

# EVIDENCE-BASED PROGRAMS: AN OVERVIEW

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**November 9, 2011**

# Purpose of this presentation

2

- Background and definition of ‘evidence-based programs’ (EBPs)
- Share Casey’s work to develop an EBP database
- Challenges of effective EBP implementation
- Share Casey’s process of evidence-building for new innovations

In the past, people believed that no social intervention programs for youth worked reliably. *Today, we know better.*

3

### STATE OF THE ART, CIRCA 1980

Widespread belief that *nothing worked* in public systems

- Analysis of hundreds of programs in corrections found no evidence that any treatment could consistently reduce recidivism.
- Analysis of existing delinquency and substance abuse prevention programs found similar results.
- Symbolic of wider belief that no social intervention programs had positive effects

(Romig, 1978; Martinson, 1974; Lipton, et al, 1975; Janvier et al., 1980; Berleman,, 1979)

### STATE OF THE ART, CIRCA 2011

Strong research that a wide range of programs for children and families can consistently produce better outcomes

- Prenatal & infancy programs
- Early childhood
- Parent training
- School behavior management strategies
- Children's mental health
- Juvenile delinquency and substance abuse prevention
- Community mobilization
- Education
- Public health

# What made the difference?

4

- Clearer understanding of risk and protective factors
- Stronger evaluation methodology & behavior change models
- As a result, more programs tested in controlled trials shown to be effective when implemented with fidelity
- Many evidence based programs are also cost effective
- Increasing government support for evidence-based programs

# Risk and protective factors

5

- Longitudinal studies have identified the predictors (risk factors) of substance abuse, violence, school dropout and other problem behaviors...
- As well as the predictors (protective factors) of positive outcomes like success in school and work.

# Risk factors

Community

Family

School

Individual/Peer

	Substance Abuse	Delinquency	Teen Pregnancy	School Drop-Out	Violence	Depression & Anxiety
<b>Risk Factors</b>						
<b>Community</b>						
Availability of Drugs	✓				✓	
Availability of Firearms			✓		✓	
Community Laws and Norms Favorable Toward Drug Use, Firearms, and Crime	✓	✓			✓	
Media Portrayals	✓				✓	
Transitions and Mobility	✓	✓		✓		✓
Low Neighborhood Attachment and Community Disorganization	✓	✓			✓	
Extreme Economic Deprivation	✓	✓	✓	✓	✓	
<b>Family</b>						
Family History of the Problem Behavior	✓	✓	✓	✓	✓	✓
Family Management Problems	✓	✓	✓	✓	✓	✓
Family Conflict	✓	✓	✓	✓	✓	✓
Favorable Parental Attitudes and Involvement in the Problem Behavior	✓	✓			✓	
<b>School</b>						
Academic Failure Beginning in Late Elementary School	✓	✓	✓	✓	✓	✓
Lack of Commitment to School	✓	✓	✓	✓	✓	
<b>Individual/Peer</b>						
Early and Persistent Antisocial Behavior	✓	✓	✓	✓	✓	✓
Alienation and Rebelliousness	✓	✓		✓		
Friends Who Engage in the Problem Behavior	✓	✓	✓	✓	✓	
Favorable Attitudes Toward the Problem Behavior	✓	✓	✓	✓		
Early Initiation of the Problem Behavior	✓	✓	✓	✓	✓	
Constitutional Factors	✓	✓			✓	✓

