DEVELOPMENT AND EVALUATION OF A NURSE PRACTIONER DIRECTED HOME-BASED PRIMARY CARE PRACTICE AND ITS IMPACT ON EMERGENCY ROOM VISITS, OBSERVATION UNIT STAYS, AND HOSPITAL ADMISSIONS

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Spring 2024

Problem Description

- Increase in aging demographic rates
- Medical complexity with aging
- High SDOH needs
- Healthcare system fragmentation

Available Knowledge

- Naylor's work on TOC and readmission rate reduction
  - (Naylor et al., 2018), (Hirschman et al., 2015)
- Veteran's Administration experience on longitudinal HBPC and IPTs
  - (Ritchie, 2021)
- Grace Model-longitudinal wrap around HBPC
  - (Counsell et al., 2016)
- AFHS-4M use across settings for improved geriatric care delivery
  - (Mate et al., 2021)

Rationale & Theoretical Framework

- PDSA-plan, do, study, act
- HBPC will use 4M's model
  - Matters
  - Medications
  - Mentation
  - Mobility
- Access to IPT for consultation
- Project variables are HBPC visits and IPT

Purpose

- Context
  - Geri Fellow training
  - Population Health TOC Model
  - Shift to longitudinal care to close the gap
  - Poor access leads to avoidable hospital use
  - Increasing complexity and home confinement increase hospital use

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Ethical Considerations

- Human Subjects Review Committee application completed
- IRB exempt
- No control group
- Home-confined patients offered HBPC
- Security of data collection

Interventions

- Reviewed Center for Healthy Aging patient panels of 5 providers
- Used structured fields of oxygen use, durable medical equipment, and hospital use in the last year
- Completed outreach scripting, calls made by DNP student and allocated existing medical assistant from practice
- HBPC visits scheduled in the home

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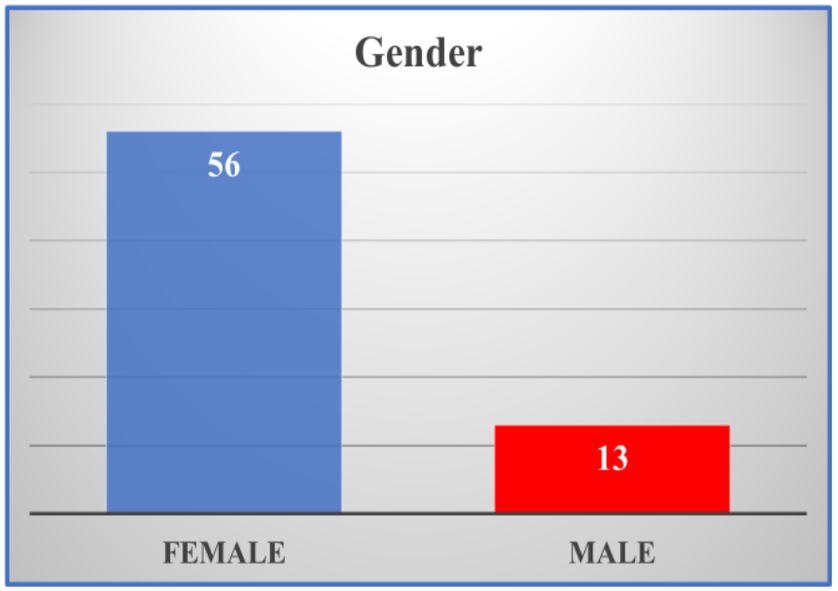
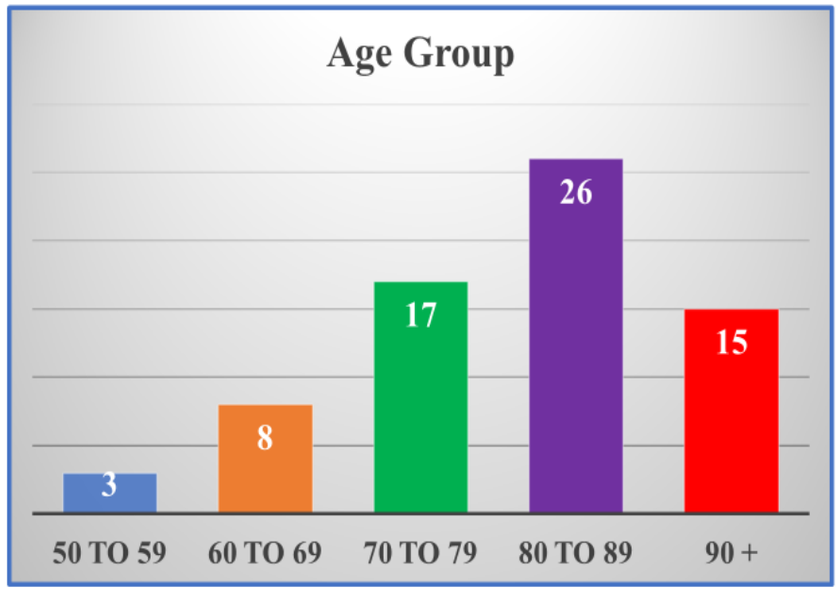
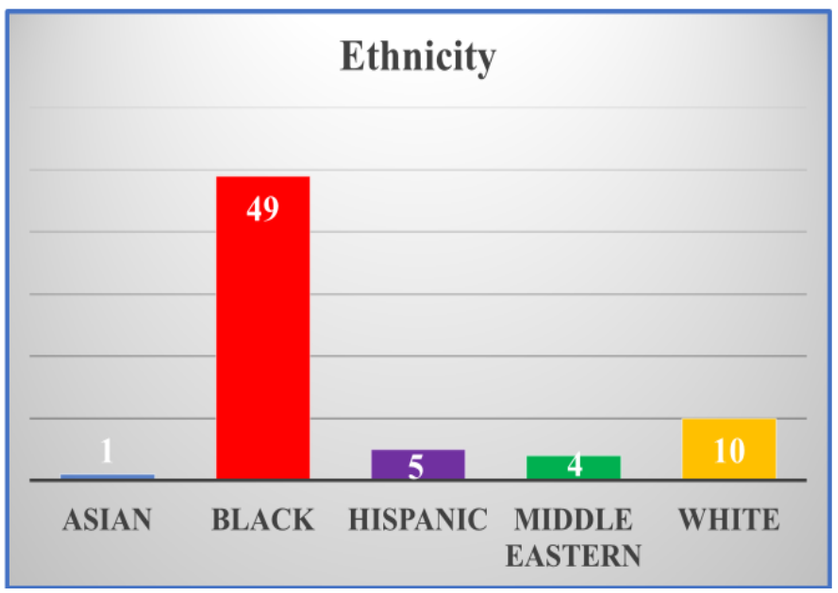
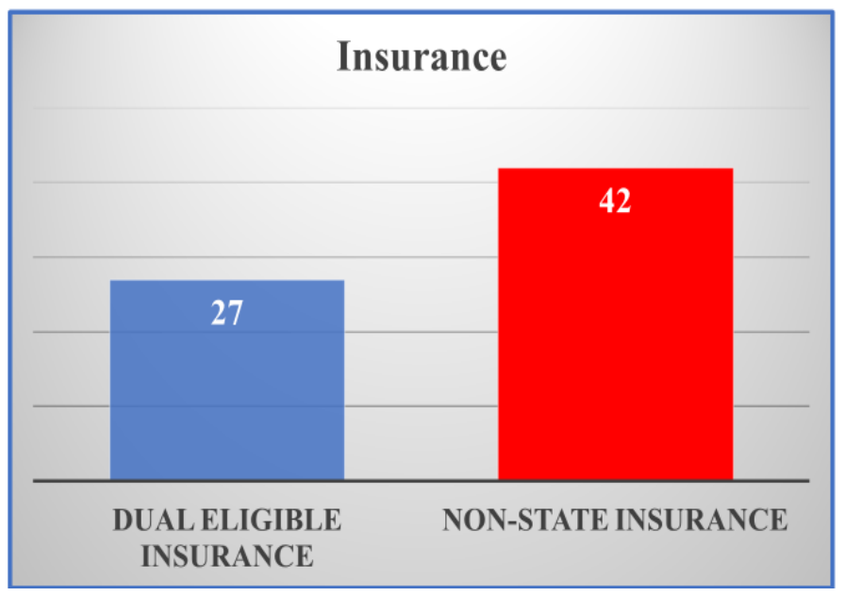
Data Analysis

