

Trail Master Plan 2022

For

Fountain Hills McDowell Mountain Preserve

Purpose

It is generally acknowledged that trails in the Preserve are a significant benefit to the Town and add to the quality of life in Fountain Hills. However, at some point in the future, the Preserve trail system will be “built out”.

The purpose of this Trail Master Plan is to determine and specify what, if any, additional trails may eventually be added to the Preserve over time, while maintaining an appropriate balance of the criteria specified by the Town, the 2004 Preserve Master Plan, and the McDowell Mountain Preservation Commission (MMPC) Guidelines.

It is anticipated that no additional trails will be constructed in the Preserve beyond those presented in this Trail Master Plan.

The trails in this plan must still be qualified by a thorough vetting process, and approved by Town Council, prior to being built.

Background

In 1996 the Town of Fountain Hills established the McDowell Mountain Preserve Commission (MMPC) to “provide trails, trailhead locations and safeguard the Preserve”.

Specifically, the Town’s stated intention is, in part, to “maintain the existing, undisturbed desert landscape” and accomplish the following:

1. Provide for the development of a trail system within the Preserve
2. Grant public access to the Preserve
3. Limit human encroachment to specific areas within the Preserve
4. Protect wildlife habitat

In 1997 the MMPC voted to establish the Sonoran Conservancy of Fountain Hills, with the stipulation that their Board must include one or more MMPC Commissioners. Trail building was a high priority, with all work and programs in the Preserve based on MMPC requests and approvals.

In 2004 the FH Town Council approved a comprehensive Preserve Master Plan which provides further detail regarding their intent. The 2004 Preserve Master Plan mission statement is:

**The mission is to preserve this setting for present and future residents
as an open space conservation Preserve.**

Pertinent to the development of this Trail Master Plan is an action item from Goal 4 of the 2004 Preserve Master Plan: **“Construction of specific walking trails to provide the public with the opportunity to explore all directions within the Preserve”**.

In 2020 the MMPC adopted “Guidelines for the Management of the FH Preserve”. They are consistent with the 2004 Preserve Master Plan. The Guidelines anticipate further trail development and include additional criteria for trail design and trail density:

1. Provide a diversity of experiences on Preserve trails
2. Consider trail density and usage
3. Be sensitive to the impact on neighboring communities

To add perspective and basis to the Trail Master Plan, a forward-looking document, it is helpful to first assess the current state and character of the Fountain Hills McDowell Mountain Preserve. The existing trail system evolved prior to the current MMPC vetting criteria.

The Promenade, Overlook, Western Loop, Easy and Sonoran trails were the “foundation” trails in the Preserve spelled out in the 2004 Preserve Master Plan. The Trailblazers constructed the Andrews-Kinsey, Lower Sonoran, alternate Bike Route, and Ridgeline trails in the last eight years. The Lower Ridgeline trail will be completed by early 2022.

The chronology of current trails in the Preserve:

<u>Date</u>	<u>Trail Name</u>	<u>Distance (miles)</u>	
2002	Promenade	0.8	(existing Jeep trail)
2003	Overlook	0.6	
2006	Western Loop	1.3	
2007	Easy	0.1	
2008	Sonoran	1.8	
2009	Sonoran to Dixie Mine	0.6	
2014	Andrews-Kinsey	0.5	
2017	Lower Sonoran	2.1	
2018	Bike Loop	0.5	
2019	Ridgeline	1.3	
2022	Lower Ridgeline	0.8	

Until 2010 access to the Preserve was restricted to guided hikes only, led by SCFH members. Hikers were then allowed to park about one mile from the Preserve entrance and hike up an unpaved road to the trailhead. Public access over an unpaved road to the Adero Canyon trailhead was allowed beginning in 2012. This was then limited to weekends only during the early construction of the Adero Canyon housing development. Construction of the Adero Canyon Trailhead (ACT) was completed in 2018. A ribbon-cutting ceremony was held on November 17, 2018, to celebrate the opening of the trailhead. The road to the Adero Canyon Trailhead was paved in 2020.

The MMPC believes the existing FH McDowell Mountain Preserve trail system adheres to the intent of the Town, the 2004 Preserve Master Plan, and the MMPC Guidelines and would pass the vetting process to which future trails are subject.

