

HIDDEN HOLLOW NATURAL AREA MASTER PLAN

PREPARED FOR :

REDEVELOPMENT AGENCY
OF SALT LAKE CITY

451 SOUTH STATE, ROOM 418
SALT LAKE CITY, UT 84111



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Introduction

The area known as Hidden Hollow lies within a Sugar House block between 1100 East and 1300 East and just south of 2100 South. From 1910 to the 1950's, Hidden Hollow served as the original Sugar House Park. The area was then abandoned when the old prison land was given to the community and turned into the new Sugar House Park. After construction of the new Sugar House Park, Hidden Hollow became a dumping ground and camp site for transients. During the 1980's the area was destined to become a parking lot for a commercial plaza. It wasn't until 1990 when children from the Hawthorne Elementary School rediscovered the site's interesting character and put forth a huge effort to clean it up. The children, organized as "KOPE" (Kids Organized to Protect our Environment), fought to have the area rezoned as an open space natural area and named it Hidden Hollow. Through persistence and help from volunteers, the KOPE kids managed to secure CDBG (Community Development Block Grant) funds to restore the south bank of Parleys creek to its original grade. They have also installed a concrete path along Parleys creek complete with lighting and benches. Now the remaining portions of Hidden Hollow, under the direction of the Redevelopment Agency of Salt Lake City, has been master planned. This master plan is to be used as a guideline in developing Hidden Hollow and making it an integral crossroads in the redevelopment of Sugar House.

Design Guideline

The design direction that Hidden Hollow has taken has been dependent upon the private, public, and community input. The desires, ideas, and requests of the community were gathered through a suggestion box, a community design charrette, and interested parties just sharing thoughts. The suggestion box was in a booth at the Sugar House Sesquicentennial Celebration on the 27th of September. The design charrette was held at the Sprague Library on the 20th of November. Only after collecting all the necessary input and information was a concept put together. The majority of information received shows that the community would like to see Hidden Hollow as a natural area, with connecting paths between the adjacent business areas and parks. Along the paths they want to see gathering spaces and open areas where activities, meetings, displays, markets, and educational groupings could take place. There were also requests for secondary trails that take visitors off the beaten path for nature studies. Boardwalks were suggested to keep traffic off the vegetation allowing for better nature viewing, less maintenance, and a different feel. Some other concerns are a need for seating, access to the waters

edge, and informational signs. (A list of all the suggestions from the design charrette is attached at the end of this document.)

Paths:

There are four types of paths proposed in Hidden Hollow that offer a definite hierarchy of uses. The first path would be the main observation path which meanders along the southern edge of Parleys creek. A large portion of this 8' wide concrete path already exists and is intended for passive walking, nature viewing, creek access, gathering space access, and will be ADA accessible. Cyclists, rollerbladers, joggers, etc., are permitted to use this path with consideration of a speed limit. There will be natural step off areas where people can leave the path to relax, view, chat, etc. The step off areas will include natural stone paving, boulder and rock seating, and possibly shade.

The second path that skirts the southern border of the property offers access to Hidden Hollow and the quickest way through the area. This path is a ten foot wide, ADA accessible, concrete path, which also offers step off areas. It is meant to serve commuters, bicyclist, pedestrians, and to keep faster traffic from disturbing and causing conflict in the slower traffic along the street path. A speed limit may need to be enforced or it could be posted as a dismount area if dangerous speeds and recklessness is observed.

The third type of path used will be the nature path and boardwalk. This path is intended to be for the nature observers and students to exit the main path and enjoy the flora and fauna of Hidden Hollow. The nature path will offer more change in elevation and the surface will vary between soil and mulch. The boardwalk areas are intended to comply with ADA standards and should be constructed with recycled lumber if the budget allows for it. These paths offer viewing areas and traverse the north and east sides of Hidden Hollow.

The fourth path will not be much of a path at all but rather a stepping trail. Strategically placed rocks and boulders will allow people to exit the main path down to the creeks edge and cross to the observation deck on the north side of the creek. The rock and boulder placement across the stream is to be done in shallow water and be approved by County flood control. This path is to allow access to the creek without making a formal trail. It should sustain less traffic and be very useful for educational purposes.

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The path system that is being prescribed for Hidden Hollow is intended to cater to a large variety of people for a great number of uses. The hope is that every person that visits Hidden Hollow will find their own niche and follow the path that best suits them and their interest. All the paths should be installed according to their proper standards and ADA detectable warning paving textures should be used where applicable. Porous paving may be looked at as an alternate surface treatment in efforts to conserve water on site.

Gathering Spaces:

A series of small gathering spaces have been designed along the main path of Hidden Hollow. As described earlier, they were called step off areas and can be used for many activities. Some of these spaces will offer visual and physical access to the creek while others may just offer a rock to sit on for a rest. These spaces will vary in size so that each and every user can find a space that is comfortable for them. Some step off areas actually connect to one another making informal connections between the main paths.

The largest gathering space is a terraced amphitheater. Its informal seating steps upward to the south with center stage to the north. This space will also be natural to achieve continuity on site, and terracing will be achieved by berming with rocks and boulders. There will be native planting among the rocks and some trees to provide shade in the heat of the afternoon. The amphitheater space can be used for small performances, educational gatherings, meetings, etc. The terracing will also offer seating possibilities for lunch breaks, picnics, or just reading a book. This space will have a berm to the back side to lend it some privacy and separation from the other spaces. Depending on the number of activities planned for this space a coordinator may be needed at some point to schedule events.

Connections

Another main issue in the development of Hidden Hollow is connecting it with other parts of Sugar House. There are four connections that have been addressed on the connections plan.

