the drain tiles do not have a surface outlet accessible in the property, as required in 65.15(7)"b".
☐ In lieu of the drain tile, a certification signed by a PE, a groundwater professional certified pursuant to 567 IAC Chapter 134, a qualified staff from NRCS or a qualified organization is being submitted indicating that the groundwater elevation, measured according to 567 IAC 65.15(7)"c," is below the bottom of the formed structure.

Engineer's Certification: I hereby certify that I have prepared a site-specific design for the formed manure storage structure[3](s) referenced above that complies with the minimum concrete standards of 567 IAC 65.15(14). A copy of the site-specific engineering report, plans and specifications will be available on site for the DNR's inspection.
(Include PE engineering seal, stamp, signature in contrasting color ink and date.)

LICENSED PROFESSIONAL ENGINEER
DENNIS JOHNSON 10640
IOWA

2/12/15

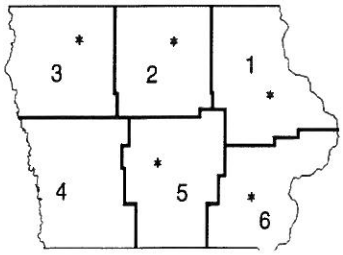
Company:	Wenck Associates, Inc.
Address:	1012 5th Avenue, Windom, MN 56101
Phone No.	507-831-2703
Fax No.	507-831-5271

Contractor's Certification If the PE will not be present on site observing critical points of construction, I hereby certify that I will construct the formed manure storage structure(s) referenced above according to the engineering design.

(Print Contractor's Name)	(Contractor's Signature)	(Date)
(Company)	209 W. South St., Tipton, IA 52772 (Address)	563-886-6196 (Phone No.)

Mailing Instructions: Mail this "PE Design Certification" according to the following:

1. Operations with an AUC between 501 and 999 AU and constructing a formed manure storage structure, required to submit a manure management plan (MMP), prior to beginning construction must file this "PE Design Certification," the karst and alluvial soils documentation requested in pages 1 and 2, the MMP and fees to the nearest DNR Field Office:



Field Office 1 909 W Main St Ste 4 Manchester, IA 52057 (563) 927-2640	Field Office 3 1900 N Grand Ave Spencer, IA 51301 (712) 262-4177	Field Office 5 7900 Hickman Rd Ste 200 Windsor Heights, IA 50324 (515) 725-0268
Field Office 2 2300 15th St SW Mason City, IA 50401 (641) 424-4073	Field Office 4 1401 Sunnyside Ln Atlantic, IA 50022 (712) 243-1934	Field Office 6 1023 W Madison Washington, IA 52353 (319) 653-2135

2. If a construction permit is required (AUC = 1,000 AU or more and constructing a formed manure storage structure), mail this form as required in the construction permit application form (DNR Form 542-1428).

If you have any questions regarding the concrete standards requirements and this PE Design Certification, contact an engineer of the AFO- Program at 712-262-4177, the nearest DNR Field Office, or visit www.IowaDNR.gov/afo.

For unpermitted and permitted confinement feeding operations

Professional Engineer[1] (PE) Design Certification

This form is to be used in lieu of a Construction Design Statement (CDS) for confinement feeding operations with an Animal Unit Capacity (AUC)[2] of more than 500 Animal Units (AU), not required to have a PE, that are constructing a formed manure storage structure[3] with a site-specific design sealed by a PE. For more information contact the Department of Natural Resources (DNR) (see page 2 for contact information).

Name of operation: Grandview Farms Facility ID No. : _____

Location: SE (¼ ¼) SE (¼) 12 (Section) T79N, R2E (Tier & Range) Hickory Grove (Name of Township) Scott (County)

Describe the proposed confinement feeding operation structures: 124' x 275' x 2' Deep, Belowground, Covered, Concrete Scraper Pit Foundation that will drain into 124' x 275' x 8' Deep, Belowground, Covered, Concrete Pit Foundation directly underneath 2' Scraper Pit

Design Certification: Pursuant to 567 Iowa Administrative Code (IAC) 65.15(14)"a" or "b", I prepared an engineering report, plans and specifications for the operation referenced above. Design considerations were in conformance with the following design methods:

American Concrete Institute (ACI):	Portland Cement Association (PCA):	MidWest Plan Service (MWPS):
☒ ACI 318	☐ EB 075	☐ MWPS 36
☐ ACI 360	☐ EB 001	☐ MWPS TR9
☐ ACI 350	☐ IS0 72	

In addition, for non-dry manure the following additional requirements of 567 IAC 65.15(14)"a"(1) will be met:

☒ 1. The floors shall be a minimum of 5 inches thick. Nondestructive methods to verify the floor slab thickness may be required by the DNR. The results shall indicate that at least 95 percent of the floor slab area meets the minimum required thickness. In no case shall the floor slab thickness be less than 4.5 inches.

☒ 2. Wire mesh shall not be used as primary reinforcement for a formed manure storage structure with a depth of 4 feet or more. Fiber shall not be used as reinforcement.

☒ 3. Waterstops shall be installed in all areas where fresh concrete meets hardened concrete. Waterstops shall be made of plastic, rolled bentonite or similar materials approved by the department.

☒ 4. The vertical steel of all walls shall be extended into the footing and be bent at 90° or a separate dowel shall be installed. As an alternate to the 90° bend, the dowel may be extended at least 12 inches into the footing, with a minimum concrete cover of 3 inches at the bottom. In lieu of dowels, mechanical means or alternate methods may be used as anchorage of interior walls to footings.

Karst Determination: Go to www.IowaDNR.gov, select the link to "Environment" then click on Mapping and GIS, then click on the AFO Siting Atlas. Click on the red push pin icon to enter a legal description of the proposed location. Make sure the karst box is checked in the left legend. If you cannot access the map or if you have questions about this issue, contact the AFO Engineer at 712-262-4177. Check one of the following:

☒ The site is not in karst or potential karst. Print and enclose the map with the name and location of the site clearly marked.

☐ The Siting Atlas has indicated that the site is in karst. The upgraded concrete standards of 567 IAC 65.15(14)"c" are used:

567 IAC 65.15(14)"c." Karst terrain—upgraded standards. If the site of the proposed formed manure storage structure is located in an area that exhibits karst terrain or an area that drains into a known sinkhole, the minimum concrete standards set forth in 65.15(14)"a" or "b" shall apply. In addition, the following requirements apply to all formed manure storage structures that store nondry or dry manure:

☒ (1) A minimum 5-foot vertical separation distance between the bottom of a formed manure storage structure and limestone, dolomite, or other soluble rock is required if the formed manure storage structure is not designed by a PE or an NRCS engineer.

