

LEGISLATIVE RESEARCH COMMISSION

COMMITTEE ON ACCESS TO RURAL HEALTHCARE IN NORTH CAROLINA

Mark Stacy MD.

Dean, Brody School of Medicine at East Carolina University

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CEO Vidant Health

Distinguished Professor

Brody School of Medicine at East Carolina University

MEETING THE CHALLENGE



BRODY SCHOOL OF MEDICINE MISSION

For more than 40 years the Brody School of Medicine has consistently - and cost-effectively - delivered on our legislatively-mandated mission to:

- Increase the supply of primary care physicians for our state
- Enhance access of minority and disadvantaged students to a medical education
- Improve the health status of citizens in Eastern North Carolina

North Carolina needs more of what Brody does

MEETING THE CHALLENGE


Brody ranks in the **top 10%**
of U.S. medical schools for
graduating physicians who:

Practice in the state

Practice primary care

Practice in rural and underserved areas

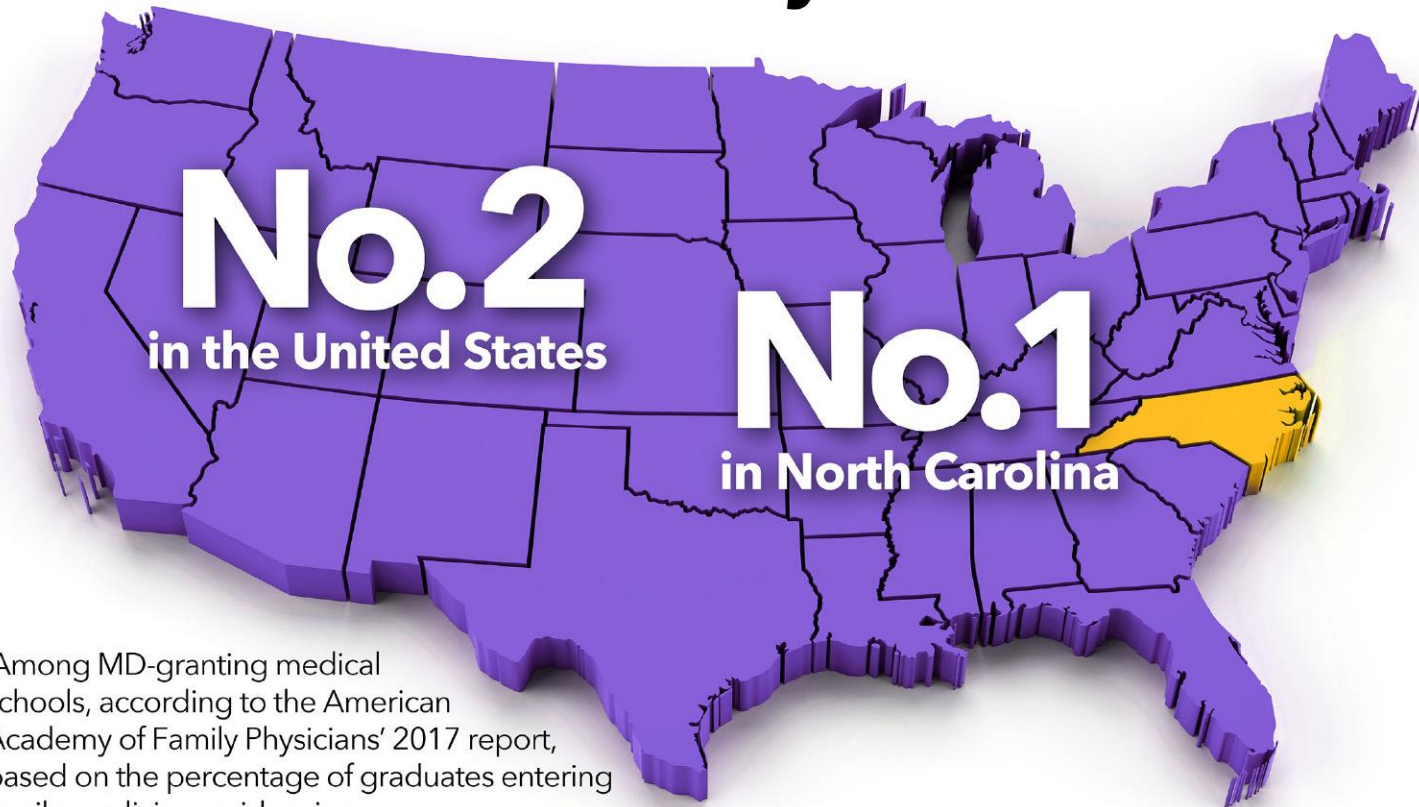
MEETING THE CHALLENGE



Brody graduates
are currently practicing in
83 of NC's **100** counties

MEETING THE CHALLENGE

Percentage of graduates who choose careers in family medicine*



* Among MD-granting medical schools, according to the American Academy of Family Physicians' 2017 report, based on the percentage of graduates entering family medicine residencies

MEETING THE CHALLENGE

Ranked in the **Top 5** for seven straight years

2011 2012 2013 2014 2015 2016 2017

MEETING THE CHALLENGE

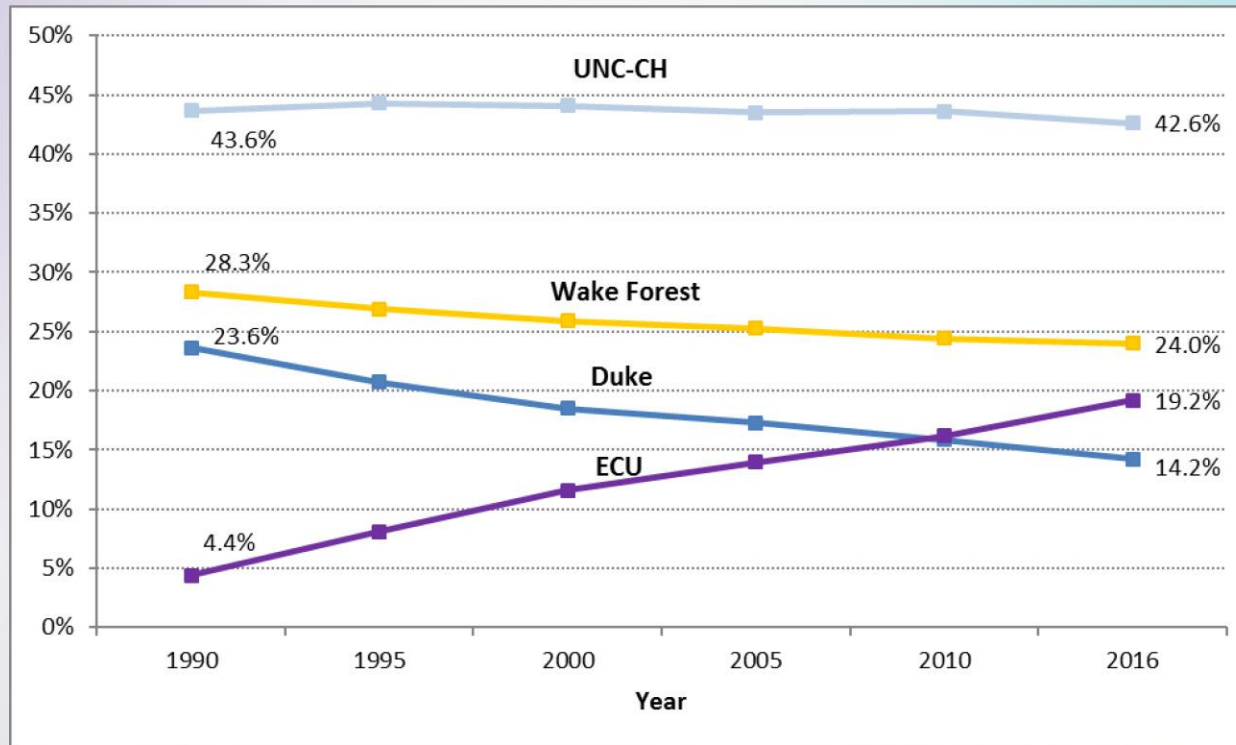


More than **60%** of Brody graduates
are practicing in NC five
years after graduation
—nearly double
the rate of NC's
second-highest
producing
medical
school.

