



December 16, 2022

Dan Colton, CEO/President  
Green Light Wisconsin  
2 East Mifflin St  
Suite 600  
Madison, Wisconsin 53703

Subject: Revised NOI Submission Request for Additional Information

Dear Mr. Colton:

The Wisconsin Department of Natural Resources (DNR) received the revised Notice of Intent (NOI) to drill from Green Light Wisconsin (GLW) dated November 30, 2022 in response to the DNR request for additional information. The revised NOI and supporting information were posted on the DNR [webpage](#) on December 6, 2022. The DNR has reviewed the additional information provided by GLW and determined more information is necessary to complete the review process.

Under s. NR 130.109(3), Wis. Adm. Code, in order for the DNR to complete its review of the revised NOI to determine whether any additional approvals or permits are needed, and ultimately issue a decision pursuant to s. NR 130.109(4), Wis. Adm. Code, please amend the revised NOI to include details previously requested by the DNR that address all of the bulleted items below:

*Additional information:*

- Due to the number of inconsistencies between the Exploration Plan, Exhibit A, and the Additional Information Sheet, please revise and combine the submission into one standalone document. Please remove all contradictory or conflicting statements. Some examples include:
  - Section 1.1 Drill Site Construction / Drillhole, states in the second paragraph, “All the access roads and drill sites traverse and are located on uplands...No activities associated with the Work Plan take place in or proximate to wetlands.” However, access to Site 1 and 2/3 both traverse the wetland ditch on the referenced GLW Wetland Determination Memo (9/20/2022).
  - Section 1.1 Drill Site Construction / Drillholes, paragraph 2 states, “Merchantable timber will not be cut during the drilling operation, but in the event GLW needs to cut such timber it will be done in accordance with Forest Service regulations and specifications.”
  - Section 1.1 Drill Site Construction / Drillholes states in the first paragraph, “No topsoil will be disturbed.” and then in the third paragraph, “To the extent possible, no top soil will be disturbed.” A variation of “no disturbance” to “where top soil is disturbed” are stated in 5 other paragraphs throughout the submittal. The same situation applies to “rutting”. Consistency is crucial.

- The applicant's name abbreviation changes throughout the document set. Please use the company name associated with the Exploration License.
- Remove all processes or activities that are not planned to be conducted on site. The Exploration Plan will not be approved if it lists activities outside of a reasonable scope of work. Examples include: retaining walls, culverts, gravel, work in floodplains, etc.
- Section 1.1 Schedule, paragraph 2 states "...GLM has the discretion to undertake Work Plan activities before and after frozen conditions." Note that GLW only has authorization to undertake activities within the timeframe outlined of an approved NOI submittal unless approved by the DNR in writing through a new permit or permit amendment.
- Confirm that any holes in addition to the 8 listed in Table 1 including offsets, as referenced in paragraph 4 of the Drill Site Construction / Drillholes section of the Exploration Plan, will need to go through an additional NOI review process or can be submitted with the annual license renewal for review.
- Exhibit A, provision 1(a) – Correct or remove the contact information.
- Exhibit A, provision 2(a) - Clarify who or what position would constitute the contracting-officer? Do you plan to alert the DNR in such instances? If so, specify DNR Metallic Mining Coordinator.
- Exhibit A, provision 4(b) – Confirm that state threatened, endangered, or candidate species will be considered in assessments and, in the case of an encounter, that the DNR will be contacted, as well.
- Exhibit A, provision 5(a) – Are there floodplains present within the Work Plan area?
- Exhibit A, provision 5(b) – Will wetland crossings be avoided when constructing temporary roads?
- Exhibit A, provision 5(c) – Again, are there floodplains present within the Work Plan area? If flooding of the project area is expected, will the DNR be contacted?
- Exhibit A, provision 5(d) – Is temporary fill material planned? Are re-circulation tanks being used?
- Exhibit A, provision 5(e) states, "Drilling, road use, and road construction can occur within a wetland only after these surfaces have been frozen enough or mitigation used to provide access and use without breaking through the frozen layer." If these activities are not planned within wetlands, the language should be removed.
- Exhibit A, provision 6(a) – Are there additional "new road locations and construction standards" other than outlined in this plan?
- Exhibit A, provision 6(b) – Will culverts and gravel approaches be used? The Additional Information Sheet (c)/(e) state otherwise.
- Exhibit A, provision 6(c) – Is road fill being proposed? Will there be a retaining wall?
- Exhibit A, provision 6(d) – Where and how will the temporary sediment traps be installed?