☐ (2) If the vertical separation distance between the bottom of the proposed formed manure storage structure and limestone, dolomite, or other soluble rock is less than 5 feet, the structure shall be designed and sealed by a PE or an NRCS engineer who certifies the structural integrity of the structure and a 2-foot-thick layer of compacted clay liner material shall be constructed underneath the floor of the formed manure storage structure.

☐ (3) In addition, in an area that exhibits karst terrain or an area that drains into a known sinkhole, a PE, a Natural Resources Conservation Service(NRCS) engineer or a qualified organization shall submit a soil exploration study based on the results from soil borings or test pits to determine the vertical separation between the bottom of the formed structure and limestone, dolomite or other soluble rock. A minimum of two soil borings or two test pits, equally spaced within each formed structure, are required. After soil exploration is completed, each soil boring and pit shall be properly plugged with concrete grout, bentonite or similar materials.

[1] PE includes a professional engineer licensed in the state of Iowa or an NRCS Engineer.

[2] To determine the Animal Unit Capacity (AUC) see the "Manure Storage Indemnity Fee" (DNR Form 5424021) or the "Construction Permit Application" (DNR Form 542-1428) or contact the DNR (see page 2 for contact information).

[3] Formed manure storage structure = covered or uncovered concrete or steel tank, and concrete pit below the building.

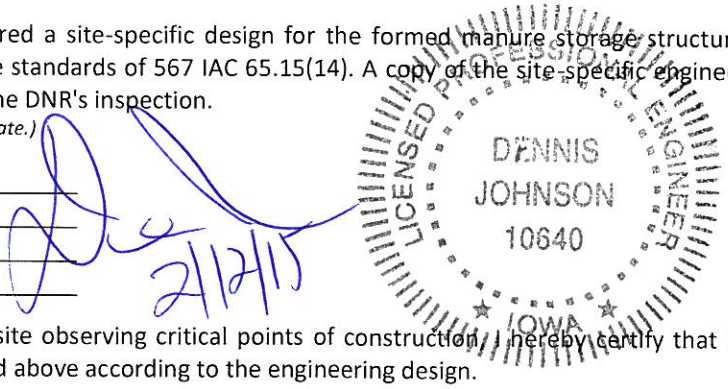
☐ (4) Groundwater monitoring shall be performed as specified by the DNR.
☐ (5) Backfilling shall not start until the floor slats have been placed or permanent bracing has been installed, and shall be performed with material free of vegetation, large rocks, or debris.

Alluvial Soils Determination: Go to www.IowaDNR.gov, select the link to "Environment" then "Mapping and GIS," then click on the AFO Siting Atlas. Click on the red push pin icon to enter a legal description of the proposed location. Make sure the alluvial box is checked in the left legend. If the site is in potential alluvial soils, if you cannot access the map, or if you have questions about this issue, contact the DNR Flood Plain section at 866-849-0321. Check one of the following:

☒ The site is not in alluvial soils. Print and enclose the map with the name and location of the site clearly marked.
☐ If the site is in alluvial soils contact the DNR Flood Plain section at 866-849-0321. You will be required to submit a petition for a declaratory order if less than 1,000 AUC or request a Flood Plain determination if 1,000 AUC or greater. Submit one of the following:
  ☐ Include correspondence from the DNR showing the site is not in the 100-year floodplain or does not require a floodplain permit.
  ☐ Include a copy of the Floodplain Permit if a floodplain permit is required.

Groundwater separation requirements: (check one of the following boxes):
☒ A drain tile shall be installed along the footings to artificially lower the groundwater table, pursuant to 65.15(7)"b".
☐ The drain tiles will have a device to allow shut off and monitoring, if the drain tiles do not have a surface outlet accessible in the property, as required in 65.15(7)"b".
☐ In lieu of the drain tile, a certification signed by a PE, a groundwater professional certified pursuant to 567 IAC Chapter 134, a qualified staff from NRCS or a qualified organization is being submitted indicating that the groundwater elevation, measured according to 567 IAC 65.15(7)"c," is below the bottom of the formed structure.

Engineer's Certification: I hereby certify that I have prepared a site-specific design for the formed manure storage structure[3](s) referenced above that complies with the minimum concrete standards of 567 IAC 65.15(14). A copy of the site-specific engineering report, plans and specifications will be available on site for the DNR's inspection.
(Include PE engineering seal, stamp, signature in contrasting color ink and date.)



Company:	Wenck Associates, Inc.
Address:	1012 5th Avenue, Windom, MN 56101
Phone No.	507-831-2703
Fax No.	507-831-5271

Contractor's Certification If the PE will not be present on site observing critical points of construction, I hereby certify that I will construct the formed manure storage structure(s) referenced above according to the engineering design.

(Print Contractor's Name)	(Contractor's Signature)	(Date)
(Company)	209 W. South St., Tipton, IA 52772 (Address)	563-886-6196 (Phone No.)

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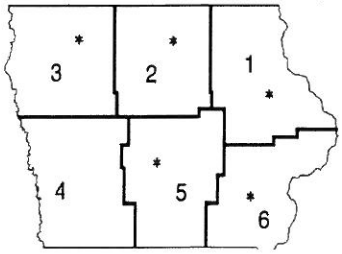

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2. If a construction permit is required (AUC = 1,000 AU or more and constructing a formed manure storage structure), mail this form as required in the construction permit application form (DNR Form 542-1428).

If you have any questions regarding the concrete standards requirements and this PE Design Certification, contact an engineer of the AFO- Program at 712-262-4177, the nearest DNR Field Office, or visit www.IowaDNR.gov/afo.

For unpermitted and permitted confinement feeding operations

Professional Engineer[1] (PE) Design Certification

This form is to be used in lieu of a Construction Design Statement (CDS) for confinement feeding operations with an Animal Unit Capacity (AUC)[2] of more than 500 Animal Units (AU), not required to have a PE, that are constructing a formed manure storage structure[3] with a site-specific design sealed by a PE. For more information contact the Department of Natural Resources (DNR) (see page 2 for contact information).

Name of operation: Grandview Farms Facility ID No. : _____

Location: SW (¼ ¼) SW (¼) 7 (Section) T79N, R3E (Tier & Range) Sheridan (Name of Township) Scott (County)

Describe the proposed confinement feeding operation structures: 51' x 241' x 8' Deep, Belowground, Covered, Concrete Pit Foundation

Design Certification: Pursuant to 567 Iowa Administrative Code (IAC) 65.15(14)"a" or "b", I prepared an engineering report, plans and specifications for the operation referenced above. Design considerations were in conformance with the following design methods:

American Concrete Institute (ACI):	Portland Cement Association (PCA):	MidWest Plan Service (MWPS):
☒ ACI 318	☐ EB 075	☐ MWPS 36
☐ ACI 360	☐ EB 001	☐ MWPS TR9
☐ ACI 350	☐ IS0 72	

In addition, for non-dry manure the following additional requirements of 567 IAC 65.15(14)"a"(1) will be met:

☒ 1. The floors shall be a minimum of 5 inches thick. Nondestructive methods to verify the floor slab thickness may be required by the DNR. The results shall indicate that at least 95 percent of the floor slab area meets the minimum required thickness. In no case shall the floor slab thickness be less than 4.5 inches.