Drs. Darlene Keene '83 '89
and Jamande Jones '10

HIGH PRIMARY CARE RETENTION

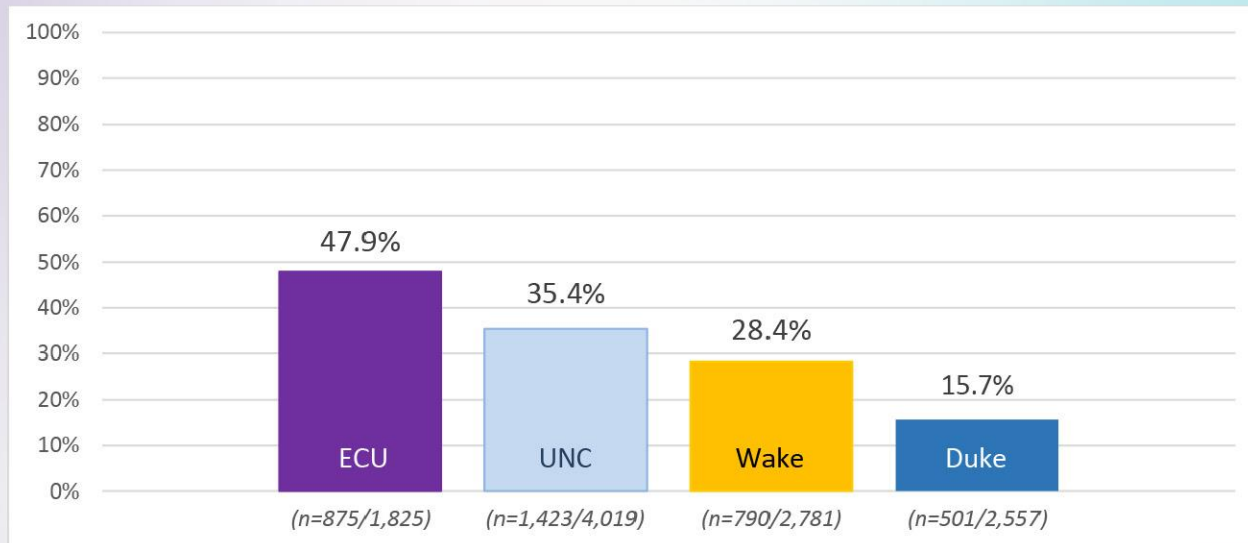
Active Licensed NC-educated Physicians by Medical School Location (1990-2016)



[Data are derived from the North Carolina Board of Medicine and include active, licensed physicians in practice in North Carolina as of October 31 of each year who graduated from an NC medical school, are not residents-in-training, and are not employed by the Federal government. Source: North Carolina Health Professions Data System, Program on Health Workforce Research and Policy, Cecil G. Sheps Center for Health Services Research, University of North Carolina at Chapel Hill.]

