



Collaborative Research
On MEducation use
& family health

MedSMART Families

Promoting Opioid Medication Safety
Among Parents and Teens

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Background

- The COVID-19 pandemic caused record high US drug overdose deaths in 2020^{1,2}
 - Most misused prescription opioid medications are obtained from a family member or friend³
 - 86.3% of intentional opioid exposures occur in the home⁴⁻⁷
 - Parents often model inappropriate prescription opioid use for their teens⁸⁻¹⁰
 - Adolescents have inadequate knowledge and understanding about opioid use and safety¹¹⁻¹³
 - Parents and teens desire innovative interventions to facilitate safe use of opioids and promote communication¹⁴⁻¹⁹
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The Intervention

- MEDSMART Families is a novel intervention
- Utilizes the serious game *MEDSMART: Adventures in PharmaCity*
- Incorporates the use of personalized family medication safety plan (FMSP)
- Facilitates parent-teen communication about medication safety and increases opioid knowledge





MedSMART Families Study Aims

1. Determine parent-child dyads' acceptability of the *MEDSMART Families* intervention.
 2. Evaluate a participatory game-based approach for co-creating personalized family medication safety plans.
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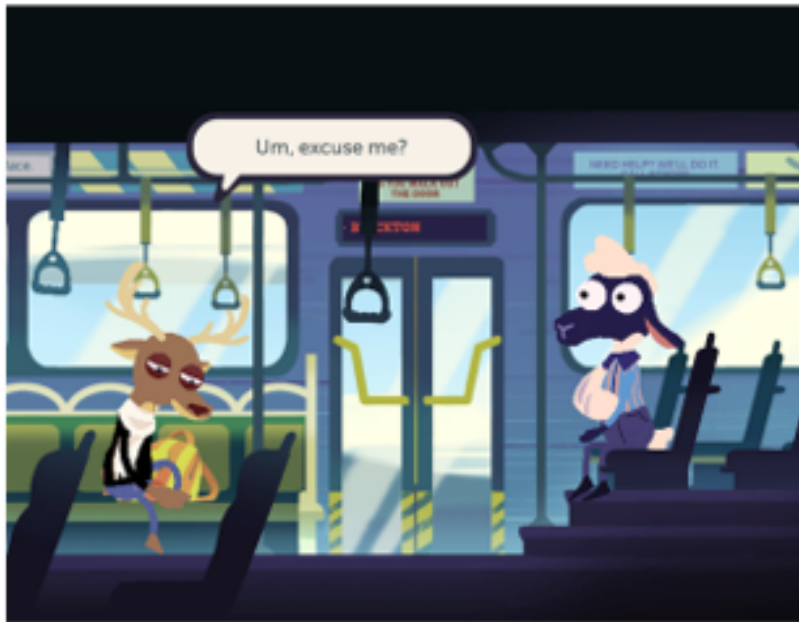
The Game

- Serious game used to increase opioid medication safety knowledge
- Players learn about...
 - Why sharing medications is dangerous
 - Safe storage
 - Safe disposal
 - Naloxone use for overdose





Home



School/city bus



Home neighborhood



School

Family Medication Safety Plan

Medication and Family Information:	Dosage and Instructions					Medication Schedule									
Family member name and age:	Reason for use	Dosage & How to take	Over-the-counter or prescription medicine? 2	Benefits	Potential side effects	Drug-drug interactions 3	Food-drug interactions 4	Scheduled time	Monday	Tuesday	Wednesday	Thursday	Friday	Saturday	Sunday
Medication 1 (Brand name, Generic name): 1								Time:							
Medication 2 (Brand name, Generic name):								Time:							
Medication 3 (Brand name, Generic name):								Time:							
Proper Storage and Disposal	Discuss plans for proper storage and disposal in your home and fill in below														
Where you store your medication															
Instructions for storage of your medication															
Expiration & time for disposal															
Proper disposal techniques 5															
Positive Communication	Discuss positive communication for medication concerns and questions and fill in below														
Questions or concerns about medication															
Who and how to contact for questions about medications															
Name (doctor/pharmacy) : _____															
Phone: _____															
Name (doctor/pharmacy) : _____															
Phone: _____															
Plan for medication use in school															
What to do in case of accidental use or overdose															
<p>1 For example, Advil is the Brand Name of the medication and Ibuprofen is the Generic Name.</p> <p>2 Over the counter medications, or OTCs, are medications that you can buy off the shelf without a prescription.</p> <p>3 For example, one medicine may react with another when taken at the same time.</p> <p>4 For example, mixing alcohol with some drugs may cause you to feel tired or slow your reactions. Other drugs may need to be taken with food.</p> <p>5 The best way to dispose of your expired, unwanted, or unused medicines is at a drug take back site or your local pharmacy. You should not put any medication down the drain.</p>															

Study Design & Recruitment

Participants and Eligibility

- Parents of adolescents aged 12-18
- Adolescents aged 12-18
- Access to a computer and webcam
- Can read, speak and understand English
- Live in the United States

