

BOARDMAN LAKE TRAIL

For nearly 30 years the community has supported the vision of a trail circling Boardman Lake. Since 2002, nearly 3 miles have been completed, providing trail users with a special opportunity to escape the bustle of the city and enjoy a wooded trail perfect for walking, running, bicycling, and providing an important non-motorized connection for visitors and residents making their way through town.

The trail was formed through partnerships at the City, Township, County, and TART Trails. TART Trails supported trail development and helps offset maintenance costs with volunteers that average over 300 hours of work a year on the trail helping remove trash, trim shrubs, install signage, repair boardwalk, clean debris, and more.

Between Hull Park and Medalie Park, the trail runs through both Traverse City and Garfield Township. The trail is identified as a development priority in planning documents for the City, Township and County and is part of the Boardman Lake Brownfield Work Plan.

Each year the trail hosts over 58,000 visits, with counts in the summertime averaging over 250 per day.

A Look Back...

- Nearly 3 miles of trail currently wrap around the lake between Medalie Park and 14th Street.
- Funding for trail development between Hull Park and Medalie Park was shared nearly equally between Traverse City, Garfield Township, and Grand Traverse County matched by state funding.
- TART Trails helped secure donated easements for the trail valued at \$200,000. All easements are held by the City of Traverse City.

Photo: Gary Howe



- Over 1.5 miles on the west side between 14th St. and Medalie Park are left to complete the loop around the lake.
- Trail design is being funded through a Coastal Zone Management Grant matched with Brownfield funding.

East Boardman Lake	Hull Park to South Airport				
2005					
Funding Participants	\$1,194,242.64	Total Cost		Percent of Total	
City of TC	\$191,900			16%	
		\$26,900.00	1993		
		\$6,000.00	1994		
		\$10,000.00	1995		
	(engineering)	\$120,000.00	?		
		\$5,000.00	2002		
		\$24,000.00	2002		
County	\$153,000			13%	
		\$59,000.00	2004		
		\$94,000.00	2005		
Garfield Township	\$153,000			13%	
		\$59,000.00	2004		
		\$94,000.00	2005		
TART	\$15,000			1%	
State of Michigan	\$513,386			43%	
		\$50,000.00	2006		
		\$216,875.51	2005		
		\$233,124.49	2005		
		\$13,385.64	2006		
JV 501 Waterfront Grant	\$167,957			14%	
				100%	
Easement Donations	\$200,000				
Cost with Easment Value	\$1,394,242.64				

West Boardman Lake		Bridge to 14th St.		
Year: 2014				
Funding Participants	\$799,740.00	Total Cost		Percent of Total
City of TC	\$0			0%
County	\$0			0%
Garfield Township	\$0			0%
State of Michigan	\$210,000			26%
DNR Trust Fund		\$210,000.00		
Other Grants/Sources	\$589,740			74%
TART Trails		\$5,000.00		
Brownfield Funds		\$584,740.00		
Easement Donations	\$222,000			
Cost with Easment Value	\$1,021,740.00			

*Lake Ridge donated a new easement for the trail alignment in front of the development

Preliminary Design Work for West Boardman Lake Trail (Leadership Team & Owner Team Meetings)

Public Input
Open House #1 3/9/2016, Online Input
Open House #2 5/19/2016
Focus Groups & Interviews

2/1/2016 – 5/19/2016

Presentations of Preliminary Design & Identify strategies for funding trail maintenance & development

7/6/16 Joint Study Session
7/20/16 GTC Parks & Recreation BDT
7/21/16 GTC Parks & Recreation Commission*