Some neighborhood concerns have been expressed with previous trail additions. When it was proposed, Eagles Nest residents expressed concerns relative to the Lower Sonoran Trail. Meetings with the Eagles Nest HOA and some minor rerouting of the trail alleviated those concerns. One outcome from those discussions was that 300 feet of separation between a residential property line and a trail were an acceptable offset. One Shadow Canyon homeowner expressed his concern regarding the Lower Ridgeline trail, but only after the trail was approved and well under construction.

Neighborhood impact is a sensitivity that must be managed prior to the building of any new trails in the Preserve.

The MMPC believes the current public view of the Preserve is highly positive. Community input to the Community Services Master Plan of 2021 has indicated a strong desire for additional trails.

However, there is a recognition by the MMPC that there is a limit to how many additional trails, if any, are appropriate in the Preserve. The challenge the MMPC has is to maintain a balance between keeping the current character of the Preserve with providing additional public access for its enjoyment.

This Trail Master Plan contains the MMPC's analysis and recommendations regarding a long-term vision of future trails in the Preserve. It does not address the timing of trail additions, other than recommending the next trail to be built.

Trail Options

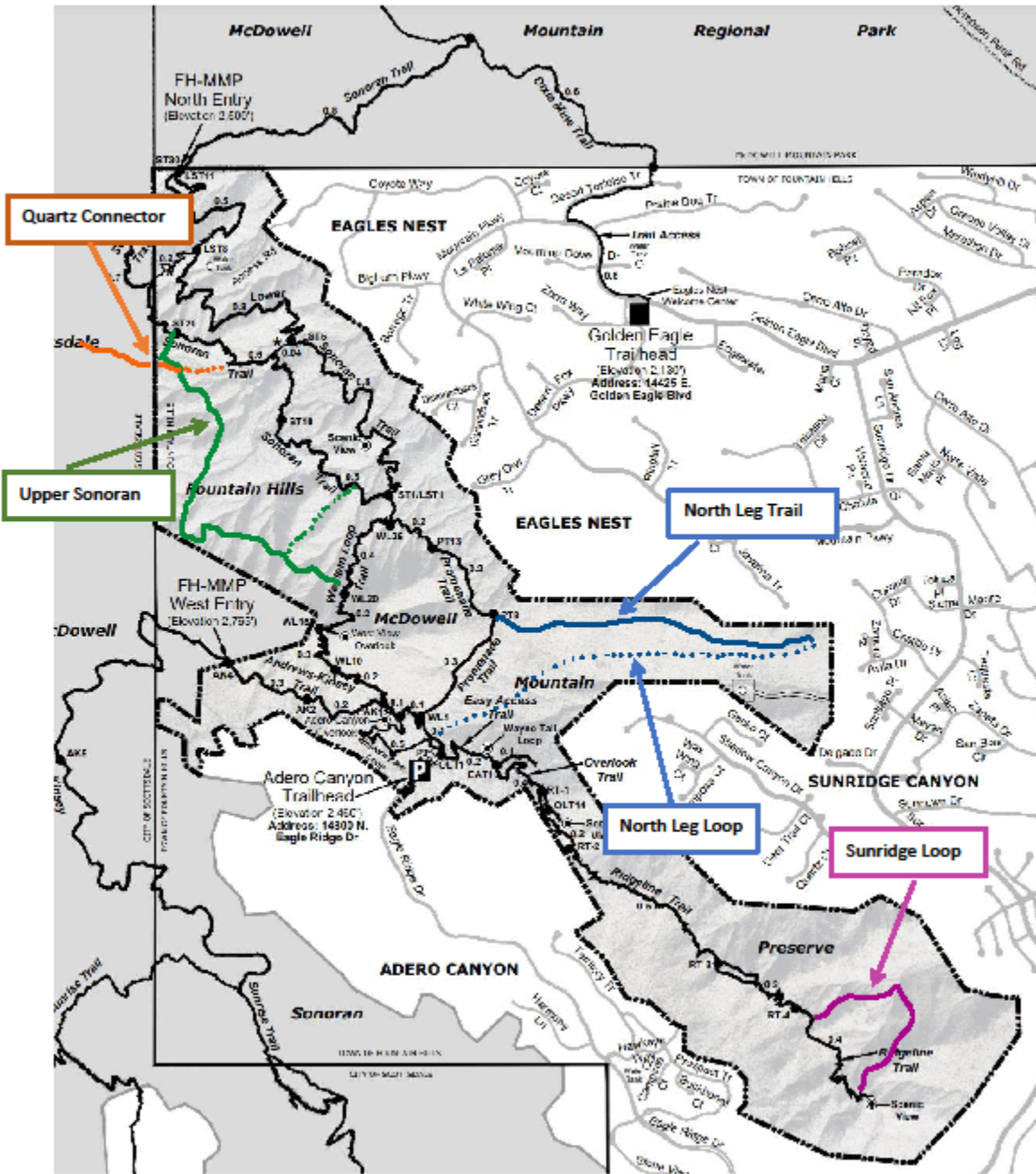
The geographic footprint of the Preserve and the existing trails in the Preserve suggested several possible areas for additional trail development. After careful consideration by the MMPC, and incorporating input from the SCFH, the Master Plan trail options were narrowed to the following:

1. North Leg Trail – an out and back trail, from the Promenade trail extending into the north arm of the Preserve.
2. Upper Sonoran Trail – a trail from the northern part of the Sonoran trail to the Western Loop, with a possible extension back to the Sonoran trail.
3. Quartz Trail Connector – a short connecting trail to an extension of the current Quartz trail in Scottsdale's McDowell Sonoran Preserve.
4. North Leg Loop – adding a loop extension to the North Leg trail.
5. Sunridge Loop – a loop trail extending out from the east end of the Ridgeline Trail.

An additional entry point to the Preserve may be desirable, but is not currently a possibility due to the lack of adjacent Town property or easement.

It is important to emphasize that, even as additional trails are considered, maintenance of the existing trail system is to take priority over new trail construction.

Fountain Hills McDowell Mountain Preservation Master Plan 2022



Process for Trail Master Plan Development

The various options were considered, both individually and in the aggregate, and vetted via the MMPC Guidelines vetting process (see Appendix).

Additional factors included in the analysis are:

- Impact on the image of the Town of FH
- Impact on Trailhead parking
- Impact on wildlife
- Impact on neighboring communities
- Impact on trail density
- Difficulty level of building the trail
- Ability to use professional trail builders, i.e., equipment access
- Availability of trail building resources

Analysis of Trail Options

Criteria common to all Options

Many of the vetting criteria and additional factors apply equally to all the trail options:

Do they meet the Guiding Principles?

- The Guiding Principles are to: maintain the natural beauty of the Preserve, minimize human impact, prioritize conservation over development, and provide public access. While the addition of new trails will impact the natural state of the Preserve and increase human impact, the Plan intends that new construction will be carefully considered and carried out in a way that will minimize impact while providing the public with additional, desired trails.
- The ability to give priority to conservation over development will require that each proposed trail in the future be thoroughly vetted at that time.

Do they complement or conflict with the mission to preserve the Preserve?

The additional trails present a challenge in terms of how to maintain a balance between keeping the current character of the Preserve and providing additional public access for its enjoyment. The Trail Master Plan 2022 aims to address these issues by limiting future development to the trails specified in this plan. This is consistent with the vision of the 2004 Preserve Master Plan to allow: the “Construction of specific walking trails to provide the public with the opportunity to explore all directions within the Preserve”.

Do they take into consideration Town input?

- The Town of Fountain Hills has tasked the MMPC with, among other things, “to provide for the development of a trail system within the Preserve”. Community input to the Community Services Master Plan of April 2021 has indicated a strong desire for additional trails, including Greater Trail Connectivity, Long Range Trail Plans, Environmental Education Center, Development of Outdoor and Environmental Programs, Fitness and Wellness Programs. The unique characteristic of the Preserve satisfies many of these aspirations.

What problem or need do they satisfy?

- The addition of trails in the Preserve serves to help accomplish the Town of Fountain Hills’ desire to provide for the development of a trail system within the Preserve and serves to help fulfill community input for a desire for additional trails.
- The additional trails in this Plan also help to achieve the 2004 Preserve Master Plan vision of “construction of specific walking trails to provide the public with the opportunity to explore all directions within the Preserve”.

What are the funding requirements?

