



BOARD DECISION

RFR 2018-03/ RA17047

In Consideration of Requests for Board Review filed under the *Agricultural Operation Practices Act* in relation to Decision Summary RA17047

H.E. Livestock Inc.

January 31, 2018

Background

On December 18, 2018, NRCB Approval Officer Francisco Echegaray issued Decision Summary RA17047 in relation to the confined feeding operation (CFO) proposed by H.E. Livestock Inc. (H.E. Livestock) at NE 7-42-25 W4M in Ponoka County. H.E. Livestock sought registration for a new 300 head beef finisher CFO. The proposed CFO includes the construction of a livestock barn and a manure storage pad. The approval officer considered this application in Decision Summary RA17047 and issued a registration with conditions.

Pursuant to section 22(4) of the *Agricultural Operation Practices Act (AOPA)*, Requests for Board Review (RFRs) of Decision Summary RA17047 were filed by directly affected parties Laura Bluck, Rachele Foley, Linda Cunnington and Greg Hagemann.

Following receipt of the RFRs, all parties were provided with copies of the requests, and notified of the Board's intent to meet and deliberate on this matter. Directly affected parties with an adverse interest to the matters raised in the RFRs were provided the opportunity to make a rebuttal submission in response. The Board did not receive any submissions that met the January 18, 2018 filing deadline for rebuttal submissions.

Jurisdiction

The Board's authority for granting a review of an approval officer's decision is found in section 25(1) of AOPA, which states:

- 25(1) The Board must, within 10 working days of receiving an application under section 20(5), 22(4) or 23(3) and within 10 working days of the Board's determination under section 20(8) that a person or organization is a directly affected party,*
- (a) dismiss the application for review, if in the opinion of the Board, the issues raised in the application for review were adequately dealt with by the approval officer or the issues raised are of little merit, or*
- (b) schedule a review.*

The Board considers that a party requesting a review has the onus of demonstrating that there are sufficient grounds to merit review of the approval officer's decision. Section 13 of the *Agricultural Operation Practices Act Administrative Procedures Regulation* describes the information that must be included in each RFR.

Documents Considered

The Board considered the following information:

- Decision Summary RA17047, dated December 18, 2017
- Registration RA17047
- Technical Document RA17047
- RFRs filed by:

- Laura Bluck
- Rachelle Foley
- Linda Cunnington
- Greg Hagemann
- Portions of the public record maintained by the approval officer.

Board Deliberations

The Board met on January 24, 2018 to deliberate on the RFRs.

In its deliberations, the Board considered each RFR filed by the directly affected parties and the various issues raised. The Board must dismiss an application for review if, in its opinion, the issues raised in the RFR were adequately dealt with by the approval officer or the issues are of little merit. The issues raised in the RFRs include:

- Risk to surface water from CFO manure storage facilities
- Risk to surface water from manure spreading and nutrient loading requirements

Risk to surface water from CFO manure storage facilities

Laura Bluck's RFR expresses concern about the potential for manure to be carried by surface water movement from the barn and manure storage pad to an intermittent creek that flows across the NE 7-42-25 W4M onto her property on the SW 18-42-25 W4M. Ms. Bluck asserts that manure entering the water course could contaminate the livestock watering dugout on her property. Ms. Bluck asks the Board to direct an amendment to the registration to require a catchment pond to collect surface water flow between the CFO manure storage areas and the intermittent creek. She supports this request by her assertion that catchment ponds are common practice for cattle feeding operations.

The Bluck RFR states that a concrete manure storage facility is uncommon for beef finisher cattle in central Alberta. In a large snowfall year that experiences a sudden melt, she suggests that manure runoff could flow from the manure storage pad at the end of the barn. Ms. Bluck asserts that, as the sudden melt would occur at a time when the ground is still frozen, surface flows would be more likely to reach her dugout less than a mile downstream. She further states that the roof over the barn would add to this risk given its contribution to the snow melt. She asserts that in the past, the stream flow in the intermittent stream has been so significant that the county has three large culverts under Range Road 255 that runs along the north side of the CFO quarter. She refutes the approval officer's assessment of surface water drainage patterns, stating his site visits were conducted during a drought year.

The Board accepts that the intermittent creek flows within 160 metres downgrade of the planned manure storage pad and barn. Surface water protection is a core AOPA objective. The approval officer assessed the proposed facilities using the NRCB's Environmental Risk Screening Tool. The purpose of this tool is to assess the potential risk to surface and ground water. The Board has confirmed that the approval officer examined the topographical gradients between the manure storage facilities and the intermittent stream and notes that the slope between the source and potential receptor was fully considered by the approval officer. The Board further notes that the manure within the barn will not be exposed to surface water flows. Using the environmental risk screening tool and associated site information, the approval officer has assessed the risk of runoff from the manure storage pad to be low.

The Board finds that the approval officer factored in compliance with relevant regulations under AOPA, the topography, the distance to the intermittent stream (common body of water), and the design of the manure storage barn and pad in determining that the proposed facilities pose a low risk to surface water and that “a runoff control catch basin is not necessary.” Having regard for the approval officer’s determination that a catch basin is not required and the factors he considered in reaching his decision, the Board is satisfied that the approval officer adequately considered the potential for surface water runoff to reach the intermittent creek as low risk. This issue does not merit consideration at a hearing.