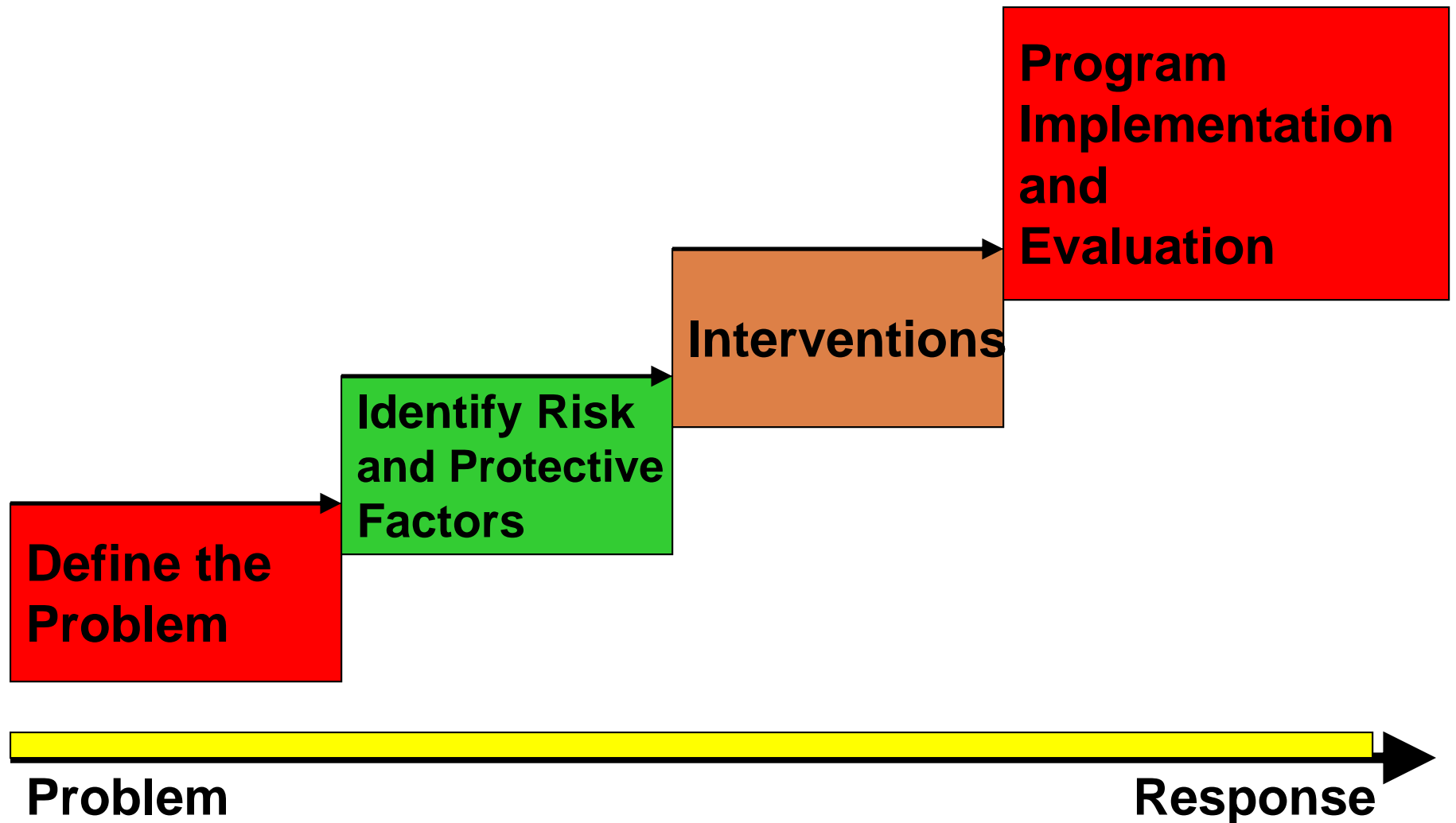
# Protective factors can help predict positive outcomes

7

- Individual Characteristics
  - High Intelligence
  - Resilient Temperament
  - Competencies and Skills
  
- In each social domain (family, school, peer group and neighborhood)
  - Prosocial Opportunities
  - Reinforcement for Prosocial Involvement
  - Bonding
  - Healthy Beliefs and Clear Standards

# Prevention science framework for program development

8



# What are Evidence-Based Programs/ Practices (EBPs)?

9

Approaches to prevention or treatment that are based in theory and have undergone scientific evaluation. “Evidence-based” stands in contrast to approaches that are based on tradition, convention, belief, or anecdotal evidence.

*- National Registry of Evidence-based Programs and Practices (NREPP)*

# Why evidence-based programs?

10

- Stronger & more consistent positive outcomes
- Strong ethical argument – avoid potential harmful effects
- Potential cost savings to taxpayers and society
- Improving the well-being of our children at a population level

# Evidence Based Program Examples

11

Program	Age Group	Target Group/Outcomes	Return on Investment (per dollar spent)*
<b>Incredible Years (Parent + Child)</b>	2-4 years	All children at risk of behavior problems ≈ 30% Improved behavior, academics, delinquency	\$7.50
<b>Promoting Alternative Thinking Strategies</b>	5-10 years	ALL Improved behavior, academics, emotional regulation	\$13.04
<b>Life Skills Training</b>	10-14 years	ALL Reduced substance abuse, violence, risky driving	\$42.13
<b>Functional Family Therapy (FFT)</b>	10-16 years	Young people at risk of detention Reduced substance abuse, recidivism, improved mental health	\$11.86
<b>Nurse Family Partnership (NFP)</b>	14-19 years	Pregnant girls and young women Improved prenatal health. Fewer childhood injuries, improved school readiness	\$3.23

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# Prevention Research & Implementation: Agenda for the Next 20 Years

12

- Make EBPs accessible to policymakers, public systems, schools, practitioners, and communities
- Research to understand how to increase use of EBPs with fidelity to become standard of practice
- Choosing appropriate programs based on local need
- Support for moving new practice innovations to evidence based programs

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13

- Detail background and definition of ‘evidence-based programs’
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# Federal Program Lists of Evidence Based Programs and Practices

14

- Center for Mental Health Services (2000)
- National Registry (NREPP) (2002)
- Office of Safe & Drug Free Schools (2001)
- Blueprints for Violence Prevention (2007)
- National Institute of Drug Abuse (2003)
- Surgeon General Report (2001)
- Helping America's Youth (2007)
- OJJDP Title V (2007)

