

## METRICS

# Will Dorsett Road be a Great Street?

Metrics are a discovery-oriented tool to shape a collective point of view about a project’s aspirations. They help to develop more thorough design solutions by setting goals, integrating strategies from the four DW Legacy Design® circles (Economics, Environment, Community, and Art) and measuring outcomes. Metrics help clients understand how DW Legacy Design® will positively impact their project.

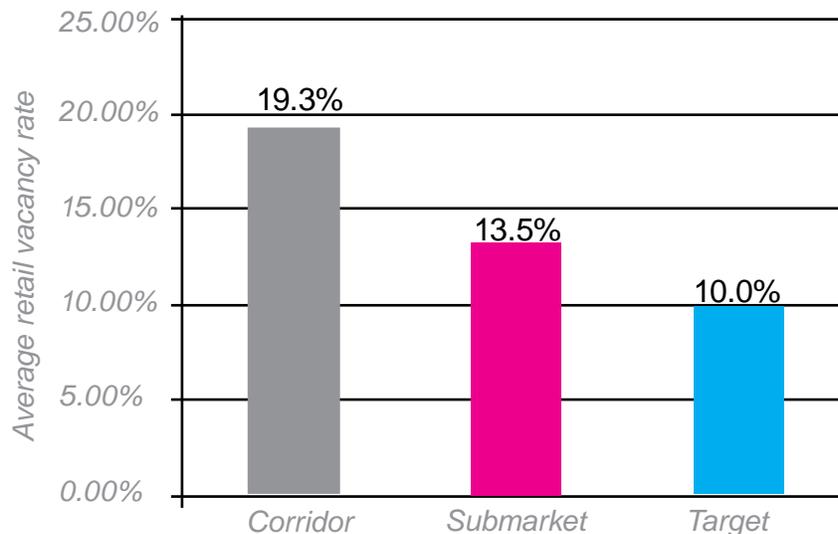
At the outset of the design process the project team set out to answer the question “Will Dorsett Road be a Great Street?” The key characteristics of a Great Street guided project development and helped to ensure that this final product optimizes benefits for the environment, economics, art, and community of Maryland Heights.

## ECONOMICS

Great Streets contribute to the economic vitality of the City.

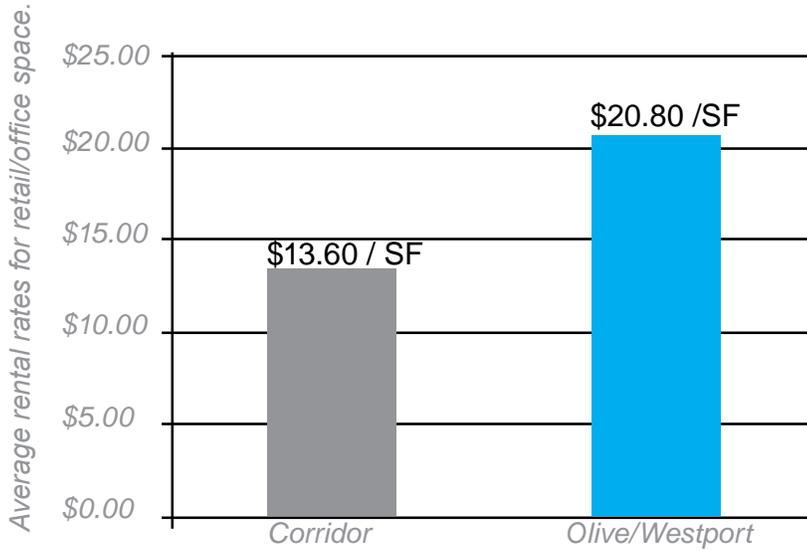
### *Reduce retail vacancy.*

To create an active and vibrant street, it is essential that the city look towards current vacancies in the corridor as opportunities to attract investment. In particular, community members voiced complaints about the number of retail vacancies along Dorsett Road. In similar suburban environments, the target vacancy rate for retail should waver between eight and ten percent. Maryland Heights should look to this number as goal for retail vacancy in the corridor.



