Transportation’s Impact on Health and Cancer Care

Transportation influences people’s daily lives, their health and the health of their community. Investments in transportation infrastructure such as sidewalks, bike lanes, trails, and public transit can help people stay healthy by:

- Providing a place to be physically active
- Decreasing air pollution
- Helping prevent traffic accidents and injuries

However, transportation barriers can make it difficult for some to access health care services, including cancer care.

Transportation barriers can lead to missed or delayed appointments, overall poorer health and widened health disparities. Insufficient access to transportation often occurs with other social determinants of health like lower income, reduced mobility, being a person of color, less social support, being un- or underinsured, and living in rural or medically underserved areas.

5.8 million people in the U.S. (1.8%) delayed medical care in 2017 because they did not have transportation, according to Wolfe (2020).

1.6 million rural households do not own cars, and public transportation is only available in 60% of rural counties. Cancer patients living in these counties face significant barriers to treatment, according to the U.S. Department of Agriculture.

75% of patients deal with a lack of transportation as a major barrier to receive screening for breast, cervical and colorectal cancer, according to patient care navigators.

Data for our Region

Car ownership

Percentage of households with no vehicle in the Siteman catchment area:

<table>
<thead>
<tr>
<th>RANK</th>
<th>COUNTY</th>
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<tbody>
<tr>
<td>1</td>
<td>St. Louis City, MO</td>
</tr>
<tr>
<td>2</td>
<td>Knox, MO</td>
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<tr>
<td>3</td>
<td>Wyandotte, KS</td>
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<td>4</td>
<td>Jackson, MO</td>
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<td>5</td>
<td>Linn, KS</td>
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<td>6</td>
<td>Putnam, MO</td>
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<td>7</td>
<td>Maries, MO</td>
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<td>8</td>
<td>Washington, MO</td>
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<td>9</td>
<td>Iron, MO</td>
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<tr>
<td>10</td>
<td>Atchison, MO</td>
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</tbody>
</table>

Use of transportation resources

Highest rates of medical transportation requests (rides/population) in 2018 from 2-1-1 data from Missouri and select counties in Illinois and Kansas

<table>
<thead>
<tr>
<th>CAR OWNERSHIP</th>
<th>PERCENTAGE</th>
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<tbody>
<tr>
<td>0 - 2.8</td>
<td></td>
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<tr>
<td>2.9 - 6.4</td>
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<tr>
<td>6.5 - 11.9</td>
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<tr>
<td>12.0 - 24.9</td>
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<td>25.0 - 71.1</td>
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Summary

In the Siteman catchment area, 144,868 households (7.4%) across rural and urban areas are without cars. While ACS has provided 327 rides to cancer care appointments in 2018, most are within St. Louis city and county. There are programs to help ease the transportation barrier, but the need persists.
How implementation can help
Evidence-based interventions may include:
- Using technology to promote telehealth options
- Providing mobile clinics or direct transportation services
- Connecting patients to transportation resources via community health workers

The most beneficial interventions may vary by region – understanding the impact of transportation on the health of the specific community is the best way to determine the most appropriate strategies to implement.

HELEN’S STORY
Helen (age: 54) from a rural town shared with us that her process for getting transportation is easy and that she learned about this transportation benefit when she received her insurance card. She also noted that not everyone in her community has the same experience. Read below about how having transportation or not impacts Helen, her family, and her community.

On impact on her own health outcomes/mental health
“...I was already stressing, I had anxiety really, really bad and it just took some stress off of me knowing that it [transportation] was secured and taken care of, knowing I didn’t have to worry about that part.”

On impact on family
“That takes stress of off them too, in a way. Knowing that I am getting there back and forth safely and that I do have good transportation

On others in community having transportation issues
“Sometimes they [community members] were just forgotten, [transportation] people just didn’t show up. …There are other people who have had real problems with this shuttle called [name removed]. It is really bad about picking up people and leaving them.

References

Full list of references available here: http://bit.ly/SnapshotReferences

TAKE ACTION
Below are additional resources on available transportation services, local data, policy advocacy or research capacity.

Resources for transportation services:
- Find additional transportation resources here: http://bit.ly/SnapshotResources

Resources for more local data:
- Local United Way 2-1-1- data https://211mo.211counts.org/

Resources for research:
- Dr. Deborah Salvo’s research focuses on transportation and physical activity. She welcomes collaborative opportunities related to transportation and cancer health disparities. https://tinyurl.com/wustl-Deborah-Salvo

About WU-ISC3
The Washington University Implementation Science Center for Cancer Control (WU-ISC3) brings together a diverse group of researchers from the School of Medicine and the Brown School to focus on eliminating cancer disparities in Missouri and Illinois by advancing implementation science methodologies. http://implementationscience.wustl.edu

The Program for the Elimination of Cancer Disparities (PECaD) of the Siteman Cancer Center at Barnes-Jewish Hospital and Washington University works with community partners to address the excess cancer burden within the region through outreach and education, research, and culturally relevant training strategies that foster healthy communities and environments less burdened by cancer. http://bit.ly/PECaD

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