TREASURE HILL PARK CITY OCTOBER 11 2017 PRESENTATION and SUMMARY NARRATIVE:

Purpose—The purpose of this writing is to provide a concise summary narrative coupled with the attached slides and exhibits of the Park City Planning Commission Presentation on October 11, 2017 by Big-D Construction, Robinson Construction Group, MPE INC, and AGEC INC regarding staging, phasing, other construction related items, excavation, effect on skiing, and geotechnical conditions pertaining to the Treasure Hill CUP Application submitted January 26, 2004. It is intended as a supplement to the Constructability Assessment Report submitted by Alta Engineering on June 26, 2017. In a few places, it updates presentation information based on new information, most notably in that at the present time, (1) the City Engineer has requested the use of Lowell Avenue alone as construction access with the addition 3-5 feet of pavement on the uphill side of Lowell Avenue extending from the project to Manner Way and (2) King's Crown ski run will remain open with snowmaking each and every ski season.

BIG-D by Troy Thompson

Phasing and Staging

We've identified four distinct phases: Phase I, Phase 2, Phase 3 and Phase 4. See Exhibit 1.

Phase 1: Phase 1 will include the 1 Buildings, 2 Building, and lift improvements. Work will start near the street with access improvements and a material lay down area and will move to the South where work on excavation will begin. It will probably take most of a full year to install retention devices and excavate for foundations. One of the really cool things about this project, unlike a downtown projects where there is no staging and lot line to lot line excavation, there is room to move soil around the entire site which is quite large. In the 17.2 refinement, there's approximately 1,000,000 cubic yards, accounting for a swell factor, that need to be dug out and moved. Phase 1 will open the gateway for excavation, roads will be cut, and flat areas will be created in such a way that the excavation material can be moved to the northwest end of the building site. The material will be staged there for placement further up the gulch. In Phase I, as can be appreciated in the plan sections, there are cuts coming down the mountainside into the garage level. Where necessary these cuts will need to be permanently stabilized if left exposed and temporarily stabilize during the construction process. Concrete operations will follow working from South to North. During the first year, the goal will be to finish the earthwork and the garage to the point they can be used for material and operations staging and the buildings can go vertical. During the second year non-ski season, we would also anticipate the construction of the new lift improvements, understanding that, regardless, at all times during the ski season ski access on the south side of the Lift will be maintained to the town. 1,000,000 cubic yards of dirt is approximately 100,000 truckloads if the material is taken down the street. However, this impact will be avoided by balancing the excavation material on site.

<u>Phase 2:</u> Phase 2 will include the 5 Buildings located along the side of Creole Gulch. Initially, there will be significant retention and earthwork and then a process similar to Phase 1 will proceed.

<u>Phase 3:</u> Phase 3 will include the 4 Buildings and associated parking with several hundred thousand yards of material being removed out of that particular hole and moved up into the Creole Gulch. The process of constructing the garage will begin followed by vertical construction.

<u>Phase 4:</u> Phase 4 will include the 3 Buildings. The Phase 4 area will be the final staging and construction area. We're proposing from the onset of Phase 1 that a berm be maintained in that location adjacent to the street using the existing slope and vegetation to the extent possible and be maintained as long as possible prior to the construction of this final phase. This berm will provide a visual and noise barrier for much of the project construction timeline. Phase 4 construction will then proceed in a manner similar to previous phases.

<u>Staging:</u> All material and construction activity will be staged on site and screened from the public. Trash and sanitary facilities and other logistical details will be set forth in a Construction Management Plan arrived at jointly with the Park City Building Department and which will be updated as the construction of various phases proceeds.

<u>Fencing and Landscaping:</u> The entire project limits of disturbance will be fenced initially with an 8' chain link fence to protect the public from inadvertently getting mixed up in the construction process. This fence will be proactively contracted as areas are finished, landscaped, and safe. Permanent fences will be constructed as described elsewhere as required by code and to protect skiers, bikers and hikers regarding permanent steep slopes and retaining walls. The intent is to landscape the periphery of the project as well as any other portion proactively to provide an early landscaped buffer between active construction and the public interface and to allow the vegetation maturation process to begin.

Other Construction Related Items

Manpower and Parking: This project is not going to be built all at once, it will be built in phases. Each of these phases will look and operate like construction projects that we do all the time. We anticipate about 300 workers at peak times. These workers will be bused to the site from remote locations. We'll have a sufficient number of these buses running primarily in the morning and evening. We anticipate the remote site(s) will be located outside the present City limits on leased property where construction personnel can park their personal vehicles. There will be rigorous enforcement of this plan and a prohibition of workers parking in nearby neighborhoods. This approach is very common and effective on big projects in urban settings. Construction employees will not rely on the proposed cabriolet gondola to access the site.

<u>Emergency Access:</u> We will have an active program in place to not only manage our traffic but where we can help assure emergency access along local streets working in conjunction with local authorities and the Park City Mountain.

<u>Deliveries, Construction Traffic, Loading and Unloading:</u> There will be no off-loading or loading of vehicles parked in City streets. There will be no cueing of construction vehicles on nearby streets. There will be a delivery manager to assure this is the case who will coordinated with appropriate City employees. Just-in-time management practices will be utilized. According to a predetermined Construction Management Plan which will be part of the permitting process and further according to subsequent amendments to that and directives from the City Engineer, all material and

equipment deliveries will follow designated routes which will be improved and/or maned by certified flaggers when and where required. Hours and days of operations will be modulated according the Construction Management Plan in order to avoid high traffic periods, inclement weather, and other special circumstances and to be compliant with all applicable ordinances. Streets will be cleaned proactively everyday. Social media and a news letter will keep neighbors posted on construction activities.

<u>Estimated Duration of Construction.</u> How long it will take to build the entire project will depend on many factors such market conditions, weather, and final design details. Nonetheless, a conservative estimate is three years for each phase—however, with some overlap, so say 8 years. Keep in mind there will be reduced construction activity during winter seasons, busy events, and holidays thus lengthening the construction process. Each phase will be designed to stand alone with interval landscaping acceptable to the City regarding any extended periods of interruption. Obviously, this will benefit not only the City a large but the occupied units and future marketing efforts.

