



Urban & Regional Planning Program
Michigan State University
UP 494/894 Planning Practicum

GrandWalk Trail Planning & Development Study Kent County, MI

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Spring 2007





Introduction to GrandWalk Trail Study

Clients

Rick Chapla - The Right Place Inc.

Carol Townsend - MSU Kent County Extension

Project Purpose

Develop and analyze a GrandWalk area community profile

Identify challenges to planning and building a non-motorized trail and propose solutions to overcome them

Propose an ideal route for a trail in relation to area characteristics

Assess the impact of a trail on the community

Propose an implementation strategy for a trail



GrandWalk Paper Practicum Topics

Profile of GrandWalk

- History of GrandWalk
- Socio-economic and Business profile
- Land and infrastructure inventory

Recreational Context and Planning Objectives

- Master/Recreation Plans and Policy

Legal Requirements, Liability and Construction Standards

- Trail planning and construction challenges
 - Parcel acquisition procedure
 - Construction along an active railroad, next to water, at intersections
 - Trail Standards and Materials
 - Safety and Liability Concerns

Case Studies

- Trail Impact on Property Value and Crime – Case Studies

Recommendations

- Trail location, phases of development, access points, amenities
- Estimated Cost of Parcel Acquisition
- Trail Financing Options
- Stakeholders



Questions to be Addressed

1. What is **GrandWalk** and how is the proposed **trail** a tool to **redevelop** the area?
2. What would be the **benefit** of building the trail?
3. What **community support** is available for building the trail?
4. What are the **challenges of building** the trail and how can they be overcome?
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GrandWalk Boundaries



GrandWalk History

- Area settled in 1830s
- Historic industries: lumber, gypsum mining, oil, gravel pits and wagon construction



- First mill stones – Public Museum of Grand Rapids
- Indian Mill Creek scrip labor



GrandWalk Socio-economic Profile

- 1,833 acres
- 4812 residents
- Increasing number of young people/nearly 30% of population
- 32 years old - median age
- Low household size

Age distribution

Age	GrandWalk		
	2000	%	1990-2000 Change
Under 5	644	7.53%	37.31%
5 to 9	664	7.76%	55.87%
10 to 14	627	7.33%	50.72%
15 - 19	523	6.12%	9.87%
20 - 29	1,600	18.71%	19.76%
30 - 39	1,393	16.29%	17.65%
40 - 49	1,218	14.24%	39.20%
50 - 59	805	9.41%	28.18%
60 - 64	264	3.09%	-13.44%
Over 65	814	9.52%	-19.72%

2000 Median age

	2000
GrandWalk	32.15
Grand Rapids	30.4
Walker	32.4
Kent County	32.6
Michigan	35.5

Household size

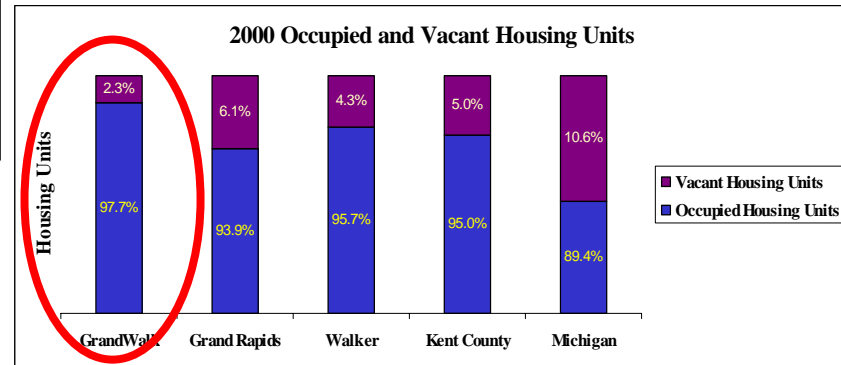
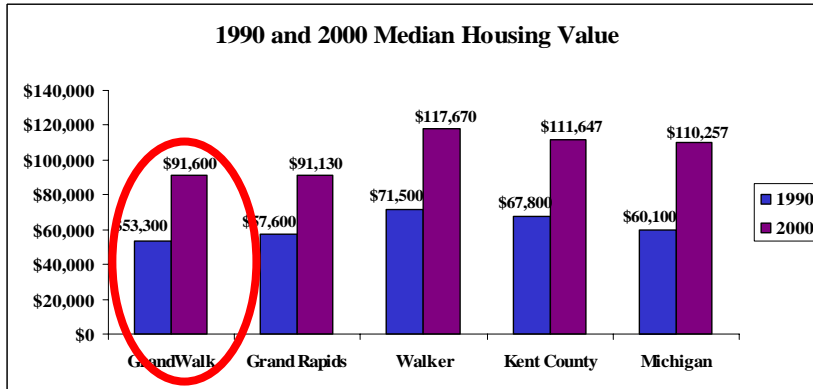
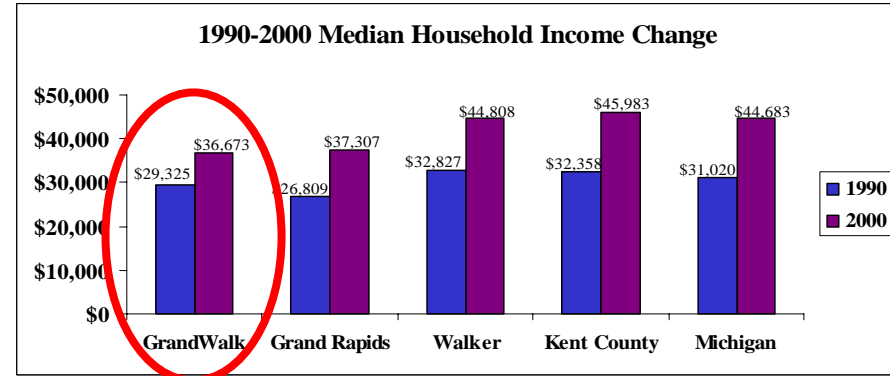
	1990	2000	% Change
GrandWalk	2.98	2.48	-16.78%
Michigan	3.16	2.56	-18.99%
Kent County	3.2	2.64	-17.50%
Grand Rapids	3.2	2.57	-19.69%
Walker	3.16	2.45	-22.47%





GrandWalk Socio-economic Profile

- Low median household income
- Low median housing value
- Low vacancy rate
- 16% of working population travel less than 10 min. to work





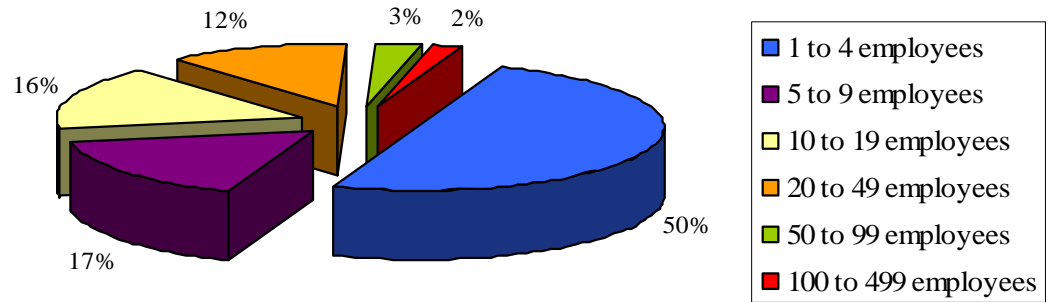
GrandWalk Business Profile

- Approx. 380 businesses

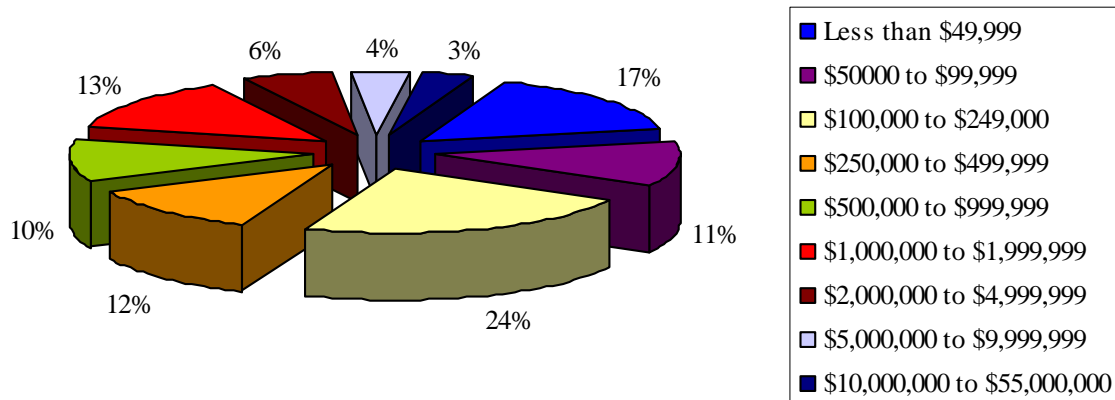
Small businesses

- 67% with less than 10 employees
- 52% with less than \$249,000 sales volume

Distribution of Local Businesses by Size



2005 Sales Volume



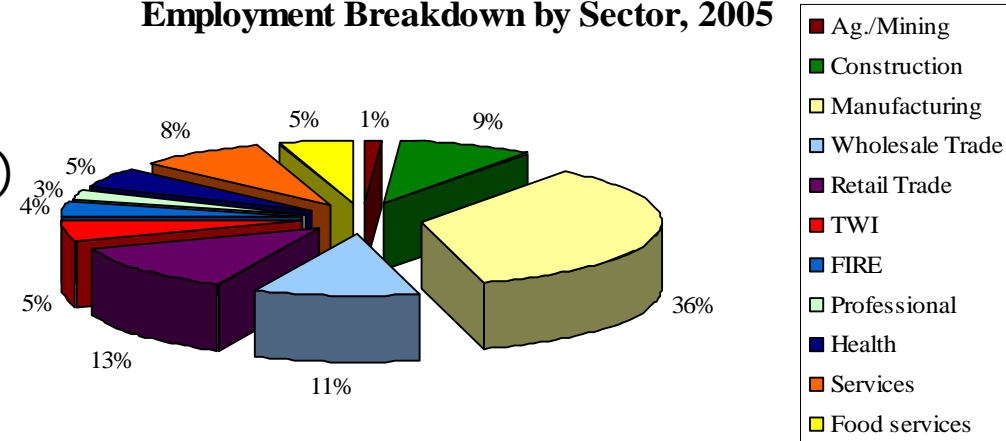


GrandWalk Business Profile

- **Major economic sectors:**

Manufacturing (36% of employees), Retail trade (13%), Wholesale trade (11%) and Services (8%)