- Funding requirements are minimal. Labor to build and maintain the trails is done on a volunteer basis. Minor funds will be required for signage and updating of online trail maps.
- Future trail building & maintenance could become problematic for this volunteer group in terms of safety, expertise, training, and equipment. Funding may be required to address these potential issues.

What is the impact on Trailhead parking?

- Hiking activity in the Preserve is very seasonal. Parking capacity at Adero Canyon Trailhead may be reached during limited hours on weekends and holiday periods (mid-November through March). Additional trails in the Preserve will incrementally add to this demand.
- This can be mitigated by allowing overflow parking on Eagle Ridge Drive on weekends during the peak hiking season.
- Parking limitations will improve trail user density. If the amount of parking spaces remains the same, it will limit additional users regardless of how many new trails are added.

What is the impact on wildlife in the Preserve?

- Without an extensive study on wildlife movements, it is difficult to anticipate the impact on current habitats. However, years of continuous construction in the adjacent neighborhoods have likely already forced alternate environments for some of the Preserve's wildlife.
- The impact on wildlife will be considered when vetting any potential new trails.

What is the input from SCFH?

The Sonoran Conservancy of Fountain Hills (SCFH) reviewed an early draft of the Trail Master Plan and provided input to the MMPC (see full comments in the Appendix). Their thoughtful and thorough comments were discussed by the MMPC and taken into consideration in finalizing this document.

The SCFH input was most helpful in improving this plan. Their involvement and efforts are appreciated by the MMPC.

Trail Specific Vetting

Following are the results of the vetting of specific trails. Note that:

- The proposed North Leg Trail has been fully vetted by the MMPC. Its approval by Town Council is recommended by the MMPC and supported by the SCFH.
- The other trails listed have been through an initial screening to determine if they warrant inclusion in this Trail Master Plan. A complete vetting and Town Council approval are required prior to moving forward with these.
- The descriptive names used in this document will not necessarily be the trail name. That will be decided at the time each trail is approved.
- References to Trail Density refer to the physical proximity and visibility of other trails.

North Leg Trail

This is an out and back trail from the Promenade trail, extending into the north arm of the Preserve. The trail length is 0.9 miles one way. It is a 2.8-mile round trip hike from Adero Canyon Trailhead.

What is the potential impact on the image of the Town of FH?

- One of the appeals of Fountain Hills is the Preserve and the ability of people to enjoy the Preserve via a trail system. Additional hiking options in the Preserve will enhance that image.
- Another appeal is the ability of non-hikers to enjoy the view of the Preserve from a distance. This trail will have virtually no effect on that view.

Does it add to the diversity of the trail system?

- This trail is 0.9 miles in length (one way) and would be rated moderately easy. It has easy access from the Promenade and provides a new hiking option, especially for visitors not accustomed to, or wanting more strenuous hikes.
- The trail opens an area of the Preserve not currently accessible to the public.

What is the impact on trail density?

- This trail extends to an area of the Preserve with no existing trails. Therefore, it does not add to localized trail density. Visibility to and from other trails is minimal.

What is the impact on bordering neighborhoods?

- There are a few lots bordering this area of the Preserve:
 - Nine houses in Shadow Canyon.
 - Six lots in Eagles Nest, none of which are developed.

The North Leg trail has been planned to minimize the visual impact on these residences.

What is the impact on wildlife in the Preserve?

- This portion of the Preserve is approximately 0.2 miles wide, with existing or planned residential development on three sides. It is believed that the addition of a hiking trail in this area will have minimal impact on any wildlife.

What is the level of effort to pursue i.e., trail building difficulty?

- Building this trail would be of similar difficulty as the Lower Sonoran and Lower Ridgeline builds. For Trailblazers, this would be the shortest hike to the trail work, approximately one-half mile.

What is the ability to use professional trail-building resources?

- The trail is connected to the Promenade. This is the most accessible of the trails to transport trail building equipment, though it is expected that this trail will be built in the traditional fashion of volunteer labor and hand tools only.

What is the availability of resources to build the trail?

- The SCFH Trailblazers leader has confirmed that Trailblazer volunteer labor will be sufficient to construct this trail.

Upper Sonoran Trail – Initial Screening

This is a 1.2-mile trail from near the north end of the Sonoran Trail to the Western Loop Trail. There is also a proposed leg leading back to the southern end of the Sonoran Trail.