**Implementation Plan Development
(Design, Funding Strategies for Development and Maintenance)**

Easement Identification and Discussions

City confirms ownership Letters of commitments by 9/30/16

Design & survey work begin
12/2015

Preferred Alignment Identified

Preferred Trail Alignment Presented
5/19/2016

Final Design to Public

Aug 22 City of Traverse City
Aug 23 Garfield Township *

Sept 6 City of Traverse City *

Plan Approval

2015

Dec Jan Feb Mar Apr May Jun Jul Aug Sept Oct

2016

Today

*Resolution of Support for Trail Design

West Boardman Lake Non-Motorized Path



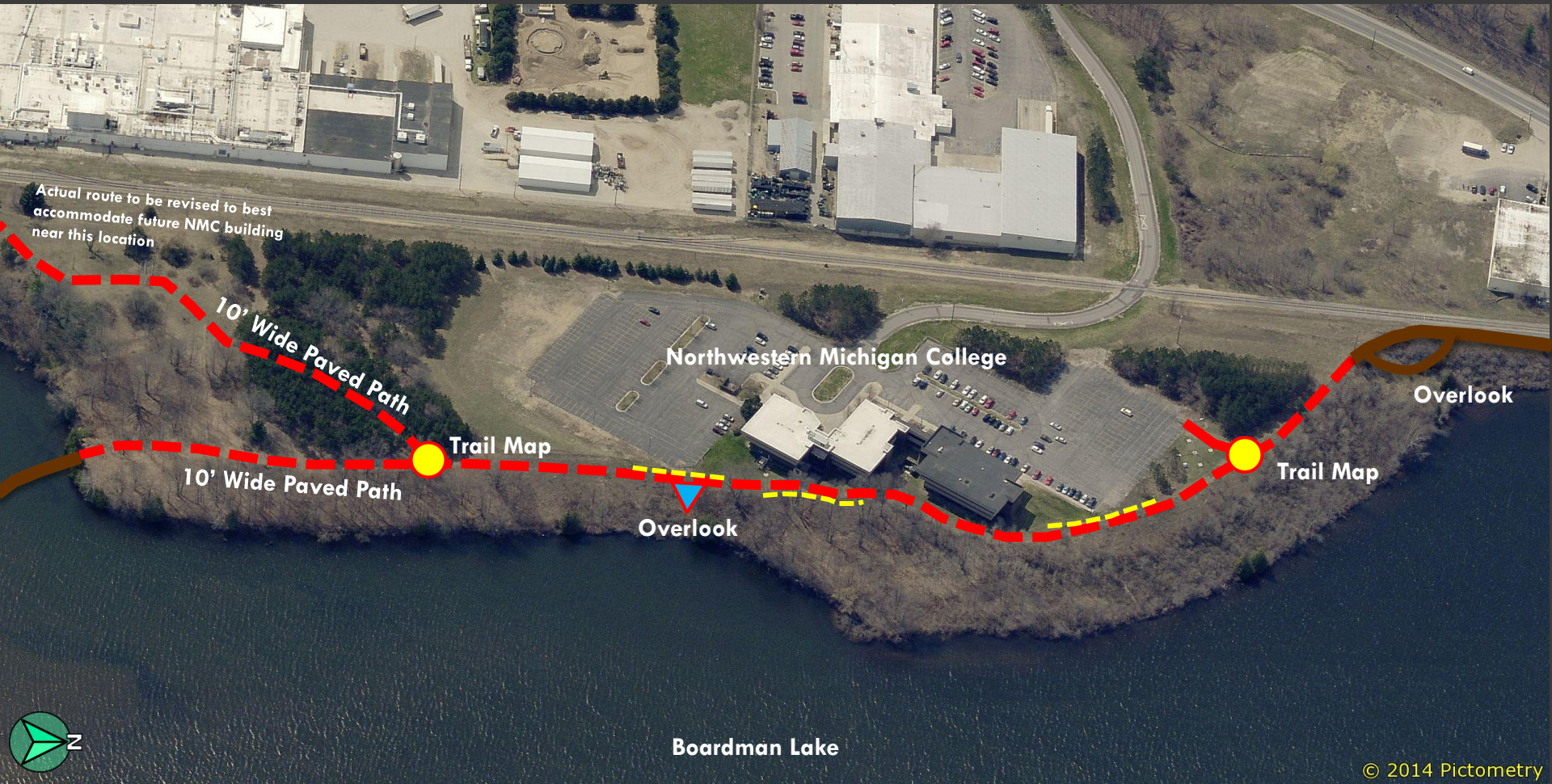
West Boardman Lake Non-Motorized Path



West Boardman Lake Non-Motorized Path



West Boardman Lake Non-Motorized Path



West Boardman Lake Non-Motorized Path



Actual route to be revised to best accommodate future NMC building near this location