Troy Thompson

Jany Delango

Executive Vice-President of Big-D Construction

11-14-2017

ROBINSON CONSTRUCTION by Tim Jones

Excavation and Material Placement

Robinson Construction was asked by MPE INC to evaluate the excavation portion of the Treasure Hill Project to determine the most effected means to remove material from the building site and place it on the Creole Gulch and King's Crown depository sites. This proposal is based on the current design and will require some adjustments as the full character of the material is evaluated, including onsite inspection during construction. Based on Robinson Construction's past experience on a number of commercial and industrial sites including work on the Park City Mountain and, in fact, Treasure Hill itself, what is presented here is a logical and feasible approach to the excavation and placement process.

Robinson Construction proposes to perform the foundation excavation and mass excavation using standard excavation methods. This entails using large excavators and haul trucks to remove the soil. Earth filled ramps will be installed to facilitate the haul units, but where space is restricted, excavators (so called bucket brigade) will be used to elevate the material to a location so that it can be loaded out. In the areas of the proposed cliffscapes, the operation will work closely with landscapers to ensure coordination of their work and compliance with the approved landscape plan. In order to mitigate potential dust, water trucks and off-road water wagons will be used to wet the work zone and haul roads. Conveyor systems will not be the primary method of moving material due to the requirement that material must first be processed and noise, dust, grade, and distance considerations, although, it is possible they will have a limited role.

To prevent pedestrians, skiers and mountain bikers from wondering into any portion of the excavation and material placement work zones, a safety fence will be installed around the entire perimeter, with signs warning of the work ahead. This perimeter fence will be adjusted to allow for seasonal opening of the King's Crown and Quit'n Time ski runs.

The fill operation in the Creole Gulch will begin at the bottom and work its way up. Topsoil will be stripped and stockpiled on the sides or the toe of the fill. Smaller vegetation such as grass and small brush will be mixed with the topsoil. Larger vegetation such as trees and bigger brush will be mulched and used for erosion control on finished slopes. As demonstrated in Exhibits 4 and 5, King's Crown will be the designated haul route. As the embankment operation progresses up the Creole Gulch, new ramps will be installed from King's Crown to bring material into the gulch. The previously used and no longer needed ramps as well as the completed associated fill slopes will be reclaimed as the process moves upward.

The embankment operation on the Creole slope will be performed under the direction of a soils engineer in benches that will be keyed into the existing slope. Only the portion of the slope that will need to be disturbed for the current bench will have the topsoil stripped and stockpiled nearby. The embankment material will be hauled to the Creole fill depository site using six wheel drive off-road articulated haul trucks. These trucks provide good traction in difficult terrain conditions. The embankment material will be placed with large dozers in lifts and compacted with a sheepsfoot compactor in order to attain the desired compaction and reduce material swell. Once the bench level has been attained, the new slope will be final graded and have topsoil placed and track walked. Finally, it will be planted with specified trees according to plans, seeded, and protected with mulch. Anticipated heavy equipment will include, large track excavators, 6x6 articulated haul trucks, large dozers, water trucks and off road water wagons, a sheepsfoot compactor, and a motor grader.

All the haul routes will be maintained and dust mitigated by water wagons that will spray water to prevent dust. A couple of 8000 gallon stand tanks will be used to top load water trucks as needed. It is anticipated the embankment operation will be suspended during the ski season or when wet weather conditions prevent safe transport of material and proper compaction of the material. Existing snow making hydrants on King's Crown and upper Quit'n Time ski runs will be marked and protected during the hauling process. As each haul season concludes, King's Crown and upper Quit'n Time will be graded as necessary with input from Park City Mountain to allow snow making and skiing operations on these runs for the upcoming ski season. As the placement and grading operation nears completion, snowmaking lines will be replaced as necessary to assure appropriate longterm operation.

A Storm Water Pollution Prevention Plan (SWPPP) will be implemented according to State and local standards for the entire operation to limit the discharge of storm water from the project. The SWPPP measures will be adjusted as needed as the work progresses.

In order to mitigate noise from construction equipment, exhaust scrubbers will be installed on all heavy equipment to muffle engine noise during construction operation. White noise back up alarms will be used on all heavy equipment stationed onsite.

The estimated time frame for excavation is approximately 600 working days.

As needed, blasting will be employed to break up hard rock. Blasting will be performed according to all applicable local, state, and federal regulations. In order to limit disturbance on nearby properties, blasts will be small, controlled and monitored to prevent impacts on adjacent properties. Blasting is the safest way to remove hard rock that is not amenable to removal with standard heavy earth-moving equipment. In these hard rock locations, it is quieter, quicker and creates less dust than other methods that could be employed, in particular, rock hammers attached to excavators.

Tim Jones

Operations Coordinator

Robinson Construction Group

11-14-2017

MPE INC by Pat Sweeney

Ski Improvements and Management of Ski Access

New ski runs will be added including a central beginner/intermediate run from the top of Payday; an intermediate/expert branch off of this central run connecting to lower Quit'n Time; a beginner branch off of this central run connecting to Upper Norfolk; a new branch off of King's Crown connecting to Creole; and a remade Creole Run, all as shown on Exhibit 2.

It will be necessary to close the upper trail connecting Quit'n Time to the old location of the midstation for the construction of Phase 1. It will be necessary to close Creole Run until Phase 2 is completed.

Lift improvements will be built during Phase 1b consisting of a standup cabriolet from the Town Base to the project and a detachable quad from the project to the top of Payday.

The lift will operate with run access to the Town Base each ski season with the above run closure restrictions.

Pat Sweeney

President of MPE INC

11-14-2017

AGEC by Taylor Nordquist

General Geotechnical Conditions

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Previous and pending new geotechnical studies (see Exhibits 6, 7 and 8) suggest the geotechnical conditions are favorable for the construction of the project as planned. In particular, the dip and

strike or, in simple terms, fracture lines are favorably oriented. The material is well suited. There is no apparent creep that would predict instability.

Nonetheless, ongoing geotechnical analysis and site inspection and adherence to recommended methods including benching to clean competent material, compacting, and drainage facilities will be important to assure safe stable conditions. Rock bolting and other stabilization techniques will be required in places.

Refer to the soil studies and opinions for more definitive technical details.

