Mineta Transportation Institute presents:

Safe Routes to School in 2021: Let’s Walk the Walk

Presented by
Michelle Lieberman
Dr. Anurag Pande
Dr. Carole Voulgaris
Rick Kos
Sue-Ellen Katz Atkinson
Branka Tatarevic
Justin Flynn

February 16, 2021 | Moderated by Shiloh Ballard
Safe Routes to School: 2021 and Beyond

Michelle Lieberman
Consulting and Program Support Director
Safe Routes to School Around the Nation: A Snapshot from 2019

6 E’s of Safe Routes to School

1. Engagement
2. Equity
3. Engineering
4. Encouragement
5. Education
6. Evaluation
State of Safe Routes to School Programs in 2020 and 2021

• Pivot, pivot, pivot!
• Confronting the unknown and moving forward together
• Responding to local community needs
• Continuing to raise up the importance of traffic safety and physical activity
Working Group and Guide

- Guiding Recommendations
- Strategies
- Tools
- Considerations
- Advice for long-term planning

Short-term, actionable, designed to adapt and modify to fit the unique needs of individual school, district, or community
Importance of Safe Routes to School in 2021 and Beyond

• Transportation and physical activity are essential needs

• More safety concerns around riding the bus; some families don’t own cars

• Student travel options need to be safe, convenient, and physically distant

• Treasure trove of strategies, tools, ideas, and lessons learned from 2020

• Safe Routes to School anticipates lifestyle changes and helps communities adapt
Resources on Our Website

Back to School 2020
Recommendations for Safe Routes to School Programming

Step by Step
How to Start a Walking School Bus at Your School

SAFE ROUTES FOR YOUTH
Supporting and Empowering Teen Leaders in Vision Zero
April 2020

Building Blocks
A Guide to Starting and Growing a Strong Safe Routes to School Program
Thank you!

Michelle Lieberman  
Consulting and Program Support Director

michelle@saferoutespartnership.org
NEIGHBORHOOD EFFECTS OF SAFE ROUTES TO SCHOOL PROGRAMS ON THE LIKELIHOOD OF ACTIVE TRAVEL TO SCHOOL

Carole T. Voulgaris, PhD
Reyhane Hosseinzade
Anurag Pande, Ph.D
Serena E. Alexander, Ph.D.

Study funded by the Mineta Transportation Institute at San Jose State University.
Photo credit: New York City Department of Transportation
Elements of Safe Routes to Schools programs (6 ‘E’s)

- Education (e.g., teaching drivers to yield to pedestrians and cyclists)
- Encouragement (e.g., Walk to School Day events)
- Enforcement > Engagement (e.g., the use of police officers and community volunteers to enforce traffic laws)
- Engineering (e.g., sidewalk and crosswalk improvements)
- Equity
- Evaluation
Federal role in Safe Routes to Schools

(SAFETEA-LU) in 2005: Safe, Accountable, Flexible, Efficient Transportation Equity Act: A Legacy for Users Act

2005

Under MAP-21, the federal SRTS program was discontinued.

(MAP-21) in 2012: Moving Ahead for Progress in the 21st Century Act

2012
Methods

- Quantitative
  - Analysis of land use and demographic factors affecting the success of the SRTS programs (CHTS Data)

- Qualitative
  - In-depth interviews with individuals involved in planning and implementing the SRTS programs at individual school level
Quantitative Data and Methods

- Those containing schools for which the National Center for Safe Routes to Schools (NCSRTS) Data Collection System included student travel data from 2012.
- This study only includes households living in the study area with children who attend grades kindergarten through eighth grade.
- SRTS tracts includes 24-30% of students.
Control Variables

- Commute distance to school
- Household income
- Race/ethnicity
- Gender
- Presence of non-working adult(s) in the household
- Housing unit density
- Average block length
- Share of the population between the ages of five and fourteen years old
- Percent of resident workers who walk to work in the tract
**Statistical Analysis**

**Binomial logistic regression models**

- **Model 1**: estimating the average difference in the probability of taking an active mode to school by the presence of SRTS program.

- **Model 2**: Including interaction terms between the presence of an SRTS program and each of the control variables in addition to all the terms included on model 1.

- **Model 3**: replacing the indicator variable for the presence of an SRTS program with an indicator if whether the student attends school in SRTS area and has a commute distance of less than the walking threshold.

- **Models 4**: including the same indicator variable as model 3, and all terms as model 2.

