

IDAHO SPRINGS PLANNING COMMISSION COMMUNICATION

Meeting Date: August 5, 2020	Page 1 of 7 plus attachments	Item: Annexation and Rezoning of 4 mining claims near upper Argo Landing: The Queen Lode, The Motor Lode, the A B E Lode, and a portion of The Alpha Lode
Presented by: Barb Cole Community Development Planner		

BACKGROUND:

The City received an annexation petition from Mary Jane Loevlie (the “Applicant”) to annex four mining claims. If the mining claims are annexed, the Applicant proposes to rezone the property as the Argo Planned Development, which Planning Commission will also consider at this meeting. State Statute requires that properties be rezoned within 90 days of annexation. The Applicant intends to combine the properties with other Applicant properties to facilitate access to the Upper Landing of the approved Final Development Plan (FDP) for the Argo Phase 1 Gondola.

Properties.

The proposed annexation consists of four parcels.

- The Queen Lode. The parcel is 3.83 acres. It contains portions of Santa Fe Mine Road and Franklin Mine Road. As noted in the Applicant’s submittal, control of land along the roads will provide improved access at the Upper Landing Area. The area will also include siting of water/wastewater utility equipment in addition to overhead and underground electrical power and stormwater management.
- The Alpha Lode. The proposed annexation is 0.071 acres. The Applicant is currently pursuing a boundary line adjustment (BLA) to include this small area in the Queen Lode.
- The Motor and A B E Lodes. Together these mining claims include 6.82 acres. These parcels include a portion of the gondola alignment as well as trail alignments that connect the upper and lower portions of Virginia Canyon Mountain Park (VCMP).

The Applicant plans to integrate these properties into the Argo PD approved by City Council in 2019. The existing PD includes several use or ownership areas: 2A (Gondola), 2B (Privately Owned), and 2C (City-Owned).

- Area 2A uses include City park and recreation uses in addition to the operation and maintenance of the gondola.
- Areas 2B and 2C include the Upper Landing Area at the north end of the gondola alignment. The Upper Landing Area provides access to both the Virginia Canyon Mountain Park (VCMP) and gondola area.

History. In 2019, City Council approved annexation and rezoning to Planned Development (PD) of the Argo project. Earlier this year City Council approved Phase 1 of the Argo project.

COMPLIANCE WITH MUNICIPAL CODE:

Annexation

Section 21-103 of the Idaho Springs Municipal Code requires City staff to prepare a report analyzing the feasibility of annexing the proposed property. The Annexation Impact Report is attached. The report is substantively the same as what is required by the Statute for an Annexation Impact Report with two additional findings:

COMPLIANCE WITH THE COMPREHENSIVE PLAN:

The subject properties to be annexed are presently zoned by Clear Creek County as **Mining One (M1)**. The East End Action Plan and the 2017 Comprehensive Plan note that this general area should be tourist-oriented, consisting of private-public development, mixed use development and a gondola line. This proposed annexation facilitates road access from the north to the Upper Landing Area.

COMPLIANCE WITH THE THREE MILE PLAN

The Colorado Revised Statutes require the preparation of a Three Mile Plan. The Plan identifies issues that should be addressed prior to any parcel of land being annexed into the City of Idaho Springs. The Plan mentions that the criteria to be considered when determining which lands near Idaho Springs might be desirable for annexation include:

- i. Areas which will broaden the range of housing types and home ownership opportunities in the City,*

This area is not suitable for housing given its location.

- ii. Areas that have enough buildable land so that desired City land uses can be accommodated,*

By filling in some “gaps” in the current Argo project area, these areas facilitate the development of the 2019 PD, provide access to the Upper Landing, and allows for the gondola tower in one location.

- iii. Areas that are, or can easily be, served by utilities with no negative physical or economic impact on the community,*

The Argo Team is presently working with Xcel energy for electric service to the annexation area. Private well and septic will provide water and wastewater service to the 2019 PD area. The annexation of these parcels facilitate access by service vehicles to the Upper Landing Area.

- iv. Areas that help strengthen the economy of Idaho Springs,*

The 2019 PD is a major development for the City of Idaho Springs. The development provides access to the 472-acre City owned mountain park, anchored by mixed use redevelopment of the Argo Gold Mill and Tunnel including hotel, retail, and restaurant uses. A gondola is proposed to provide access to the top of the mountain park. This proposed annexation provides road access needed to construct and service the Upper Landing Area.

v. *Areas that promote infill development, and*

The proposed annexation adds land to the much larger project that would result in comprehensive development of the Argo Mill and Mine properties that is both an infill development as well as adaptive reuse of historic properties.

vi. *Areas that share a community of interest with Idaho Springs.*

The annexation of the upper mining claims allows comprehensive development and access and facilitates the development of the Upper Landing Area that is part of the Argo project and increases access to the VCMP.

Three Mile Plan Recommendation Area:

The Three Mile Plan mentions that IF development were to occur in this area, every effort must be made to protect the historic landscape. The PD zoning and approved FDP for the upper landing support this recommendation

SOURCES OF REVENUE FROM THE PROPERTY

The proposed uses in the approved 2019 annexation area should generate a significant increase in sales tax, revenue sharing from the gondola, and tourism-related economic activity. The economic benefits of this development should be substantial for both the City and overall health of the local economy.

Rezoning

In determining the zoning, the following factors are to be considered:

a. *Whether the proposed zoning is in conformity with the Comprehensive Plan.*

The 2019 Argo parcels annexed into the City were found to be in conformance with the Idaho Springs Comprehensive Plan and the East End Action Plan (EEAP). The proposed annexation and rezoning area is outside the boundaries of the East End Overlay District, but the properties will be subject to the requirements of the already approved Argo PD.

b. *Whether there have been material changes in the character of the neighborhood such as to justify a change in the zoning.*

The Argo PD approved in 2019 introduces a significant change with the proposed gondola and Upper Landing Area. The proposed annexation complements the Argo project by facilitating access to the Upper Landing Area.

c. *Whether the proposed rezoning will tend to preserve and promote property values in the neighborhood.*

The Upper Landing Area has not seen significant development since the mining era. The Gondola and Upper Landing Area will tend to preserve and promote property values in the immediate area. The proposed annexation parcels provide access to the upper landing area.

- d. Whether development of the property in accordance with the proposed rezoning will be in harmony and compatible with surrounding land uses and present development in the area.*

The 2019 PUD includes restrictions, such as limits on lighting, to minimize impact on surrounding properties.

- e. Whether the property can be reasonably used and developed as presently zoned.*

If the annexation is approved, it will be followed by a proposal to rezone the properties to the PD zoning approved in 2019.

- f. Whether the proposed rezoning will affect traffic congestion in the area.*

Traffic on the properties proposed for annexation will be limited to temporary construction traffic and providing service as needed to the Upper Landing Area.

- g. Whether the proposed rezoning will promote the public welfare.*

This proposed rezoning extends the existing PD to the access route that will provide a service road for the project. This road is needed to construct and service the proposed Mighty Argo project and the Virginia Canyon Mountain Park including a trails network, gondola, food trucks,, retail and support uses which will add to the tax base, support a visitor population, increase property values, and will overall be in the interest of the public welfare. This access road will also improve emergency service to the Virginia Canyon Mountain Park.

- h. Whether the property was properly zoned when its current zoning was established.*

The existing County zoning on the properties-Mining One (M-1) was appropriate for an area made up largely of mining claims dating back the historic mining era.

- i. Whether denial of the proposed rezoning would preclude any reasonable economic use of property.*

Denial of the proposed rezoning would preclude reasonable use of the Upper Landing of the Argo property due to the lack of access roads serving the properties.

- j. Whether any other zoning classification would afford any reasonable use of the property.*

Since these parcels are integral to the Argo project including the Upper Landing Area and gondola towers, the proposed rezoning is essential.

- k. Whether denial of the proposed rezoning would impose an undue hardship on the owner.*

Denial of the proposed rezoning would impose an undue hardship on the Argo properties because the area is integral to the development of the approved Phase 1 Final Development Plan. In addition, the Virginia Canyon Mountain Park has been designed assuming the gondola were an integral component, and the construction of the gondola and Upper Landing Area relies upon the access that will be provided across the properties proposed for rezoning.

1. *Whether the proposed rezoning will promote or disturb stability in the zoning of the neighborhood.*

The road across to the proposed area of rezoning is limited to the temporary construction period and servicing the Upper Landing Area once it is built.

ADDITIONAL REVIEW CRITERIA REQUIRED FOR PLANNED DEVELOPMENTS (Sec. 21- 107.J)

Considerations for review and approval will be the same as is required for a rezoning with the following additions:

1. *Whether the proposed PD adequately mitigates any adverse impacts it causes, including without limitation adverse impacts on traffic, view corridors, noise, property values and the provision of public services.*

As mentioned throughout this report, there are numerous written restrictions to mitigate adverse impacts. These include:

- Prohibitions on public vehicle access to Use Area Two (Upper Landing Area)
- Dark sky lighting standards
- Building coverage limitations
- Prohibitions on internally illuminated signage
- Specific design requirements including additional design requirements in proximity to the Greenway
- Careful arrangement of use areas and building heights to limit visual impacts
- Requirements for geologic reports and limited grading.

2. *Whether deviations from the requirements of the underlying zone district are warranted by virtue of the improved design and/or amenities provided in the PD.*

Deviations from the Land Development Code permitted in the approved 2019 PD include a gondola use, alternate methods for building height measurement, and a percentage of structures that may exceed the 35' height limit in this area. The area of the proposed rezoning is limited to the access road and infrastructure that serves the Upper Landing Area.

REFERRALS AND PUBLIC MATERIALS

Planning staff has coordinated the scheduling of the referral process and the provision of materials related to the annexation to the public. A list of all agencies that received the referral is attached with this report.

As required by the LDR, mailed notification of this hearing was sent to all property owners within 300 feet of the property. This amounted to approximately 150 letters. Two (2) signs were posted on the property indicating public hearing dates and time, and announcement of the public hearing was posted on the City's website and social media page.

The associated annexation required additional notice that was also provided. This included publication of the annexation and zoning hearings, by both Planning Commission and City Council, on four consecutive weeks. It also required certified mailing of the notice, annexation petition, resolution, and impact report to

the Board of County Commissioners, County Attorney, the School District, and the Special Districts that cover the area of the proposed annexation and rezoning.

REFERRAL RESPONSES:

As of the writing of this Staff Communication to the Planning Commission (July 29, 2020), no written comments have been received. There was one email requesting the information sent to surrounding property owners. This information was emailed to that person.

PLANNING STAFF SUMMARY:

The approved Planned Development (PD) for this site is a result of more than two years of discussions between the City and the Argo Team. Similar to any standard zone district, it addresses the uses, development standards and intent of the project.

The Argo development will be a major new destination for Colorado, benefitting both area residents and visitors.