1. 1300 East and eventually Sugar House Park
2. Sugar House Center shopping area
3. Fairmont Park
4. 2100 South and Downtown Sugar House

Getting to 1300 East from Hidden Hollow and eventually to Sugar House Park seems to be the most controversial connection to be made. A number of possible crossing methods were considered and the selection was based on: cost, difficulties, aesthetics, dangers, security, and other concerns. One of the ideas looked at was a tunnel to exit the east side of the Hidden Hollow property, go under the proposed office building and 1300 East exiting into Sugar House park. Some major problems with this idea are: lack of ownership and permission to pass through the property just east of Hidden Hollow in this manner, and working around the utilities under 1300 East would be a real obstacle. A tunnel for this location would be very expensive, a security risk, and would disrupt some of the retention capabilities that Sugar House Park maintains. An overhead pedestrian bridge was also considered as a possible connecting feature. A few problems with this solution are that it would also be expensive, generally not very aesthetic, and often not as utilized as other forms of crossings. We then looked at a surface crossing with a pedestrian controlled traffic signal at the intersection of 1300 East and Wilmington Avenue. A surface crossing would slow traffic to potentially increase safety, create a safe crossing location, and possibly help traffic circulation on Wilmington Avenue. Based on the analysis of three most popular solutions discussed, a surface crossing with a pedestrian controlled traffic signal at the intersection of 1300 East and Wilmington Avenue is recommended. In addition to the surface crossing a landscaped median with shade trees is desired along this section of 1300 East to further slow traffic and soften the western view from Sugar House Park. The surface crossing along with median improvements seemed to best address the concerns of safety, aesthetics, complications, and costs without creating a security risk.

In looking at other Hidden Hollow connections the Sugar House center can be reached by using the south or east exits of Hidden Hollow. Connection to Fairmont Park uses mostly existing sidewalk and street connections. We feel this is an important link and recommend that it be further investigated as development moves west. Getting to 2100 South and downtown Sugar House can be accomplished by passing west through the new retail center or using one of the north exists to 2100 South.

Signs and Historical Information

We recommend there be historical, educational, and directional signage used throughout the site. Signs should be used to identify and explain the site's history, special amenities, speed limits, regulations, and trail connections. Posting informational signs along the nature trail and creek to identify plants, animals, and

educational features is also recommended. All signs should be made from anti-graffiti materials and include Braille writing where applicable. The signs may also serve as a form of artistic expression for the site. We further recommend that signs be placed outside Hidden Hollow on the main roads to inform and direct people to the site.

Lighting

We have proposed additional security lighting throughout the site. The initial intention is to continue using the same style lighting that exists within Hidden Hollow. At a later date, when the adjacent properties have been developed and the existing lighting seems to be more than necessary, new fixtures should be installed on the existing poles to reduce the night time glare of the site. We are hoping that the hotel and adjacent development, supply enough light to illuminate the north side of the site. If this does not occur, possible trail lighting on the north side of the creek may be necessary. This may be accomplished with bollard or pole lighting but should be avoided unless absolutely necessary.

Security

Security was an important issue in the planning of Hidden Hollow. A community "cop shop" currently exists just west of Hidden Hollow and will remain locally with the new development. In addition to proper lighting and regular patrols, increased public use due to improvements should provide the best security for the area. Activity from the surrounding businesses and future development will also help monitor the site and deter crime and vandalism. The implementation of a neighborhood watch system or mounted security cameras were suggested during the information gathering process and may be further investigated if a need for additional security measures arise. In helping to deter crime and vandalism, we recommend that vandal resistant materials and surfaces be implemented where possible.

Site Amenities

Along with the existing bench seating, additional benches will be located throughout the site. However in promoting Hidden Hollow as a natural area, we encourage people to find one of the many rocks or boulders as a resting place. Garbage receptacles will also be placed throughout the site promoting clean and responsible usage of Hidden Hollow. A few bicycle racks and a drinking fountain should also be located within Hidden Hollow. We have proposed the intersection

just south of the new bridge as a great location for the drinking fountain for optimum usage. The existing gate at the current west entrance, though it will be no longer necessary to contain the site, should be relocated during construction and identified with a historic marker to document the "Kope" kids efforts to save Hidden Hollow.

Resource Conservation

Hidden Hollow, preserved as a natural area in the center of an urban commercial zone, lends itself to be an educational resource. We investigated the process of making Hidden Hollow a model energy efficient and water conserving site to educate the community and serve as an example for future development. It is possible that Hidden Hollow could be self sufficient by using solar and hydro-electric energy for electricity, and collect storm runoff for irrigation. Water can be collected from adjacent parking areas, roofs, and an existing well. The overflow water could then be filtered, cleaned and returned to the natural water system. Though resource conservation is important, due to space limitations and installation costs, the idea is not highly recommended for use within Hidden Hollow.

Site Appearance

To ensure that Hidden Hollow remains a natural area and help improve its appearance, we would like to remove as much of the existing construction debris and trash as possible without destroying the site. One of the concerns is how much of the mature natural vegetation and existing site amenities will be destroyed by trying to remove all the debris. We recommend that at some point during the pre-construction phase of this project a qualified group of individuals do an on site analysis of the existing conditions to determine exactly which items can be removed or mitigated and which must remain. These decisions will be based on visual impact, damage caused if removed, natural value, historical value, costs to remove, hazards posed by leaving or removing, and any other relevant criteria that may be of a concern. If some debris is to remain, attempts to cover or hide unappealing views should taken. We are not proposing much of a grading change for Hidden Hollow. The north side of the site and the creek are to remain mostly intact and the south side will be bermed and sculpted to create spaces and natural settings. In preserving the natural integrity and appearance of Hidden Hollow, we encourage wildlife use and existence within the area. In keeping with the concept of preservation, we also recommend consideration of a conservation easement over Parley's Creek.