☒ 2. Wire mesh shall not be used as primary reinforcement for a formed manure storage structure with a depth of 4 feet or more. Fiber shall not be used as reinforcement.

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☒ 4. The vertical steel of all walls shall be extended into the footing and be bent at 90° or a separate dowel shall be installed. As an alternate to the 90° bend, the dowel may be extended at least 12 inches into the footing, with a minimum concrete cover of 3 inches at the bottom. In lieu of dowels, mechanical means or alternate methods may be used as anchorage of interior walls to footings.

Karst Determination: Go to www.IowaDNR.gov, select the link to "Environment" then click on Mapping and GIS, then click on the AFO Siting Atlas. Click on the red push pin icon to enter a legal description of the proposed location. Make sure the karst box is checked in the left legend. If you cannot access the map or if you have questions about this issue, contact the AFO Engineer at 712-262-4177. Check one of the following:

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[3] Formed manure storage structure = covered or uncovered concrete or steel tank, and concrete pit below the building.

☐ (4) Groundwater monitoring shall be performed as specified by the DNR.
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Groundwater separation requirements: (check one of the following boxes):
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(Include PE engineering seal, stamp, signature in contrasting color ink and date.)

LICENSED PROFESSIONAL ENGINEER
DENNIS JOHNSON
10640
IOWA

2/12/15

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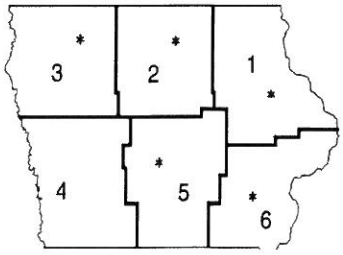
Address:	1012 5th Avenue, Windom, MN 56101
Phone No.	507-831-2703
Fax No.	507-831-5271

Contractor's Certification If the PE will not be present on site observing critical points of construction, I hereby certify that I will construct the formed manure storage structure(s) referenced above according to the engineering design.

(Print Contractor's Name)	(Contractor's Signature)	(Date)
(Company)	209 W. South St., Tipton, IA 52772 (Address)	563-886-6196 (Phone No.)

Mailing Instructions: Mail this "PE Design Certification" according to the following:

1. Operations with an AUC between 501 and 999 AU and constructing a formed manure storage structure, required to submit a manure management plan (MMP), prior to beginning construction must file this "PE Design Certification," the karst and alluvial soils documentation requested in pages 1 and 2, the MMP and fees to the nearest DNR Field Office:



Field Office 1 909 W Main St Ste 4 Manchester, IA 52057 (563) 927-2640	Field Office 3 1900 N Grand Ave Spencer, IA 51301 (712) 262-4177	Field Office 5 7900 Hickman Rd Ste 200 Windsor Heights, IA 50324 (515) 725-0268
Field Office 2 2300 15th St SW Mason City, IA 50401 (641) 424-4073	Field Office 4 1401 Sunnyside Ln Atlantic, IA 50022 (712) 243-1934	Field Office 6 1023 W Madison Washington, IA 52353 (319) 653-2135

2. If a construction permit is required (AUC = 1,000 AU or more and constructing a formed manure storage structure), mail this form as required in the construction permit application form (DNR Form 542-1428).

If you have any questions regarding the concrete standards requirements and this PE Design Certification, contact an engineer of the AFO- Program at 712-262-4177, the nearest DNR Field Office, or visit www.IowaDNR.gov/afo.

For unpermitted and permitted confinement feeding operations

Professional Engineer[1] (PE) Design Certification

This form is to be used in lieu of a Construction Design Statement (CDS) for confinement feeding operations with an Animal Unit Capacity (AUC)[2] of more than 500 Animal Units (AU), not required to have a PE, that are constructing a formed manure storage structure[3] with a site-specific design sealed by a PE. For more information contact the Department of Natural Resources (DNR) (see page 2 for contact information).

Name of operation: Grandview Farms Facility ID No. :

Location: SW (¼ ¼) SW (¼) 7 (Section) T79N, R3E (Tier & Range) Sheridan (Name of Township) Scott (County)

Describe the proposed confinement feeding operation structures: 41' x 125' x 8' Deep, Belowground, Covered, Concrete Pit Foundation (Add-on to east end of existing 41' x 260' pit)

Design Certification: Pursuant to 567 Iowa Administrative Code (IAC) 65.15(14)"a" or "b", I prepared an engineering report, plans and specifications for the operation referenced above. Design considerations were in conformance with the following design methods:

American Concrete Institute (ACI):	Portland Cement Association (PCA):	MidWest Plan Service (MWPS):
☒ ACI 318	☐ EB 075	☐ MWPS 36
☐ ACI 360	☐ EB 001	☐ MWPS TR9
☐ ACI 350	☐ IS0 72	

In addition, for non-dry manure the following additional requirements of 567 IAC 65.15(14)"a"(1) will be met:

☒ 1. The floors shall be a minimum of 5 inches thick. Nondestructive methods to verify the floor slab thickness may be required by the DNR. The results shall indicate that at least 95 percent of the floor slab area meets the minimum required thickness. In no case shall the floor slab thickness be less than 4.5 inches.

☒ 2. Wire mesh shall not be used as primary reinforcement for a formed manure storage structure with a depth of 4 feet or more. Fiber shall not be used as reinforcement.

☒ 3. Waterstops shall be installed in all areas where fresh concrete meets hardened concrete. Waterstops shall be made of plastic, rolled bentonite or similar materials approved by the department.

☒ 4. The vertical steel of all walls shall be extended into the footing and be bent at 90° or a separate dowel shall be installed. As an alternate to the 90° bend, the dowel may be extended at least 12 inches into the footing, with a minimum concrete cover of 3 inches at the bottom. In lieu of dowels, mechanical means or alternate methods may be used as anchorage of interior walls to footings.

Karst Determination: Go to www.IowaDNR.gov, select the link to "Environment" then click on Mapping and GIS, then click on the AFO Siting Atlas. Click on the red push pin icon to enter a legal description of the proposed location. Make sure the karst box is checked in the left legend. If you cannot access the map or if you have questions about this issue, contact the AFO Engineer at 712-262-4177. Check one of the following:

☒ The site is not in karst or potential karst. Print and enclose the map with the name and location of the site clearly marked.