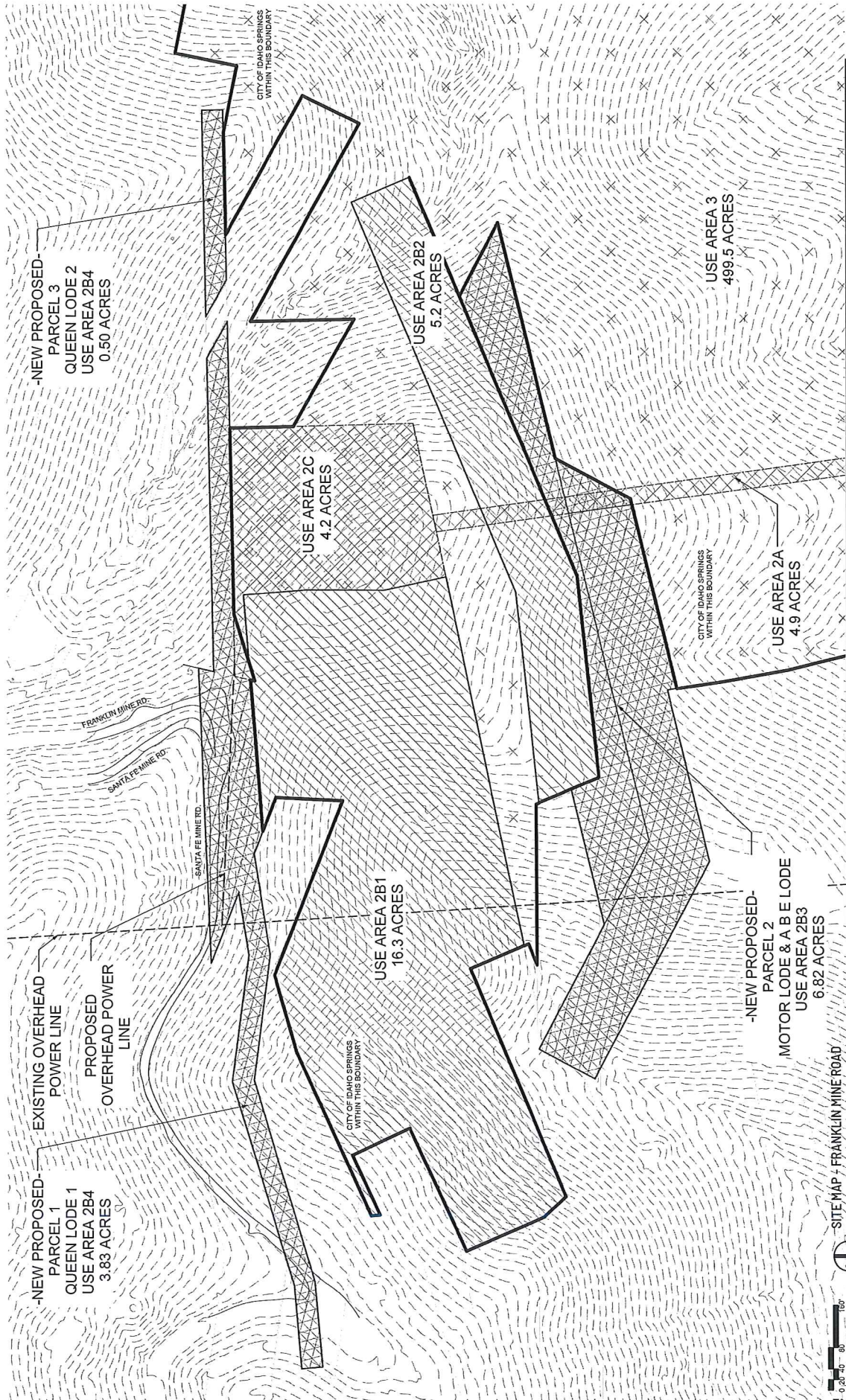
This proposed rezoning extends the PD to complete a service road route that will connect to the existing Franklin Mine Road.

PLANNING STAFF RECOMMENDATION:

- 1. Staff recommends the Planning Commission recommend approval to the City Council of the annexation of the parcels.**
- 2. Staff recommends the Planning Commission recommend approval to the City Council of the rezoning of the subject properties from County Mining-One to the Planned Development as proposed.**

ATTACHMENTS:

- 1. Submittal Documents for Annexation and Rezoning**
- 2. Annexation Map**
- 3. Annexation Impact Report**



-NEW PROPOSED-
PARCEL 3
QUEEN LODGE 2
USE AREA 2B4
0.50 ACRES

-EXISTING OVERHEAD-
POWER LINE
PROPOSED
OVERHEAD POWER
LINE

-NEW PROPOSED-
PARCEL 1
QUEEN LODGE 1
USE AREA 2B4
3.83 ACRES

USE AREA 2C
4.2 ACRES

USE AREA 2B1
16.3 ACRES

USE AREA 2B2
5.2 ACRES

-NEW PROPOSED-
PARCEL 2
MOTOR LODGE & A B E LODGE
USE AREA 2B3
6.82 ACRES

USE AREA 2A
4.9 ACRES

USE AREA 3
499.5 ACRES

CITY OF IDAHO SPRINGS
WITHIN THIS BOUNDARY

CITY OF IDAHO SPRINGS
WITHIN THIS BOUNDARY

CITY OF IDAHO SPRINGS
WITHIN THIS BOUNDARY

FRANKLIN MINE RD.
SANTA FE MINE RD.

SANTA FE MINE RD.



SCALE: 1" = 100'

SITE MAP - FRANKLIN MINE ROAD

ENLARGED SITE MAP
@ FRANKLIN MINE ROAD
03

08-15-2020
XX-XX-XXXX
ARGO HOLDINGS, LLC
1431 MINER STREET
IDAHO SPRINGS, CO. 83452
309-337-7461

DATE ISSUED:
DATE REVISED:
PREPARED BY:
ADDRESS:

PLANNED DEVELOPMENT
MIGHTY ARGO & VIRGINIA CANYON MOUNTAIN PARK
MIXED-USE DEVELOPMENT

Mary Jane Laville
IDAHO SPRINGS, CO.
83452

OWNER 3:
ADDRESS:

OWNER 2: CITY OF IDAHO SPRINGS
Alvin Tureback - City Planner
Andrew Naran - City Administrator
ADDRESS: CITY HALL
IDAHO SPRINGS, CO. 83452

OWNER 1:
ADDRESS:





Mighty Argo and Virginia Canyon Mountain Park Mixed-Use Development Annexation of Four Parcels to be included in Planned Development

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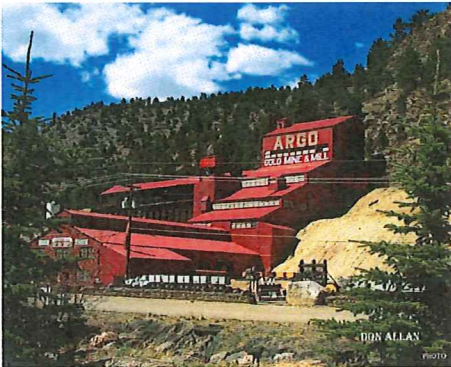
"Latte, Jed?"

1.0	Cover Letter
2.0	Impact Assessment
3.0	Petition for Annexation
4.0	Proof of Ownership
	Appendices
5.0	Geologic Summary
6.0	Water/Wastewater Demand Analysis (Upper Landing)
7.0	Water/Wastewater Memo (Upper Landing)



Mighty Argo and Virginia Canyon Mountain Park Mixed-Use Development Annexation of Four Parcels to be included in Planned Development

COVER LETTER



ARGO Mill & Tunnel from south bank of Clear Creek

COMMUNITY BENEFITS

- Year-round Access and Public Restrooms (upper and lower) for VCMP
- Improved Emergency Access and Services to VCMP
- Revenue Sharing for Trail Construction Maintenance and Parking
- Economic Generator - a catalyst for future development
- Public Spaces - Plazas, Parks, Play Areas, Food and Beverage
- Job Creation - Broad spectrum of opportunities
- Revenue - Sales Tax, Property Tax, Tap Fees
- Entertainment Venues and Creative Programming
- Future Phases to include Housing, Lodging, Commercial Spaces
- Destination Attractions - Critical Mass
- Provide lift-assist outdoor experience for all ages and abilities
- Celebrate our shared Heritage and Love for the Outdoors
- Free Gondola Passes for City Residents



Existing social trail in Virginia Canyon Mountain Park.

Contents:

1. Applicant Contact Info
2. Project Introduction and Description of Proposed Development
3. Current and Proposed Uses
4. How the Proposed Development Meets Review Criteria
5. Known Hazards due to Topography, Geology, Hydrology
6. Anticipated Sources of Water/Wastewater
7. Estimated Public Water/Wastewater Demands

1. Applicant Contact Info

Mary Jane Loevlie

PO Box 218, Idaho Springs, Colorado

(303) 903-2427 – MaryJaneLoevlie@MightyArgo.com

2. Project Introduction and Description of Proposed Development:

On June 10th, 2019, Idaho Springs City Council approved a Planned Development for Argo Holdings, LLC, Mary Jane Loevlie, and the City of Idaho Springs, which established zoning and design guidelines for a variety of uses – The Mighty Argo and Virginia Canyon Mixed Use Development – Planned Development.

In the months following approval of this PD, Mary Jane Loevlie has acquired four (4) additional parcels adjacent to the northern portion of the PD project boundary. These parcels will substantially improve the functionality and feasibility of various aspects of the park, including access, trail development, and infrastructure. The following Cover Letter and Impact Statement describes each parcel and references relevant sections of the approved Planned Development Cover Letter and Impact Statements.

Each of these four parcels – The Queen Lode, The Motor Lode, the A B E Lode, and a portion of The Alpha Lode will become part of Use Area 2B, and a small portion of the Motor and A B E Lodes would contain Use Area 2A (Gondola) as detailed in the approved Planned Development. All uses approved for Use Area 2B would be designated Allowable Uses for these four (4) parcels.

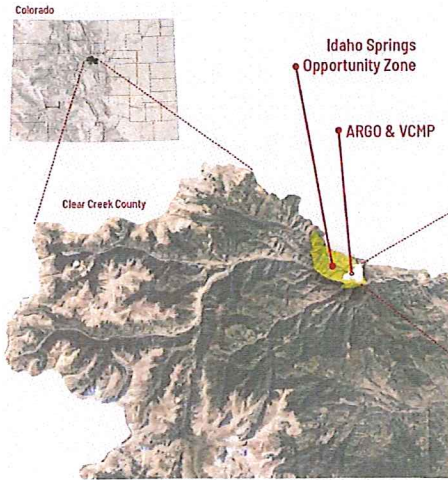


Mighty Argo and Virginia Canyon Mountain Park Mixed-Use Development

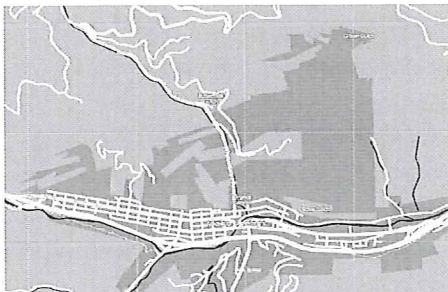
Annexation of Four Parcels to be included in Planned Development

COVER LETTER

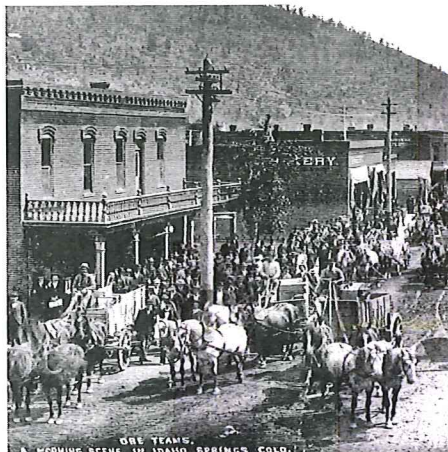
Parcel Descriptions and Rationale for Annexation and Rezoning:



Area Map showing Clear Creek County



Vicinity Map showing Idaho Springs and VCMP



Miner Street, Idaho Springs, CO circa early 1900s

The Queen Lode:

This 3.83 Acre parcel contains portions of Santa Fe Mine Rd and Franklin Mine Rd, and is adjacent to Use Areas 2B and 2C. Annexing and Rezoning this parcel into the approved PD will improve the development in the following ways:

- Improve pedestrian access and Reduce traffic, and parking impacts to the site. For example, by controlling areas adjacent to Franklin Mine Rd, park and gondola operators can have better control over traffic and parking impacts at the upper landing.
- Improve efficiency and operation of Water/Wastewater and Electrical Utilities, and Stormwater Management at the Upper Landing. This includes better siting and layout of water/wastewater utility equipment, more efficient routing of overhead and underground electrical power, and a more comprehensive stormwater management plan.