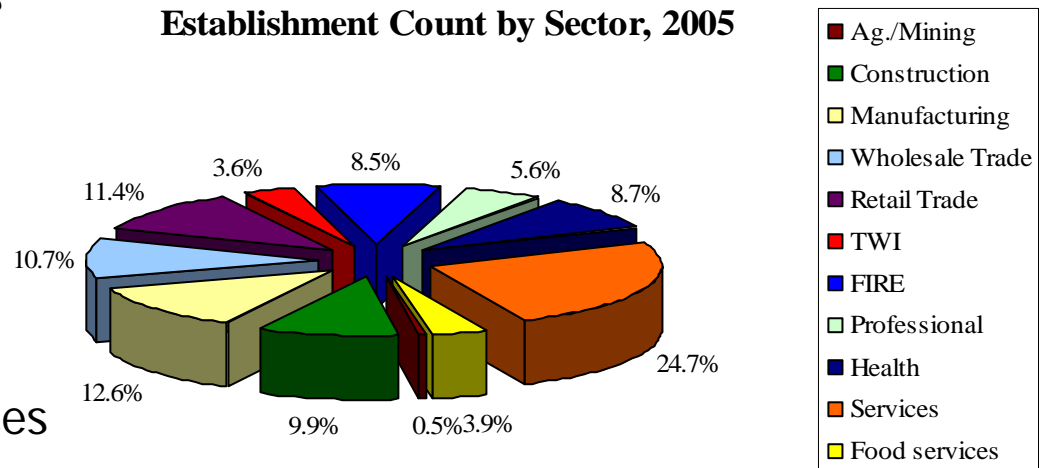
**GrandWalk Study Area
Employment Breakdown by Sector, 2005**



- **Strong economic sectors:**

- Building Materials Dealers
- Non-store Retailers
- Educational Services
- Performing Arts
- Spectator Sports
- Waste Management
- Rental and Leasing Services

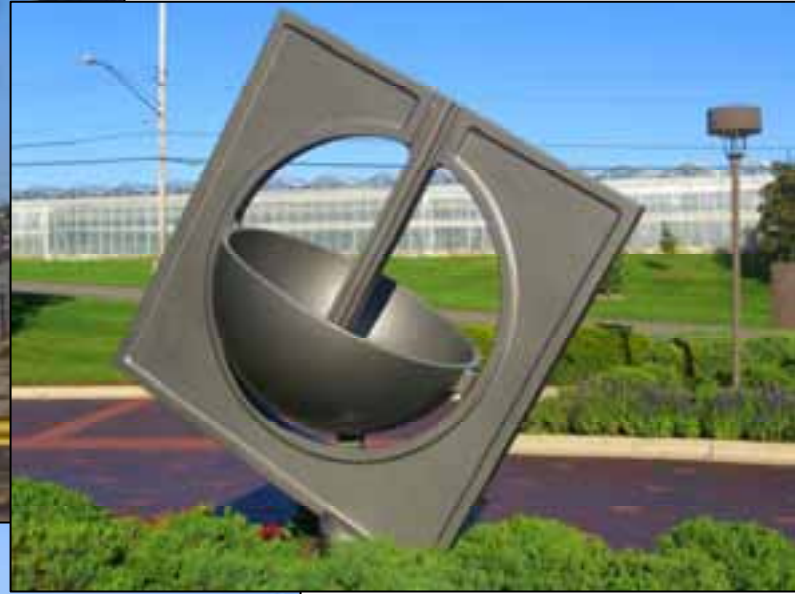
**Grandwalk Study Area
Establishment Count by Sector, 2005**