Patient Characteristics









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Data Analysis

Outcomes

Patient with Multiple Visits - 15 Patients

Groups	*Sum*	*F*	*P-value*
#ER visits- pre	7	0.44	0.647
#ER visits during	3		
Post ER visits-6wks	5		

Groups	*Sum*	*F*	*P-value*
#OBS visits-Pre	1	0.60	0.553
#Obs during	2		
Post Obs visits-6 wks	0		

Groups	*Sum*	*F*	*P-value*
#Admissions-Pre	7	0.43	0.650
#Admissions during	3		
Post Admissions-6 weeks	2		

Patients with One Visit - 54 Patients

Groups	*Sum*	*F*	*P-value*
#ER visits- pre	5	1.73	0.180
#ER visits during	2		
Post ER visits-6wks	8		

Groups	*Sum*	*F*	*P-value*
# OBS visits-Pre	0	1.00	0.370
#Obs during	1		
Post Obs visits-6 wks	0		

Groups	*Sum*	*F*	*P-value*
#Admissions-Pre	4	0.57	0.567
#Admissions during	4		
Post Admissions-6 weeks	7		

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Limitations

- Limitations
  - Access to IPT Consult
  - Volume of patients possible in a day
  - Lack of dedicated MA coordinator and RN
  - Many patients were out of care
- Plans for Sustainability
  - Stakeholder support
  - Patient exemplars
  - IPT team growth
  - AFHS outcome data sharing
  - Present outcomes and value to payors to support the shift to Value-Based Program payments
  - Community Partnerships-Grants
  - Senior Living visit clustering

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Implications for Advanced Nursing Practice

- Dissemination-Pennsylvania Coalition of Nurse Practitioners, Gerontologic Advanced Practice Nurse Association
- AACN DNP Essentials
  - Scientific underpinnings
  - Systems leadership
  - Clinical scholarship
  - Information systems
  - Health Care Policy
  - Interprofessional Collaboration
  - Population Health
  - Advanced Nursing Practice

Conclusion

- Home-Based Primary Care reduces a significant healthcare gap for those with a level of high health needs
- There is significant cost savings possible with HBPC
- Emergency room use, observation visits, and hospital admissions have the potential to be reduced with HBPC

Acknowledgments

- Dr. Denise Lyons, Faculty Advisor
- Dr. Susan Parks, Project Mentor Advisor
- Dr. Anne Mitchell, Project Team Lead
- Dr. Monica Henry, Editor
- Dr. George Cooper, Statistician
- The patients who have allowed me to serve them in their homes

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