Positive Youth Development
History, Effectiveness and Future Directions

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The Coalition for the Promotion of Behavioral Health
Objectives

- Describe the history of Positive Youth Development (PYD) in the U.S.
- Describe a set of PYD concepts
- Describe the impact of PYD programs on delinquency, substance use and other problems
- Provide an extended example of one PYD program
- Recommend next steps for PYD research
History of Positive Youth Development Programs: United States Experience

- Early 1900’s: Adolescence emerges as a distinct stage of development
- Service programs, YM(W)CA, Scouting, 4H, Boys and Girls Clubs develop; secondary education extended to be more universal; Federal grants to states for child welfare
- 1950’s: Juvenile crime intervention and treatment programs first supported by government
- 1950-1970: Treatment programs for adolescents expand to substance use, conduct disorder, academic failure, pregnancy
- Mid 1960’s-mid 1970’s: Prevention programs focused on a single problem begin to be developed; most ineffective
- Mid 1970’s-1980’s: Prevention programs focus on precursors of a single problem, some successes occur
- Late 1980’s-early 1990’s: Critiques begin of single problem approach to prevention
Positive Youth Development (PYD) Critiques of Single Problem Behavior Focus of Early Prevention Programs

Practitioners and Policy Makers
- Focus on single problems ignores the whole child.
- Focus on the individual and downplays the role of the environment.
- Developmental needs and competencies ignored.
- Problem-free does not mean fully prepared or healthy.
- Separates promotion from prevention.

Prevention Scientists
- Overlapping risk and protective factors predict diverse problems.
- Risk and protective factors located in both individual and environment.
- Developmental needs, processes and competencies ignored.
- Protective factors often not addressed.
Recommendations for a Broader Conception of Youth Development

Practitioners/Policy Makers
- Focus on whole child
- Focus on developmental needs and challenges.
- Focus on the individual as well as the environment.
- Address cultural competence in program delivery
- Include promotion and prevention.

Prevention Scientists
- Address risk and protective factors for multiple problems
- Address risk and protective factors salient during critical developmental periods
- Engage multiple socialization units.
- Understand the developmental epidemiology of the target population.
- Include those at greatest risk.
Convergence in critiques and recommendations led US. Department of Health and Human Services to commission the first review of youth development program efficacy (Catalano et al., 1998)
Positive Youth Development Concepts

- Reviewed literature that described the youth development approach
- Identified concepts being discussed to define this developing field
- Augmented through subsequent national and international reviews eg., Annenberg-Sunnylands Task Force on PYD (Seligman, Berkowitz, Catalano et al., 2005; Markham et al., 2010; Catalano, Toumbourou, & Hawkins, 2014; )
Positive Youth Development

**Concepts**

- Social, emotional, behavioral, cognitive and moral competence
- Self-efficacy
- Opportunities for positive social involvement
- Recognition for positive behavior
- Bonding
- Positive norms
- Belief in the future
- Spirituality
- Clear and positive identity
- Self-determination
- Resiliency

Catalano et al., 1998; 2002;
Seligman, Berkowitz, Catalano et al., 2005;
Shek et al., 2007; Markham et al., 2010;
Catalano, Toumbourou & Hawkins, 2014

Gavin, Catalano, David-Ferdon, Gloppen, Markham, 2010. *A review of positive youth development programs that promote adolescent sexual and reproductive health.* Journal of Adolescent Health, 46 (3 Suppl. 1)*

*Sponsored by Centers for Disease Control and Prevention*
PYD Program Review
Inclusion Criteria

- Promotive approach directed at youth aged 0-20
- Address positive youth development constructs
- Comprehensive (multiple PYD concepts or socialization contexts targeted)
- Strong evaluation
- Demonstrate behavioral outcomes on either (or both) positive or problem behavior
Review Methods

- Electronic search of online databases plus review of grey literature (1985-2007)

- Identified studies were summarized using a standard review form

- Each summary prepared independently by two reviewers who then met to reach consensus