Total establishment
Count: 377



GrandWalk Business Profile



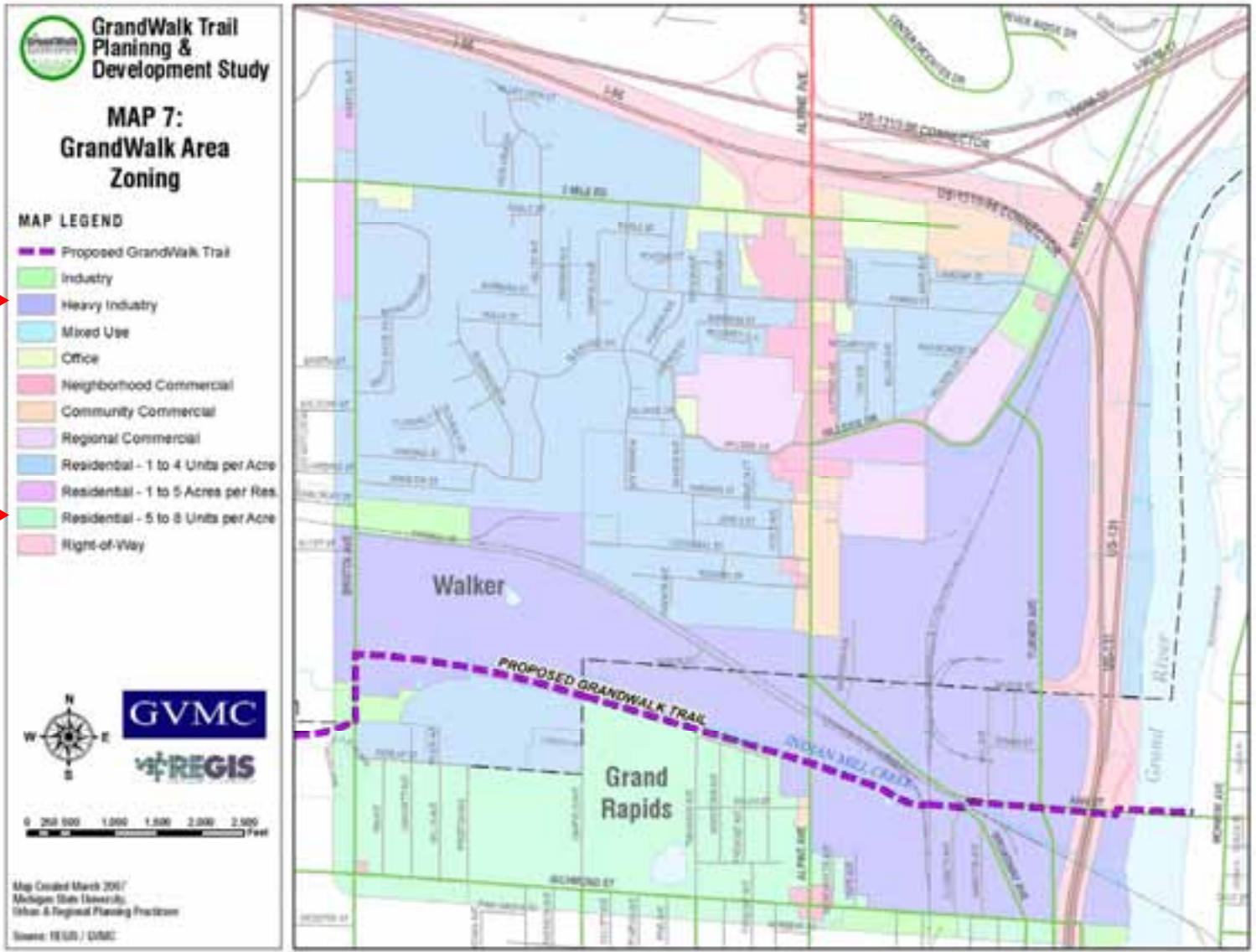
mill creek
centre
400 ann street





GrandWalk Zoning Map

Proposed GrandWalk Trail - Heavy Industrial and Residential Areas



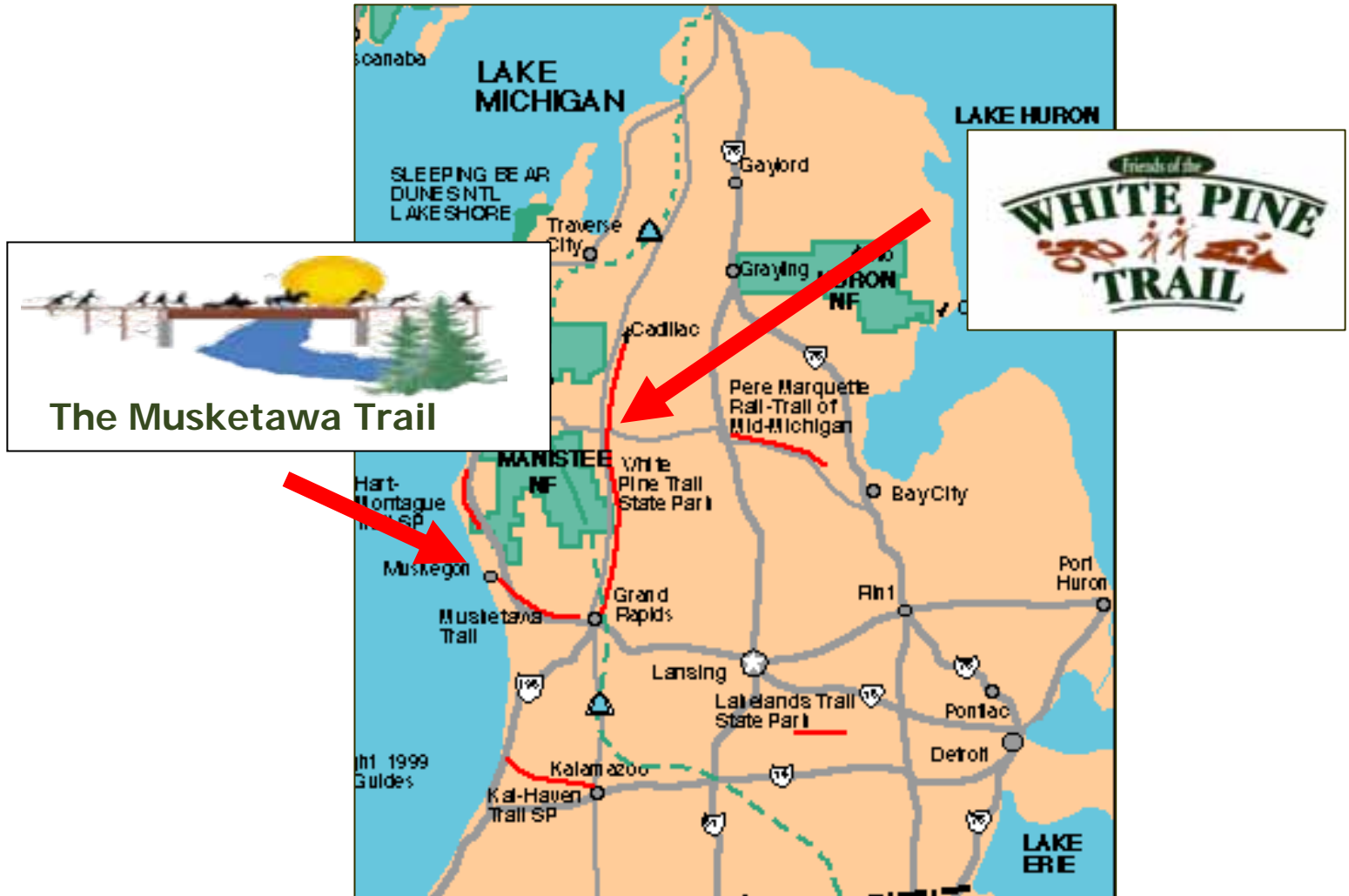
GrandWalk Business Profile Implications



- Large number of **salvage yards** adjacent to the proposed route of the trail
- Recreational and entertainment opportunities: DeltaPlex Theater, **Richmond** and **Riverside Park**
- Proximity to **downtown Grand Rapids** and Walker
- Opportunity for growth in **trail tourism** industry – connection with existing trails



Proposed GrandWalk Trail Connections




GrandWalk Parks and Schools




 GrandWalk Trail Planning & Development Study

MAP 8:
Location of Existing Recreation Areas and Schools in Relation to Trail

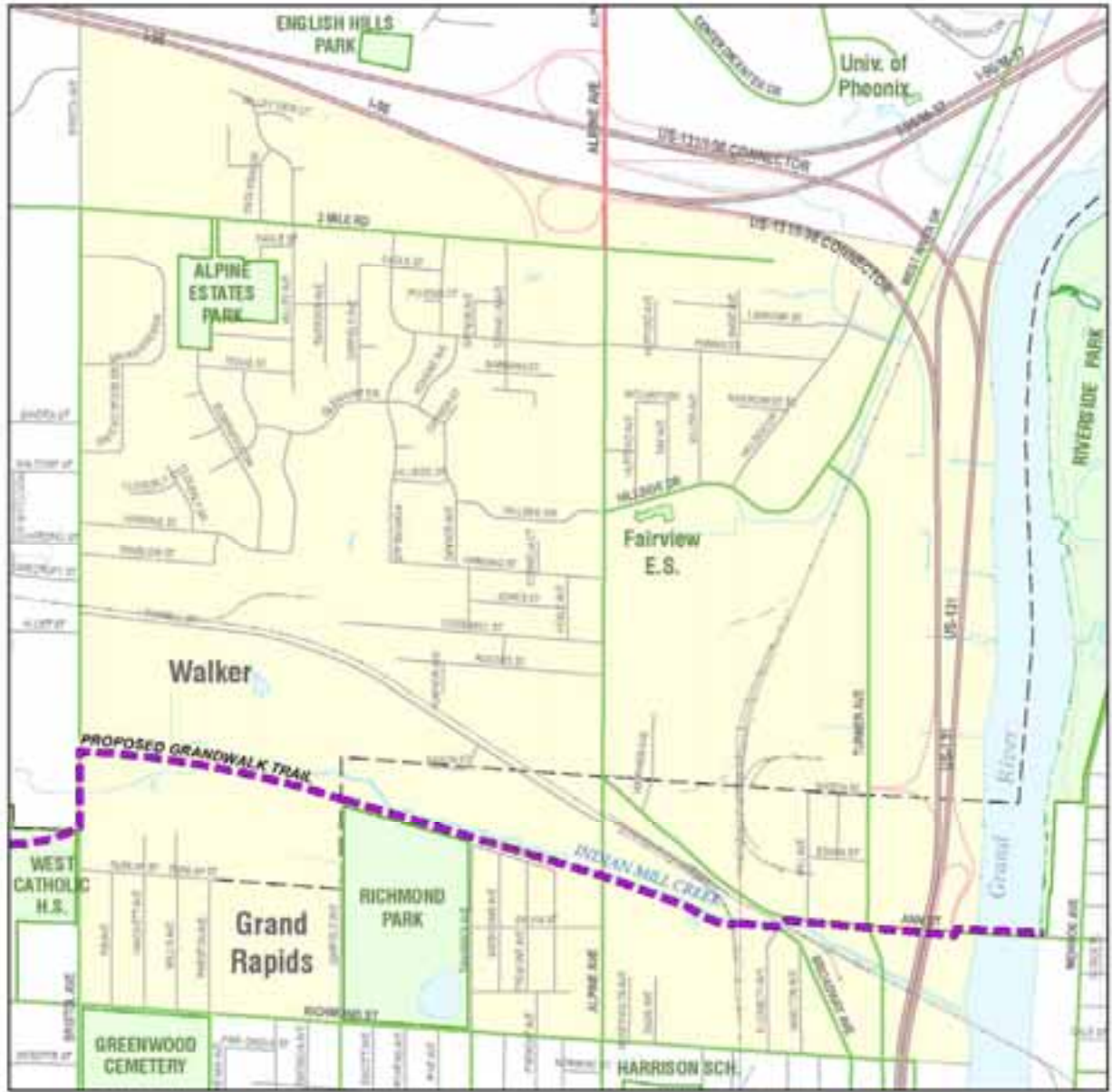
MAP LEGEND

-  Proposed GrandWalk Trail
-  GrandWalk Study Area
-  Parks, Cemeteries & Schools

0 250 500 1,000 1,500 2,000 2,500 Feet

Map Created March 2017
Michigan State University
Urban & Regional Planning Platform
Source: REGIS / GVMC



GrandWalk - Public Transportation Map



Source: City of Grand Rapids
Master Plan Bus Route Framework



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Proposed GrandWalk Trail Benefits

