



# Iowa Safe Routes to School

Our new vision to reach all students

Hi, I'm Matt Burkey

## What is Safe Routes to School?

SRTS is a movement established to create safe, convenient, healthy, and fun opportunities for children to walk and bike to/from school.

- Infrastructure
- Non-Infrastructure



## Why SRTS Matters

- Help pave ways to get to school to increase the numbers of those walking/ biking.
- Decrease health issues/ inactivity

   Obesity crisis
- Improve Air Quality
- Reduce traffic (idling cars)

Exposure to high levels of air pollution can cause a variety of adverse health outcomes. It increases the risk of respiratory infections, heart disease and lung cancer. Kids more susceptible



Upper Explorerland's SRTS Program- serves 6 rural counties in the very northeastern corner of Iowa



Coordinators are April Bril and Ashley Christensen

- Walking and Biking School Buses or Clubs.
- Bike Safety Lessons.
- Bike Rodeo Supplies.
- SRTS Community Coalitions.



Iowa Northland Regional Council of Governments (INRCOG) serves a 6-county

INRCOG SRTS, Brenda, program offers virtual or in-person classroom bike and ped safety presentations and pairs with bike rodeo and trail rides



#### Why me?

Remainder 86 counties my jurisdiction

Oh bother



#### Why me?

I want more people riding bikes to Bike There

Roadie and gravel grinder

Multifarious background & skill set

Brewed beer, TA, oil rig geologist, paper boy, paper man



### Why me?

I want more people riding bikes to Bike There

Roadie and gravel grinder

Multifarious background & skill set

Brewed beer, TA, oil rig geologist, paper boy, paper man

Bike commuting for over 10 years



#### Iowa SRTS Goal:

All lowan 4th graders receive bicycle traffic safety education

35000

How? Give out helmets? Blog?

Personal goal: More people riding bikes.

#### Iowa Safe Routes current model

Bike rodeos

In classroom session

Blog and social media

(please like & subscribe)

Annual Reach: ~500 students

#### SRTS Vision 2023 to 2028

All Iowa 35,000 4th-grade students receive bike, pedestrian, and traffic safety education.

What? How?

### Why?

# From 2012-2022 there 918 bicycle crashes with 7 fatalities in urban areas involving cyclists under 16

#### **VISION ZERO**



Vision Zero is Des Moines' plan to eliminate traffic fatalities and further enhance the safety of our transportation system for our growing community.

Every person in our community matters.

## Why?

- Help pave ways to get to school to increase the numbers of those walking/ biking.
- Decrease health issues/ inactivity
  - Iowa's obesity rate for children ages 10 to 17, is at 17.6% in 2022
    - 17th in the nation!

Physical activity is a boost to mental health

Cycling great way to make friends

Effectiveness of physical activity interventions for improving depression, anxiety and distress: an overview of systematic reviews a



#### Abstract

**Objective** To synthesise the evidence on the effects of physical activity on symptoms of depression, anxiety and psychological distress in adult populations.

Design Umbrella review.

Data sources Twelve electronic databases were searched for eligible studies published from inception to 1 January 2022.

### Why?

Worldwide, kid mobility down

Dang kids, go play on the lawn!

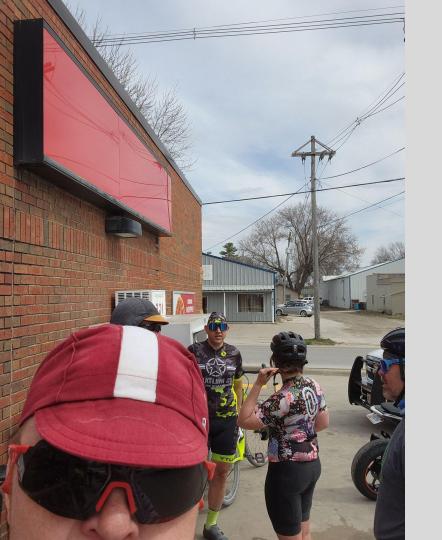
Secondly, the loss of independent mobility can have adverse effects on children's well-being, health and personal development including:

• Considerable loss of autonomy and access to a safe environment outside the home,

• Decline in physical condition potentially leading to obesity and other health benefits,

• Gaining insufficient practical and social skills owing to inexperience in acting independently.