☐ The Siting Atlas has indicated that the site is in karst. The upgraded concrete standards of 567 IAC 65.15(14)"c" are used:

567 IAC 65.15(14)"c." Karst terrain—upgraded standards. If the site of the proposed formed manure storage structure is located in an area that exhibits karst terrain or an area that drains into a known sinkhole, the minimum concrete standards set forth in 65.15(14)"a" or "b" shall apply. In addition, the following requirements apply to all formed manure storage structures that store nondry or dry manure:

☒ (1) A minimum 5-foot vertical separation distance between the bottom of a formed manure storage structure and limestone, dolomite, or other soluble rock is required if the formed manure storage structure is not designed by a PE or an NRCS engineer.

☐ (2) If the vertical separation distance between the bottom of the proposed formed manure storage structure and limestone, dolomite, or other soluble rock is less than 5 feet, the structure shall be designed and sealed by a PE or an NRCS engineer who certifies the structural integrity of the structure and a 2-foot-thick layer of compacted clay liner material shall be constructed underneath the floor of the formed manure storage structure.

☐ (3) In addition, in an area that exhibits karst terrain or an area that drains into a known sinkhole, a PE, a Natural Resources Conservation Service(NRCS) engineer or a qualified organization shall submit a soil exploration study based on the results from soil borings or test pits to determine the vertical separation between the bottom of the formed structure and limestone, dolomite or other soluble rock. A minimum of two soil borings or two test pits, equally spaced within each formed structure, are required. After soil exploration is completed, each soil boring and pit shall be properly plugged with concrete grout, bentonite or similar materials.

[1] PE includes a professional engineer licensed in the state of Iowa or an NRCS Engineer.

[2] To determine the Animal Unit Capacity (AUC) see the "Manure Storage Indemnity Fee" (DNR Form 5424021) or the "Construction Permit Application" (DNR Form 542-1428) or contact the DNR (see page 2 for contact information).

[3] Formed manure storage structure = covered or uncovered concrete or steel tank, and concrete pit below the building.

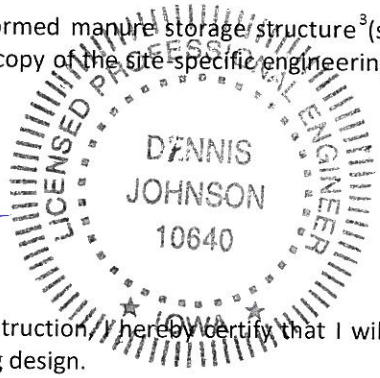
☐ (4) Groundwater monitoring shall be performed as specified by the DNR.
☐ (5) Backfilling shall not start until the floor slats have been placed or permanent bracing has been installed, and shall be performed with material free of vegetation, large rocks, or debris.

Alluvial Soils Determination: Go to www.IowaDNR.gov, select the link to "Environment" then "Mapping and GIS," then click on the AFO Siting Atlas. Click on the red push pin icon to enter a legal description of the proposed location. Make sure the alluvial box is checked in the left legend. If the site is in potential alluvial soils, if you cannot access the map, or if you have questions about this issue, contact the DNR Flood Plain section at 866-849-0321. Check one of the following:

■ The site is not in alluvial soils. Print and enclose the map with the name and location of the site clearly marked.
☐ If the site is in alluvial soils contact the DNR Flood Plain section at 866-849-0321. You will be required to submit a petition for a declaratory order if less than 1,000 AUC or request a Flood Plain determination if 1,000 AUC or greater. Submit one of the following:
  ☐ Include correspondence from the DNR showing the site is not in the 100-year floodplain or does not require a floodplain permit.
  ☐ Include a copy of the Floodplain Permit if a floodplain permit is required.

Groundwater separation requirements: (check one of the following boxes):
■ A drain tile shall be installed along the footings to artificially lower the groundwater table, pursuant to 65.15(7)"b".
☐ The drain tiles will have a device to allow shut off and monitoring, if the drain tiles do not have a surface outlet accessible in the property, as required in 65.15(7)"b".
☐ In lieu of the drain tile, a certification signed by a PE, a groundwater professional certified pursuant to 567 IAC Chapter 134, a qualified staff from NRCS or a qualified organization is being submitted indicating that the groundwater elevation, measured according to 567 IAC 65.15(7)"c," is below the bottom of the formed structure.

Engineer's Certification: I hereby certify that I have prepared a site-specific design for the formed manure storage structure[3](s) referenced above that complies with the minimum concrete standards of 567 IAC 65.15(14). A copy of the site-specific engineering report, plans and specifications will be available on site for the DNR's inspection.
(Include PE engineering seal, stamp, signature in contrasting color ink and date.)



2/12/15

Company:	Wenck Associates, Inc.
Address:	1012 5th Avenue, Windom, MN 56101
Phone No.	507-831-2703
Fax No.	507-831-5271

Contractor's Certification If the PE will not be present on site observing critical points of construction, I hereby certify that I will construct the formed manure storage structure(s) referenced above according to the engineering design.

(Print Contractor's Name)	(Contractor's Signature)	(Date)
(Company)	209 W. South St., Tipton, IA 52772 (Address)	563-886-6196 (Phone No.)

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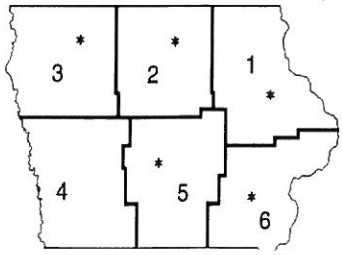

Field Office 1 909 W Main St Ste 4 Manchester, IA 52057 (563) 927-2640	Field Office 3 1900 N Grand Ave Spencer, IA 51301 (712) 262-4177	Field Office 5 7900 Hickman Rd Ste 200 Windsor Heights, IA 50324 (515) 725-0268
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If you have any questions regarding the concrete standards requirements and this PE Design Certification, contact an engineer of the AFO- Program at 712-262-4177, the nearest DNR Field Office, or visit www.IowaDNR.gov/afo.

Facility and Support Services
600 West 4th Street
Davenport, Iowa 52801-1003
fss @ scottcountyiowa.com
(563) 326-8738 Voice (563) 328-3245 Fax

February 18, 2015

To: Dee F. Bruemmer
County Administrator

From: Dave Donovan, Director
Facility and Support Services

Subj: Design Contract for Phase 3 and 4 of the Courthouse Renovation Project

I am in receipt of a proposal for architectural and engineering design services from Wold Architects and Engineers for Phase 3 and 4 of the 1st Floor Courthouse Renovation Project. As you recall, several years ago, the Board selected Wold to complete the design work for the entire first floor of the Courthouse. At that time, the Board had decided to only award Phase 1 and 2 of the design, due to the uncertainty of the timing of the Phase 3 and 4 project. Since then, Wold has provided design services and is providing contract administration for the Phase 1 and 2 project, currently in progress. We are pleased with their work thus far and our project design team has high confidence in their ability to deliver projects that meet our needs with good value and project outcomes.