Taylor Nordquist, ETT

AEGC INC

11-14-2017

Treasure - Park City, Utah

Planning Commission Presentation October 11, 2017

Phasing, Staging, Construction - Prepared in response to Commission, Staff, Public Comments, and to comply with MPD and CUP requirements. Goals:

- 1) Arrive at workable phasing plan by Big-D (exhibit 1)
 - a. Give priority to lift improvements
 - b. Phase 1—Lift,1 Buildings, 2 Building, and associated access
 - c. Phase 2—the 5 Buildings
 - d. Phase 3—the 4 Buildings
 - e. Phase 4—the 3 Buildings
- 2) Arrive at feasible ski access plan by Big-D (exhibit 2)
 - a. Keep lift operational every season, integrate lift improvements
 - b. Phase 1-keep South Town runs open, 1b-finish ski access to quad
 - c. Phase 2—finish North Town runs

Phasing, Staging, Construction - Prepared in response to Commission, Staff, Public Comments, and to comply with MPD requirements.

Goals (cont.):

- 3) Create a practical master staging plan by Big-D (exhibit 3)
 - a. Move immediately off the street
 - b. Leave a berm at Lowell/Empire until Phase 4
 - c. Fence or otherwise safely contain construction areas
 - d. Contract fence and landscape proactively
 - e. Employees parking and shuttles, prohibiting parking on nearby streets
 - f. Deliveries
 - g. Materials
 - h. Distribution
 - i. Trash
 - j. Sanitary facilities

Phasing, Staging, Construction - Prepared in response to Commission, Staff, Public Comments, and to comply with MPD requirements. Goals (cont.):

4) Incidentals by Big-D

- a. Limit working hours December-March, holidays, events
- b. Pay attention to what is going on—weatherTypical busy day—number of trucks up Lowell
- c. Keep it all on Lowell, 5' flex space uphill side—6" asphalt 18" base
- d. Keep flex space clear as necessary—snow, lackadaisical parking
- e. Ongoing collaboration with the City and Ski Resort
- f. Communication with neighbors
- g. Keep streets clean

Phasing, Staging, Construction – Prepared in response to Commission, Staff, Public Comments, and to comply with MPD requirements.

Goals (cont.):

5) Hole excavation by Robinson Construction

- a. Excavate hole in standard fashion—like downtown
- b. Ramps and bucket brigade to pickup area
- c. Cliffscapes—construct, stain and revegetate on the way down per guidelines
- d. Dust control—water trucks
- e. Construct safety fence on top, signage

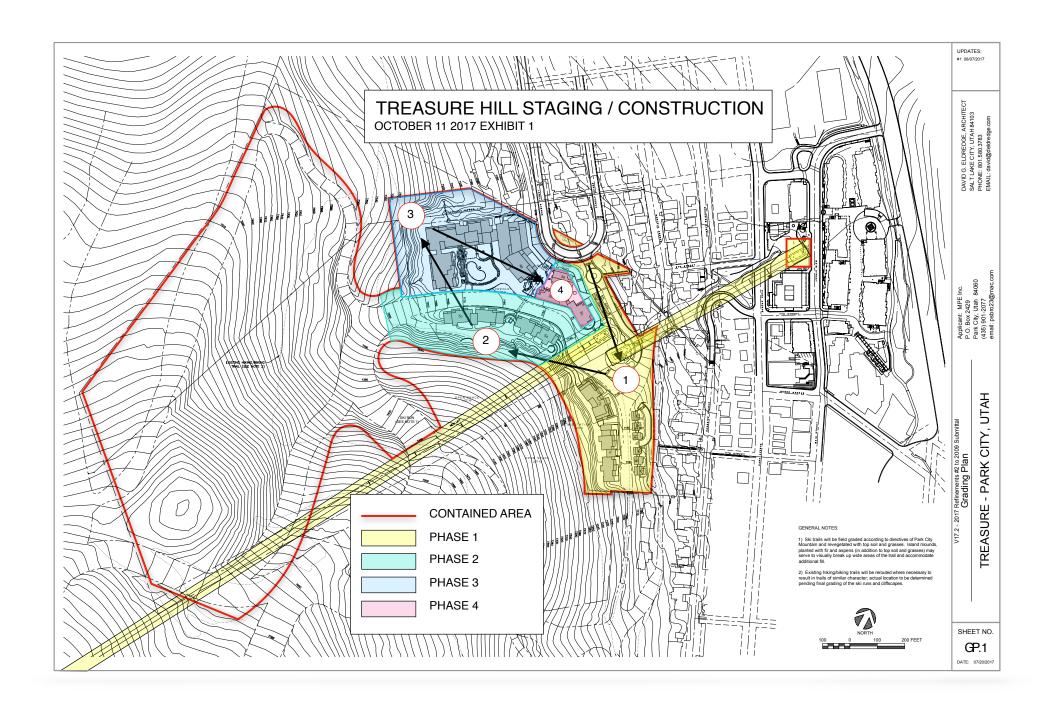
Phasing, Staging, Construction – Prepared in response to Commission, Staff, Public Comments, and to comply with MPD requirements.

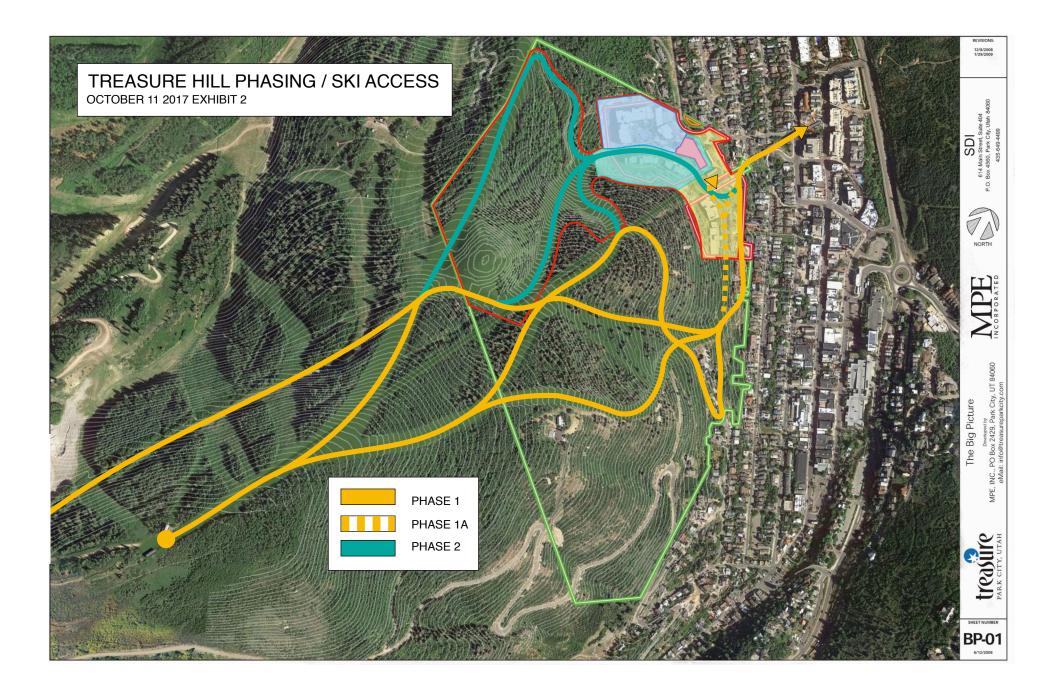
Goals (cont.):

