

Using Social Media in Transportation Projects and Planning: Lessons From Four Minnesota Case Studies

Center for Transportation Studies Annual Conference
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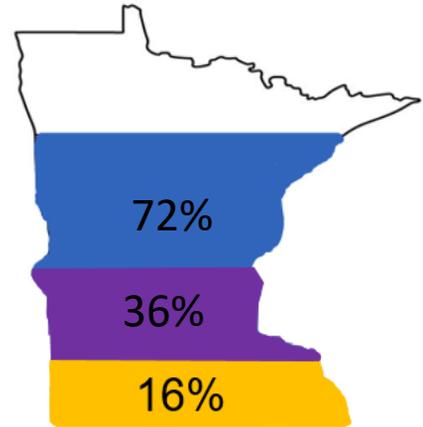
Project Goals

- **Assess** social media use for public engagement in transportation & public sector areas in U.S.
- **Identify** potential penetration rates of social media within diverse MN populations
- **Assess & develop strategies** to maximize engagement opportunities through social media by select segments

Thanks to the Local Road Research Board and MnDOT's Transportation Research Innovation Group for funding and to Renee Raduenz, Jeanne Aamodt, Mitch Bartlett, our case study site partners, and the TAP members for their guidance and partnership on this project.

Outreach opportunity: Transportation issues

- **72%** of MN adults use social media
 - **36%** are interested in using social media to be informed or involved in transportation issues
 - But only **16%** actually use social media to be informed or involved in transportation issues



Case study research questions

- 1) Does social media use increase engagement?* What do social media analytics indicate about whether and how?
- 2) How do stakeholders respond to social media?* What are their perceptions of social media use, compared with other engagement methods?

Comparative case study design

	High social media use	Low social media use
Twin Cities Metro area	Portland Avenue Richfield	Snelling Avenue Hamline-Midway in St. Paul
Greater Minnesota	Highway 61 Red Wing	Highway 10/59 Detroit Lakes

Data sources & analysis

- **Social media.** Analysis of official & community nodes for: reach, impressions, shares & reactions; sentiment analysis; and demographics
- **Confidential interviews.** 39 stakeholders, focus on impressions and preferences about the public engagement methods. Prioritized diverse POVs, not a representative sample.
- **Cross-check.** Reviewed analysis with all local government & MnDOT project leads

Richfield case

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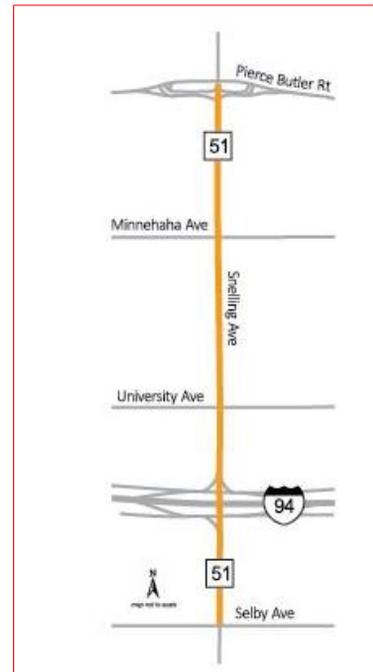


Richfield take-aways

- Online discussion happened mostly on Facebook. An **unofficial** community page had 6x the comment density of any other node.
- Why use social media? **"It's what people want!"** It's cost-effective and does not require extra time and skill so much as a "habit" of recognizing the opportunity.
- Stakeholders find the city's use social media of **informative**, but would like more **consultation** and online **dialogue**.
- Stakeholders from minority and immigrant community assert the city's engagement with them are generally poor. They emphasize that **in-person outreach** is particularly important.

St. Paul case

	High social media use	Low social media use
Twin Cities Metro area	Portland Avenue Richfield	Snelling Avenue Hamline-Midway in St. Paul
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St. Paul take-aways

- Online discussion was *diffuse*, across 4 Twitter and 5 Facebook nodes
- Social media is great for *timely construction & navigation updates*, a priority for small businesses, churches, and schools.
- It's also prone to incivility, shorthand, and escalation, and thus *risky for complex or divisive issues*.
- *In-person visits* were highly valued, yet the usual "*come to the stakeholder*" advice is edgy for government visits to immigrant- owned / oriented spaces. *Trusted community liaisons* are excellent conveners, but need resources.
- Previous projects are *consequential for a long time*. Stakeholders could not separate this from Rondo, the Green Line, Charles Avenue Blvd, etc.

