

Reverse Discrimination?

*Wages of Internationally Educated Nurses
Working in the United States*

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Disclosures

Sat Ananda Hayden is affiliated with the University of Southern Mississippi College of Nursing, Department of Systems Leadership and Health Outcomes

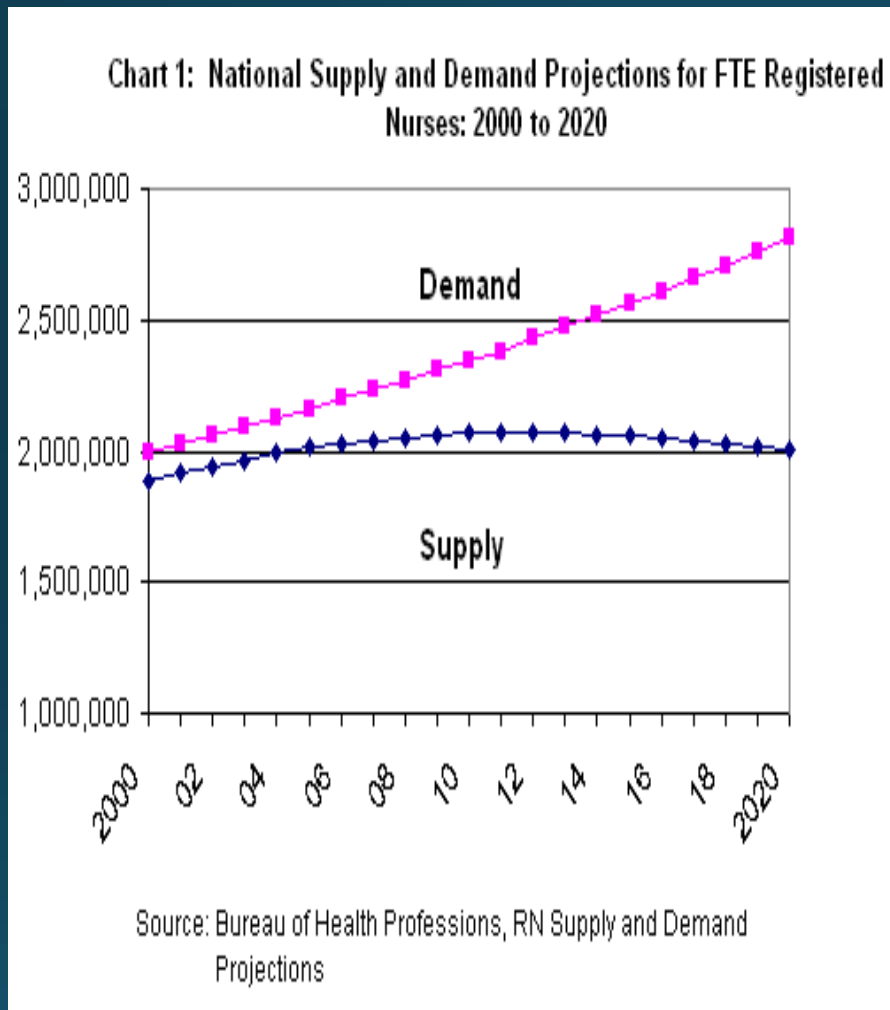
No commercial or private support was received by the author to conduct this research.

No conflicts of interest are reported.

Objectives

At the end of this session attendees will

1. Understand the role played by gender, race, human capital, and market characteristics in wages earned by internationally educated nurses (IENs) working in the United States
2. Relate the effects of gender , race, and human capital in terms of hourly wages earned by IENs
3. Understand the impact of study findings on employer preference
4. State policy implications of wage disparity among IENs



Topics

Problem

Significance

Study

Results

Analysis of Findings

Research Questions

1. Do all IENs earn the same?
2. If NO, are differences due to:
 - MARKET
 - INDIVIDUAL ATTRIBUTES
 - HUMAN CAPITAL INVESTMENT

Findings

- HUMAN CAPITAL investments do not influence wages
- MARKET SECTOR do influence wages
- INDIVIDUAL ATTRIBUTES can influence wages
 - Effects of Race and Gender are interactive
 - Country of Education produces differences in wages

Female IENs earn \$.94 cents for each \$1.00 earned by
a male IEN

Problem

1. 3,063,162 Registered Nurses (RN) in the United States are female (U.S. DHHS & HRSA, 2010)
2. Female RNs face wage discrimination based on gender (Gates & Jones, 2004; Hayden, 2004; Jarrell & Stanley, 2004; Kalist, 2002)
3. Historically, non-white workers in the United States experience wage discrimination based on race
4. Unexplained differences in wages exist between IENs and USENs

Significance

1. Discrimination is an avoidable injustice
2. Laws to eliminate wage inequality have not been effective
3. Preferential wages earned by IENs may signal devaluation of domestic nursing education
4. Nurses who receive lower wages bear a disproportionate burden of health care costs

Background

1. Non-white female teachers and nurses earn more than white female teachers and nurses (McGregory, 2011)
2. IENs earn higher wages than US educated RNs (Schumacher, 2010)
3. Male RNs earn higher wages than female RNs (Jones & Gates, 2004; Hayden, 2004; Jarrell & Stanley, 2004; Kalist, 2002)

Gap:

Wage structure among IENs is unexplored in the literature

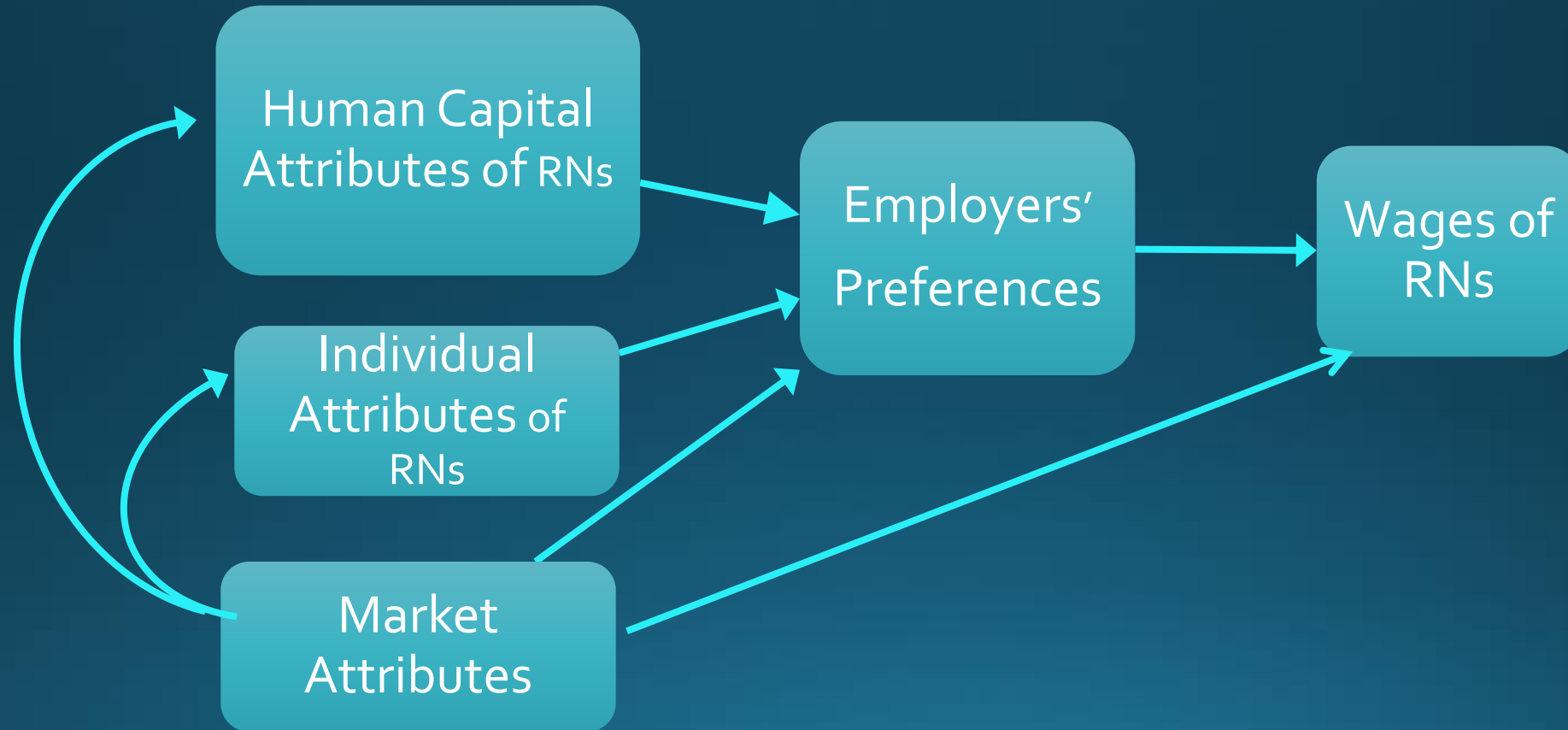
Study

- Data from 2008 NSSRN
- IENs
 - Working Full Time in the U. S. as an RN
 - Minimum of 1 year experience as an RN
 - Active RN license required for job

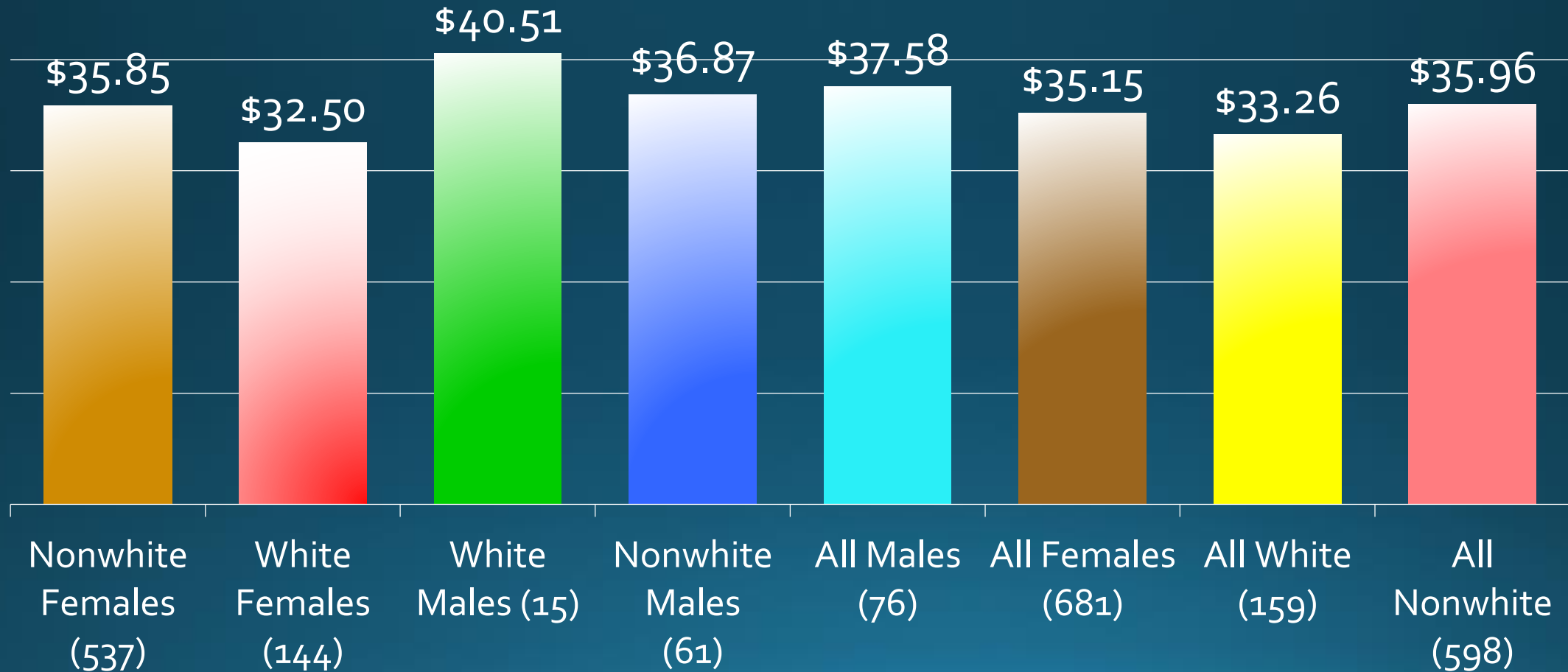
Method

- Linear Regression with post hoc 1 sample t test and effect size
- Secondary Data/ 2008 NSSRN (accessible population = 1548)
- Power Analysis (.05, power of .08, 20 variables) required n=156
- N = 757

