Mejorar La Raza: measuring the implicit anti-black racial bias of multiracial individuals.

Katalina Traxler

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MEJORAR LA RAZA: MEASURING THE IMPLICIT ANTI-BLACK RACIAL BIAS OF MULTIRACIAL INDIVIDUALS

By

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A Dissertation
Submitted to the Faculty of the
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Doctor of Philosophy
in Counseling and Personnel Services

Department of Counseling and Human Development
University of Louisville
Louisville, Kentucky

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DEDICATION

This dissertation is dedicated to my younger self,
who needed support and resources about multiraciality.

Kata, I see you. Thank you for fueling the fire
that created Dr. Katalina Guadalupe Traxler.
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I would like to thank my committee chair, Dr. Susan Longerbeam, for her guidance, patience, and advocacy over these past (almost) five years. Even when COVID-19 made things more difficult, Dr. Longerbeam kept her contagious optimism. I would also like to thank internal committee members, Dr. Amy Hirschy and Dr. Jason Immekus, for their assistance and feedback. Dr. Hirschy’s feedback always caused me to think critically about my work. Dr. Immekus did the impossible for a lifelong math hater by helping me to both understand and like statistics. I would also like to thank external committee member, Dr. Sara Furr, for her unwavering support, for reminding me what I am capable of, and for never giving up on the college student with the big mouth who constantly barged into her office.

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stop and smell the roses on a daily basis. Shadow’s ability to keep me centered was unparalleled, and I will love him forever.

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ABSTRACT

MEJORAR LA RAZA: MEASURING THE IMPLICIT ANTI-BLACK RACIAL BIAS OF MULTIRACIAL INDIVIDUALS

Katalina G. Traxler

September 27, 2022

This dissertation sought to examine if there are implicit anti-Black racial bias differences across multiracial people who identify as Black/White compared to multiracial people who do not identify as Black/White, accounting for age, citizenship, and education level. It was also determined if age, citizenship status, and education level moderate the relationship between multiracial identity and implicit anti-Black racial bias. The theories guiding this dissertation were: Heider’s Balance Theory, Multiracial Identity Development, and White Identity Development. The data were collected from Project Implicit, a non-profit organization and international collaborative of researchers who are interested in implicit social cognition. The data analysis approach was a hierarchical multiple linear regression analysis that also tested for interaction effects. The independent variables were race (Multiracial – Black/White, Multiracial – Not Black/White), age, education level, and U.S. citizenship status. The dependent variable was overall IAT score, which measures implicit anti-Black racial bias.
The results of this study suggest that multiracial people who do not identify as Black/White have more implicit anti-Black racial bias than multiracial people who do identify as Black/White. Age, citizenship status, and education level were all found to not moderate the relationship between multiracial identity and implicit anti-Black racial bias. This study begins to fill in a gap in existing literature, as little research has been done that examines the implicit racial bias and implicit anti-Black racial bias of multiracial individuals. The results of this study illustrate the importance of support for multiracial individuals (especially for multiracial people who do not identify as Black/White) in navigating implicit racial biases, implicit anti-Black racial bias, colorism, internalized racism, and horizontal racial oppression. Additionally, the results of this study contradict the idea of a “shared” multiracial experience that exists in previous research. The results of this study imply that there is a need for more individualized attention and support for multiracial individuals based on their specific racial identifications. The results also show a need for more research on implicit racial bias, implicit anti-Black racial bias and multiracial individuals based on specific racial identifications.
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“Mejorar” – it means “to improve” in Spanish. The phrase “mejorar la raza” literally means “to improve the race”. What a loaded phrase for a multiracial kid with Latinx and White roots. This sentence is often said in the context of skin color in the Latin American community. Specifically, this sentence means that an individual should marry someone with lighter skin so that the race can be in closer proximity to Whiteness, thus elevating the race’s status in society. The roots of this phrase are steeped in colorism, horizontal racial oppression, respectability politics, internalized racism, and anti-Blackness. Young multiracial Kata, who this dissertation is dedicated to, struggled a lot with colorism, straddling the line of what was “too much sun” and “too dark/too White”. Young adult multiracial Kata had visceral anger towards the messages of anti-Blackness that she saw blatantly in Whiteness and the White supremacy embedded in United States society, but also at its implicit presence in her identity as a Person of Color.

As a thirty-three year old, multiracial Woman of Color, I say explicitly that the use of the phrase “mejorar la raza” was intentional in my dissertation title. I proudly take this phrase back, as I believe that by researching multiracial identity, implicit anti-Black racial bias, and potential pathways to stop implicit anti-Black racial bias, that I am quite literally improving my race.