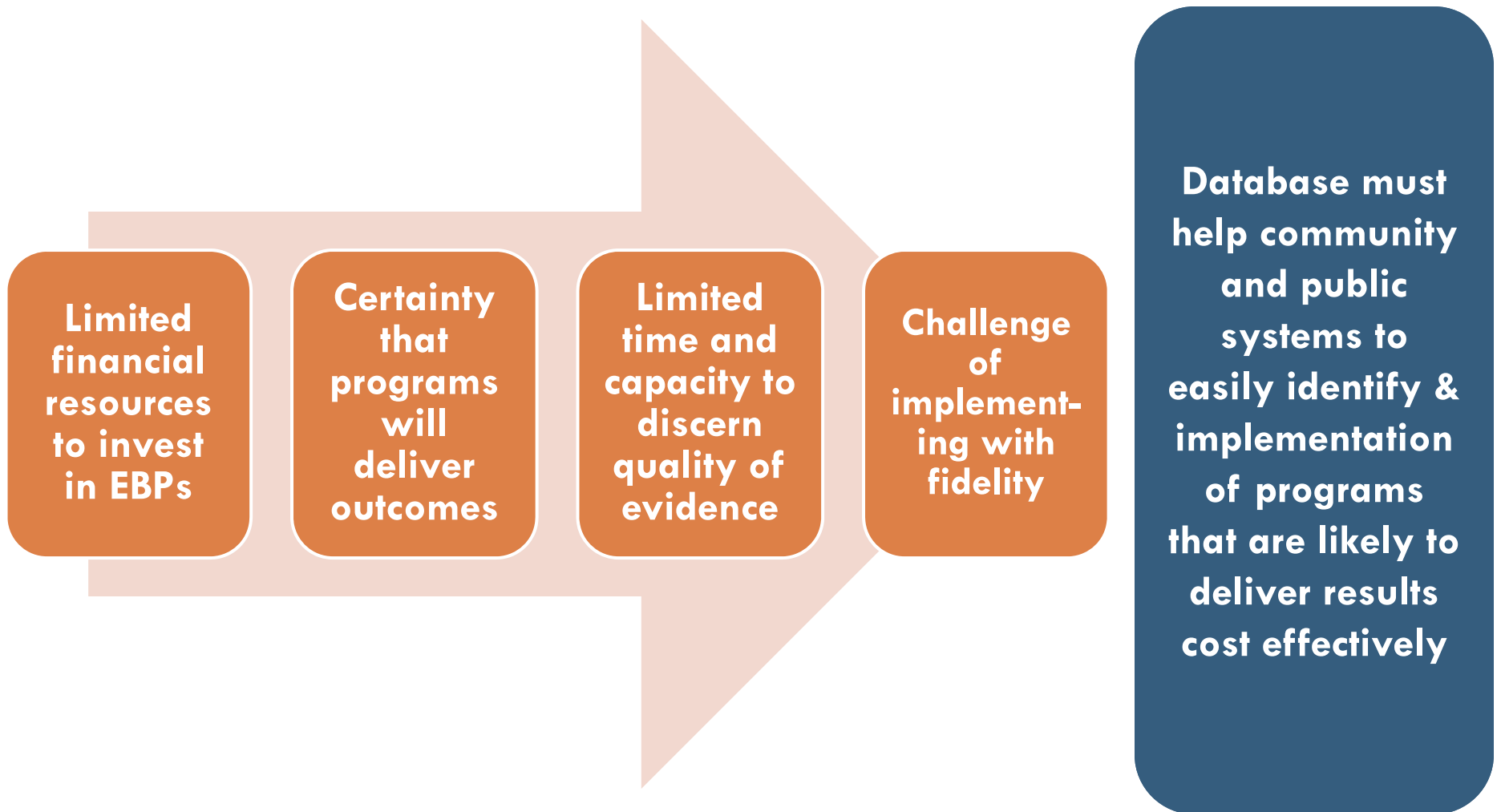
# Issues with existing databases

15

- No program appeared on all lists
  - ▣ Only one program (LST) appeared on 7 of 8 federal lists as a program with best evidence for effectiveness
  - ▣ Two programs were on at least five lists: Multisystemic Therapy & Towards No Drug Abuse
  
- Usefulness of information for consumers is variable
  
- Often just program descriptions with unclear databases with implementation

# Our first step was to understand community and public system needs and limitations

16



# What is the Casey Evidence-Based Program Database?

17

A tool that can be used by communities and public systems to select evidence-based programs that have the greatest likelihood of improving child and youth developmental outcomes, reducing their risk and boosting their protective factors.