Trail Map

10' Wide Paved Path

12' Wide Boardwalk

Overlook 2

Overlook 1

"The Cove"

Logan's Landing

Clear Span Bridge

Medalie Park

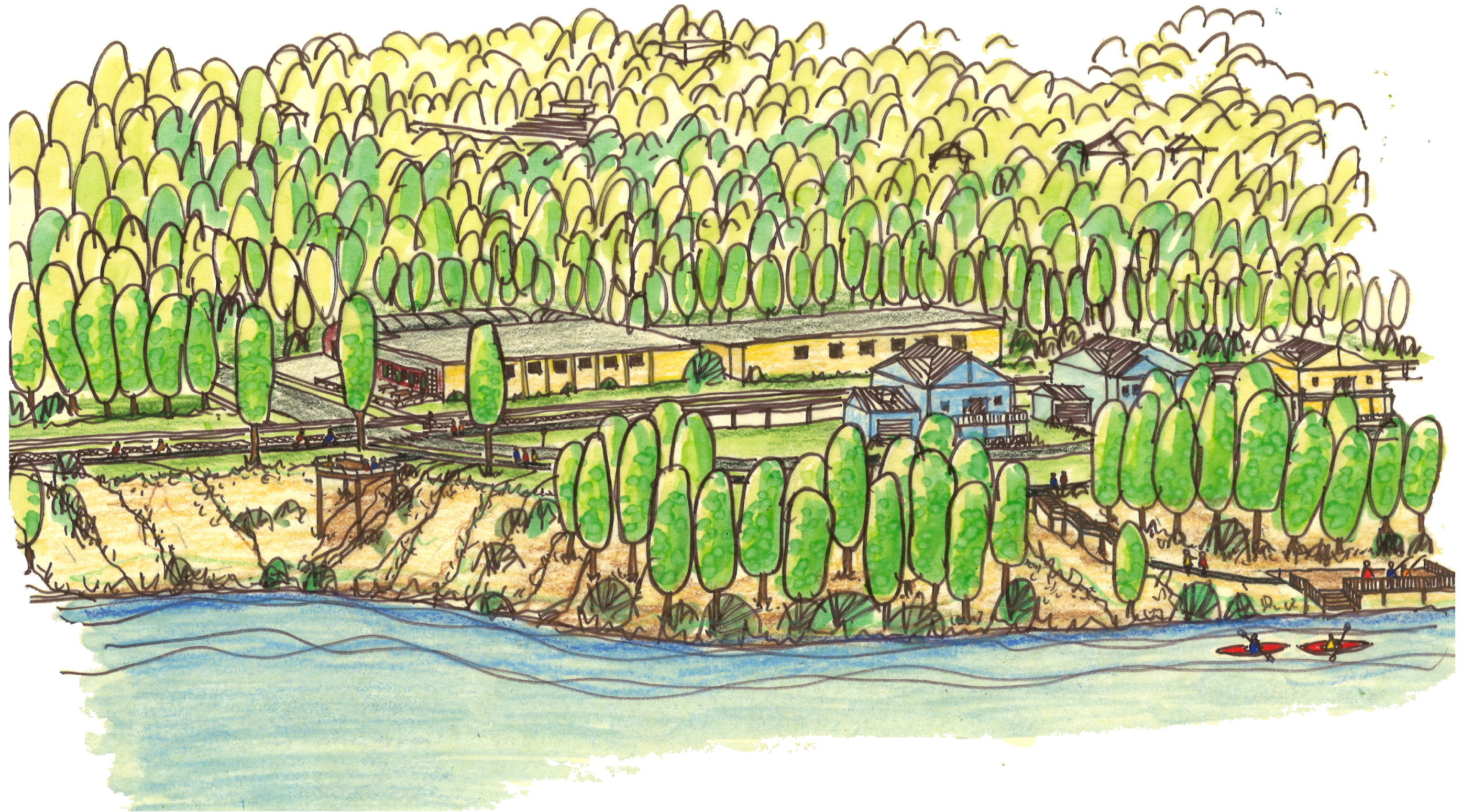
Boardman River

Existing Path

Wysong Rd.

South Airport Rd.