The Alpha Lode:

This 0.079 Acre portion of the Alpha Claim (included in the 3.83 Queen Parcel 1) is currently undergoing a County Boundary Adjustment to be included in the Queen Lode. There is a reciprocal approval contemplated with this process to allow for the City of Idaho Springs Annexation/Rezoning and County Minor Boundary Adjustment to proceed in parallel. See description above for the Queen Lode for rationale for Annexation and Rezoning.

The submitted Annexation Map shows the Alpha portion as part of the Queen Lode.

The Motor and A B E Lodes:

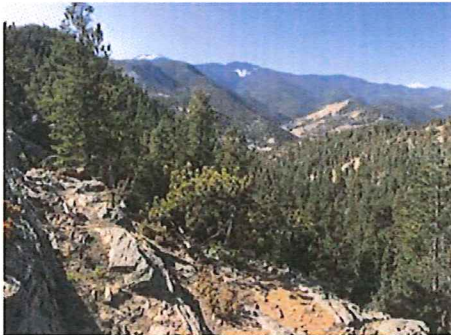
These two claims total 6.82 Acres, and traverse across the upper portion of Virginia Canyon Mountain Park. The parcels contain a portion of the Gondola Alignment (Use Area 2A), as well as critical trail alignments connecting the upper and lower portions of VCMP. Mary Jane Loevlie purchased these claims in 2019 with the intent to allow optimal alignment of both the Cable Car and VCMP Trails.



Mighty Argo and Virginia Canyon Mountain Park Mixed-Use Development

Annexation of Four Parcels to be included in Planned Development

COVER LETTER



The geologic history of the region will be highlighted.



Interior photo of the historic Mighty ARGO .



Trail blazers enjoying spectacular views from the Upper Landing at Virginia Canyon Mountain Park.

3. Current and Proposed Uses:

Current Uses

All four (4) parcels are currently Zoned M-1 and are in Unincorporated Clear Creek County.

Proposed Uses

From PD Section 1.0 – Area 2A (Gondola), Area 2B (Privately Owned), and 2C (City-Owned) Use Descriptions from Approved PD:

Design Intent of Development:

The Mighty Argo and Virginia Canyon Mountain Park (VCMP) Mixed-Use Development areas are intended as a mix of lively zones of activity and natural open space, promoting mobility, connectivity, recreation and tourism and shall not obstruct critical views of the historic mill or view corridors from the multiple peaks and ridges of VCMP. It is the intent of the applicants to create a balanced community whose vision includes:

1. Environmental enhancement and preservation;
2. Historic enhancement, protection and preservation;
3. Diversified, economic growth which has been planned and is compatible with the vision of the community;
4. Adding to the quality of life for the residents of Idaho Springs and surrounding areas.
5. Publicly accessible recreation opportunities

Area 2A – Gondola

Gondola towers and associated cables connect Area 1 and the landing pad at Area 2. The cableway nods to the transportation used during the historic mining era. They are simple galvanized structures situated along the mountain side, darkened to minimize contrast with their natural surroundings. The cable line and cabins moving along the line will excite visitors and draw them to the development.

Area 2B and 2C - Upper Landing

The Upper Landing site of the Gondola straddles private property and the City land of Virginia Canyon Mountain Park. The associated development agreement will detail the many benefits of the Upper Landing between the private owner(s) and co-applicant, the City of Idaho Springs. The landing shall be vibrant and lively space consisting of natural rock formations, montane and sub alpine



Mighty Argo and Virginia Canyon Mountain Park Mixed-Use Development

Annexation of Four Parcels to be included in Planned Development

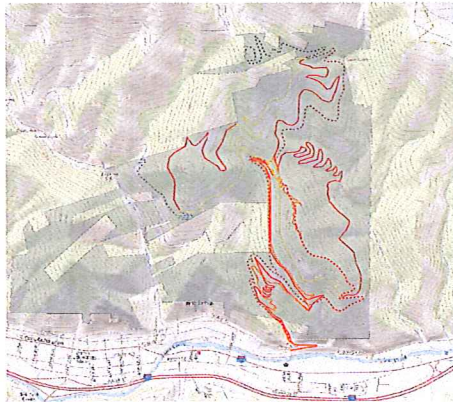
COVER LETTER



Historic Mighty Argo is a beautiful example of mill architecture



Activities for all ages anytime of the year are possible in Idaho Springs in Virginia Canyon Mountain Park.



Virginia Canyon Mountain Park - Master Plan

landscapes, and plenty of scenic views. Viewing decks may be tiered to address the steep natural grades of the region. The space may be inviting to the user through design elements such as similar exterior lighting, street furniture, whimsical artistic elements and notable historic artifacts and interpretive signage dedicated to the history of the surrounding region and its gold mining legacy. See Design Standards section for further information. Final design standards will be approved per the associated Final Development Plan.

Food and beverage and operational resource structures may be located to draw users to and through the environment. See Allowed Uses section for specific uses allowed per Area. Design elements shall address the pedestrian through the use of unique detailing similar to that of Area 1 and relatable elements at the pedestrian level such as fenestrations, counters and benches.

From PD Section 1.1 – Allowed Uses:

Area 2A - Gondola

P- Park and Recreation per the City of Idaho Spring Municipal Code and:

- Gondola operations and maintenance

Area 2B -Upper Landing

Uses for public access shall only be accessed by the public via the Gondola, hiking, biking or commercially-operated visitor shuttle.

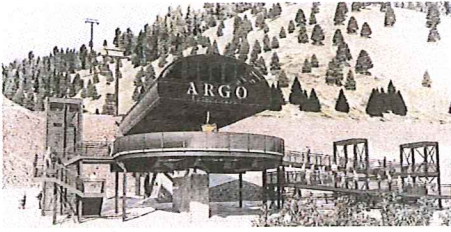
P- Park and Recreation per Table 21-50-1 of the City of Idaho Spring Municipal Code and:

- Gondola operations, maintenance and accessory uses customarily incidental to a tourist- oriented line such as retail, restaurants, visitor center, art studios, craft shops and custom small industry, museums, decks, conference facilities, mine tours.
- Alcohol may be served and consumed.
- Tourist accommodations which include overnight stays
- Single family residential (20 units max.) Road access for Residential Uses is allowed.
- Pop Up kiosks, booths or trucks occupying space
- Aerial Adventures: canopy tours, aerial trekking parks, zip line rides, rope course and ancillary structures
- Sale, rental repair or inside storage of any equipment, supplies or materials related to recreational activities not including mini storage



Mighty Argo and Virginia Canyon Mountain Park Mixed-Use Development Annexation of Four Parcels to be included in Planned Development

COVER LETTER



Mighty Argo Cable Car



Argo Landing



Argo Landing

- Storage and maintenance for gondola and property related equipment shall be screened
- Communications Towers

From PD - Building Height and Maximum Building Coverage

Area 2A – Gondola-Towers and air rights for line

5% building coverage up to 46' max.

10 towers max. up to 46' max., 5 towers max. up to 65' max.; and

5 towers max. to be determined based on final coordination between the Gondola and VCMP.

Area 2B - Upper Landing

8% building coverage

Maximum height up to 35' max.

A maximum 25,000 SF of elevated deck up USGS 8792' elevation

*No single element shall be more than 65' from existing adjacent grade

4. How the Proposed Development Meets Review Criteria:

The parcels to be annexed meet review criteria as required by Idaho Springs Land Development Regulations. See Annexation Map for Descriptions and Contiguity Statements. Refer to Approved Mighty Argo and Virginia Canyon Mountain Park Mixed-Use Development Planned Development (PD) for additional review criteria descriptions.

5. Known Hazards due to Topography, Geology, Hydrology:

Refer to Geological Summary in the appendix of this Document

6. Anticipated Sources of Water/Wastewater:

Potable water is to be purchased from the City of Idaho Springs and trucked to the site where it will be stored for potable use.

Wastewater is to be treated by a private wastewater plant located in Use Area 2B. The treated effluent from the CDPHE Regulation 84 Membrane Bioreactor (MBR) Plant will be used for Toilet Flushing, Gondola Cabin washing, and irrigation. Effluent will be stored at Use Area 2B for this purpose, as well as for non-building firefighting storage. Any excess effluent will be trucked to the Idaho Springs municipal wastewater treatment plant for final treatment.

The applicant and City of Idaho Springs are currently contemplating



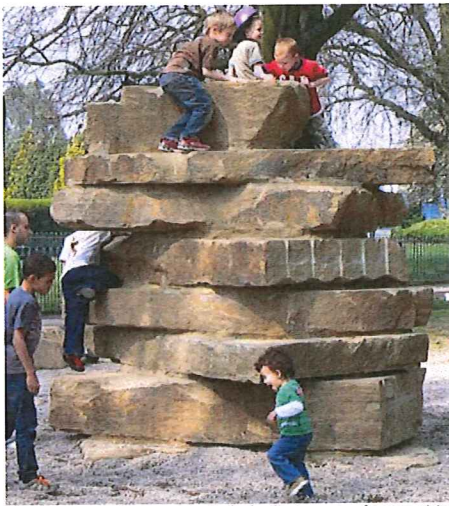
Mighty Argo and Virginia Canyon Mountain Park Mixed-Use Development

Annexation of Four Parcels to be included in Planned Development

COVER LETTER



Clear Creek Greenway Trail



Play elements provide an opportunity for families to pause and create activity.



Flexible Programming will activate the project in a variety of ways.



Modular Food and Beverage Programming both Upper and Lower

what this agreement for purchase and treatment of water will include and how it will be structured.

Refer to the Water/Wastewater Memo in the appendix of this document.

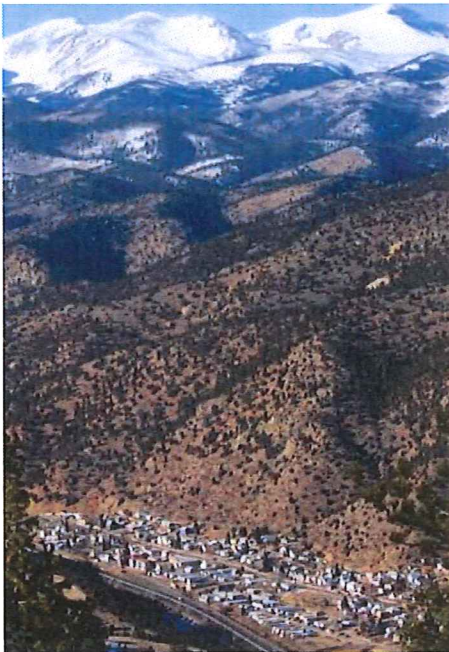
7. Estimated Public Water/Wastewater Demands:

Refer to Water/Wastewater analysis in the appendix of this document.