Risk to surface water from manure spreading and nutrient loading requirements

The Rachel Foley, Linda Cunnington and Greg Hagemann RFRs each state that the land base for manure application is not suitable for solid manure disposal. Specifically, these RFRs express concern that melt water and runoff from the operator’s proposed manure spreading on the NE 7-42-25 W4M could enter the intermittent stream, contaminating their lands, posing a public health issue and compromising aquatic life should contamination flow downstream into Wolf Creek or Battle River. Ms. Foley requests that the registration be amended to require that manure be trucked off the property and applied to a land base where there is not an intermittent stream.

In her RFR, Ms. Cunnington states that she has lived on the NE 7 for 40 years and has observed a constant water run-on from lands east of the property. Ms. Cunnington further describes seeing the whole of NE 7 containing ponds and a river, and that Range Road 255 has flooded in the past. Ms. Cunnington’s RFR asks the Board to conclude that the land base is not suitable for manure application because of the large volume of runoff. Ms. Cunnington asks the Board to reverse the approval officer’s decision.

In his RFR, Mr. Hagemann expresses concerns about the watershed of the area and contamination downstream. He states that the setback areas and slope findings were not released by the approval officer. He also expresses concern that soil testing was not done before the approval officer determined that there were sufficient manure spreading lands. Mr. Hagemann requests that the decision be reversed or that the registration require both a ground survey to determine setbacks to the intermittent stream and an environmental impact survey before any manure is spread on the quarter.

In Decision Summary RA17047, the approval officer’s review included an assessment of the available spreading lands on the NE of 7-42-25 W4M. The AOPA *Standards and Administration Regulation* provides that an applicant must have a sufficient land base for manure spreading for the first year following the granting of the application [s.25(2)(a)]. The approval officer calculated that the CFO will require a land base of 57.8 acres (23.4 hectares). The approval officer assessed the 130 acres identified by the applicant as available acres in the NE of 7 and concluded that 104 acres were available after calculating acreage removals for setbacks to the intermittent stream (19.87 acres; 8.24 hectares), and north body of water (3 acres; 1.24 hectares) and removing the lease (2.9 acres; 1.16 hectares). In reaching this conclusion the approval officer applied a 60 metre setback to both sides of the intermittent stream. The Technical Document RA17047 contains a statement that 40 acres (16.2 hectares) of the 165 acres (66.8 hectares) identified by H.E. Livestock across the three parcels are not suitable for manure application. The Board finds that the approval officer’s record showed the calculation method for the NE of 7. While the notes stating these acreages were in the approval officer’s record at the time his decision was released, the Google Earth screen shots showing how he

arrived at these numbers were recreated by the approval officer after the fact. Although the Board acknowledges that evidence acquired after the decision is not the preferred approach, the Board is satisfied that the notes, technical documents and decision summary indicate that the work added later was a recreation of earlier work. The approval officer calculations were performed using tools available in Google Earth Pro[®]. The Board understands that calculations using Google Earth contain a known and small margin of error. Having said that, the Board finds that the calculated land area available for spreading exceeds the requirement under the regulations by a factor of two.

The Board also considered the approach taken by the approval officer to protect the intermittent stream from runoff associated with manure spreading. The *Standards and Administration Regulation* also provides for manure spreading setbacks adjacent to common bodies of water. The minimum setback is 30 metres for forage or directly seeded crops when the slope is less than 4% or the operator incorporates the manure into the soil within 48 hours. For forage or directly seeded crops with a slope between 4% – 6%, the setback increases to 60 metres, and for 6% - 12% slopes the setback is 90 metres. The Board accepts that the sole purpose the province established these setbacks to common bodies of water was to provide reasonable and adequate protection for the water resource.

The Board finds that the approval officer utilized a number of tools to assess potential risk of contamination of the intermittent stream. The approval officer conducted site visits as part of his due diligence. Included in the record are several provincial government topographical maps and a Google Earth slope assessment diagonally from the proposed barn site to the centre of section 7. The Google Earth tool calculated the average slope over this distance as 2.7% with a maximum slope of 15.5%. Additionally, the approval officer had the NRCB's Senior Environmental Scientist review his findings using MapSource[®] (Version 6.16.3; Garmin Ltd.).

Finally, the Board considered whether the absence of soil testing data for the lands identified for manure spreading warrants further review. Section 25(1) of the *Standards and Administration Regulation* states that "a person must not apply manure, composting materials or compost to soil unless the soil has been tested within the previous 3 years". The NRCB does not require soil testing of proposed manure spreading lands in advance of receiving a permit to construct and operate a CFO. While this does not immediately answer the question of what soil testing may indicate for the NE 7, the section does assure that manure cannot be spread on a parcel unless it meets the nutrient loading provisions of the regulation.

As part of the application review, approval officers educate applicants about the permit holders' obligations to satisfy relevant provisions of AOPA and the *Standards and Administration Regulation*. H.E. Livestock will have been briefed on the requirements to respect setbacks and to perform the necessary soil tests.

Having regard for the assessment performed by the approval officer and the regulatory requirements that H.E. Livestock will have to meet in terms of spreading setbacks and soil testing, the Board finds that the approval officer adequately considered the potential risk to the surface water quality in the intermittent stream from manure spreading in the NE 7-42-25 W4M. To conclude, the Board finds that there is no basis for review of the issues of risk to surface water and nutrient loading requirements.

Decision

As a result of the Board's deliberations, the Board finds that the approval officer adequately considered all issues raised in the filed Requests for Review and therefore does not direct any matters to a hearing. The RFRs are denied.

DATED at EDMONTON, ALBERTA, this 31st day of January, 2018.

Original signed by:

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Copies of the *Agricultural Operation Practices Act* can be obtained from the Queen's Printer at www.qp.gov.ab.ca or through the NRCB website.