

# CHILDHOOD UNINTENTIONAL INJURY PREVENTION

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# OUTLINE

- **Public Health**
  - Burden
  - Risk & protective factors
  - Best practices
- **Organizations**
  - JCDHE
  - Safe Kids
  - Charlie's House
- **Activities**
  - Development
  - Implementation
  - Review
- **Reflection**
  - Challenges
  - Knowledge gained
  - Opportunities

# **PUBLIC HEALTH BACKGROUND**

FACTS ABOUT UNINTENTIONAL CHILDHOOD INJURY

# CHILDHOOD UNINTENTIONAL INJURY: U.S.

- #1 cause of death and disability
- Greater than mortality for all diseases combined
- 42% of all YPLL 2000-2009
- **Annually:**
  - >9000 deaths
  - 20 million need medical care or restricted activity
  - >9 million seen in ER
  - 200,000 hospitalized
  - >\$300 billion U.S.
- **Effects:**
  - Child: from pain to functional limitation to permanent disability; psychiatric problems; missed school
  - Caregivers: lost productivity; psychiatric & social problems; costs of medical care

# LEADING CAUSES OF MORTALITY

Rank	Age <1	Ages 1-4	Ages 5-9	Ages 10-14	Ages 15-19
1	Suffocation 907 (77%)	Drowning 450 (31%)	Motor Vehicle (MV) Traffic 378 (49%)	MV Traffic 491 (68%)	MV Traffic 3,242 (67%)
2	MV Traffic 91 (8%)	MV Traffic 363 (25%)	Drowning 119 (15%)	Transportation - Other 117 (15%)	Poisoning 715 (15%)
3	Drowning 45 (4%)	Fire/Burns 169 (12%)	Fire/Burns 88 (11%)	Drowning 90 (10%)	Drowning 279 (6%)
4	Fire/Burns 25 (2%)	Transportation - Other 147 (10%)	Transportation - Other 68 (9%)	Fire/Burns 53 (6%)	Transportation - Other 203 (4%)
5	Poisoning 22 (2%)	Suffocation 125 (9%)	Suffocation 26 (3%)	Suffocation 41 (5%)	Fall 58 (1%)

# LEADING CAUSES OF MORBIDITY

Rank	Age <1	Ages 1-4	Ages 5-9	Ages 10-14	Ages 15-19
1	Fall 147,280 (59%)	Fall 955,381 (45%)	Fall 631,381 (37%)	Fall 615,145 (29%)	Struck by/against 617,631 (24%)
2	Struck by/against 31,360 (13%)	Struck by/against 372,402 (18%)	Struck by/against 406,045 (24%)	Struck by/against 574,267 (27%)	Fall 468,967 (18%)
3	Bite/sting 10,922 (4%)	Bite/sting 137,352 (7%)	Cut/pierce 104,940 (6%)	Overexertion 276,076 (13%)	Overexertion 372,035 (14%)
4	Foreign Body 8,860 (4%)	Foreign Body 126,060 (6%)	Bite/sting 92,590 (5%)	Cut/pierce 118,440 (6%)	Motor Vehicle Occupant 341,257 (13%)
5	Fire/Burns 7,846 (3%)	Cut/pierce 84,095 (4%)	Pedal Cyclist 84,590 (5%)	Pedal Cyclist 118,095 (6%)	Cut/pierce 184,972 (7%)

# CHILDHOOD UNINTENTIONAL INJURY: LOCAL

- Kansas childhood unintentional injury mortality rate is higher than the US rate
- Rate is higher in >1, 1-4, 5-9, and 10-14 year olds
- Rate is higher for almost every type of injury
- 19% of Kansas population lives in Johnson County
- 25.5% of residents are children
- Unintentional injury is the leading cause of death for Johnson County children over 1 year of age

# RISK AND PROTECTIVE FACTORS

- Gender
- Racial/Ethnic background
- Socioeconomic factors
- Age

## Johnson County

- Less diverse than KS (86% white)
- Median income > KS, US
- Education levels > KS, US
- 17% in poverty
- 17% in single parent households
- Of children 0-17, 8% poor and 20% low income

# PREVENTION: BEST PRACTICES

Comprehensive strategies combining education, environmental &/or product modification, and legislation

Examples:

- Child passenger safety seats
- Bike helmets
- Smoke alarms
- Window bars
- Playground standards