Mighty Argo and Virginia Canyon Mountain Park Mixed-Use Development Annexation of Four Parcels to be included in Planned Development

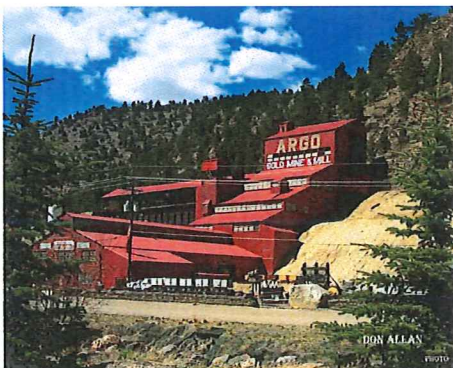
IMPACT STATEMENT



Idaho Springs, CO and view of the Colorado Rocky Mountains

FACTS

- 500 Acre site with 2,100 feet of Clear Creek frontage
- 35 Minutes to Union Station
- 55 Minutes to DIA
- 25 Minutes to the continental divide
- 22 Million cars pass by annually
- 3.5 Million residents within 35 minutes
- 14 Million gamblers per year in nearby
- Along the 2nd most popular rafting river in Colorado



Mighty Argo Mill & Tunnel, Idaho Springs, CO

Contents:

1. Traffic Impact/Trip Generation
2. Parking
3. Water Demand/Service
4. Electric, Gas, Telecom, and Utilities
5. Environmental Hazards and Mitigation Plan
6. Natural Resources
7. Sanitary Sewer Demand/Service
8. Historic Preservation
9. Drainage, including off-site impacts
10. Visual Impacts
11. Educational Needs
12. Emergency Services Needs

1. Traffic Impact/Trip Generation:

The annexation of the Queen Claim will improve traffic conditions. Because the applicant owns the queen, there is greater control over parking along the county alignment of Franklin Mine Rd. By limiting or controlling any public parking at this location, the applicant can deter unwanted parkers at the upper landing, thus reducing traffic on Virginia Canyon Rd.

Refer to approved PD – Impact Statement Section 3.0 and Approved FDP – Traffic and Parking Impact Study for this narrative.

2. Parking:

The annexation and rezoning of these parcels will have no additional parking impacts from the approved PD.

Refer to approved PD – Impact Statement Section 3.0 and Approved FDP – Traffic and Parking Impact Study for this narrative.

3. Water Demand/Service:

Refer to approved PD and approved FDP for this narrative.

Refer to Section 6 and 7 of the Cover Letter in this submission for this narrative.

4. Electric, Gas, Telecom, and Utilities:

Refer to approved PD – Impact Statement Section 4.0 for this narrative.



Mighty Argo and Virginia Canyon Mountain Park Mixed-Use Development Annexation of Four Parcels to be included in Planned Development

IMPACT STATEMENT

*“You should view
something beautiful
every direction
you look”*

Dana Crawford

The annexation and rezoning of these parcels will allow for more efficient design and alignments of Xcel power lines.

5. Environmental Hazards and Mitigation Plan:

Refer to approved PD – Impact Statement Section 5.0 for this narrative, as well as the Geologic Hazards Report in the appendix of this document.

6. Natural Resources:

Refer to Approved PD – Impact Statement Section 6.0 for this narrative.

7. Sanitary Sewer Demand and Service:

Refer to Section 6 and 7 of the Cover Letter in this submission for this narrative.

8. Historic Preservation:

Refer to approved PD – Impact Statement Section 8.0 for this narrative.

9. Drainage, Including Off-site Impacts:

Refer to approved PD – Impact Statement Section 9.0 for this narrative.

Refer to Drainage Memo in the appendix of this Document.

10. Visual Impacts:

The annexation and rezoning of these parcels will allow for the efficient and economical design and construction of a Water/Wastewater Utility yard. These elements will not be visible to the public from the Argo Landing or Virginia Canyon Mountain Park, but will be visible from the intersection of Santa Fe Mine Road and Franklin Mine Road. Current designs anticipate two (2) 120,000 gallon above-ground cisterns, as well as a sub-grade concrete vault, and (3) 40 foot long shipping containers containing Membrane Bioreactor treatment and pumping equipment. These elements will be colored so as to blend in with their surroundings as much as possible. This area is home to many historic and current industrial mining sites that contain numerous structures. These elements will not be typologically out of place in this environment, and will provide a cutting edge, and efficient way to deliver services to the upper landing as well as the Virginia Canyon Mountain Park.



Mighty Argo and Virginia Canyon Mountain Park Mixed-Use Development Annexation of Four Parcels to be included in Planned Development

IMPACT STATEMENT



Big horn sheep are native wildlife in Clear Creek County.



Argo Mill Workers on Lunch Break - circa 1900

Refer to approved PD – Impact Statement Section 10.0 for additional narrative.

11. Education Needs:

Refer to approved PD – Impact Statement Section 11.0 for this narrative.

12. Emergency Services Needs:

Refer to approved PD – Impact Statement Section 12.0 for this narrative.



Mighty Argo and Virginia Canyon Mountain Park Mixed-Use Development
Annexation of Four Parcels to be included in Planned Development

PETITION FOR ANNEXATION

PETITION FOR ANNEXATION

Mary Jane Annexation

TO: THE CITY CLERK AND THE CITY COUNCIL OF THE CITY OF IDAHO SPRINGS,
COLORADO

The undersigned, in compliance with the “Municipal Annexation Act of 1965,” C.R.S. §31-12-101 et seq., as amended, hereby petition the City Council of the City of Idaho Springs, Colorado, for annexation to the City of Idaho Springs, the following described unincorporated territory located in the County of Clear Creek, State of Colorado, and more particularly described in Paragraph 5 below. In support of said Petition for Annexation, the undersigned submits the attached annexation map, and states and alleges as follows:

1. It is desirable and necessary that the property described in Exhibit A be annexed to the City of Idaho Springs, Colorado.
2. The requirements of C.R.S. §§31.12-104 and 31-12-105, as amended, exist and have been met as follows:
 - a. Not less than one-sixth (1/6) of the perimeter of the area proposed to be annexed is contiguous with the City of Idaho Springs, Colorado.
 - b. A community of interest exists between the City and the area proposed to be annexed to the City of Idaho Springs, Colorado.
 - c. The area proposed to be annexed is urban or will be urbanized in the near future.
 - d. The area proposed to be annexed is integrated or is capable of being integrated with the City of Idaho Springs, Colorado.
 - e. In establishing the boundaries of the area proposed to be annexed, no real property held in identical ownership, whether consisting of one tract or parcel of real estate or two or more contiguous tracts or parcels of real estate, will be divided into separate parts or parcels without the written consent of the landowners.
 - f. In establishing the boundaries of the area proposed to be annexed, no real property held in identical ownership, whether consisting of one tract or parcel of real estate or two or more contiguous tracts or parcels of real estate, comprising twenty (20) acres or more (which together with the buildings and improvements situated thereon has a valuation for assessment in excess of \$200,000.00 for ad valorem tax purposes for the year next preceding the annexation) shall be included without the written consent of the landowners.
 - g. The property proposed for annexation is not presently part of any incorporated city or town, nor have annexation proceedings been commenced for the annexation of part of all of such property to another municipality.



Mighty Argo and Virginia Canyon Mountain Park Mixed-Use Development
Annexation of Four Parcels to be included in Planned Development

PETITION FOR ANNEXATION

- h. The proposed annexation will not result in the detachment of real property from any school district and the attachment of same to another school district.
 - i. The proposed annexation will not have the effect of extending the municipal boundary more than three (3) miles in any direction in one (1) year.
3. The undersigned are the owners of more than 50% of the real property proposed to be annexed, and hereby consents to the establishment of the boundaries of this property as shown on the annexation plat submitted herewith.
4. No election for annexation to the City of Idaho Springs, Colorado, has been initiated for the real property to be annexed hereunder within the preceding twelve (12) months.
5. The legal description of the property to be annexed is as follows:

ANNEXATION NO. 1

THE QUEEN LODGE U.S. MINERAL SURVEY NO. 205, LYING WEST OF THE TERRIBLE LODGE U.S. MINERAL SURVEY NO. 85, TOGETHER WITH TWO TRACTS OF LAND AS DESCRIBED IN WARRANTY DEED RECORDED AT RECEPTION NO. 295062 AND TOGETHER WITH THAT PORTION OF THE ALPHA LODGE U.S. MINERAL SURVEY NO. 14559 LYING SOUTH OF THE SAID QUEEN LODGE. CONTAINING A CALCULATED AREA OF 3.83 ACRES.

THE ABOVE DESCRIBED LAND IS CONTIGUOUS TO THE CITY OF IDAHO SPRINGS AND MEETS THE REQUIREMENTS SET FORTH IN COLORADO REVISED STATUTES 1973, 31-12-104-(1) (A) THAT ONE-SIXTH OR MORE OF THE PERIMETER TO BE ANNEXED IS CONTIGUOUS WITH THE ANNEXING MUNICIPALITY

CONTIGUITY STATEMENT-PARCEL 1:

- TOTAL PERIMETER OF AREA CONSIDERED FOR ANNEXATION = 5,443
- ONE-SIXTH OF TOTAL PERIMETER OF AREA = 907
- PERIMETER OF THE AREA CONTIGUOUS WITH EXISTING CITY LIMITS = 970
- THE TOTAL CONTIGUOUS PERIMETER IS 18%, WHICH EXCEEDS THE 1/6 AREA REQUIRED.

ANNEXATION NO. 2

THE A.B.E. LODGE U.S. MINERAL SURVEY NO. 17569, EXCEPTING THERE FROM THE ALLEN LODGE U.S. MINERAL SURVEY NO. 17569 AND EXCEPTING THEREFROM THE ORR LODGE U.S. MINERAL SURVEY NO. 15840.

TOGETHER WITH THE **MOTOR LODGE** U.S. MINERAL SURVEY NO. 15840, EXCEPTING THEREFROM THE SAID ORR LODGE AND EXCEPTING THEREFROM THE HAROLD LODGE U.S. MINERAL SURVEY NO. 12276 CONTAINING A CALCULATED AREA OF 6.82 ACRES.

THE ABOVE DESCRIBED LAND IS CONTIGUOUS TO THE CITY OF IDAHO SPRINGS AND MEETS THE REQUIREMENTS SET FORTH IN COLORADO REVISED STATUTES 1973, 31-12-104-(1) (A) THAT ONE-SIXTH OR MORE OF THE PERIMETER TO BE ANNEXED IS CONTIGUOUS WITH THE ANNEXING MUNICIPALITY

CONTIGUITY STATEMENT-PARCEL 2:

- TOTAL PERIMETER OF AREA CONSIDERED FOR ANNEXATION = 4,307
- ONE-SIXTH OF TOTAL PERIMETER OF AREA = 718
- PERIMETER OF THE AREA CONTIGUOUS WITH EXISTING CITY LIMITS = 2,617
- THE TOTAL CONTIGUOUS PERIMETER IS 61%, WHICH EXCEEDS THE 1/6 AREA REQUIRED.



Mighty Argo and Virginia Canyon Mountain Park Mixed-Use Development
Annexation of Four Parcels to be included in Planned Development

PETITION FOR ANNEXATION

ANNEXATION NO. 3

THAT PORTION OF **THE QUEEN LODGE** U.S. MINERAL SURVEY NO. 205 LYING EAST OF THE TERRIBLE LODGE U.S. MINERAL SURVEY NO. 85. CONTAINING A CALCULATED AREA OF 0.50 ACRES.

THE ABOVE DESCRIBED LAND IS CONTIGUOUS TO THE CITY OF IDAHO SPRINGS AND MEETS THE REQUIREMENTS SET FORTH IN COLORADO REVISED STATUTES 1973, 31-12-104-(1) (A) THAT ONE-SIXTH OR MORE OF THE PERIMETER TO BE ANNEXED IS CONTIGUOUS WITH THE ANNEXING MUNICIPALITY

CONTIGUITY STATEMENT-PARCEL 3:

- TOTAL PERIMETER OF AREA CONSIDERED FOR ANNEXATION = 1,028
- ONE-SIXTH OF TOTAL PERIMETER OF AREA = 171
- PERIMETER OF THE AREA CONTIGUOUS WITH EXISTING CITY LIMITS = 240
- THE TOTAL CONTIGUOUS PERIMETER IS 23%, WHICH EXCEEDS THE 1/6 AREA REQUIRED.