- Program summaries were confirmed by original program developers (70%)
Review Results

1998-25 of 77 PYD Program for children 6-20 that met the PYD inclusion criteria had evidence of effectiveness (Catalano et al., 1998)

2010-15 of 30 PYD Programs for children 0-20 that met the inclusion criteria and evidence of impact on Sexual and Reproductive Health (Gavin, Catalano et al., 2010)
Inclusion Criteria for this Presentation

- Found to be effective in the two reviews (38 total programs)
- Focus on those that had impact on Substance Use and/or Antisocial Behavior with mention other outcomes (20 efficacious programs from the two reviews)
**Effective Programs Pre-School**

<table>
<thead>
<tr>
<th>PYD Program</th>
<th>Substance Use, Delinquency outcomes</th>
<th>Other outcomes</th>
</tr>
</thead>
<tbody>
<tr>
<td>Abecedarian Project</td>
<td>Substance use</td>
<td>Academic achievement, employment, teen birth</td>
</tr>
<tr>
<td>(Campbell, Ramey et al., 2002)</td>
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<tr>
<td>High/Scope Perry Preschool</td>
<td>Crime, substance use</td>
<td>Academic achievement, family relationships, teen pregnancy, employment</td>
</tr>
<tr>
<td>(Schweinhart et al., 1992, 2005)</td>
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</tbody>
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## Effective Programs

### Elementary School Age

<table>
<thead>
<tr>
<th>PYD Program</th>
<th>Substance Use, Delinquency outcomes</th>
<th>Other outcomes</th>
</tr>
</thead>
<tbody>
<tr>
<td>Seattle Social Development Project (Hawkins et al., 1999; Lonczak, Hawkins et al., 2005; 2008)</td>
<td>Crime/delinquency, heavy alcohol use, violence</td>
<td>Academic achievement, High school graduation, ever sex, # of partners, delayed initiation, STI, pregnancy or birth, mental health diagnoses</td>
</tr>
<tr>
<td>Know Your Body (Walter, Vaughan and Wynder, 1989)</td>
<td>Smoking initiation</td>
<td>Healthy diet</td>
</tr>
<tr>
<td>Promoting Alternative Thinking Strategies (PATHS) (Greenberg, 1996; Greenberg &amp; Kusche, 1997)</td>
<td>Externalizing behaviors, conduct problems</td>
<td>Internalizing behaviors</td>
</tr>
</tbody>
</table>
## Effective Programs Middle School Age

<table>
<thead>
<tr>
<th>PYD Program</th>
<th>Substance Use, Delinquency outcomes</th>
<th>Other outcomes</th>
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</thead>
<tbody>
<tr>
<td>Aban Aya – SCI (Flay et al., 2004)</td>
<td>Violence, school delinquency, substance use</td>
<td>Recent sex, condom use</td>
</tr>
<tr>
<td>Gatehouse Project (Patton et al., 2006)</td>
<td>Substance use, antisocial behavior</td>
<td>Ever sex</td>
</tr>
<tr>
<td>Reach for Health (O’Donnell et al., 1998, 2002)</td>
<td>Violence</td>
<td>Recent sex, ever sex</td>
</tr>
<tr>
<td>PYD Program</td>
<td>Substance Use, Delinquency outcomes</td>
<td>Other outcomes</td>
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<td>-------------------------------------------------</td>
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<tr>
<td>Big Brothers/Big Sisters (Tierney, Grossman &amp; Resch, 1995)</td>
<td>Drug use, hitting, skipped class</td>
<td>Academic competence in subpopulations</td>
</tr>
<tr>
<td>Bicultural Competence Skills (Schinke, Botvin et al, 1988)</td>
<td>Alcohol, marijuana, inhalants</td>
<td>Self control</td>
</tr>
<tr>
<td>The Social Competence Program for Young Adolescents (Weissberg &amp; Caplan, 1998; and Caplan et al., 1992)</td>
<td>Minor delinquency</td>
<td>Positive behavior</td>
</tr>
<tr>
<td>The Midwestern Prevention Project – Project STAR – Kansas (MPP) (Pentz et al., 1994; Pentz et al., 1989; Pentz, et al., 1990)</td>
<td>Smoking, marijuana, and alcohol use</td>
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<tr>
<td>PYD Program</td>
<td>Substance Use, Delinquency outcomes</td>
<td>Other outcomes</td>
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<tr>
<td>Staying Connected with Your Teen (Haggerty et al., 2007)</td>
<td>Substance use, violence</td>
<td>Ever sex</td>
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<tr>
<td>New Beginnings (Wolchik, Sandler et al., 2002, 2007)</td>
<td>Substance use</td>
<td>Mental health, # of sex partners</td>
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## Effective Programs Middle – High School Age