This study sought to examine multiracial individuals and how the factors of age, citizenship, and education level are related to their overall implicit anti-Black racial bias,
as measured by the Race Implicit Association Test (IAT) (Greenwald et al., 1998). The IAT is a test that measures attitudes and beliefs that people may be unwilling or unable to report. In this study, data from the 2015 Race IAT were intentionally utilized. The 2015 Race IAT data were collected in January of 2015. The 2015 Race IAT data were utilized in order to minimize influence in responses from the 2016 United States Presidential Election. Donald Trump is viewed as a racially polarizing figure because of comments he made about race and People of Color while campaigning to be President of the United States (Shook et al., 2020). Thus, the decision was made to not use data that could be especially biased due to a particular period of time in the United States. At a time where People of Color, multiracial individuals included, are feeling the impact of explicit racism at higher rates while battling systemic oppression on a daily basis, this study was not going to utilize data that could be inaccurate, thus causing further harm. Specifically, this study sought to determine if there are any implicit anti-Black racial bias differences across multiracial people who identify as Black/White compared to multiracial people who do not identify as Black/White, accounting for age, citizenship, and education level.

Multiracial college students is one of the fastest growing college student populations in the United States (Renn, 2000). From 2000 to 2010, the interracial marriage rate in the United States increased by three percent (Pew Research Center, 2015). The 2010 United States Census was the first census in which an individual could choose, “One or More Races”. On the 2020 United States census, 38.8 million people identified themselves as “two or more races”, which is a 276% increase from the 2010 census (United States Census Bureau, 2021). Additionally, multiracial individuals in the
United States report experiencing racism, discrimination, and prejudice at similar rates to their mono-racial BIPOC (Black, Indigenous, People of Color) peers (Franco, 2019).

Besides the explicit racism and biases that BIPOC experience, multiracial individuals also can experience implicit racism and implicit racial biases. Implicit racial bias is when individuals have negative attitudes towards certain racial groups, or associate specific stereotypes with certain racial groups without their conscious knowledge (Payne et al., 2019). Anti-Black racism is defined as a two-part formation that both strips Blackness of value, and systematically marginalizes Black people (Kendi, 2019). Thus, implicit anti-Black racial bias is when individuals have attitudes towards Black or African American groups, or associate specific stereotypes with Black and African American individuals without their conscious knowledge. However, while the multiracial population has consistently grown in the United States, there is still little research on the relationship between implicit racial bias, implicit anti-Black racial bias, and multiracial individuals. As the population of multiracial individuals continues to increase, it is imperative that these individuals are included in current and future research. Multiracial college students have generally been treated as a monolith, instead of being acknowledged as a diverse group with varying needs (Torres et al., 2009). Thus, it is important to focus on topics that can impact identity development for the multiracial student population, including implicit racial bias and implicit anti-Black racial bias.

The theoretical approach used in this study is Balance Theory (Heider, 1958). Balance is defined as reaching a level of equilibrium and stasis in an individual’s decision making process, as well as the process they use to make conclusions or assumptions about the world (Heider, 1958). Balance Theory states that individuals feel discomfort
and tension when their implicit thoughts do not align with their explicit thoughts. For example, an individual may implicitly know that the sky is the color blue, but an instructor keeps stating that the sky is actually the color green. In this situation, the individual would feel uncomfortable and off-balance because their implicit assumption is being explicitly challenged. Balance Theory is based on studies of balanced and imbalanced states (Anderson, 1979; Davis, 1967; Flament, 1979). These studies support the generalization that balance is preferred by an individual over imbalance, which creates disharmony (Heider, 1958, p. 204). Balance Theory is the theoretical foundation for the IAT, created by Anthony Greenwald and Mahzarin Banaji in 1995 (Greenwald et al., 2002).

The secondary theories that guided this study are: White Identity Development (Helms, 1990; Rowe et al., 1995) and Multiracial Identity Development (Deters, 1997; Root, 1998). White identity development is the process involving an individual becoming aware of one’s “Whiteness”, and accepting this aspect of one’s identity as socially meaningful and personally salient (Helms, 1990). Multiracial identity development is the process involving an individual of two or more races becoming aware of their racial identity, then determining which identities are most salient to them, and continually choosing their own racial identification (Deters, 1997; Johnston-Guerrero et al., 2016; Johnston-Guerrero et al., 2020; Malaney & Danowski, 2015; Renn, 2000; Renn, 2003; Renn, 2004; Renn, 2008; Root, 1998).