Site Maintenance

Even though Hidden Hollow is designed as a low maintenance site, there is no such thing as no maintenance. Plants are intended to be self sufficient and grow uncontrolled but an irrigation program will be needed to run for approximately two years until the plants are established. Hidden Hollow was designed to require only slightly more upkeep than what is currently established; yet, additional maintenance will be necessary due to increased usage and amenities. There will be path upkeep in the winter and trash receptacles to be emptied on occasion.

Planting and Irrigation

The planting scheme as noted in the master plan is to use natural vegetation throughout the site. However, the openness of the south side of Hidden Hollow allows significant sun and heat to penetrate and even native plants require irrigation for approximately two years to become established. We recommend installing a spray irrigation system, on the south side of the site to over spray everything without regard for walks. The irrigation system, though temporary, should be maintained even after the plants are established for drought control, fire prevention emergencies, and any future planting. Careful monitoring of the irrigation system must be employed to avoid over watering and the promotion of weed growth, and the planting should be done so that plant height and density does not become a security risk.

We have attached an ecological inventory of Hidden Hollow, supplied to us by Dr. A. T. Harrison of Westminster College. The planting scheme for Hidden Hollow includes many of the native species indicated in Dr. Harrison's inventory as well as others that are native to the area, but have not yet found their niche in Hidden Hollow. Though the cost estimate and the general planting locations have been shown, the specific placement of the plants should be determined after the approval of the master plan as part of the planting process.

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Hidden Hollow Natural Area Cost Estimate

Preliminary cost estimate based on the 1-15-97 master plan

10' Concrete Path	16,000 sq ft	\$60,000
5' Stabilized Path	3,600 sq ft	\$5,500
5' wide Boardwalk and Observation Desks	2,800 sq ft	\$33,600
Rock Steppoffs/Amphitheater/Paths	8,000 sq ft	\$100,000
Bridge	lump sum	\$23,000
Abutment	lump sum	\$7,000
Planting	lump sum	\$80,000
Irrigation	lump sum	\$30,000
Clean up and Clearing	lump sum	\$15,000
Grading Excavation	lump sum	\$15,000
Culvert Addition	20 LF	\$5,000
Lighting	8 @\$2,500	\$20,000
Benches	6 @\$1,000	\$6,000
Trash Receptacles	6 @\$500	\$3,000
Bike Racks	4 @\$500	\$2,000
Signage	lump sum	\$15,000
Drinking Fountain	1 @\$2,000	\$2,000
TOTAL		\$422,100

Upon the approval of the master plan the project is to be phased for construction based on the amount of funding available.

Hidden Hollow -Design Charrette Notes from 11-20-97

Design Ideas/Concerns/Recommendations

Walks

Benches

Garbage Rec.

Concern at closeness of hotel to Hidden Hollow

Let trees go natural (leave dead trees)

Wedding between public and nature

Team building activities (15 people exercise-get away from office, grassy 40 x 40 area)

Side walk surface (aggregate vs. brick vs. Concrete)

Two accesses only and egresses desired by police

Wide enough trails for police vehicles (not desired by the people)

Boardwalks

Long Grasses

Rocks, boulders (like found naturally)

Waterfall

Existing bridge dangerous need new one

Exercise path and equipment

Historical and nature signage

grade pond edge so that kids can access and study pond environment

Figure 8 trail system to access both sides of creek

Fence all other access areas (not chain link)

Bike access yes or no

Separate trails, or enforce speed and trail restrictions.

Gazebos

Swinging gate with signage to control access and a community volunteer to open and close as necessary

Multiple paths

Statues (Art)

Lights not like amusement park lights (too many, too bright)

Concern over pond clean out and debris grate

Stream depth concern about people drowning

Multiple access for kids not just two

Information booth-kiosk

Drinking fountains

Bicycle police vs. Car police (patrols)

Ha Ha Fence (wall)

Picnic areas

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Stone wall as sitting areas
Walk space large enough to sustain markets and art display
Visual safety concerns open up to outside, so outsiders can see in
Graffiti Wall
Dismount area
Conservation easement
Toilet Facility
Bike Racks
Building surface of new buildings (appearance)
Surface parking bad issue
Cameras on poles to monitor
Signs on outside of block to draw people in
Vandalism control concern
Neighborhood watch
Outline phases
Recommendations to make walks and signs - Blind usable
Creative water uses. Irrigation with rain water. (Theme) created by kids who care.
Make some innovative creative plans, stored water, use existing well below hotel
Concern over county maintenance of creek
Light park run by natural stored energy
Anti graffiti materials for signs benches etc.
Contractor recycling recommendations
Recommendations to do Sugar House Park walks at same time as Hidden Hollow
Maintenance Agreement Plan

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Connections

Access to Hidden Hollow from 13th

Elevator etc. security new building

Tunnel / Overpass connection to Sugar House park

Connection overpass at new building vs. Intersection

On 13th, make some lane changes leaving a median and safe zone with surface crossing.