<table>
<thead>
<tr>
<th>PYD Program</th>
<th>Substance Use, Delinquency outcomes</th>
<th>Other outcomes</th>
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<tbody>
<tr>
<td>Adolescent Sibling Pregnancy Prevention</td>
<td>Substance use</td>
<td>Ever sex, pregnancy, condom use, school truancy</td>
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<tr>
<td>(East et al., 2003)</td>
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<tr>
<td>Woodrock Youth Development Project</td>
<td>Substance use</td>
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<tr>
<td>(LoSciuto et al., 1997)</td>
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<tr>
<td>Project Northland</td>
<td>Alcohol use</td>
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<tr>
<td>(Perry et al., 1996)</td>
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<tr>
<td>Familias Unidas</td>
<td>Substance use</td>
<td>STI, unprotected sex</td>
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<td>(Prado et al., 2007)</td>
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Seattle Social Development Project

An Example PYD Program

Focused on family and school environments

Addressed PYD concepts and risk factors

With long term effects on adolescent and young adult development and prevention of multiple problems
Seattle Social Development Project using the Raising Healthy Children Intervention in Primary Grades

Funded by:
National Institute on Drug Abuse, Office of Juvenile Justice and Delinquency Prevention,
Robert Woods Johnson Foundation, National Institute on Alcoholism and Alcohol Abuse,
National Institute on Mental Health, Burlington Northern Foundation, Seattle Public Schools

PI’s
J. David Hawkins   Richard Catalano   Jennifer Bailey
Rick Kosterman   Karl G. Hill

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National Institute on Mental Health, Burlington Northern Foundation, Seattle Public Schools
What is our Approach to Positive Youth Development?

1. Universally delivered in schools and families among populations that include those exposed to multiple risk factors

2. Utilizes theory (Social Development Model) to build protection and reduce risk

3. Focuses on middle childhood

4. Develops partnerships with parents, schools, and researchers
Why Universally Delivered?

Prevention Paradox and Public Health
(Rose, 1981)

- The majority of cases of a complex disorder come from a population at low or moderate risk (genetic or environmental) for that disorder; only a minority of cases come from the high-risk population.

- If Promoting Positive Youth Development is to have a public health effect, deliver universally not just to those at high risk.
Ensure that Universal Intervention also Promotes Equity

Implement universal preventive interventions in communities that include vulnerable populations (poverty, low education, people of color) and examine results among subpopulations.

(Frolich and Potvin, 2008)
SSDP Sample: Gender, Ethnicity & SES

Poverty: Eligible for free/reduced lunch (5th, 6th or 7th grades)
SSDP-Design

- Quasi-experimental study with three conditions reported here
  - Full treatment (grades 1-6) = 149
  - Late treatment (grades 5-6) = 243
  - Control = 206
Positive Youth Development