8/16/2016

West Boardman Lake Non-Motorized Path

View at 16th Street & Lake Ridge Drive



7/28/2016

West Boardman Lake Non-Motorized Path

Boardwalk at "The Narrows"



8/16/2016

West Boardman Lake Non-Motorized Path

Path Connection at NMC



8/5/2016

West Boardman Lake Non-Motorized Path

Boardwalk to Logan's Landing



7/28/2016

West Boardman Lake Non-Motorized Path

Pedestrian Bridge to Medalie Park

	City of Traverse City	Garfield Township	TC/Garfield Rec Authority	TART Trails, Inc.	Grand Traverse County
1. How well does this project align with existing and approved plans?	"Close to perfect/strong alignment"	"Some alignment"	"Does not align"	"Perfect alignment"	"Some alignment"
Comments	"Healthy living, quality of life, environmental stewardship, transportation, existing trail network. It fits well with MDOT, City, and Township other goals."	"Aligns well with both master Plan and Park Plan. The trail is in the plans and has public comment support. There is no CIP regarding this issue. Both plans could be used as support for grant applications."	"Current Rec Authority scope limited to 3 park properties - no involvement outside of those 3 properties."	"Number one item on communities survey for trail priorities. Meets all of the organization's community goals. Connecting communities."	"The current county parks master plan and strategic plan include "working with TART and other partners to develop trails." We have no CIP for trails at all. There is no alignment with the Board of Commissioners strategic plan."

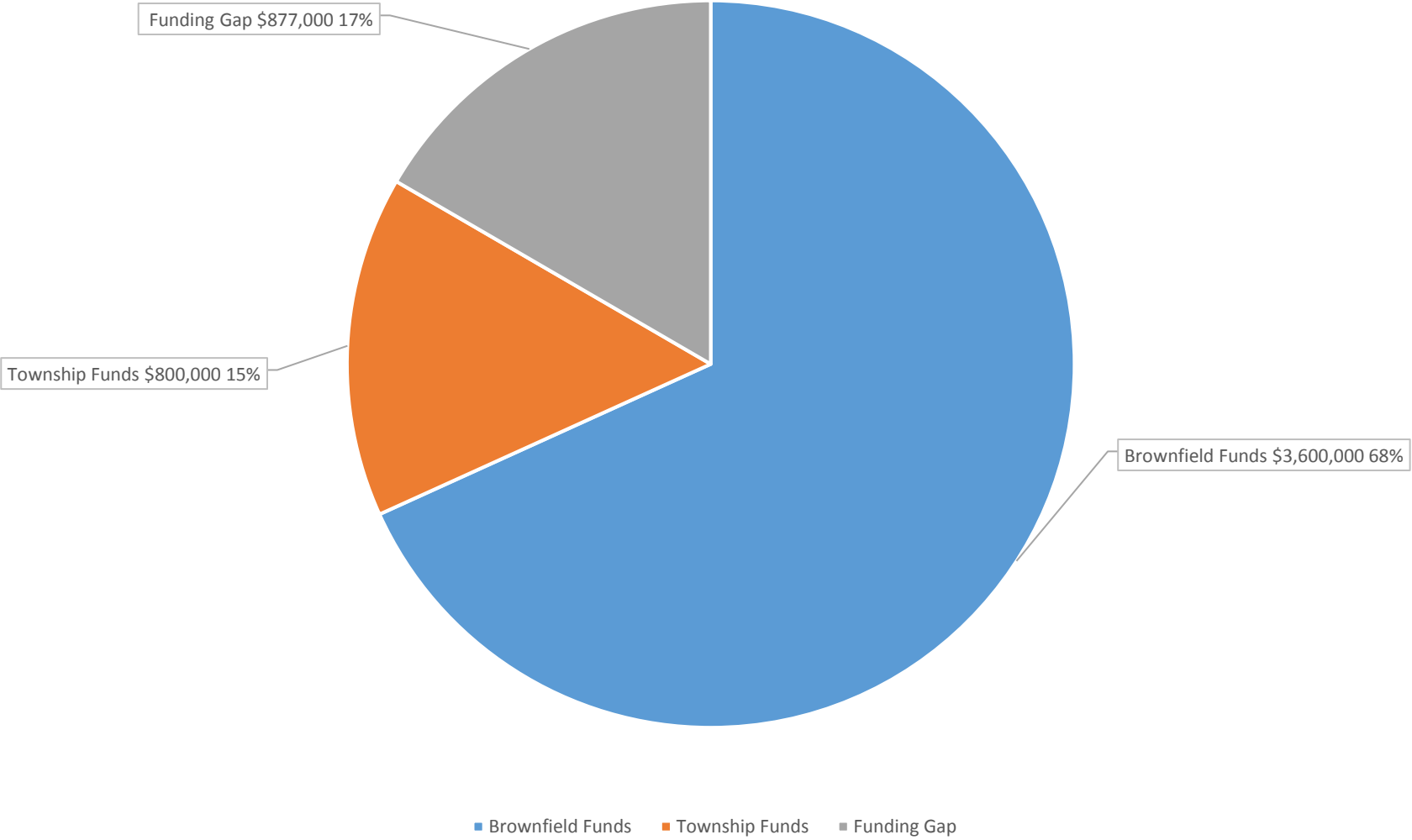
	City of Traverse City	Garfield Township	TC/Garfield Rec Authority	TART Trails, Inc.	Grand Traverse County
2. How important of a priority is this trail project to your unit of government /entity?	"Extremely important/quite important; a high priority"	"Somewhat important"	<i>no comments</i>	"Extremely important/a top priority"	"Not at all important/not a priority"
Comments	<i>no comments</i>	"This trail is not going to be utilized by our Township residents as much as City residents. The top two priorities of the Board of Trustees are roads and trails, however this specific trail doesn't place up at the top of the priority."	<i>no comments</i>	"See above. Part of our origin story."	"It is not a priority to the County Board of Commissioners. It is not at the top of the County Parks priorities but it is on the list. We are focusing on saving our parks right now."