Wold has proposed a fixed fee contract of 7.5% of the estimated total construction cost, or $234,000, plus reimbursable expenses. Our experience indicates that is a reasonable fee for this type of design work.

As you also recall, this project includes several smaller project needs in the Courthouse including: the relocation/consolidation of the server and network rooms, replacement of the main electrical switchgear and service for the building, replacement of all remaining exterior windows and reconfiguring or replacing exterior emergency egress doors.

The preliminary budget for the project is estimated at:

General Construction	$2,971,375.00
Construction Contingency	$297,137.00
A/E Fees	$234,000.00
Misc. Costs	$63,137.00
FFE	$297,137.00
Project Total	$3,862,786.00

I am certain that estimate will be revised and refined as we get further into design. It is based on a preliminary schematic design that was completed as we began work on the Phase 1 and 2 design. I would consider that estimate a not-to-exceed target figure at this point. The total amount budgeted in the five year CIP plan for this project is $4,165,000.00.

The preliminary schedule for the project is:

Schematic Design / Design Development	March-May 2015
Construction Documents	June-August 2015
Approval Project Plans (Board Action)	August 2015
Bidding	September 2015
Award of Constr Contract (Board Action)	Sept-Oct 2015
Construction Activity	Oct 2015 – Sept 2016

The completion of this project will mark the completion of the short term recommendations from the Master Plan for the Courthouse Building. The Seventh Judicial District has expressed to me (on numerous occasions) their appreciation for the current project underway (Phase 1 and 2) as well as for the budget commitment from the Board for the Phase 3 and 4 project. They are very supportive of this project and are eager to participate in the planning and design process for this next project. I will be at the next Committee of the Whole meeting to discuss this proposal further and to answer any questions that you or the Board may have.

CC: Chief Judge Marlita Greve
Kathy Gaylord, Court Administrator
FSS Management Team
Matt Hirst

THE COUNTY AUDITOR'S SIGNATURE CERTIFIES THAT THIS RESOLUTION HAS BEEN FORMALLY APPROVED BY THE BOARD OF SUPERVISORS ON _____.
DATE

SCOTT COUNTY AUDITOR

R E S O L U T I O N

SCOTT COUNTY BOARD OF SUPERVISORS

February 26, 2015

A RESOLUTION APPROVING THE AWARD OF CONTRACT FOR THE COURTHOUSE PHASE 3 AND 4 PROJECT TO WOLD ARCHITECTS AND ENGINEERS IN THE AMOUNT OF $234,000 PLUS REIMBURSABLE EXPENSES.

BE IT RESOLVED BY the Scott County Board of Supervisors as follows:

Section 1. That the proposal from Wold Architects and Engineers for design services for the Courthouse Phase 3 and 4 project is hereby approved and awarded in the amount of $234,000 plus reimbursable expenses.

Section 2. That Facility and Support Services Director is hereby authorized to sign contract documents on behalf of the Board of Supervisors.

Section 3. This resolution shall take effect immediately.

OFFICE OF THE COUNTY ADMINISTRATOR
600 West Fourth Street
Davenport, Iowa 52801-1003

Office: (563) 326-8702
Fax: (563) 328-3285
www.scottcountyiowa.com

Item 06
02-24-15

February 17, 2015

TO: Dee F. Bruemmer, County Administrator

FROM: David Farmer, Budget Manager

RE: FY15 Budget Amendment

Please find attached the resolution to approve the FY15 Budget Amendment. The public hearing was held on Thursday, February 12, 2015 and advanced notice of the hearing was published according to state law in the two official County newspapers.

THE COUNTY AUDITOR'S SIGNATURE CERTIFIES THAT THIS RESOLUTION HAS BEEN FORMALLY APPROVED BY THE BOARD OF SUPERVISORS ON _____.
DATE

SCOTT COUNTY AUDITOR

R E S O L U T I O N

SCOTT COUNTY BOARD OF SUPERVISORS

February 26, 2015

APPROVING A BUDGET AMENDMENT TO THE FY15 COUNTY BUDGET

BE IT RESOLVED BY the Scott County Board of Supervisors as follows:

Section 1. A budget amendment to the current FY15 County Budget as presented by the County Administrator is hereby approved as follows:

SERVICE AREA	FY15 AMENDMENT AMOUNT
Public Safety and Legal Services	$120,153
Physical Health and Social Services	($33,686)
Mental Health, MR & DD	($818,648)
County Environment and Education	$127,942
Roads and Transportation	$98,000
Government Services to Residents	$91,489
Administration	$158,304
Nonprogram Current	$150,000
Debt Service	$1,025
Capital Projects	($209,632)
Operating Transfers Out	$4,090,000

Section 2. This resolution shall take effect immediately.

OFFICE OF THE COUNTY ADMINISTRATOR
600 West Fourth Street
Davenport, Iowa 52801-1003

Office: (563) 326-8702
Fax: (563) 328-3285
www.scottcountyiowa.com

Item 07
02-24-15

February 17, 2015

TO: Dee F. Bruemmer, County Administrator

FROM: David Farmer, Budget Manager

RE: FY16 Budget Adoption

Please find attached the resolution to approve the FY16 Budget Adoption. The public hearing was held on Thursday, February 12, 2015 and advanced notice of the hearing was published according to state law in the two official County newspapers.

THE COUNTY AUDITOR'S SIGNATURE CERTIFIES THAT THIS RESOLUTION HAS BEEN FORMALLY APPROVED BY THE BOARD OF SUPERVISORS ON _____.
DATE

SCOTT COUNTY AUDITOR

R E S O L U T I O N

SCOTT COUNTY BOARD OF SUPERVISORS

February 26, 2015

ADOPTING THE FY16 COUNTY BUDGET IN THE AMOUNT OF $81,849,435 AND THE COUNTY'S FY 16 CAPITAL BUDGET AND FY17-20 CAPITAL PROGRAM.

BE IT RESOLVED BY the Scott County Board of Supervisors as follows:

Section 1. The FY16 County Budget as presented by the County Administrator and as reviewed and considered by this Board is hereby adopted in the amount of $81,849,435 (which includes the Golf Course Enterprise Fund in the amount of $1,073,648, a non-budgeted fund for State certification purposes).