### *Increase office/retail rental rates.*

Rental rates can reflect both property value and neighborhood popularity within the market. Looking at office and retail spaces within the corridor helps to determine how these types of properties are valued and to what degree they are desirable to potential businesses and investors. The recommendations outlined in the Dorsett Road Great Streets Plan will help to create an environment that will attract businesses and investors and thereby increase property owner returns.



## ENVIRONMENT

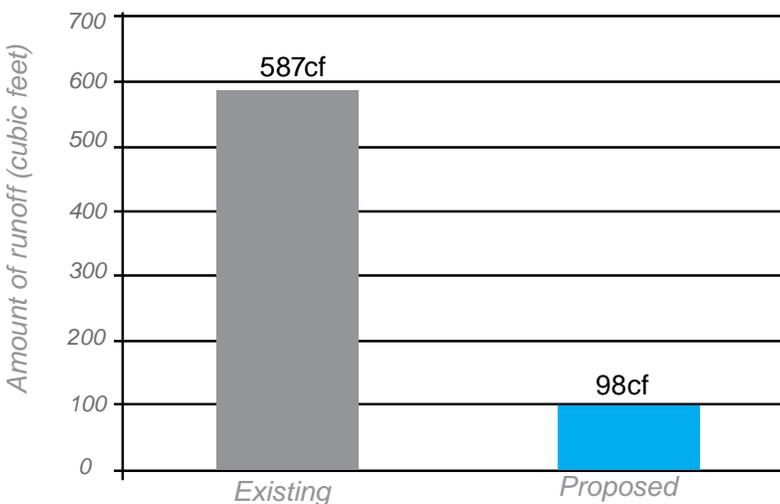
Great Streets are green.

*Reduce stormwater runoff and increase pervious surfaces.*

Impervious surfaces (such as concrete and asphalt currently used for corridor sidewalks and parking lots) can have a major impact on stormwater management, regional water quality and urban heat island effects. To create opportunities to better manage stormwater and reduce the negative effects of urban heat islands, this plan recommends a number of strategies including:

- Conversion of surface parking lots to pervious surfaces.
- Construct recommended multi-use path using permeable concrete.
- Construct raingardens in recommended locations along Dorsett Road.

*The average rainfall in Maryland Heights is 30.07 inches. During a 90 percent storm event, a surface parking lot constructed of permeable asphalt would reduce the amount of stormwater runoff by 83 percent. A 90 percent storm event represents a rain event that can be expected to occur with a 90 percent probability within a given year.*

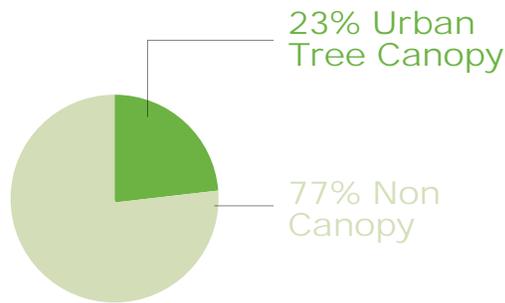


*Increase the number of street trees along Dorsett Road.*

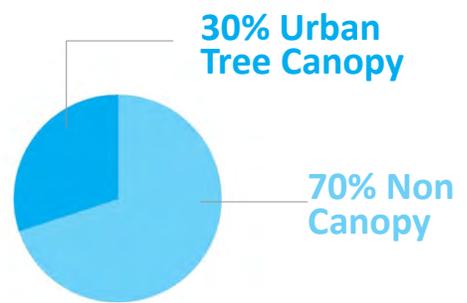
The value that street trees can bring to environments like the Dorsett Road corridor cannot be stressed enough. In addition to the benefits listed on page 82, tree planting can also provide the following environmental benefits:

- Reduce stormwater runoff
- Increase groundwater recharge
- Reduce energy use
- Improve air quality and reduce atmospheric CO<sub>2</sub>
- Reduce urban heat island and heat-related illness and fatalities
- Improve native habitat
- Provide environmental education opportunities

