## Defining Diversity and Offering Access to All

Modupe N. Akinola Columbia Business School

NDEW 2017- Focus Session: Organization and Management of Diversity

## Gateways vs. Pathways



- Entry points into valued organizations, communities or institutions
  - E.g., admissions, hiring, promotion; decisions requiring a yes/no response



- Fluid processes that influence one's ability to access an entry point and succeed after entry
  - E.g., mentorship, sponsorship, feedback, social network processes

(Chugh & Brief, 2008; Milkman, Akinola, & Chugh, 2015)

## Agenda and Focus of Talk

## Inequities in Gateway Processes

#### Key Focus

- Organizational-level decisions
- Perceptions
- Racial diversity



#### How do definitions of diversity perpetuate social inequity in organizations?

(Akinola, Opie, Ho, Castel, Unzueta, & Brief, working paper)

## Inequities in Pathway Processes

#### Key Focus

- Individual-level decisions
- Contextual factors
- Race and gender diversity



## When and where is discrimination most pronounced in academia?

(Milkman, Akinola, & Chugh, 2012) (Milkman, Akinola, & Chugh, 2015) Inequities in Gateway Processes

Diversity Isn't What It Used To Be: The

Consequences of Broad Diversity

Definitions

### Collaborators



Tina Opie Babson College



Geoff Ho Google, Inc.



Safiya Castel UCLA

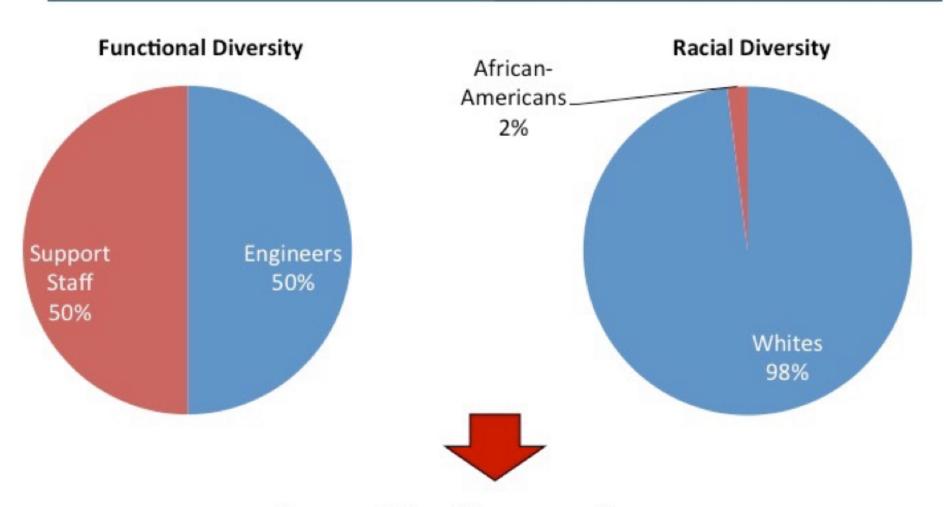


Miguel Unzueta
UCLA



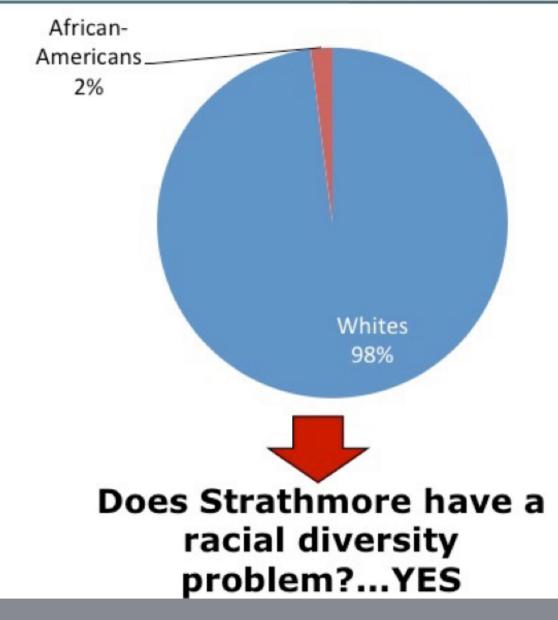
Art Brief University of Utah

## Strathmore's Diversity Statistics



## Does Strathmore have a racial diversity problem?

## Strathmore's Racial Diversity



## **Diversity Definitions**

#### Narrow

- Focused on legal (EEOC protected) categories
  - Sex/Gender
  - Race/Ethnicity
  - LGBT
  - Religion
  - Disability
  - Age/Generational Difference
  - National Origin

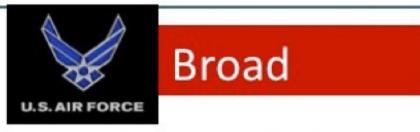
#### **Broad**

- Focused on any category of difference
  - Legal categories
  - Background/culture
  - Perspectives
  - Skills/abilities/talents
  - Socioeconomic
  - Education
  - Lifestyles/Interests
  - Ideologies
  - Functional knowledge
  - Etc...

## UC Berkeley vs. U.S. Airforce

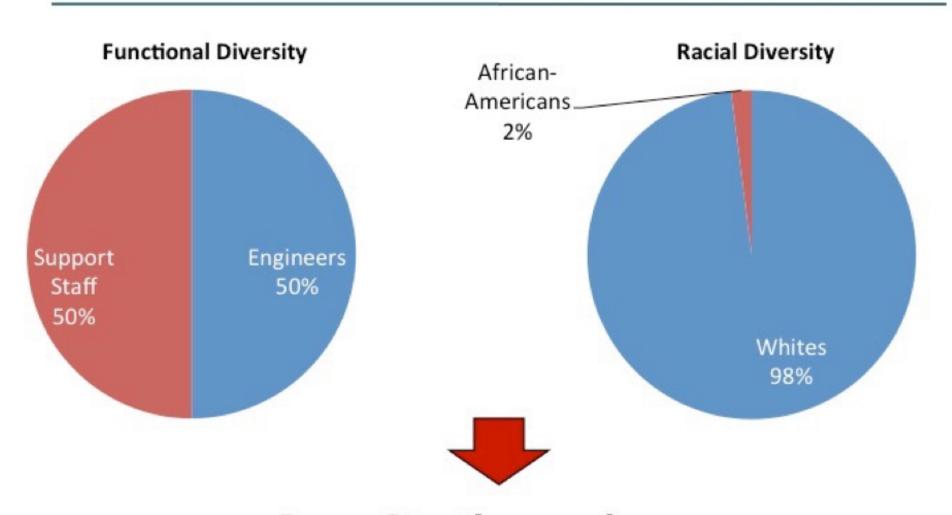


UC Berkeley (2013) defines faculty diversity along the categories of: "members of groups that have been historically underrepresented in higher education such as women, ethnic minorities, religious minorities, differently-abled, lesbian/ gay/bisexual/transgender and others..."



U.S. Airforce (2013) defines diversity along the categories of: "personal life experiences, geographic background, socioeconomic background, cultural knowledge, educational background, work background, language abilities, physical abilities, philosophical/spiritual perspectives, age, race, ethnicity and gender"

## Strathmore's Diversity Statistics



## Does Strathmore have a racial diversity problem?

## Theory and Hypotheses

Edelman, Riggs Fuller, & Mara-Drita (2001)

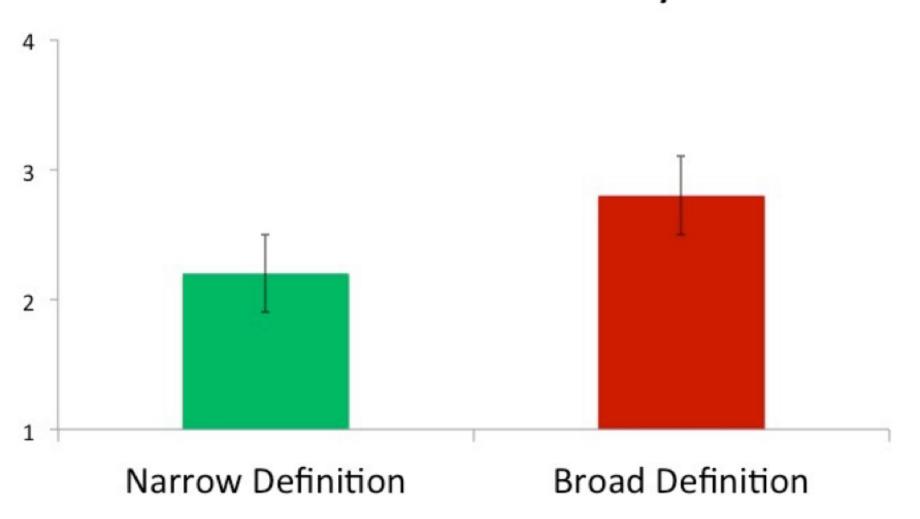
- Broad definitions shift discourse away from legally protected groups
  - Attention focused on other dimensions of diversity
    - E.g., functional diversity vs. racial diversity

