TRAINING NEW SCHOLARS IN CHILD MALTREATMENT SCIENCE: THE T32 PROGRAM AT PENN STATE

Yo Jackson, Ph,D., ABPP

Director of Training

WHAT IS A TRAINING GRANT?

- **T32 - Ruth L. Kirschstein Institutional National Research Service Award**
- **(F31, F32 - person)**
- **T34 – Undergraduate Institutional Research awards**
- **T35 – Short-term Institutional Research Award**
- **T15 - Continuing Education Research award**
- **D45/D71 – International Research Training Award**
- **Main Goal: Awards made to institutions to support groups of pre- and/or postdoctoral fellows, including trainees in basic, clinical, and behavioral research**

T32 TRAINING GRANTS

2,056 across the US in FY 2020

168 in PA alone

9 at Penn State

NICHD, NIDA, NIA, NIDDK, NIGMS, NLM

TRAINING IN T32 CM METHODS

- T32 training is training that moves beyond typical graduate school/post doc education
- Training focused on creating grant generating, publication productive, future academics
- Expectation of products is fundamental – 2 publications a year
- Specific goals:
  - Exposure
  - Practice
  - Expansion
  - Evaluation

THE POINT OF TRAINING GRANTS?

Develop already promising scholars into even more productive scholars

- Focus on a topic area – specialty development
- Provide intensive training (across disciplines)

Create a pipeline of scholars who are "more likely" to get later NIH funding

- Developing/expanding professional networks with mentor team
- Building grant skills and research idea development in a group setting
- Building vitas so that confidence in ability to see a project to completion is clear

- Shadowing
- Direct Instruction
- Feedback
- Scaffolding

MENTOR TEAM MODEL OF TRAINING

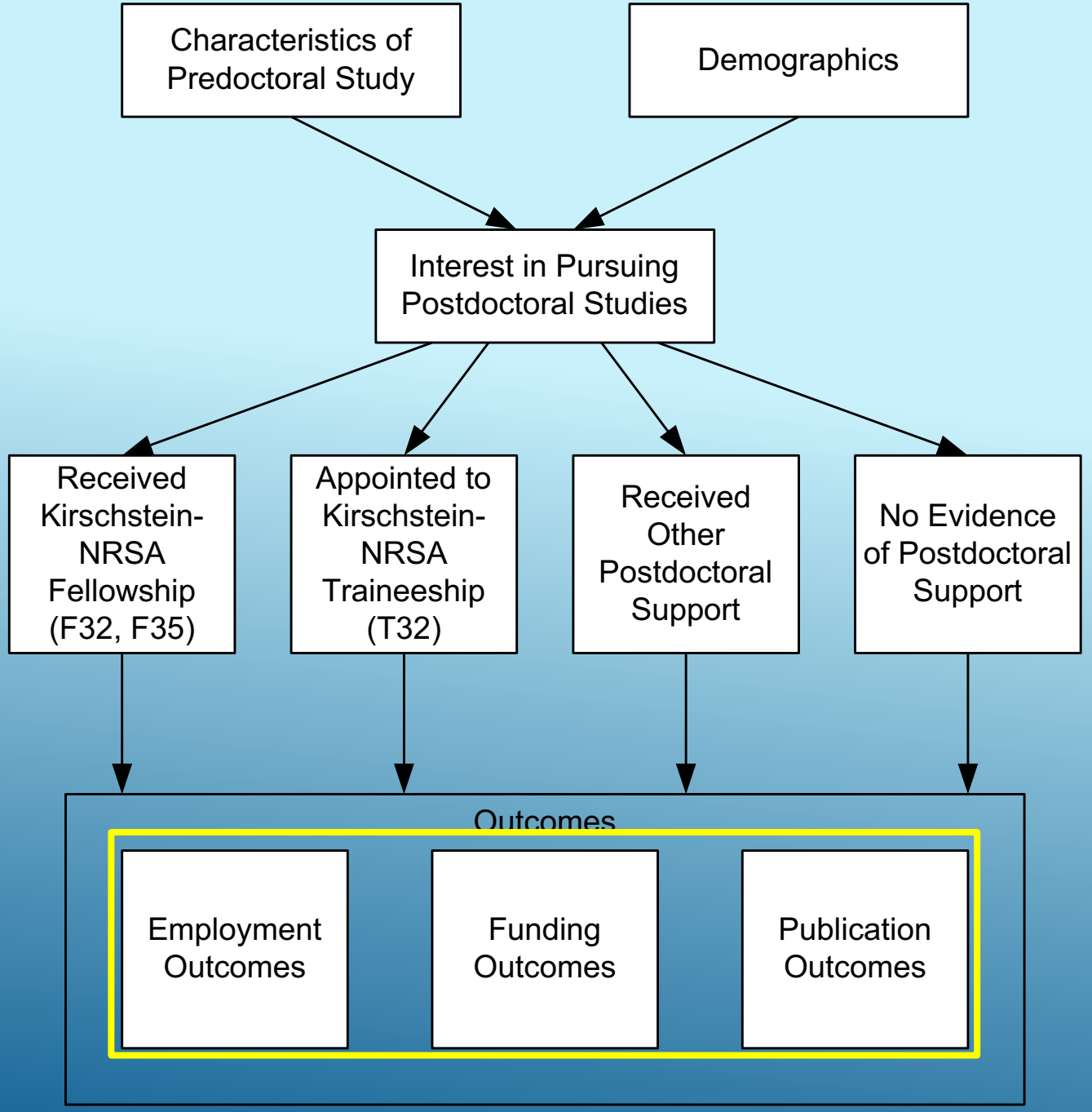
INGREDIENTS TO A GREAT TRAINING EXPERIENCE

- **Need a few things…**

- **Really Good Mentors**
  - **Experts**
  - **Leadership track record of producing strong scholars**
- **Opportunities – Within and Between Mentors and University**
- **Evaluation and Outcomes**