*Existing Conditions*



*Proposed Conditions*

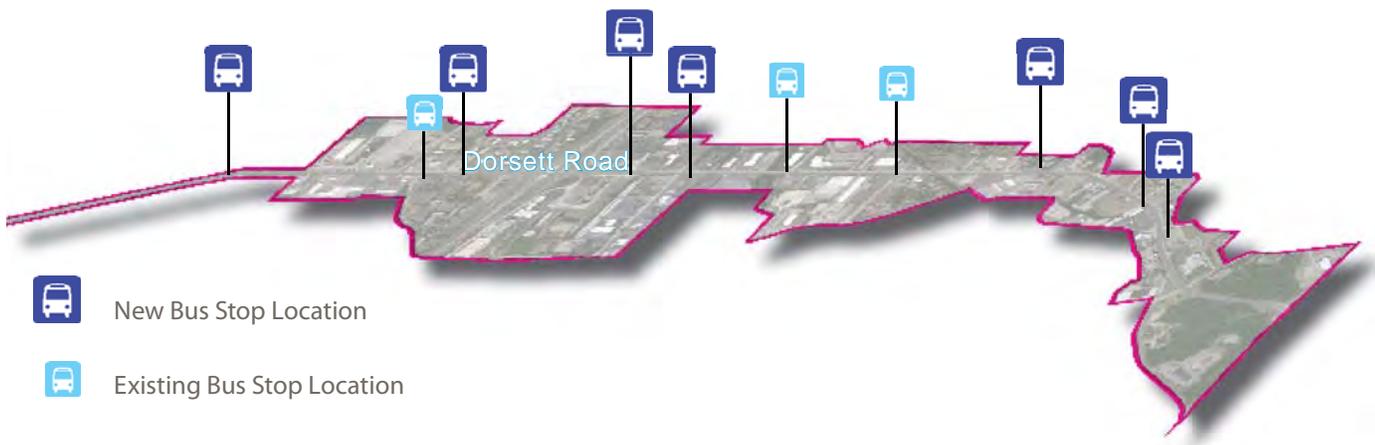


## COMMUNITY

Great Streets provide mobility.

*Consolidate bus stops.*

To facilitate more efficient travel and create safer conditions for transit riders and drivers, the project team has outlined a number of locations where bus stops can be consolidated and in some cases, moved.



Great Streets allow people to walk comfortably and safely.

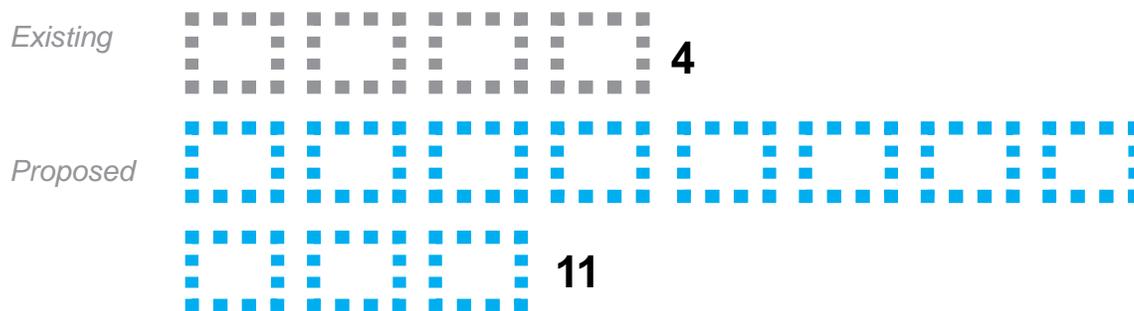
*Increase sidewalk width.*

Improving conditions for pedestrians in the Dorsett Road corridor is a key factor to the success of this project. In order to accomplish this, one significant recommendation is to create a 12 foot wide multi-use path along the length of the road from Marine Avenue to Lindbergh Boulevard. Increasing sidewalk widths give pedestrians more space to maneuver the road, stop and pause, or take a moment to chat with a fellow pedestrian. Additionally, increased sidewalk widths help improve safety conditions by creating more distance between travelling cars and people walking on the sidewalk.