- May result in...
  - Organizations failing to recognize inequities pertaining to groups protected by law

- 150 participants from an online participant pool
- Manipulated whether participants saw a broad or narrow definition of diversity
- Showed the two pie charts
- Asked them:
  - Do you perceive Strathmore to be diverse? (3 items)
  - Does Strathmore have a racial diversity problem? (2 items)

Study 1

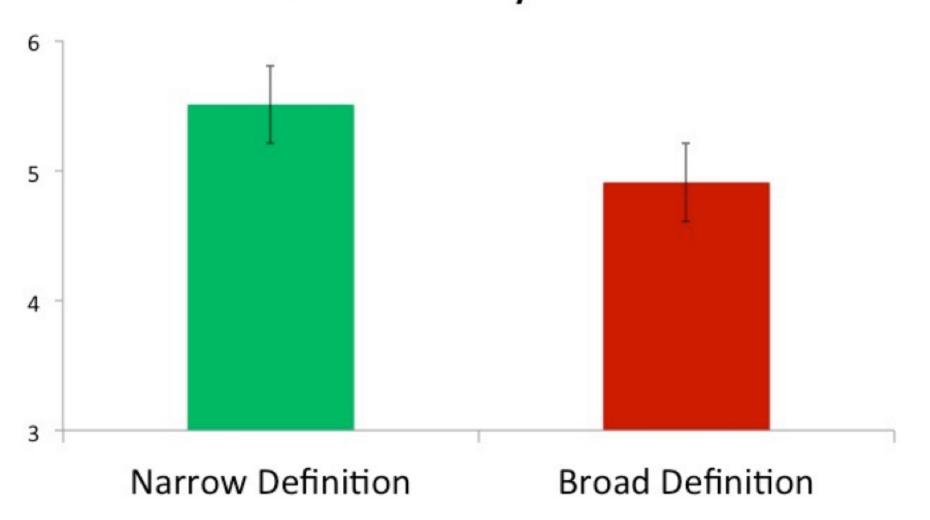
## Perceived Diversity



t(148) = 2.37, p = .02

Study 1

## Racial Diversity Problem

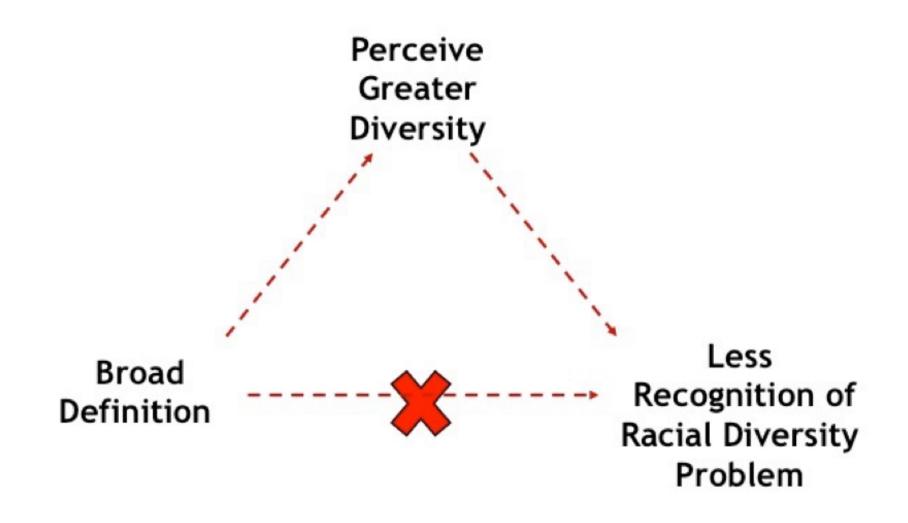


t(147) = 2.31, p = .02

## Goal of Mediation Analysis



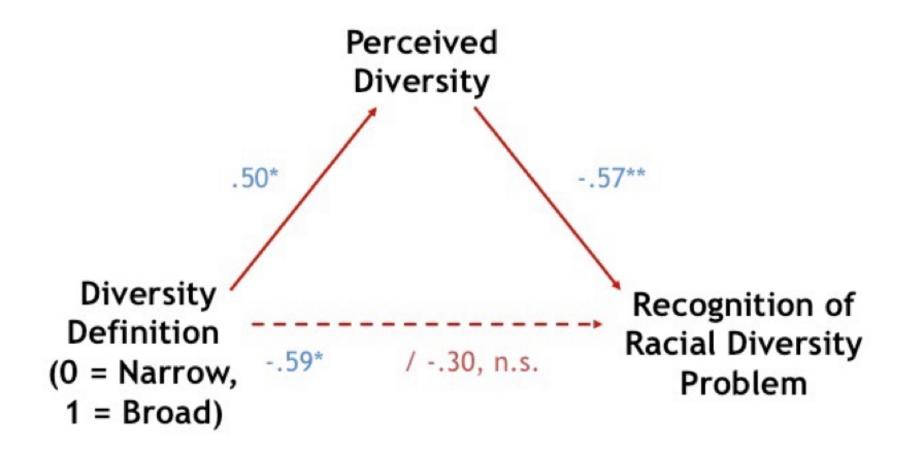
## Goal of Mediation Analysis



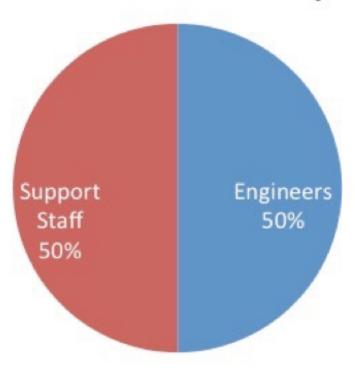
## **Mediation Analysis**

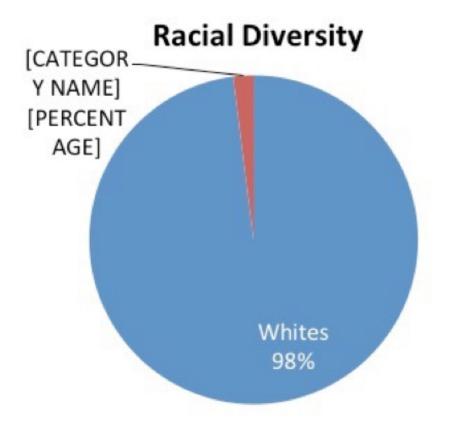


## **Mediation Analysis**

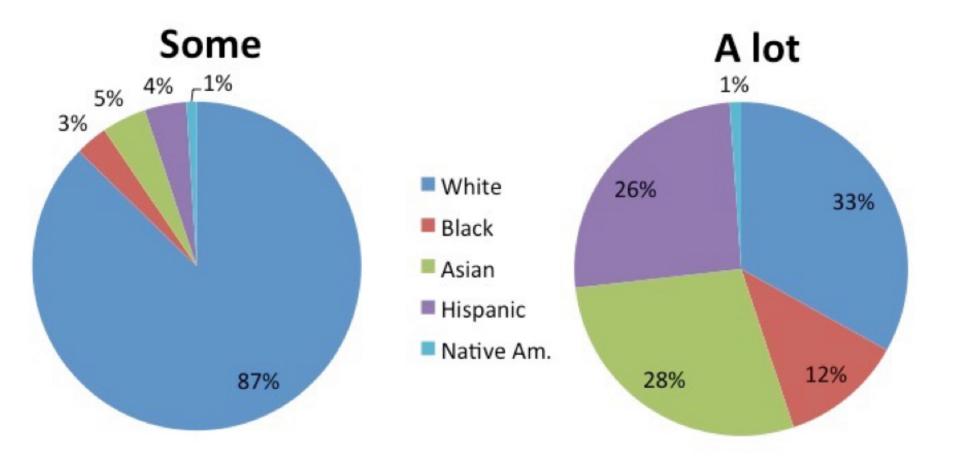


#### **Functional Diversity**





Strathmore's Racial Diversity



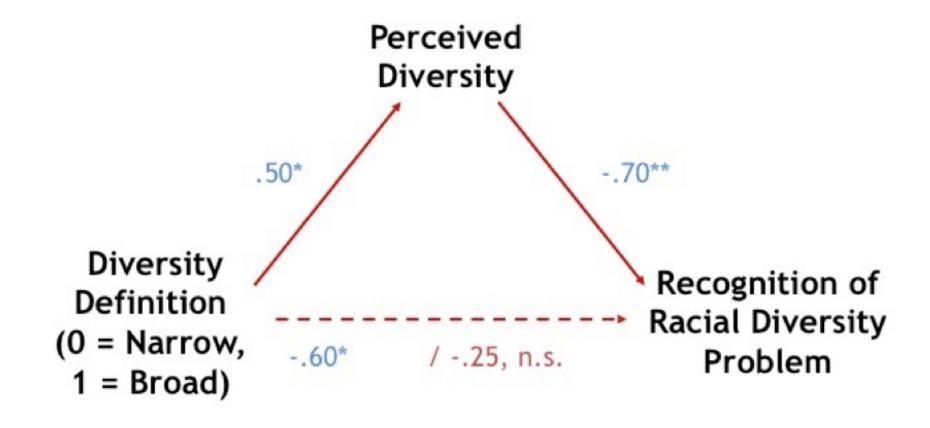
## **Mediation Analysis**

```
Diversity Recognition of Racial Diversity

(0 = Narrow, -.60* Problem

1 = Broad)
```

## Mediation Analysis



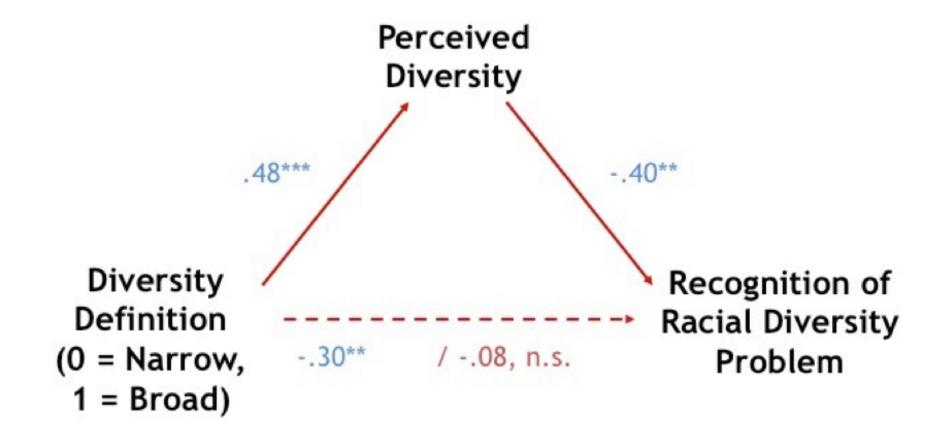
#### 73 MBA students

- Survey
  - "how was diversity defined at your most recent place of employment?"
    - Rated on a 1-5 scale (broad vs. narrow)
    - Coded statements
- Asked them:
  - Perceived diversity of most recent place of employment? (3 items)
  - Whether the company had a racial diversity problem? (2 items)

## **Mediation Analysis**



## **Mediation Analysis**



Do companies with more broad diversity definitions have a lower representation of minorities and women?

#### Diversity Statements

- Taken from company websites
- Broad vs. Narrow coded subjectively and objectively