Concepts

- Social, emotional, behavioral, cognitive and moral competence
- Self-efficacy
- Opportunities for positive social involvement
- Recognition for positive behavior
- Bonding
- Positive norms
- Belief in the future
- Spirituality
- Self-determination
- Clear and positive identity
- Resiliency
- Positive emotions
- Life satisfaction

x=addressed by SSDP intervention
### Risk Factors

<table>
<thead>
<tr>
<th>Family History of the Problem Behavior</th>
<th>Teen Pregnancy</th>
<th>School Drop-Out</th>
<th>Depression &amp; Anxiety</th>
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<th>Family Management Problems</th>
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<th>Family Conflict</th>
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<th>Favorable Parental Attitudes and Involvement in the Problem Behavior</th>
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<tr>
<th>School Academic Failure Beginning in Late Elementary School</th>
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<th>Lack of Commitment to School</th>
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<th>Individual/Peer Early and Persistent Antisocial Behavior</th>
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<th>Alienation and Rebelliousness</th>
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<th>Friends Who Engage in the Problem Behavior</th>
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<th>Favorable Attitudes Toward the Problem Behavior</th>
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<th>Early Initiation of the Problem Behavior</th>
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<th>Constitutional Factors</th>
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The Social Development Model

Promotion Path
The Social Development Model

Promotive and Risk paths
The Social Development Model

Promotive and Risk paths
Intervention Opportunities

**Intervention**

- **Prosocial opportunities**
- **Prosocial involvement**
- **Prosocial rewards**
- **Bonding to prosocial others**
- **Clear & Healthy Standards**
- **Positive Behavior**
- **Problem Behavior**

**External constraints:**
- Norms
- Family & Classroom Management

**Position in the social structure:**
- Race, SES, age, gender

**Individual constitutional factors**

**Antisocial opportunities**
- **Antisocial involvement**
- **Antisocial rewards**
- **Bonding to antisocial others**
- **Antisocial values**

**Skills for interaction**

**PROSOCIAL PATH**

**ANTISOCIAL PATH**

(+)  (-)  (+,-)
Intervention Components

- Component One: *Teacher Training in Classroom Instruction and Management*
- Component Two: *Parent Training in Behavior Management and Academic Support*
- Component Three: *Child Social, Emotional and Cognitive Skill Development*
SSDP Changed Risk, Protection and Outcomes

At the end of the 2nd grade
- boys less aggressive
- girls less self-destructive

By the start of 5th grade, those in the full intervention had
- less initiation of alcohol
- less initiation of delinquency
- better family management
- better family communication
- better family involvement
- higher attachment to family
- higher school rewards
- higher school bonding

By age 18 Youths in the Full Intervention had
- less heavy alcohol use
- less initiation of delinquency

By age 27, significant effects were found on educational and occupational outcomes:
- more high school graduates
- more attending college
- more employed
- better emotional and mental health
- fewer with a criminal record
- less drug selling
- less co-morbid diagnosis of substance abuse and mental health disorder

By age 27, significant effects were found on mental health and risky sexual activity:
- above median on SES attainment index
- fewer mental health disorders and symptoms
- fewer lifetime sexually transmitted diseases
- less co-morbid diagnosis of substance abuse and mental health disorder

Effects by End of Grade 6: California Achievement Test Scores

* p<.05 compared with controls; N = 548 to 551.
SSDP: Age 24 and 27 Proportion Who Met Diagnostic Criteria for Generalized Anxiety, Social Phobia, Major Depression, or Post Traumatic Stress Disorder

* p < .05

Hawkins et al., 2008
SSDP Eliminated Disparities in Sexually Transmitted Infections

Sig. Tx X Ethnicity Interaction on STI onset, p < 0.0401

Hill et al., 2013
An independent cost-benefit analysis estimated that projected benefits resulting from the SSDP intervention would produce a net positive return per participant.
Can an PYD Program Delivered in Childhood Have an Intergenerational Effect?

Intergenerational positive developmental cascade model

Preventive Intervention

G1 Reduced Environmental Risk & Enhanced Protection

G2 Reduced Environmental Risk & Enhanced Protection

G2 Reduced Risk Behavior, more Prosocial Outcomes

Improved G2 Child Functioning

Good self-regulation  Good cognitive functioning  Good Social Functioning

Family  Neighborhood  School  Peer

Improved G3 Child Functioning

Good self-regulation  Good cognitive functioning  Good Social Functioning

Family  Neighborhood  School  Peer

Can an PYD Program Delivered in Childhood Have an Intergenerational Effect?
Improved G3 Child Functioning

Good self-regulation
Good cognitive functioning
Good Social Functioning

Intergenerational positive developmental cascade model

Preventive Intervention

Might social development intervention in childhood affect functioning in the next generation?