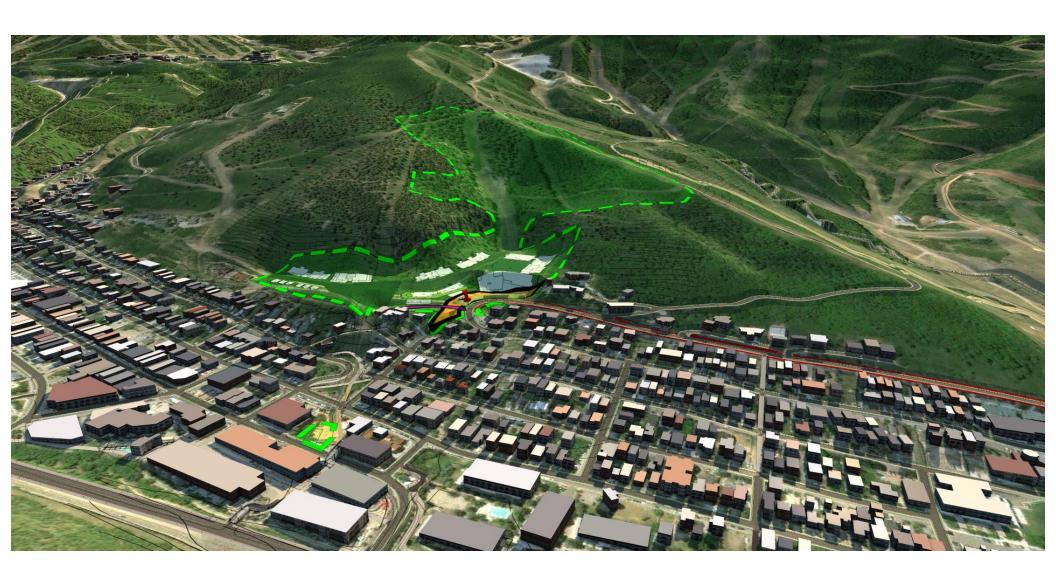
6) Placement of material by Robinson Construction (exhibit 4 & 5)

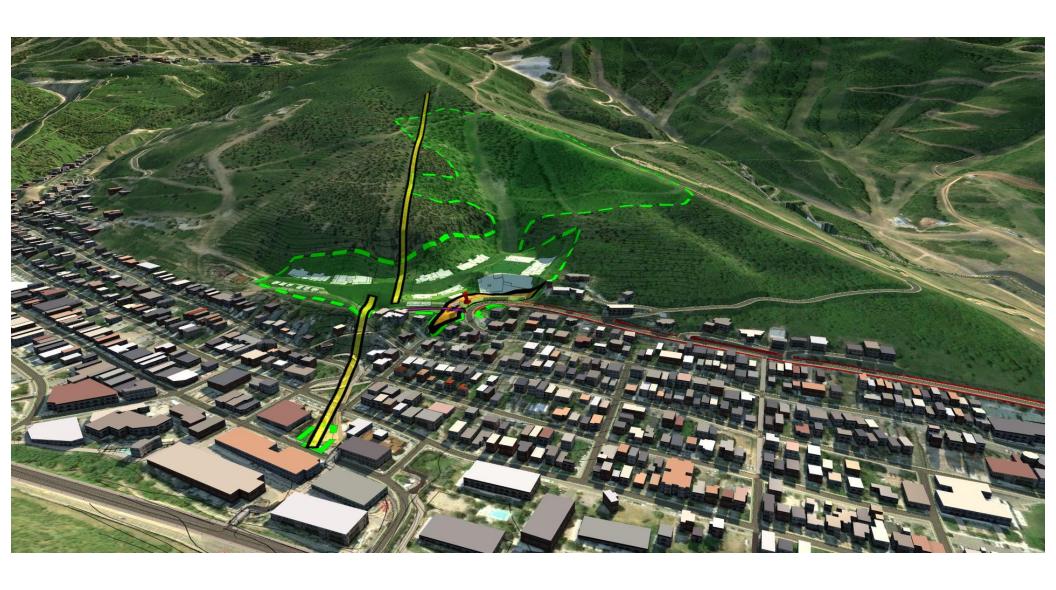
- a. Bottom up, reclaim as you go
- b. Mulch trees, stockpile top soil/organics
- c. Haul road up King's Crown
- d. Distribution roads—in places 40' cross cuts, steep cuts, to be reclaimed
- e. Bench placement zone
- f. Haul and work material to desired to locations
- g. Dust control, stand tanks, water trucks
- h. Place and compact material according direction of soils engineer
- i. Replace top soil / organics, track & seed
- j. Implement SWPPP and DEQ protocols (Cont.)