Recreation - access to, and link between Richmond and Riverside Parks



Health - trails associated with decreased obesity rates

Youth - education, exercise, safe school routes



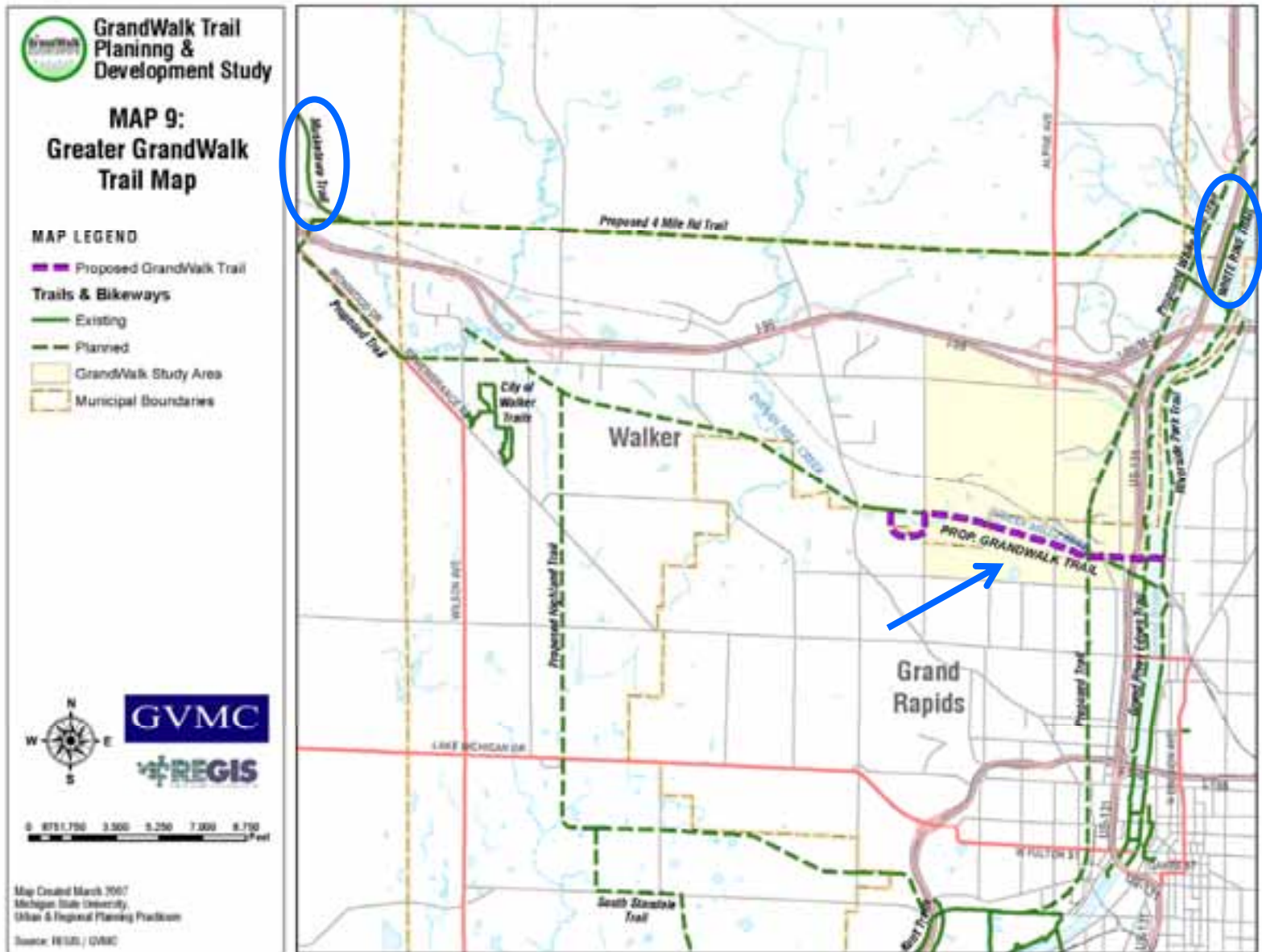
Enhancement of natural resources - Indian Mill Creek environmental awareness, salmon population

Economic - area revitalization

Transportation - non-motorized alternatives, connect two regional trail systems



Greater GrandWalk Trail Map





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Community Support – Stakeholders

Residents and Landowners alongside the proposed trail

Community Organizations

- West Grand Neighborhood Organization
- Steepletown Youth Group

Advocacy Groups

- Friends of Indian Mill Creek
- Friends of Walker Highland Trails
- Friends of White Pine Trail and Musketawa Trail

Municipalities

- Grand Rapids and Walker Planning and Engineering Depts.
- Recreation Depts., Drain Commissioner
- Kent Co. Parks & Rec. Dept., DNR, MDOT
- West MI Strategic Alliance, West MI Trails and Greenways



Community Support – City of Grand Rapids Plans

Parks Plan

- Increase recreational benefits
- Encourage connectivity
- Linkages with parks system
- Walkability - lack of policy

Master Plan

Theme of Balanced Transportation

- Reduce auto dependency/
increase non-motorized trans.
- Preserve natural areas
- Increase mobility and access

Community Support – City of Walker Plans

Parks Plan

- Explicit connections
- System of trails
- Multi-modal transportation
- Increase recreation

Master Plan

Neighborhood Section

- Neighborhood connectivity and
"livability"
- Neighborhoods - expanded
recreational opportunities

Community Support – Kent County

Kent County Parks Plan

- MSU Recreation Needs Assessment
- Working Draft to be updated summer 2007



United Growth for Kent Co.

- Connect neighborhoods
- Encourage development that utilizes existing infrastructure



Community Support – West Michigan

West MI Strategic Alliance

- 25 year-plan
- Integrate park access/green infrastructure into urban neighborhoods



Trails & Greenways Coalition

- Goal: 510 miles of trail network



Community Support – State

State Long Range Plan

- Limited MDOT control of non-motorized facilities
- 1,428 mi. of trails – 1st in Nation (2005)
- Transportation Enhancement Fund



Land Use Leadership Council

- Encourage state-wide trail system

Community Support – Federal

SAFETEA-LU - Transportation Legislation

- Increase inter-modal connectivity
- Streamline government
- \$370 million through 2009 for recreational trails



Safe Routes to School

- Encourage/Enable walking and biking to school



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Proposed Trail Planning Challenges

Property Owner Concerns

- Private Liability Concerns
- Impact on Crime
- Impact on Property Value

Construction Challenges

- Intersection with Roadways
- Intersections with Railroads
- Adjacent to Water



Proposed Trail Planning Challenges

Property Owner Concerns

- Private Liability Concerns
 - Trespassing
 - Noise
 - Litter
- Impact on Crime
- Impact on Property Value





Proposed Trail Planning Challenges

Private Liability Concerns

Types of Property Owner Concern

- Trespassing
- Duty of Care

Protections

- Recreational Use Statutes – Michigan Natural Resource and Environmental Protection Act
- Easements
- Insurance Policies

Conclusions

- No liability landowner liability adjacent to trail
- No need for landowner to purchase additional insurance



Proposed Trail Planning Challenges

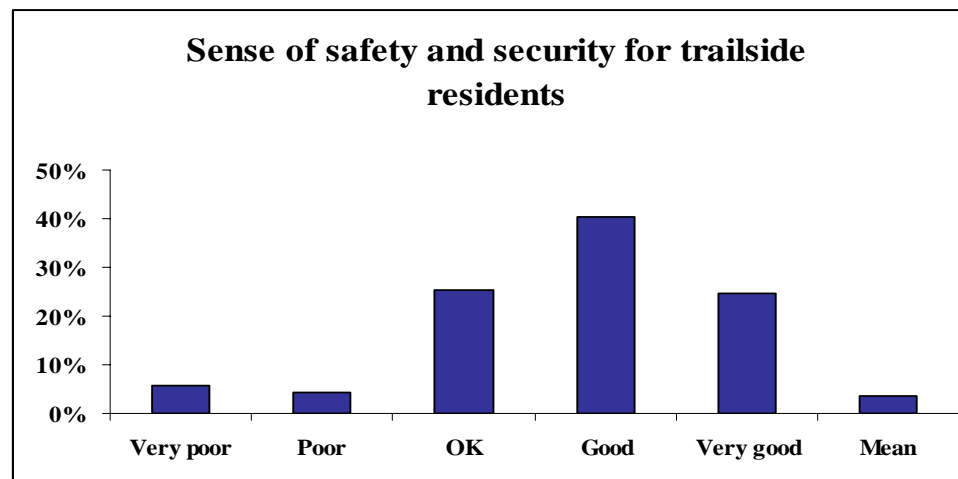
Impact on Crime

Case Studies

- Omaha Recreational Trail, NE
- Pinellas Trail, FL
- Pere Marquette Trail, MI

Conclusions

- No adverse impact on safety or security
- Crime rates not statistically different



Source: Pere Marquette Trail Case Study, Michigan State University

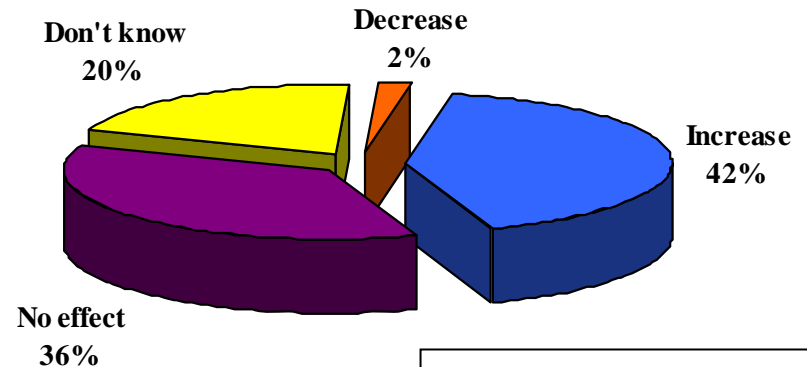
Proposed Trail Planning Challenges

Impact on Property Value

Case Studies

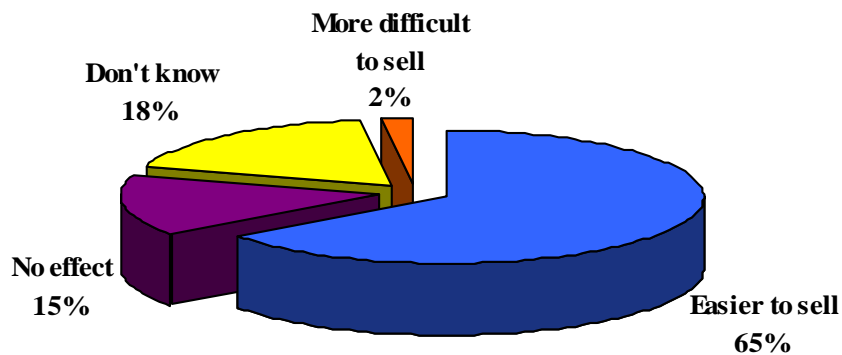
- Omaha Recreational Trail, NE
- Pinellas Trail, FL
- Pere Marquette Trail, MI
- Minuteman Bikeway and Nashua River Trail Run, MA