T32 - RUTH L. KIRSCHSTEIN INSTITUTIONAL NATIONAL RESEARCH SERVICE AWARD

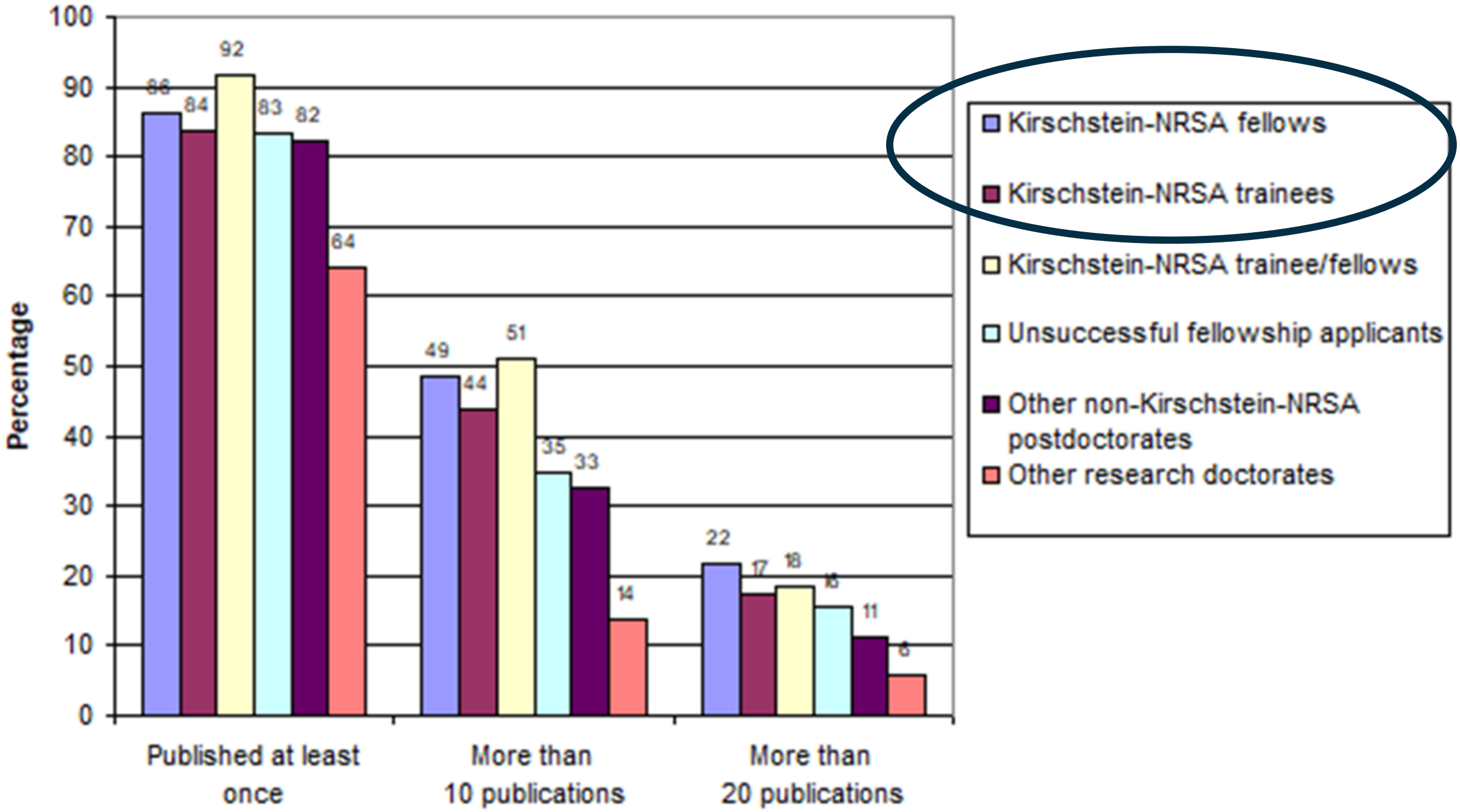
- **Started in FY 1975 – 5th decade of funding**
- **Kirschstein-NRSA program has focused on supporting predoctoral and postdoctoral training in a wide range of health-related disciplines where there is a need for personnel**
- **Two kinds of awards**
  - **1) institutional training grants to public and nonprofit private institutions for multidisciplinary training programs or targeted training programs in specific research areas and,**
  - **2) fellowships to individuals for supervised study with a senior scientist at an institution of the fellow's choice**
  - **Awards are conferred after competitive peer review**
  - **When NIH first awarded research training support in FY 1975, awards were made to 2,202 postdoctoral trainees and fellows; by FY 2002, 6,281 individuals received postdoctoral-level support.**