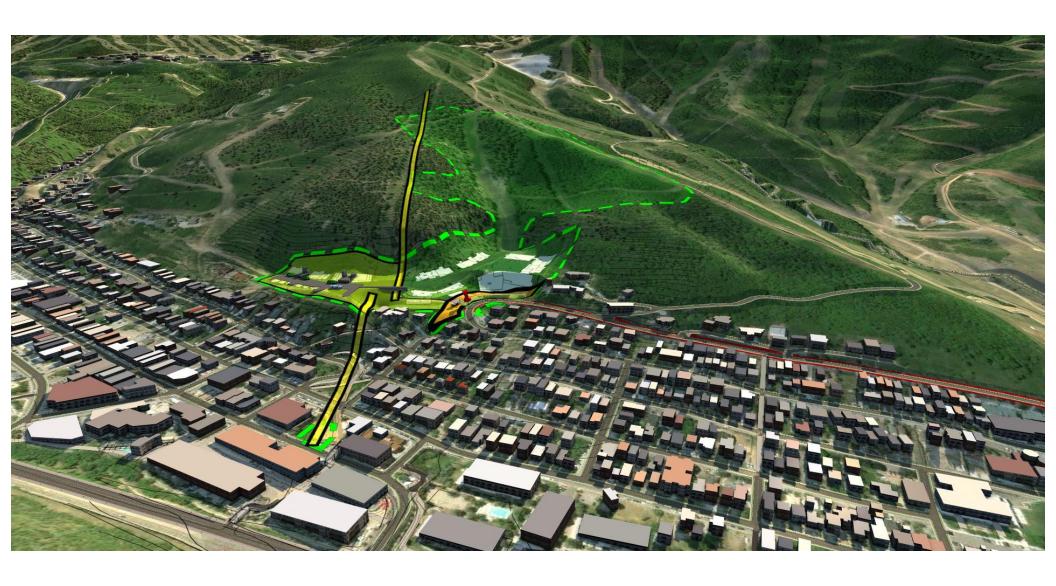
- k. Shut down during ski season
- Equipment—excavators, dozers, sheep foot, articulating trucks, water trucks
- m. Exhaust scrubbers
- n. Estimated time frame