# The database includes programs that meet specific standards in four areas

18

## **IMPACT**

- Positive impact on an child well-being outcomes  
(education, behavior, emotional well-being, positive relationships, physical health)
- Absence of any negative effects

## **EVALUATION QUALITY**

- One randomized controlled trial OR a quasi-experimental trial without design flaws

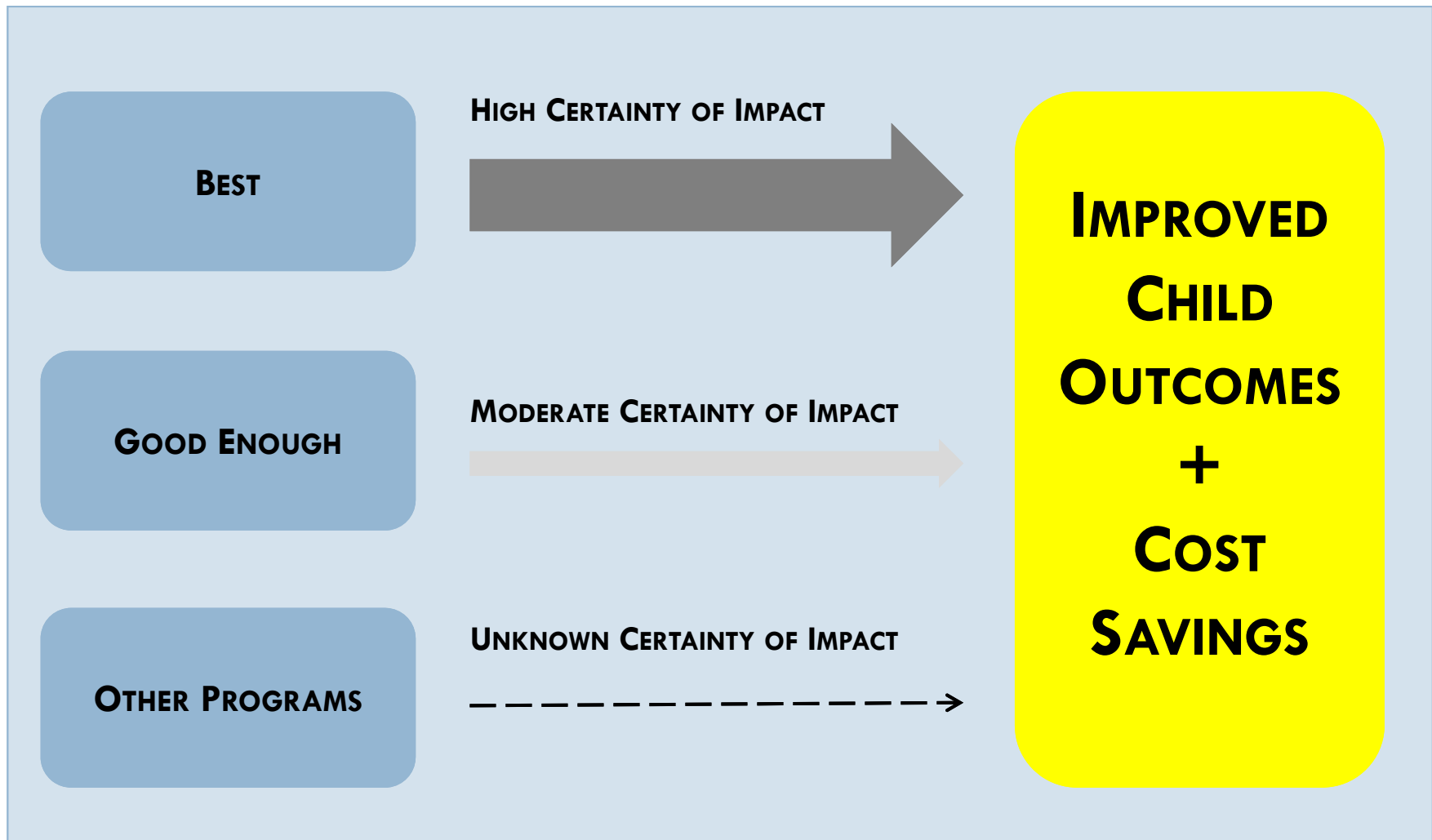
## **INTERVENTION SPECIFICITY**

- Population of focus is clearly defined
- Risk and protective factors that program seeks to change are identifiable

## **AGENCY READINESS**

- Training materials are available
- Information on the financial and human resources required
- Cost-benefit analysis

Investing in evidence-based programs offer higher certainty of achieving the intended impact on child outcomes *when implemented with fidelity*



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20

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# Achieving take-up of EBPs has been a major challenge

21

- **Prevention approaches that do not work or have not been evaluated have been more widely used than those shown to be effective.**

(Gottfredson et al 2000, Hallfors et al 2000, Hantman et al 2000, Mendel et al 2000, Silvia et al 1997; Smith et al 2002; Ringwalt et al., 2002; 2010)

# Challenges to EBP implementation and dissemination

22

- Delivering programs with fidelity requires training, technical assistance, and monitoring
- Integrating EBPs with mission, schedule of services, staff competencies of public agencies
- Adaptation to diverse cultures and different languages
- Competing for limited funds with “best,” usual, or new untested programs