# **ORGANIZATIONS**

LOCAL GOVERNMENT AND NON-PROFIT AGENCIES

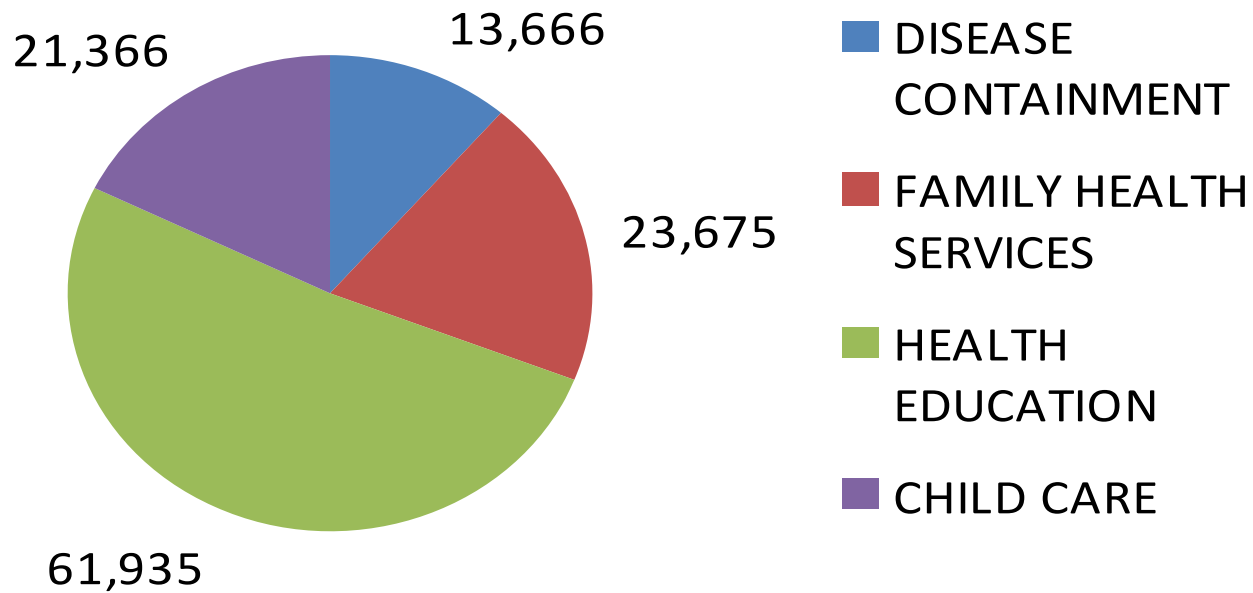
# JOHNSON COUNTY DEPARTMENT OF HEALTH AND ENVIRONMENT

*"to prevent disease and to protect and promote the health of the community"*



# HEALTH EDUCATION DIVISION

## Population Served in 2011




**SAFE KIDS JOHNSON COUNTY**

*"dedicated solely to the prevention of unintentional childhood injury"*

**SAFE**  
**K:DS**  
**JOHNSON**  
**COUNTY**

# ACTIVITIES

- Child Passenger Safety Seat Check-Up events
  - Child Passenger Safety technician training
  - Bike Rodeos/Bike helmet fittings
  - Information and events on:
    - Home Safety topics
    - Sports Safety topics
  - National Safe Kids Week events
  - Community injury prevention education for professionals, parents, and caregivers
  - Information and contact points for media
- 

# CHARLIE'S HOUSE

"to prevent injuries to children in and around the home"



charlie's  
house

# BACKGROUND & ACTIVITIES

- **Safety demonstration house**
  - Room-by-room safety tips
  - Use of safety devices
  - Examples of home hazards
- **Provision of furniture straps**
- **Development of educational materials for parents**



# EDUCATION COMMITTEE

## MEMBERS

- **Pediatricians**
- **Pediatric nurses**
- **Representatives from Safe Kids and other area non-profits**
- **Fire and police department members**
- **Area parents**

## ACTIVITIES

- **Monthly meetings**
- **Review current CIP research and activities**
- **Assess educational needs of Charlie's House**
- **Collaborate on upcoming events**
- **CIP presentations to community groups**

# **FIELD EXPERIENCE ACTIVITIES**

DISTILLED FOR RELEVANCE

# DEVELOPMENT

- **Projects overseen by Katie Schatte**
  - JDCHE Health Educator
  - Lead SKJC coordinator
  - Charlie's House Education Committee chairperson
- **Priorities determined by Education Committee**
  - Standardized, modifiable educational presentations on home safety for use with lay audiences
  - Catalog of CIP best practices and free available materials
  - Additional educational documents to supplement presentations and for media dissemination
- **Goals**
  - Raise public awareness about unintentional childhood injury prevalence, risk factors, and potential hazards
  - Highlight opportunities and best practices for CIP

# HEALTH EDUCATION



# LITERATURE REVIEW

- **Review and documentation of existing content**
  - JDCHE and SKJC materials
  - Online materials from national organizations
  - Consultation with local content experts
  - Online journal articles related to CIP statistics, best practices, and evidence-based interventions



# ANALYSIS

## Approaches of existing educational materials:

- Topical
- Sub-topical
- Geographic
- Age-based

## Limitations

- Extent of injury types and variety of possible interventions
- Relevance
- Generalizability
- Presence of multiple children



# PROJECT FRAMEWORK


## ORGANIZATION

- **Season-specific**
  - Winter/Holiday
  - Summer/Outdoors

## AUDIENCE

- **Caregivers**
    - Able to make changes in home environment
    - Emphasis on adult supervision
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## CONTENT