Section 2. The total amount of service area:

Service Area	Amount
Public Safety & Legal Services	$29,301,561
Physical Health & Social Services	5,962,415
Mental Health, MR & DD	7,918,096
County Environment & Education	5,080,532
Roads & Transportation	5,991,000
Government Services to Residents	2,535,390
Administration (interprogram)	10,963,015
Subtotal Operating Budget	$67,752,009
Debt Service	3,608,943
Capital Projects	9,414,835
Subtotal County Budget	$80,775,787
Golf Course Operations	1,073,648
TOTAL	$81,849,435

Section 3. The FY16 capital budget and FY17-20 capital program is hereby adopted.

Section 4. The County Auditor is hereby directed to properly certify the budget as adopted and file with the records of her office and that of the State Department of Management as required by law.

Section 5. This resolution shall take effect immediately.

Item 08
02-24-15

SCOTT COUNTY ENGINEER'S OFFICE
500 West Fourth Street
Davenport, Iowa 52801-1106

(563) 326-8640
FAX – (563) 326-8257
E-MAIL - engineer@scottcountyiowa.com
WEB SITE - www.scottcountyiowa.com

JON R. BURGSTRUM, P.E.
County Engineer

ANGELA K. KERSTEN, P.E.
Assistant County Engineer

MEMO

TO: Dee F. Bruemmer
County Administrator

FROM: Jon Burgstrum
County Engineer

SUBJ: Approval of the FY 15-16 Operating Budget and 5 Year Construction Program

DATE: February 26, 2015

The Iowa Code requires the Board of Supervisors to approve the Secondary Road annual budget and five year construction program by resolution and submit it by April 15th to the Iowa Department of Transportation for their approval. The Secondary Road budget and program is part of the overall budget and capital program of the County and is included in those documents on the county website and as the public document filed in the Auditor's Office.

THE COUNTY AUDITOR'S SIGNATURE CERTIFIES THAT THIS RESOLUTION HAS BEEN FORMALLY APPROVED BY THE BOARD OF SUPERVISORS ON _____.
DATE

_____
SCOTT COUNTY AUDITOR

R E S O L U T I O N

SCOTT COUNTY BOARD OF SUPERVISORS

FEBRUARY 26, 2015

APPROVAL OF FY 2015/2016 SECONDARY ROAD OPERATING BUDGET AND FIVE YEAR CONSTRUCTION PROGRAM AND AUTHORIZING ITS SUBMITTAL TO THE Iowa DOT

BE IT RESOLVED by the Scott County Board of Supervisors as follows:

Section 1. That in accordance with Section 309.93 and Section 309.22 Code of Iowa, 2012, the FY 2015/2016 Secondary Road Budget and Five Year and Construction Program as set forth in detail is hereby adopted and that same be submitted to the Iowa Department of Transportation for their approval.

Section 2. That the Chairman be authorized to sign the budget and program documents on behalf of the Board.

Section 3. That this resolution shall take effect immediately.

HUMAN RESOURCES DEPARTMENT
600 W. 4TH Street
Davenport, IA 52801

Office: (563) 326-8767
Fax: (563) 328-3285
www.scottcountyiowa.com

Date: February 17, 2015

To: Dee F. Bruemmer, County Administrator

From: Mary J. Thee, Human Resources Director/Asst. County Administrator

Subject: FY16 Organizational Changes

Review of Organizational Change requests

The following organizational change requests were submitted as part of the budget process for Fiscal Year 2016. These positions were reviewed by the Hay Committee for potential reclassification.

- Operations Manager (FSS)
- Adminstrative Office Assistant (Health)
- Classification Specialist (Sheriff's Office)

The following organizational change requests were submitted at part of the budget process for Fiscal Year 2016. Departments have requested a change in FTE (full time equivalent) level for these positions or the creation of new positions.

- Attorney I (Attorney) (+1.0 FTE)
- Official Record Clerk (Auditor) (+0.1)
- Clerk III (Planning)(+0.5 FTE)
- Chief Building Inspector (Planning and Development) (+1.0 FTE)
- Clerk III (Sheriff's Office) (+ 0.4 FTE)
- Senior Accounting Clerk (Sheriff's Office) (Increase Inmate Services Clerk to share duties)

Discussion

For the positions that are requesting a Hay Committee review, the departments completed the job questionnaire and noted changes in the job description, then Human Resources met with the departments as necessary and provided feedback on the review of the position descriptions. Human Resources staff then updated the job descriptions to reflect the changes in duties. Final

approval of the job descriptions were obtained by the incumbent and their Elected Official or Department Head. The Hay Committee then met and reviewed each job description.

For departments requesting a change in FTE level, staff met with the affected groups to determine the business necessity for the change in FTE level. In order to determine the appropriateness of the request the factors considered are increased volume of work, greater efficiencies, and change in key personnel.

Hay Committee Recommendation

The Hay Committee met on January 13, 2015 to review the positions submitted as Organizational Change requests. After reviewing the position of *Jail Classification Specialist* (Sheriff) the Hay Committee did not recommend any changes to its Hay Points. The general consensus was that although some job duties had changed they were not the type of duties that when analyzed had an affect on the overall Hay score. The job description will be updated to reflect those changes. The Committee recommends the following changes:

FSS

Operations Manager. The Committee reviewed the revised job description for the consideration. The Committee felt that the position was not adequately compensated due to the fact that it supervises other supervisors. In scoring the position there was no recommendation for adjustments related to the budgetary authority. The recommendation after reviewing the position was to establish the Hay points from at 462, resulting in a pay range of $57,657 (minimum), $67,849 (midpoint) to $78,020 (maximum).

Health

Administrative Office Assistant. The Committee reviewed the revised job description for the consideration. The Committee felt that the increased responsibilities of the position related to grant management and Medicaid funding warranted an increase in the Hay points. The recommendation after reviewing the position was to establish the Hay points at 271, resulting in a pay range of $41,662 (minimum), $49,025 (midpoint) to $56,368 (maximum).

Budgetary Requests

Attorney I (Attorney)

The Attorney's Office has requested an additional Attorney to address the increasing case load of the office. They have made a formal presentation to the Board during the budgeting process. The anticipated costs of the salary and benefits is $84,197.

Official Records Clerk (Auditor)

The Auditor has requested the Official Records Clerk's hours be increased by 0.1 FTE. The position is currently at 0.9 FTE or 1,872 hours annually. In the FY14 the position worked 2,007.2 hours and through December 31, 2014 has worked 136.35 hours over the half year allotment. The additional hours are being absorbed in Elections.

Clerk III (Planning and Development)

In FY15 the Board approved the elimination their 0.25 FTE Clerk III, along with the 0.25 FTE Clerk III, in the Secondary Roads Department. It was done in anticipation of Secondary Roads moving to the Black Hawk Trail location, which has yet to occur. However, upon further review of the staffing needs it has been determined that the department does require clerical assistance and the recommendation is to add the 0.5 FTE Clerk III into the budget, all in Planning and Development.