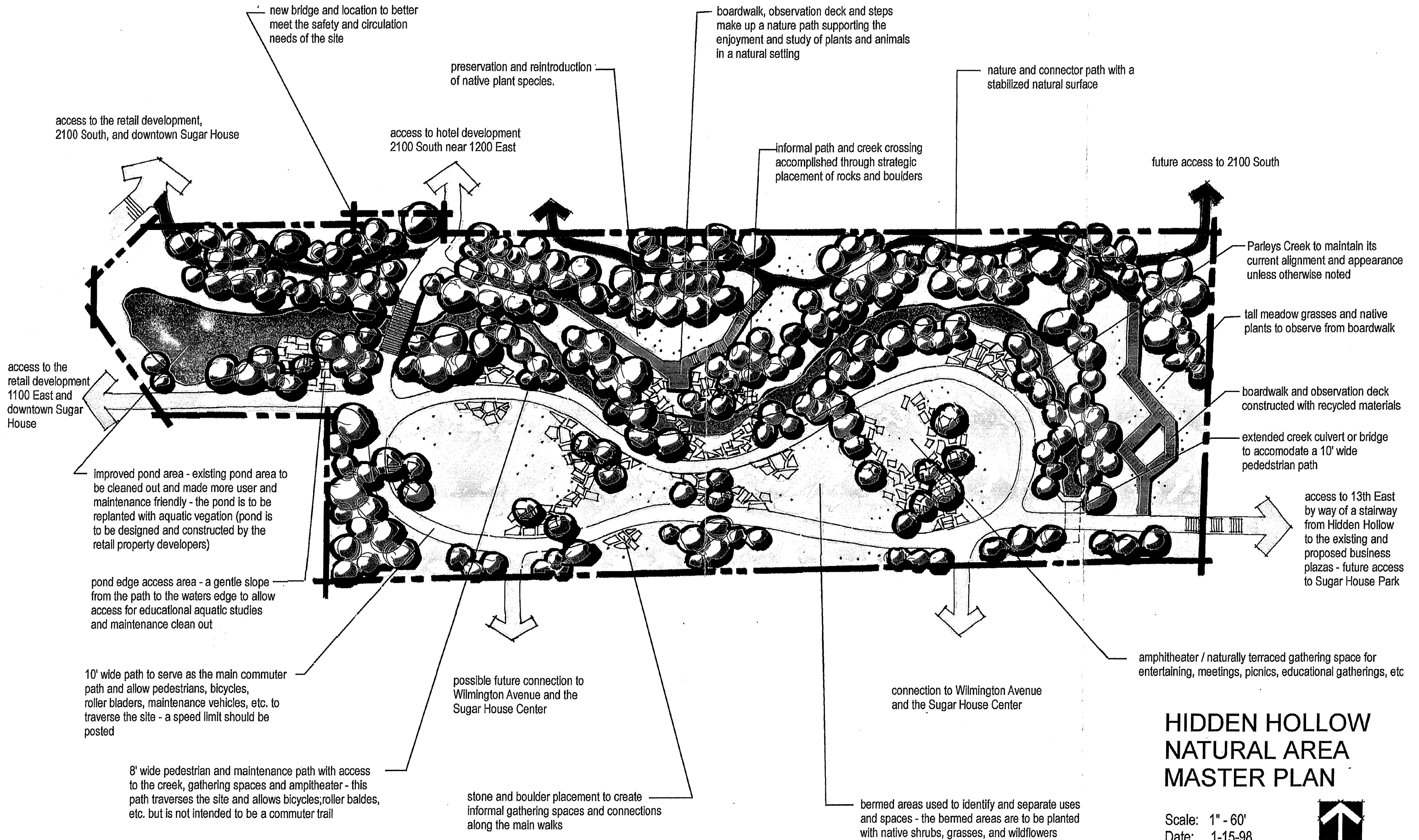
At a 13th crossing, have vehicle passage recessed and pedestrian across at the surface

Fairmont park linkage, leave sidewalks for pedestrians only. Make the major path/bike trail go around by I-80

Locate existing tunnels

Connection at north side of bridge area

On 13th make connection from 21st to Wilmington, and make it very visible and distinguished