Finally, four cognates guided this study: Internalized Racism, Colorism, Respectability Politics, and Horizontal Racial Oppression. All of these phenomena have been found to have a connection to implicit anti-Black racial bias. Internalized Racism is
the internalization of racial oppression by BIPOC individuals (Edwards, 2017). Colorism is the term for discrimination based on skin color; it centers on the advantages and disadvantages that people experience based on skin tone, including those of the same racial group (Keith & Monroe, 2016). Respectability Politics utilize respectability narratives as the basis for defying stereotypes and to enact social, political, and legal change (Richardson, 2019). Respectability narratives are representations of marginalized individuals meant to construct an image of the marginalized group as people sharing similar traits, values, and morals with the dominant group (Richardson, 2019). Horizontal Racial Oppression is when people from BIPOC racial groups believe, act on, and/or enforce dominant systems of oppression against other BIPOC racial groups (Campion, 2019).

This study addressed the research gap on implicit anti-Black racial bias and multiracial individuals. Current research on implicit anti-Black racial bias focuses mostly on mono-racial individuals, as opposed to multiracial individuals. Specifically, this study sought to determine if there are any relationships between implicit anti-Black racial bias and multiracial people who identify as Black/White versus multiracial people who do not identify as Black/White, accounting for age, citizenship status, and education level.

**Study Purpose**

This study sought to examine if there are implicit anti-Black racial bias differences across multiracial people who identify as Black/White compared to multiracial people who do not identify as Black/White, accounting for age, citizenship, and education level. It was also determined if age, citizenship status, and education level moderate the relationship between multiracial identity and implicit anti-Black racial bias.
The data analysis approach was a hierarchical multiple linear regression analysis that also tested for interaction effects. This approach was chosen to determine if there are any relationships between multiracial identity, age, education level, citizenship status, and implicit anti-Black racial bias. The independent variables were: race (Multiracial – Black/White, Multiracial – Not Black/White), age, education level (Elementary School, Junior High School, Some High School, High School Graduate, Some College, Associate’s Degree, Bachelor’s Degree, Some Graduate School, Master’s Degree, J.D., M.D., Ph.D., Other Advanced Degree, MBA), and citizenship status (United States Citizenship, No United States Citizenship). The dependent variable was overall IAT score, which measures implicit anti-Black racial bias.

In this study, multiracial is defined as more than one race. Race is a social construct that utilizes physical characteristics and shared cultural experiences to create groupings of human individuals (Bonilla-Silva, 2004). Education level is defined as elementary school to a terminal degree, which is the highest academic degree that can be awarded in a particular field. Citizenship status is defined as either having or not having official citizenship in the United States (the IAT specifically asks participants for their country of citizenship). Finally, overall IAT score is defined as a value between -2 to 2.

**Research Questions & Hypotheses**

**RQ1:** Are there differences in implicit anti-Black racial bias across multiracial people who identify as Black/White, compared to multiracial people who do not identify as Black/White, accounting for age, citizenship status, and education level?

**RQ2:** Do age, citizenship status, and education level moderate the relationship between multiracial identity and implicit anti-Black racial bias?
H1: Multiracial people who do not identify as Black/White will have less implicit anti-Black racial bias than multiracial people who do identify as Black/White.

H2: Age will moderate the relationship between multiracial identity and implicit anti-Black racial bias, such that older multiracial people will have more implicit anti-Black racial bias than younger multiracial people.

H3: Citizenship status will not moderate the relationship between multiracial identity and implicit anti-Black racial bias.

H4: Education level will moderate the relationship between multiracial identity and implicit anti-Black racial bias, such that multiracial people who have a college degree will have less implicit anti-Black racial bias than multiracial people who do not have a college degree.

**Position of Self as Researcher**

I identify as a biracial (White & Latinx) Woman of Color who is a United States citizen. I attended predominantly White institutions for my baccalaureate degree, master’s degree, and doctoral degree. I am a college administrator at a predominantly White institution. I have been employed only at predominantly White institutions in the United States, ranging geographically from the upper Midwest to the South. I grew up in a predominantly White suburb in the Midwest region of the United States, near a large city. From childhood until college, I visited and interacted with both the White and Latinx sides of my family on a weekly basis. I was taught that explicit racism was wrong from an early age. I was also taught to culturally appreciate aspects of both my German and Mexican heritages. However, topics of implicit racial biases, implicit anti-Black racial bias, microaggressions, and the nuances of being multiracial were not discussed
due to lack of knowledge and awareness. I know that implicit anti-Black racial bias was present in my upbringing, mainly through colorism, respectability politics, and horizontal racial oppression. My development as a multiracial individual was negatively impacted by implicit anti-Black racial bias, horizontal racial oppression, colorism, and monoracism. As an adult, I know that I have perpetuated and do perpetuate implicit anti-Black racial bias. My life partner is a Black male, and if we have children in the future, our children would be multiracial. Thus, through multiple facets, I have a personal investment in this research.
Multiracial and biracial students are one of the fastest growing populations in higher education in the United States of America. By 2050, it is estimated that one in five new college students will identify as biracial or multiracial (Ingram et al., 2014). Throughout the history of the United States, multiracial individuals have been viewed and characterized in numerous ways. Initially, the multiracial individuals born in the United States were predominantly White and Black or White and Indigenous. This was the product of European colonizers raping Indigenous women and enslaved Black women (Edwards, 2017). During this time, children who were both Black and Indigenous were born too, as these two oppressed groups were brought together through genocide and mass enslavement. Initially, the children of White colonizers and Black or Indigenous women were considered good, as that meant there were more enslaved people to work on a plantation or farm. However, the products of White and BIPOC unions soon became viewed negatively as the de-purification of the White race (Dalmage, 2004). For example, a 1661 Maryland statute stated that if a White woman married an enslaved man, that she would become enslaved too, along with any of their children (Tucker, 2004; Wilkerson, 2020).