*Increase number of crosswalks.*

Through site visits and public input, the project team quickly discovered that the lack of crosswalks along Dorsett Road has left many pedestrians feeling and being unsafe. For example, between McKelvey Road and I-270, there are currently no crosswalks for pedestrians to safely cross Dorsett Road, despite the heavy traffic coming from I-270, the significant number of residential apartments in the area, a major bus stop, and the nearby presence of major employers. To address this problem, this document recommends increasing the number of crosswalks along Dorsett Road. These crosswalks are identified in the illustrative master plan (refer to pages 87 through 115).



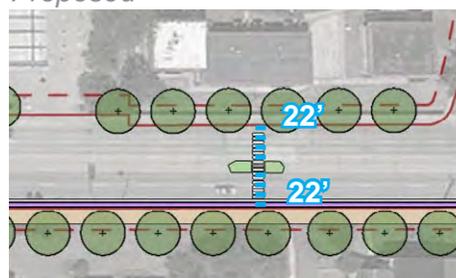
*Decrease crosswalk distance.*

Shorter crosswalk distances correspond with an increase in pedestrian safety by minimizing conflicts between pedestrians and cars at intersections throughout the corridor. With the addition of new pedestrian refuge islands, walking distances would decrease from 60 feet to approximately 22 feet. The walking distance of 22 feet represents the distance from one side of the street to the median refuge in the middle.