Conceptual Model



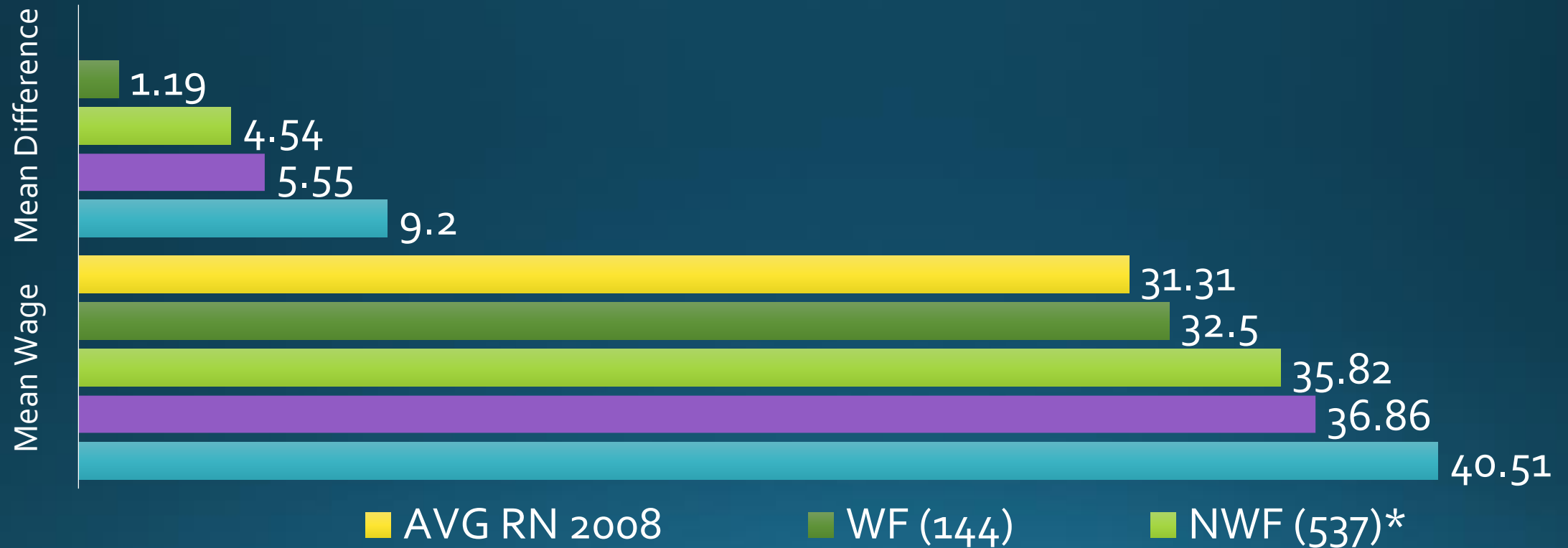
Dependent Variable



Sample: n = 757

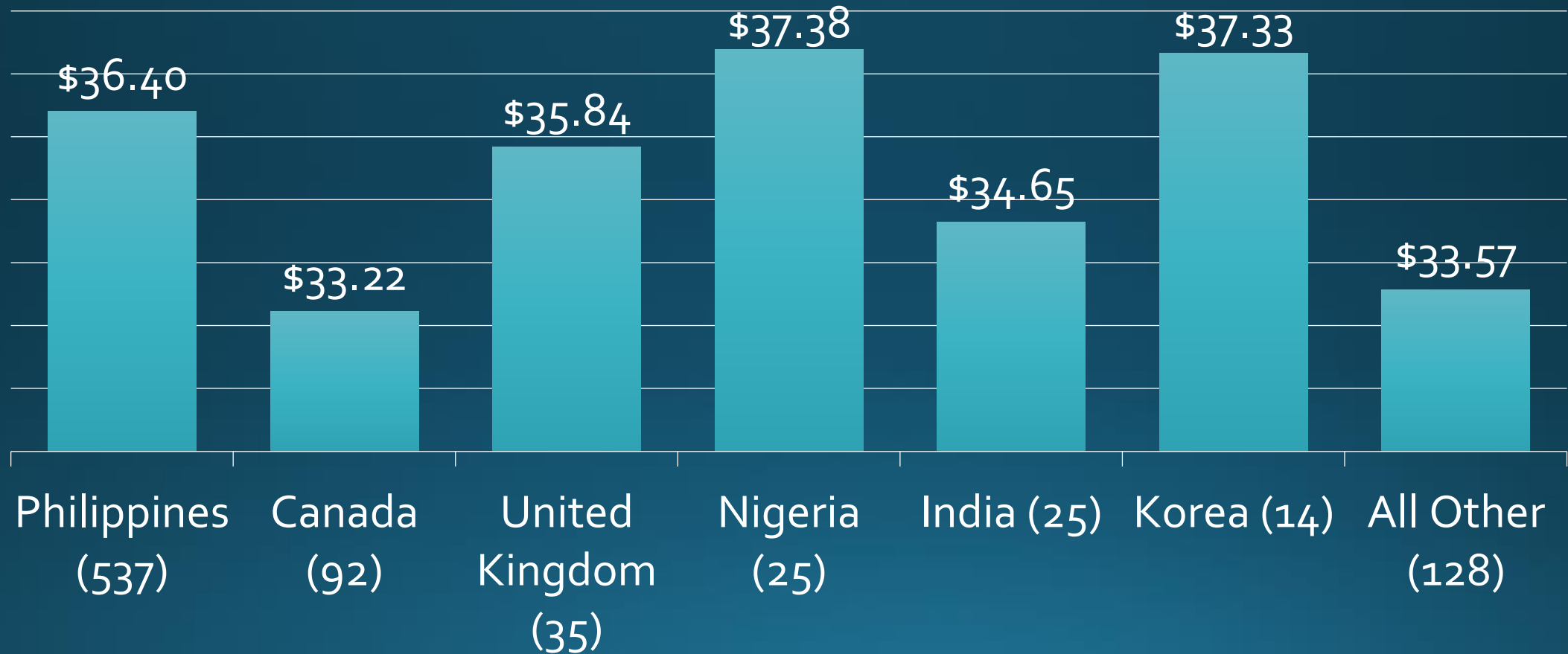
- White IENs n = 159
 - Canada (92)
 - United Kingdom (35)
 - Other (53)
- NonWhite IENs n = 598
- Male IENs n = 76
 - Philippines (48)
 - Canada (10)
 - United Kingdom (4)
 - Nigeria (3)
 - India (2)
 - Other (9)
- Female IENs n = 681