Source: Children's Independent Mobility: an international comparison and recommendations for action





We also estimate that urban residents who switched from driving to cycling for just one trip per day reduced their carbon footprint by about half a tonne of CO<sub>2</sub> over the course of a year, and save the equivalent emissions of a <u>one-way flight</u> from London to New York.

https://www.sciencedirect.com/science/article/pii/S1361920921000687?via%3Dihub

#### NPR 4/4/2023

#### Gasoline prices are expected to go up, too

Crude oil prices are a major driver of gasoline prices, so as the price of oil goes up, gasoline prices often follow, delayed by days or weeks.

That's what happened last year when oil prices surged, sending the national average price for gasoline to a record of as much as \$5 per gallon.

Prices had come down significantly since then, to \$3.50 per gallon, according to AAA.

It's hard to predict exactly how much prices will rise now, because there are other factors at play, including refinery outages, changes in demand and general economic conditions.

### Two Ways to enact SRTS

- 1. Infrastructure
  - a. If you build it, they will come. Ride a bike.

- 2. Education
  - a. Hands on

### 2 Working Groups

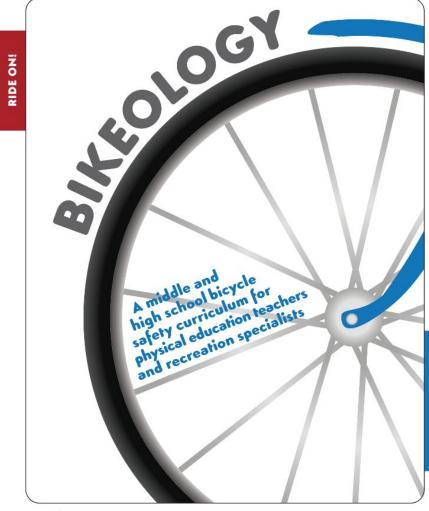
To guide this effort, the Coalition will lead a curriculum development council that can build and adapt lesson plans and activities to be implemented.

Previous curriculum covers cycling and walking

Aimed for K through 6th grade, too wide a net

#### **SHAPE** America

PE teachers organization





NILITCA

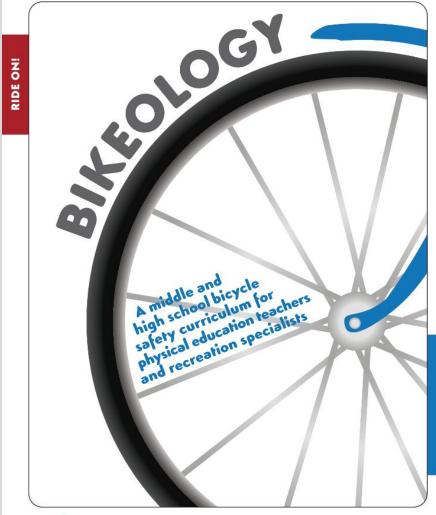
#### **SHAPE** America

PE teachers organization

Guide is a mere 352 pages long

"The average reader will read 350 pages in 9.7 hours"

That's 3.2 Great Gatsbys





#### **New Curriculum**

Designed for 4th grade level

Once complete can be adapted for younger & older students

Age specific material more effective

Ensure standardization of topics/materials

Under 300 pages

#### National Physical Education Standards

**Standard 1:** competency in a variety of motor skills and movement patterns.

**Standard 2:** applied knowledge of concepts, principles, strategies and tactics related to movement and performance.

**Standard 3:** demonstrates knowledge and skills to achieve and maintain a health-enhancing level of physical activity and fitness.

**Standard 4:** exhibits responsible personal and social behavior that respects self and others.

**Standard 5:** recognizes the value of physical activity for health, enjoyment, challenge, self-expression and/or social interaction.

#### Citation:

SHAPE America. (2013). National Standards for K-12 Physical Education. Reston, VA: Author.