3. What is your government/organization willing and able to do to support the project?	City of Traverse City	Garfield Township	TC/Garfield Rec Authority	TART Trails, Inc.	Grand Traverse County
A. What is your preferred role and level of involvement in trail development?	"Apply for and administer grants. Partner with County, Township, Rec Authority. Key advocate and catalyst."	"The township role may be financial and staff time. Planning, grant writing, planning staff currently at the township."	"Not a part of Rec Authority's current mandate. Outside of 3 current properties."	"Project managers for design (in cooperation and collaboration). Facilitation of public input. Fundraising support."	"The County is unable to financially support this project but can use planning staff. County Brownfield is a partner as well."
B. What is your preferred role and level of involvement in trail maintenance?	"Partner with area government agencies and Rec Authority."	"There is no township staff for trail maintenance and will not be in the future. The township has some potential for a role in maintenance funding contribution."	<i>no comments</i>	"Identifying and coordinating needs. Supporting and providing volunteers to support maintenance. Establish clear understanding of definition of roles between partners/owners."	"None."
C. What are significant roadblocks to your involvement?	"Competing projects, overall resources, being without common ground with partner jurisdictions."	"There is no township personnel for maintenance and there will not be in the future. Limits also include getting Board of Trustee approval."	"To be involved, scope of Rec Authority would have to change."	"Lack of: financial support for organizational capacity, partner involvement, ownership."	"Money."
D. What are your suggested solutions to potential barriers or challenges?	"Facilitator to find common ground. Involve Tyson and other businesses."	"A recreational authority is a potential solution to trail maintenance county wide as well as trail construction."	"The RA has been a good example of multi-jurisdictional cooperation around recreational resources. Trails lend themselves to a cooperative approach, and formalizing such an approach could potentially be helpful."	"Work effectively with our partners. Working in long-term maintenance costs into trail plans at the outset, including clear definition of roles."	"Tourist tax. Recreational millage - a potential solution lies in a county-wide parks authority."
E. How do you want to work with other partners?	"Investigate partnership including with RA, TART, MDOT, Road Commission. There is a regional benefit - look at partners that way."	"Participation by staff and officials at different meetings."	"RA cooperates with the parent jurisdictions and is always open to considering the best ways to serve the residents of TC and Garfield Township."	"Continue to support solutions that serve the community. Consistency and follow-through on commitments. Bring in private sector to help fill gaps."	"Continue being at the table."