Impact of Trail on Selling Price



Source: Omaha Recreational Trail Case Study

Impact of Trails on Selling Home



Source: Omaha Recreational Trail Case Study

Conclusions

- Majority residents felt no impact on value
- Many felt increased value
- Houses near trail sold twice as fast as other
- Positively influence purchase decision

Proposed Trail Planning Challenges

Construction Challenges

- Intersection with Roadways
- Intersections with Railroads
- Adjacent to Water



Proposed Trail Planning Challenges



GrandWalk Trail Planning & Development Study

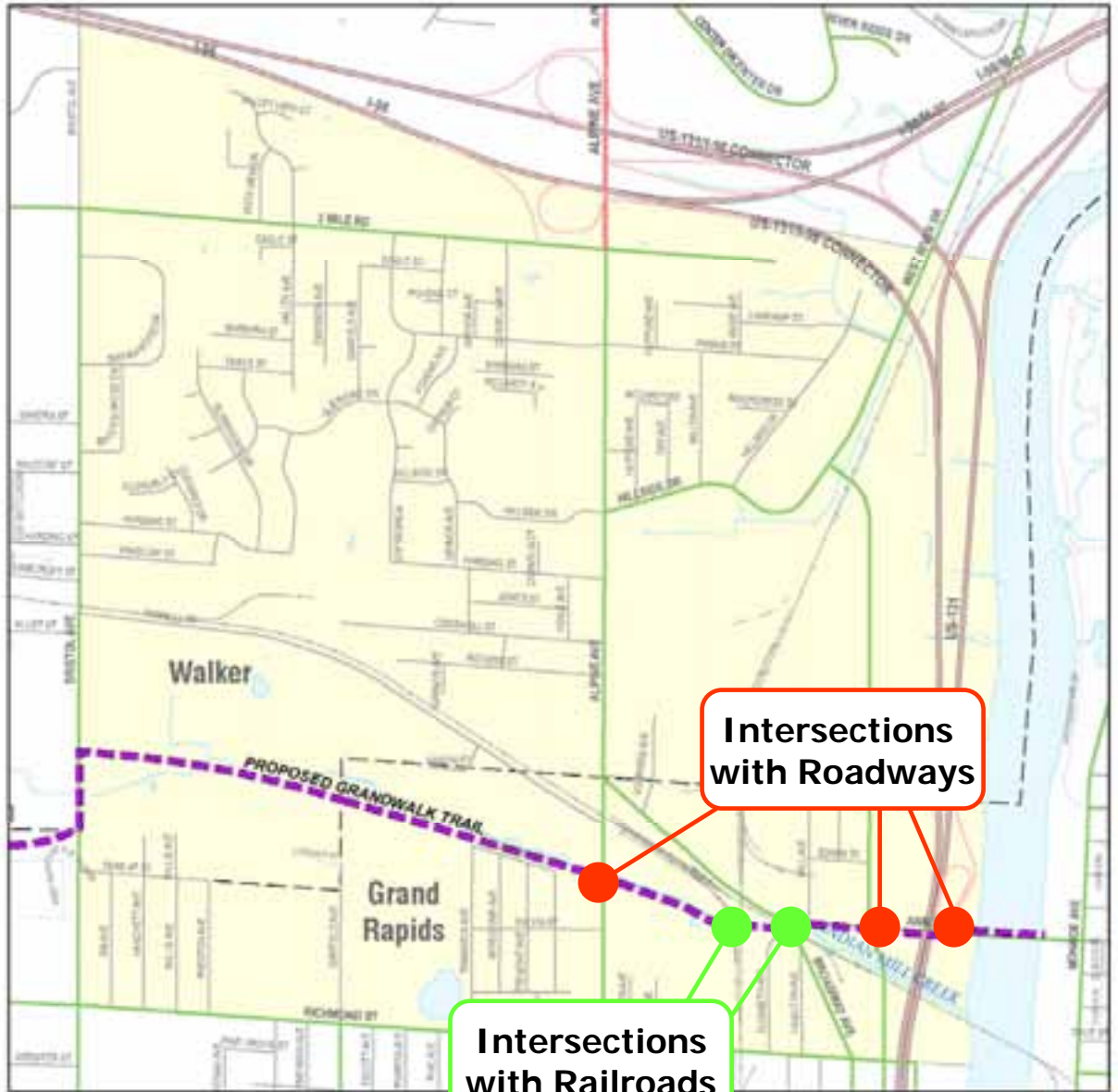
**MAP 3:
Location of Proposed GrandWalk Trail Relative to GrandWalk**

MAP LEGEND

- Proposed GrandWalk Trail
- GrandWalk Study Area

GVMC
REGIS

Map Created March 2007
Michigan State University,
Urban & Regional Planning Practices
Source: REGIS / GVMC



Intersections with Roadways

Intersections with Railroads

Proposed Trail Planning Challenges

Intersections with Roadways

- Raised crosswalk or intersection
- Signage, crossing devices
- Refuge islands
- Overpass



Proposed Trail Planning Challenges

Intersections with Railroads

Easements not granted along active rail – CSX

Crossing a Railroad:

- Overpass
- Sunken
- At-grade



Proposed Trail Planning Challenges



 GrandWalk Trail Planning & Development Study

**MAP 11:
GrandWalk Trail and
Railroad Crossing Map**

MAP LEGEND

-  Proposed GrandWalk Trail
-  Active Railroad

0 25 50 100 150 200 250

Map Created March 2007
Michigan State University
Urban & Regional Planning Program

Source: REGIS / GVMC



Proposed Trail Planning Challenges

Adjacent to Water

- Indian Mill Creek within study area, not a classified drain





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Proposed GrandWalk Trail Location




Elements Considered for Locating the Trail

1. Safety
2. Cost
3. Existing Infrastructure
4. Connections with Other Trails
5. Trail Accommodations
6. Connections with Community





Proposed GrandWalk Trail Location



 **GrandWalk Trail Planning & Development Study**




**MAP 3:
Location of Proposed
GrandWalk Trail Relative
to GrandWalk**

MAP LEGEND

-  Proposed GrandWalk Trail
-  GrandWalk Study Area

Walker

Grand Rapids

0 250 500 1,000 1,500 2,000 2,500
Feet

Map Created March 2007
Michigan State University
Urban & Regional Planning Program
Source: REGIS / GVMC