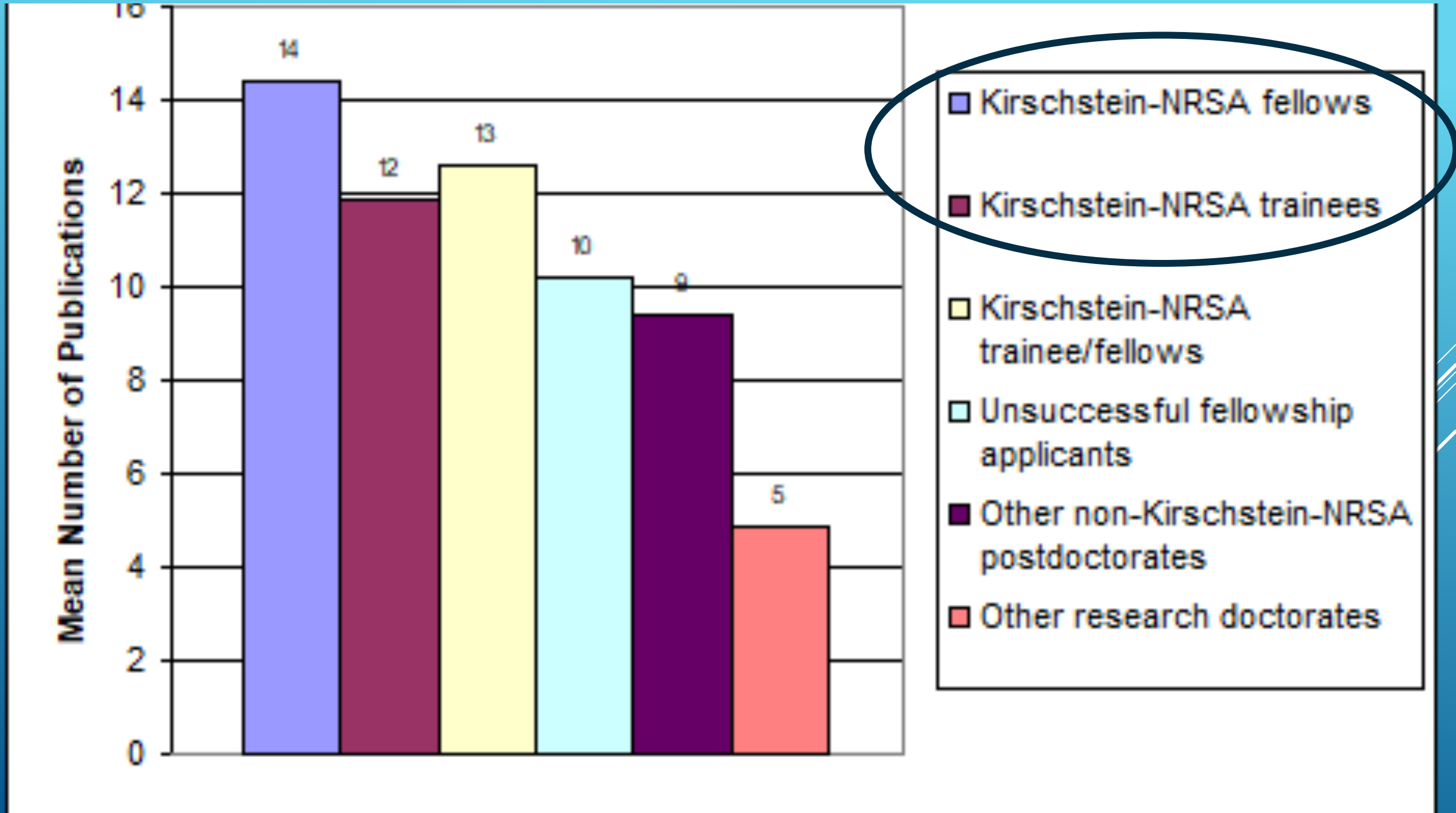

Characteristics of Predoctoral Study
Demographics
Interest in Pursuing Postdoctoral Studies
Received Kirschstein-NRSA Fellowship (F32, F35)
Appointed to Kirschstein-NRSA Traineeship (T32)
Received Other Postdoctoral Support
No Evidence of Postdoctoral Support
Outcomes
Employment Outcomes
Funding Outcomes
Publication Outcomes

RESEARCH OUTCOMES FROM T32 TRAINING - GRANTS

	T32 Trainees	Other postdocs
Percentage applying RO1 level	**30%**	**20%**
Percentage of those applying receiving at least one award	**47%**	**36%**
Average years to first award	**7.2**	**6.8**

RESEARCH OUTCOMES FROM T32 TRAINING - PUBLICATIONS


Percentage
100
90
80
70
60
50
40
30
20
10
0
86
84
92
83
82
64
49
44
51
35
33
14
22
17
18
15
11
6
Published at least once
More than 10 publications
More than 20 publications
Kirschstein-NRSA fellows
Kirschstein-NRSA trainees
Kirschstein-NRSA trainee/fellows
Unsuccessful fellowship applicants
Other non-Kirschstein-NRSA postdoctorates
Other research doctorates


Mean Number of Publications
0
2
4
6
8
10
12
14
16
14
12
13
10
9
5
Kirschstein-NRSA fellows
Kirschstein-NRSA trainees
Kirschstein-NRSA trainee/fellows
Unsuccessful fellowship applicants
Other non-Kirschstein-NRSA postdoctorates
Other research doctorates

	T32 trainees	Other postdocs
Percentage who published at least one article	84%	82%
Average number of publications	11.9	9.4
Average number of citations	27.8	2.4