HIGH PRIMARY CARE RETENTION

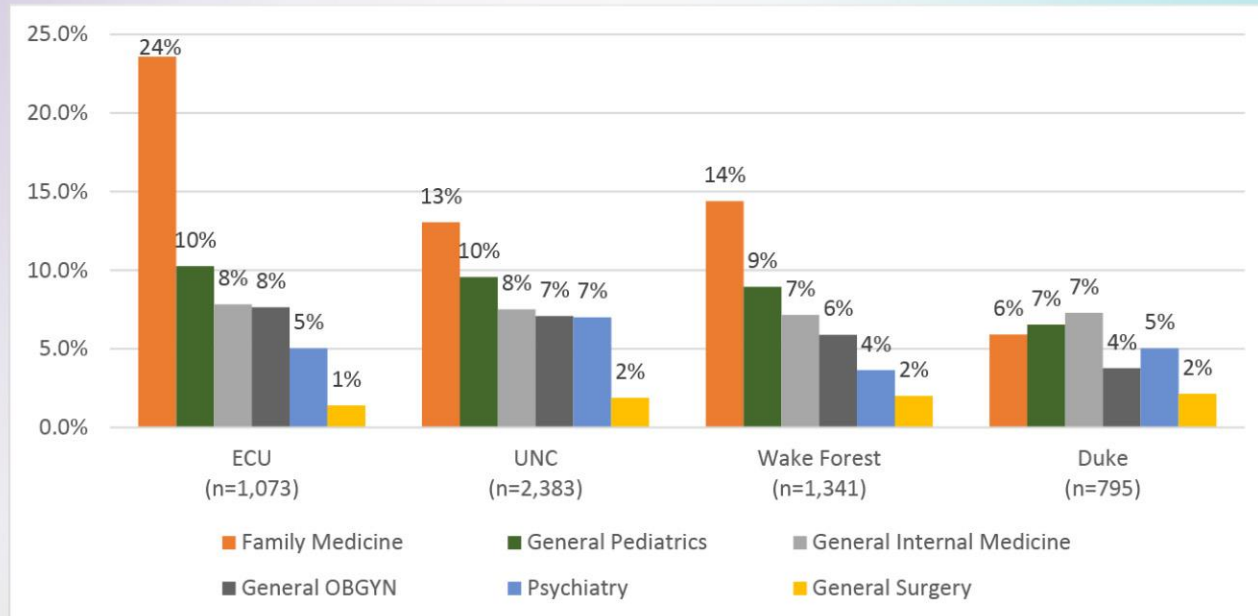
Percentage of Graduates in Active Practice in 2016 NC Workforce (Classes of 1990-2015)



[Data are derived from the North Carolina Board of Medicine and include active, licensed physicians in practice in North Carolina as of October 31, 2016 who graduated from an NC medical school between 1990 and 2015, are not residents-in-training, and are not employed by the Federal government. Data on number of graduates from 1990-2015 obtained from the registrar's office of each medical school. Source: North Carolina Health Professions Data System, Program on Health Workforce Research and Policy, Cecil G. Sheps Center for Health Services Research, University of North Carolina at Chapel Hill.]