Comparison of Mean Hourly Wages with Average Wage for RNs in 2008

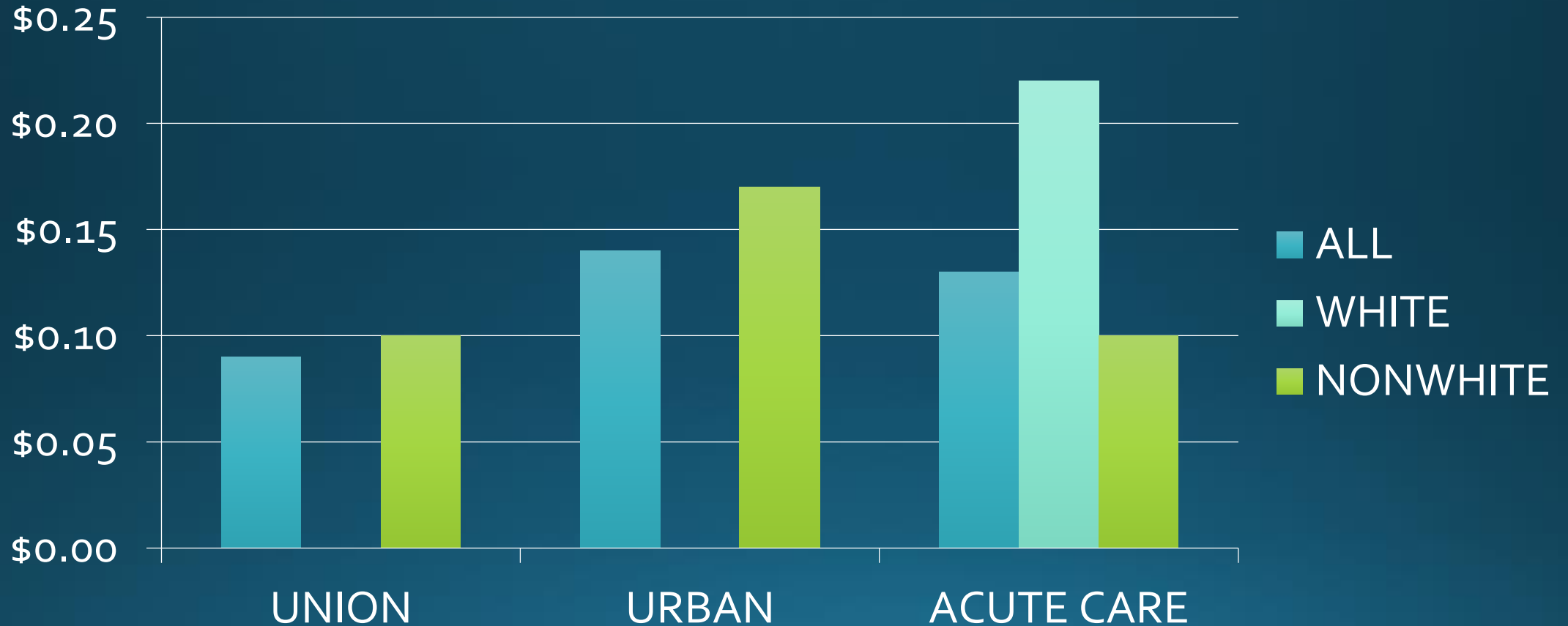


* statistically significant at $p < .001$

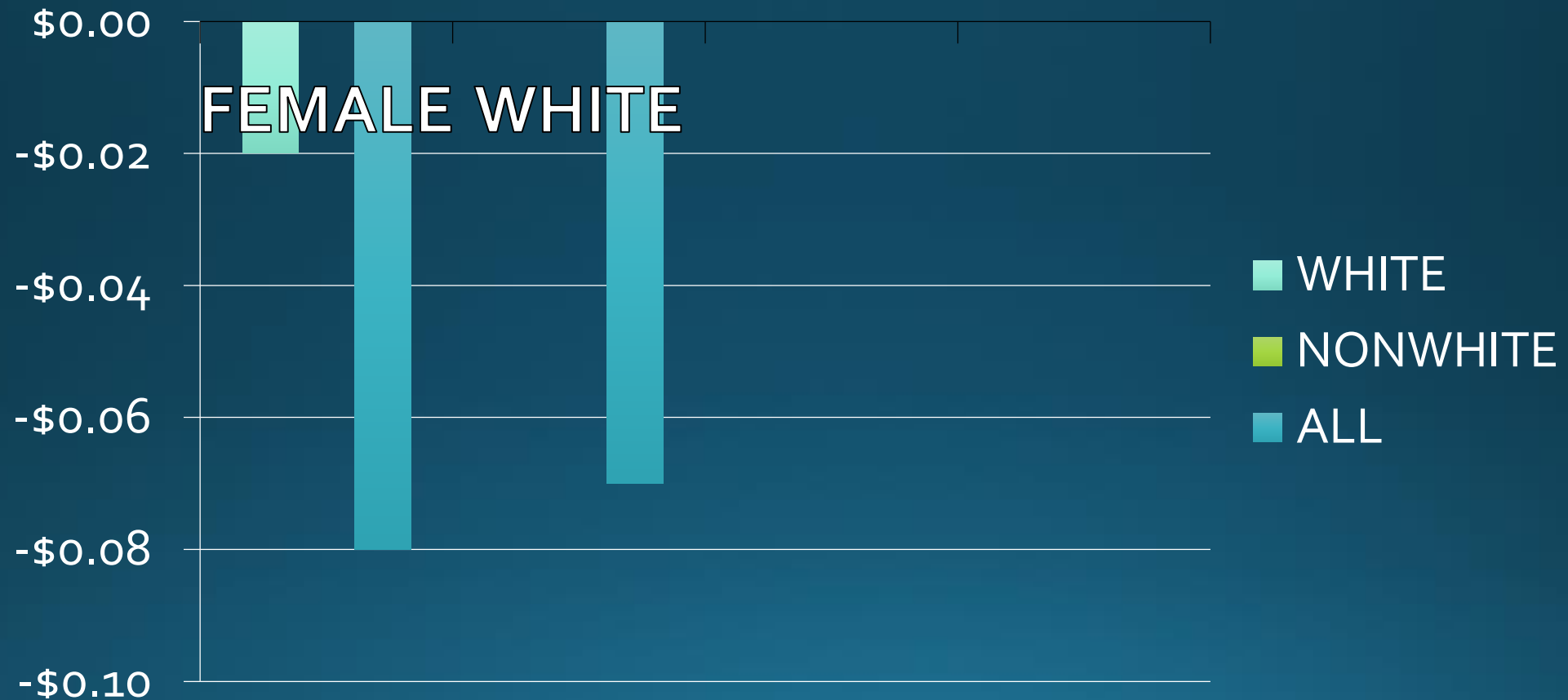
Mean Wage by COE



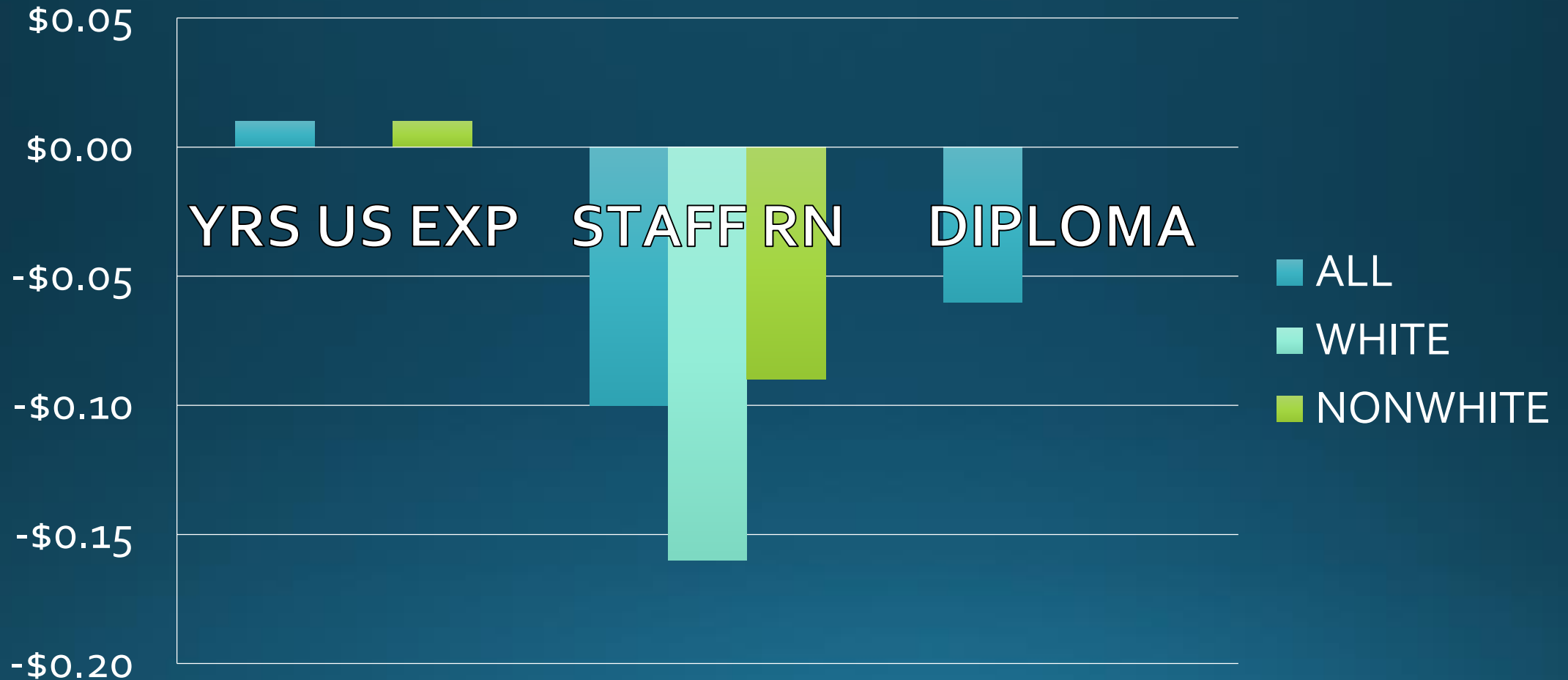
Market Impact on Wages



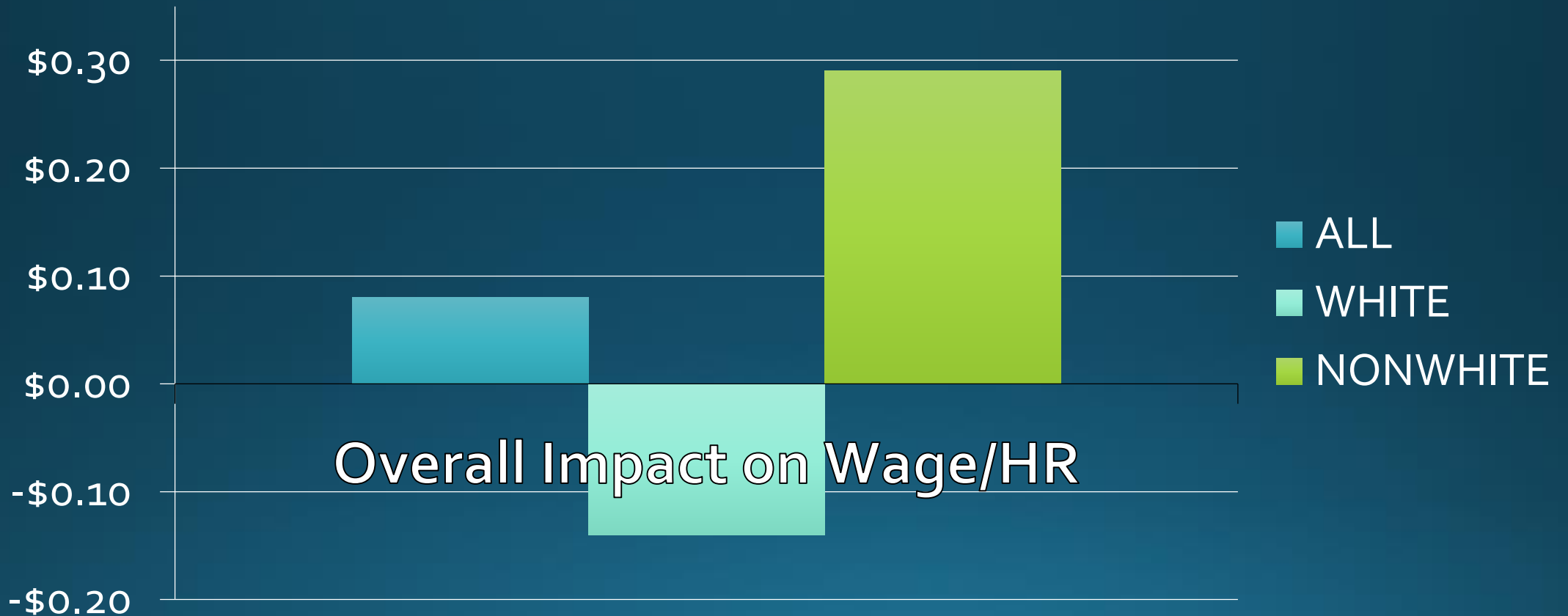
Individual Attribute Impact on Wage



Human Capital Impact on Wages



Overall Impact on Wages



Statistically Significant Sources of Inequality

- Years of US experience +
- Working in a tertiary setting +
- Working in an urban location +
- Holding a staff nurse position -
- Union membership +