Mighty Argo and Virginia Canyon Mountain Park Mixed-Use Development
Annexation of Four Parcels to be included in Planned Development

ANNEXATION AGREEMENT

C:\Users\paul\Documents\Projects\1002202020202\Argo\Map\04\CA\Annexation\Map\Map04_Annexation_Map.dwg June 03, 2020 - 9:33am

VICINITY MAP

ANNEXATION MAP

TO THE CITY OF IDAHO SPRINGS
A PART OF SECTION 25,
TOWNSHIP 3 SOUTH, RANGE 73 WEST OF THE 6TH PRINCIPAL MERIDIAN,
COUNTY OF CLEAR CREEK, STATE OF COLORADO

SECTION 25

ANNEXATION PARCEL NO. 1
3.83 ACRES

ANNEXATION PARCEL NO. 2
6.82 ACRES

ANNEXATION PARCEL NO. 203
0.50 ACRES

ANNEXATION PARCEL NO. 3
0.50 ACRES

THE CITY OF IDAHO SPRINGS

THE CITY OF IDAHO SPRINGS

THE CITY OF IDAHO SPRINGS

LEGEND

- Annexation Parcels
- City of Idaho Springs
- City of Clear Creek
- Section 25
- Virginia Canyon Road
- Idaho Springs Road
- Clear Creek Road
- Clear Creek
- East of Clear Creek Road
- West of Clear Creek Road
- East of Idaho Springs Road
- West of Idaho Springs Road
- East of Virginia Canyon Road
- West of Virginia Canyon Road
- East of Idaho Springs Road & Clear Creek Road
- West of Idaho Springs Road & Clear Creek Road
- East of Idaho Springs Road & Virginia Canyon Road
- West of Idaho Springs Road & Virginia Canyon Road
- East of Idaho Springs Road & Clear Creek Road & Virginia Canyon Road
- West of Idaho Springs Road & Clear Creek Road & Virginia Canyon Road

GRAPHIC SCALE
1 INCH = 100 FEET

PROJECTION
NAD 83 UTM Zone 12N

SURVEYOR'S CERTIFICATE

I, Nathan D. Stangor, a Professional Land Surveyor registered in the State of Colorado, do hereby certify that the foregoing map is a true and correct representation of the facts and conditions known and believed to be true and correct on the date of this certificate, and that I am duly qualified and licensed to perform such services.

Witness my hand and official seal at the City and County of Clear Creek, State of Colorado, this 11th day of June, 2020.

Nathan D. Stangor
Professional Land Surveyor
No. 10866

Agreement for Parcel No. 1, 2, 203, & 3 of Idaho Springs, Colorado.

This Surveyor's Agreement was acknowledged before me this _____ day of _____, 2020.

By agreement signed:

DATE: _____	PROFESSIONAL LAND SURVEYOR: _____
DRAWN BY: _____	TITLE: _____
CLIENT: MIGHTY ARGO CABLE CAR, LLC	WESTON SURVEYING
ANNEXATION MAP TO THE CITY OF IDAHO SPRINGS COUNTY OF CLEAR CREEK, STATE OF COLORADO	ANNEXATION MAP TO THE CITY OF IDAHO SPRINGS COUNTY OF CLEAR CREEK, STATE OF COLORADO



Mighty Argo and Virginia Canyon Mountain Park Mixed-Use Development
Annexation of Four Parcels to be included in Planned Development

PROOF OF OWNERSHIP



Mountain Land Title, LLC

Mountain Land Title, LLC
972 Golden Gate Canyon Road
Black Hawk, CO 80422
Phone: 303-582-0603 Fax: 303-582-0604
service@mountainlandtitle.com

DATE: May 12, 2020
OWNER: Loevlie

Ownership & Encumbrance Report

Attn: Mary Jane Loevlie
P. O. Box 218
Idaho Springs, CO 80452
email: maryjaneloevlie@mightyargo.com
carlschembri@rocketmail.com

Vesting on last deeds of record: Mary Jane Loevlie

Vesting Deeds Information: Warranty Deed recorded January 2, 2019, in Book 959, Page 559; Quit Claim Deed recorded May 3, 2019, in Book 964, Page 80; Quit Claim Deed recorded June 3, 2019, in Book 965, Page 593; Quit Claim Deed recorded June 4, 2019, in Book 965, Page 632; and Warranty Deed recorded April 1, 2020, in Book 980, Page 886.

Legal Description: See Deeds

ENCUMBRANCES/LIENS

1. None

DISCLAIMER: This information is for your sole use and benefit and is furnished as an accommodation. The information had been taken from our in house title plant, without reference to, or examination of, instruments which purport to affect real property. The information is neither guaranteed nor certified, and is not an Abstract of Title, Opinion of Title, nor a Guarantee of Title, and our liability is limited to the amount of the fees paid.



Mighty Argo and Virginia Canyon Mountain Park Mixed-Use Development
Annexation of Four Parcels to be included in Planned Development

PROOF OF OWNERSHIP

291277 05/03/2019 10:04:00 AM B: 964 P: 80 QGD
Page 1 of 1 R: \$13.25 D: \$3.20 T:\$16.45
eRecorded in Clear Creek County, Colorado

QUIT CLAIM DEED

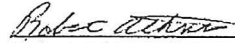
This Quit Claim Deed is entered into on April 30, 2019. LPB Minerals, LLC, a Colorado limited liability company, whose street address is 6605 S. Jay Dr. Littleton, CO 80123 ("Grantor") for the consideration of Thirty-Two Thousand Dollars (\$32,000), in hand paid, hereby sells and quitclaims to Mary Jane Loevlie whose street address is PO Box 1201, 2350 Riverside Drive Idaho Springs, CO 80452 ("Grantee"), the following real property in the County of Clear Creek and State of Colorado, to wit:

The A. B. E. Lode Mining Claim, U. S. Mineral Survey No. 17569, as described in U. S. Patent dated August 10, 1906 and recorded February 5, 2001, in Book 608, Page 855, Excepting therefrom any portion embraced in Survey No. 15840, as excepted in said Patent,
County of Clear Creek, State of Colorado

with all its appurtenances, subject to matters of record.

Executed on the date set forth above.

LPB Minerals, LLC
a Colorado limited liability company



Robert Atkinson, Manager

STATE OF COLORADO)
) ss.
COUNTY OF DENVER)

The foregoing instrument was acknowledged before me on April 30, 2019 by Robert Atkinson as manager of LPB Minerals, LLC, a Colorado limited liability company.

Witness my hand and official seal.

My commission expires: *December 16, 2020*


Notary Public

OKSANA DONCULA
NOTARY PUBLIC
STATE OF COLORADO
NOTARY ID 2018-047834
MY COMMISSION EXPIRES DECEMBER 16, 2020



Mighty Argo and Virginia Canyon Mountain Park Mixed-Use Development
Annexation of Four Parcels to be included in Planned Development

PROOF OF OWNERSHIP

291607 06/03/2019 02:15:00 PM B: 965 P: 593 QCD
Page 1 of 1 R: \$13.25 D: \$4.50 T:\$17.75
eRecorded in Clear Creek County, Colorado

QUIT CLAIM DEED

THIS DEED, Made this 30th day of May, 2019 between

Ronald Eudell Eubanks

of the County of Jefferson and State of Colorado, grantor(s), and

Mary Jane Loevlie, in Severalty

Whose legal address is P. O. Box 1201 Idaho Springs, CO 80452 of the County of Clear Creek, in the State of Colorado, grantees:

WITNESSETH, that the grantor, for and in consideration of the sum of Forty Five Thousand and 00/100 DOLLARS, the receipt and sufficiency of which is hereby acknowledged, has remised, released, sold, conveyed and Quit Claimed, and by these presents does remise, release, sell, convey and Quit claim unto the grantee(s), her heirs and assigns forever, all the right, title, interest, claim and demand which the grantor(s) have in and to the real property, together with improvements, if any, situate, lying and being in the County of Clear Creek and State of Colorado, described as follows:

The Motor Lode Mining Claim, U. S. Mineral Survey No. 15840, as described in U. S. Patent dated June 13, 1904 and recorded November 9, 2004, in Book 717, Page 427, Excepting therefrom any portion embraced in Survey Nos. 2229, 6002A, 12276, 13041 and 14222B, as excepted in said Patent, County of Clear Creek, State of Colorado.

also known by street and number as 001 Motor Idaho Springs CO 80452

To have and to hold the same, together with all and singular the appurtenances and privileges thereunto belonging or in anywise thereunto appertaining, and all the estate, right, title, interest and claim whatsoever, of the grantor(s), either in law or in equity, to the only proper use, benefit and behoof of the grantee(s), their heirs and assigns forever.

IN WITNESS WHEREOF the grantor(s) has executed this deed on the date set forth above.

Ronald Eudell Eubanks
Ronald Eudell Eubanks

State of Colorado)
)ss.
County of Gilpin)

The foregoing instrument was acknowledged before me on May 30, 2019,
by Ronald Eudell Eubanks

Witness my hand and official seal.

Tawnisha Contessa
Notary Public

TAWNISHA CONTESSA
NOTARY PUBLIC
STATE OF COLORADO
NOTARY ID 20174044093
MY COMMISSION EXPIRES OCTOBER 24, 2021



Mighty Argo and Virginia Canyon Mountain Park Mixed-Use Development
Annexation of Four Parcels to be included in Planned Development

PROOF OF OWNERSHIP

295062 04/01/2020 03:28:00 PM B: 980 P: 886 WD
Page 1 of 2 R: \$18.25 D: \$14.00 T:\$32.25
eRecorded in Clear Creek County, Colorado

The printed portions of this form, except differentiated additions, have been approved by the Colorado Real Estate Commission (DR-10-19)(Mandatory 1-20)

WARRANTY DEED

Mike Pryor (Grantor(s)),

whose street address is 7304 South Robb Street Littleton, CO 80127, County of Arapahoe, State of Colorado for the consideration of One Hundred Forty Thousand and 00/100 dollars, (\$140,000.00), in hand paid, hereby sell(s) and convey(s) to

Mary Jane Loevlie, In Severality, (Grantee(s))

whose street address is P. O. Box 1201 Idaho Springs, CO 80452 of the County of Clear Creek, in the State of Colorado, the following real property in the County of Clear Creek and State of Colorado, to wit:

See Attached Exhibit 'A'

known as: TBD Queen Road Idaho Springs CO 80452

with all its appurtenances (Property) and warrant(s) the title to the same, subject to:

1. if this is checked, "statutory exceptions" as defined in §38-30-113(5)(a), C. R. S., and
2. if this is checked, any rights of tenants, as to tenants' right to possession only, under unrecorded leases of the Property, as described in that certain contract for the sale of the Property between Grantor(s) and Grantee(s), and
3. Other: _____

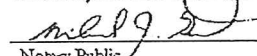
Grantor(s):


Mike Pryor

State of Colorado)
)ss.
County of Gilpin)

The foregoing instrument was acknowledged before me on March 27, 2020,
by Mike Pryor

Witness my hand and official seal


Notary Public

MICHAEL J. GILBERT
Notary Public
State of Colorado
Notary ID # 20094015211
My Commission Expires 05-13-2021



Mighty Argo and Virginia Canyon Mountain Park Mixed-Use Development Annexation of Four Parcels to be included in Planned Development

PROOF OF OWNERSHIP

295062 04/01/2020 03:28:00 PM B: 980 P: 887 WD

Page 2 of 2 R: \$18.25 D: \$14.00 T:\$32.25

eRecorded in Clear Creek County, Colorado

Attached to and forming a part of Deed from Mike Pryor to Mary Jane Loevlie, In Severality

Exhibit 'A'

A tract of land located in Section 25, Township 3 South, Range 73 West of the 6th P.M., more particularly described as follows:

Beginning at Corner No. 11 of the Queen Lode Mining Claim, U. S. Mineral Survey No. 205; thence Northeasterly along line 11-12 of said Queen Lode to the point of intersection with line 2-3 of the Alpha Lode Mining Claim, U. S. Mineral Survey No. 14559; thence Southwesterly along line 2-3 of said Alpha Lode to the point of intersection with line 6-5 of the Dorina Lode Mining Claim, U. S. Mineral Survey No. 14222 A; thence Southwesterly along line 6-5 of said Dorina Lode to the point of intersection with line 1-2 of the Silver Queen Lode Mining Claim, U. S. Mineral Survey No. 1857; thence Northwesterly along line 1-2 of said Silver Queen Lode to the point of intersection with line 10-11 of the said Queen Lode; thence Northeasterly along line 10-11 of said Queen Lode to Corner No. 11 of said Queen Lode, the Point of Beginning,
And

A tract of land located in Section 25, Township 3 South, Range 73 West of the 6th P.M., more particularly described as follows:

Beginning at Corner No. 2 of the Queen Lode Mining Claim, U. S. Mineral Survey No. 205; thence Southwesterly along line 2-3 of said Queen Lode to the point of intersection with line 1-2 of the Silver Queen Lode Mining Claim, U. S. Mineral Survey No. 1857; thence Northwesterly along line 1-2 of said Silver Queen Lode to the point of intersection with line 1-2 of the Trojan Lode Mining Claim, U. S. Mineral Survey No. 4885; thence Easterly along line 1-2 of said Trojan Lode to the point of intersection with line 2-3 of the Alpha Lode Mining Claim, U. S. Mineral Survey No. 14559; thence Southwesterly along line 2-3 of said Alpha Lode to the point of intersection with line 1-2 of said Queen Lode; thence Southwesterly along line 1-2 of said Queen Lode to Corner No. 2 of said Queen Lode, the Point of Beginning,
And

The East 2,600 feet of:

The Queen Lode Mining Claim, U. S. Mineral Survey No. 205, as described in U. S. Patent recorded March 2, 1875, in Book 29, Page 398,

Combined into a single parcel by Combination of Lots Agreement recorded August 24, 2000, in Book 600, Page 998,

County of Clear Creek, State of Colorado.



Mighty Argo and Virginia Canyon Mountain Park Mixed-Use Development
Annexation of Four Parcels to be included in Planned Development

PROOF OF OWNERSHIP

Note:

The Alpha Claim is undergoing title work and a quit claim deed. This will be finalized prior to any hearing, and will also be subject of a Clear Creek County Minor Boundary Adjustment (MBA) process to occur in parallel to the Annexation Process, with a reciprocal approval condition between City Annexation and County MBA. Proof of ownership and title commitment to be provided as soon as it is finalized.



Mighty Argo and Virginia Canyon Mountain Park Mixed-Use Development Annexation of Four Parcels to be included in Planned Development

7.0 - APPENDIX - GEOLOGIC SUMMARY

GROUND ENGINEERING

March 11, 2020

Subject: Initial Geologic Summary, **Argo Mill Redevelopment, Aerial Tramway Alignment**, Idaho Springs, Colorado
Revised

Job No. 19-3070

Bryan McFarland
The Mighty Argo Denali Holdings, LLC
29025 A Upper Dear Creek Road
Evergreen, Colorado 80439

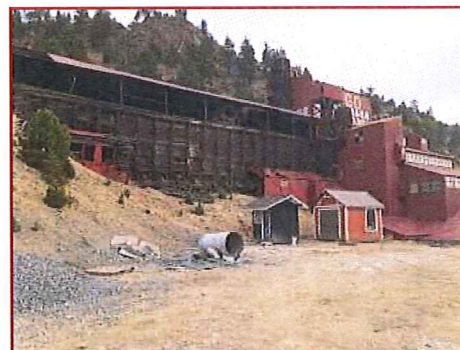
Dear Mr. McFarland:

GROUND Engineering Consultants, Inc. (GROUND) completed an initial geologic summary in support of the design of the proposed improvements to Argo Mill facility and proposed Aerial Tramway alignment located at 2350 Riverside Drive in Idaho Springs, Colorado in general accordance with GROUND's Proposal No. 1910-1819, dated October 3, 2019. The findings of our evaluation are summarized herein.

SITE CONDITIONS

For the purposes of discussing the site conditions, the project site has been split into two subareas: the Argo Mill and its associated waste rock pile and the aerial tramway alignment.

Argo Mill and Waste Rock Pile At the time of our assessment, the Argo Mill and associated waste rock pile portion of the development consisted primarily of the Argo Mill building, a visitor building, mill waste rock pile, and graded, aggregate surfaced parking areas and drive lanes. Material processing and handling equipment, vehicles, and other miscellaneous items were observed on





Mighty Argo and Virginia Canyon Mountain Park Mixed-Use Development Annexation of Four Parcels to be included in Planned Development

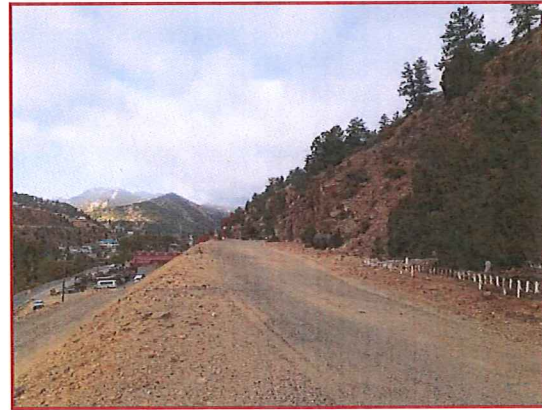
7.0 - APPENDIX - GEOLOGIC SUMMARY

Initial Geologic Hazard Analysis **Revised**
Argo Mine Redevelopment
Job No. 19-3070
Page 2 of 14

site as well. This portion of the project site was bordered by Riverside Drive and a reach of Clear Creek to the south, a water treatment facility to the west, undeveloped land and a reach of Rosa Gulch to the north, and undeveloped land to the east. Additional undeveloped land, single-family residences, multi-family developments, and retail development further surrounded the site.

Mill waste rock was generally exposed at the ground surface of the site. The drive lanes and the central parking area had an aggregate material at the surface, which appeared to be similar to road base. Mature and juvenile trees were observed locally, near the margins of the site as well.

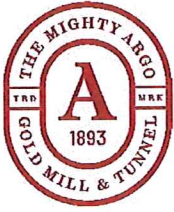
The project site abutted a relatively steep, undeveloped slope, with local vertical to near vertical rock outcrops. This slope generally descended to the south, but slope direction varied locally. About 75 feet of relief were observed across the project site. Against this slope, a mill waste rock pile was constructed. The top of this pile had been graded, and was relatively flat. The slopes of the pile were relatively steep, and generally descended to the south.



Aerial Tramway Alignment

At the time of our subsurface exploration program, the aerial tramway alignment traversed a waste rock pile associated with the Argo Mill (described in the above section), and extend north following Rosa Gulch to Santa Fe Mine Road, near Seaton Mountain. The alignment generally traversed largely, undeveloped land. However, some signs of prior development were





Mighty Argo and Virginia Canyon Mountain Park Mixed-Use Development Annexation of Four Parcels to be included in Planned Development

7.0 - APPENDIX - GEOLOGIC SUMMARY

Initial Geologic Hazard Analysis **Revised**
Argo Mine Redevelopment
Job No. 19-3070
Page 3 of 14

lower portion of Rosa Gulch. Additional signs of development included prospect pits, mine shafts/adits, and other mining related excavations.

In general, the alignment crossed land that sloped moderately to steeply to the south. Local slopes, however, were gentle to vertical and slope direction varied locally. About 1,300 feet of relief were observed across the alignment. Rock outcrops were observed commonly along the alignment.



The alignment generally was heavily vegetated, with a variety of trees, shrubs, grasses, and other vegetation being observed. Additionally, large cobbles and boulders were also observed on the ground surface.

SITE RECONNAISSANCE AND SUBSURFACE EXPLORATION

Limited observations of the site surface conditions, including visual assessments of site slopes, land use, vegetation, etc., were performed in October 2019, corresponding broadly to our subsurface exploration for other elements of the project. In addition to the site observations, an initial document review was performed to summarize the relevant geologic conditions along the tramway alignment and at the proposed parking garage. The results of these studies are provided below.

SUBSURFACE CONDITIONS

The project site lies in a complex geologic region created by a variety of geologic forces and processes. Many geologic structures are present and complicate the understanding of the geologic conditions affecting engineered structures. Additionally, the specific rock types present at this site are themselves sources of unique geologic constraints. The following sections of the report will discuss the local geologic conditions in greater detail.



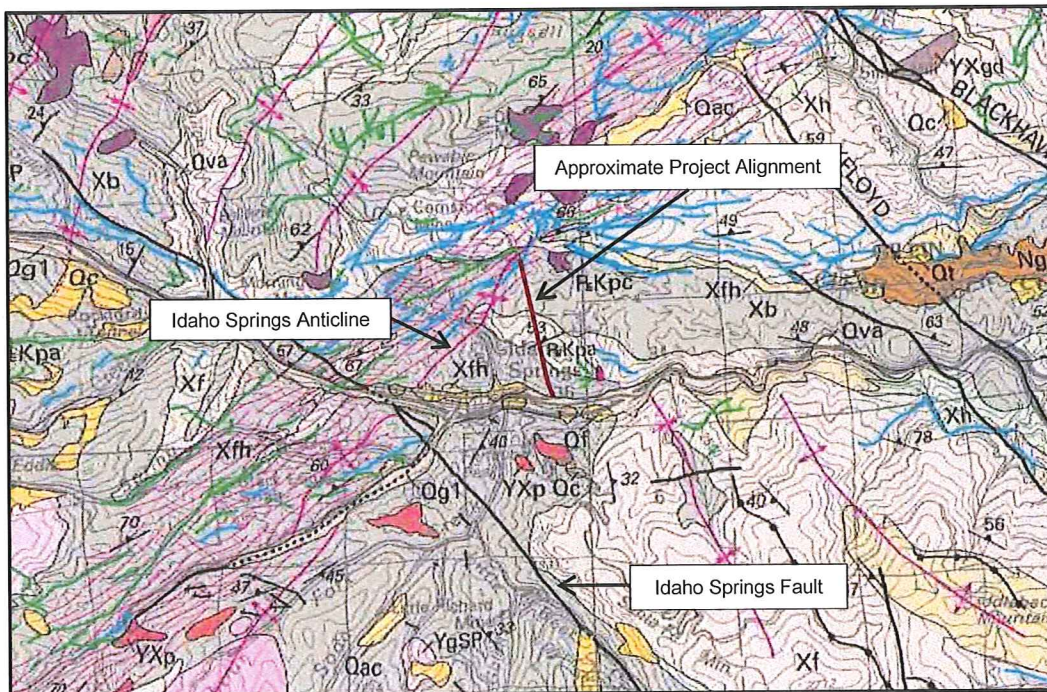
Mighty Argo and Virginia Canyon Mountain Park Mixed-Use Development Annexation of Four Parcels to be included in Planned Development

7.0 - APPENDIX - GEOLOGIC SUMMARY

Initial Geologic Hazard Analysis **Revised**
Argo Mine Redevelopment
Job No. 19-3070
Page 4 of 14

Local Geologic Units

Published geologic maps, e.g., Widmann, Kirkham, and Beach (2000),¹ Sims (1964),² and Kellogg, Shorba, Bryant, and Premo (2008),³ depict the site as underlain by Proterozoic metamorphic rocks overlain locally by mine waste rock and mill wastes, colluvium, and alluvium. Felsic intrusions are also mapped along the alignment as well. A portion of the Kellogg, Shorba, Bryant, and Premo (2008) map reproduced below.