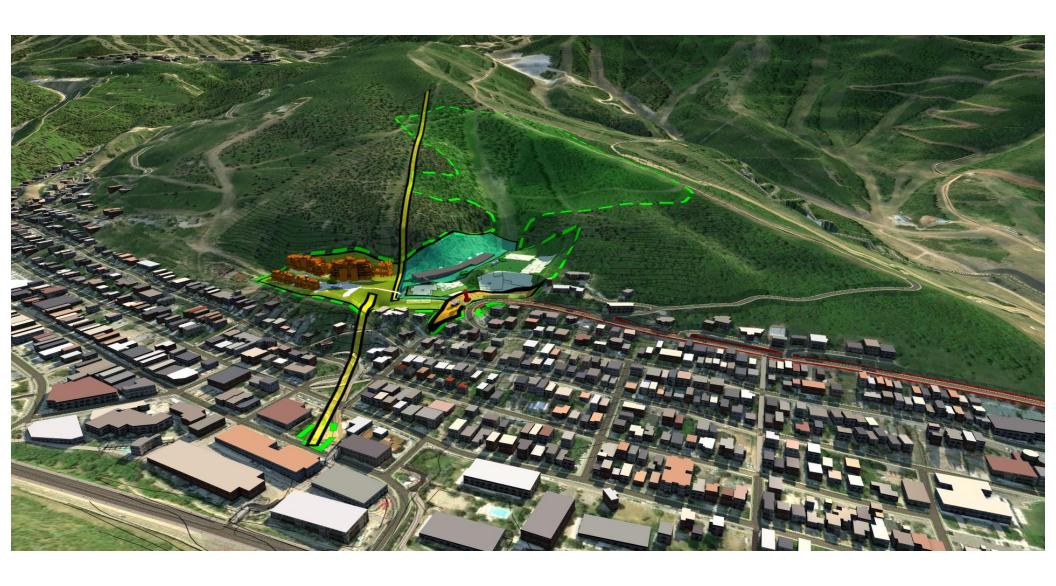


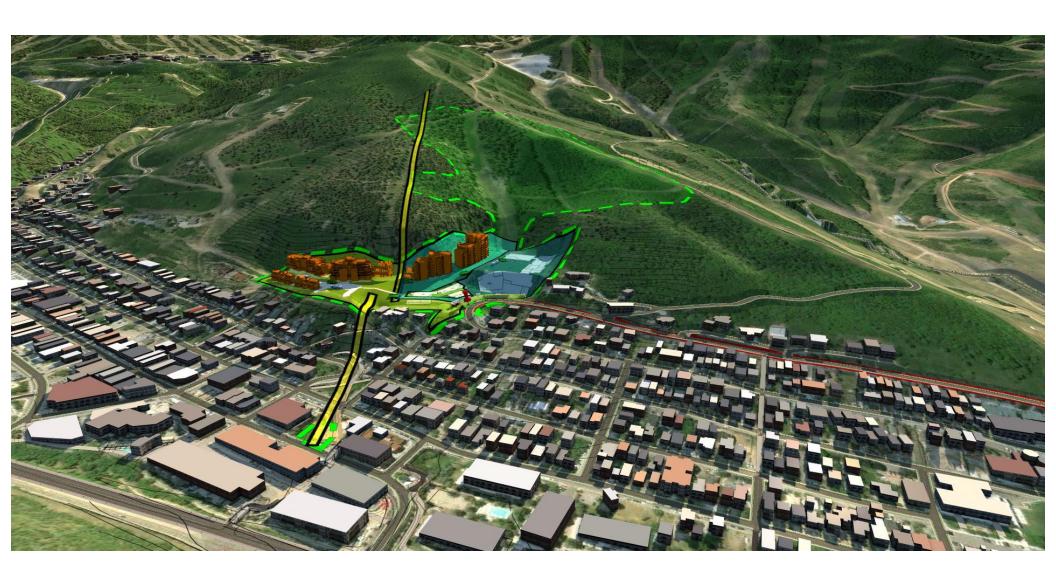


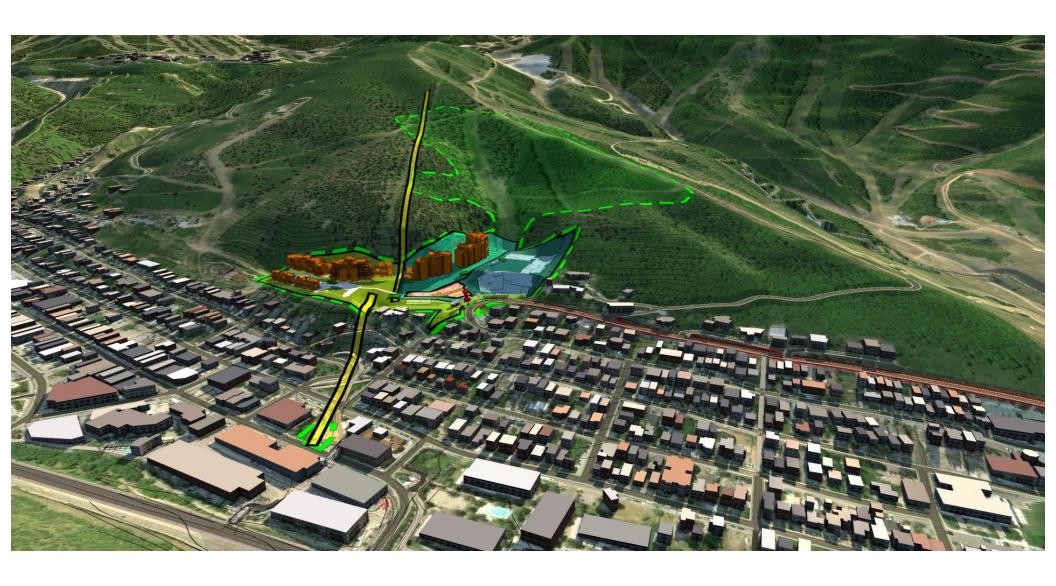


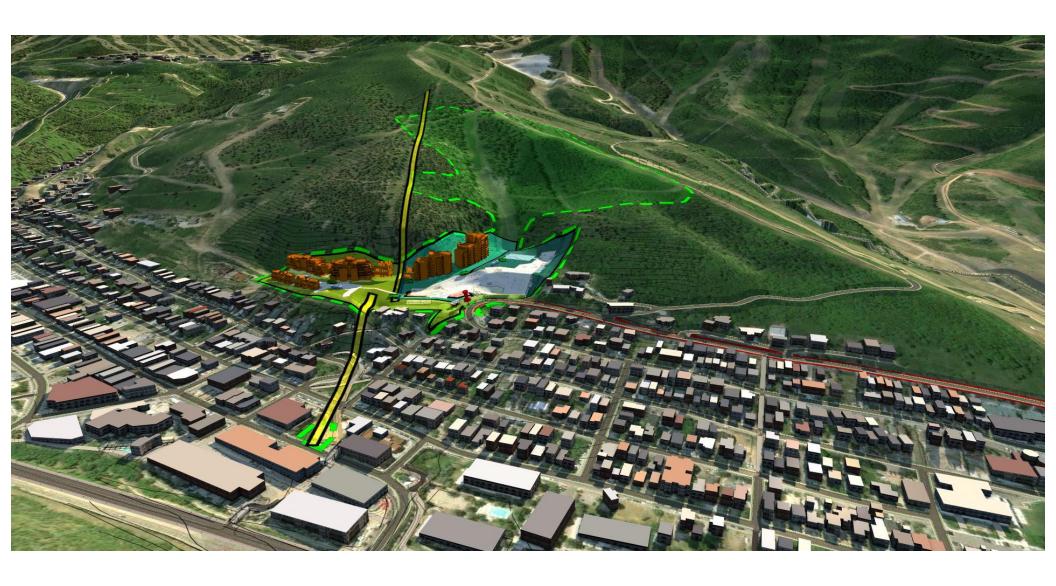