HIGH PRIMARY CARE RETENTION

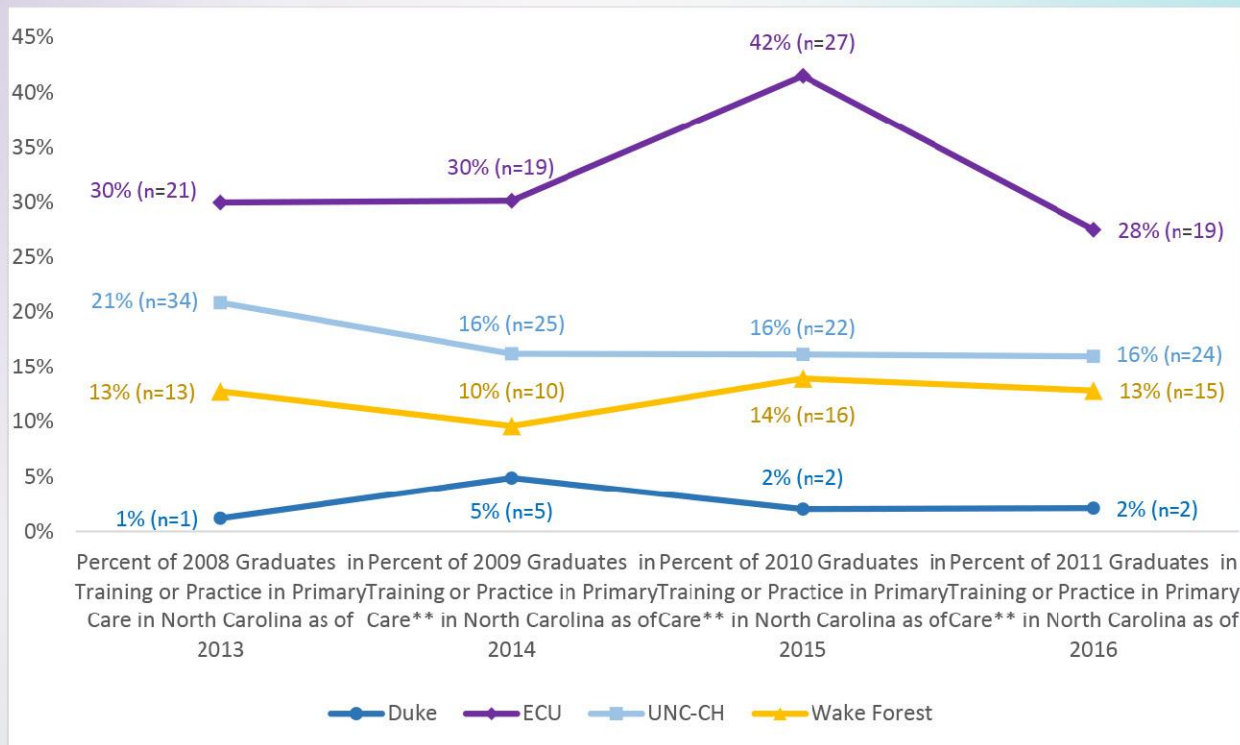
Specialty of Active Physicians in 2016 NC Workforce



[Data are derived from the North Carolina Board of Medicine and include active, licensed physicians in practice in North Carolina as of October 31, 2016 who graduated from an NC medical school, are not residents-in-training, and are not employed by the Federal government. Source: North Carolina Health Professions Data System, Program on Health Workforce Research and Policy, Cecil G. Sheps Center for Health Services Research, University of North Carolina at Chapel Hill.]

HIGH PRIMARY CARE RETENTION

Percentage of NC Medical School Graduates Retained in North Carolina in Primary Care Five Years After Graduating



[Notes: Primary care includes family medicine, general internal medicine, general pediatrics, and obstetrics & gynecology. Data are derived from the AAMC include graduates of the classes of 2008, 2009, 2010, or 2011 from NC medical schools in NC and are matched to data derived from the North Carolina Board of Medicine. NCMB data include active, licensed physicians in practice in North Carolina as of October 31 in 2013, 2014, 2015, or 2016, respectively who graduated from an NC medical school, are not residents-in-training, and are not employed by the Federal government. Source: North Carolina Health Professions Data System, Program on Health Workforce Research and Policy, Cecil G. Sheps Center for Health Services Research, University of North Carolina at Chapel Hill.]

OUR STRATEGY

Before Application

- Health Sciences Academy
- Summer Program for Future Doctors
- Early assurance pipeline programs



OUR STRATEGY

Student Selection Focuses On:

- North Carolina residents
- Applicants from rural areas
- Diversity
- Primary Care interest
- Service orientation



OUR STRATEGY

Tuition and Fees

- Brody graduates have **33% less debt** than peers nationwide



OUR STRATEGY

Curriculum

- Coursework focuses on health disparities, service learning, inter-professional collaboration
- Clinical experience in rural community settings
- Service Learning Distinction Track for students who want to work with medically underserved, marginalized and rural populations



MEETING THE CHALLENGE

Brody can do more

- Expand class size from **80 to 120**
- There were over **1000 North Carolina applicants** for the class of 2021
- Adding 40 slots will result in **17 more doctors annually** practicing in North Carolina

North Carolina needs more of what Brody does

VISION

To be the national model for rural health and wellness by creating a premier, trusted academic health care delivery system for the benefit of the people of eastern North Carolina.