*Existing Conditions at McKelvey Hill Drive*



*Proposed*

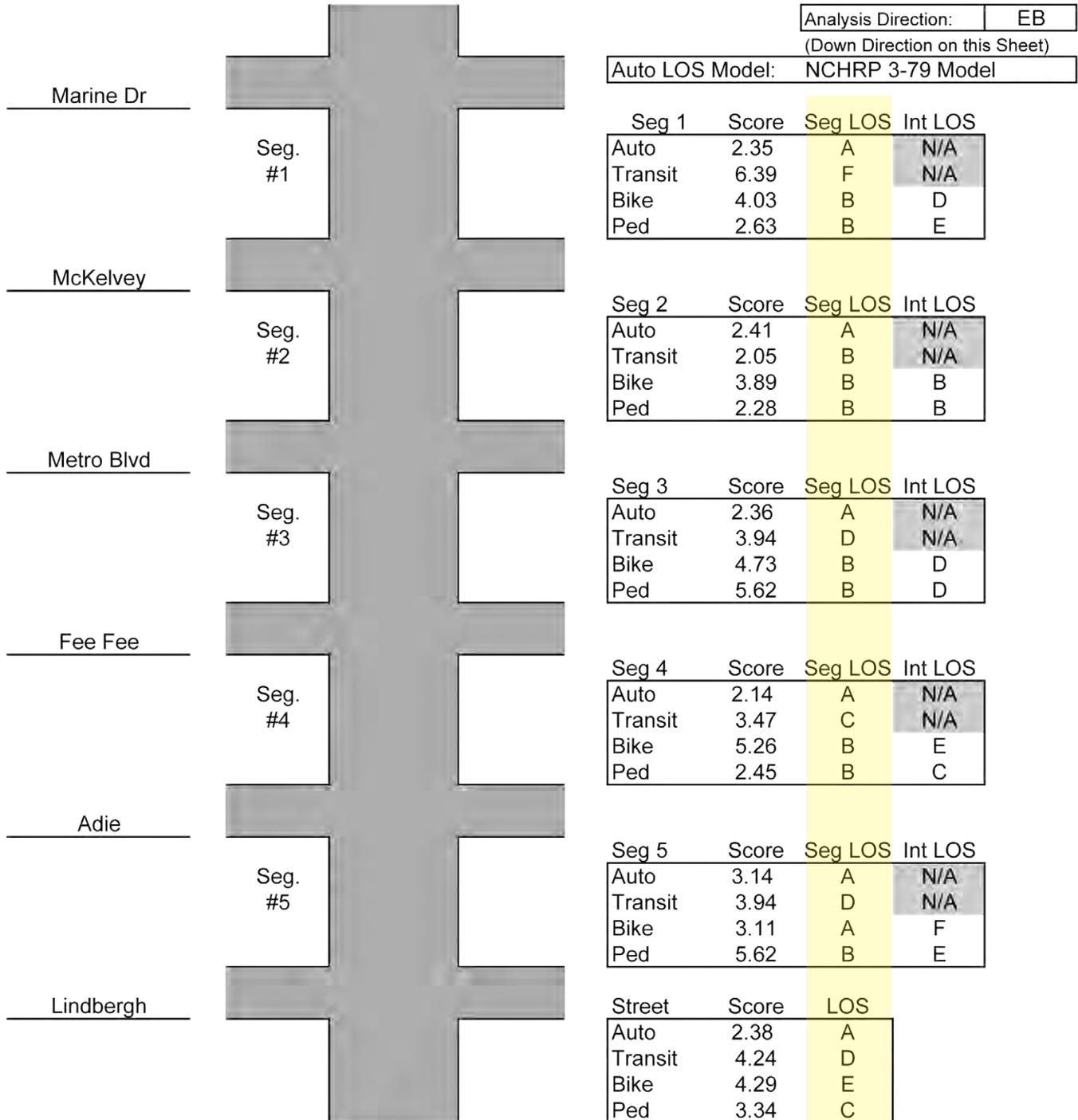


Great Streets are functionally complete.

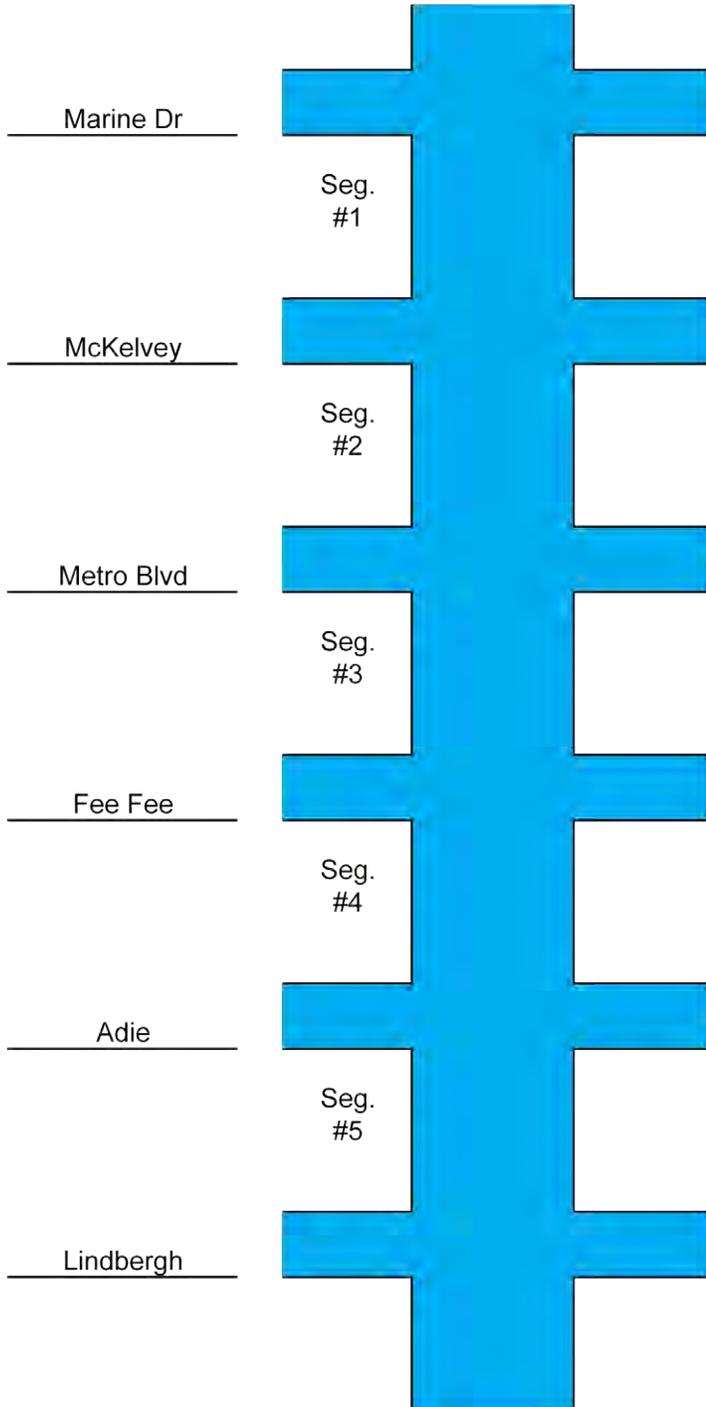
*Improve MMLOS score for all segments of the corridor.*