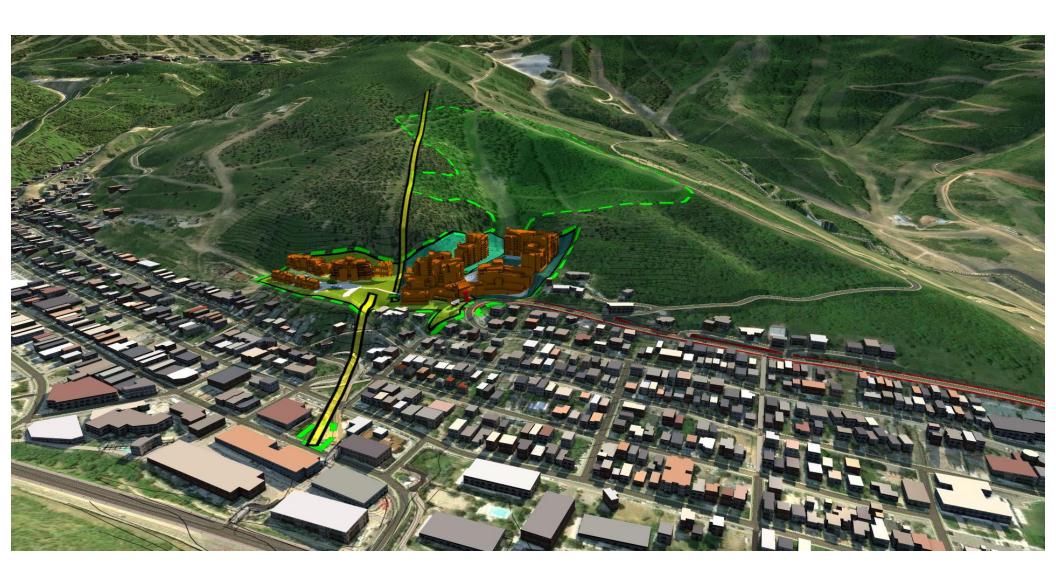


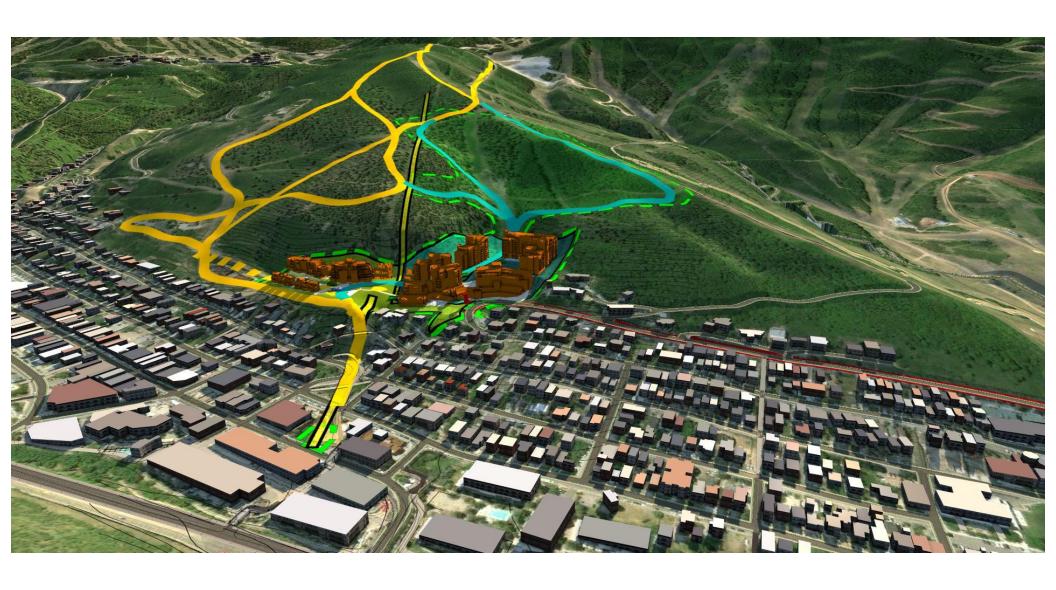


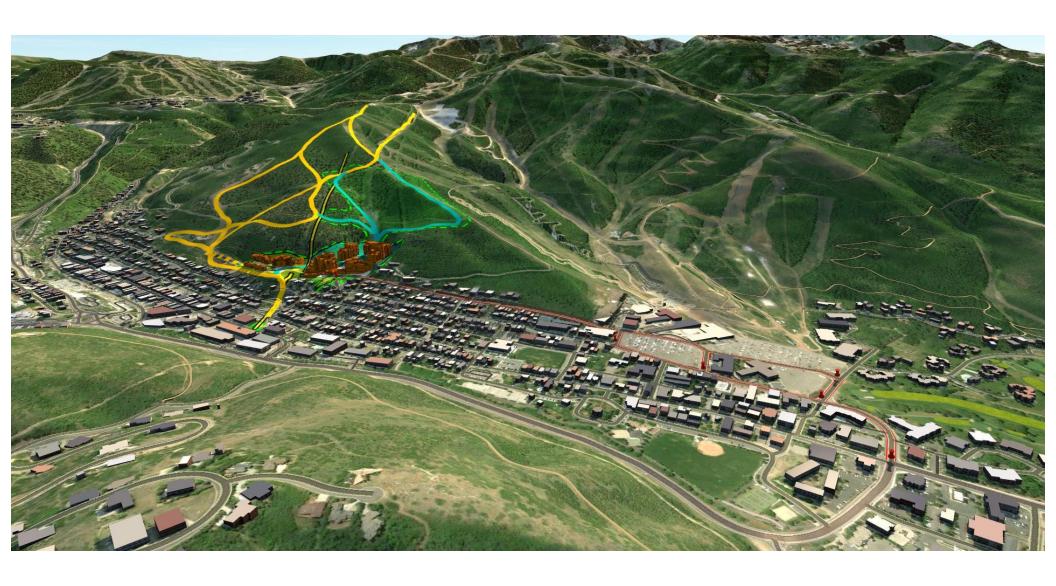


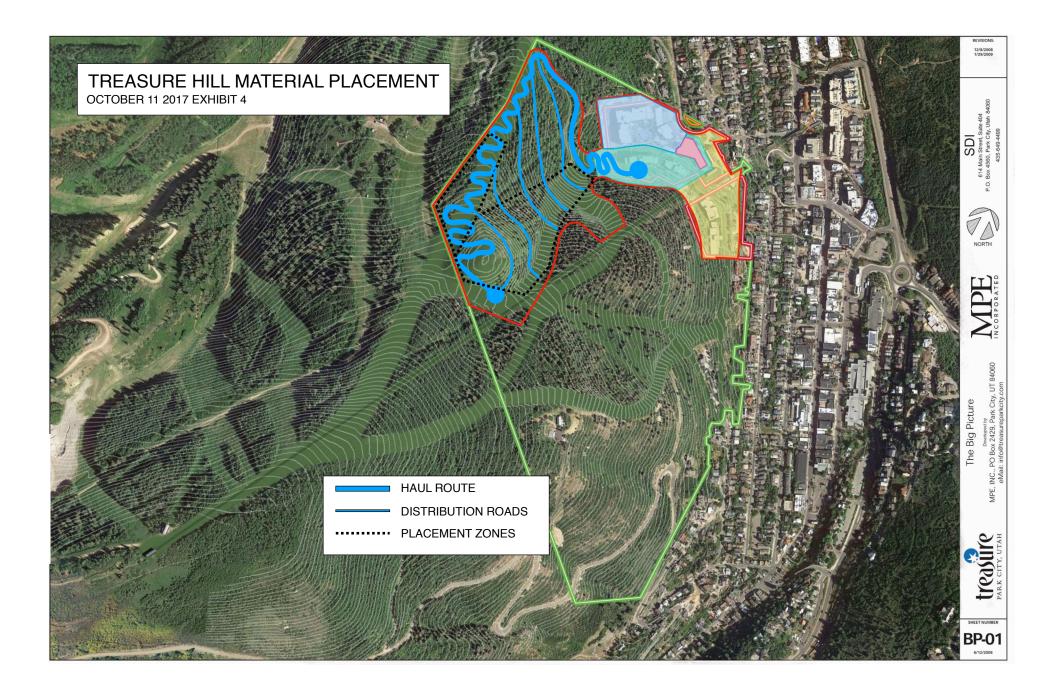