- Additional Information Sheet (b)(7) – If a thawing event occurs, will work terminate on site? If not, what additional measures will be implemented to prevent adverse impacts? When will they be implemented?

*(b) A description of the means and methods that will be used for the exploration including drilling methods, anticipated drillhole locations, diameter, and depth, source of drilling water, and anticipated use of drilling additives, if any.*

- Section Water Source. states in the first paragraph that the water for the drilling operation will be the North Branch of the Yellow River. Later in the same paragraph it states, “Water may also be pumped directly from the Yellow River to the drilling operation site...” Are there 2 water sources or did you mean to reference the North Branch of the Yellow River for both scenarios?
- Provide the specific details as to how water will be withdrawn from the water source. Depending on withdrawal methods, this process may require a permit. Examples of activities to address: How and where will water be removed? Will you drop a hose from the bridge? Will it have a screened intake? Will it rest on the bed and take in sediment? Will it require an anchor or post in the waterway to hold it? What will you use for spill containment for the pump and fuel?
- Additional Information Sheet (b)(7) states, “A portable pump unit would be set up along the North Fork of the Yellow River or adjacent to the bridge that crossed the river.” Detail the specifics in this case, as requested in the previous bullet point.
- At what rate will surface water be treated with chlorine? Procedures shall be in accordance with Wisconsin regulations for chlorine specifications in s. NR 812.11(14), Wis. Adm. Code.
- List the specific additive products that will be used. This is not a request for the DNR approved drilling fluid list.

*(c) A description of drilling site access and site preparation needed to accommodate the drilling activity including site grading and stabilization methods.*

- Section 2.2 Drill Site Restoration states, “...area of disturbance will be graded to original contour **to the extent feasible...**” Please confirm that the grade will be restored to the pre-existing elevations.
- Exhibit A, 7(a) & Additional Information Sheet (c)(5) – Note that evidence of any rutting would result in immediate stop work procedures.
- Additional Information Sheet (j)(4)(a)(b) – Is rutting a planned outcome? If work will not result in rutting, there should be no reason for rut filling to occur.
- Additional Information Sheet (d)(4) – Provide clarification on “the walls will be sufficiently cut at an angle to accommodate the layer (1-inch) of bentonite.” What bentonite product will be used? Will it be applied as a powder or liquid? How will the thickness described be achieved under the proposed scenario?

*(d) A description of how any diversion, retention, or drainage of water, including stormwater, drilling water, and water from flowing drillholes, on or around the drilling site will be conducted.*

- Additional Information Sheet (d)(1) – Provide more detail on how depth to groundwater will be determined while digging the sump. What if groundwater is not encountered during sump construction?
- Additional Information Sheet (d)(7) – Clarify the timing during the dewatering phase while solids are settling in the sump before pumping free water out. How will the water be kept from freezing?
- Clarify the response hierarchy and detail the immediate containment procedures for encountering flowing well conditions prior to consulting DNR.

*(e) A description of how drilling mud, drill cuttings, any pollutant-bearing minerals or materials, including fuel, lubricants, and drilling additives, will be handled during exploration and a description of spill prevention, containment and remediation procedures.*

- Additional Information Sheet (j)(4)(a)(g) & (i)(1) – Define and provide locations for the “staging area” and the “upland staging area used during past drilling programs”.

*(f) A description of drillhole abandonment methodology. The explorer shall conduct the drillhole abandonment procedures in compliance with s. NR 130.111.*

- Describe or amend the process of filling a hole **“from top to bottom”** with concrete or neat cement, as stated in Section Drillhole abandonment, paragraph 2. Note that this is not the correct order according to s. NR 130.111, Wis. Adm. Code.