Red Wing case



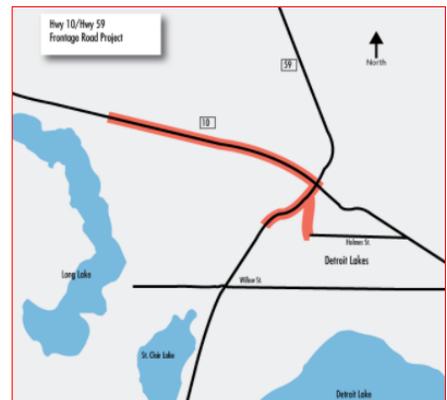
	High social media use	Low social media use
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Red Wing take-aways

- The Main Event participants ***amplified all SM outreach to their own networks.*** They upheld a commitment to extensively share content, repackage it, and promptly rebroadcast it.
- A “***regular diet***” of SM updates ***during construction*** made people informed, stayed positive, and kept customers coming downtown.
- Planning was ***proactive and inclusive of stakeholder interests.*** Ex: construction spread over 2 years to minimize tourism impact. Early, extensive outreach ***reduced anxiety.***
- Personal, timely ***responses from key project staff*** were valued, but providing multiple ways to get information was desirable and necessary.

Detroit Lakes case

	High social media use	Low social media use
Twin Cities Metro area	Portland Avenue Richfield	Snelling Avenue Hamline-Midway in St. Paul
Greater MN	Highway 61 Red Wing	Highway 10/59 Detroit Lakes



Detroit Lakes take-aways

- Social media showed a limited # of postings but heavy level of comments on them. **Visit Detroit Lakes** was the most active node.
- Stakeholders **could not separate this project from related ones** (recent & upcoming), which was a positive reflection of project managers' focus on **building sustained relationships**.
- Weekly construction email updates were a good method, but stakeholders needed **even more frequent updates** to stay current
- To improve social media: 1) use #DetroitLakes or other place markers to flag people's attention in large MnDOT districts; 2) use video to help people navigate complicated construction zones.

→ Case study research questions



1) *Does social media use increase engagement?* What do social media analytics indicate about whether and how?

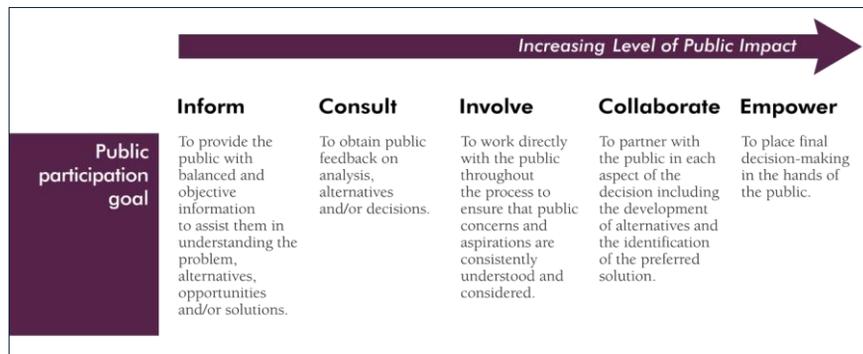
2) *How do stakeholders respond to social media?* What are their perceptions of social media use, compared with other engagement methods?

Findings from SM analysis

- Larger communities **do** have more social media nodes with higher participation, but they **do not** necessarily generate more engagement (likes, comments, and shares).
- ***Smaller communities that actively use social media may generate high levels of engagement.***
- ***Hashtags*** and ***visual stimuli*** improve engagement.
- ***Paying attention to social media metrics is important.***

Findings from case studies

- Government-sponsored social media served primarily to *inform* the audience.... whereas community pages *inform and engage*.



→ Case study research questions

1) *Does social media use increase engagement?* What do social media analytics indicate about whether and how?



2) *How do stakeholders respond to social media?* What are their perceptions of social media use, compared with other engagement methods?

Stakeholders' reactions

- Social media is cost-effective, nimble, and a good way to provide timely updates and draw people to other platforms.
- But... it's only one part of the puzzle. *Utilizing multiple modes of engagement is essential*



Stakeholders prefer

- A “*regular diet*” of information.
- *Social media that is dynamic* (not just a new channel for pushing traditional announcements).
- Social media that *engages multiple voices* (not just hub-and-spoke with the sponsor).

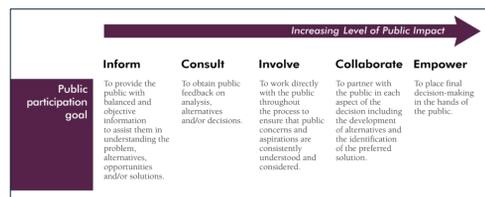


Stakeholders want greater involvement

- Disgruntled stakeholders were usually experiencing a uni-directional “inform” mode of engagement... whereas they wanted earlier, greater *inclusion in decision-making*.