# What boosts implementation fidelity?

23

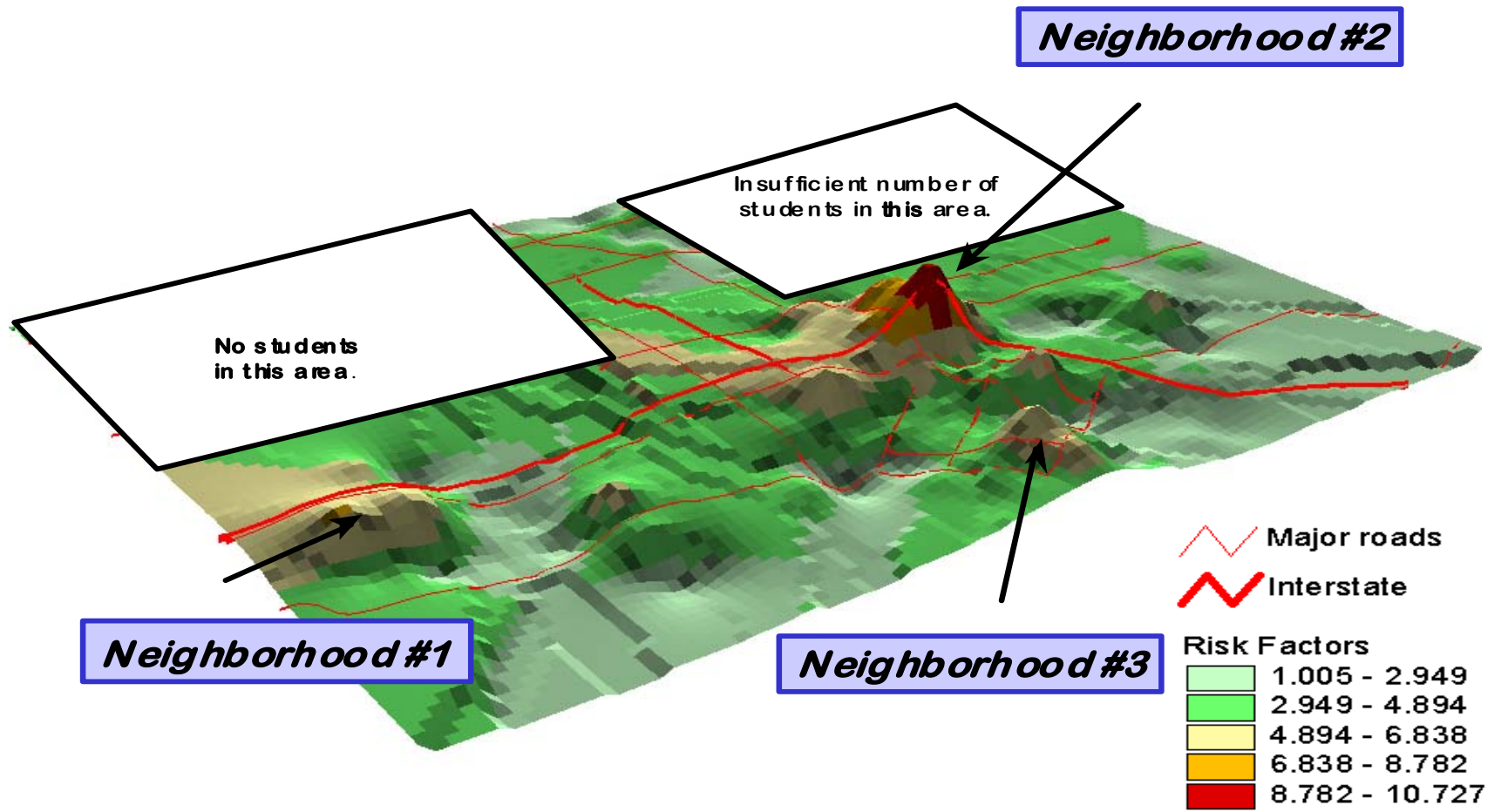
- Published material including manuals, guides, curricula
- Certification of trainers
- High quality, readily available technical assistance
- Dissemination organization committed to distribution and delivery of tested program
- Data monitoring system to provide feedback on implementation fidelity and outcomes

