Maternal-Child (and Family) Mental Health MATTERS

Mary Kimmel, MD
Clinical Assistant Professor
Medical Director, Perinatal Psychiatry Inpatient Unit
Medical Director, NC Maternal Mental Health MATTERS

and

Hannah Rackers, MPH
Research Instructor
Program Manager, NC Maternal Mental Health MATTERS

UNC SCHOOL OF MEDICINE
DEPARTMENT of PSYCHIATRY

Funding and Disclosures

- NIMH 1K23MH110660-01
- Brain & Behavior Research Foundation NARSAD Young Investigator Award
- Foundation of Hope Seed Grant
- Sage Therapeutics, Miller Medical Communications LLC
- Royalties from UptoDate

UNC SCHOOL OF MEDICINE

COMMITTEE OPINION

(Reaffirmed 2018)

Number 667, July 2016

Committee on Obstetric Practice

This Committee Opinion was developed by the American College of Obstetricians and Gynecologists' Committee on Obstetric Practice in collaboration with committee members George A. Macones, MD; Christian M. Pettker, MD; Maria A. Mascola, MD, MPH; and R. Phillips Heime, MD.

The American College of Obstetricians and Gynecologists
WOMEN'S HEALTH CARE PHYSICIANS

AWHONN

Maternal Fetal Triage Index (MFTI)

Implement appropriate infectious disease control processes for triage and evaluation.

YES — Is the woman presenting for a scheduled procedure and has no complaint?

NO

Does the woman or fetus have STAT/PRIORITY 1 vital signs?
OR
Does the woman or fetus require immediate lifesaving intervention?
OR
Is birth imminent?

YES → STAT/ PRIORITY 1

STAT — PRIORITY 1

Abnormal Vital Signs
Maternal HR <40 or >150, apneic, SpO_2 <95%, SBP ≥160 or DBP ≥110 or <60/palpable. No FHR detected by doppler (unless previously diagnosed fetal demise), FHR <110 bpm for >60 seconds

Immediate lifesaving intervention required, such as:

Maternal
- Cardiac compromise
- Severe respiratory distress
- Seizing
- Hemorrhaging
- Acute mental status change or unresponsive (cannot follow verbal commands)
- Signs of placental abruption
- Signs of uterine rupture

Fetal
- Prolapsed cord

Imminent Birth
- Fetal parts visible on the perineum
- Active maternal bearing-down efforts

NO

Does the woman or fetus have URGENT/PRIORITY 2 vital signs?
OR
Is the woman in severe pain without complaint of contractions?
OR
Is this a high-risk situation?
OR
Will this woman and/or newborn require a higher level of care than institution provides?

YES → URGENT/ PRIORITY 2

URGENT — PRIORITY 2

Abnormal Vital Signs
Maternal HR >120 or <50', Temperature ≥100.0°F, 38.1°C, RR >26 or <12, SpO_2 <96%, SBP ≥140 or DBP ≥90 **symptomatic**[1] or <80/40, repeated; FHR >160 bpm for >60 seconds; decelerations

Severe Pain: (unrelated to ctx) ≥7 on a 0–10 pain scale

Examples of High-Risk Situations
- Unstable, high risk medical conditions
- Difficulty breathing
- Altered mental status
- Suicidal or homicidal
- <34 wks c/o of, or detectable, uterine ctx
- <34 wks c/o of SROM/leaking or spotting
- Active vaginal bleeding (not spotting or show)
- c/o of decreased fetal movement
- Recent trauma[2]

≥34 wks with regular contractions or SROM/leaking with any of the following
- HIV+
- Planned, medically-indicated cesarean (maternal or fetal indications)
- Breech or other malpresentation
- Multiple gestation
- Placenta previa

Transfer of Care Needed
- Clinical needs of woman and/or newborn indicate transfer of care, per hospital policy

NO

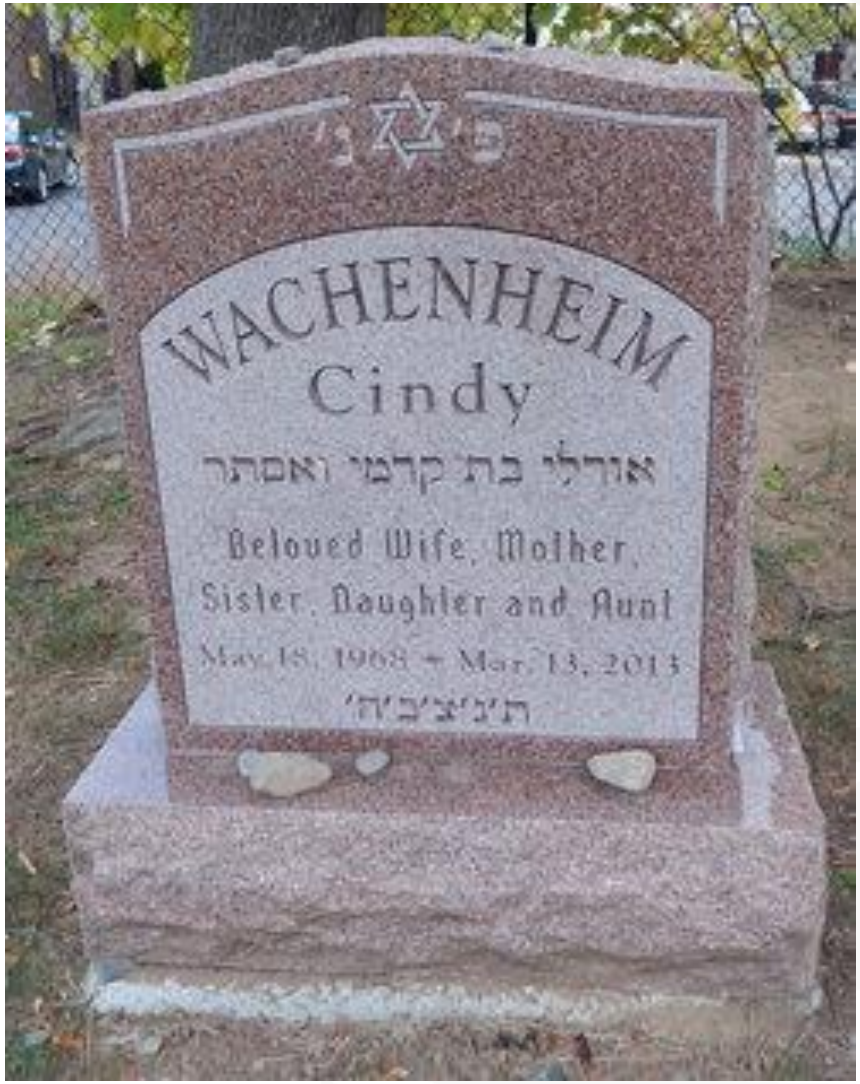
Does the woman or fetus have PROMPT/PRIORITY 3 vital signs?
OR
Does the woman require