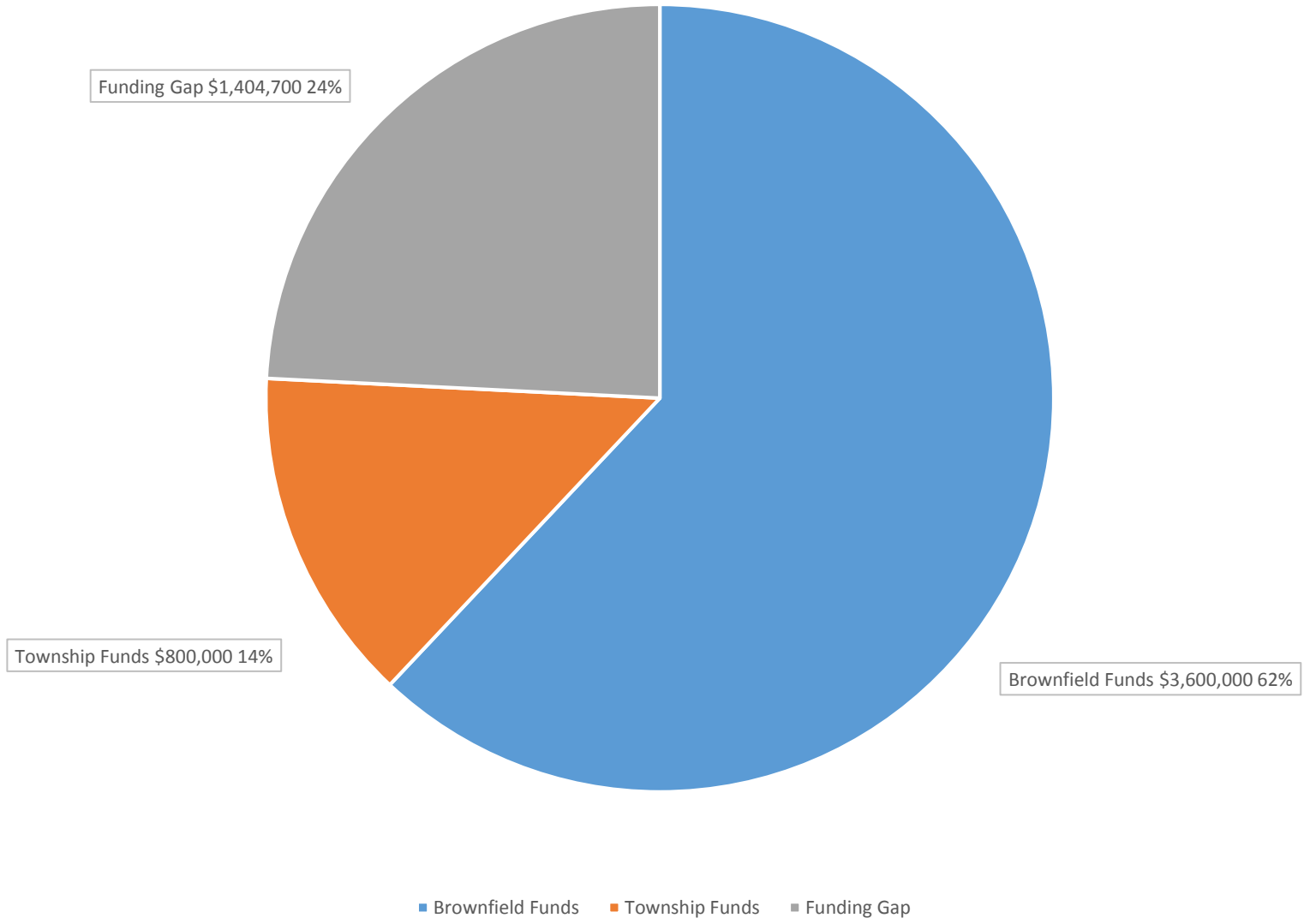
Boardman Lake Trail 14th St-South Airport Rd
2015-2018

Budget	
Expenses	
Construction Funds	4,470,000.00
Final Design/Construction Engineering (8%)	360,000.00
Contingency (10%)	447,000.00
Total Development Cost	5,277,000.00
Maintenance Cost Set aside (10%)	527,700.00

Funding Sources for West Boardman Lake Trail Development
Scenario #1
\$5,277,000
No Maintenance Set Aside