Recruitment

- Research panel
- Social media
- Email listservs
- Snowball sampling
- UW Madison Emergency Department

Data Collection

Part 1:

- Pre-game survey
- 30 minutes of gameplay
- Post-game survey
- Approximately 15-minute Interview

Part 2:

- Parent-child dyads complete the FMSP prior to session
- Approximately an hour interview

Results

- 72 parent-child dyads completed Part 1

- 66 parent-child dyads completed Part 2

Data is still being analyzed

- Provisional data shows...
 - the game was positively received by parents and children
 - the FMSP and the MEDSMAR&T game prompted positive communication about medication safety
 - both parents and children would like to see the intervention in a doctor's office, pharmacy, or school setting

Parent and Child Feedback on MedSMART Families

“I thought it was a really good way to learn about [opioids]...I know how to use medication properly, but I did not realize that you were supposed to put it in a drop box instead of in the garbage. And so it taught me how to dispose of it properly.” -*Child*

“...[the FMSP] would probably be good at, like, a pharmacy, doctor's office, and at schools. I mean, because it could help families keep track of their medicine better.” -*Child*

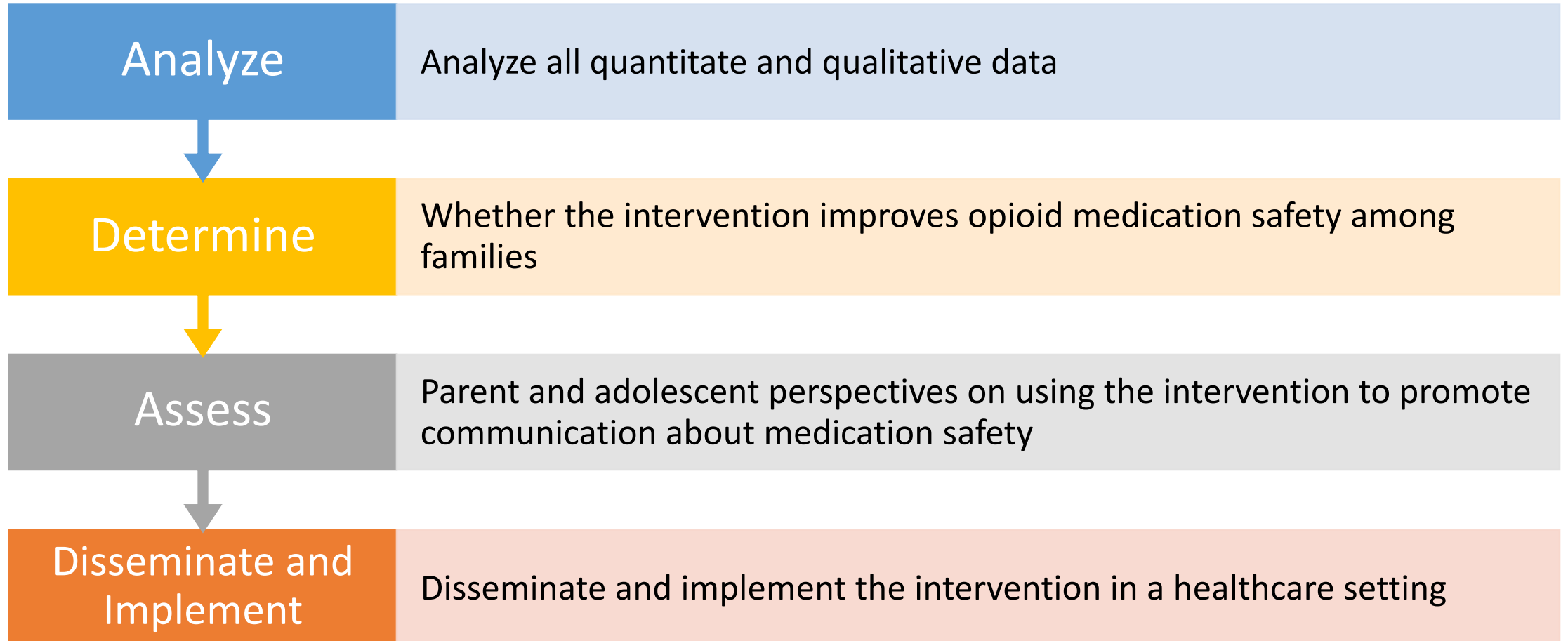
“...perhaps the kid and the parents could play [the game] together, or the parent could watch the child playing it and it could help fill in any missing pieces or answer questions that the kid might have. I think it's a nice way to introduce the topic for a family discussion.” -*Parent*

“So we don't really lock away our prescriptions. We just have them stored in our areas. But that's what these forms got me thinking about is I don't know about all of the prescriptions that are in my home. So how can I say that my current technique and my current method is good?” -*Parent*

MedSMART Game

FMSP

Next steps





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THANK YOU!

Questions?



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