Chief Building Inspector (Planning and Development)

The department requested an additional full-time Chief Building Inspector to address the increased housing inspections. Additional cost of the position including benefits is approximately $85,000. After budgetary review it is not recommended to proceed with this request at this time.

Clerk III (Sheriff's Office)

In FY14 the hours of the Clerk III were increase from 0.5 FTE (1,040) to 0.6 FTE (1,248 hours). The request is to increase the hours by 0.4 FTE, thereby making it a full-time position. That would impact the budget by $31,335. After discussions with the Sheriff's office the decision was to remain at the current FTE level.

Senior Accounting Clerk (Sheriff's Office)

The request to increase the Inmate Services Clerk's Hay points to the level of the Senior Accounting Clerk so that the two could share duties. The Inmate Services Clerk is cross trained so that when the Senior Accounting Clerk is out of the office the work is completed in a timely fashion and the Inmate Services Clerk is compensated by receiving "step up" pay. Therefore the recommendation is to leave the positions at their current skill level and appropriate pay levels.

Review of Table of Organization

As we have in previous years, the Budget Manager and HR have worked with departments to review and correct the table of organization to coincide with actual numbers. This will assist in the position control module that will be available in the new financial software system. These are the corrections being addressed this year.

Detention Youth Counselor (JDC)

The Juvenile Detention Center utilzes part-time hours to cover weekend, vacation and absences of Detention Youth Counselors. These postions are paid at the

entry level of the postion and are not eligible for merit increases. The hours for these positions are budgeted but not reflected in the table of organization. In FY13 the hours were adjusted to add 0.8 FTE however it was not updated in ZIM thus did not translate over to Logos. This correction will be reflected in the upcoming fiscal year.

Proposed Action

The overall first year costs are $117,256, as itemized in the attached spreadsheet. The new job descriptions are also attached for the Board's review and infromation. It is recommended that these changes take effect July 1, 2015, in accordance with the budget submissions.

Cc: Hay Committee

Org Changes FY16

Position	Current Hay	Proposed Hay	FTE Change	Current Salary	New Salary	Additional Salary	Benefits[1]	Total
Operations Manager - FSS	417	462	0	$72,925	$76,565	$3,640	$604	**$4,244**
Administrative Office Assistant - Health	252	271	0	$54,225	$56,937	$2,712	$450	**$3,162**
Attorney I - Attorney	464	464	1	$57,844	$57,844	$57,844	$26,353	**$84,197**
Clerk III - Planning	162	162	0.5			$22,006	$3,649	**$25,655**
Total			**1.5**			$86,202	$31,054	**$117,256.29**

Notes:

1. Benefits includes IPERS & FICA

THE COUNTY AUDITOR'S SIGNATURE CERTIFIES THAT THIS RESOLUTION HAS BEEN FORMALLY APPROVED BY THE BOARD OF SUPERVISORS ON _____.
DATE

SCOTT COUNTY AUDITOR

R E S O L U T I O N

SCOTT COUNTY BOARD OF SUPERVISORS

February 26, 2015

APPROVAL OF CLASSIFICATION AND STAFFING ADJUSTMENTS AS DISCUSSED DURING THE FISCAL YEAR 2016 BUDGET REVIEW PROCESS

BE IT RESOLVED BY the Scott County Board of Supervisors as follows:

Section 1. That the table of organization for the Attorney's Office increased by 1.00 FTE (total 10 FTE to reflect the addition of an Attorney I.

Section 2. In the FSS Department the position of Operations Manager (1.0 FTE) is hereby upgraded from 417 to 462 Hay points.

Section 3. In the Health Department the position of Administrative Office Assistant (1.0 FTE) is hereby upgraded from 252 to 271 Hay points.

Section 4. That the table of organization for Planning and Development Department be increased by 0.5 FTE to reflect the decision to maintain the position of Clerk III, that was previously shared by Planning and Development and Secondary Roads and elimination was anticipated last fiscal year.

Section 5. This resolution shall take effect July 1, 2015.

Item 10
02-24-15

THE COUNTY AUDITOR'S SIGNATURE CERTIFIES THAT
THIS RESOLUTION HAS BEEN FORMALLY APPROVED BY
THE BOARD OF SUPERVISORS ON _____
DATE

_____
SCOTT COUNTY AUDITOR

R E S O L U T I O N

SCOTT COUNTY BOARD OF SUPERVISORS

February 26, 2015

APPROVAL OF SALARY RATE TABLE FOR FY 2015-2016 Z-SCHEDULE OF TEMPORARY AND PART-TIME STAFF

BE IT RESOLVED by the Scott County Board of Supervisors as follows:

Section 1. The following salary rate table for z-schedule temporary and part-time staff in fiscal year 2015-2016 is hereby approved:

Health Intern & Planning Intern	$9.90 to $12.58/hour depending on skills, education and experience
Enforcement Aide	$9.90 to $18.65/hour depending on skills, education and experience
Seasonal Maintenance Worker (Roads)	$11.97/hour
Summer Law Clerk	Set in cooperation with University Programs
Civil Service Secretary	Set by Civil Service Commission
Mental Health Advocate	Set by Chief Judge
Health Services Professional	
Immunization Clinic/Jail Health	
LPN	$20.02/hour
RN/EMT-P	$23.62/hour
Election Officials	$7.92/hour
Election Chairpersons	$8.71/hour
Election Clerk	$13.33/hour

CONSERVATION: *

Glynns Creek:	
Seasonal part-time Golf Managers	
Food Service	$8.75 - $10.50/hour
Pro Shop	$9.75 - $12.50/hour
Seasonal Golf Pro Shop Personnel	$7.50 - $11.75/hour
Golf Course Rangers, Starters, Cart Persons	$7.50 - $10.00/hour
Concession Stand Workers	$7.50 - $10.25/hour
Groundskeepers	$7.50 - $11.25/hour
Scott County & West Lake Parks:	
Beach Manager	$11.25 - $16.25/hour
Pool Manager	$11.25 - $16.25/hour
Assistant Beach/Pool Managers	$9.00 - $11.75/hour
Water Safety Instructors	$8.00 - $10.00/hour
Pool/Beach Lifeguards	$7.50 - $9.00/hour
Pool/Beach/Boathouse - Concession Workers	$7.50 - $8.75/hour
Park Attendant	$7.50 - $11.25/hour
Maintenance	$7.50 - $10.25/hour
Skilled Maintenance	$9.00 - $11.75/hour
Park Patrol (non-certified)	$12.00 - $16.50/hour
(certified)	$15.00 - $17.00/hour
Pioneer Village:	
Day Camp Counselors	$7.50 - $9.75/hour
Apothecary Shop Concession Workers	$7.50 - $9.75/hour
Maintenance/Resident Caretaker	$9.00- $11.75/hour
Wapsi Center:	
Assistant Naturalist	$10.00 - $12.75/hour
Maintenance / Resident Caretaker	$10.75 - $11.75/hour
Cody Homestead:	
Attendants/Concession Workers	$7.50 - $11.25/hour

* Set by Scott County Conservation Board

Section 2. This resolution shall take effect July 1, 2015.