- **Age range**
    - 1-14 years
  - **Excluded topics**
    - Safe Sleep
    - Child Passenger Safety
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# REVIEW OF PRODUCTS

## Reviewers

- Agency mentor
- Charlie's House education committee

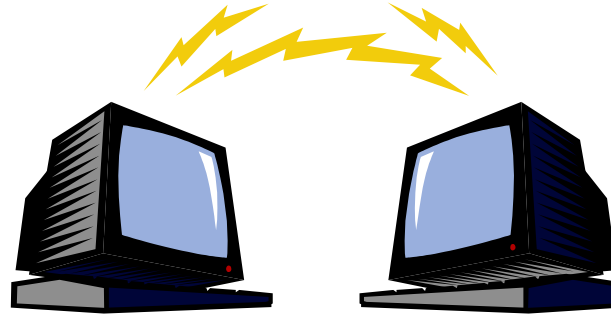
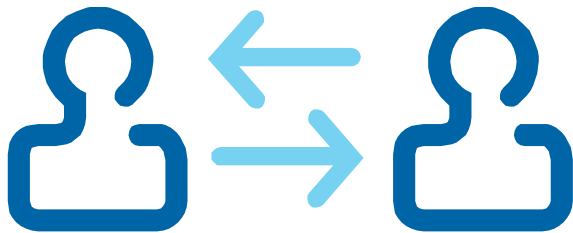
## Reviewed

### Style and content

- Impact
- Accuracy
- Thoroughness



# DISSEMINATION



- Project materials & resource library organized electronically
- Disseminated through JCDHE's Health Education division
- Copied onto thumb drives for Charlie's House health educators

# **PERSONAL REFLECTIONS**

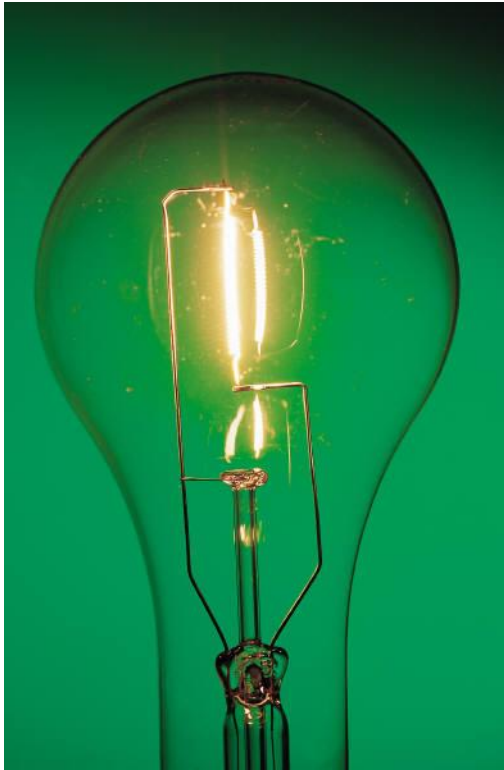
THE GOOD, THE BAD, THE UGLY

# CHALLENGES

- **Gaps in data collection**
  - Local injury surveillance
- **Direction of Charlie's House**
  - Role of education in CIP
  - Home injury interventions
  - Home injury hazards
  - National vs. local

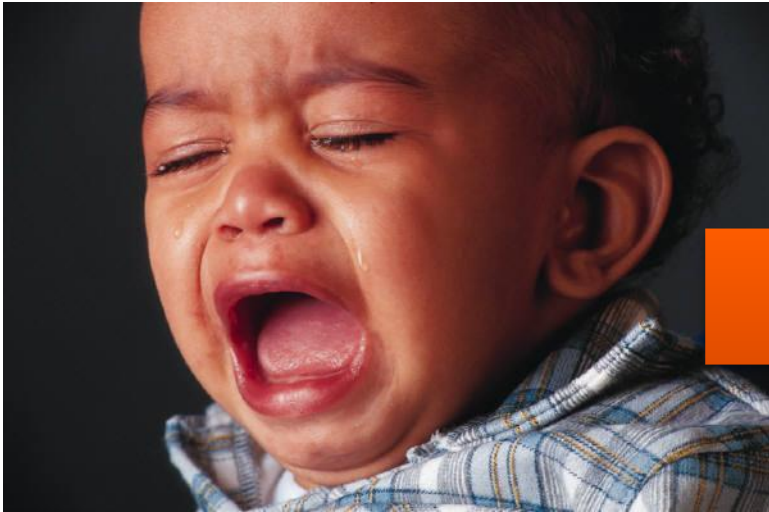


# KNOWLEDGE



- Burden of unintentional childhood injury
- Preventability of unintentional injury
- Worldwide relevance of CIP
- Personal priorities & skills (or lack thereof)
- New interests and opportunities

# OPPORTUNITIES



Evidence + Theory + Communication =  
Successful Interventions

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# QUESTIONS?