# Choosing Appropriate Programs Based on Local Need

# Why a Place Based Approach?

## Communities Vary in Risk Exposure

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# An additional challenge

26

**How can we increase use of tested and effective prevention policies and programs...**

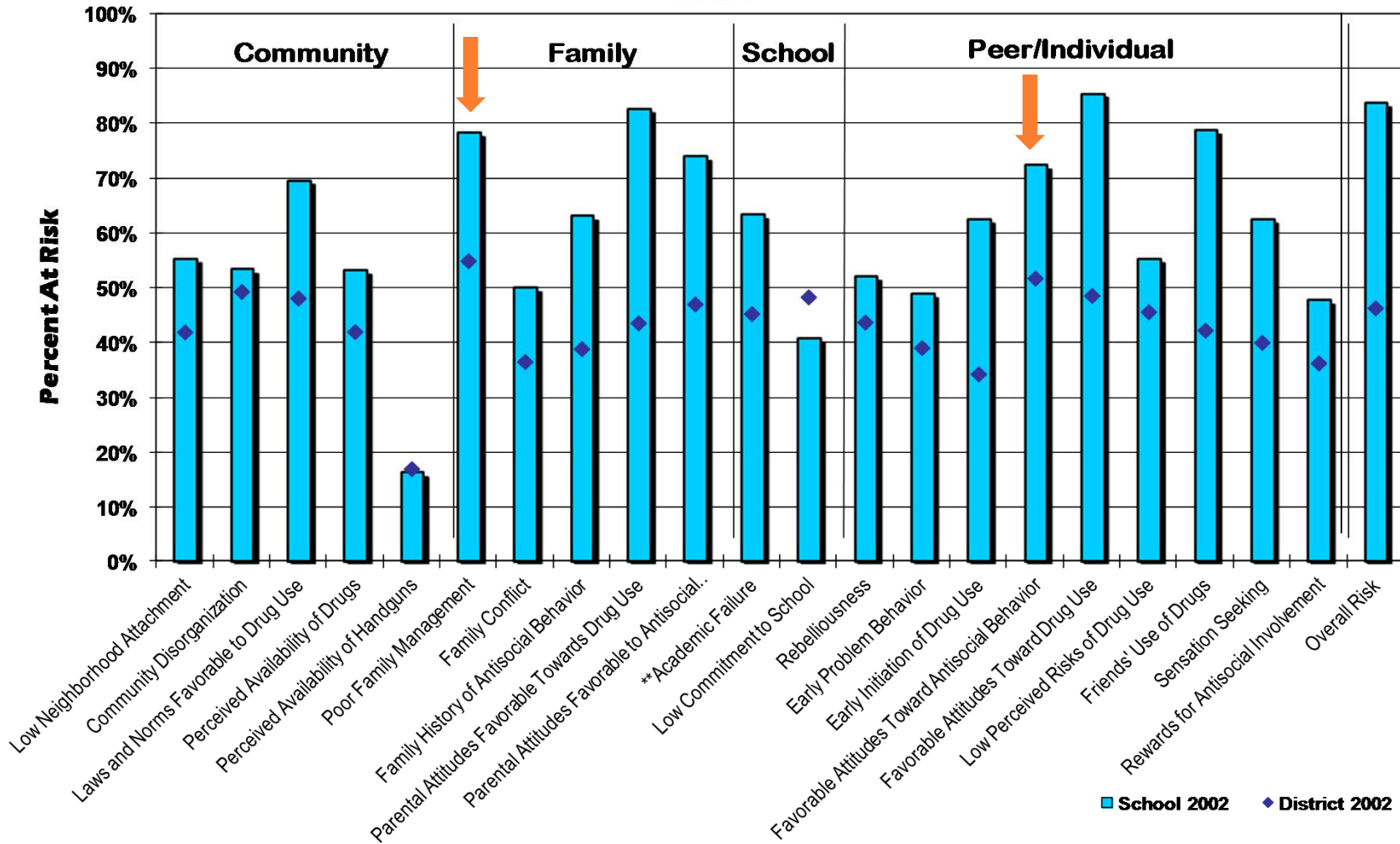
**AND**

**Recognize that communities are different and may need to decide locally what programs they use?**

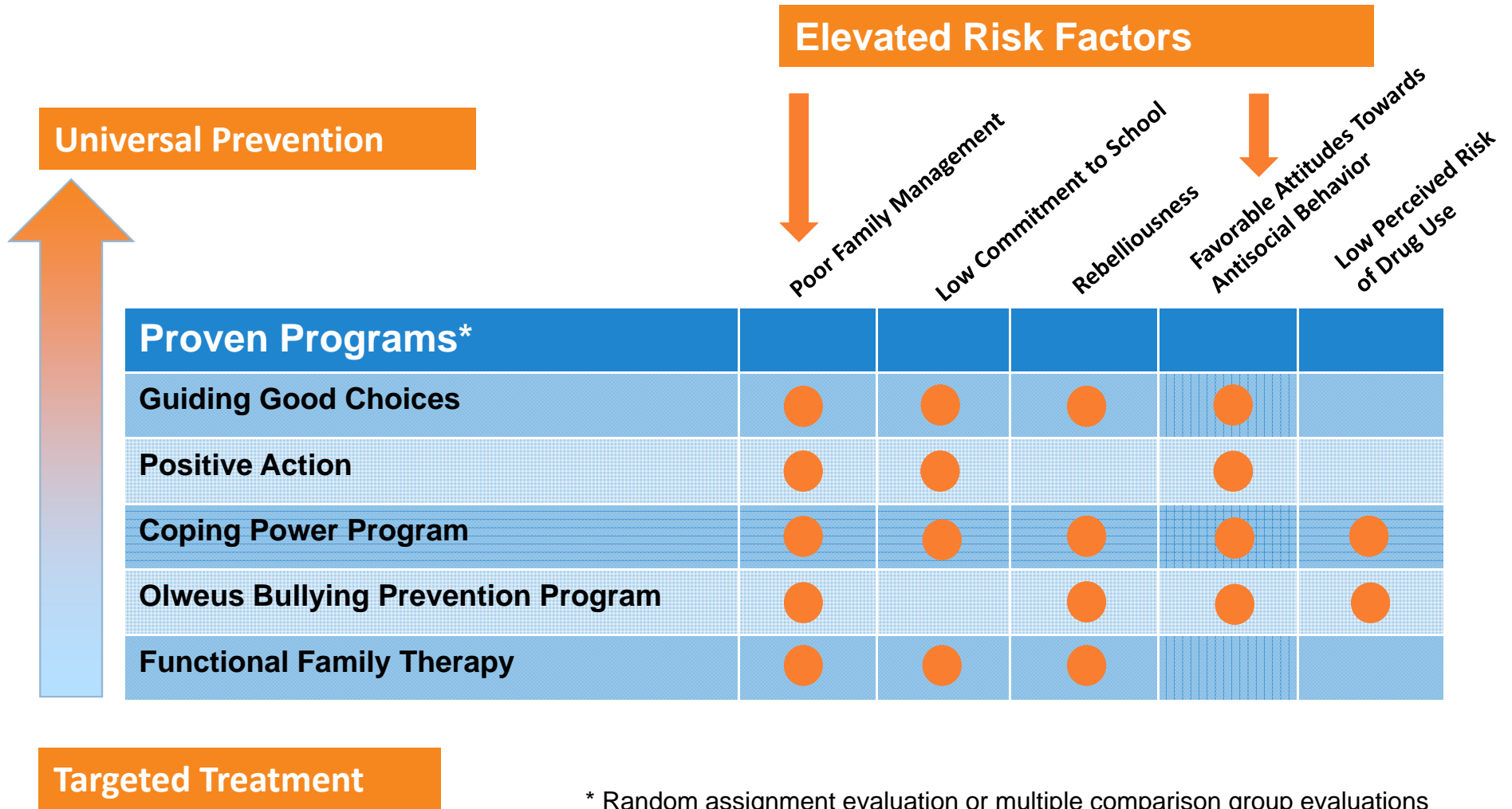