	T32 Trainees	Other postdocs
Academic Setting	54%	45%

RESEARCH OUTCOMES FROM T32 TRAINING - EMPLOYMENT

Child Maltreatment T32 TRAINING AT Penn State

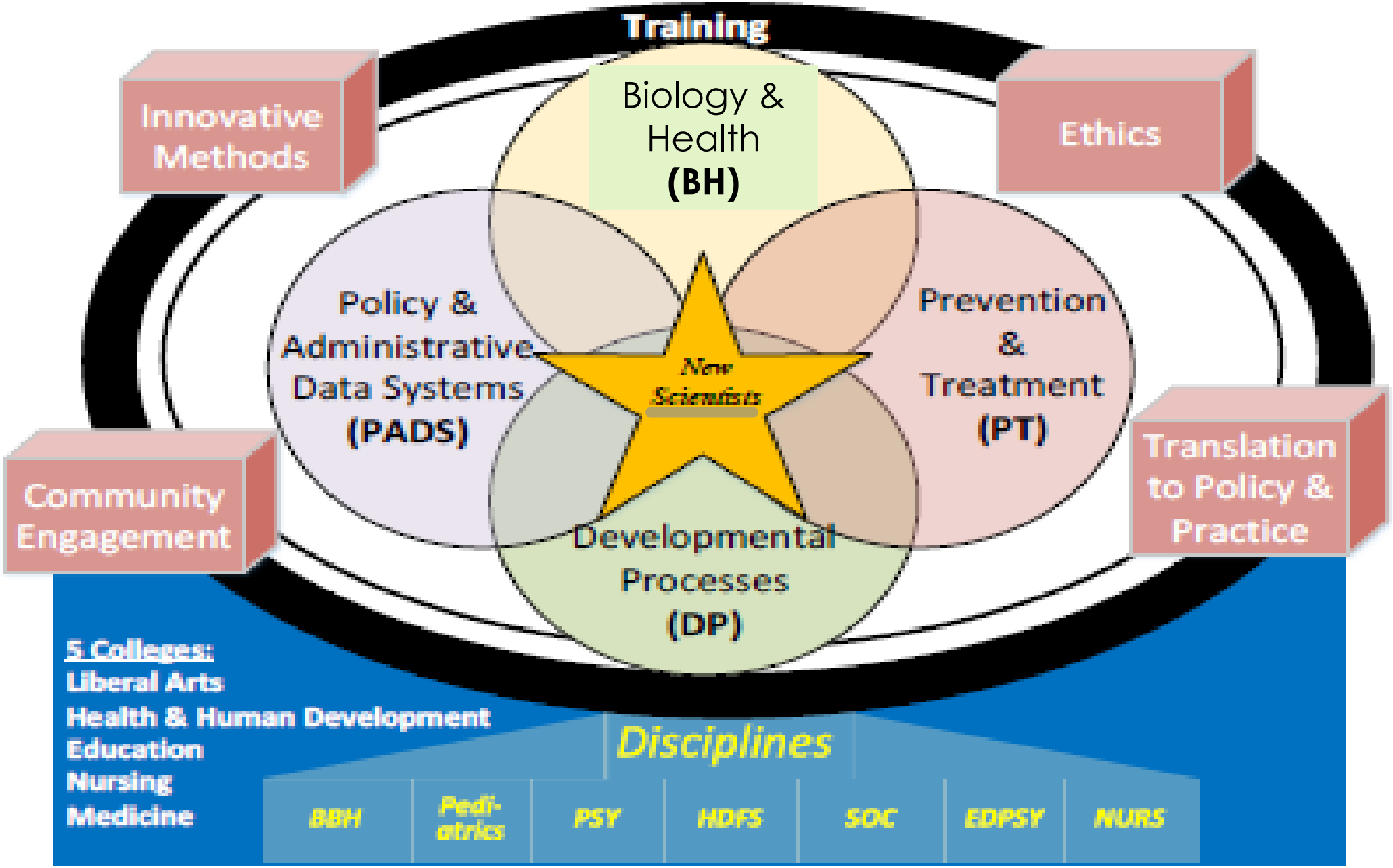
Creating the Next Generation of Scholars in Child Maltreatment Science

Awarded May 2020 to Penn State University
NICHD T32HD101390-01

WHY A TRAINING GRANT IN CHILD MALTREATMENT?

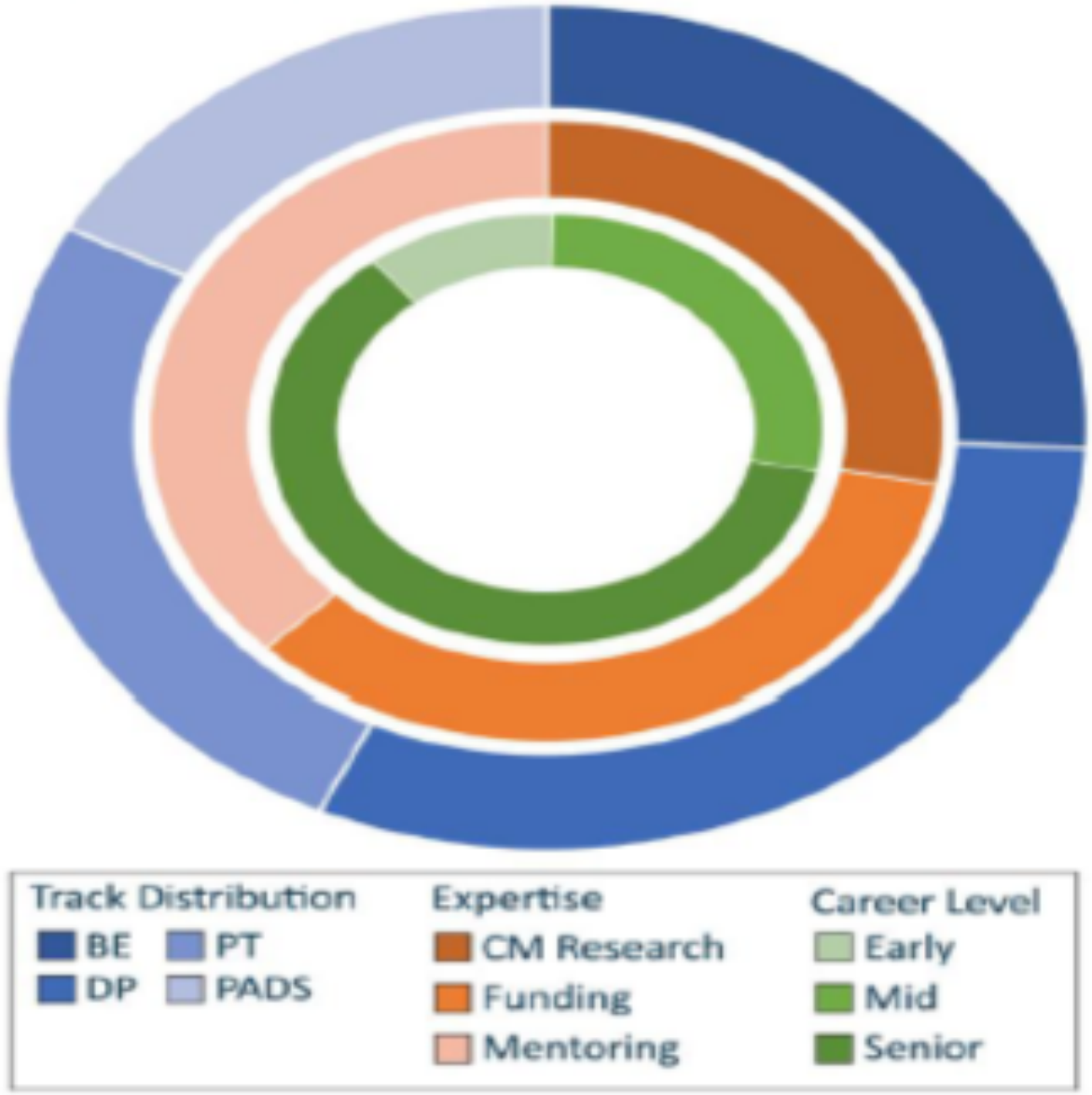
- **Child maltreatment affects over 4-6 million children and families in the US every year**
- **Unlike efforts for most public health crises – science in child maltreatment has done relatively little to change the rates of abuse or speed the rates of recovery over the past 40 years despite over 15,000 empirical studies on the topic**
- **Why?**
- **CM is perhaps the most cross-disciplinary, yet siloed area of study**
  - **Of interest to law, medicine, social welfare, biology, psychology, genetics, sociology, public health, and developmental science to name a few**