PROFILES IN RURAL HEALTH CARE



KORNEGAY BROTHERS

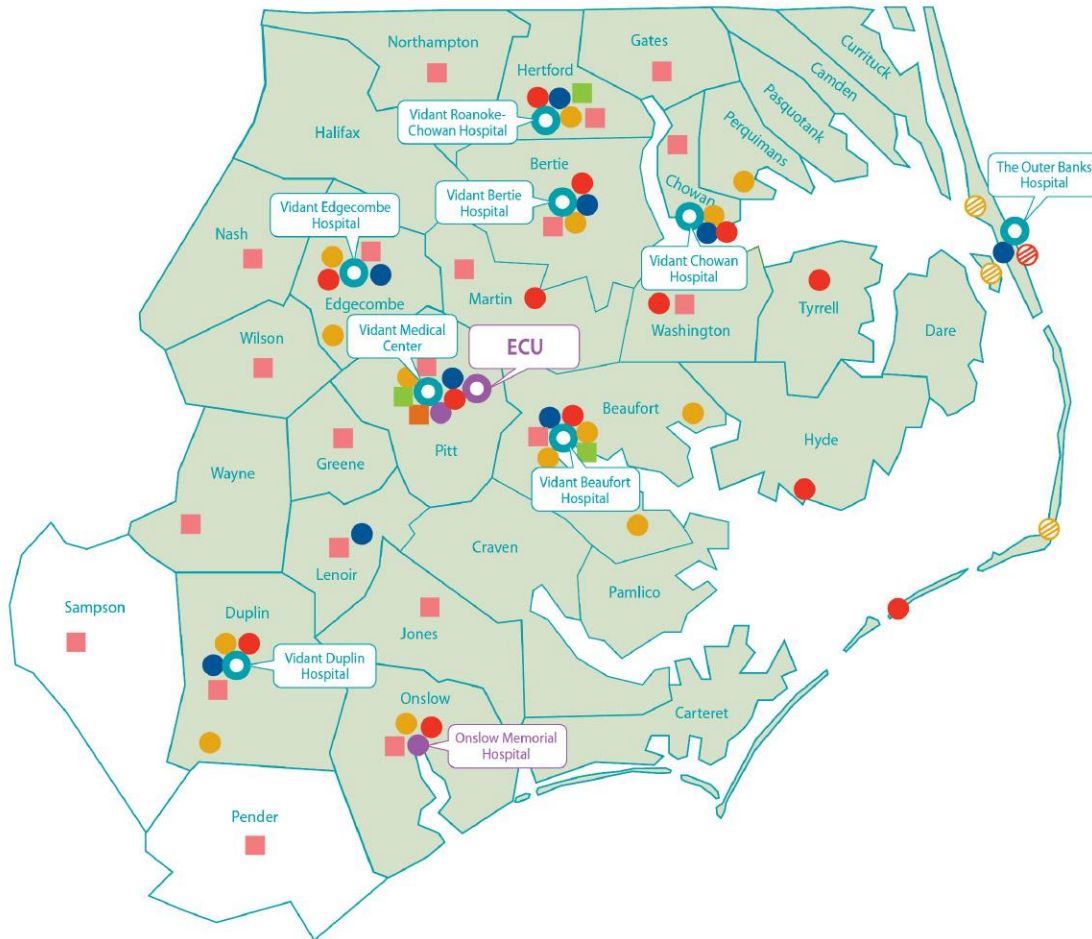
Five of Kornegay's seven children are ECU graduates, with four sons following their undergraduate tenure with a degree from the Brody School of Medicine. These doctors have been shaped by their early exposure to family medicine in a rural area and the mission of ECU's Brody School of Medicine.