# Surveys can assess local need

## Sample Risk Factor Profile (Communities that Care Survey)

2002



# Children's needs and strengths can be matched to the program database



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29

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# A major concern about evidence-based program development

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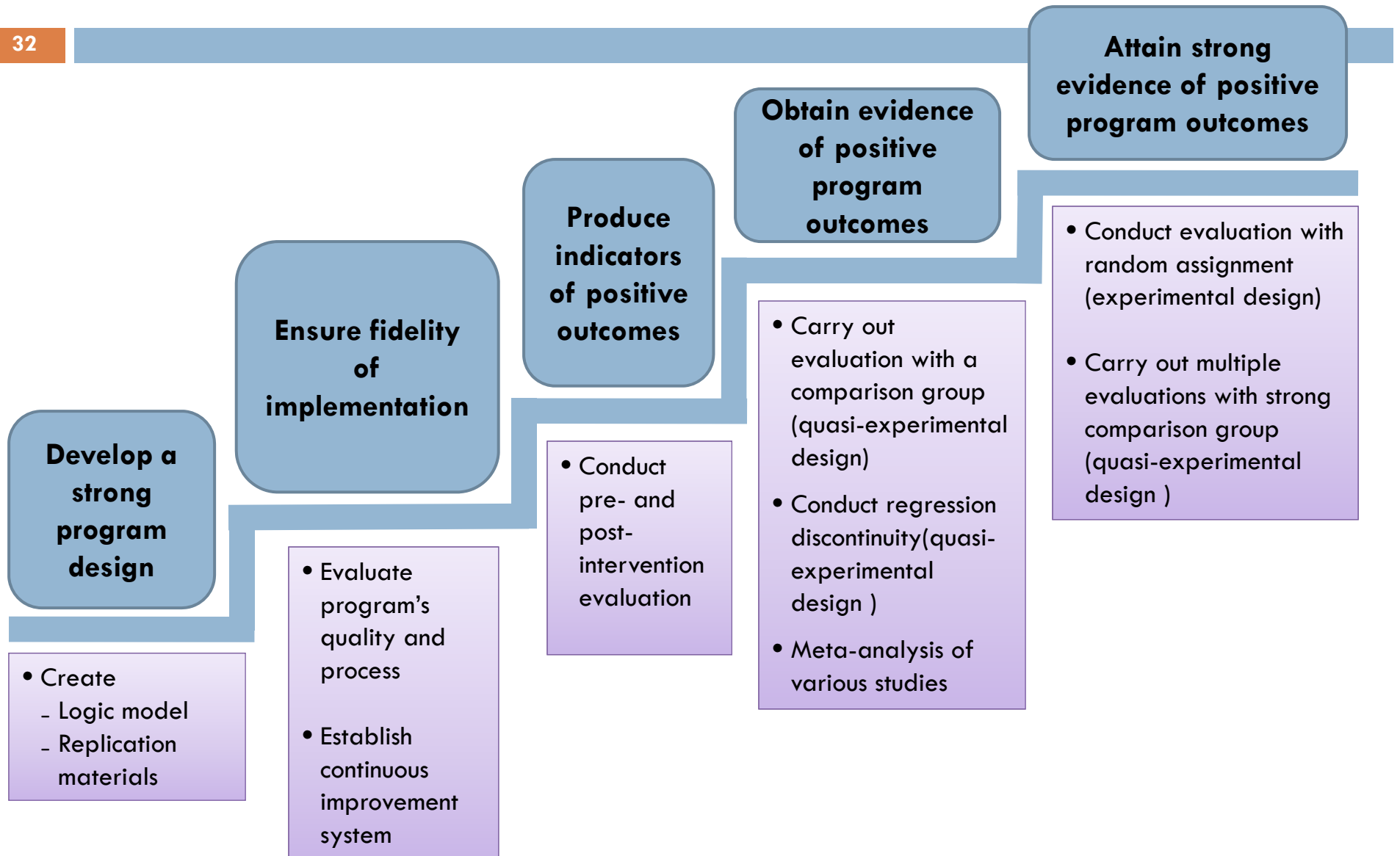
# Annie E. Casey Foundation: Looking at EBPs through a wide lens