Figure 1. Conceptual Training Model of the CMT32



13 CM Primary Mentors
25 non-CM secondary Mentors

Figure 3: Primary/Secondary Mentor Team Expertise & Experience



TRAINING GOAL 1:

DEVELOP AN UNDERSTANDING OF CM SCIENCE AND AN ABILITY TO FRAME RESEARCH QUESTIONS FROM A BIOLOGICAL, DEVELOPMENTAL, INTERVENTION, AND SYSTEMS PERSPECTIVE

Monthly research team meetings with mentors across tracks

Monthly Proseminar/annual 521 course in CM

Participation in P50 projects

TRAINING GOAL 2:

DEMONSTRATE AN UNDERSTANDING OF THE RANGE OF RESEARCH METHODS APPLICABLE TO RESEARCH ON CM

- Monthly research team meetings with mentors across tracks
- Biannual Track Meetings
- Monthly Proseminar (postdocs)
- Development of research projects with mentors

TRAINING GOAL 3:

DEMONSTRATE AN UNDERSTANDING OF THE ETHICAL AND POLICY IMPLICATIONS OF RESEARCH IN CM

Monthly Ethics Seminar (fall)

CITI Training

Monthly Professional Development Seminar (postdocs)

Development of Policy Briefs

TRAINING GOAL 4:

DEVELOP AN INDEPENDENT LINE OF RESEARCH QUESTIONS RELATED TO THE APPLICATION OF CM SCIENCE IN THE FIELD

Grant writing course (spring)

Development of annual conference symposium

Published research papers from projects with mentors

TRAINING GOAL 5:

DEVELOP SKILLS IN BUILDING COMMUNITY PARTNERSHIPS AND DISSEMINATION TO PRACTICE AND POLICY AUDIENCES

Completion of community engagement project

Annual policy in CM training workshops

Participation in the Rapid Response Network

Director of Training
Yo Jackson, Ph.D., ABPP

Core Elements	PDT Jackson	PDR Noll	Both
Teach Proseminar	●		
Teach Professional Dev. Seminar	●		
Teach Ethics in CM Seminar		●	
Teach Grant Writing (HDFS 597)		●	
Coordinate recruitment, admissions, trainee evaluation, and training program evaluation		Pairing trainees w/mentors	●
Provide oversight and coordinate as needed w/mentors on training plans			●
Review progress of trainees	Training plan	Research plan	●
Coordinate All Track meetings and attend Within Track meetings			●
Help coordinate PSU summer institutes, workshops, and other site-specific training activities			●
Oversight of community engagement projects and policy activities	●		
Coordinate the submission of trainee grants, conference presentations, monitor research projects and products		●	
Prepare annual reports			●
Supervise funding for travel, update CMT32 website content			●

Director of Research
Jennie Noll, Ph.D.

TRACKS AND TRACK LEADS

BIOLOGY AND HEALTH – HANNAH SCHREIER, PH.D.
DEVELOPMENTAL PROCESSES – ERIKA LUNKENHEIMER, PH.D.
POLICY AND ADMINISTRATIVE DATA SYSTEMS – CHRISTIAN CONNELL, PH.D.
PREVENTION AND TREATMENT – CHAD SHENK, PH.D.

RECRUITMENT

2020-2021

Recruitment of Cohort 1
Recruitment of Cohort 2 begins
Appointment Cohort 2 3 postdocs!
May 2020
Aug 2020
Jan 2021
March 2021
Aug 2021
Appointment Cohort 1 4 predocs 2 postdocs!
Recruitment Cohort 2 ends

RECRUITMENT 2020-2021

- Efforts for recruitment
  - **Email to over 490 scholars, relevant training programs, departments, listserves on child maltreatment**
  - **Jackson & Noll personally reached out to over 100 child maltreatment experts to inform them about the training program**
  - **Social media postings created a website with details about the training and application process**
  - **Graduate programs and internships across the country in social welfare, psychology, education, human development, applied biology, neuroscience, and nursing**
  - **Connected with faculty experts at over 10 HBCUs to inform them about the CMT32 so that we may encourage a diverse recruitment pool**

Creating the Next Generation of Scholars in Child Maltreatment Science

(T32 Training Grant, NICHD)

T32 Training Grant

How to Apply

1 Pick Training Tracks
2 Choose Primary Mentors
3 Choose Secondary Mentors

Primary Mentor List

Secondary Mentor List

Purpose

The purpose of this T32 – Training the Next Generation of Scholars in Child Maltreatment (CM) Science is to provide a comprehensive and multi-level training program using a transdisciplinary approach that includes preparation in the multi-faceted issues in need of research to advance the field of CM.