#### Diversity Statistics

- Source: Building a Better Legal Profession (BBLP)/ the National Association for Legal Career Professionals (NALP)
- % Women and % Minorities (Whites, Blacks, Hispanics, Asians)



## Do companies with more broad definitions have a lower representation of women and minorities?

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## Do companies with more broad definitions have a lower representation of women and minorities?

## Regression Model Predicting % Minorities and Women

Variables	Model 1	
	В	s.e.
Independent Variables		
Broad Diversity Definition (rated)	37*	.17
ontrol Variables		
Number of Words	002	.003
Number of Offices	.19†	.11
Vortheast	-1.51***	.36
outh	-1.24**	.38
Midwest	-1.83***	.50

NOTE: n= 253, level 1; n=135, level 2. Regions were dummy coded \*p<.05; \*\*p<.01; \*\*\*p<.001

## Summary

- Broadening the definition of diversity is beneficial
  - Brought attention to people that have been overlooked in organizations
- Broadening the definition of diversity has ironic consequences
  - Shifts discourse away from legally protected groups (e.g., women and minorities)
  - Attention focused on other dimensions of diversity (e.g., functional, personality)
- Organizations may be less likely to recognize inequities pertaining to groups protected by law, perpetuating inequitable social hierarches

# Inequities in Pathway Processes The When and Where of Discrimination: An Audit Study in Academia

### Collaborators



Katherine Milkman
The Wharton School,
University of Pennsylvania



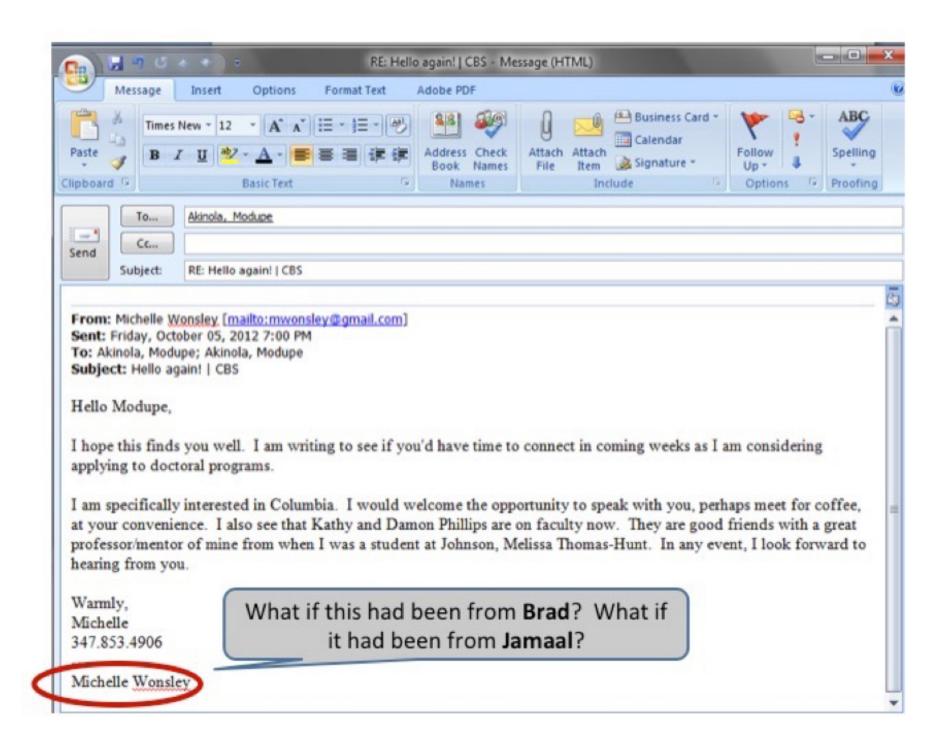
Dolly Chugh
NYU Stern School of
Business

## We all get these emails...

- I got your name from ...
- I read your paper on....
- I saw you on XYZ website...
- ...and I am interested in applying to PhD programs



### Are you available to meet?



 Do academics discriminate on the basis of race and gender?