YES → PROMPT/ PRIORITY 3

PROMPT — PRIORITY 3

Abnormal Vital Signs
Temperature >100.4°F, 38.0°C, SBP ≥140 or DBP ≥90, **asymptomatic**[1]

Prompt Attention, such as:
- Signs of active labor ≥34 weeks
- c/o early labor signs and/or c/o SROM/leaking 34–36 6/7 weeks
- ≥34 weeks with regular contractions and HSV lesion
- ≥34 weeks planned, elective, repeat cesarean with regular contractions


WACHENHEIM
Cindy
אורלי בת קרמי ואסתר
Beloved Wife, Mother,
Sister, Daughter and Aunt
May 18, 1968 ~ Mar. 13, 2013
ת'נ'צ'ב'ה'

Objectives

- Overview of Perinatal Mood and Anxiety Disorders (PMAD)
  - » Prevalence
  - » What is known in NC
- NC Maternal Mental Health MATTERS
  - » Screening
  - » Assessment
  - » Treatment
- Future Directions
- Recommendations

Overview of Perinatal Mood and Anxiety Disorders

Antenatal and Postpartum Depression

PREVALENCE

- Pregnancy is not protective against depression and anxiety
- Between 10-20% of women will experience AND and PPD

References: Gaynes, et al 2005; Bansil et al 2010; Aizer and Currie 2014; Schlotz and Phillips, 2009; Raikkonen et al 2012; Thomas et al 2009; O'Donnell and Meaney, 2017Grigoriadis et al 2013; Qiu et al 2009; Huizink et al 2002; Werner et al 2007; Davis et al 2007; Pawlby et al 2011; O'Donnell and Meaney, 2017; Palladino et al 2011; Gentile 2011; Oates 2003; Lindahl et al 2005

Antenatal and Postpartum Depression

PREVALENCE

- Pregnancy is not protective against depression and anxiety
- Between 10-20% of women will experience AND and PPD

NEGATIVE OUTCOMES

- Severe anxiety is a common symptom and can be crippling
- Suicide is one of the largest contributors to maternal mortality

References: Gaynes, et al 2005; Bansil et al 2010; Aizer and Currie 2014; Schlotz and Phillips, 2009; Raikkonen et al 2012; Thomas et al 2009; O'Donnell and Meaney, 2017Grigoriadis et al 2013; Qiu et al 2009; Huizink et al 2002; Werner et al 2007; Davis et al 2007; Pawlby et al 2011; O'Donnell and Meaney, 2017; Palladino et al 2011; Gentile 2011; Oates 2003; Lindahl et al 2005

Antenatal and Postpartum Depression

PREVALENCE

- Pregnancy is not protective against depression and anxiety
- Between 10-20% of women will experience AND and PPD

NEGATIVE OUTCOMES

- Severe anxiety is a common symptom and can be crippling
- Suicide is one of the largest contributors to maternal mortality
- Preeclampsia, Preterm Birth

References: Gaynes, et al 2005; Bansil et al 2010; Aizer and Currie 2014; Schlotz and Phillips, 2009; Raikkonen et al 2012; Thomas et al 2009; O'Donnell and Meaney, 2017Grigoriadis et al 2013; Qiu et al 2009; Huizink et al 2002; Werner et al 2007; Davis et al 2007; Pawlby et al 2011; O'Donnell and Meaney, 2017; Palladino et al 2011; Gentile 2011; Oates 2003; Lindahl et al 2005

Antenatal and Postpartum Depression

PREVALENCE

- Pregnancy is not protective against depression and anxiety
- Between 10-20% of women will experience AND and PPD

NEGATIVE OUTCOMES

- Severe anxiety is a common symptom and can be crippling
- Suicide is one of the largest contributors to maternal mortality
- Preeclampsia, Preterm Birth
- Delayed cognitive and socioemotional development

References: Gaynes, et al 2005; Bansil et al 2010; Aizer and Currie 2014; Schlotz and Phillips, 2009; Raikkonen et al 2012; Thomas et al 2009; O'Donnell and Meaney, 2017Grigoriadis et al 2013; Qiu et al 2009; Huizink et al 2002; Werner et al 2007; Davis et al 2007; Pawlby et al 2011; O'Donnell and Meaney, 2017; Palladino et al 2011; Gentile 2011; Oates 2003; Lindahl et al 2005

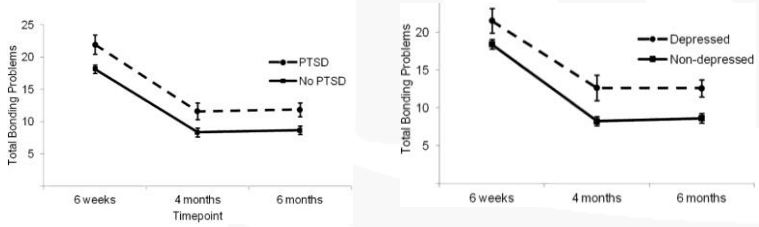
Antenatal and Postpartum Depression

PREVALENCE

- Pregnancy is not protective against depression and anxiety
- Between 10-20% of women will experience AND and PPD