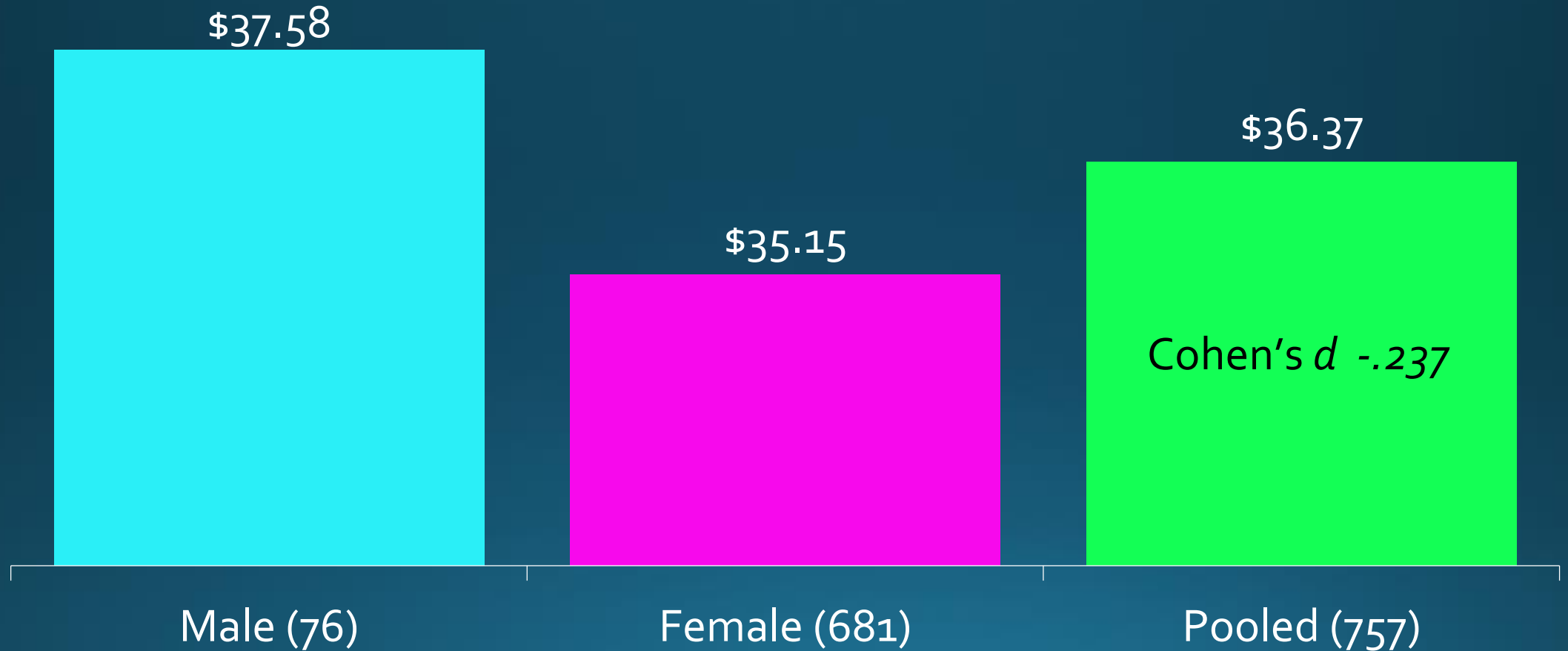
$$R^2 = .143$$

$$F(8, 748) = 15.62$$

$$P = 0.000$$

$$n = 756$$

Difference in Hourly Wage By Gender



Wage Differences by Race

- Years experience working in the U. S. +
- Working in a tertiary setting ++
- Working in an urban location ++
- Holding a staff nurse position --
- Being female -
- Union membership ++