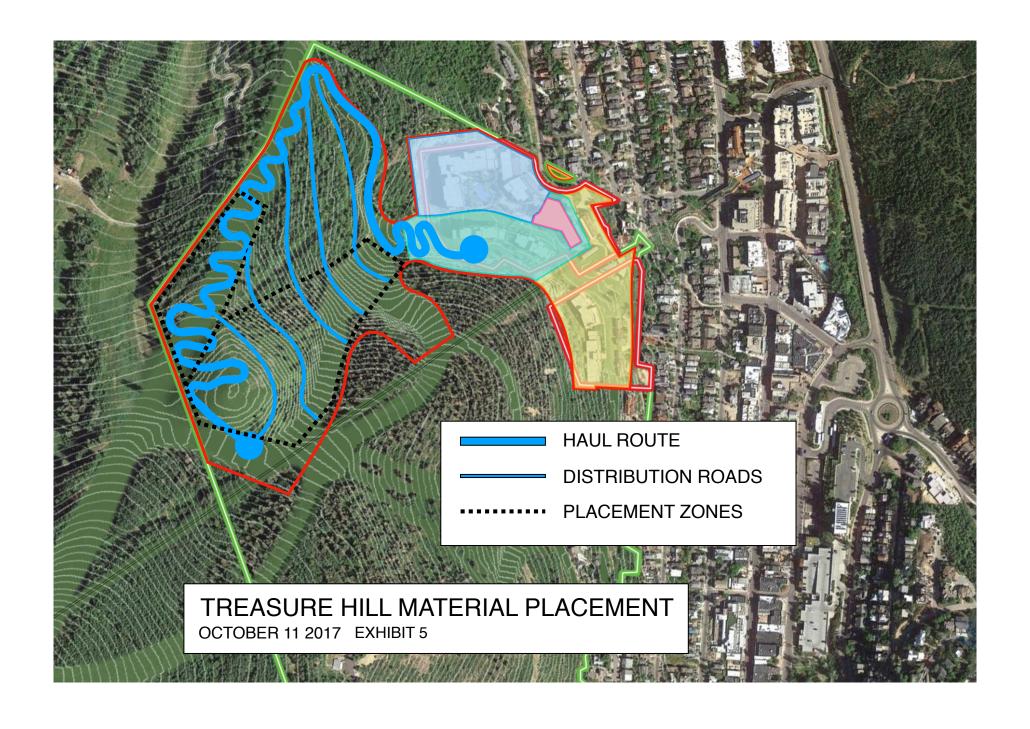


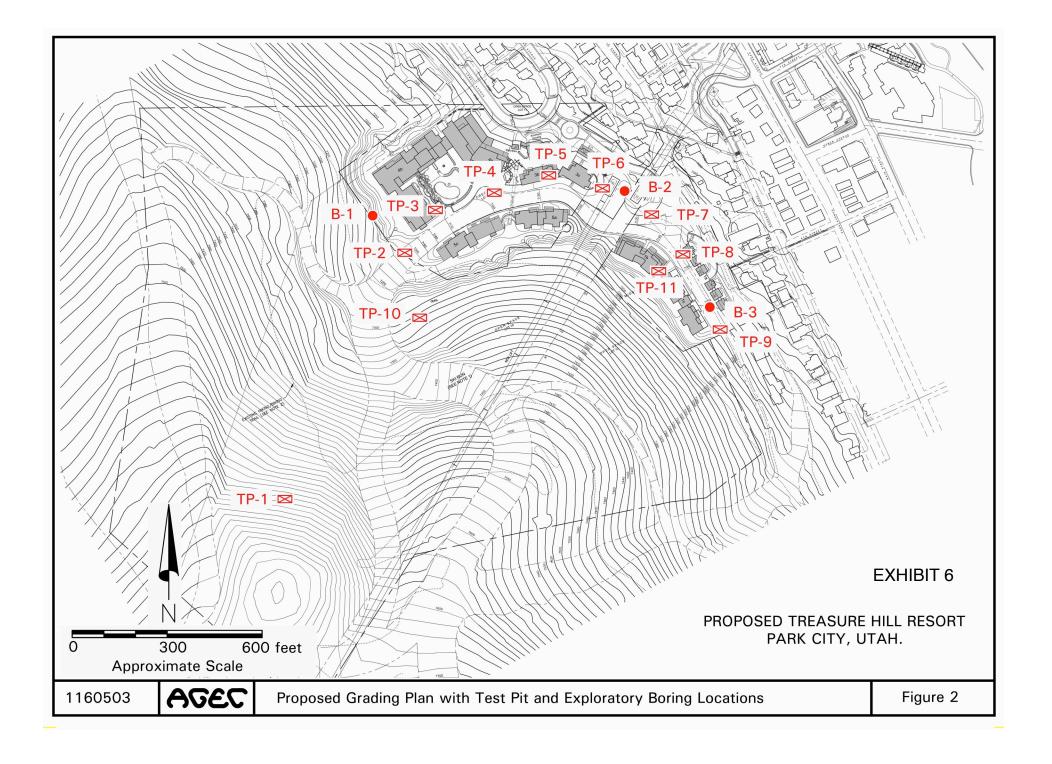




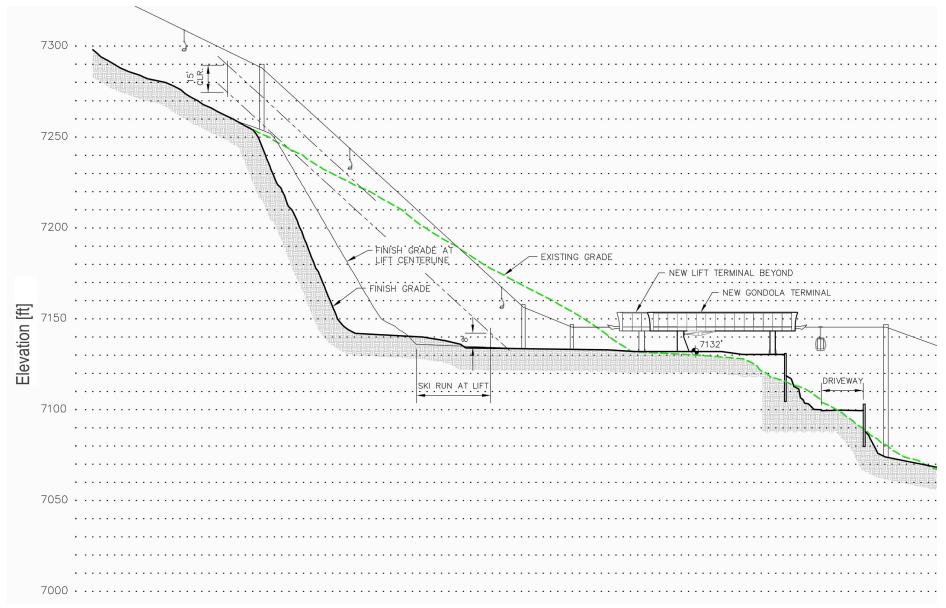








Profile View at Town Lift



Profile View at Town Lift