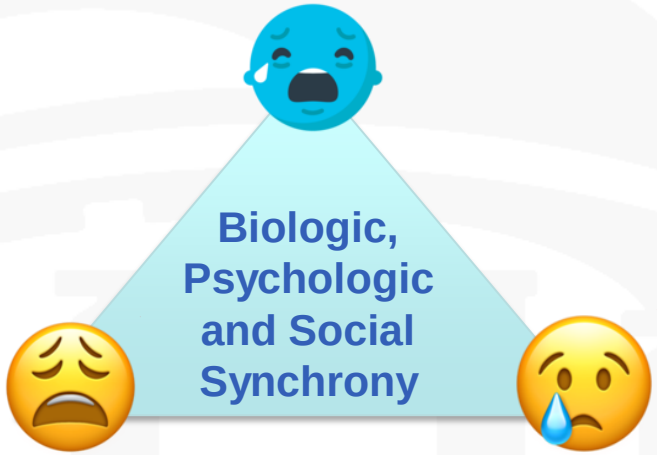
NEGATIVE OUTCOMES

- Severe anxiety is a common symptom and can be crippling
- Suicide is one of the largest contributors to maternal mortality
- Preeclampsia, Preterm Birth
- Delayed cognitive and socioemotional development
- ADHD, Depression, and Psychosis in Offspring



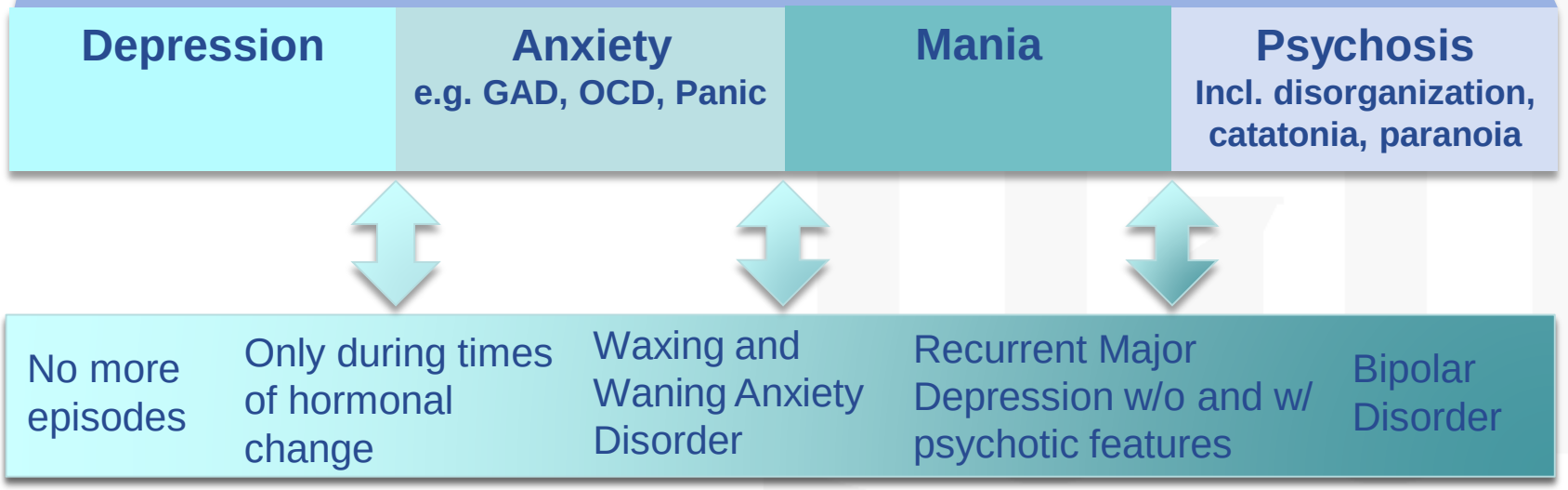
References: Gaynes, et al 2005; Bansil et al 2010; Aizer and Currie 2014; Schlotz and Phillips, 2009; Raikkonen et al 2012; Thomas et al 2009; O'Donnell and Meaney, 2017Grigoriadis et al 2013; Qiu et al 2009; Huizink et al 2002; Werner et al 2007; Davis et al 2007; Pawlby et al 2011; O'Donnell and Meaney, 2017; Palladino et al 2011; Gentile 2011; Oates 2003; Lindahl et al 2005, Muzik et al 2013