What is the potential impact on the image of the Town of FH?

- One of the appeals of Fountain Hills is the Preserve and the ability of people to enjoy the Preserve via a trail system. Additional hiking options in the Preserve will enhance that image.
- Another appeal is the ability of non-hikers to enjoy the view of the Preserve from a distance. This trail would not be visible from outside the Preserve.

Does it add to the diversity of the trail system?

- This trail is approximately 1.2 miles long and would be rated difficult. It connects the eastern part of the Sonoran Trail to the Western Loop trail, with an option to rejoin the Sonoran trail at the western end.
- The addition of this trail would provide many additional options for desirable loop hikes when combined with the Western Loop, Sonoran, Lower Sonoran, and crossovers.
- The trail traverses a more rugged and remote portion of the Preserve, often with no houses in view. It provides hikers with a very different experience than other trails in the Preserve.

What is the impact on trail density?

- This trail extends through rugged terrain. Other than connection points to the Western Loop and Sonoran Trails, no other trails are visible.

What is the impact on bordering neighborhoods?

- There are no houses impacted by this trail. It is in a remote area of the Preserve.

What is the impact on wildlife in the Preserve?

- This trail is in a more remote area of the Preserve. There is likely more wildlife in this part of the Preserve but also more space for a trail to minimally impact the wildlife. Additional assessment of this should be completed during the full vetting process.

What is the level of effort to pursue i.e., trail building difficulty?

- This is a more difficult trail to construct but could still be accomplished with volunteer labor and hand tools only.

What is the ability to use professional trail-building resources?

- The trail is connected to the Sonoran Trail a short distance from the Promenade trail. Trail building equipment could access this trail via the Promenade trail, then down the Sonoran.

Quartz Trail Connector – Initial Screening

This is a 1.7-mile trail from the Quartz Trail in the Scottsdale McDowell Sonoran Preserve to the Upper Sonoran or Sonoran Trail in the Fountain Hills McDowell Mountain Preserve.

The majority of this trail is in Scottsdale. The Fountain Hills portion of the trail would be only 300 feet if connected to the proposed Upper Sonoran or 0.25 miles if connected to the Sonoran.

What is the potential impact on the image of the Town of FH?

- One of the appeals of Fountain Hills is the Preserve and the ability of people to enjoy the Preserve via a trail system. Additional hiking options in the Preserve will enhance that image.
- Another appeal is the ability of non-hikers to enjoy the view of the Preserve from a distance. This trail would not be visible from outside the Preserve.

Does it add to the diversity of the trail system?

- This trail is approximately 1.7 miles long and would be rated difficult. It provides an additional connection to the Scottsdale McDowell Mountain Preserve which opens the possibility of many additional hiking options.
- It provides access to a rugged and remote portion of the Scottsdale Preserve, often with no houses in view. It provides hikers with a very different experience than other trails in the Preserve.

What is the impact on bordering neighborhoods?

- There are no houses impacted by this trail.

What is the level of effort to pursue i.e., trail building difficulty?

This is a very difficult trail to construct on the Scottsdale side. The Fountain Hills portion of this trail would be relatively easy due to its short length.

What is the ability to use professional trail-building resources?

- Accessibility by trail building equipment is not clear, though it is unlikely to be used in the Fountain Hills Preserve for this trail.

What is the impact on trail density?

- This trail extends through rugged terrain and towards the Scottsdale Preserve. Other than the connection point to either the Upper Sonoran or Sonoran Trail, no other trails are visible from this trail.

What is the impact on wildlife in the Preserve?

- Due to the short length of the Fountain Hills portion of the trail, there would be minimal impact on wildlife in the Preserve. The impact on wildlife on the Scottsdale side would be addressed by Scottsdale.

North Leg Loop – Initial Screening

This is an extension of the North Leg Trail connecting back near the Adero Canyon Trailhead. This would be a 2.6-mile loop hike from Adero Canyon Trailhead.

What is the potential impact on the image of the Town of FH?

- One of the appeals of Fountain Hills is the Preserve and the ability of people to enjoy the Preserve via a trail system. Additional hiking options in the Preserve will enhance that image.
- Another appeal is the ability of non-hikers to enjoy the view of the Preserve from a distance. This trail would have limited visibility from nine houses in Shadow Canyon.