### Evidence of Discrimination

- Recent evidence of discrimination against women and minorities exists in many settings:
  - Employment
    - Blind orchestra auditions help women (Goldin and Rouse, 2000)
    - Identical black candidates 50% less likely to receive an interview in Boston, Chicago (Bertrand and Mullainathan, 2004)
    - Caucasians just released from prison equivalent to Black/
       Latino with no such record (Pager, Western, and Bonikowski, 2009)
  - Housing (Massey and Lundy, 2001)
  - Credit (Ross and Yinger, 2002)
  - K-12 Education (Farkas, 2003)

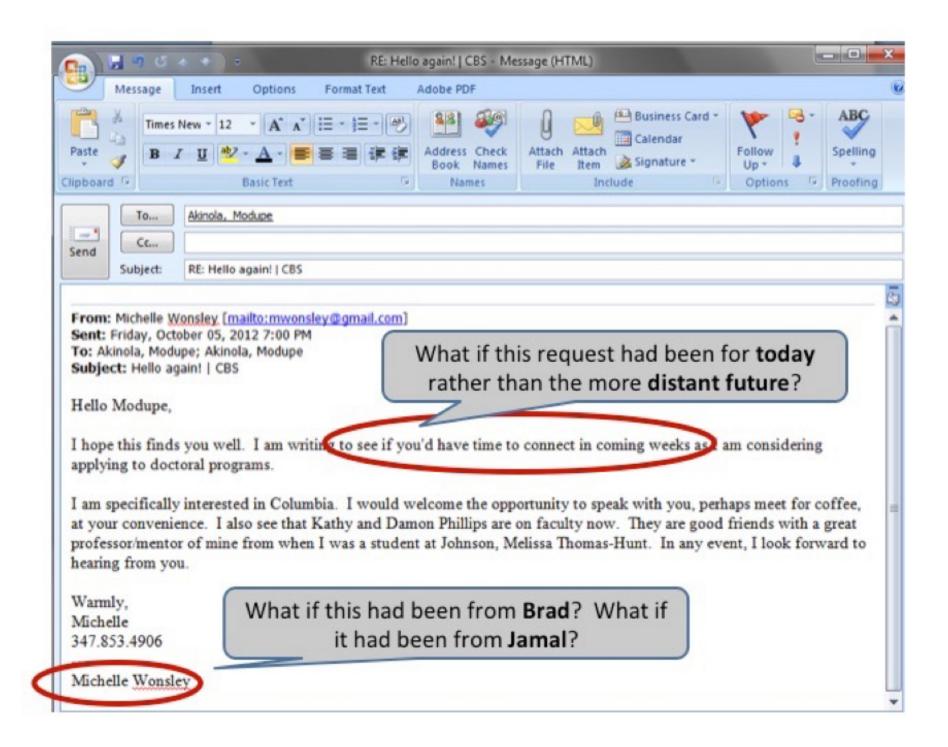
#### What about Academia?

- If you would expect to see a post-racial and post-gender world anywhere, it might be in academia
  - Egalitarianism is prized
  - Affirmative action is widespread
  - A setting where some believe reversediscrimination may exist



Daddy works in a magical, faraway land called Academia.

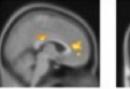
- Do academics discriminate on the basis of race and gender?
  - –If so, how much?
  - —In what context is discrimination most pronounced?



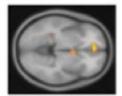
# Choices about the future are shaped by "temporal distance" Trope & Liberman, 2003

 Choices for now vs. later rely on different processes and mental representations

McClure et al. (2004)







Temporal distance heightens construal level

Trope and Liberman (2003)

# Construal Level Theory

- *Immediate* Events Trigger Low Level Construal:
  - Concrete reasoning
  - Focus on **how** the event will occur
  - Focus on *feasibility* of the event

- Distant Events Trigger High Level Construal:
  - Abstract generalizations
  - Focus on why the event should occur
  - Focus on *desirability* of the event

**Near-future** events lead one to consider **"can I do** it?" whereas distant future events lead one to consider "is doing it worthwhile?"

## Construal Level and Stereotyping

- Theory: Abstract construals' desirability/why focus heightens reliance on perceived average group characteristics, stereotypes in judgment
- Evidence: High level construal mindsets increase reliance on stereotypes in lab studies McCrea, Wieber, and Myers (2011)
- Implications: Let's look at "Brad" and "Jamaal" ...

Methods

#### **EXPERIMENTAL DESIGN**

## Field Experiment Set in Academia

 Procedure: Subjects (faculty at U.S. universities) received an email from a prospective doctoral student requesting a 10 minute meeting

#### Randomization:

- Student's name (designed to signal identity)
  - Gender (male or female)
  - Race (Caucasian, Black, Hispanic, Chinese or Indian)
- Timing of meeting request: "now" vs. "later"

## Faculty Subjects

- 6,548 faculty at top 260 Universities
  - 1 or 2 from each of 6,300 Ph.D.-granting departments
- Characteristics pulled from homepages:
  - Race, gender, rank, university affiliation

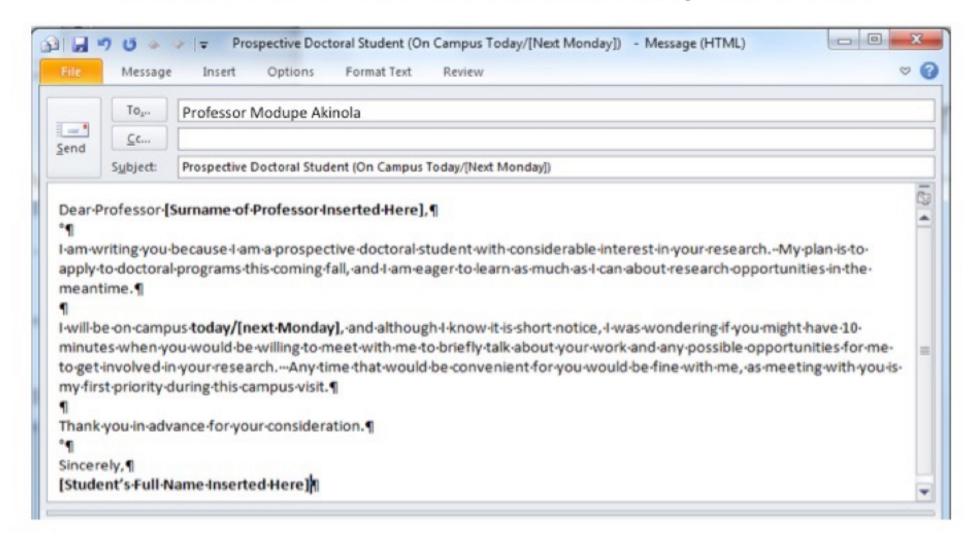
	Representative Sample
Caucasian	87.5%
Black	1.2%
Hispanic	1.5%
Indian	3.0%
Chinese	4.1%
Other Race	2.6%
Male	68.8%
Full Professor	48.0%
Assistant Professor	25.9%
<b>Associate Professor</b>	21.3%
Other Professor	4.8%
Eastern (EST)	54.9%
Central (CST)	26.4%
Mountain (MST)	5.4%
Pacific (PST)	13.3%
	N = 4,375

#### Surveys to Pre-Test Race and Gender Recognition

Race	Gender	Student Name	Race Recognition	Gender Recognition	SES (1 = low, 3 = high)
		Brad Anderson	100%***	100%***	2.42
Caucasian Male	Steven Smith	100%***	100%***	2.26	
	-	Meredith Roberts	100%***	100%***	2.21
Female		Claire Smith	100%***	100%***	2.15
		Lamar Washington	100%***	100%***	1.79
Black Female	Terell Jones	100%***	94%***	1.79	
	Keisha Thomas	100%***	100%***	1.73	
	Latoya Brown	100%***	100%***	1.64	
Male	Carlos Lopez	100%***	100%***	1.68	
	Juan Gonzalez	100%***	100%***	1.68	
	Gabriella Rodriguez	100%***	100%***	1.68	
	Female	Juanita Martinez	100%***	100%***	1.58
		Raj Singh	90%***	100%***	2.32
Indian Female	Deepak Patel	85%***	100%***	2.47	
	Sonali Desai	85%***	100%***	2.26	
	Indira Shah	85%***	94%***	2.26	
Male	Chang Huang	100%***	94%***	2.42	
	Male	Dong Lin	100%***	94%***	2.26
Chinese		Mei Chen	100%***	94%***	2.47
	Female	Ling Wong	100%***	78%***	2.26

Reported significance levels indicate the results of a two-tailed, one sample test of proportions to test the null hypothesis that the observed recognition rate is equal to that expected by chance (16.7% for race and 50% for gender). \*\*\* 0.1%, \*\* 1%, \* 5%

#### Emails All Sent on a Monday at 8 am



Messages sent from email accounts of the form: firstname.lastname@domain.com

#### SUBJECT: Prospective Doctoral Student (On Campus Today/Next Monday)

#### Dear Professor [Surname of Professor Inserted Here],

I am writing you because I am a prospective doctoral student with considerable interest in your research. My plan is to apply to doctoral programs this coming fall, and I am eager to learn as much as I can about research opportunities in the meantime.