Perinatal Mood and Anxiety Disorders and Families

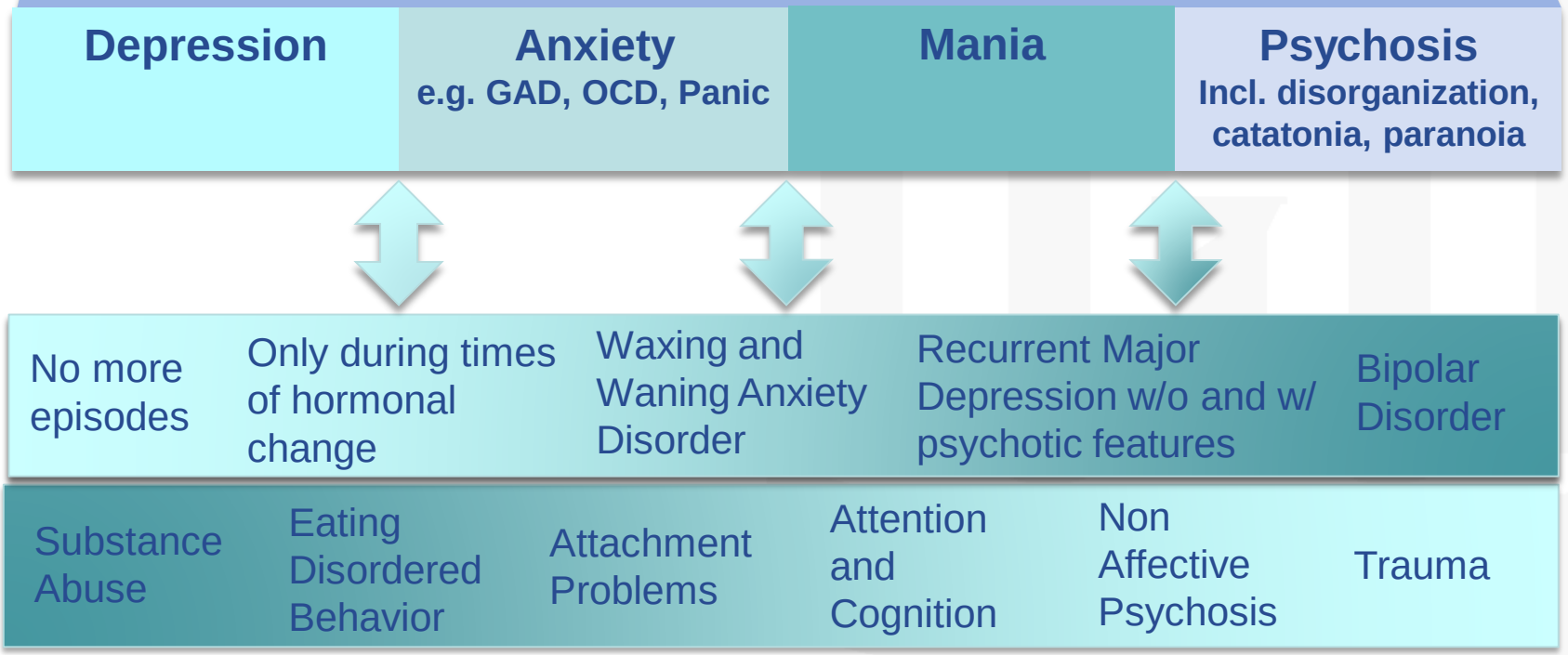


- Partners are affected by PPD by supporting and coping with their partner's symptoms but also by experiencing depression (Paulson and Bazemore, 2010)
  - 24% to 50% of partners experience depression along with their partner (Goodman 2004), 1/10 fathers experience depression in the first year (Kessler et al 2003)
  - Non-gestational carrier parents are balancing all the changes of having a baby too!

Perinatal Mood and Anxiety Disorders



Perinatal Mood and Anxiety Disorders



NC Maternal Mental Health MATTERS

(Making Access to Treatment, Evaluation, Resources & Screening Better)

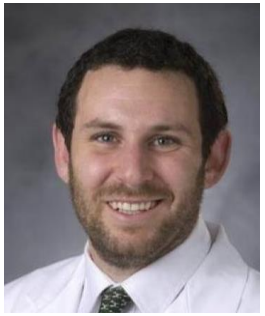
Aims

- Enhance systems for screening, assessment and treatment of behavioral health disorders in pregnant and postpartum women
- Support local providers through training and in the integration of maternal mental health into primary care practice

The MATTERS Team

Program :
Dr. Mary Kimmel, Hannah Rackers, Dr. Gary Maslow, Kendra Rosa, Dr. Naomi Davis





NC DHHS Partners:
Belinda Pettiford
Becky Moore-Patterson
Tara Owens Shuler

OB Champion:
Dr. Alison Stuebe

Substance Use Expert:
Dr. Hendree Jones

Perinatal Mental Health Specialists:
Liz Cox, Edith Gettes, Samantha Meltzer-Brody, Susan Michos, Chris Raines, Erin Richardson, Marla Wald