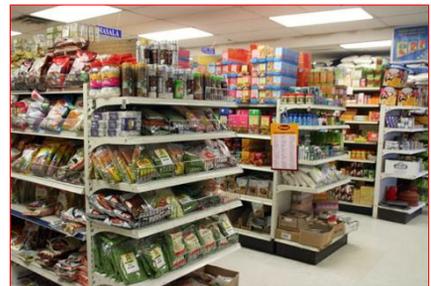
High participation: Diverse, representative involvement. Barriers to access removed. Input taken seriously.

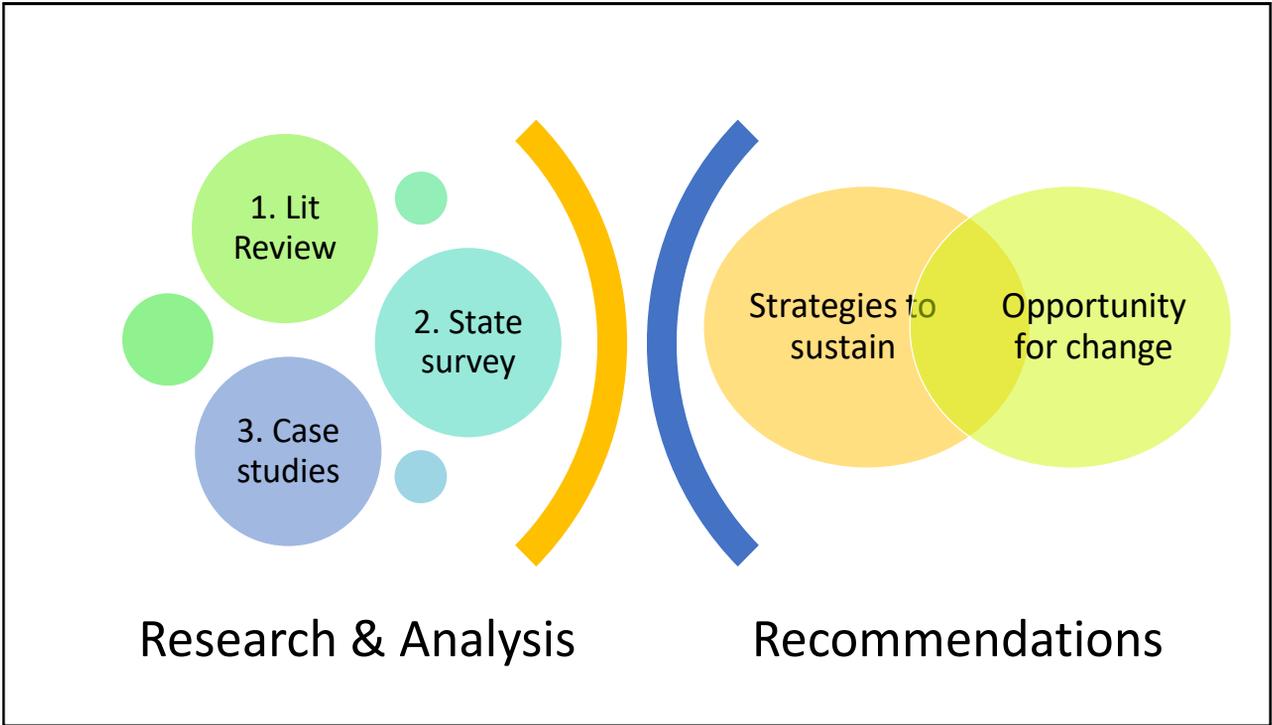
High inclusion: Ongoing, mutual engagement of policy-makers and other stakeholders in co-defining problems, priorities, and solutions.



Trust: liaisons & history

- Engagement with immigrants and communities of color is generally poor. *Trusted, established liaisons are good connectors and conveners, but they need resources.*
- How a particular project fits in with *past and future transportation projects* has strong implications for the quality of engagement and trust.





Recommendations for local agencies

1. Clarify the purpose of public engagement in this case, and design the social media approach accordingly.
2. Integrate social media into multi-pronged, dynamic (video, not just text) and interactive (bi-directional) engagement approaches.
3. Assess the demographic qualities of the key stakeholders whom you want to reach and engage. Adjust your social media strategies to meet them, using the survey data that indicates their preferences.
3. Employ best practices for social media engagement, such as using SM analytics tools and generating interactive content.

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Lessons From Four Minnesota Case Studies

THANK YOU!

