

Montana Department of Natural Resources and Conservation  
Water Resources Division  
Water Rights Bureau

**ENVIRONMENTAL ASSESSMENT**  
**For Routine Actions with Limited Environmental Impact**

Note: Instructions to DNRC staff for preparing this EA can be found at:  
[http://www.dnrc.mt.gov/wr\\_ea/](http://www.dnrc.mt.gov/wr_ea/)

**Part I. Proposed Action Description**

1. *Applicant/Contact name and address:* Green Meadow CGWA  
%R Allan Payne  
44 W 6<sup>th</sup> Avenue, Suite 200  
Helena, MT 59601
2. *Type of action:* Petition to the Department of Natural Resources and Conservation for a Controlled Groundwater Area.
3. *Water source name:* Groundwater
4. *Location affected by action:* Proposed control area includes: S $\frac{1}{2}$ S $\frac{1}{2}$ NW, S $\frac{1}{2}$ NE, NENE and S $\frac{1}{2}$ , Section 22, NWSWSE, SWNWNE, SWNE, SWSENE and S $\frac{1}{2}$ , Section 23, SWSWSW, Section 24, W $\frac{1}{2}$ W $\frac{1}{2}$ , W $\frac{1}{2}$ SESW, and SWNESW, Section 25, all of Sections 26, 27, 34 & 35, W $\frac{1}{2}$  and W $\frac{1}{2}$ SWSE, Section 36, Township 11 North, Range 04 West; W $\frac{1}{2}$  and W $\frac{1}{2}$ W $\frac{1}{2}$ E $\frac{1}{2}$ , Section 1, all of Sections 2 and 3, N $\frac{1}{2}$  and N $\frac{1}{2}$ NESE, Section 10, W $\frac{1}{2}$ NWSW, SWSWSW, S $\frac{1}{2}$ SESW and S $\frac{1}{2}$ SWSE, Section 11, NW, W $\frac{1}{2}$ NWNE, W $\frac{1}{2}$ SW and W $\frac{1}{2}$ NESW, Section 12, NWNWNW, Section 13 and N $\frac{1}{2}$ NENE, Section 14, Township 10 North Range 04 West, Lewis and Clark County, Montana.
5. *Narrative summary of the proposed project, purpose, action to be taken, and benefits:*  
A petition has been presented to the DNRC for establishment of a controlled groundwater area in the Green Meadow Study area bounded on the south by Seven Mile Creek, on the east and north by the BNSF rail line right of way, and on the west by the boundary of Sections 21 and 22, TWP 11 North, RGE 4 West extending due south to Seven Mile Creek. This area is north of Helena, Montana. The petitioners allege the possibility that groundwater withdrawals are in excess of available recharge, that groundwater levels in the area have been dropping, or not recovering, and that future development may cause excessive withdrawals to occur. Petitioners have submitted two studies to support their allegations. Petitioners are requesting the closure of the Green Meadow Controlled Groundwater Area to further appropriations.
6. *Agencies consulted during preparation of the Environmental Assessment:*  
(include agencies with overlapping jurisdiction)

## **Part II. Environmental Review**

### **1. Environmental Impact Checklist:**

<b>PHYSICAL ENVIRONMENT</b>
-----------------------------

#### **WATER QUANTITY, QUALITY AND DISTRIBUTION**

**Water quantity** - Assess whether the source of supply is identified as a chronically or periodically dewatered stream by DFWP. Assess whether the proposed use will worsen the already dewatered condition.

*Determination:* The petition states that groundwater levels have declined in the area. It is not known if this is a result of the ongoing drought situation or continued development of the surrounding area.

**Water quality** - Assess whether the stream is listed as water quality impaired or threatened by DEQ, and whether the proposed project will affect water quality.

*Determination:* Water quality is not an issue being addressed by this petition

**Groundwater** - Assess if the proposed project impacts ground water quality or supply. If this is a groundwater appropriation, assess if it could impact adjacent surface water flows.

*Determination:* Conditions arising from establishment of a controlled groundwater area could impact the total withdrawals allowed from the aquifer(s).

**DIVERSION WORKS** - Assess whether the means of diversion, construction and operation of the appropriation works of the proposed project will impact any of the following: channel impacts, flow modifications, barriers, riparian areas, dams, well construction.

*Determination:* No impacts.

#### **UNIQUE, ENDANGERED, FRAGILE OR LIMITED ENVIRONMENTAL RESOURCES**

**Endangered and threatened species** - Assess whether the proposed project will impact any threatened or endangered fish, wildlife, plants or aquatic species or any "species of special concern," or create a barrier to the migration or movement of fish or wildlife. For groundwater, assess whether the proposed project, including impacts on adjacent surface flows, would impact any threatened or endangered species or "species of special concern."

*Determination:* The administrative action of establishing a Controlled Groundwater Area would not have any impacts. It could be possible that the establishment of the boundaries and any

conditions imposed on water use could guide future development into areas that do have endangered or threatened species.

**Wetlands** - Consult and assess whether the apparent wetland is a functional wetland (according to COE definitions), and whether the wetland resource would be impacted.

Determination: No impact.

**Ponds** - For ponds, consult and assess whether existing wildlife, waterfowl, or fisheries resources would be impacted.