I will be on campus today/[next Monday], and although I know it is short notice, I was wondering if you might have 10 minutes when you would be willing to meet with me to briefly talk about your work and any possible opportunities for me to get involved in your research. Any time that would be convenient for you would be fine with me, as meeting with you is my first priority during this campus visit.

Thank you in advance for your consideration.

Sincerely,

[Student's Full Name Inserted Here]

#### Outcomes of Interest

#### 1. Response Received within One Week

67% of emails received a response within a week

#### 2. Meeting Request Accepted

- Coded by RA's (97% agreement rate)
- 40% of meeting requests accepted
  - In other words: 59% of responders said "yes"

#### 3. Response Speed

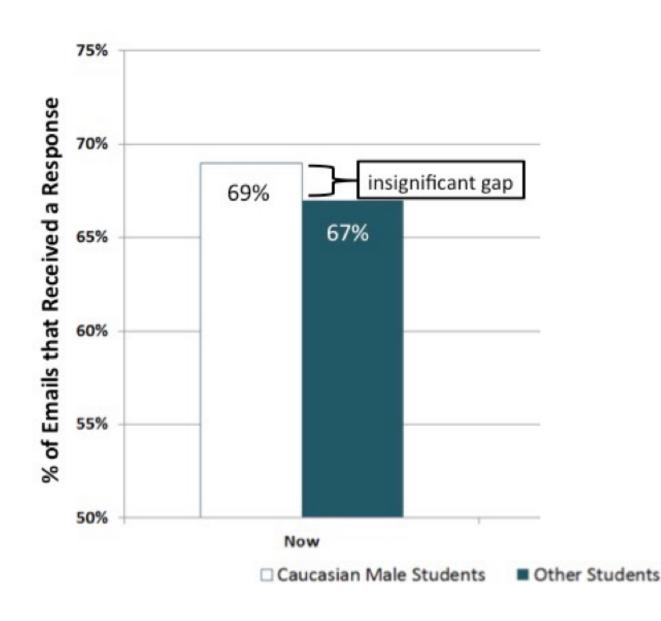
- Hazard models used to address right censoring
- Median response speed: 5.6 hours

Paper #1: Temporal Distance and Discrimination: An Audit Study in Academia Psychological Science (2012)

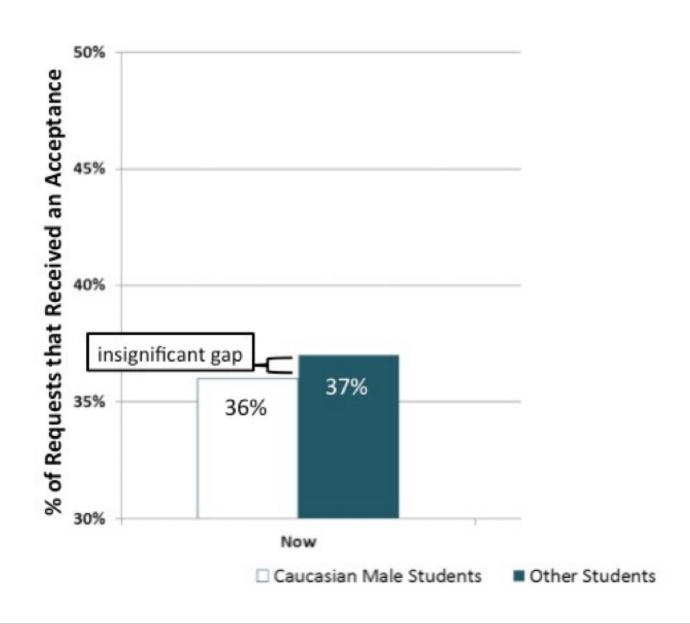
Results - Temporal Distance and Discrimination: Part 1