A driving force behind this project has been the study of auto, transit, bicycle and pedestrian levels of service in order to recommend improvements that would create the optimal condition for all modes of transit on Dorsett Road. By following the recommendations outlined in the Dorsett Road Great Streets Plan, MMLOS conditions are predicted to improve across the board.

### LOS Under Existing Conditions



# LOS Under Proposed Conditions



Analysis Direction: EB  
(Down Direction on this Sheet)

Auto LOS Model: NCHRP 3-79 Model

Seg 1	Score	Seg LOS	Int LOS
Auto	2.35	A	N/A
Transit	2.82	C	N/A
Bike	2.91	A	B
Ped	3.08	A	D

Seg 2	Score	Seg LOS	Int LOS
Auto	2.41	A	N/A
Transit	0.50	A	N/A
Bike	3.72	A	A
Ped	2.83	B	B

Seg 3	Score	Seg LOS	Int LOS
Auto	2.36	A	N/A
Transit	0.99	A	N/A
Bike	1.90	A	A
Ped	2.92	A	D

Seg 4	Score	Seg LOS	Int LOS
Auto	2.14	A	N/A
Transit	0.97	A	N/A
Bike	4.35	A	A
Ped	2.79	A	B

Seg 5	Score	Seg LOS	Int LOS
Auto	3.14	A	N/A
Transit	2.91	C	N/A
Bike	3.13	A	B
Ped	3.03	A	D

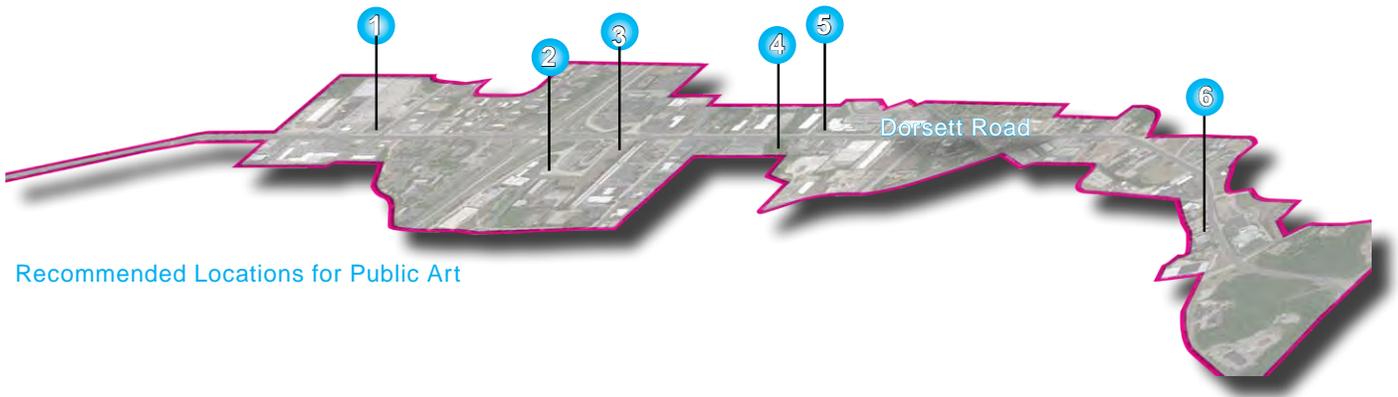
Street	Score	LOS
Auto	2.38	A
Transit	1.64	A
Bike	3.18	C
Ped	2.94	C

## ART

Great Streets are representative of their places.

*Increase the presence of public art.*

A recent study conducted by the Knight Foundation found that there is a higher correlation between community attachment and aesthetics (public art, parks, landscape) than community attachment and economics or housing. Creating opportunities to house these aesthetic elements in the Dorsett Road corridor and making these elements a priority over the next 20 years will help Maryland Heights create a true identity for the corridor that is reflective of the community. The Dorsett Road corridor does not currently include any pieces of public art.