HIDDEN HOLLOW NATURAL AREA MASTER PLAN

Scale: 1" = 60'
Date: 1-15-98

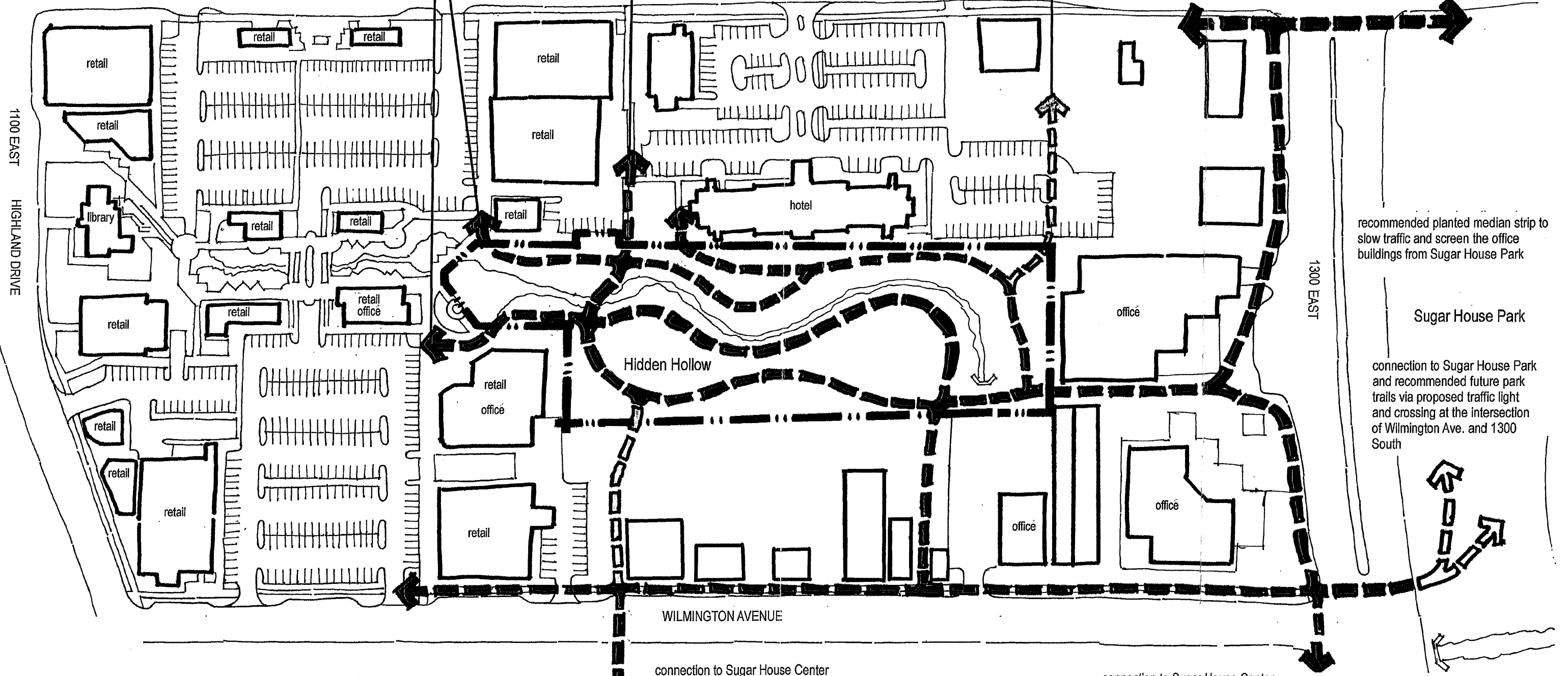


Hidden Hollow has two exits into the future retail development that will connect Hidden Hollow with Downtown Sugar House

the exit to the north between the future retail development and the hotel connects to 2100 South

a possible future connection from the north east corner of Hidden Hollow to the north will make a second connection to 2100 South

connection to Sugar House Park using the crossing at 2100 South



recommended planted median strip to slow traffic and screen the office buildings from Sugar House Park

Sugar House Park

connection to Sugar House Park and recommended future park trails via proposed traffic light and crossing at the intersection of Wilmington Ave. and 1300 South

connecting to Fairmont Park - pedestrians should use the existing area sidewalks and bicyclist / recreators should use the proposed open space corridors trail east up the north side of interstate 80 and along 1300 East

connection to Sugar House Center via the south east and possible future south west exits of Hidden Hollow