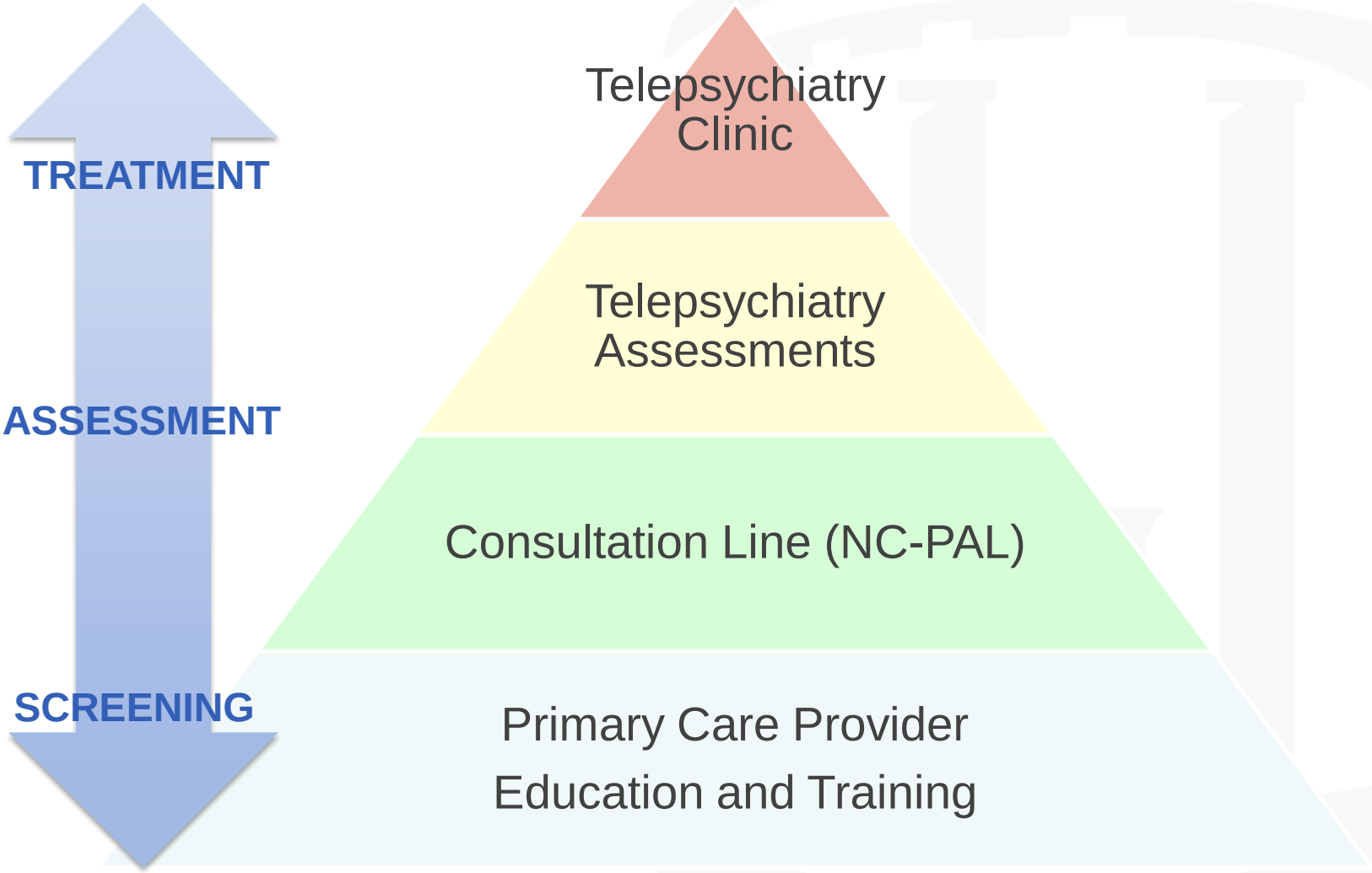




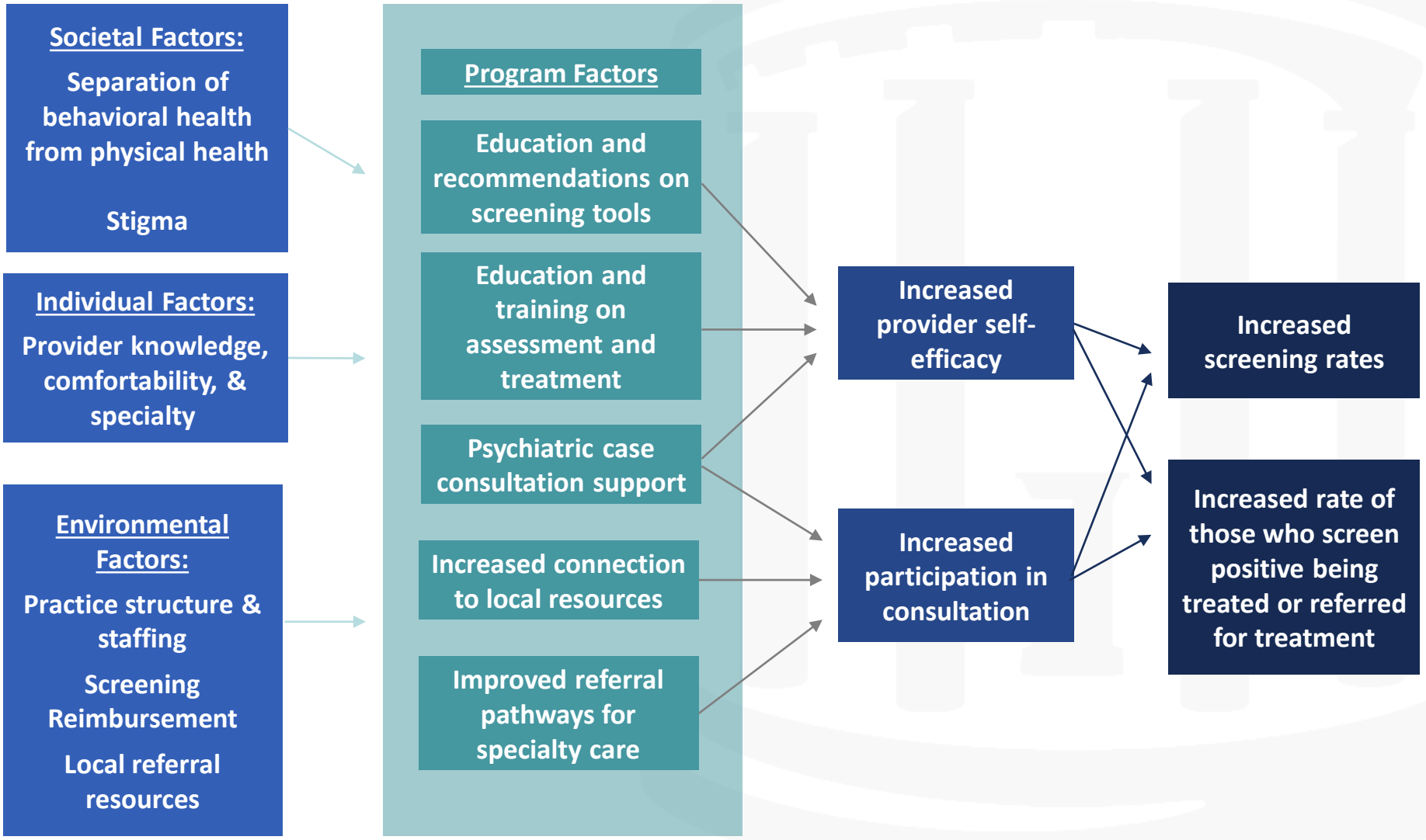


Care Coordinators:
Valon Alford, Bethany Bivens, Marquis Eloi

Program Components: Tiers of Patient and Provider Support



Program Conceptual Model



Provider Education and Training

SCREENING

- Screening toolkit designed for medical home
- Provided in partnership with Postpartum Support International (PSI) on components of care for perinatal mental health
- Provider specific support via consultation line
- Practice specific support during enrollment visit and ongoing through lunch and learns
- Webinar series and case discussions

Consultation Line

ASSESSMENT & TREATMENT

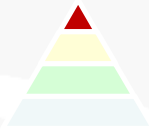
- For primary care providers to treating mental health concerns
- Staffed by UNC and Duke perinatal mental health specialists
- Case specific consultation and support
- Care coordination services to ensure connections to appropriate local resources

Mental Health Assessments

ASSESSMENT & TREATMENT

- For higher-need patients who may be treated locally but need further evaluation
- Psychiatric assessments completed by a Perinatal Mental Health Specialist (PMHS) in-person or via Telehealth
- Care coordination services to ensure connections to appropriate local resources