DR. EARIC BONNER

A native to eastern North Carolina, Earic completed his undergraduate education at Livingstone College in Salisbury and his medical degree at Meharry Medical College in Nashville, Tennessee. Upon completing his residency in internal medicine at Vidant Medical Center, Earic returned to his hometown of Edenton to start his practice at Vidant Internal Medicine - Edenton. He also works part-time as a hospitalist at Vidant Chowan Hospital.

A SYSTEM OF RURAL HEALTH CARE



OVERVIEW

- 1,048 providers
- 123 Practice Locations
- 39 Primary Care Practices
- 84 Specialty Practices
- Hospital-Based Providers in 9 Hospitals (ED and/or Hospitalist)
- Providers in non-Vidant Health Hospital Areas - Lenoir, Wayne, and Onslow Counties

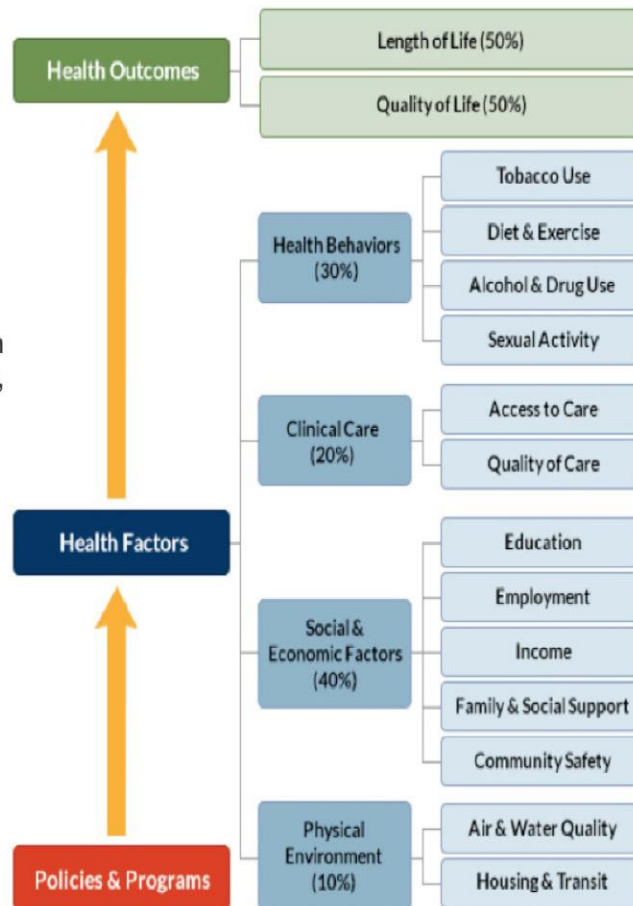
HEALTH CARE NEEDS

- The health of eastern North Carolinians **has improved** since Brody's inception and partnership with Vidant Health.
- When Brody opened in 1979, eastern NC's age-adjusted mortality rates **were much worse** than those across the rest of the state.
- Today eastern NC's mortality rates are projected to match the remainder of the state **by 2020**.
- While the region's mortality rates are beginning to match those of the state and nation, **the burden of chronic disease** in eastern NC remains heavy.

CAPABILITIES - RURAL HEALTH MODEL

True Population Health Management

Requires a collaborative strategy between leaders in healthcare, politics, charity, education, and business