connection to Sugar House Center via the south and east exits of Hidden Hollow

Sugar House Center

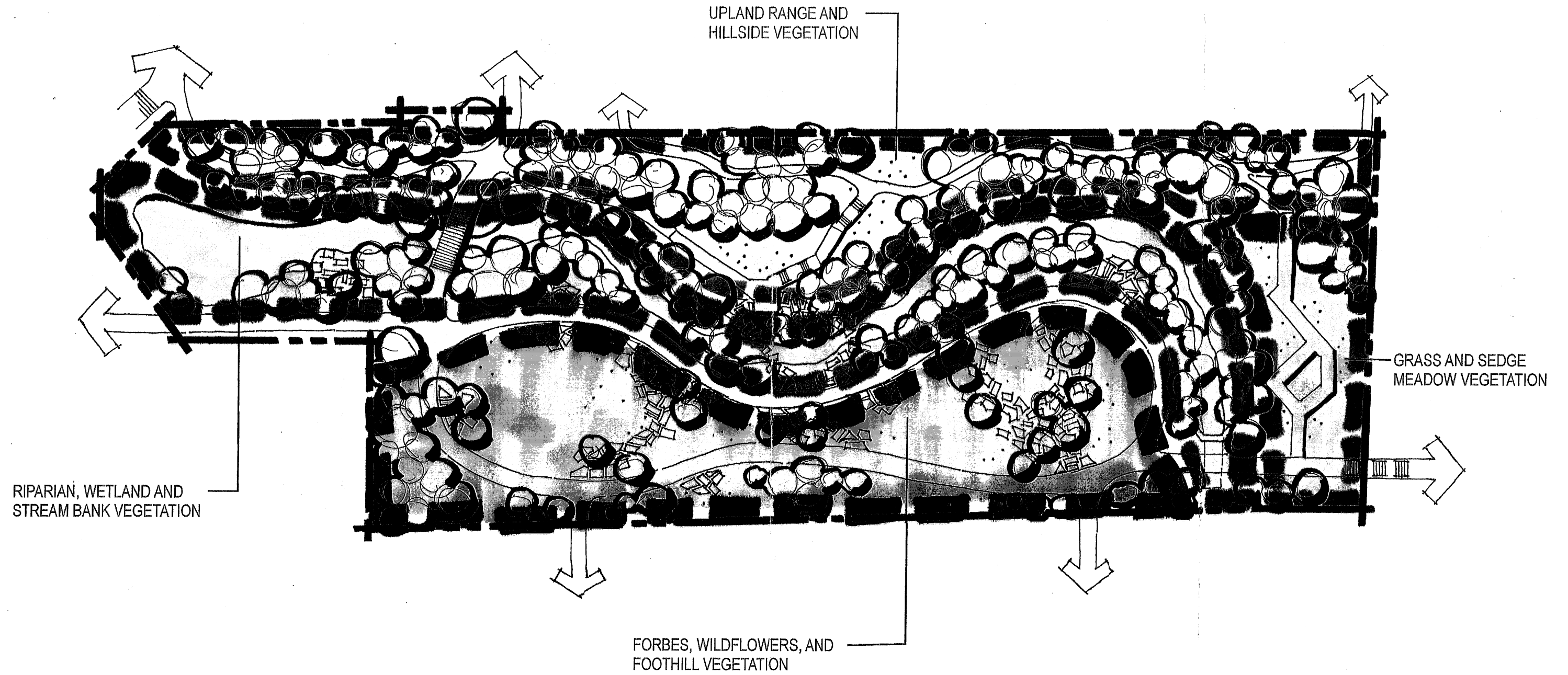
HIDDEN HOLLOW NATURAL AREA CONNECTIONS

 PROPOSED CONNECTIONS

 POSSIBLE FUTURE CONNECTIONS

Not To Scale
Date: 1-15-98



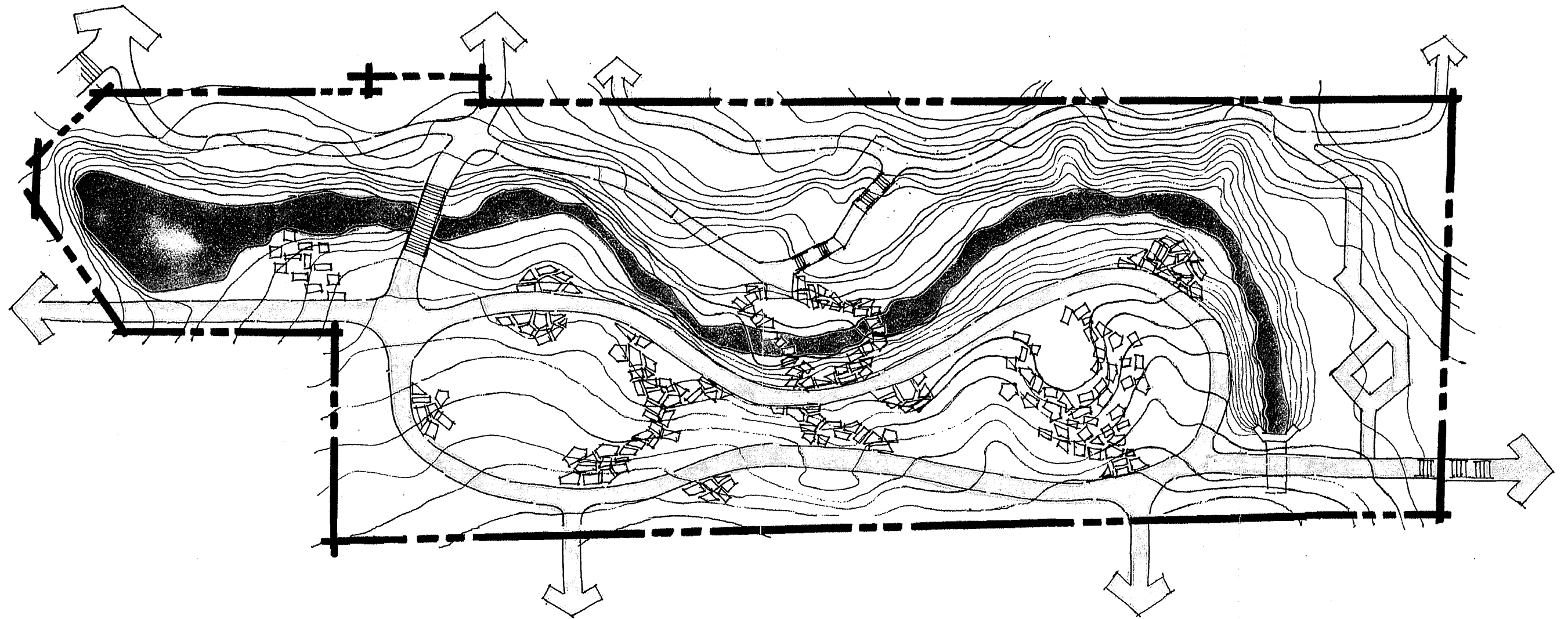


HIDDEN HOLLOW NATURAL AREA PLANTING PLAN

Scale: 1" - 60'
Date: 1-15-98



North



1' CONTOUR INTERVALS

HIDDEN HOLLOW NATURAL AREA GRADING AND DRAINAGE

Scale: 1" - 60'
Date: 1-15-98



Hidden Hollow Ecological Inventory

The following plant and animal species exist in Hidden Hollow and have been identified by Dr. AT Harrison, Assoc. Prof. Of Biology, Biology Department, Westminister College of Salt Lake City, as of March 1997. The plants are classified by their growth form. The common name is followed by the scientific name together with brief comments. A reference plant collection of identified, pressed specimens is being assembled at Westminister College. This list documents the importance of relict or remnant native plant species which should be used for future landscaping and habitat restoration efforts in this important riparian, urban natural area. The standard reference book for identifying the plant species found in Utah is: A Utah Flora S.L. Welsh et al. Great Basin Naturalist Memoir NO. (, 1987. BYU Press.

- | A. <u>NATIVE TREES:</u> | <u>Comments & Notes</u> |
|---|---|
| 1. Box Elder (<u>Acer negundo</u>) | -Along upper creek banks; important food plant for insects, & birds. |
| 2. Peach Leaf Willow (<u>Salix amygdaloides</u>) | -Important riparian tree for stream bank stabilization. |
| 3. Gambel Oak (<u>Quercus gambelii</u>) | -Two remnant clone at the NE side of property. |
| 4. Narrowleaf Cottonwood (<u>Populus angustifolia</u>) | -One remnant clone at the NE. side of property. |
| B. <u>INTRODUCED OF EXOTIC TREES:</u> These trees are recent invaders of Hidden Hollow from surrounding urban lots. Their seed is spread either by bird or the wind. The seedlings grow rapidly, invading disturbed soil and recent plantings. They compete with native species for space and nutrients and have minimal value for wildlife. They should be removed as labor and resources permit as part of a long term management plan for the area. | |
| 1. Siberian Elm (<u>Ulmus pumila</u>) | -Scattered throughout the Hollow; some have been removed already. |
| 2. Green Ash (<u>Fraxinus pennsylvanica</u>) | -A few seedlings and saplings along the creek. |
| 3. Russian Olive (<u>Elaeagnus angustifolia</u>) | -A very few small seedling; brought into the area by starlings and robins; need removal regularly. |
| 4. Tree of Heaven (<u>Ailanthus altissima</u>) | -A few saplings on the north side of creek; invading from a parent plant near Hygeia building. Should be removed as soon as possible. |
| 5. Weeping Willow (<u>Salix babylonica</u>) | -One tree growing in the creek at the east end of the property. |
| 6. Poplar hybrids and backcrosses | -A number of these hybrid cottonwoods established after the flood years 1983-84 from hybrid seed from cultivated European black cottonwood (<u>Populus nigra</u>), the Carolian Poplar, and the Fremont Cottonwood (<u>Populus fremontii</u>), all of which are inter-fertile and which come from parent trees, upstream along Parley's Creek. They should probably be left rather than removed since they are important habitat and food plants for insects and birds. |