Ongoing Care



TREATMENT

- For patients that need specialized care and do not have local resources
- Treatment in UNC's Women's Mood Disorder Clinic in-person or via Telehealth by PMHS
- Care coordination services to ensure connections to other needed services

UNC SCHOOL OF MEDICINE

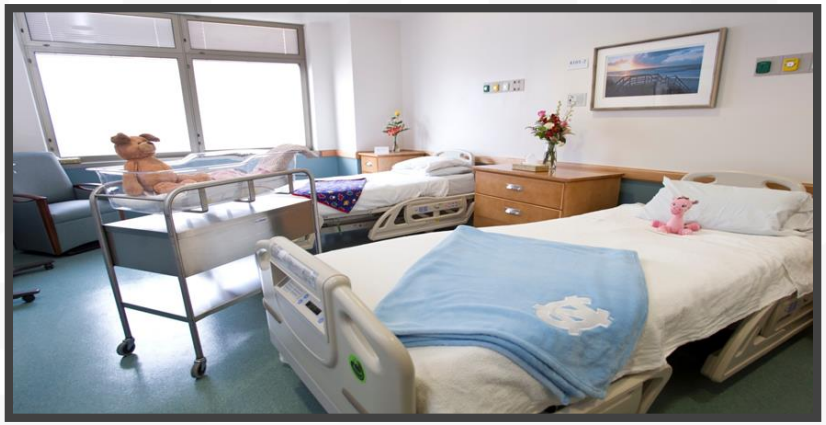
Perinatal Psychiatry Inpatient Unit

5 bed inpatient psychiatric unit for pregnant and postpartum women

MISSION: To provide specialized ***multidisciplinary care*** to assist in the recovery of perinatal (pregnant and postpartum) women from psychiatric illness requiring inpatient care

VISION: A world that understands and provides for the unique mental health ***needs of women and their families during the critical perinatal period***