Trail Length:
1.9 Miles



Proposed GrandWalk Trail Location Phase 1



 GrandWalk Trail Planning & Development Study

MAP 3:
Location of Proposed GrandWalk Trail Relative to GrandWalk

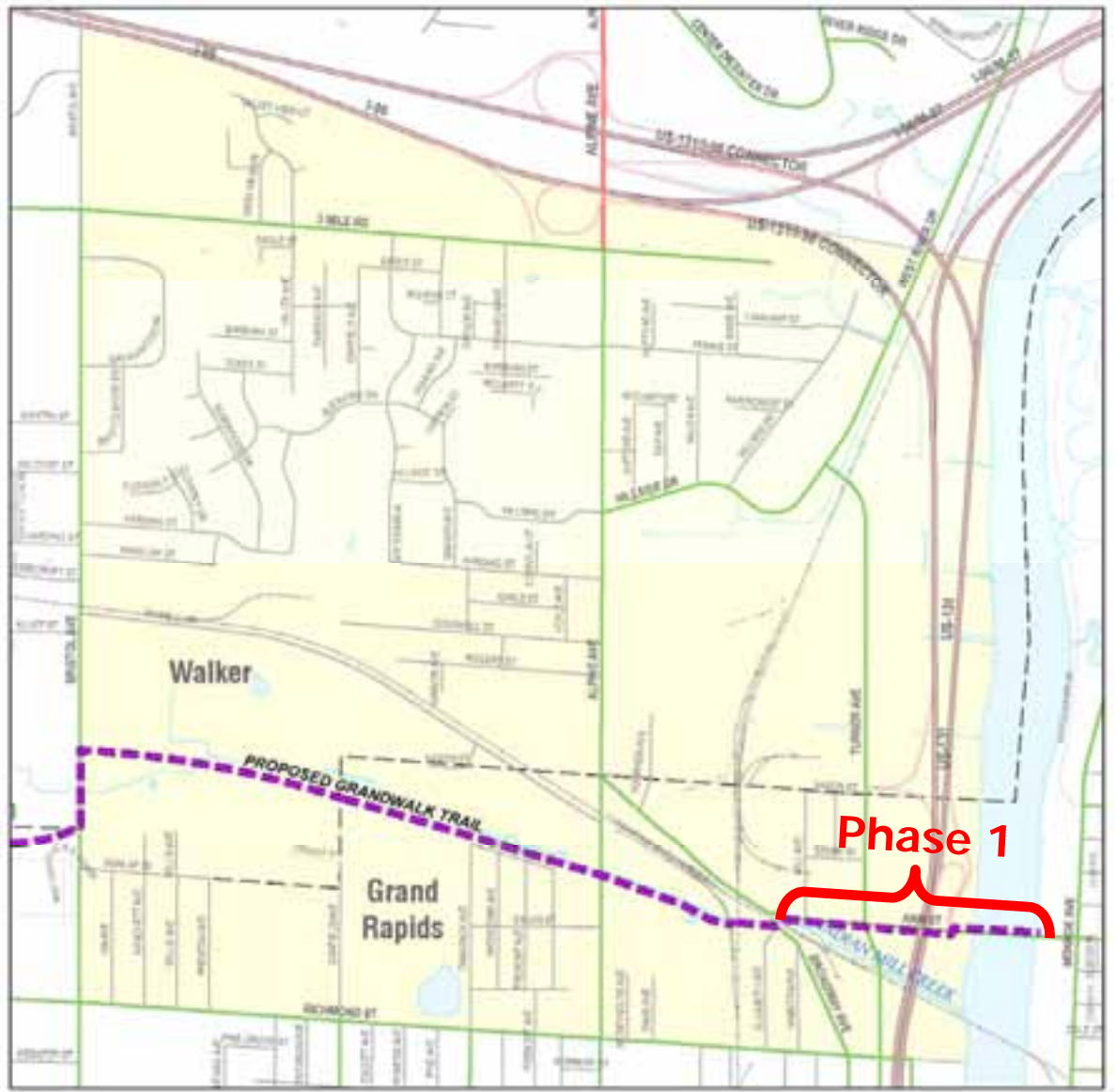
MAP LEGEND

-  Proposed GrandWalk Trail
-  GrandWalk Study Area

0 250 500 1,000 1,500 2,000 2,500
Miles

Map Created March 2007
Michigan State University
Urban & Regional Planning Program
Source: REGIS / GVMC



Proposed GrandWalk Trail Location Phase 1



Proposed GrandWalk Trail Location

Phase 1

- Start: Southernmost point of Riverside Park - access point
- Cross to South side Ann at 131 exit - access with parking
- Intersection with Turner
- West along Ann St.- lane reduction



Proposed GrandWalk Trail Location Phase 1

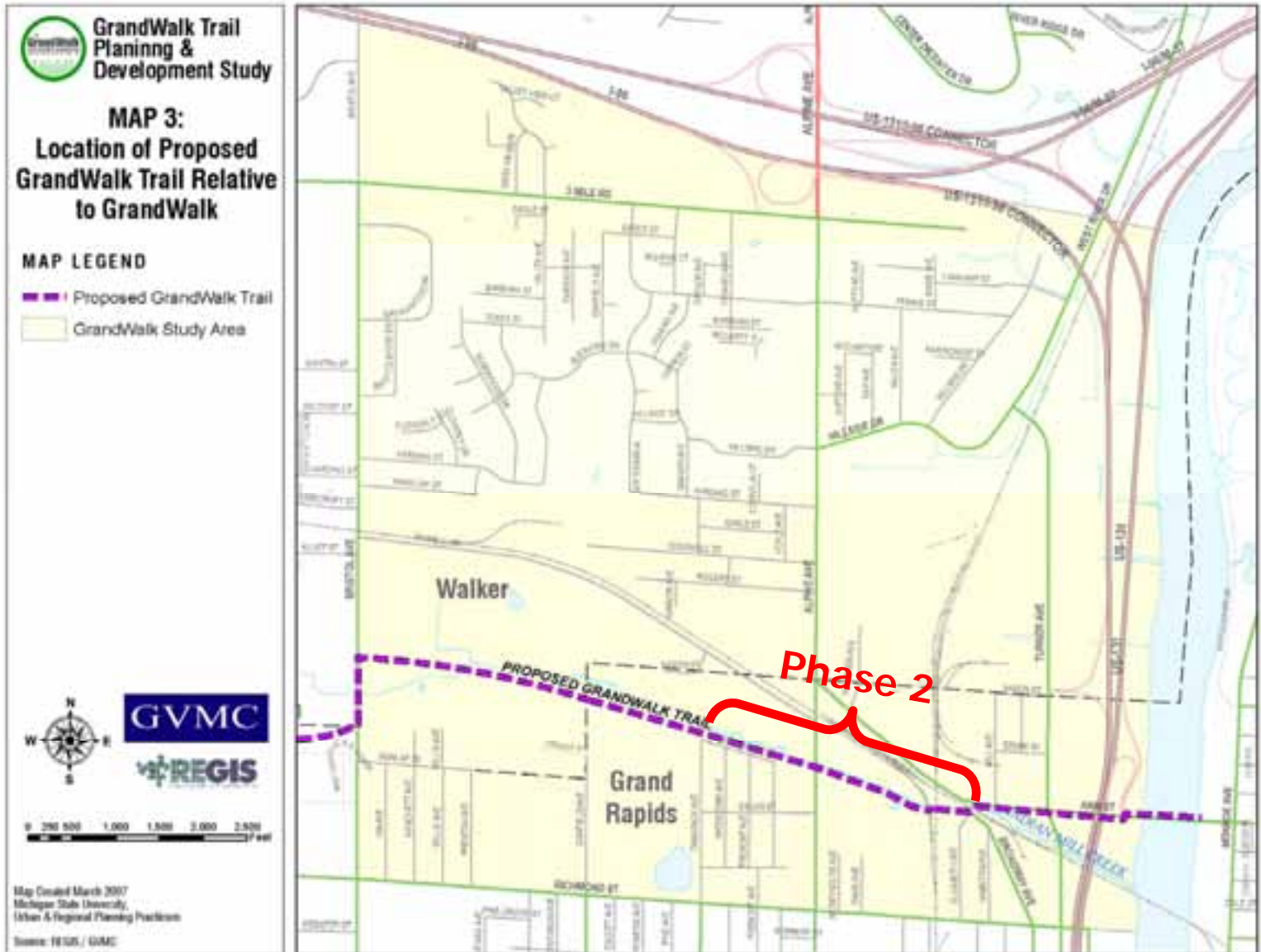


Phase 1 cont.

- Cross over railroad/pedestrian bridge to south side Indian Mill Creek - access with parking
- Overpass three active railroad tracks



Proposed GrandWalk Trail Location Phase 2



Proposed GrandWalk Trail Location Phase 2



 GrandWalk Trail Planning & Development Study

**MAP 16:
GrandWalk Trail
Parcel Detail Information
Phase 2**

MAP LEGEND

-  Proposed GrandWalk Trail
-  Parcels
- Parcel Acquisitions**
 -  Easement
 -  Previously Acquired
 -  Purchase



Map Created March 2007
Michigan State University,
Urban & Regional Planning Program
Source: REGIS / GVMC



Proposed GrandWalk Trail Location Phase 2



Phase 2

- Continue west on south banks of Indian Mill Creek
- Overpass intersection of Alpine - access point



- Continue along south side of Indian Mill Creek
- Reach Richmond Park – access with recreation