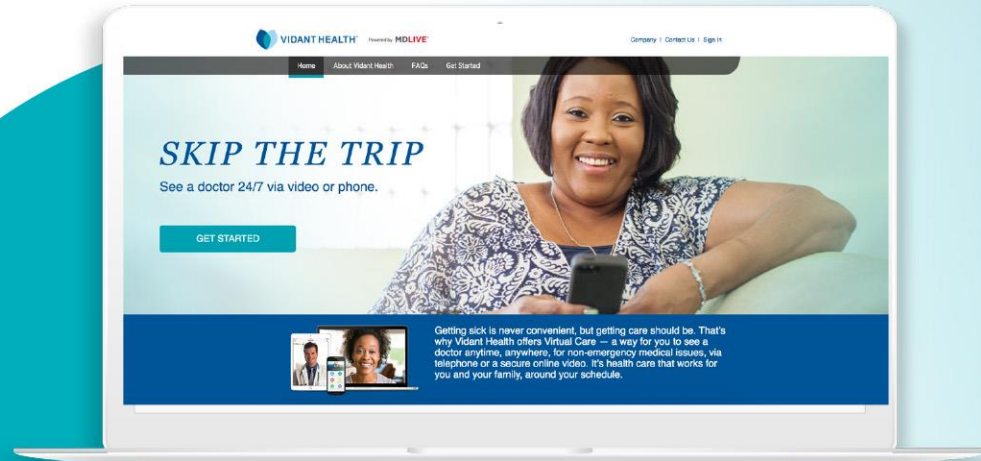
- One Electronic Health Record (EHR)
- Clinically Integrated Network (CIN)
- Education
- Research

Robert Wood
Johnson
Foundation,
2014

CAPABILITIES - VIRTUAL/TELEHEALTH

Online visits with board-certified doctors

- **VidantNow**
- **TeleStroke**
- **TelePsych**
- **Remote Home Monitoring**



VidantNow

- **Anytime:** 24-hour physician access
- **Any device:** computer, phone, tablet
- **Anywhere** - rural access

GRADUATE MEDICAL EDUCATION AT VMC AND BRODY

- **40 Years**
- **40 Programs**
 - 15 residency programs
 - 25 fellowships
- **400+ Physicians-In-Training**

Residency Programs	
Dermatology	Emergency Medicine
Emergency Medicine / Internal Medicine	Family Medicine
Internal Medicine	Internal Medicine / Pediatrics
Internal Medicine / Psychiatry	Obstetrics and Gynecology
Pathology	Pediatrics
Physical Medicine & Rehabilitation	Psychiatry
Surgery	Thoracic Surgery
Emergency Medicine / Internal Medicine / Critical Care Medicine	

FOCUSING ON HEALTH CARE NEEDS

- With an increasing deficit of physicians in North Carolina, Vidant Medical Center serves a vital role in providing physician training opportunities focused on rural health care.
- Due to the young age of our institution at the time the cap was set, our GME program is capped at 260 funded positions (additional positions funded by VMC).
- Have the clinical capacity to train an additional 100-150 residents and fellows.

STATE SUPPORT – MEDICAL RESIDENCY

- **Planning and start-up funds for Rural Training Track Residency program appropriated by NC General Assembly in 2017**
 - Partnership with rural hospitals in eastern North Carolina (both Vidant and Non-Vidant Health hospitals)
 - Residents spend one year at Vidant Medical Center and two years at a rural hospital
 - \$162,857 (FY 18), \$803,804 (FY 19)

Residency Training Programs Practicing in Rural North Carolina:

- 30% of Vidant's **family medicine** residents (17% for all NC)
- 26% of Vidant's **internal medicine** residents (12% for all NC)
- 28% of Vidant's **pediatrics** residents (10% for all NC)
- 33% of Vidant's **OBGYN** (16% for all NC)
- 41% of Vidant's **general surgery** (26% for all NC)
- 25% of Vidant's total residents (11% for all NC)

RECOMMENDATIONS

- Continue to support new primary care GME positions in NC, using the Integrated Rural Training Track model being implemented at VH/ECU
- Allocate expansion funding to institutions that have demonstrated the ability to graduate and retain physicians that meet the healthcare workforce needs of rural NC
 - Expand class size and supporting infrastructure at the Brody School of Medicine to capitalize on a model that has measurable success
- Study methods to increase provider participation as community training sites to support both medical students and residents.

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