Does it add to the diversity of the trail system?

- This trail would provide a loop option to the North Leg.
- It would also provide an additional path from Adero Canyon Trailhead for hikers to disperse.

What is the impact on trail density?

- This extension to the North leg increases trail density near the Adero Canyon Trailhead. The visibility to and from other trails, including the Promenade trail, is minor except for near the Trailhead.

What is the impact on bordering neighborhoods?

- This trail would have limited visibility from nine houses in Shadow Canyon.

What is the impact on wildlife in the Preserve?

- This portion of the Preserve is approximately 0.2 miles wide, with existing or planned residential development on three sides. It is believed that the addition of a hiking trail in this area will have minimal impact on any wildlife.

What is the level of effort to pursue i.e., trail building difficulty?

- Building this trail would be of similar difficulty as the Lower Sonoran and Lower Ridgeline builds. For Trailblazers, this would be the shortest hike to the trail work, starting just outside the Trailhead.

What is the ability to use professional trail-building resources?

- The trail begins near the Adero Canyon Trailhead, and so is the most accessible of the trails for trail building equipment access.

Sunridge Loop – Initial Screening

What is the potential impact on the image of the Town of FH?

- One of the appeals of Fountain Hills is the Preserve and the ability of people to enjoy the Preserve via a trail system. Additional hiking options in the Preserve will enhance that image.
- Another appeal is the ability of non-hikers to enjoy the view of the Preserve from a distance. This trail would be visible from the Sunridge golf course area.

Does it add to the diversity of the trail system?

- This trail is an extension of the Ridgeline trail and is approximately 0.9 miles long. It would be rated difficult.
- The trail provides additional scenic views of the Sunridge golf course, the Fountain, and a bird's eye view of the Town. The addition of this loop increases hiking options when combined with the Ridgeline and Lower Ridgeline trails.

What is the impact on trail density?

- This trail extends to an area of the Preserve with no other trails. No other trails would be visible from this trail.

What is the impact on bordering neighborhoods?

- This trail would be visible from a distance in the Sunridge golf course area.

What is the impact on wildlife in the Preserve?

- It is believed that the addition of a hiking trail in this area would have minimal impact on wildlife.

What is the level of effort to pursue i.e., trail building difficulty?

- Building this trail would be of similar difficulty as the Ridgeline Trail build.

What is the ability to use professional trail-building resources?

- It would be difficult for trail building equipment to access this trail.

Summary

The MMPC believes the Fountain Hills McDowell Mountain Preserve has evolved to the point that a long-term trail master plan is warranted. Such a plan serves to provide a coordinated approach to possible future trails that will serve to achieve the Preserve Master Plan goal:

“To provide the public opportunity to explore all directions within the Preserve.”

while ensuring that the overall Preserve trail system achieves the best balance possible between preservation of the Preserve and availability to the public.

The MMPC will present recommendations for approval by the Town Council of each new trail identified in this Trail Master Plan one at a time, and only after each has been fully vetted and potential resources to construct each trail are identified.

APPENDIX

IDEA FLOW AND MMPC IDEA VETTING PROCESS

The following idea qualification process was adopted by the MMPC in 2019.

This process would be applied as additional consideration filters following compliance with the Guiding Principles and used by the working groups to assess new ideas and issues.

Step 1 - VETTING:

1. Does it meet the Guiding Principles?
2. Does it complement or conflict with our mission to preserve the Preserve?
3. Does it consider the source - Town, Community, SCFH, within MMPC? (Town source should take priority)
4. What problem does it solve or what need does it satisfy?
5. What are the funding requirements? (both capital and expense as well as necessary or long-term funding sources)
6. What is the level of effort to pursue? (Is it achievable within the means of the MMPC?)

Step 2 – APPROVAL (presented by Working Group at a monthly MMPC meeting)

1. Outline the problem or need.
2. Provide several possible scenarios with pros and cons for each.
3. If appropriate, provide a recommendation for approval/disapproval.

Step 3 – PRIORITIZATION (once approved)

1. Are there time constraints in implementing the idea? (Budget deadlines, seasonal considerations, resource availability, etc.)
2. Will funding complexities affect completion?