Recommended Locations for Public Art

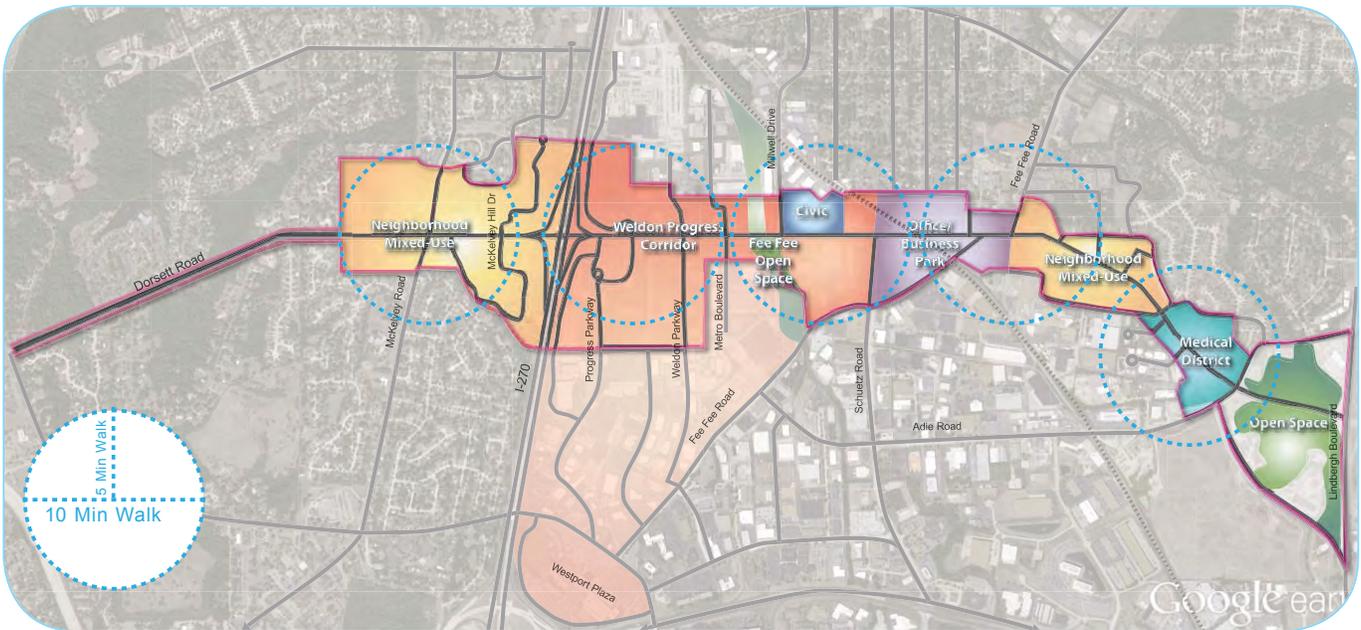
*Recommended Public Art Locations:*

1. Dorsett/McKelvey community marker
2. Progress Parkway roundabout
3. Private development in the Weldon Progress Corridor
4. Fee Fee Creek
5. Maryland Heights Government Center
6. Eastern Gateway near Ranken Jordan

Great Streets facilitate placemaking.

*Increase the number of park and open space within the corridor.*

Parks are some of the most memorable places in cities. They allow the community to gather, recreate and enjoy the beauty of local landscapes. The Dorsett Road Great Streets Plan recommends the two potential open spaces within the corridor (around Fee Fee Creek, and in the wooded area between Adie and Lindbergh) be developed and made accessible to all community members.



## Metrics Conclusion

The City of Maryland Heights and the various stakeholders should use the metrics information, including goals, in order to help guide the ongoing design and implementation of the Dorsett Road plan. The metrics will help the community to be able to monitor its progress in meeting the goals articulated as part of this effort, over time, as improvements are made and completed. The particular goals and targets may change over time, but this framework will help the community in making sure that the overall goals of this Great Streets effort are met over the short term and the long term.