Determination: No significant impacts identified. If uses of water are prioritized as an outcome of a controlled area any proposed ponds using groundwater may not be allowed.

**GEOLOGY/SOIL QUALITY, STABILITY AND MOISTURE** - Assess whether there will be degradation of soil quality, alteration of soil stability, or moisture content. Assess whether the soils are heavy in salts that could cause saline seep.

Determination: No impacts.

**VEGETATION COVER, QUANTITY AND QUALITY/NOXIOUS WEEDS** - Assess impacts to existing vegetative cover. Assess whether the proposed project would result in the establishment or spread of noxious weeds.

Determination: No impacts.

**AIR QUALITY** - Assess whether there will be a deterioration of air quality or adverse effects on vegetation due to increased air pollutants.

Determination: No impacts.

**HISTORICAL AND ARCHEOLOGICAL SITES** - Assess whether there will be degradation of unique archeological or historical sites in the vicinity of the proposed project.

Determination: No impacts.

**DEMANDS ON ENVIRONMENTAL RESOURCES OF LAND, WATER, AND ENERGY** - Assess any other impacts on environmental resources of land, water and energy not already addressed.

Determination: None identified.

## HUMAN ENVIRONMENT

**LOCALLY ADOPTED ENVIRONMENTAL PLANS AND GOALS** - Assess whether the proposed project is inconsistent with any locally adopted environmental plans and goals.

*Determination:* Establishment of a controlled groundwater area may conflict with plans for development in the area. There is a current subdivision plan for private property within the boundaries of the proposed closure. Lewis and Clark county has approved the preliminary plan with conditions. Establishment of a controlled groundwater area could have a significant impact on the ability to develop the subdivision using a private water system.

**ACCESS TO AND QUALITY OF RECREATIONAL AND WILDERNESS ACTIVITIES** - *Assess whether the proposed project will impact access to or the quality of recreational and wilderness activities.*

*Determination:* No impact identified.

**HUMAN HEALTH** - *Assess whether the proposed project impacts on human health.*

*Determination:* Any controls established would be driven by the need for a sustainable and protectable water supply from the groundwater source in the area, which is directly linked to the support of human health of the area residents.

**PRIVATE PROPERTY** - *Assess whether there are any government regulatory impacts on private property rights.*

Yes X No \_\_\_ *If yes, analyze any alternatives considered that could reduce, minimize, or eliminate the regulation of private property rights.*

*Determination:* A permanent closure for all water appropriations regardless of size may be an additional burden on individual home development. Any additional development in the area would be forced to use existing water supplies or hook up to the city of Helena's water system. The costs for this could be a burden.

Allowing permitting with conditions and basing those conditions on scientific information may help reduce the effects of a controlled area.

**OTHER HUMAN ENVIRONMENTAL ISSUES** - *For routine actions of limited environmental impact, the following may be addressed in a checklist fashion.*

*Impacts on:*

- (a) Cultural uniqueness and diversity? No significant impacts.
- (b) Local and state tax base and tax revenues? Potential controls on groundwater use could affect size and distribution of tract development. Existing levels of revenue should not be affected.
- (c) Existing land uses? No change in existing land uses. No significant Impacts.
- (d) Quantity and distribution of employment? No significant impacts.
- (e) Distribution and density of population and housing? See (b) above.

- (f) *Demands for government services?* Administration of any controls established would likely increase the workload of a number of agencies. DNRC would be impacted trying to enforce a complete closure. DEQ and Lewis and Clark County Planning office may be affected by alternative development requests. No significant impacts.
- (g) *Industrial and commercial activity?* No significant impacts.
- (h) *Utilities?* No significant impacts.
- (i) *Transportation?* No significant impacts.
- (j) *Safety?* No significant impacts.
- (k) *Other appropriate social and economic circumstances?* Land values of undeveloped properties may be affected if established controls limit some use of groundwater.

2. ***Secondary and cumulative impacts on the physical environment and human population:*** Establishment of controls within the proposed area may have affects on property values and development scenarios. This could affect where and how housing development occurs in the Helena valley to a limited degree.
3. ***Describe any mitigation/stipulation measures:*** A temporary controlled area would allow for studies to be conducted for two to four years while still allowing for some development with individual wells to occur.
4. ***Description and analysis of reasonable alternatives to the proposed action, including the no action alternative, if an alternative is reasonably available and prudent to consider:*** No action would allow potential development to apply for water use permits under the current application process and be scrutinized on an individual basis. Individual well users of up to 35 gpm and 10 acre-feet per year would continue to file on water use with little review. Comprehensive studies would be less likely to occur in a timely manner in which to make water management decisions.

Alternative: County zoning with a variety of conditions could reduce housing densities and water use while still allowing regulated growth to occur.

### **PART III. Conclusion**

*Based on the significance criteria evaluated in this EA, is an EIS required? No.*

*If an EIS is not required, explain why the EA is the appropriate level of analysis for this proposed action:* Any actions taken through the establishment of a controlled groundwater area would be administrative in extent with no physical action being directly involved. No significant environmental impacts have been identified.

*Name of person(s) responsible for preparation of EA:*

*Name:* Jan Langel

*Title:* Regional Manager

*Date:* August 30, 2006