31

- There are several stages of program development that lead to the establishment of an evidence-based program
- This design continuum starts with a strong program design and basic pre-post testing and evolves to the highest levels of rigor via quasi-experimental and experimental studies
- Casey is assisting new and existing innovations to become evidence based programs

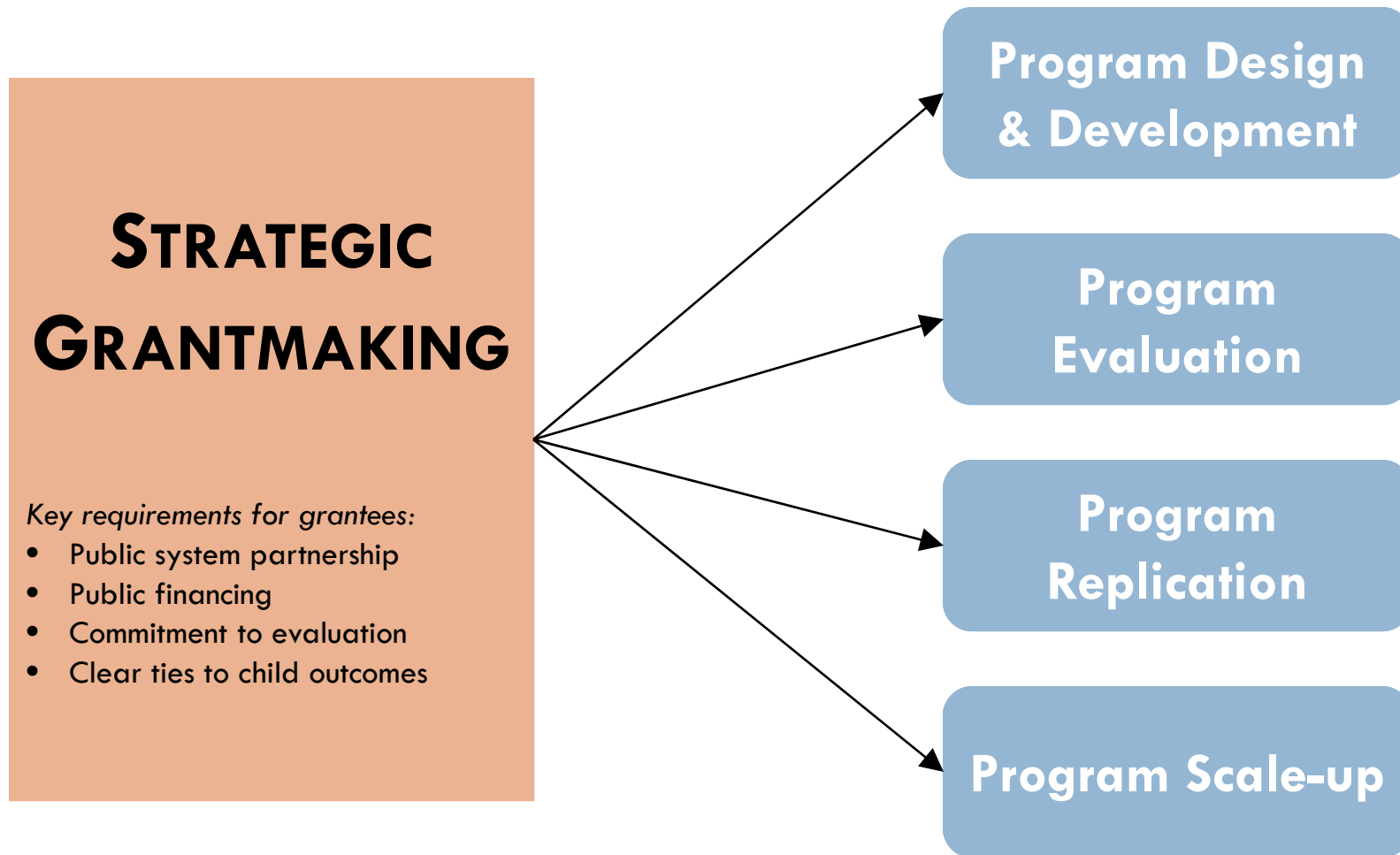
# There is a process for building certainty that a program works for children and families

32



# Our grantmaking works to increase the supply and utilization of evidence-based programs

33



# Questions?