Funding Sources for West Boardman Lake Trail Development & 10% Maintenance Set Aside
Scenario #2
\$5,804,700



Proposed New West Boardman Lake Trail Maintenance Budget (14th St to Medalie Park)										
Facility Type	Distance (Miles)/ # Bridges/ Sq. Feet Retaining Wall	Annual Maintenance & Operations Costs/Mile***	Annual Ops Cost	Preventative Maintenance Costs/Mile Includes: Annual inspection, 7 year trenching, as needed crack sealing, and/or culvert clearing***	Annual Preventative Cost	Snow Removal Cost/Mile***	Snow Removal Cost	Annual Component Replacement Set-Aside/Mile***	Annual Component Replacement Set-Aside	Total
Total	1.58		\$2,425.00		\$806.36		\$2,296.59		\$11,672.00	\$17,199.95
					\$5,527.95					

*Maintenance Cost Data Sources: Prein & Newhof, TART Trails Current & Historical Costs, Sleeping Bear Heritage Trails Current & Historical Costs

**Assumes private contractor inspection 2x/year

*** Assume annual 3% inflation increase/adjustment from 2016

Entire Boardman Lake Trail (Existing and Proposed) Maintenance Budget										
Facility Type	Distance (Miles)/ # Bridges/ Sq. Feet Retaining Wall	Annual Maintenance & Operations Costs/Mile***	Annual Ops Cost	Preventative Maintenance Costs/Mile Includes: Annual inspection, 7 year trenching, as needed crack sealing, and/or culvert clearing***	Annual Preventative Cost	Snow Removal Cost/Mile***	Snow Removal Cost	Annual Component Replacement Set-Aside/Mile***	Annual Component Replacement Set-Aside	Total
Total	5.09		\$7,470.00		\$2,680.22		\$7,401.33		\$31,584.00	\$49,135.55
					\$17,551.55					

*Maintenance Cost Data Sources: Prein & Newhof, TART Trails Current & Historical Costs, Sleeping Bear Heritage Trails Current & Historical Costs

**Assumes private contractor inspection 2x/year

*** Assume annual 3% inflation increase/adjustment from 2016

Entire (Existing & Proposed) Boardman Lake Trail Maintenance Funding Scenario										
Source	Total Miles	Annual Ops	Preventative	Snow Removal	Total Annual Spend	Set Aside		Endowment of 10% Maintenance Fund Set Aside	Annual Endowment Contribution (4%)	
Endowment of 10% Maintenance Fund Set Aside	5.09	\$7,470	\$2,680	\$7,401	\$17,552	\$31,584		\$527,700.00	\$21,108.00	

Proposed West Boardman Lake Trail (14th Street to Medalie) Maintenance Budget										
Facility Type	Distance (Miles)/ Bridges/ # Sq. Feet Retaining Wall	Annual Maintenance & Operations Costs/Mile***	Annual Ops Cost	Preventative Maintenance Costs/Mile Includes: Annual inspection, 7 year trenching, as needed crack sealing, and/or culvert clearing***	Annual Preventative Cost	Snow Removal Cost/Mile***	Snow Removal Cost	Annual Component Replacement Set-Aside/Mile***	Annual Component Replacement Set-Aside	Total
Shared Roadway: Includes updating pavement markings and signage	0	\$750.00	\$0.00	\$165.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00
Asphalt Shared-Use Path (25 year life): Includes updating pavement markings and signage, debris & tree limb clearing, mowing, minor isolated surface repair	1.15	\$1,500.00	\$1,725.00	\$643.79	\$740.36	\$1,455.00	\$1,673.25	\$4,000.00	\$4,600.00	\$8,738.61
Concrete Shared-Use Path (30 year life):Includes updating concrete markings and signage, debris & tree limb clearing, mowing, minor isolated surface repair	0	\$1,500.00	\$0.00	\$643.79	\$0.00	\$1,455.00	\$0.00	\$3,000.00	\$0.00	\$0.00
Crushed Limestone Shared-Use Path (10 year material add): Includes updating signage, tree limb clearing, mowing, periodic grading	0	\$750.00	\$0.00	\$198.00	\$0.00	\$1,455.00	\$0.00	\$2,000.00	\$0.00	\$0.00
Timber Boardwalk (20 year deck life): Includes updating signage, debris & tree limb clearing, isolated deck board replacement	0.4	\$500.00	\$200.00	\$165.00	\$66.00	\$1,455.00	\$582.00	\$7,040.00	\$2,816.00	\$3,664.00
Bridge (25 year deck life):Includes semi-annual inspections**	1	\$500.00	\$500.00	\$0.00	\$0.00	\$1,455.00	\$41.34	\$800.00	\$800.00	\$1,341.34
Fencing (25 year life)	0.25	\$0.00	\$0.00	\$0.00	\$0.00	NA	NA	\$4,224.00	\$1,056.00	\$1,056.00
Retaining Wall (50 year life)	2400	\$0.00	\$0.00	\$0.00	\$0.00	NA	NA	\$1.00	\$2,400.00	\$2,400.00
Total	1.58		\$2,425.00		\$806.36		\$2,296.59		\$11,672.00	\$17,199.95
					\$5,527.95					