Three major capabilities that, if mastered, get children started along adaptive pathways.

(IOM: Shonkoff & Phillips, 2000)
Parents who were in the SSDP intervention in childhood grow up to have children with... fewer developmental delays in the first five years of life.

% of children with no developmental delay averaged across waves

- **control**
- **intervention**

FDR corrected significance level to address multiple testing.

+ p < .10
* p < .05
** p < .01
Parents who were in the SSDP intervention in childhood grow up to have children with... fewer teacher-rated child behavior problems ages 6-18 years.

Standardized problem behavior score averaged across 7 waves

FDR corrected significance level to address multiple testing.

+ p < .10
* p < .05
** p < .01
Parents who were in the SSDP intervention in childhood grow up to have children with....

...higher teacher-rated **academic skills and performance** ages 6-18 years.

![Bar chart showing academic skills and performance across different categories.](chart.png)

FDR corrected significance level to address multiple testing.

- + p < .10
- * p < .05
- ** p < .01

- control
- treatment

Academic Skills and Performance Averaged Across 7 Waves

<table>
<thead>
<tr>
<th>Category</th>
<th>Control</th>
<th>Treatment</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cognitive skills</td>
<td>3.47</td>
<td>3.77</td>
</tr>
<tr>
<td>Academic skills</td>
<td>3.59</td>
<td>3.89</td>
</tr>
<tr>
<td>Relative academic performance</td>
<td>3.03</td>
<td>3.22</td>
</tr>
<tr>
<td>Grades</td>
<td>2.63</td>
<td>2.86</td>
</tr>
<tr>
<td>Emotional skills</td>
<td>3.67</td>
<td>4.1*</td>
</tr>
<tr>
<td>No School Problems</td>
<td>39.70%</td>
<td>46.00%</td>
</tr>
</tbody>
</table>
Parents who were in the SSDP intervention in childhood grow up to have children with...

...lower youth self-reported alcohol and drug onset ages 6-18 years.

FDR corrected significance level to address multiple testing.

+ p < .10
* p < .05
** p < .01
Conclusions from The Intergenerational Project Effects

- Effects of participation in a universal preventive intervention in elementary school may cascade across generations.
Characteristics of Youth Served by Effective PYD Programs

Most programs:
- targeted youth exposed to multiple risk factors
- were delivered to mixed gender groups of youth
- Were delivered to a mixed race/ethnic groups
  - a third delivered to a single race/ethnic group including African American, Latino, Native American and White

...
# Results: PYD Concepts Addressed in Efficacious Programs

<table>
<thead>
<tr>
<th># programs</th>
<th>PYD Concepts</th>
</tr>
</thead>
<tbody>
<tr>
<td>Half or more</td>
<td>Bonding, opportunities, recognition, cognitive competence, social competence, emotional competence, belief in the future, self determination</td>
</tr>
<tr>
<td>One-third-half</td>
<td>Behavioral competence, moral competence, self-efficacy, prosocial norms</td>
</tr>
<tr>
<td>One-quarter</td>
<td>Clear and positive identity</td>
</tr>
</tbody>
</table>
Conclusions

There is evidence that PYD programs:

- Prevent substance use and delinquency, many prevent other problems and promote positive outcomes
- Have robust and sustained impact
- Demonstrate effects among diverse groups of youth
Recommendations to Further the PYD Vision

- Define a limited number of Positive Youth Development Outcomes
- Review longitudinal relationships between PYD concepts and positive and problem outcomes
- Develop/test theories of PYD across development
- Measure PYD concepts, positive and problem outcomes comprehensively in PYD and prevention trials to capture potentially broad impact
- Continue to review PYD program effects
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Thank You!