*(g) A description of measures that will be taken to remove, stockpile, or otherwise protect topsoil during exploration.*

- Section 2.2 Drill Site Restoration states, “Further restoration will be completed as soon as weather conditions permit in accordance with restoration procedures outline by the Chequamegon-Nicolet National Forest.” Clarify the planned timeframe for completing restoration of the drill sites (i.e. during the 2023 growing season). Please outline these restoration procedures indicated.

*(h) A description of methods and materials used to establish temporary vegetative cover, if necessary, to stabilize any part of the drilling sites and measures to control invasive species as a result of the temporary measures.*

- Additional Information Sheet (c)(4) – Although work is proposed during frozen conditions, the erosion control requirements in s. NR 151.105, Wis. Adm. Code for construction sites less than 1 acre will apply. As described, BMPs will be necessary between the drilling operations and downslope wetlands and waterways. Note that the DNR has authority to request and require additional erosion control measures, as needed.
- Additional Information Sheet (j)(4)(a)(c) – Confirm that erosion control measures will be kept in place and under stable condition until final reclamation (i.e. spring 2023).
- Confirm that “certified weed-free straw” will be used in all applications of straw.

*(j) A reclamation plan designed to minimize adverse effects to the environment during and after exploration that includes all of the following:*

1. *A description of how all liquid and solid waste generated during the exploration activity will be disposed of or otherwise managed in an environmentally sound manner.*

- Exhibit A, provision 8(b) states, “There will be no unattended fuel storage within wetlands or floodplains.” Confirm that there will be no fuel storage within wetlands or floodplains.

2. *A description of how topsoil, if removed and stockpiled, will be redistributed during reclamation of the drilling site.*

- Section 2.2 Drill Site Restoration states, “...reseeded using any stockpiled top soil (**if available**) and approved seed mix.” Please confirm that topsoil will be available and used during reclamation.

3. *A description of final drilling site reclamation and revegetation methods and materials that will be used to stabilize disturbed soils and prevent air and water pollution.*

- Specify the seed mixes that will be used.
- Exhibit A, provision 7(c) states, “Seeding mixes will be approved by the USFS.” Confirm that seed mixes will be approved by the DNR.

4. *A description of any nearby wetlands that could be affected by the exploration activity and the measures that will be taken to minimize disturbance to wetlands, including the use of best management practices for construction in or adjacent to wetlands, and relocating or modifying the configuration of drilling sites or restricting exploration activity to the winter months.*

- If work will avoid topsoil disturbance by constructing temporary access roads under frozen conditions and bridging the wetland ditch with snowpack, why is there discussion of rutting, excessive rutting, grading, and phrases like “to the extent possible”? Inapplicable language should be removed.

5. *A total cost estimate for drilling site termination including unit costs for drillhole permanent abandonment and drilling site reclamation.*

- Section 2.3 Reclamation Cost Estimate table – Provide details on the calculation for grouting – diamond drillholes. Is a 94lb bag of grout expected to fill 300 feet of hole at a 3.78 inch diameter?
- Section 2.3 Reclamation Cost Estimate table – Confirm the number of sumps. Will there be 1 sump per drill site (6) or 1 sump per drillhole (8)?

Additional DNR permits, including dewatering (Ch. 283, Wis. Stats.) and erosion control (s. NR 216, Wis. Adm. Code) may be required for this project. Once all requested information has been received by the DNR, the review process will resume. If you have any questions regarding this second additional information request, please contact Molly Gardner at (715) 292-4911 or at [molly.gardner@wisconsin.gov](mailto:molly.gardner@wisconsin.gov).

Sincerely,



Molly Gardner  
Metallic Mining Coordinator

CC: Dave Carew, CFO, Green Light Metals  
Theodore DeMatties, Geological Consultant  
Benjamin Callan, DNR  
Gregory Pils, DNR