# COMPARING CAUCASIAN MALES TO OTHER STUDENTS (GROUPED)

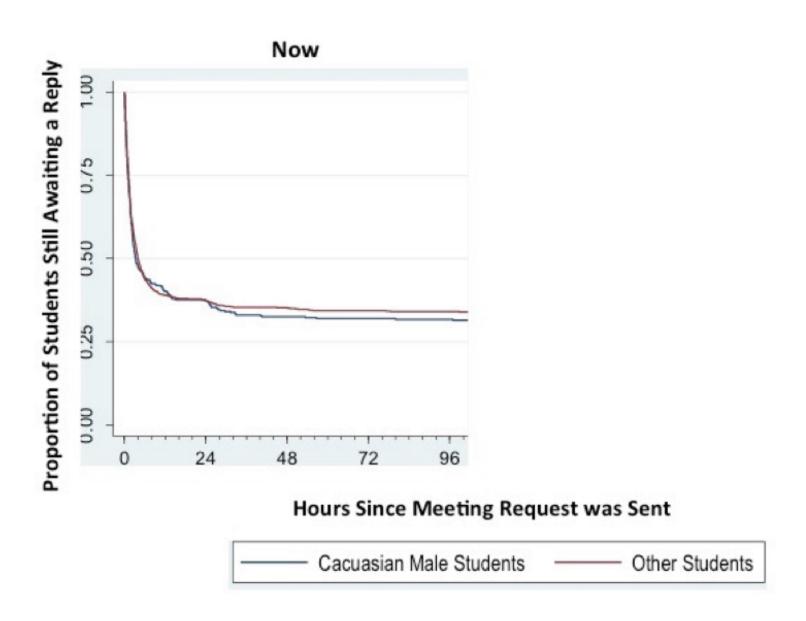
## Response Received



## Request Accepted



#### Survivorship Function: Awaiting a Reply



Results: Part 2

# COMPARING CAUCASIAN MALES TO OTHER STUDENTS (SEPARATELY)

#### Response Rates (Relative to White Males)



#### Contact

Lorenzo D. Baber

Associate Professor and Division Head, Higher

Education

School of Education

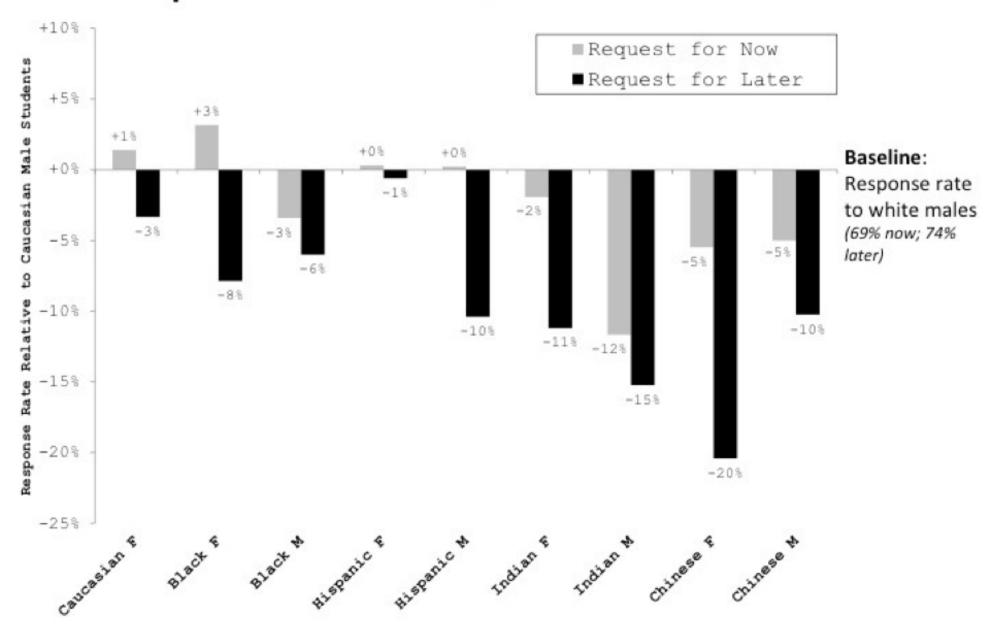
**Iowa State University** 

Email: Idbaber@iastate.edu

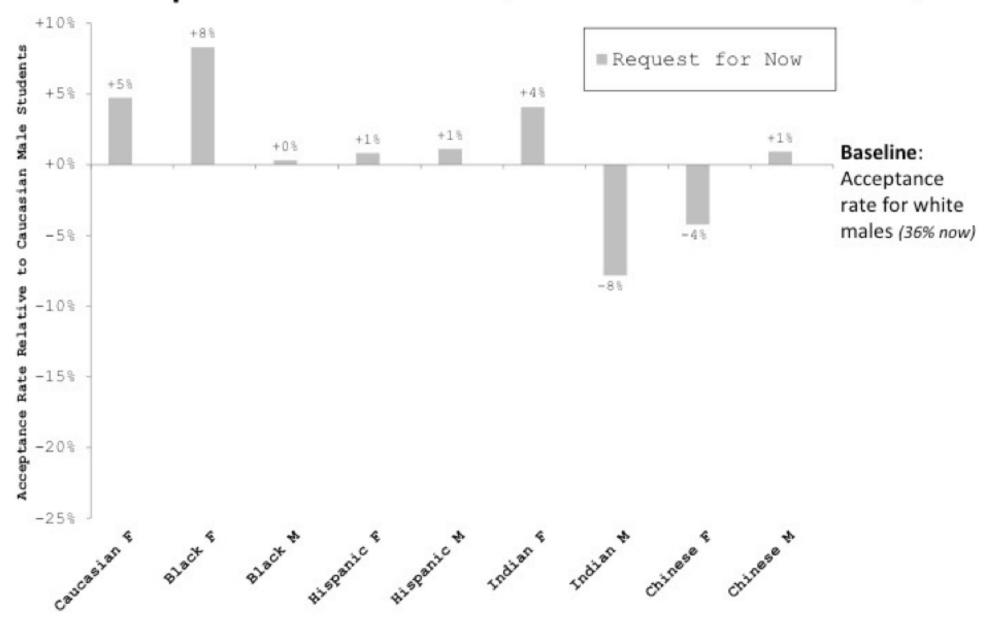
Twitter: @doczo

Phone: 515-294-8374

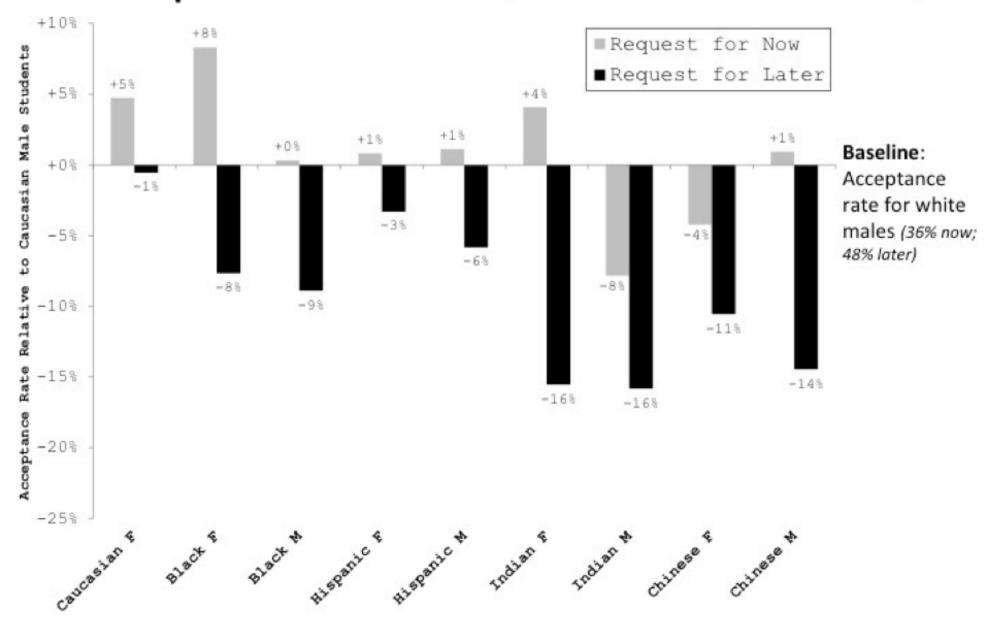
#### Response Rates (Relative to White Males)



#### Acceptance Rates (Relative to White Males)



#### Acceptance Rates (Relative to White Males)

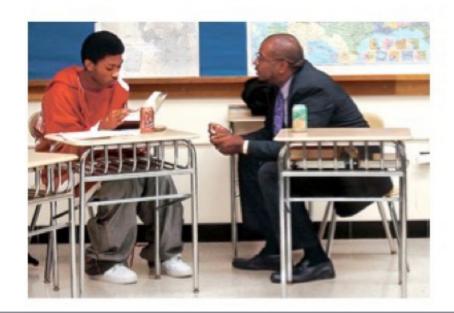


Results - Temporal Distance and Discrimination: Part 3

# EXAMINING MATCHED-RACE & GENDER FACULTY-STUDENT PAIRS

#### Faculty Responses to Students of Their Race or Gender

- Racial match increases reply rate by a factor of 1.28
- No effect of gender match on reply rate
- "Temporal discrimination effect" still present even for matched race and gender faculty-student pairs
  - Effect size is not diminished



Paper #2: What Happens Before? Exploring How
Pay and Representation Differentially Shape Bias on the
Pathway Into Organizations

Journal of Applied Psychology (2015)

Results - What Happens Before

# HOW BIG IS THE BIAS IN DIFFERENT PARTS OF ACADEMIA?

#### Faculty Subjects by Academic Discipline

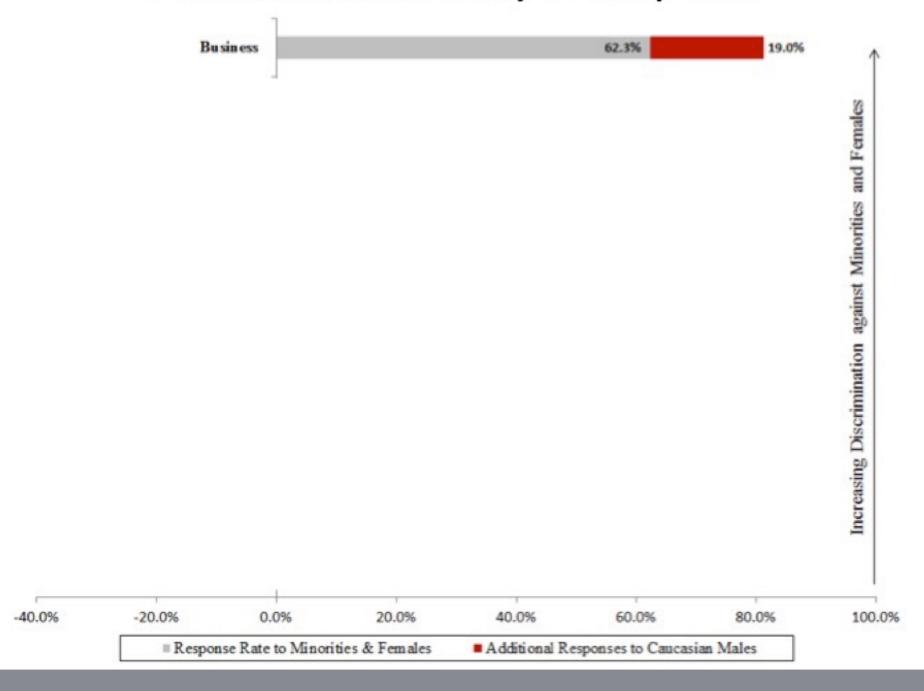
		# of Narrow Sub- Disciplines*			Sample-Weighted Representation						
Broad Discipline	N		(9 Month)		Fe male	Caucasian	Black	Hispanic	Chinese	Indian	Other Race
Business	265	6	\$	63,651	26%	85%	2%	1%	4%	5%	4%
Education	441	16	\$	45,897	55%	91%	2%	2%	2%	1%	3%
Engineering and Computer Science	1,125	14	\$	71,107	15%	78%	1%	1%	8%	8%	4%
Fine Arts	209	8	\$	38,023	38%	92%	1%	1%	4%	1%	2%
Health Sciences	343	13	\$	69,222	46%	91%	2%	0%	3%	1%	2%
Human Services	188	11	\$	49,257	43%	87%	4%	2%	1%	1%	5%
Humanities	668	7	\$	46,375	38%	90%	2%	2%	2%	2%	2%
Life Sciences	1,051	9	\$	70,123	24%	90%	0%	1%	4%	3%	2%
Natural, Physical Sciences and Math	850	9	\$	60,245	18%	85%	1%	1%	7%	4%	3%
Social Sciences	1,379	19	\$	52,889	38%	90%	2%	2%	2%	2%	3%
University Type											
Public	4,450	105		\$X	30%	87%	1%	2%	5%	4%	2%
Private	2,098	100	SX	+\$34,687	32%	88%	1%	1%	4%	2%	3%