C. NATIVE SHRUBS: These few scattered shrubs are indicative of pre-settlement conditions along the banks of Parley's Creek and should be used as a model for landscaping restoration along the banks of the creek. There are two important shrubs which have not been found in Hidden Hollow but are known to occur on nearby Emigration Creek on Westminster campus. They are Red Osier dogwood (*Cornus Stolonifera*) and Black Hawthorn (*Crataegus douglas*), both of which are valuable riparian shrubs which should be reintroduced with future habitat restoration projects.

- | | |
|---|--|
| 1. Chokecherry (<i>Prunus virginiana</i> var. <u>melanocarpa</u>) | Three or four plants along the south creek bank. Valuable for butterflies & birds |
| 2. Creeping Oregon Grape (<i>Mahonia repens</i>) | Two large clones along the upper south bank; both growing under gambel oak. |
| 3. Golden Currant (<i>Ribes aureum</i>) | 3-4 plants along the south high bank |
| 4. Wood's Rose (<i>Rosa woodsii</i>) | 3-4 plants along the south bank |
| 5. Fragrant sumac (<i>Rhus aromatica</i> var. <u>trilobata</u>) | One plant along the south west high bank |
| 6. Rubber Rabbitbrush (<i>Chrysothamnus nauseosus</i>) | Two plant on fill along east bank. |
| 7. Poison Ivy (<i>Rhus toxicodendron</i>) | Two to three large clones on the north bank of creek under old peach leaf willows. |
| 8. Service berry (<i>Amelanchier alnifolia</i>) | Recently planted on the south creek bank. |
| 9. Sandbar Willow (<i>Salix ewigua</i>) | One clone on the south creek bank near the plank bridge above the pond. |

D. INTRODUCED SHRUBS & VINES:

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|--|---|
| 1. Bittersweet (<i>Solanum dulcimara</i>) | -This small vine, introduced from Europe is spread by fruit eating birds (robins) and is probably poisonous and should be removed. There are a number of plants along the shady creek-side near the water on both sides of creek. |
| 2. Climbing rose (<i>Rosa</i> sp.) | -These are two large plants near the south entry gate on both sides of the trail; one near the south pole, the other above the creek. The seed was introduced either by birds or by yard waste dumping in year prior to the clean up. They should be removed. |
| 3. English Ivy (<i>Hedera helix</i>) | -This cultivated, evergreen vine has been introduced by fruity eating birds; seeds are defecated by roosting birds and one plant is growing under Peachleaf willows on the low south bank of the creek. |
| 4. Virginia Creeper (<i>Parthenocissus quinquefolia</i>) | -cultivated vine; climbing in trees on north side or creek. |

- | | |
|--|---|
| 10. Large Periwinkle (<u>Vinca major</u>) | Growing on north side of creek; probably introduced with year waste dumping. Landscape groundcover. |
| 11. Alfalfa (<u>Medicago sativa</u>) | Cultivated crop plant. East side of creek. |
| 12. Whitetop (<u>Cardaria draba</u>) | Throughout area. Noxious weed. Requires control by law. |
| 13. Watercress (<u>Rorippa nasturtium-aquaticum</u>) | Edible; grows around lower pond. |

G. INTRODUCED BIENNIAL WEEDS:

- | | |
|--|---|
| 1. Scotch Thistle (<u>Onopordum acanthium</u>) | A noxious weed which by law must be controlled. Fall rosettes were removed by volunteers during 1996 and 1997. |
| 2. Burdock (<u>Arctium minus</u>) | Throughout the area in shady, moist places. |
| 3. Yellow sweetclover (<u>Melilotus officinalis</u>) | A nitrogen fixing legume; planted in seed mix to prevent soil erosion in 1993-95. |
| 4. Poison Hemlock (<u>Conium maculatum</u>) | A poisonous weed, along creek on south and possibly north side; needs to be removed. This was the plant that killed Socrates. |
| 5. Tumbling Mustard (<u>Sisymbrium altissimum</u>) | Common in dry, open, disturbed areas. |

H. INTRODUCED ANNUAL WEEDS: These comprise most of the plants in the upper, dry areas of Hidden Hollow. They will need to be suppressed with ground cover wood chips or pre-emergent herbicide during landscaping restoration efforts. Many of these weeds have been introduced from Europe over the last 150 years.

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|--|---|
| 1. Fumitory (<u>Fumaria officinalis</u>) | Throughout the area in shady areas. |
| 2. Wild lettuce (<u>Lactuca serriola</u>) | A common weed; edible when young |
| 3. Burr Buttercup (<u>Ranunculus testiculatus</u>) | A bothersome, early spring annual of intensely disturbed areas. Spread by construction equipment. |
| 4. Cranesbill (<u>Erodium cicutarium</u>) | A common spring weed; introduced by overgrazing. |
| 5. Shepherd's Purse (<u>Capsella bursa-pastoris</u>) | Common spring weed. Edible; seed pods shaped like a triangular shepherd's purse. |
| 6. Summer cypress (<u>Kochia scoparia</u>) | A very common weed of intensely disturbed areas. Can grow to 6 feet competitive. |
| 7. Speedwell (<u>Veronica perigrina</u>) | Attractive, blue flowered spring weed. |
| 8. Alyssum (<u>Alyssum alyssioides</u>) | Early yellow flowered; open disturbed areas |
| 9. Dead-nettle (<u>Lamium amplexicaule</u>) | Interesting, irregular purple flowers in spring. |
| 10. Orache (<u>Atriplex heterosperma</u>) | Highly nutritious, edible herb |
| 11. Spring Draba (<u>Draba verna</u>) | Tiny (1 inch) spring annual in open disturbed areas. |
| 12. Cocklebur (<u>Xanthium strumarium</u>) | Open moist areas along creek bank. |