White

$$R^2 = .15$$

$$F(3, 155) = 5.634$$

$$p = 0.031$$

$$n = 158$$

Nonwhite

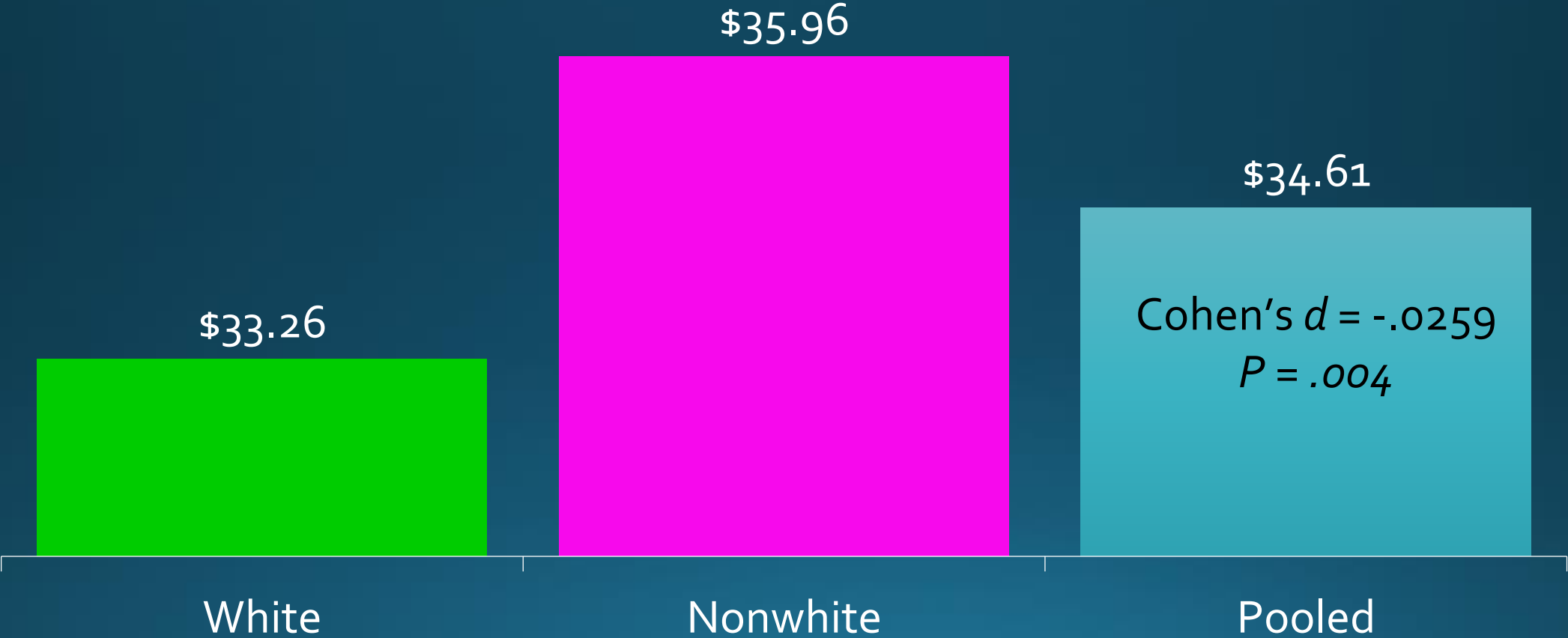
$$R^2 = .126$$

$$F(5, 592) = 17.06$$

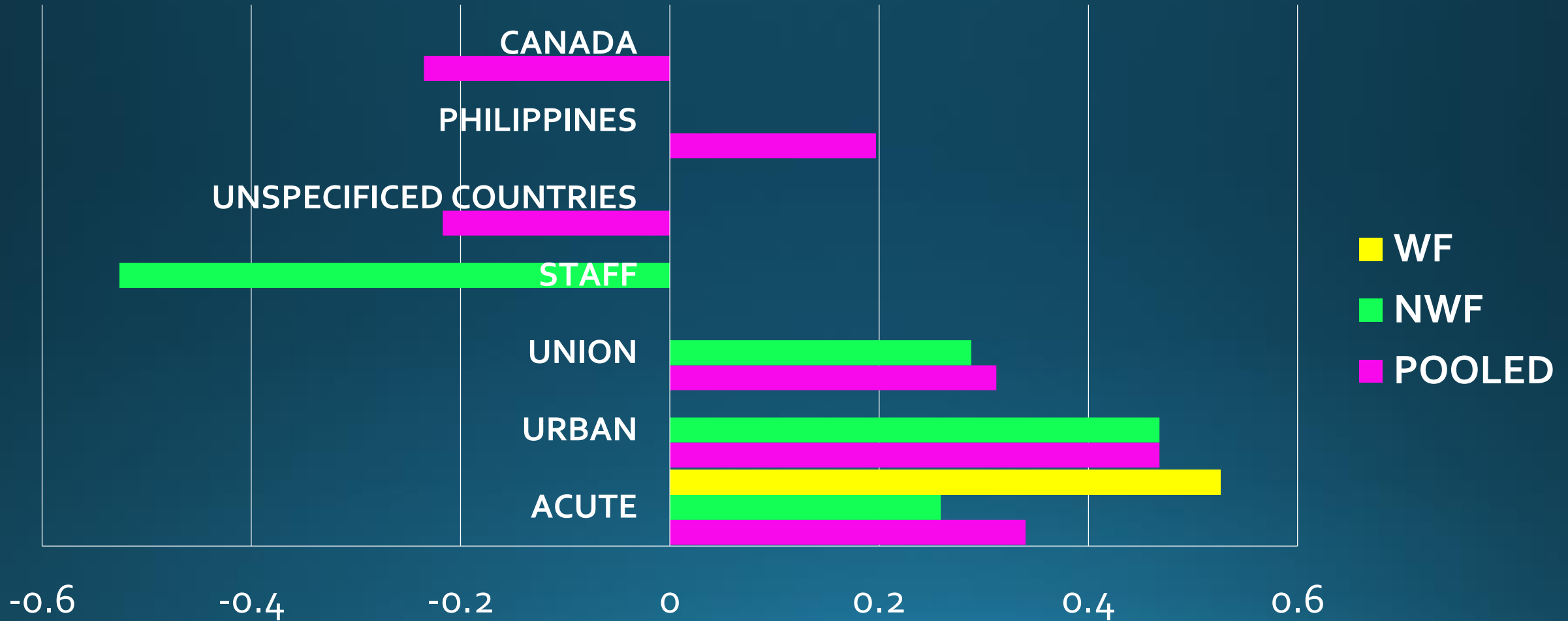
$$p = 0.006$$

$$n = 597$$

Difference in Mean Hourly Wage by Race

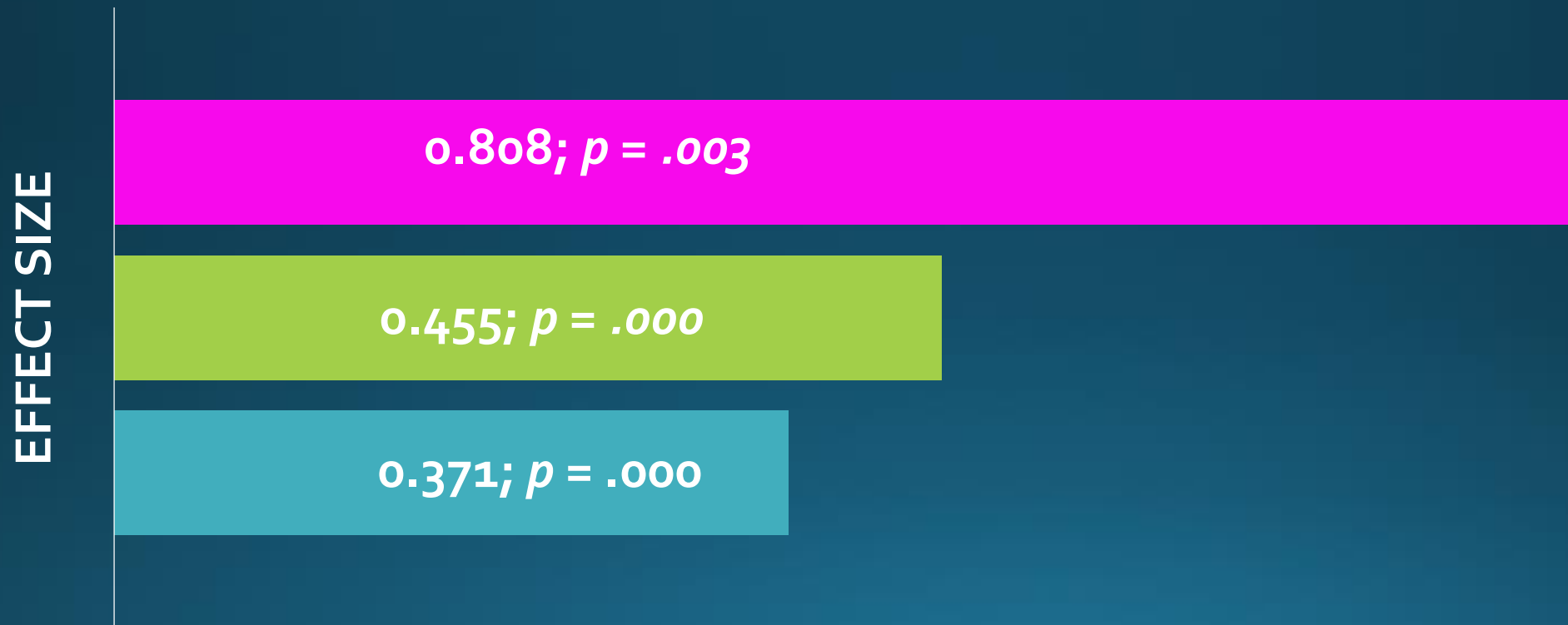


Variables with Statistically Significant Differences in Mean Hourly Wage By Race and Gender ($p \leq .013$)

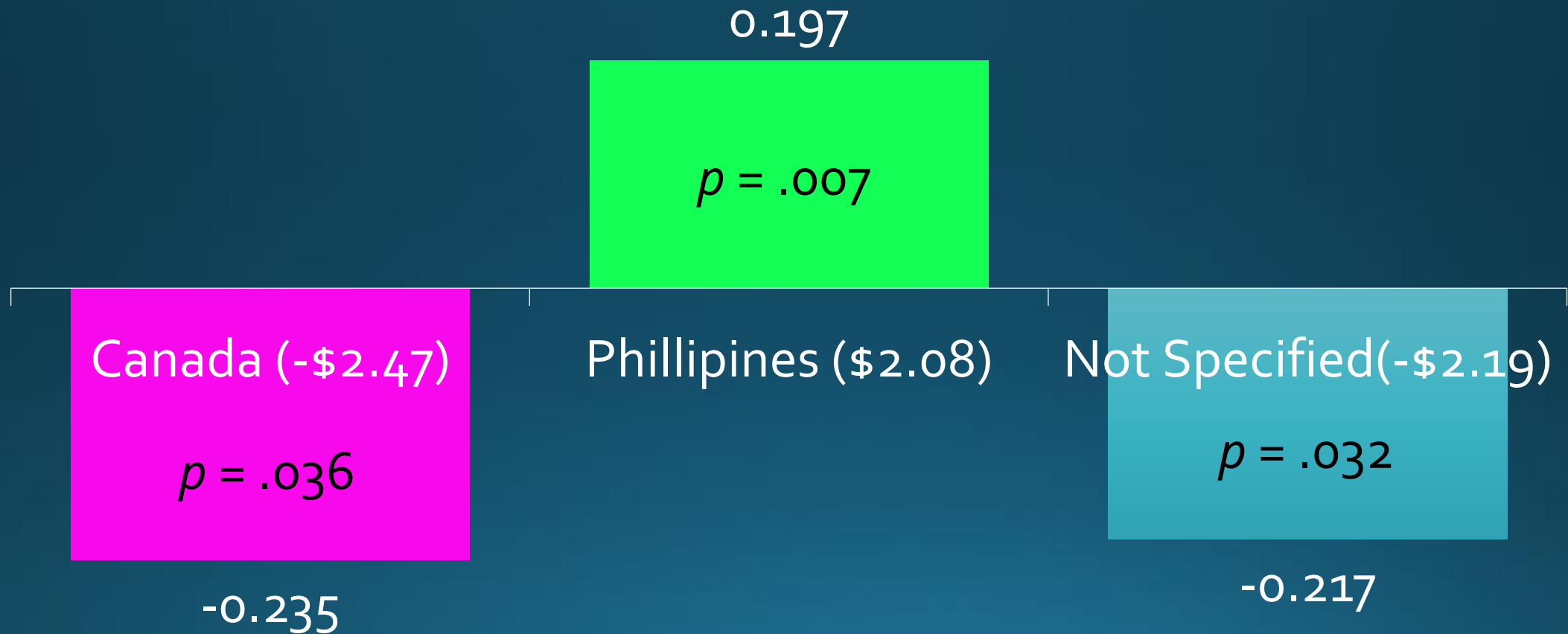


Differences in Mean Hourly Wage by Race and Gender Compared with White Males

WF (32.50) NWF (35.85) NWM (36.86)



Effect Size of Wage Difference by COE



Summary of Results ($p < .05$)

- IENS earn more if they
 - Are not staff RNs
 - Work in tertiary care
 - Are represented by a union
- IENs educated in Canada and the Philippines earn different wages
- Employers show preference for White Males

Conclusions

- The *combination* of race and gender contribute to statistical and practical differences in wages
- Higher nonwhite IEN wages are the result of gender penalties paid by white female IENs
- No relationship between human capital variables and wage
- Country of education contributes to wage inequality
- Differences are both practically and statistically significant

Implications for Policy

1. Equal pay for equal work is a wicked problem
2. A clumsy solution may be successful
3. Addition of wage equality measures to Magnet or accreditation status may be useful

