# UNITEDHEALTH GROUP® Center for Clinician Advancement



# Introduction

State-based regulations limit nurse practitioners (NPs) from practicing to the full extent of their education and training. With a burgeoning population of insured Americans, an aging and more diverse population, and anticipated shortage of primary care physicians, America's health outcomes are at risk.

The purpose of the project was to investigate the relationships between NP practice environments, provider supply and demand data, and patient health outcomes.

### **Data Sources**

- American Association of Nurse Practitioners
- National Council State Boards of Nursing
- 3. America's Health Rankings
- 4. NP Interviews

# Limitations

- Methodology focused on correlation and not causation
- Numerous confounding variables not addressed
- Convenience sample of NPs

# Correlation of Nurse Practitioner Practice Environment and Health Outcomes

Sue Mullaney, DNP, APRN, GNP-BC, Mary Jo Jerde, BSN, MBA, RN, Susan Jeska BAN, MBA EdD, RN, Chloe Shumaker, BA

# Methods



#### **Environment**

Model 1. Analytic model utilized in this study to explore data sources

#### **Quantitative Analysis**

Descriptive statistics

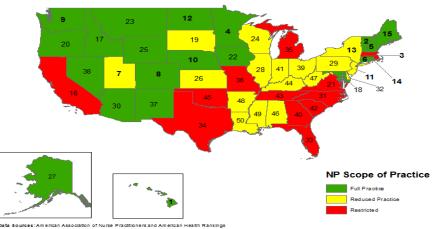
### Bivariate analysis (ANOVA)

## **Qualitative Analysis**

- Interviews of UHG
   employed NPs (n=17)
- Fact-checking interviews

### Results

Positive relationship between practice environment and health ranking (p value = 0.0003)



Map 1. Depicts the NP practice environment (color) and the AHR ranking (numbers)

# **Findings**

"HF patient treated in ER due to lack of signed agreement" (TX NP #1)

"Asthma patient experiences delay in treatment due to inability to order DME" (TX NP#2)

# **Discussion**

- Access to affordable, safe and high quality care remains compromised.
- NPs can fill many of these gaps with full scope of practice.

# **Practice Implications**

- There is opportunity to develop NP advocacy competence to influence policy change.
- NPs should leverage data in messaging.
- Additional research should explore healthcare costs with state rankings to demonstrate the complexity across states and the need to drive policy change.