Proposed GrandWalk Trail Overpasses



GrandWalk Trail Planning & Development Study

Map 12: GrandWalk Trail Points of Interest

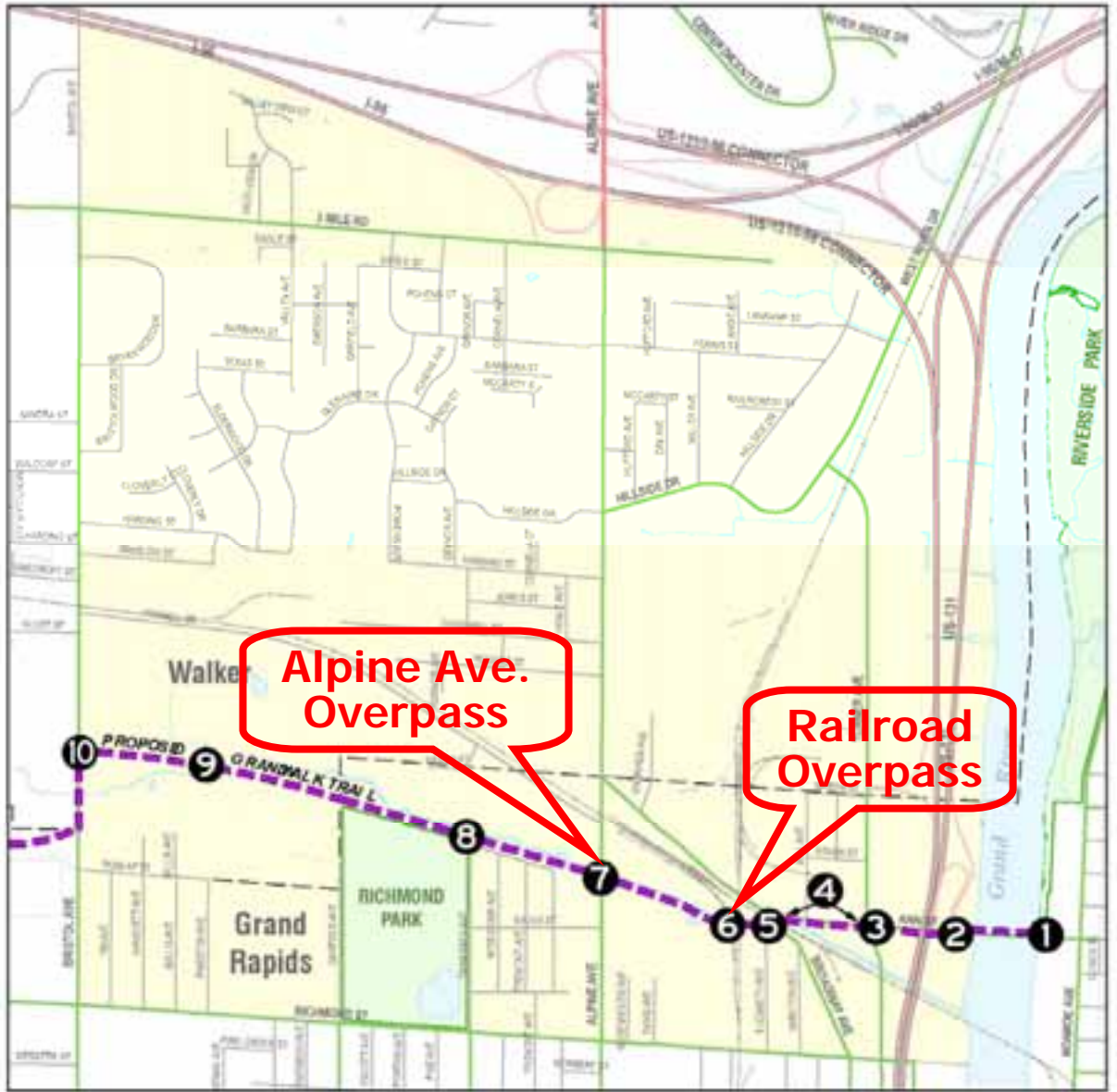
MAP LEGEND

- Proposed GrandWalk Trail
- GrandWalk Study Area

- 1** Connection with Riverside Park Trail
- 2** Ann St/US-131 Interchange
- 3** Turner Ave & Ann St Intersection
- 4** Ann Street lane reduction
- 5** Pedestrian bridge
- 6** 3 railroad crossings - raised walkway
- 7** Alpine Ave Intersection
- 8** Richmond Park Rest Area
- 9** Railroad trestle and scenic overlook
- 10** Bristol Ave intersection

0 250 500 1,000 1,500 2,000 2,500 Feet

Map Created March 2007
Michigan State University,
Urban & Regional Planning Program
Source: REGIS / GVMC



Proposed GrandWalk Trail Location Phase 3



 GrandWalk Trail Planning & Development Study

MAP 3:
Location of Proposed GrandWalk Trail Relative to GrandWalk

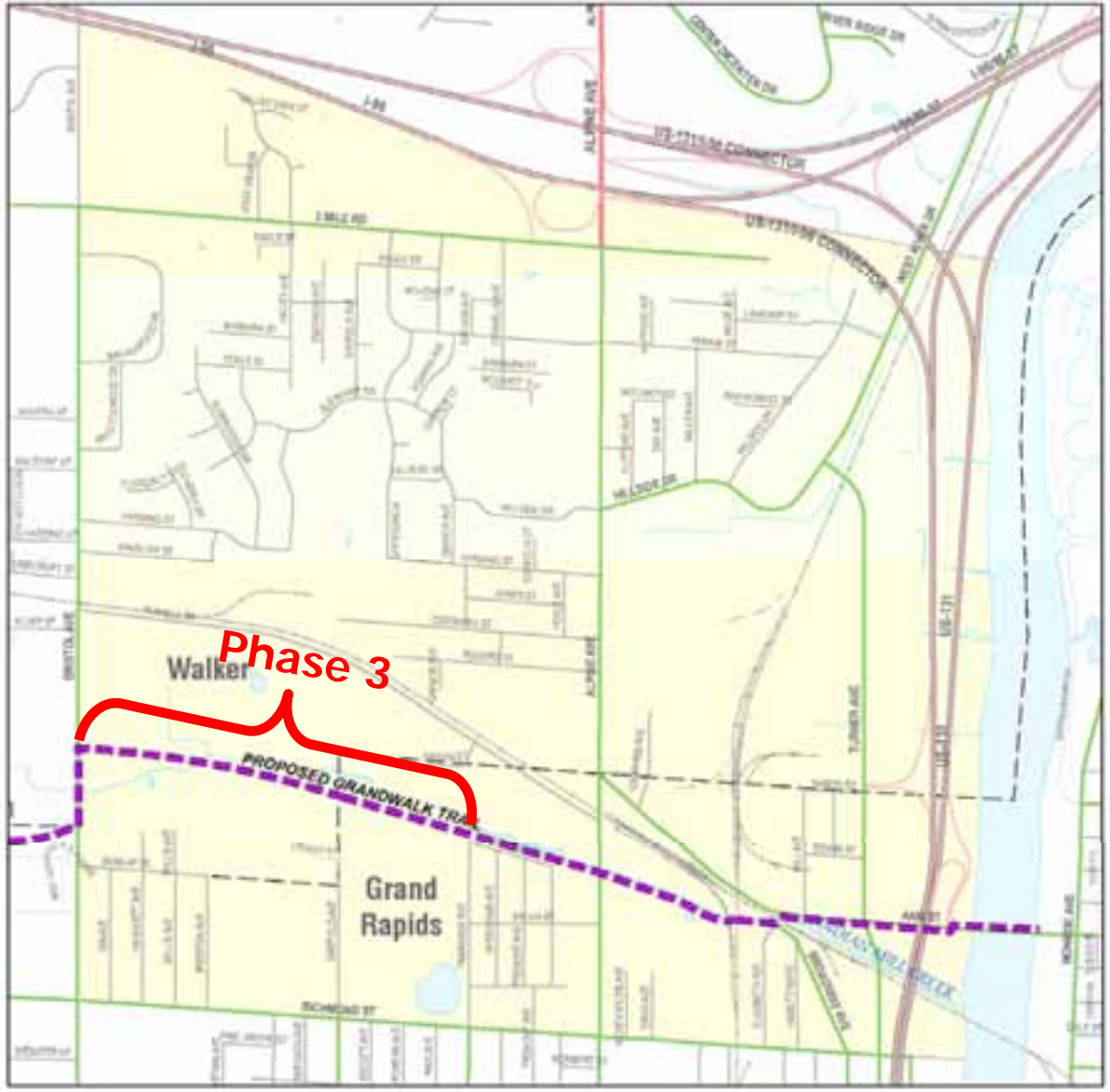
MAP LEGEND

-  Proposed GrandWalk Trail
-  GrandWalk Study Area

0 250 500 1,000 1,500 2,000 2,500 Feet

Map Created March 2007
Michigan State University,
Urban & Regional Planning Program
Source: REGIS / GVMC



Proposed GrandWalk Trail Location Phase 3



GrandWalk Trail
Planning &
Development Study

MAP 18: GrandWalk Trail Parcel Detail Information Phase 3

MAP LEGEND

- Proposed GrandWalk Trail
- Parcels
- Parcel Acquisitions
 - Easement
 - Previously Acquired
 - Purchase



0 100 200 400 600 800 1,000 Feet

Map Created March 2007
Michigan State University,
Urban & Regional Planning Practice

Source: REGIS / GVMC



Proposed GrandWalk Trail Location Phase 3



Phase 3

- Continue west on south side of Creek
- Cross over railroad trestle to north side of Creek
- Continue along abandoned rail corridor to Bristol