Limitations

- Omitted variables
- Cost of Living
- Employer attitude (statistical discrimination)
- Institutional discrimination

Recommendations for Future Study

1. Inclusion of Cost of Living data
2. Impact of institutional discrimination
3. Employer attitudes (statistical discrimination)
4. Development of an index of nurse characteristics to predict wages

Questions?



Thank You for Your Time, Attention, and Support

Photo Credits

Slide 2: Clockwise from Top

1. Foreign Nurse – USA <http://www.assistantships.com/foreign-nurse-services.htm>
2. Dugger, C (May 24, 2006). U.S. Plan to Lure Nurses May Hurt Poor Nations. *New York Times*. http://www.nytimes.com/2006/05/24/world/americas/24nurses.html?pagewanted=all&_r=0
3. Saskatchewan Institute of Applied Science and Technology <http://gosiast.com/programs-and-courses/programs/Orientation-to-Nursing-in-Canada-for-Internationally-Educated-Nurses.aspx>
4. Posted by contributor NT (August 30, 2012). *Honor or disgrace? A glimpse in the nursing community of Pakistan* <http://www.nursetogether.com/a-glimpse-in-the-nursing-community-pakistan>
5. Center photo: Foreign Nurse Inc. http://foreignnurseinc.com/doc_news1_en.php

Slide 22:

Childs, B (March 9, 2012) [blog], *Nurses Immigrating To The U.S.*, Photo by Glen McBethlaw, <http://nursinglicensemap.com/nurses-immigrating-to-the-u-s>

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