E. NATIVE WILDFLOWERS OR HERBS: Most of the native plants are rare in Hidden Hollow due to intense disturbance and competition from introduced weeds. A number of native wildflowers still exist on the Wasatch foothill and in protected areas along Emigration Creek below 1800 E. These include species such locoweed and evening primrose. See Harrison for list of additional native wildflowers and grasses appropriate to the area.

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|---|--|
| 1. Wild Onion (<u>Allium textile</u>) | 6-10 plants growing with relict oak and Oregon Grape on the upper south bank |
| 2. Indian Parsley (<u>Lomatium dissectum</u>) | Several plants growing with the wild onion (above) and several more along the south and north creek banks. |
| 3. Willowherb (<u>Gayophytum ramosissimum</u>) | A native annual; disturbed soil SE corner |
| 4. Annual Sunflower (<u>Helianthus annuus</u>) | Scattered throughout disturbed areas. |
| 5. Western Ragweed (<u>Ambrosia psilostachya</u>) | A rhizomatous, perennial; dry areas |
| 6. Curlycup Gumweed (<u>Grindellia squarrosa</u>) | A perennial, showy, yellow composite; abundant. |
| 7. Everywhere Aster (<u>Aster chilensis</u>) | Abundant, perennial, small lavender flowers |
| 8. Western Aster (<u>Aster occidentalis</u>) | Larger leaves and flowers than above; fall flowers. |
| 9. Bedstraw or Cleavers (<u>Galium triflorum</u>) | An interesting native annual with velcro-like hairs |

F. INTRODUCED PERENNIAL HERBS (and WEEDS): Due to the intense level of historic human occupation, disturbance, construction activity, dumping, etc. here in the Sugar House urban area, most of the plants growing in Wasatch Hollow are annual or perennial weeds. These common plants were introduced from other continents over the last 150 years and are now common throughout the urban areas and alleys of Salt Lake City. Some being on the official noxious weed list require property owners to control them. This weed (annual and perennial) list is incomplete and should be updated with future additions.

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| 1. Dandelion (<u>Taraxacum officinale</u>) | Common perennial weed. Edible leaves & roots. |
| 2. Chicory (<u>Cichorium intybus</u>) | Very common; biennial with bright blue summer flowers; roasted roots are coffee additive; blanched shoots are edible. |
| 3. Patience Dock (<u>Rumex patertia</u>) | Common, edible weed; in moist places near creek. |
| 4. Salad Burnett (<u>Sanguisorba minor</u>) | An edible garden herb; several plants along creek. |
| 5. Bindweed (<u>Convolvulus arvensis</u>) | A noxious perennial weed |
| 6. Catnip (<u>Nepeta catarica</u>) | An herbal weed |
| 7. Violet (<u>Viola odorata</u>) | A cultivated flower escaped into the Hollow probably from yard waste dumping over the years. IN moist, shaded area on south side of Creek. |
| 8. Red Emperor tulip | Planted by Hawthorn Elementary students about 1991-1992 |
| 9. Iris (<u>Iris germanica</u>) | Growing on the north side of creek from year waste dumping prior to 1990 |

I. INTRODUCED GRASSES (annual and perennial): No native grass species have yet been identified in Hidden Hollow. It would be valuable for educational reasons to reintroduce many of the native grasses known to have occurred in the area in any future habitat and landscaping restoration plans. See Harrison for recommendations. A very successful native grass and wildflower habitat restoration has been achieved on the south side of Interstate 80 at approximately 2100 E. and could be similarly done in Hidden Hollow.

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| 1. Bulbous Bluegrass (<u>Poa bulbosa</u>) | Probably the commonest grass; green in early spring. Goes dormant in late spring. Perennial |
| 2. Foxtail Barley (<u>Hordeum jubatum</u>) | Wet areas along stream. Perennial |
| 3. Cheatgrass (<u>Bromus tectorum</u>) | Everywhere in open, disturbed area. Noxious annual |
| 4. Annual Wild Rye ? (<u>Secale cereale</u>) | Introduced recently for erosion control. |
| 5. Tall Wheatgrass (<u>Elymus elongatus</u>) | An introduced, perennial bunch grass. |
| 6. Quackgrass (<u>Elymus repens</u>) | A noxious, rhizomatous perennial weed. |
| 7. Orchardgrass (<u>Dactylis glomerata</u>) | Introduced perennial bunch grass; most areas along the creek bank. |

J. LIST OF ANIMALS SEEN IN HIDDEN HOLLOW: This list is highly incomplete (from Harrison's memory and notes) and needs to be added to by frequent visitors of the area.

1. Birds:

1. Mallard duck (3-25-97)
2. California Gull (3-28-97)
3. Kestrel (1993)
4. Robin (3-28-97)
5. Black Capped Chick
6. House Finch

2. Mammals:

1. Rock Squirrel (3-25-97)
2. Muskrat (1994)

Fish:

1. Rainbow Trout (1994)
2. Carp (1994)

Amphibians:

1. Tiger Salamander

Insects:

1. Box Elder Bugs (3-28-97)
2. Mourning Cloak Butterfly (3-28-97)
3. Large brown aphids on Peachleaf Willow trees in fall.
4. Stream needs to be sampled for aquatic insects.