Family Room

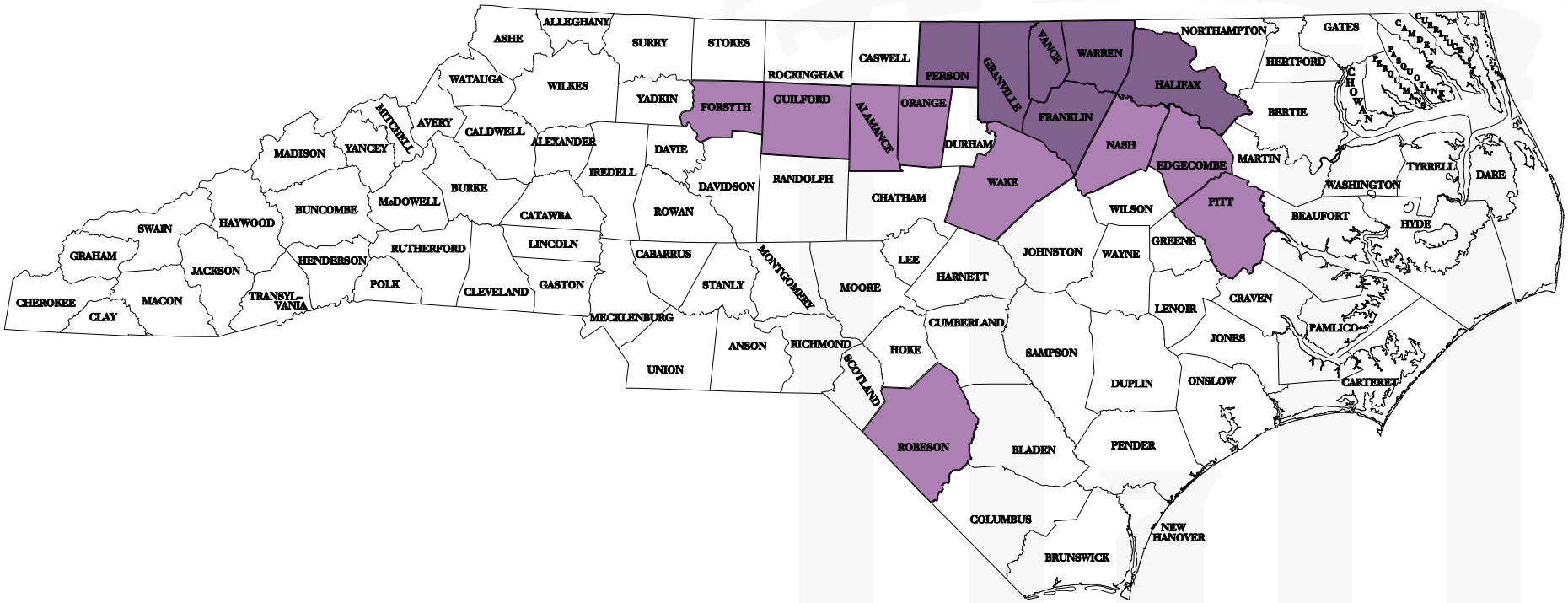


Patient Room

PPIU Admissions Coordinator

Laurie Gardner 984-975-3834

5-Year Target Counties



nc pal Perinatal Psychiatry

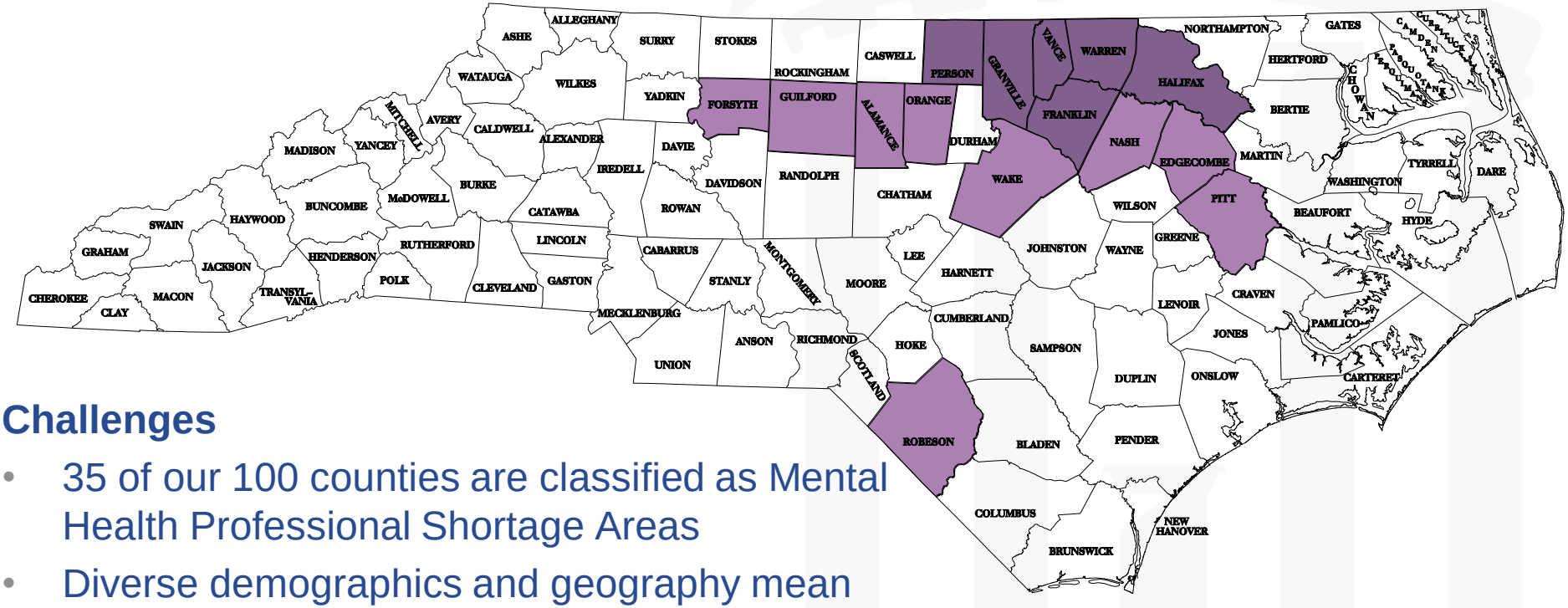
UNC SCHOOL OF MEDICINE

Duke University School of Medicine

PSI

Lifeline4Moms

5-Year Target Counties



Challenges

- 35 of our 100 counties are classified as Mental Health Professional Shortage Areas
- Diverse demographics and geography mean that needs, resources, and access vary greatly across the state