### Why 4th graders?

Slightly older are risk takers, slightly younger not cognitively there yet

Lots of adult oriented bike crashes.

4th grader -> adults

Frequent hands-on practice and reinforcement is

key to encouraging behavior change in children and this is

particularly important for bicycle riding because it is a dual

task, requiring both motor and cognitive skills to be engaged at

the same time.47-49

#### Evidence based curriculum

Helmet based education helps after that impact

Curriculum focused on safety and technique potentially prevents impact

Last year ('22) 40% of crashes with cyclists age 8 to 14 took place at 4 way intersection

Half those were unsignaled intersections

#### More than just helmets

Helmets help after the crash

Helmets do not create safety

Safety and traffic training to help prevent crashes

We want to make a bigger impact to prevent impacts

Build a branded replicable program, same focus across the state

### 2 Working Groups

To guide this effort, the Coalition will lead a curriculum development council that can build and adapt lesson plans and activities to be implemented.

To implement this effort the Coalition will convene an advisory council that includes leaders from the top 10 targeted districts. The advisory council will consist of people in dedicated professions who have the occupational abilities, connections, and opportunities to implement the program.

#### 86 Counties

#### **One Coordinator**



#### SRTS Vision 2023 to 2028

All Iowa 35,000 4th-grade students receive bike, pedestrian, and traffic safety education.

What? How?

Partnerships!

#### Cara Hamann & Ryan Dusil

#### Inventory of Youth Bicycle Education Programs

**Final Report** 



#### December 2017

Cara J. Hamann

Alyssa Conrad



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The Iowa Association for Justice educates and empowers attorneys who fight for justice in our courthouses and communities, and defends the legal rights of Iowans who seek justice in our courts.

\$2500 for new helmets, tied to bike rodeos and only available for that

Potential volunteers for bike rodeos, give them month lead time



Decatur County Hospital in Leon, IA

No bike shop for 6 counties

Agree to host bike rodeo kit.



GTSB

#### The Grant

Iowa GTSB

Applying for materials for 10 bike rodeo kits



#### How to reach every 4th grader

The Iowa Bicycle Coalition will lead an effort to create a turn-key program using proven safety lessons that are easy for volunteers and dedicated community staff to implement and deliver to students across lowa.

Bike rodeo in a (bike) box.



#### What's in the box?

Signs

Cones

Safety Vests

Training booklets

Stickers

Available for school and communities to check out and perform a rodeo!

#### **Bike Safety Education**

Lack of evaluation of interventions

Do they make a difference? How so? How do we know it was us?

Coordinators guide includes survey to fill out after rodeo and send to us.

#### Making a difference?

Use the same lowa IDOT information to track progress in areas we reached. Is the curriculum helping prevent?

Our new goal: to decrease crashes, injuries, and fatalities among bicyclists through improved traffic safety knowledge, skills, navigation, and riding behaviors.

What is the evidence of health impact and cost effectiveness?

SRTS programs are associated with increased active transportation, including an increase in the number of students walking or biking to and from school.[4, 14-18] Over a 3-year period, a comparative analysis based upon a national sample of school SRTS programs found that SRTS was associated with:

An increase in the percentage of students who walked to and from school from 7-8 percent to 15-16 percent [16]

An increase in the percentage of students who biked to and from school from one percent to two percent [16]

CDC 2014

#### Equitable

Program that can be applied to urban and rural lowans

How to adapt the program to include every student?

**Rural Schools** 

Cycling clubs?

Walking clubs?



## **Barriers**

- Distance
- Traffic- related danger
- Weather
- Opposing School Policy



## **Opportunities**

Now is a great opportunity to encourage walking to school when and where it is appropriate.

- Removing policy that may hinder kids from walking to school. Sometimes a school will not allow kids to bike and walk to school.
- Increase or establish Walking School Buses. Create cycling school buses
- Stagger bus drops off and car drop and vice versa at the end of the day.
- Have car drop off and pick up in a different location than kids walking.
- Park you grade away!
  - 5th grader 5 blocks away, 3rd graders 3 blocks away





# Thank you!

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