Questions? Contact Kathy Quick, ksquick@umn.edu



EXTRA SLIDES – analysis of
statewide survey

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Portland Ave, Richfield

- **Project:** \$8.9m re-engineering to slow traffic, improve pavement & sidewalks, add bike lane
- **Approach:** High social media use as part of generally high-effort, multi-channel engagement effort, also involving:
 - www.richfieldsweetstreets.org
 - Weekly contractor meetings
 - Open houses
 - Flyers delivered to every house
- **Social media.** 4 Facebook, one Twitter, one YouTube node. Key purposes of city's SM:
 - Draw people to and report on public meetings
 - Provide routine weekly status reports on project progress
 - Quickly relay information about road rerouting
 - Address questions posted by residents.

Snelling Avenue, St. Paul

- **Project:** \$13.2m resurfacing, bridge closure & redecking, ped crossing updates, 4 BRT stations created, sidewalk / median / boulevard changes
- **Approach:** Extensive public engagement emphasizing personalized, on-the-ground, one-to-one relationship-building & communication with key stakeholders
- **Social media.** 7 Facebook, 3 Twitter, one YouTube node. Key purposes of social media:
 - Publicize open houses
 - Announce land closures & other construction updates
 - Rapidly convey impactful changes

Highway 61, Red Wing

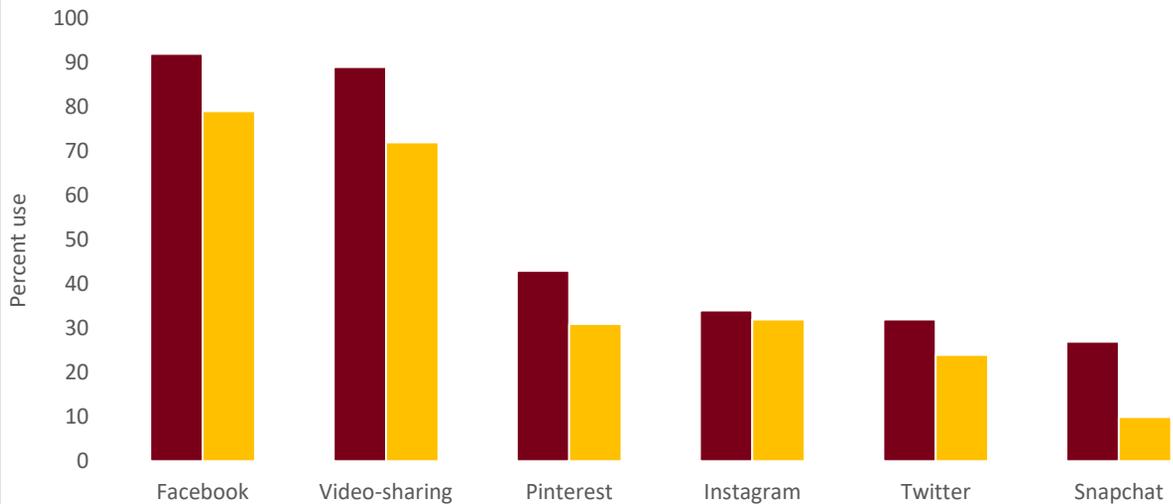
- **Project:** \$13m improvements through downtown, including mill & overlay, sewer & utility, pedestrian amenities, streetscape improvements.
- **Approach:** High social media use as part of generally high-effort, multichannel engagement effort:
 - The Main Event stakeholder advisory and marketing group
 - Lots of marketing, hardhat specials
 - Live broadcast weekly contractor mtg
 - Door-to-door outreach
- **Social media.** 4 Facebook, 3 Twitter, one YouTube node. Key purposes of city's SM:
 - Inform people about important construction updates
 - Promote public project meetings
 - Encourage residents to support local businesses impacted by construction
 - **Keep a positive, fun vibe about the project and its impacts**

Highway 10/59, Detroit Lakes

- **Project:** \$13.3m highway resurfacing & new frontage road, to improve safety on highways and vehicle, bike, ped connectivity
- **Approach:** Low social media use; higher traditional engagement efforts:
 - Construction: Weekly email to 1k
 - Project website
 - Traditional media outreach
 - Face-to-face visits
 - Community meetings (general & interest group)
- **Social media.** 2 Facebook, one Twitter. Key purposes of SM:
 - quickly provide information about construction updates
 - encourage users to attend public project meetings

MN adult platform use > U.S. adult

(Pew Research Center, 2013a, 2016a, 2016b; Schneider et al., 2018)