Colluvium and alluvium in the project area, generally consist of fine to coarse sands and gravels with large cobbles and boulders. Varying fractions of silts and clays are also present and weathering typically increases the clay contents of these deposits.

¹ Widmann, B.L., Kirkham, R.M., and Beach, S.T., 2000, *Geologic map of the Idaho Springs quadrangle, Clear Creek County, Colorado*: Colorado Geological Survey, Open-File Report OF-00-2SR, scale 1:24,000

² Sims, P.K., 1964, *Geology of the Central City quadrangle, Colorado*: U.S. Geological Survey, Geologic Quadrangle Map GQ-267, scale 1:24,000

³ Kellogg, K.S., Shorba, R.R., Bryant, Bruce, and Premo, W.R., 2008, *Geologic map of the Denver West 30'*



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Mill waste rock and mill wastes generally include fine to coarse sands and gravels with cobbles. Boulders can be present as well. Clays and silts are also present and weathering tends to increase the clay contents. Additionally, mill waste rock and mill wastes can include debris and other wastes associated with mining and milling. These can include mining equipment, metal, and wood and can be relatively large and difficult to handle. Other wastes may be present as well.

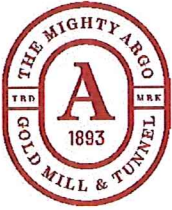
Specific varieties of the metamorphic rocks mapped include biotite gneiss, quartz feldspar gneiss, and microcline-quartz-plagioclases-biotite gneiss. Gneiss is a heavily metamorphosed (deformed) rock characterized by foliation and mafic / felsic banding. The banding can be on various scales, ranging from about ¼ inch or smaller up to several feet. The foliations can create planes of weakness where relatively weaker minerals are layered together in a preferential orientation.

Migmatite is also mapped at the project alignment. Migmatite is a heavily metamorphosed rock similar to gneiss, but its genesis included partial melting. This process creates zones of rock similar to granite or similar igneous rocks surrounded by heavily foliated, highly mafic rock.

The intrusions are mapped as including bostonite, trachytic granite, quartz monzonite, alaskite, alkali syenite, albite granodiorite, and leucocratic granodiorite. The size (width) of these intrusion varies locally from about ¼ inch or less to 10s of feet. The intrusion also include fine to very coarse grained rocks (including pegmatite).

For the purposes of the report, the metamorphic rock underlying the project site and alignment will be referred to collectively as gneiss. The various intrusion will be referred to collectively as felsic intrusions.

As the upper several feet of these rock weather, they often develop into residuum or grus. Locally, these materials are largely similar of the alluvial and colluvial material present in the project area, and generally consisted of fine to coarse sands and gravels with varying fractions of silts and clays. At the project site, these materials ranged in thickness from a few inches to 2 to 3 feet.



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Geologic Structures

The project site and alignment are located within the Idaho Spring – Ralston shear zone, which is a northeast trending zone of deformation that forms a boundary in the direction of foliation and folding in the region. Within the shear zone, there are many small and large scale geologic structures. The two primary geologic structures near the project site and alignment are the Idaho Spring anticline and the Idaho Springs fault. These two structures are discussed in greater detail below.

Idaho Springs Anticline The Idaho Springs anticline is a northeast-southwest trending anticline that plunges to the northeast. Widmann, Kirkham, and Beach (2000) indicate that the Idaho Springs anticline is strongly asymmetric with a northwestern limb that steeply dips to the northwest and a southeastern limb that dips moderately to the northeast.

The majority of the alignment and project site is located on the southeastern side of the anticline. The anticline is mapped as being offset by the Idaho Springs fault, southwest of the City of Idaho Springs. A synform structure is shown in a cross section between Trail Gulch and Spring Gulch to west of the anticline and south of the project site and the Pewabic Mountain syncline. Another anticline is mapped to southeast of the Idaho Springs anticline, near Soda Creek, and no syncline/synform structure is explicitly mapped between the two structures. This unnamed anticline is mapped as ending at the Idaho Springs fault. A syncline is mapped to the east of the Idaho Springs anticline, trending approximately north from Santa Fe Mountain, but is not mapped north of Clear Creek.

The foliations in the gneiss are generally mapped as having a northwest – southeast strike and dip to the northeast. However, a northwest-southeast strike and northwest dip is mapped to the east of Rosa Gulch. Dips were generally mapped to be between about 30 and 55 degrees near the alignment.

Idaho Springs Fault The Idaho Springs fault likely formed during the Precambrian after the formation of the Idaho Springs – Ralston shear zone. Offsets observed in the metamorphic rocks indicate left lateral, strike-slip movement. However, the Idaho Springs fault may have been reactivated in a normal sense during the Laramide.



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The fault is not mapped as crossing the project site or alignment, but smaller faults, not shown on the geologic maps, may be present locally that traverse the alignment or project site.

Jointing Joint orientations are mapped near the project site and are shown with a northeast-southwest strike and a dip of about 45 degrees to the southeast. The orientation is approximately perpendicular to the orientation of the rock foliation and Idaho Springs fault, and parallel to the Idaho Springs anticline. Orientations measured by Brierley Associates generally east – west to northeast-southwest striking with dips of 20 to 50 degrees and 80 to 90 degrees to the northwest and south, respectively. Joints with northwest – southeast strikes were also measured with dips of 80 to 90 degrees.

INITIAL GEOLOGIC HAZARD DISCUSSION

The following sections provide a limited discussion of common geologic hazard in Colorado and other geologic hazards may be present at the site. The discussion provided in the report is not sufficient for final design, but may be used in initial project planning. Design level geotechnical studies should be performed to address potential geologic hazards and provided remedial hazard prevention and mitigation options.

It should be noted that environmental concerns, such as pollution and a development's impact on wildlife, are not included in this discussion, and should be evaluated by others, if necessary.

Expansive Soils Swelling clayey soils and bedrock change volume in response to changes in moisture content that can occur seasonally, or in response to changes in land use, including development. Expansion potentials vary with moisture contents, density, and details of the clay chemistry and mineralogy. The swell potential in any particular area can vary markedly both laterally and vertically due to the complex interbedding of the site soil and bedrock materials. Moisture changes also occur erratically, resulting in conditions that cannot always be predicted.

The shallow earth materials underlying the site generally consisted of sands and gravels with varying fractions of silts and clays. The plasticity of the site soils ranged from non- to slightly plastic. Additionally, expansive soils are not mapped within the project site. We consider the risk of damaging expansive soils heave at the site will be relatively low.



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Collapsible Soils Certain surficial deposits in Colorado, typically eolian (wind-blown) materials, as well as unconsolidated debris flow, landslide, and alluvial fan deposits are known to be susceptible to local hydro-consolidation or “collapse.” Hydro-consolidation consists of a significant volume loss due to re-structuring of the constituent grains of the soil to a more compact arrangement upon wetting.

Eolian deposits generally have not been mapped in the underlying site or the immediate project area and were not recognized in during our site reconnaissance. However, debris flow deposits are mapped in the project area and likely are present in Rosa Gulch. Local landslides, debris flows, etc. were not identified on the project site during our site reconnaissance, but likely are present. We consider that the risk of collapsible soils damage affecting development at this site to be low to moderate.

Radon Testing for the possible presence of radon gas prior to project development does not yield useful results regarding the potential accumulation of radon in completed structures. Radon accumulations typically are found in basements or other enclosed portions of buildings built in areas underlain at relatively shallow depths by granitic crystalline rock. Therefore, the likelihood of encountering radon in concentrations exceeding applicable health standards on the subject site, underlain by gneissic bedrock and igneous intrusions, is relatively elevated compared to many other regions of Colorado.

Seismic Activity / Faulting Review of geologic maps depicting the project area, depicted the Idaho Springs Fault about 1 mile to the southwest of the project site. However, neither site reconnaissance nor review of available geologic maps indicated recent movement across the fault. Therefore, the likelihood of surface fault rupture at the site is considered to be low.

Based on information published by the U.S. Geological Survey, we estimate the peak horizontal ground acceleration from earthquake-induced ground shaking at the site to be approximately 0.113g. This represents a moderate risk from ground shaking compared to other regions of Colorado, but a relatively low risk from ground shaking on the scale of the continental United States.

We consider the site likely to qualify as a Seismic Site Class C site, in accordance with



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of the classification is needed, shear wave velocity testing to 100+ feet or other quantitative method(s) will be required. By this method, a site Classification of B may be attainable. A proposal for this work can be provided upon request. Compared with other regions of Colorado, recorded earthquake frequency in the project area is low.

Slope Stability and Erosion Colton and others (1975),⁴ a moderate scale geologic map showing landslides in Colorado, indicates that landslide deposits on and adjacent to the project site. The Widmann and Rogers (2003)⁵ geologic hazard map of the area depicts the project area as having “Potentially Unstable Slopes,”⁶ “Unstable Slopes,”⁷ and as a “Rockfall Area”⁸ Evidence of relatively recent rock falls was not observed during our site reconnaissance; however, large cobbles and boulders that may have been deposited during rockfall events were observed in Rosa Gulch.

Debris chutes, in which debris flows or other such material flows may travel, are also shown in Rosa Gulch on the Widmann and Rogers (2003)⁹ geohazard map. Smaller scale geologic maps covering the project area, including Widmann, Kirkham, and Beach

⁴ Colton, R.B., J.A. Holligan, and L.W. Anderson, 1975, *Preliminary Map of Landslide Deposits, Denver 1° x 2° Quadrangle, Colorado*, U.S. Geological Survey, Miscellaneous Field Studies Map MF-705.

⁵ Widdman, B.L. and Willim, and Marsh, S.P., 2003, *Selected Geologic Hazards of the Georgetown, Idaho Springs, and Squaw Pass Quadrangles, Clear Creek County, Colorado*: Colorado Geological Survey, Division of Minerals and Geology, Department of Natural Resources, Open File Report 03-02, Plate 2, scale 1:24,000.

⁶ The Widmann and Rodger 2003 geohazard map describes Potential Unstable Slopes as: Slopes that are in a state of quasi-equilibrium and do not appear to be currently active but have the potential to generate life- and property-threatening hazards when disturb by human activities or natural processes. Potentially unstable slopes are primarily susceptible to rock fall, landslide, and debris-flow hazards and may be subject to all the same risk to life and property previously described for each of those hazards. When these soils are underlain by unconsolidated surficial deposits, they may be subject to sediment deposition, severe erosion, and downslope movement of material by gravity, surface water, creep, or freeze-thaw action.

⁷ The Widmann and Rodger 2003 geohazard map describes Unstable Slopes as: Slopes that have a high potential for life- or property-threatening failure. These areas are typically adjacent to and particularly susceptible to rockfall, landslide, debris-flow, and potential snow-avalanche hazards and may be subject to all the same risks to life and property previously described for each of those hazards. Unstable slopes may also be subject to severe erosion.

⁸ The Widmann and Rodger 2003 geohazard map describes Rockfall Areas as: Areas subject to deposition of relatively large fragments of rock and debris. Inherent risks in rockfall areas include injury or loss of life and severe damage to structures, roads, vehicles, and utilities. The lower limit of many rockfall areas is often gradational and difficult to delineate. Therefore, development in and below these areas should be avoided unless site-specific analyses (such as detailed field studies and computerized rockfall simulation profiles) indicate that careful siting or engineering solutions will effectively mitigate the hazard.

⁹ Widdman, B.L. and Willim, and Marsh, S.P., 2003, *Selected Geologic Hazards of the Georgetown, Idaho Springs, and Squaw Pass Quadrangles, Clear Creek County, Colorado*: Colorado Geological Survey,



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(2000),¹⁰ Sims (1964),¹¹ do not show landslide deposits in the project site or in adjacent areas.