<sup>\*</sup>Note that some sub-disciplines fit into more than one broad disciplinary category, which is why the total number of narrow sub-disciplines listed here does not sum to the total number in our sample.

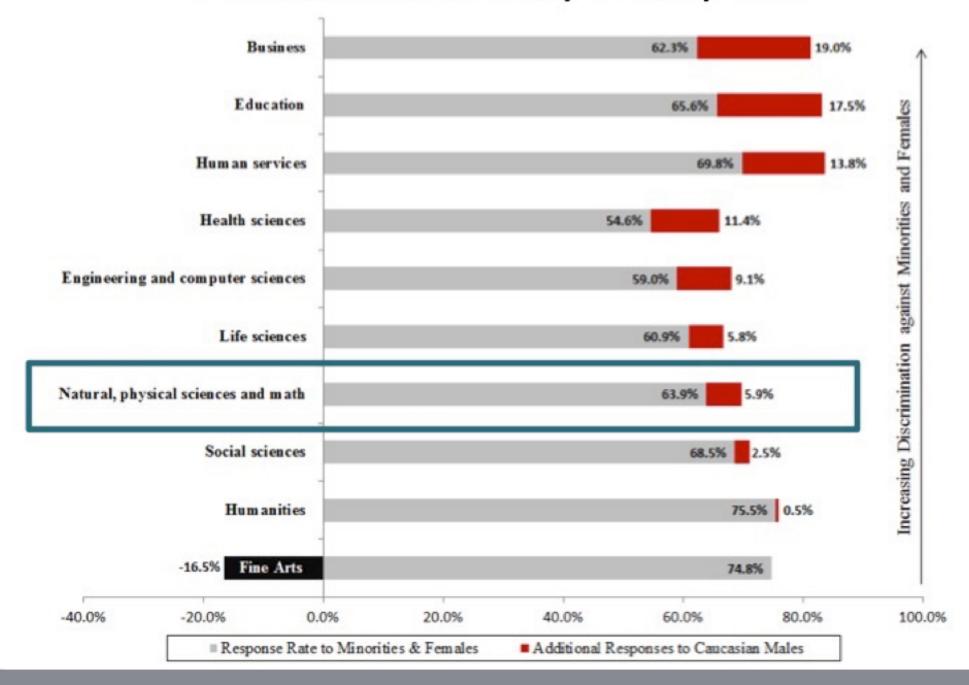
#### National Study of Post-Secondary Faculty (NSOFP) 2009 Data

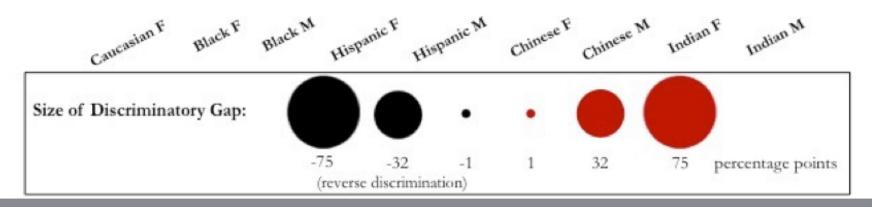
National Center for Education Statistics

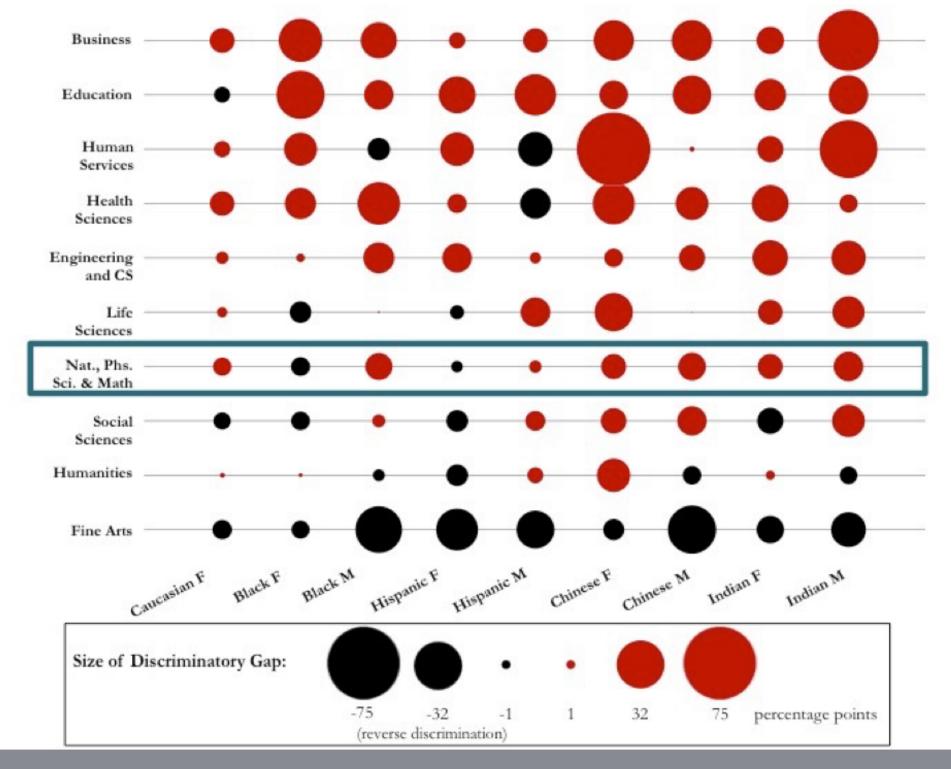
## Discrimination by Discipline



### Discrimination by Discipline





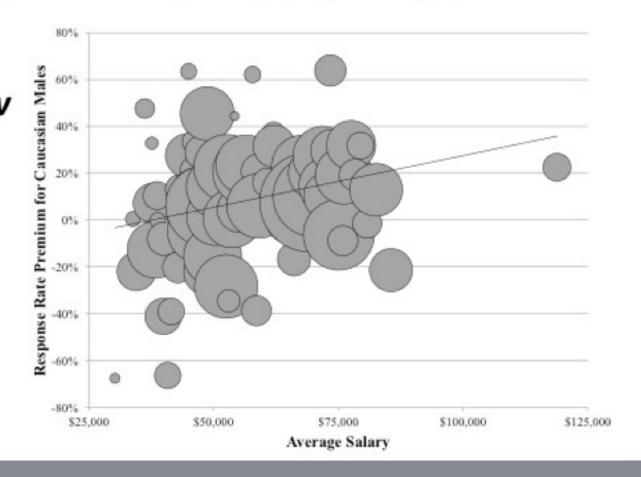


# What Drives the Disciplinary Gaps?

Across 10 Broad NSOFP Fields:

Correlation of 0.47 between yearly pay and gap size

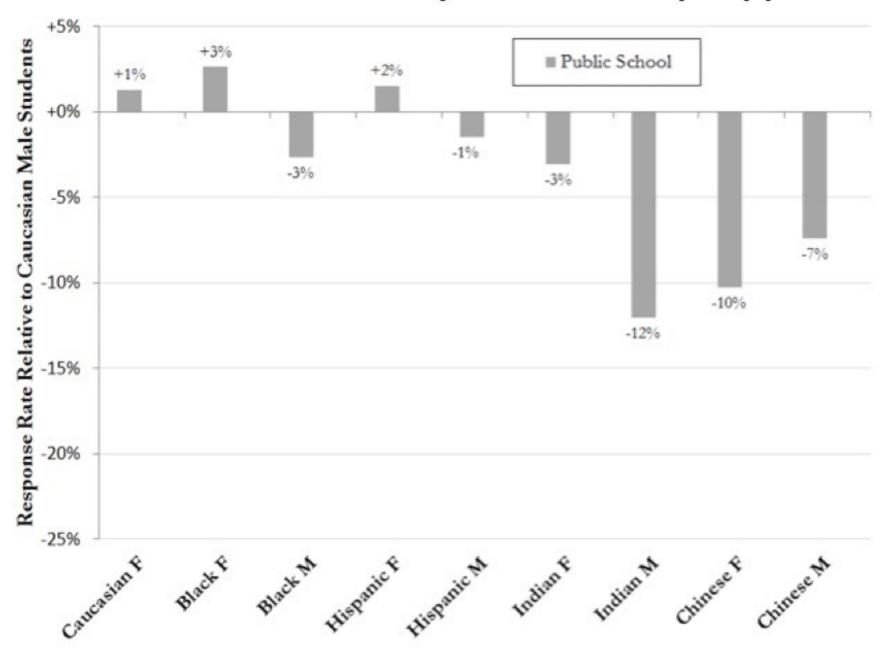
Across 89 Narrow
 NSOFP Fields:
 \$13k increase in
 pay associated
 with a 4 pct. pt.
 increase in gap



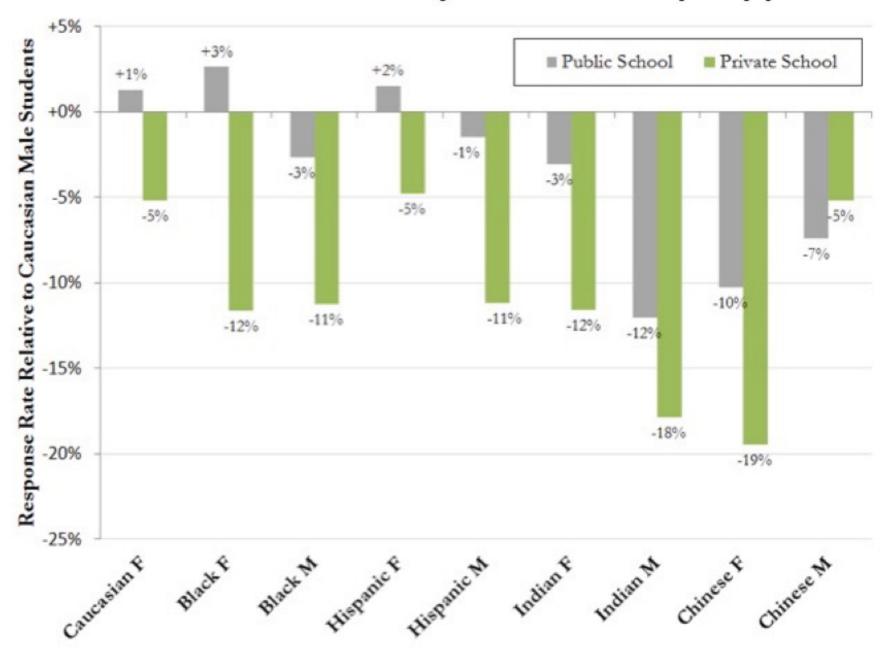
Z-Avg. Faculty Pay	0.000	0.009	0.014	0.014	0.014	
	-0.043*	-0.048**	-0.053**			higher nay prodicts hiss
	(0.018)	(0.018)	(0.018)	(0.018)	(0.018)	higher pay predicts bias
Z-Faculty% Minority		0.002	0.000			
	-					
	-				2.722.734.5	representation in the
			(0.012) 0.018^	0.019^	(0.013) 0.019^	
Z-Faculty % Female	-	0.018^				discipline and university
		(0.010)	(0.010)	(0.011)		Lalana makamadiak latan
						does not predict bias
		(0.013)	(0.013)			
Z-PhD Students % Minority		0.002		-0.004		
	-	-0.004	-0.003	0.001	0.001	
Control of the Contro		(0.018)	(0.018)	(0.018)	(0.018)	
Public School						
			(0.025)	(0.029)		
						private u. predicts bias
	-		(0.029)		The second secon	private u. predicts bias
Z-Undergraduate % Minority				-0.024*	-0.024*	
				(0.012)	(0.012)	
Z-Und%Minority x Minority	-		-			
Student	-	-	-	(0.013)		
Z-Undergraduate % Female			-	-0.009	-0.009	
		-	-	(0.008)	(0.007)	
	-		-	0.005		
	-	-	-	(0.013)		
Z-School Rank (US News)		-0.006	-0.010^	-0.006	-0.003	
	(0.006)	(0.006)	(0.005)	(0.005)	(0.019)	
				-	-0.004	US News rank does not
			-			03 News fallk does not
	-0.088**	-0.091**	-0.180***	-0.176***		predicts bias
	-0.078*	-0.080*	-0.172***	-0.159***		predicts bids
		-0.178***	-0.268***	-0.253***	-0.255***	
Chinese	-0.123***	-0.124***	-0.215***	-0.204***	-0.206***	
Female	-0.042	-0.044	-0.134***	-0.128**	-0.130**	
	0.059^	0.063*				
Hispanic x Female	0.078*	0.081*	0.172***	0.170***	0.172***	
Indian x Female	0.105*	0.105*	0.194***	0.172***	0.174***	
	0.015		0.101*			
	ull, Associate, A	Assistant); Requ	est for Now; R	equest for Nov	v x	
ent, racuity-Student Racial Match	6,206	6,206	6,206	6,206	5,852	
	Z-Pay x Minority or Female Student Z-Faculty% Minority  Z-Fac %Minority x Minority Student Z-Faculty % Female  Z-Fac %Female x Female Student Z-PhD Students % Minority  Z-PhD Minority x Minority Student  Public School  Public School x Minority or Female Student Z-Undergraduate % Minority  Z-Und %Minority x Minority Student Z-Undergraduate % Female  Z-Und %Female x Female Student Z-School Rank (US News)  Z-School Rank x Minority or Female Student Black Hispanic Indian Chinese Female Black x Female Hispanic x Female Indian x Female Chinese x Female	Colle   Z-Pay x Minority or Female Student   Coll	County   C	Content   Cont	C-Pay x Minority or	Z-Pay x Minority or

<sup>\*</sup>Significant at the 10% level. \*Significant at 5% level. \*\*Significant at 1% level. \*\*\*Significant at the 0.1% level.

### Discrimination by University Type



### Discrimination by University Type



## Summary

#### Temporal distance heightens discrimination

 Decisions about distant future events generate more discrimination than decisions about near future events

#### Discrimination varies by discipline

- Most discriminatory disciplines: business, education, human services, health sciences, engineering
- Faculty in higher paying disciplines are more discriminatory
- Faculty in private vs. public institutions are more discriminatory

# **Implications**

- Systems to prevent discrimination are needed in pathway processes
  - E.g., All emails from students get forwarded to a central administrator
  - Systems need not focus solely on gateway processes
- How can women and minorities ensure they do receive a response?
  - Ambiguity is a breeding ground for bias
  - Encourage applicants to make their qualifications clear
- An impressive representation of minorities and women in faculty ranks cannot be assumed to eliminate or reduce discrimination
- Academic programs designed to combat discrimination are needed, particularly in high-paying disciplines and at private universities

## The Importance of Word Choice

- Which categories to include in diversity definitions?
  - Which groups end up feeling excluded?
  - What attracts vs. deters applicants?
- Which terms to use to describe women?
  - Female vs. Woman?
  - Woman!!
    - Refers specifically to human beings; female connotes biological sex and refers to mammals not humans
    - Not all women are biologically female; calling women females excludes gender non-conforming people and members of the trans community
    - Female is an adjective; No one refers to men as "males" (e.g., how often do you hear the term "male doctor"?)

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