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<thead>
<tr>
<th>Model Alternative</th>
<th>1</th>
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<tbody>
<tr>
<td><strong>Distance to school (miles) (log transformed)</strong></td>
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<tr>
<td><strong>School neighborhood characteristics</strong></td>
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<td>Presence of SRTS program</td>
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<td>Presence of SRTS program and commute less than threshold</td>
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<td>Housing density (housing units / acre)</td>
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<td>Percent of population ages 5 to 14 years old</td>
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<tr>
<td>Household income (in units of $10,000)</td>
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<td>Presence of non-worker adult in household</td>
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<td>Sex</td>
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**Interactions with presence of SRTS program**

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**Interactions with presence of SRTS program (only for commutes less than threshold)**

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Results

In 2012, students commuting to schools in SRTS tracts were significantly more likely to commute to school by active modes than students commuting to school in non-SRTS tracts, with a difference of about nine percentage points.
Predicted probabilities of using an active mode for the journey to school for non-Hispanic white students and Asian students attending school in tracts with and without SRTS programs, for three different trip distances: 0.2 miles, 0.7 miles, and 1.2 miles. All other variables from the regression model are held at their base values for categorical variables (male, no non-working adult in the household) or mean values for continuous variables.
Qualitative Analysis

- We conducted interviews with school administrators and parents involved with SRTS programs.
  - Within the study area, SRTS programs have generally emphasized education and encouragement.
  - Some of the more unique recent initiatives part of SRTS programs include free bike repair services.
  - One interviewee emphasized the need to increase visible safety measures within the community and near schools, such as having more parent volunteers, *adding speed bumps*, and increasing the number of teachers out on yard duty.
Qualitative Analysis

Interviewees’ responses align with the Schneider’s operational theory of routine mode choice decisions

- **Awareness and availability** (e.g., through proper communication by the schools to parents),
- **Basic safety and security** (e.g., through improvements to the routes to school and increasing school staff and equitable enforcement and encouragement in the SRTS programs),
- **Enjoyment** (e.g., through the novelty of the SRTS events and social connections created by walking or bicycling together),
- **Habit** (e.g., targeting information about sustainable transportation options to people making key life changes), and
- **Convenience and cost** (e.g., through long-term changes in land use; perhaps the most difficult to implement for the school context).
Conclusion

• SRTS programs improves health and safety of students in two ways: safety for who would walk/ bike even in the absence of such program and increasing the share of students who walk/bike to school.

• With shorter distance of walking, the impact of race/ethnicity on choosing to walk/bike to school can be eliminated.

• Potential impacts of SRTS programs in alleviating racial and geographic barriers to commuting to school by active modes.

• Qualitative data suggests there is appreciation for engagement and education elements of the SRTS programs
Questions/Comments

• Carole Voulgaris (cvoulgaris@gsd.harvard.edu)

• Anurag Pande (apande@calpoly.edu or @PolyProfPande on Twitter)
Safe Routes to Schools Service-Learning Projects
In San José Spark Longstanding Student Engagement
In Community Planning

Richard Kos, AICP
Sue-Ellen Katz Atkinson, AICP
Branka Tatarevic
Justin Flynn
Service-Learning and Community Engagement at San Jose State University

Masters of Urban Planning program

Capstone Studio in Community Planning
Advanced GIS for Urban Planning

CommUniverCity partnership

Mindset: Asset-Based Community Development

Approach: Collaborative Neighborhood Planning Model
- Community assessment
- Community building
- Implementation bridges

Benefits for students, communities, university
- Bottom-up, community driven approach
- Families take ownership of the SRTS program
- Provides structure for a program that can be long-lasting and part of school culture
- Local jurisdictions can provide materials and support for programs
• Educates young residents how to walk and bike safely (and their families too!)
• Encourages a new generation to use multimodal options and not vehicles only
• Increases mode share for active transportation
• Builds pride in the community and a sense of ownership in the built environment
Sierramont Site Visit
TRANSPORTATION CONDITIONS:
LARGE SCALE

- Sierramont site visit
PROMOTIONAL MAP:

- Inform and remind students and families about the walkability of the neighborhood
- Simple design conveys more info because of iteration
- Could be printed at the school office
The school is close to the district boundary edge.

Bachrodt Area is divided by I-880.

Rosemary Gardens walkable.
VIRTUAL COMMUNITY MEETING

- Parent representative shared a map
- Many people drive (bilingual program; highways)
- Narrow streets
- Drive through for drop off
- Mapped input from the community
- Updated the Walkable streets with confirmed multiple entrances
- Automobile traffic as impediment for active transportation, even in the immediate neighborhood
PUBLIC SAFETY

- For internal use can inform route recommendations
- Crime concentrated along 1st Street, also scattered throughout Rosemary Gardens neighborhood (see red arrows)
- 19 sex offenders in the neighborhood - only 3 right near the school
Service-Learning and Community Engagement at San Jose State University

Benefits for Students
- Exposure to real-world challenges
- Integrating theory and practice
- Course is run as a small consulting firm
- Empathy and active listening
- Professional network building
- Students continue into jobs serving communities

Benefits for Communities
- Access to students with wide skill sets
- Turning aspirations into actions and advocacy
- Giving a voice to the marginalized
- Students continue into jobs serving communities
Thank you for joining us for:

Safe Routes to School in 2021: Let’s Walk the Walk

View the full reports at:
Pande and Volgaris et al: https://transweb.sjsu.edu/research/1821-Measuring-Success-Safe-Routes-School
Kos et al: https://transweb.sjsu.edu/research/2061-Safe-Routes-School-San-Jose

Tune in for our next MTI Research Snap “TODs and Park and Rides, Which is Appropriate Where?” on March 4, 2021 at 10a.m. (PST)! Visit https://transweb.sjsu.edu/events for details and registration.

Have a suggestion for a webinar topic you’d like to see featured? Email irma.garcia@sjsu.edu