Specifically, the proposed training program will provide integrated training in biology & health, developmental processes, prevention and treatment, and policy and administrative data systems. Along with a topical focus, the training will incorporate training in CM research ethics, innovative CM science methods, community engagement, and translation of policy to practice components so that trainees will be in the best possible position to effectively contribute to advancing CM science.

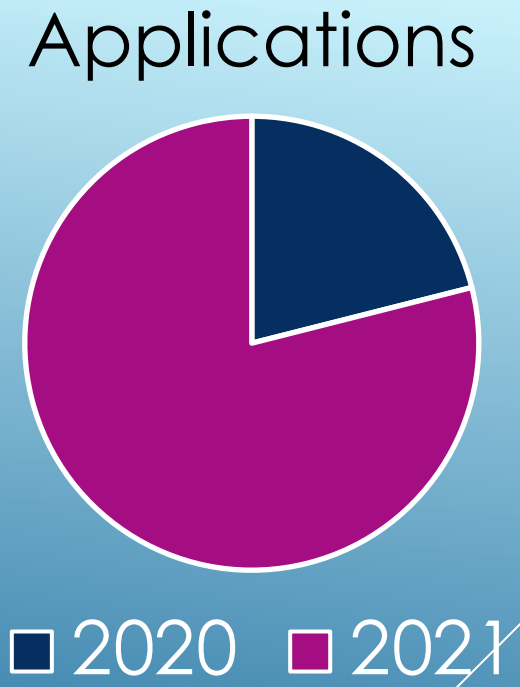
To effectively address CM, the next generation of researchers need to be capable of embracing the

Leadership and

Donate

RECRUITMENT 2021 – POSTDOCS ONLY

- Growth in applications over past year 275% increase
- 30 applications 2021 – for 3 slots
  - 8 applications 2020 for 2 slots

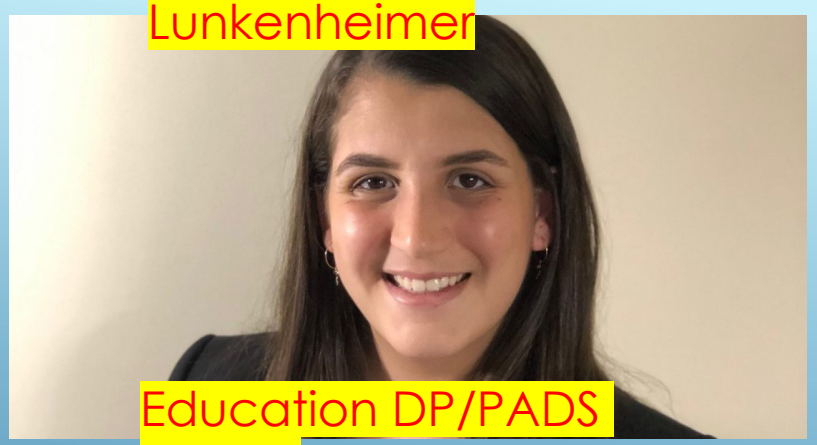


PSYC/DP/PT Lunkenheimer

PSYC/DP/PADS Lunkenheimer

Social Work Univ MD/PADS/PT Connell

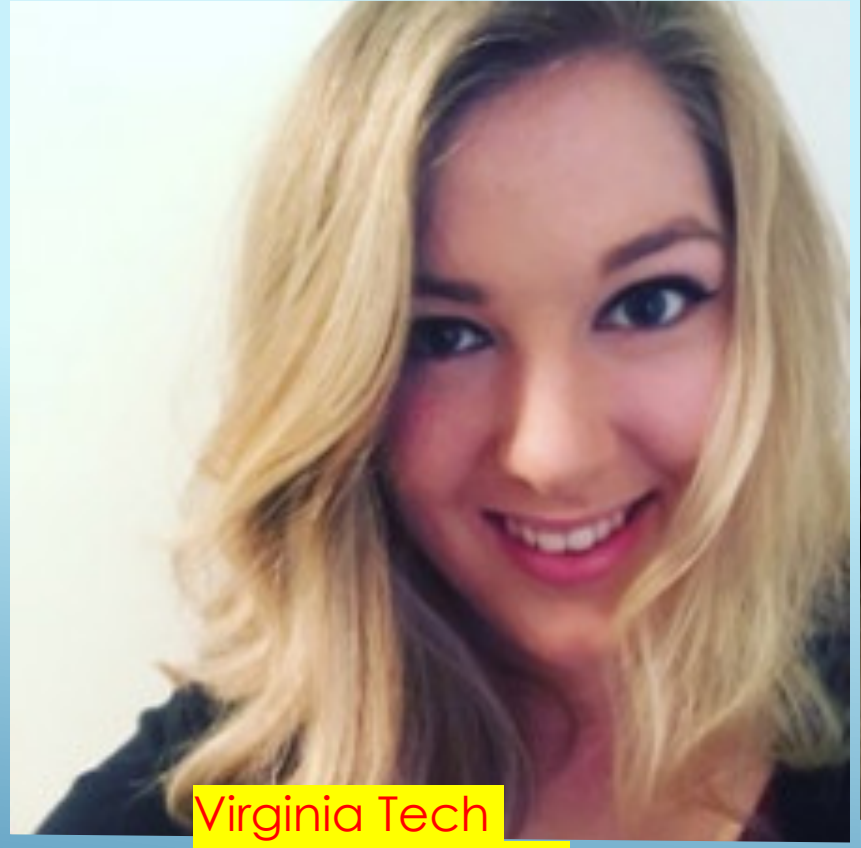
HDFS/PT/DP Shenk



Education DP/PADS Panlilio

Social Work Univ GA/PADS/PT Font

COHORT 1 FELLOWS
CATHERINE DIERKS, KALYA BROWN, STACEY SHIPE (POST)
ANNEKE OLSON, CASEY MULLINS, TENESHA LITTLETON (POST)