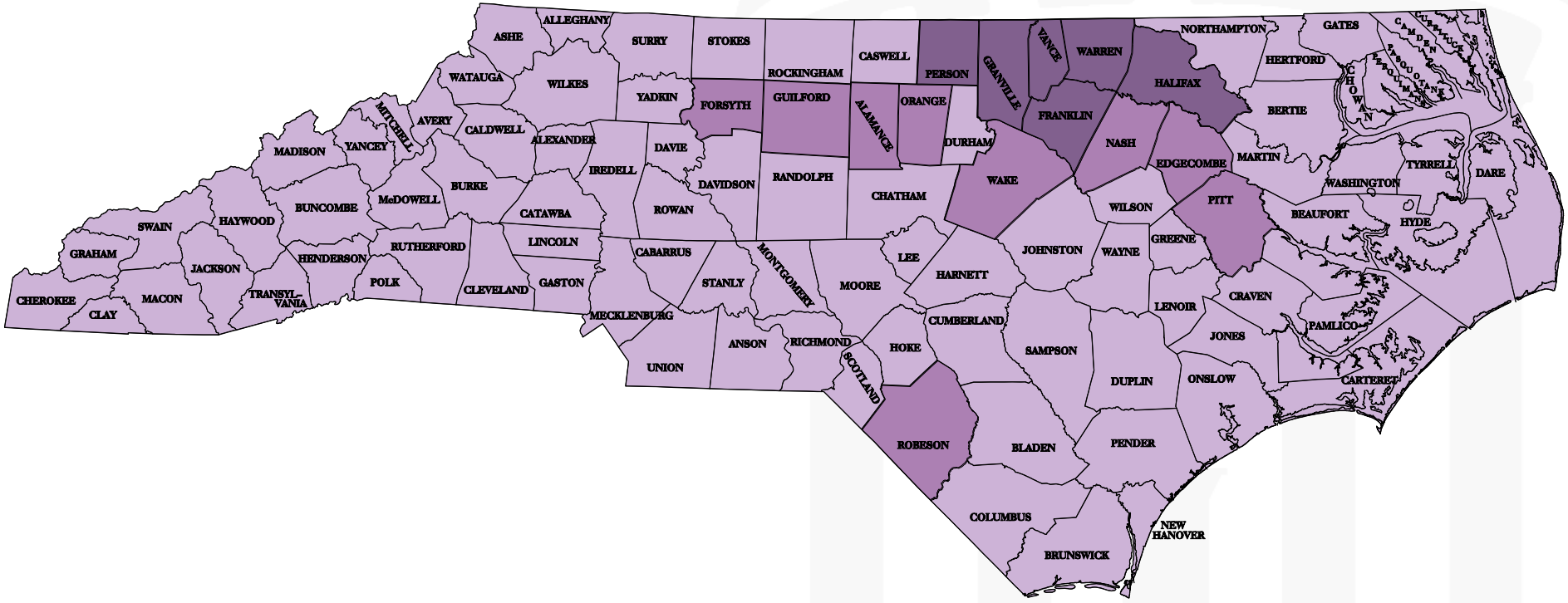
UNC SCHOOL OF MEDICINE

2019		2020 - 2023			
Summer	Fall	2020	2021	2022	2023
❖ PSI Training Kick-Off ❖ Launch Screening Tool Kit ❖ Launch Website ❖ Consultation Phone Line and Telepsychiatry Clinic Launch (July) ❖ Develop monitoring and evaluation plan	❖ Enroll practices and identify their current practices and telepsychiatry capabilities: • Warren • Granville • Vance • Halifax • Person • Franklin ❖ Convene Stakeholder Group for Sustainability ❖ Reach out to NC ACOG, Midwives of NC, NC Pediatric Society, NC Academy of Family Physicians ❖ Set baseline for evaluation indicators	❖ Refine policies and procedures from lessons learned ❖ Enroll practices and identify their current practices and telepsychiatry capabilities: • Orange • Wake • Alamance ❖ Case Discussions (Similar to ECHO model) ❖ Seminars on Perinatal Mood and Anxiety Disorders, Interventions for PMAD	❖ Refine policies and procedures from lessons learned ❖ Enroll practices and identify their current practices and telepsychiatry capabilities: • Edgecombe • Nash • Pitt ❖ Case Discussions (Similar to ECHO model) ❖ Seminars on Substance Abuse, Mother-Baby Attachment, PTSD and trauma, Psychosis	❖ Refine policies and procedures from lessons learned ❖ Enroll practices and identify their current practices and telepsychiatry capabilities: • Robeson • Forsyth • Guilford ❖ Case Discussions (Similar to ECHO model) ❖ Seminars on ADHD/Eating Disorders/ Personality Disorders Healthy Start, Home Visiting, Collaborative Care	❖ Refine policies and procedures from lessons learned ❖ Sustainability plan ❖ Case Discussions (Similar to ECHO model) ❖ Seminars on Resources ❖ Plan for statewide expansion ❖ Endline evaluation

Future Directions

UNC SCHOOL OF MEDICINE

MATTERS Statewide and Sustainability



nc pal Child Psychiatry

Community Care OF NORTH CAROLINA

NCIOM

nc pal Perinatal Psychiatry

UNC SCHOOL OF MEDICINE

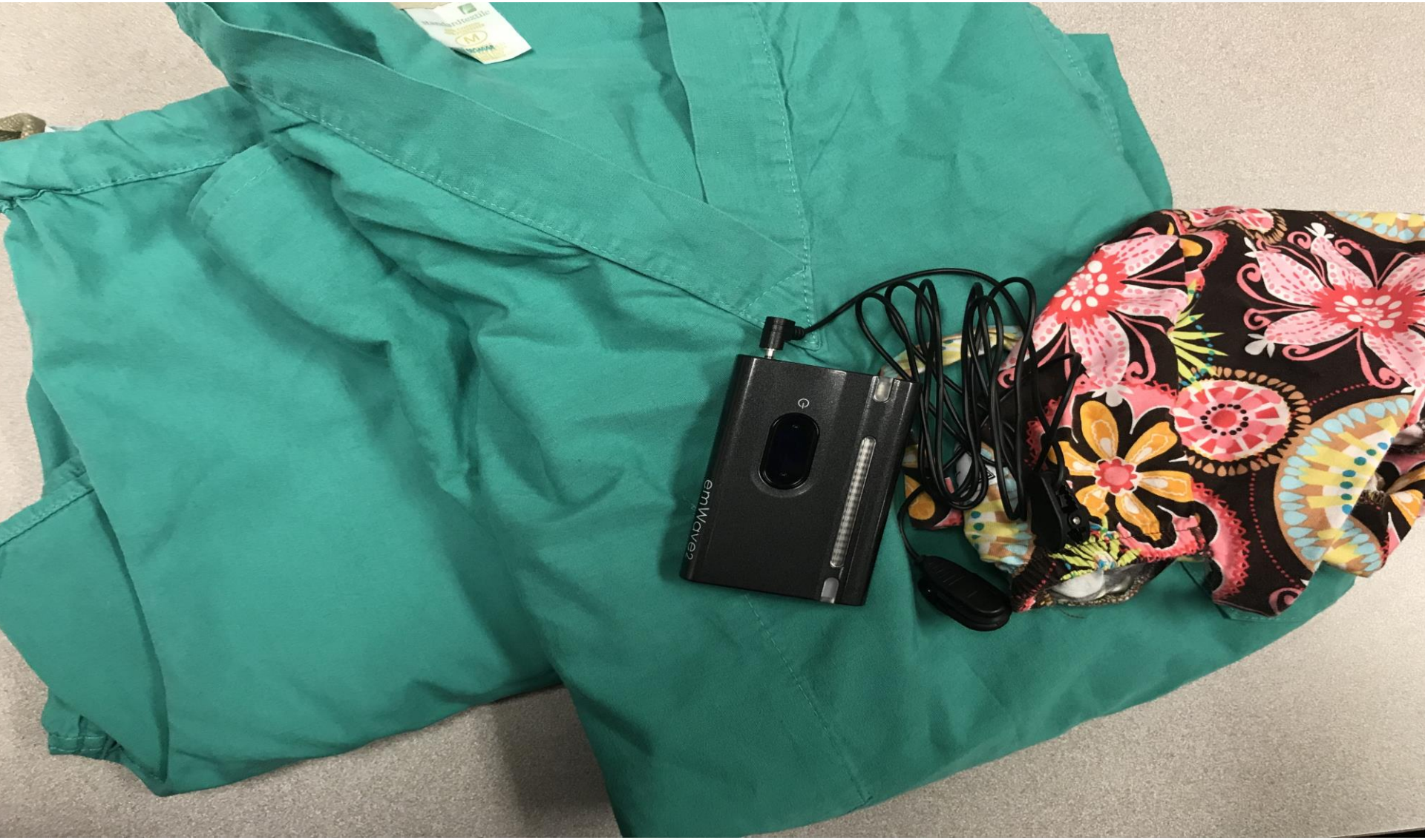
Duke University School of Medicine

PSI

Lifeline4Moms

Other Evidence-Based Practices

- Data systems for population level monitoring
- Collaborative care
- Peer support
- Expansion of home visiting


emWave2

Recommendations?

Thank you!

Contact information:
Mary Kimmel, MD
Medical Director
mary_kimmel@med.unc.edu
@maryckimmel

Hannah Rackers, MPH
MATTERS Program Manager
hannah_rackers@med.unc.edu

www.womensmooddisorders.org

UNC PPIU Inpatient Admissions:

Laurie Gardner 984-975-3834

UNC Outpatient Clinic:

General Line: 984-974-5217
New Patient Line: 984-974-3989