The majority of the project site is relatively moderately to steeply sloping with slope angles of about 20 to 40 degrees. During our preliminary reconnaissance of site area, no evidence was noted of relatively recent mass-wasting processes associated with steep slopes, such as landslides, rock fall, slumps, or unusual soil creep were observed. However, evidence of older debris flows and rockfalls were observed. Therefore, the likelihood of project developments being affected by existing large scale, unanticipated slope instabilities is considered moderate to relatively severe. Significant changes to site slopes and potentially hazardous slopes, should be analyzed for stability prior to their construction.

Flooding The subject property abuts Clear Creek and includes Rosa Gulch. Based on the published FEMA Flood Insurance Rate Map (FIRM)¹² covering the project site, the southern margins of the project site are included in Zone AE indicating area subject to inundation by the 1% chance annual flood the remained or the project site and alignment are mapped as Zone X or are unmapped.

Significant fluctuation in the flow of streams can be expected during seasonal run periods.

A civil engineer should further evaluate evaluated the site with respect flooding during project planning.

Wetlands A portion of Rosa Gulch is mapped in the National Wetland Inventory as containing a wetland.¹³ A 2.28 acre "Riverine" is mapped in Rosa Gulch and is classified as a R4SBC. This classification indicates an intermittent, streambed, riverine that is

¹⁰ Widmann, B.L., Kirkham, R.M., and Beach, S.T., 2000, *Geologic map of the Idaho Springs quadrangle, Clear Creek County, Colorado*: Colorado Geological Survey, Open-File Report OF-00-2SR, scale 1:24,000

¹¹ Sims, P.K., 1964, *Geology of the Central City quadrangle, Colorado*: U.S. Geological Survey, Geologic Quadrangle Map GQ-267, scale 1:24,000

¹² Federal Emergency Management Administration, 2012, *Flood Insurance Rate Map, Clear Creek County Colorado and Incorporated areas, Panel 240 of 350*, <https://map1.msc.fema.gov/idms/IntraView.cgi?KEY=57507910&FIT=1> accessed on 10/24/2019.

¹³ U.S. Fish and Wildlife Service, 2012, *National Wetland Inventory, Clear Creek County, Colorado*



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seasonally flooded. Special consideration and development limitations may apply to this area.

Avalanche Hazard Widmann and Rogers (2003)¹⁴ geohazard map covering the project area did not indicate an avalanche hazard in the project area. Additionally, evidence of prior avalanches, such as avalanche chutes, downed trees, etc., were not observed on site. However, given the angles of the existing site slope, if significant changes to the vegetation of the site slopes are made or if significant changes to site slopes are made, the risk of an avalanche may be greatly increased. We evaluate the risk of avalanche at the project site to be relatively low, but it should be noted the avalanche hazard is highly dependent on existing snow and weather conditions and that these conditions can change rapidly. Even though the risk of an avalanche at this site appears to be relatively low, the potential for avalanches cannot be excluded.

Mining Activity and Subsidence Significant mining activity has occurred in the greater project area. In addition to the activity at the Argo Mill, many other mining activities likely occurred along the project alignment. Some evidence of these activities was observed during our site visits (see the *Site Conditions* section of this report), and other mine and mill workings should be anticipated to be present along the alignment.

We understand that review of mining activity was performed by others. Therefore, a review of mining activity was not included as part of this report.

Published geologic maps do not indicate formations underlying the site at shallow depths that include evaporite (salt, gypsum, etc.) deposits, limestones, or other materials vulnerable to subsurface dissolution. Therefore, the likelihood of subsidence (associated with such rock formations; not mine or mill related) or other hazards related to subsurface dissolution also appears to be low.

Geologic Hazard Summary

1002.1.3.2 Impact Evaluation Based on the information obtained for this study, the risk to improvements at this site from the possible presence expansive soils heave

¹⁴ Widdman, B.L. and Willim, and Marsh, S.P., 2003, *Selected Geologic Hazards of the Georgetown, Idaho Springs, and Squaw Pass Quadrangles, Clear Creek County, Colorado*: Colorado Geological Survey,



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appears low. The risk to improvements from collapsible soils, including undocumented fills and mill waste rock is higher, and the effects of collapsible soils likely will need to be mitigated. Because expansive and collapsible soils can cause damage, design-level geotechnical evaluations for individual structures should assess the presence locally of expansive materials, so that appropriate, remedial design and construction can be implemented, as necessary.

Similarly, the risk to developments at the site from surface fault rupture appears low. The risk associated with earthquake-induced ground motions is not elevated relative to other sites in the project vicinity.

The risk of flooding at the site also is low to moderate. However, it has been our experience that surface and groundwater levels fluctuate greatly in mountainous areas due to seasonal conditions, primarily spring snow melt and run-off. Therefore, periodic, saturation of the shallow soils should be anticipated. This applies to the entire site, although the effects generally will be magnified in the lower elevation portions of the site and within Rosa Gulch. Design of improvements should include appropriate provisions for surface and sub-surface drainage.

The risks from avalanches and excessive erosion at the site appear low at the time of preparation of this report. However, the potential for both could be increased if significant numbers of trees were cut, particularly from steeper areas of the parcel.

The risk of slope instability at the site appears relatively low overall. However, rock outcrops and relatively steep slopes were encountered locally. In GROUND's opinion, improvements, in general, should be set back from these slopes. Where those areas are approached, slope-specific analyses should be performed to assess risk and means of stabilization, as appropriate.

The risk of non-mining-related subsidence at the site appears to be low. The risk of mining related subsidence was addressed by others.

The risk of radon accumulation in structures at the site appears elevated compared to many other areas in Colorado. This applies to the entire site. Radon testing should be performed in each building on-site, after construction is completed. Proper



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ventilation usually is sufficient to mitigate potential radon accumulations. Building designs should accommodate such ventilation for all building areas.

1002.1.3.3 (2a) Site Specific Analysis Several geologic hazards were noted at the subject site, as outlined above.

The risk of radon accumulation cannot be evaluated further prior to construction, but effective ventilation can be included in building design against the possibility of elevated radon levels.

For initial planning purposes, in GROUND's opinion the following set-backs should be observed due to the presence of locally steep slopes at the project site and along the alignment.

- Habitable structures should be setback from slopes that are 30 percent or steeper a distance of at least three times (3x) the local slope height.
- Other structures and access roads should not traverse or be adjacent to slopes of 30 percent or steeper.

However, at this site following the above setbacks likely will be difficult. Where improvements are proposed closer to 30+ percent slopes than outlined above, then slope-specific stability analyses should be performed, and necessary slope stabilization measure undertaken.

1002.1.3.3 (2b) Recent Modifications No indications of relatively recent events or improvements were noted on the site that appeared to have altered the site significantly with regard to increasing the risk of geologic hazards there.

CLOSURE AND LIMITATIONS This letter has been prepared for The Mighty Argo Denali Holdings, LLC as it pertains to the initial evaluation of the Argo Mill Redevelopment as described herein. It may not contain sufficient information for other parties or other purposes.

The geotechnical conclusions in this report relied upon the means and methods described herein. The information herein is not sufficient to support design of buildings or other improvements



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If any information referred to herein is not well understood, then the Mighty Argo Denali Holdings, LLC, or anyone using this letter, should contact the author or a GROUND principal immediately.

This report was prepared in accordance with generally accepted soil and engineering geology practice in Colorado at the date of preparation. Current applicable codes may contain criteria regarding performance of structures and/or site improvements which may differ from those provided herein. Our office should be contacted regarding any apparent disparity. GROUND makes no warranties, either expressed or implied, as to the professional data, opinions or conclusions contained herein.

This document, together with the concepts and conclusions presented herein, as an instrument of service, is intended only for the specific purpose and client for which it was prepared. Reuse of or improper reliance on this document without written authorization and adaption by GROUND Engineering Consultants, Inc., shall be without liability to GROUND Engineering Consultants, Inc.

If you have any questions, please contact this office.

Sincerely,

GROUND Engineering Consultants, Inc.

Ben Fellbaum, P.G.

Reviewed by Brian H. Reck, P.G., C.E.G., P.E.



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8.0 - APPENDIX - WATER DEMAND ANALYSIS

WATER/WASTEWATER DEMAND ANALYSIS - UPPER LANDING

Item: Flow Projections
Project: Argo Upper Landing
Customer: The Mighty Argo
Date: 1/31/2020



Mighty Argo WWTP Flow & Loading Projections (Regulation #43 - On-Site Wastewater Treatment)						Potable Water Use
Use	Number of Units	Unit	Value	Unit	Flow (GPD)	Flow (GPD)
Facilities w/Short-Term Transient Visitors	2,000	visitors	5	GPD/visitor	10,000	11,000
Office Building	20	employees	15	GPD/employee	300	330
Food Trucks (Paper Service)	75	seats	25	GPD/seat	1,875	2,063
Bar	60	seats	30	GPD/seat	1,800	1,980
Retail	4,000	ft ²	0.1	GPD/sqft	400	440
Gondola Washing					250	275
Calculated 30 Day Flow (GPD):					14,625	16,088
Rounded 30 Day Design Flow (GPD):					20,000	
Average 30 Day Flow (GPM):					14	
Peak Day Factor					2	
Peak Day (GPD)					40,000	
Peak Day Flow (gpm)					28	
Peak Hour Factor					4	
Peak Hour Flow (gpm)					56	



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9.0 - APPENDIX - MEMOS - CIVIL ENGINEERING



To: CDPHE
From: Martin/Martin, Inc.
Copy To: City of Idaho Spring
Clear Creek County
Mark Thornbrough

Date: March 2, 2020
Project No.: 19.1070
Project Title: Mighty Argo Upper Landing

Re: Mighty Argo Upper Landing Utility Separation Concept

For your consideration, this memorandum summarizes the proposed utility corridor and separation plan for proposed improvements associated with the Mighty Argo Upper Landing project.

Utilities associated with the improvements include potable water, sanitary, reclaimed water, gas, and an Xcel electric duct bank. A utility yard will be provided that contains a potable water tank, wastewater treatment facility, and a reclaimed water tank to be designed by a separate consultant. No water or sanitary service connections will be made to the City's or County's infrastructure. Potable water will be delivered to the onsite water storage tank that will be used to service the development. A sanitary line will convey wastewater to the onsite wastewater treatment facility. The wastewater treatment facility will produce reclaimed water that will then be stored in a reclaimed water tank and is anticipated to be used for irrigation and non-potable functions such as toilet flushing. See attached utility plan for additional information.

Preserving as much of the natural environment as possible and balancing the limited access needs to the site with the cost of rock excavation, the proposed access road is 16ft wide. Where the standard separation distances between potable water, sanitary, and reclaimed water is 10ft, per section 8.8.4 of the Colorado Department of Public Health and Environment's (CDPHE) Design Criteria for Potable Water Systems, "exceptions to the horizontal separation distance are allowed, provided that the water main is laid in a separate trench or on an undisturbed earth shelf located on the 'uphill' side of the sewer at such an elevation that the bottom of the water main is at least 18 inches above the top of the sewer". See highlighted excerpt from CDPHE's design criteria attached.

The proposed typical utility cross section locates the potable water line uphill of the sanitary and reclaimed water and provides 10ft of horizontal separation to the sanitary and approximately 8.5ft of horizontal separation to the reclaimed water. Additionally, the potable water is located 18" above the reclaimed and the reclaimed water is 18" above the sanitary. The pipe material for the potable water, sewer, and reclaimed water is proposed to be fused HDPE for additional cross-contamination protection. The sewer pipe will have a minimum pressure rating of 150 psi per CDPHE's criteria. Where the utility trenches are anticipated to be in rock, this will further mitigate any cross-contamination concerns.

We believe that this strategy provides adequate protection of the potable and reclaimed water lines. As such, we are requesting exception from the 10ft horizontal separation distance due to the severe conditions of the project site.

Sincerely,

Mark Sundstrom, P.E.