Proposed GrandWalk Trail Access Map

- Access Points
- Access and Parking
- Rest Areas



Proposed GrandWalk Trail Access Map



GrandWalk Trail Planning & Development Study

MAP 19:
Location of Proposed Access Points, Parking Areas and Rest Areas

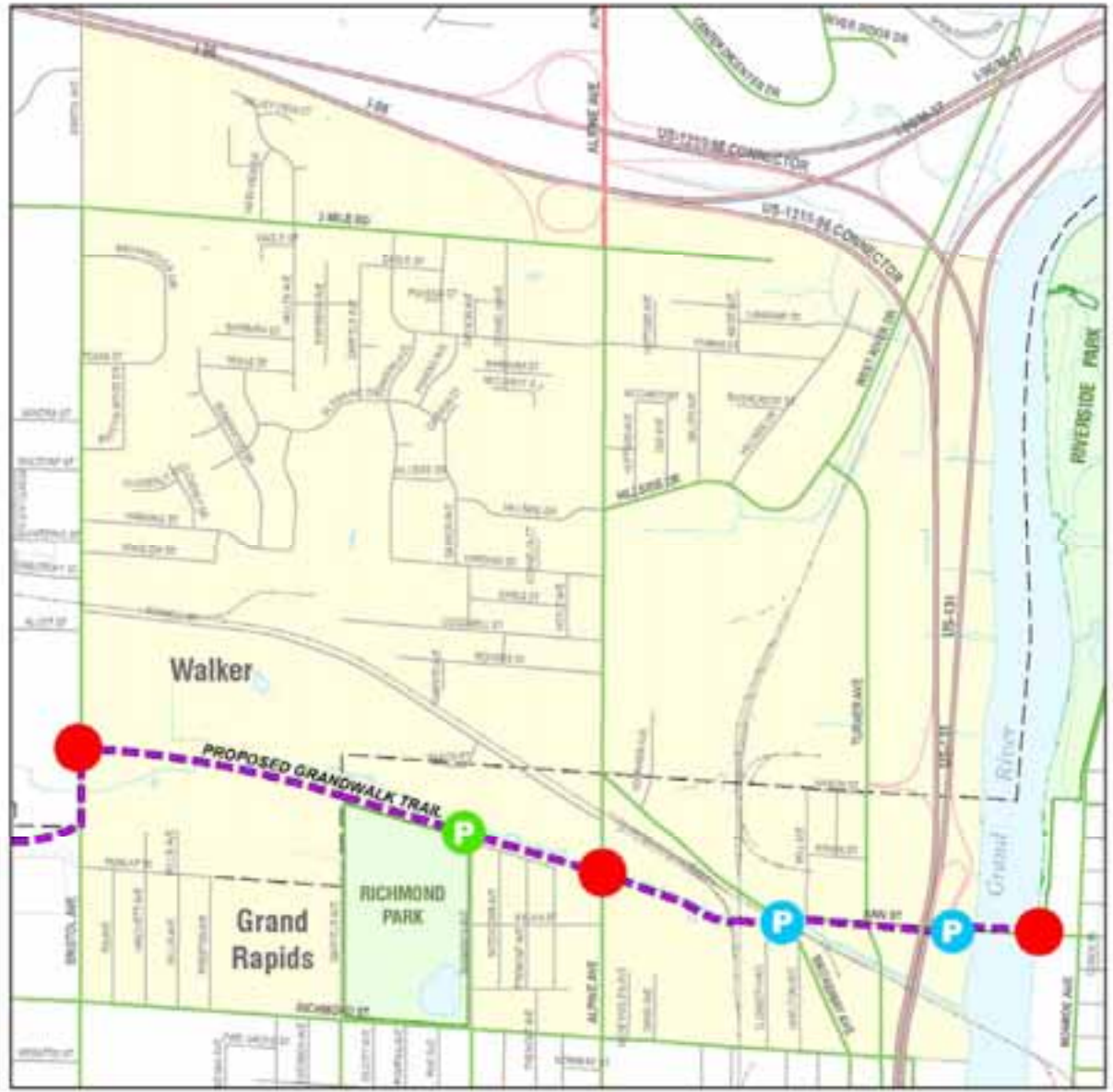
MAP LEGEND

- Proposed GrandWalk Trail
- GrandWalk Study Area
- Access Point
- Access Point with Parking
- Rest Area with Parking

GVMC

0 500 1,000 1,500 2,000 2,500 Feet

Map Created March 2007
 Michigan State University,
 Urban & Regional Planning Program
 Source: REGIS / GVMC



Proposed GrandWalk Trail Amenities

- Informative Signs
- Mill Stones (Replica)
- Overlook Deck at Trestle
- Canoe Livery
- Benches
- Bike Racks
- Drinking Fountains
- Decorative Lighting
- Disposal Wastebaskets
- Emergency Boxes





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GrandWalk Trail Parcel Acquisition

Easement – Three

- GR Eastern RR Inc.
- Consumers Energy
- Chesapeake and Ohio RR
- 5.35 *acres total*

Purchase – Six

- Penndel Co. (4)
- Conrail RR
- CL Frost Inc.
- 10.49 *acres total*

Previously Owned – One

- City of Grand Rapids
- 3.35 *acres total*

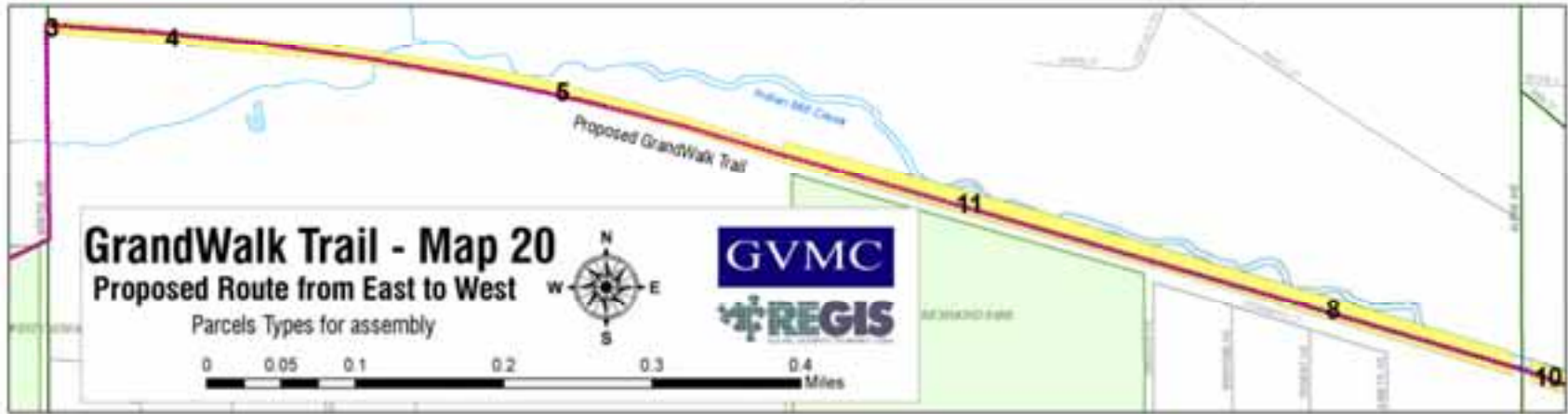


GrandWalk Trail Parcel Acquisition



Number	Owner Name	Type
1	GR EASTERN RAILROAD INC	Easement
2	CITY OF GRAND WALK	Previously Owned
3	PERNELL COMPANY	Purchase
4	CONSUMERS ENERGY	Easement
5	PERNELL COMPANY	Purchase
6	CONRAE SR	Purchase
7	CL PROST INC	Purchase
8	CL PROST INC	Purchase
9	PERNELL COMPANY	Purchase
10	PERNELL COMPANY	Purchase
11	PERNELL COMPANY	Purchase
12	CHESTERFORD & OHIO RR	Easement

Trail Parcel Assembly Type	Trails and Structures
Purchase	Existing Trail Right-of-Way
Easement	Existing Trail Roadbed
Previously Owned	Existing Trail Concrete
	Existing Trail Gravel
	Proposed Trail Unknown Surface
	Proposed Trail Asphalt
	Proposed Trail Roadbed
	Proposed Trail Tiled Surface

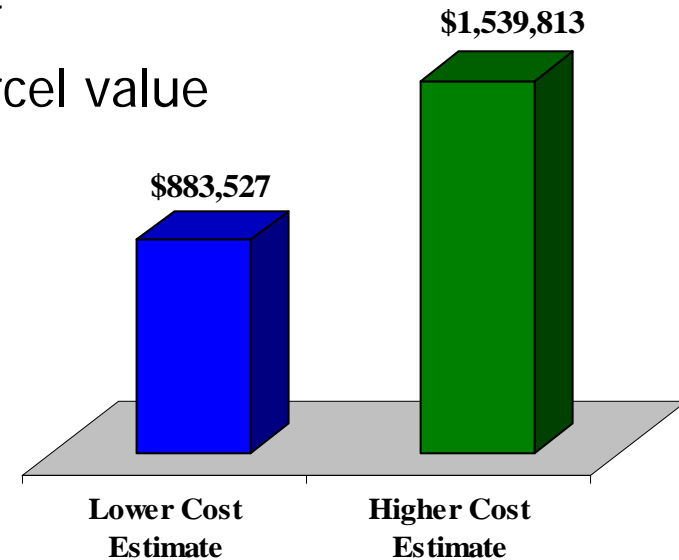




GrandWalk Trail Parcel Acquisition

Lower Cost Estimate

- Industrial - \$1.50 per square foot
- Easement cost - 20% of total parcel value
- Estimated total: **\$883,527**



Higher Cost Estimate

- Industrial - \$2.50 per square foot
- Easement cost - 25% of total parcel value
- Estimated total: **\$1,539,813**





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GrandWalk Trail Next Steps

1. **Feasibility Study** – information on property, environmental considerations, aesthetics, costs of alternative routes
2. **Parcel Acquisition** – funding sources include private donations, municipal funds, Michigan Natural Resources Trust Fund
3. **Engineering** – exact location, surveying, permits, grading and earth movements, environmental impacts, title issues, material and construction costs
4. **Construction**
5. **Maintenance** – Cities of Grand Rapids and Walker, “Friends of Trail” groups



GrandWalk Trail Immediate Next Steps

- **Pursue Feasibility Study**
 - Apply for a Transportation Enhancement Grant from MDOT
- **Continue to Garner Community/Stakeholder Support**





Thank you for your attention!

Questions?