Virginia Tech
Developmental
Science/PT Track

Univ Southern California
Social Work/PADS Track

Univ KS Child
Language/DP Track

NEW 2021 POSTDOCS COHORT 2

- **Toria Herd – Jennie Noll, Primary mentor**
- **Lindsay Palmer – Sara Font, Primary mentor**
- **Claire Selin – Yo Jackson, Primary Mentor**

PRIMARY MENTORS

- **Yo Jackson, Psychology**
- **Jennie Noll, Psychology and Human Development and Family Studies**
- **Brian Allen, Pediatrics**
- **Christian Connell, Human Development and Family Studies**
- **Max Crowley, Human Development and Family Studies**
- **Sarah Font, Sociology**
- **Kent Hymel, Pediatrics**
- **Erika Lunkenheimer, Psychology**
- **Sheridan Miyamoto, Nursing**
- **Carlo Panlilio, Educational Psychology**
- **Hannah Schreier, Biobehavioral Health**
- **Idan Shalev, Biobehavioral Health**
- **Chad Shenk, Human Development and Family Studies**

SECONDARY MENTORS

- David Almeida, Human Development and Family Studies
- Timothy Brick, Human Development and Family Studies
- Kristin Buss, Psychology
- Orfeu Buxton, Biobehavioral Health
- Sy-Miin Chow, Health and Human Development
- Lorah Dorn, Nursing
- Chris Engeland, Biobehavioral Health
- Rich Felson, Sociology
- Michelle Frisco, Sociology
- Lisa Gatzke-Kopp, Health and Human Development
- Thomas Gould, Biobehavioral Health
- Chris Hollenbeak, Health Policy Administration
- Valerie King, Sociology
- Derek Kreager, Sociology
- Paul Morgan, Educational Psychology
- Deirdre O'Sullivan, Educational Psychology
- Andrew Patterson, Veterinary and Biomedical Sciences
- Koraly Pérez-Edgar, Psychology
- Nilam Ram, Health and Human Development
- Martin Sliwinski, Health and Human Development
- Joshua Smyth, Biobehavioral Health
- Doug Teti, Health and Human Development
- David Vandenbergh, Biobehavioral Health
- Martha Wadsworth, Psychology
- Dawn Witherspoon, Psychology

PREDOC TRAINING MODEL

Coursework

- Core Concepts in CM (taken 2x)
- Ethics
- Grant writing

Participation in research projects (1 policy brief, 2 published papers a year)

- Mentor team meetings, lab meetings
- Peer writing group

Conference Presentations

- Attend and present 1 conference a year, assist with PSU CM Conference

Attend trainings

- Summer research institute
- P50/NIH meetings
- Track meetings
- Policy training

POSTDOC TRAINING MODEL

Coursework	Participation in research projects (1 policy brief, 2 published papers a year)	Conference Presentations	Attend trainings
• Professional Seminar in CM • Professional Development Seminar • Ethics • Grant writing	• Mentor team meetings, lab meetings • Peer writing group	• Attend and present 1 conference a year, assist with PSU CM Conference	• Summer research institute • P50/NIH meetings • Track meetings • Policy training

1st authorship expected

Leadership on presentation expected

RESEARCH DISSEMINATION PROGRESS OF COHORT 1 (2 POSTDOCS, 4 PREDOCS)

9 published/in press papers

- 4 as first author!

9 conference presentations (posters and talks)

- Society for Research on Child Development, American Educational Research Association, the Society for Social Work and Research, Penn State Conference on Child Maltreatment

GRANT-WRITING

- **Increasing academic and school engagement for maltreated children (Mullins, F31)**
- **Using a Dynamical Systems to develop a micro-coding paradigm to study the impact of validating and invalidating parenting styles on the affect and behaviors of maltreated children (Olsen, F31)**
- **Using machine-learning techniques to develop risk models for chronic and recurrent maltreatment using LONGSCAN (Brown, F32)**
- **Examining the impact of intervention on inhibitory control for mothers at-risk for harsh parenting in the first post-partum year (Dierks, F32)**
- **The moderating effects of neighborhood quality on the effectiveness of housing voucher programs to prevent child maltreatment (Littleton, R03)**
- **Assessing the unique needs of custodial fathers in the child welfare system (Shipe, R03)**

Ensuring Services for Victims of Crime: Penalty Financing and Local Coordination

March, 2021

Authors: Sheridan Miyamoto, Stacey L. Shipe, Anneke E. Olson, Kayla M. Brown, Catherine Diercks, Tenesha Littleton, Casey A. Mullins & Jennie G. Noll
Edited by: Brittany Gay and Taylor Scott

Center for Healthy Children

Over 5.8 million people in the U.S. were victims of violent crime (e.g., domestic violence, sexual assault), in 2019.[1] In the same year approximately 678,000 children were victims of abuse or neglect.[2] Crime victimization is costly to both victims and society.[3,4] The resources victims need are often provided by victim service providers and victim advocate agencies, which heavily rely on funding through the Victims of Crime Act's (VOCA) **Crime Victims Fund** (CVF). The CVF is financed by offenders – fines, forfeitures, and penalty assessments on criminal offenders of federally prosecuted crimes – not taxpayers. Through the CVF, states provide the primary funding source for victim services agencies to deliver direct resources and services that victims desperately need. Deposits into the CVF have dropped 86% since 2014 and, to the detriment of victims, the CVF is projected to reach a ten-year low in 2021.[5] Steps must be taken to protect victims' access to essential victim services.

HIGHLIGHTS

- Crime victimization is both prevalent and costly due to negative short- and long-term outcomes.
- Access to resources and support from victim services providers can help victims through the recovery process after a crime occurs.
- VOCA's Crime Victims Fund (CVF), financed by offenders, supports victim service providers – but this fund is depleting.
- Breaks and inequities in service access underscore the need for legislative action to support victim service providers and the availability of trauma-informed services.