Item 11
02-24-15

THE COUNTY AUDITOR'S SIGNATURE CERTIFIES THAT THIS RESOLUTION HAS BEEN FORMALLY APPROVED BY THE BOARD OF SUPERVISORS ON _____.
DATE

SCOTT COUNTY AUDITOR

R E S O L U T I O N

SCOTT COUNTY BOARD OF SUPERVISORS

February 26, 2015

APPROVAL OF ADJUSTMENT IN SALARY FOR NON-REPRESENTED COUNTY EMPLOYEES FOR FISCAL YEAR 2016

BE IT RESOLVED BY the Scott County Board of Supervisors as follows:

Section 1. The salary ranges for County positions included in the Non-represented group shall be adjusted on July 1, 2015 by increasing the salary range midpoint by two and a half percent (2.5%).

Section 2. For the purpose of determining an hourly rate of pay for the Non-represented group, the annual base salary shall be divided by 2,080 hours.

Section 3. This resolution shall take effect July 1, 2015.

ZAMORA, TAYLOR, WOODS & FREDERICK

Attorneys at Law
An Association of Sole Practitioners

Item 12
02-24-15

Patricia Zamora
Cynthia Z. Taylor
Michael A. Woods
Christine Frederick

125 Kirkwood Blvd.
Davenport, Iowa 52803
Phone: (563) 323-7007
Fax: (563) 323-8335

January 7, 2015

Chairman Tom Sunderbruch
Scott County Board of Supervisors
600 W. 4th Street
Davenport, IA 52801

Re: Findings of the Scott County Compensation Board

Dear Mr. Minard and Board of Supervisors:

As Chairman of the Scott County Compensation Board, I am writing to inform you of the Compensation Board's recommendations for salaries based on our meeting held on December 19, 2014. For the fiscal year 2015-2016, the proposed salaries for the upcoming year are as follows:

Auditor	(1.5%)	$ 83,100
County Attorney	(1.5%)	$143,700
Recorder	(1.5%)	$ 83,100
Sheriff	(1.5%)	$108,100
Treasurer	(1.5%)	$ 83,100
Board Member, Board of Supervisors	(1.5%)	$ 41,700
Chair, Board of Supervisors	(1.5%)	$ 44,700

The Board, after consideration of comparable salaries of various elected officials, determined as its recommendation, the above salaries and their percentage increase rounded up to the nearest $100 as set forth above.

Please contact me with any questions.

Sincerely,

Patt Zamora

Patt Zamora

THE COUNTY AUDITOR'S SIGNATURE CERTIFIES THAT THIS RESOLUTION HAS BEEN FORMALLY APPROVED BY THE BOARD OF SUPERVISORS ON _____.
DATE

SCOTT COUNTY AUDITOR

R E S O L U T I O N

SCOTT COUNTY BOARD OF SUPERVISORS

February 26, 2015

APPROVAL OF FISCAL YEAR 2016 COMPENSATION SCHEDULE FOR COUNTY ELECTED OFFICIALS AND DEPUTY OFFICE HOLDERS

BE IT RESOLVED BY the Scott County Board of Supervisors as follows:

Section 1. The Fiscal Year 2016 salary schedule for Elected County Officials as recommended by the Scott County Compensation Board is hereby approved as follows:

Position	Annual Salary (effective 7/1/15)
Auditor	$ 83,100
County Attorney	$143,700
Recorder	$ 83,100
Sheriff	$108,100
Treasurer	$ 83,100
Board Member, Board of Supervisors	$ 41,700
Chair, Board of Supervisors	$ 44,700

Section 2. The Fiscal Year 2016 salary schedule for Deputy Office Holders is hereby approved as follows:

Position	Annual Salary (effective 7/1/15)
Deputy Auditor – Tax (75%)	$ 62,325

First Assistant Attorney (85%)	$122,145
Second Deputy Recorder (85%)	$ 70,635
Chief Deputy Sheriff (85%)	$ 91,885

Section 3. It is understood that in those positions referenced herein are salaried employees and are not paid by the hour.

Section 4. This resolution shall take effect July 1, 2015.

OFFICE OF THE COUNTY ADMINISTRATOR
600 West Fourth Streets
Davenport, Iowa 52801-1030

Office: (563) 326-8702
Fax: (563) 328-3285
www.scottcountyiowa.com

February 17, 2015

TO: Dee F. Bruemmer, County Administrator

FROM: Renee Johnson, Administrative Assistant

SUBJECT: Board Member Visits with County Departments

It is time again to set up the Board member visits with departments. During this visit, Board members will informally meet with employees in departments for a couple of hours. The visit may entail visiting 1, 2 or more employees depending on the arrangements scheduled by the appropriate department head.

Pending the Board's approval, the following departments will be contacted to arrange a time and date for the visit: Auditor, Conservation, Health, Human Resources, and Secondary Roads

Item 14
02-24-15

OFFICE OF THE COUNTY ADMINISTRATOR
600 West Fourth Street
Davenport, Iowa 52801-1030

Office: (563) 326-8702
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www.scottcountyiowa.com

February 24, 2015

TO: Board of Supervisors

FROM: Renee Johnson, Administrative Assistant

SUBJECT: Special Committee of the Whole Meetings for the Spring

It is time again to schedule meetings with authorized agencies. Pending your review, I would like to schedule these meetings for the Tuesday mornings of April 21st, 28th and May 5th. (April 21st and May 5th would start immediately after the regularly scheduled Committee of the Whole meeting.)

1. 7th Judicial District Correctional Services
2. Bi-State Regional Commission
3. Community Action of Eastern Iowa
4. DHS Targeted Case Management
5. EMA
6. GDRC
7. Humane Society
8. Iowa Waste Commission
9. Iowa Works
10. Medic
11. Mississippi Valley Fairgrounds
12. QC First
13. Quad Cities Convention and Visitors Bureau
14. Riverbend Transit
15. Scott County Kids- Decategorization and Early Childhood
16. Scott Soil Conservation/Watershed Partners
17. SECC

If you would like any of these meetings at *their* location, please let me know and I will make those arrangements.

In addition, I will be scheduling meetings with the following agencies during their regularly scheduled Board meeting times: CADS (Tuesday, May 12th 6:00 pm) CASI, CHC, and County Library (Tuesday, May 26th at 7:00).

If you have any questions, please let me know.