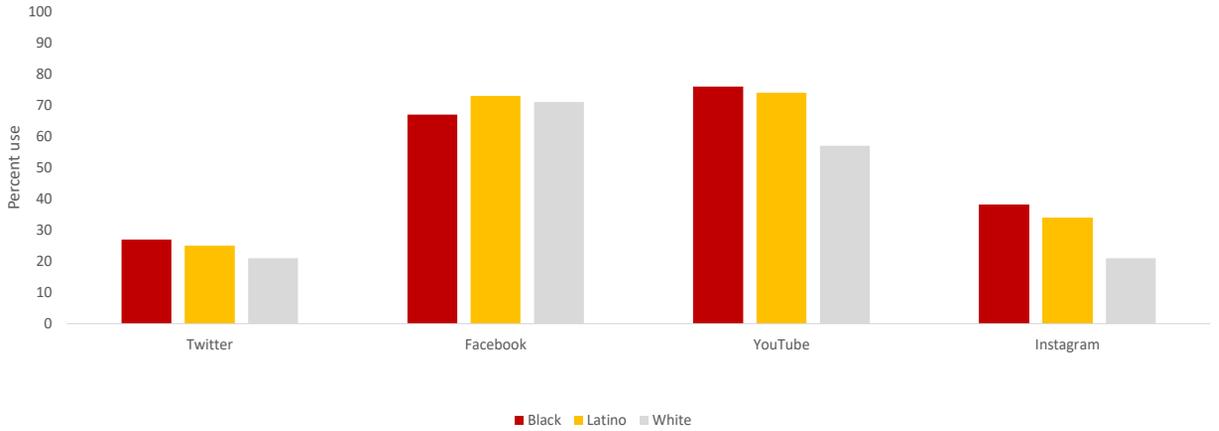
Demographic differences in social media use

- Telephone survey of 812 Minnesotans
- Conducted Fall 2016 - Winter 2017
- Oversampling of typically demographically under-represented groups
- Reweighted to be representative of Minnesota



Platform use by available Race/Ethnicity

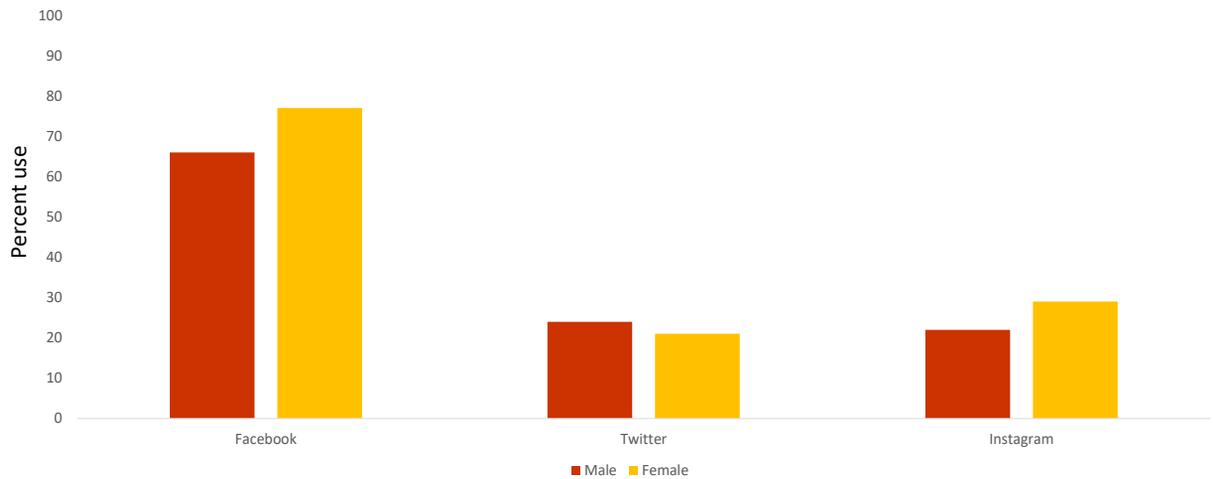
(online adults; Pew, 2015c; Pew, 2014c)



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Platform use by gender

(online adults; Pew, 2015c; Pew, 2013b)



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Findings: Significant differences among groups in MN

- **Age:** Young (18-49) > M (50-64) > Older (65+)
- **Gender:** Female > Male
- **Household income:** \$70k income > under \$50k
- **Location:** Metro > Greater MN
- **Race & ethnicity:** Non-white > White
- **Education:** At least some college > high school or less

MNs' platform use by demographic group

(n=576-585)

- 18-29 year olds *more* likely than other ages   
- Females *more* likely than males 
- Males *more* likely than females 
- Greater MN *more* likely than metro MN 
- Non-white *more* likely than white 
- High-school-only educated *more* likely than more educated  