RECOMMENDATIONS

- Victim services should be sustained by penalty fees, grant programs, or educating prosecutors on the CVF.
- Encourage coordination between first responders and victim service providers.
- Support rural community access to specialized victim services via telehealth.

Victim Needs and Service Providers

Being the victim of a crime or witnessing violence are stressful events which can leave victims with unmet essential needs. Prolonged stress can lead to physical (e.g., cancer, diabetes, stroke) and mental health problems (e.g., anxiety, depression) due to problematic health behaviors (e.g., poor nutritional intake, substance use) and chronic overexposure to stress hormones (e.g., cortisol).[6,7] Addressing the varied needs of victims is important for their long-term health and wellbeing.

Victim service providers (VSPs) offer physical, emotional, and psychological services to victims of crime. In 2018, there were over 6,000 VOCA-funded service providers that assisted 6.3 million crime victims.[8] Examples of services provided to victims include:

- **Evidence-based trauma therapies**.[1] A lack of mental health services can lead to increased use of costly emergency services for both children and adults.[10,11] When victims of assault are provided with mental health services, symptoms of PTSD, suicide, anxiety, and depression decrease and reports of social support and positive mental health outcomes increase.[12–14]
- **Housing assistance**. Crime victimization is linked with increased homelessness. Being provided safe, stable housing and receiving temporary financial assistance greatly reduces the likelihood that families enter homeless shelters.[15–18] Rapid rehousing and flexible funding programs enable victims to meet their basic needs.[19]
- **Criminal and civil justice system assistance** is related to greater safety, psychological well-being, and financial independence for women.[20,21] Receipt of civil protective orders help survivors endure less severe abuse and experience less fear of future harm.[22]
- **Advocacy organizations** provide critical information about victims' rights and provide emotional support through accompaniment to law enforcement interviews or forensic medical exams. Accessing healthcare after a sexual assault allows victims to be treated for injury, receive preventive care for infections, and allows for preservation of evidence of the assault which may be key to successful prosecution.[23–25] Alternatively, delayed access to appropriate healthcare can result in increased mental health issues and negative physical health consequences.[26]

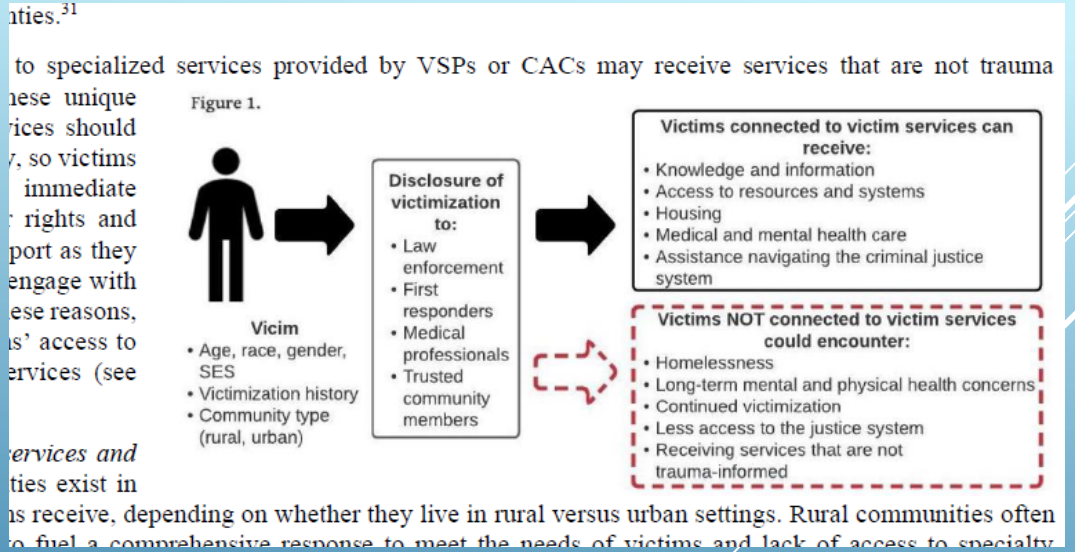
Broken Pathways to Service Access

Crime victims seek help and support through various informal (e.g. friends, family) and formal (e.g. advocacy organizations, healthcare, or law enforcement) pathways. Victim characteristics – including race, gender, and age – can impact whether and how victims disclose their victimization and access services.

- U.S. Department of Justice studies estimate that only 23% of sexual assaults are reported to police.[1,27,28] Victims of sexual assault or domestic violence may be reluctant to report to law enforcement due to complex circumstances, especially

[1] One example of an evidence-based trauma therapy is Cognitive Behavioral Therapy (CBT), through which people learn how to improve the effectiveness of their reactions to challenging situations.[9]

POLICY PROJECT VICTIMS OF CRIME ACT (VOCA)



ities.[31]

to specialized services provided by VSPs or CACs may receive services that are not trauma

hese unique
ices should
, so victims
immediate
rights and
port as they
engage with
ese reasons,
s' access to
ervices (see

ervices and
ties exist in

Figure 1.

ns receive, depending on whether they live in rural versus urban settings. Rural communities often
to fuel a comprehensive response to meet the needs of victims and lack of access to specialty

WE ARE RECRUITING FOR COHORT 3!

THAT COULD MEAN YOU! (OR SOMEONE YOU KNOW)

DEADLINE JAN 14, 2022

HTTPS://WWW.SOLUTIONSNETWORK.PSU.EDU/T32-GRANT/HOW-TO-APPLY

CRITERIA FOR FELLOW SELECTION

Interest in developing an independent research program focusing on the child maltreatment science;

Demonstration of excellent academic performance;

Aptitude, skill, and productivity in research;

Excellent evaluation by faculty; and

Commitment to a research career in an academic or applied research setting.

Predocs need to be post Masters/Comps at the start of the training (usually in their 3rd or 4th year of graduate training)