*Maintenance Cost Data Sources: Prein & Newhof, TART Trails Current & Historical Costs, Sleeping Bear Heritage Trails Current & Historical Costs

**Assumes private contractor inspection every other year

*** Assume annual 3% inflation increase/adjustment from 2016

Entire Boardman Lake Trail (Existing & Proposed) Maintenance Budget										
Facility Type	Distance (Miles)/ # Bridges/ Sq. Feet Retaining Wall	Annual Maintenance & Operations Costs/Mile***	Annual Ops Cost	Preventative Maintenance Costs/Mile Includes: Annual inspection, 7 year trenching, as needed crack sealing, and/or culvert clearing***	Annual Preventative Cost	Snow Removal Cost/Mile***	Snow Removal Cost	Annual Component Replacement Set-Aside/Mile***	Annual Component Replacement Set-Aside	Total
Shared Roadway: Includes updating pavement markings and signage	0	\$750.00	\$0.00	\$165.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00
Asphalt Shared-Use Path (25 year life): Includes updating pavement markings and signage, debris & tree limb clearing, mowing, minor isolated surface repair	3.65	\$1,500.00	\$5,475.00	\$643.79	\$2,349.83	\$1,455.00	\$5,310.75	\$4,000.00	\$14,600.00	\$27,735.58
Concrete Shared-Use Path (30 year life):Includes updating concrete markings and signage, debris & tree limb clearing,	0.18	\$1,500.00	\$270.00	\$643.79	\$115.88	\$1,455.00	\$261.90	\$3,000.00	\$540.00	\$1,187.78
Crushed Limestone Shared-Use Path (10 year material add): Includes updating signage, tree limb clearing, mowing, periodic grading	0.5	\$750.00	\$375.00	\$198.00	\$99.00	\$1,455.00	\$727.50	\$2,000.00	\$1,000.00	\$2,201.50
Timber Boardwalk (20 year deck life): Includes updating signage, debris & tree limb clearing, isolated deck board replacement	0.7	\$500.00	\$350.00	\$165.00	\$115.50	\$1,455.00	\$1,018.50	\$7,040.00	\$4,928.00	\$6,412.00
Bridge (25 year deck life):Includes semi-annual inspections**	2	\$500.00	\$1,000.00	\$0.00	\$0.00	\$1,455.00	\$82.68	\$800.00	\$1,600.00	\$2,682.68
Fencing (25 year life)	0.25	\$0.00	\$0.00	\$0.00	\$0.00	NA	NA	\$4,224.00	\$1,056.00	\$1,056.00
Retaining Wall (50 year life)	7860	\$0.00	\$0.00	\$0.00	\$0.00	NA	NA	\$1.00	\$7,860.00	\$7,860.00
Total	5.09		\$7,470.00		\$2,680.22		\$7,401.33		\$31,584.00	\$49,135.55
					\$17,551.55					

*Maintenance Cost Data Sources: Prein & Newhof, TART Trails Current & Historical Costs, Sleeping Bear Heritage Trails Current & Historical Costs

**Assumes private contractor inspection every other year

*** Assume annual 3% inflation increase/adjustment from 2016

Boardman Lake Trail

Maintenance Scenarios