This ideology was furthered by legal and illegal barriers to interracial marriage. These barriers specifically targeted unions between White and BIPOC people, as there
was not a great concern about two BIPOC individuals having a mixed-race child (Kerwin et al., 1993). For example, White people often perpetuated violence against interracial couples, kicked them out of neighborhoods, and created legislation in order to maintain the racial hierarchy (Edwards & Pedrotti, 2008). Legislation included “One Drop Rules”, which meant if an individual had at least one ancestor of Black ancestry, then they were considered Black (Collins, 2000). This one drop threshold allowed a clear distinction between Black and White people, and also removed any parental accountability from White men who raped Black women.

Additionally, anti-miscegenation laws were created in order to stop interracial unions, and thus the birth of multiracial children. One of the main arguments against interracial marriage focused on the children born of interracial unions. Anti-miscegenation law proponents argued that these statutes were necessary in order to prevent the “corruption of blood”, as well as to stop the creation of a “mongrel” breed of citizens (Patria, 2007). It was also argued that multiracial children would not have a place in society, and would suffer greatly due to not belonging to one specific race. In the 1967 case Loving v. Virginia, the United States Supreme Court overturned interracial marriage bans that still existed in sixteen different states (Root, 1998). However, different states still unofficially enforced interracial marriage bans, such as South Carolina and Alabama. The South Carolina State Constitution had a prohibitive clause against interracial marriage in it until 1998, while the Alabama State Constitution had an interracial marriage ban until 2000 (Patria, 2007).

Science was also used to argue that the mixing of the races decreases the biological superiority of the White race (Ferber, 2004). White, American men created the
social construct of race in order to maintain power, and then applied race to science so that science could be viewed as a legitimate tool to maintain White supremacy. For example, medical studies claimed that the children of White and BIPOC parents would be physically inferior, and that these mixed-race individuals would die out in a few generations due to alleged physiological and mental weaknesses. Medical professionals also claimed that the disease and sterility allegedly carried by the BIPOC races would infect the White race, and thus deteriorate its alleged superiority. By demonizing multiracial individuals as disease carriers, lawmakers were able to justify restrictions and bans on interracial marriage (Teo, 2004). Additionally, psychological arguments were made that claimed mixed-race individuals were damaged because they could not identify with one specific racial identity group (Nakashima, 1992).

Moreover, if a multiracial person had a White parent, there was a message of fear mongering, such that the multiracial child was especially dangerous if they could pass as White, which would have a negative impact on the status quo of White supremacy. Due to these various claims, multiracial individuals were portrayed as being social pariahs who were unable to cope with being part of more than one racial background (Spickard, 1992). In the present day, these myths and incorrect notions about multiracial individuals that are rooted in White supremacy have been debunked. However, this has not stopped said myths and incorrect notions from being weaponized against multiracial individuals. For example, while interracial marriage is no longer legally banned in the United States, interracial couples and their multiracial children are not always welcomed nor treated equitably in different parts of the country (Renn, 2008).
Additionally, the incorrect assumption that all or most multiracial people are products of Black and White interracial relationships is widespread, and as a result, multiracial individuals are often mistaken for the wrong racial identification (Phoenix & Tizard, 2002). When individuals are mis-raced, they can experience microaggressions, macroaggressions, and implicit biases because they do not meet the assumptions that were pushed onto them. Moreover, the fetishization of multiracial people has become increasingly prevalent as the population of multiracial individuals increased in the United States throughout the twentieth and twenty-first centuries (Sims, 2012). This is especially true for multiracial individuals who have a White parent. A specific combination of phenotype is attributed to multiracial individuals, and is also viewed as desirable and attractive (Sims, 2012). When multiracial individuals have this phenotype, they can experience unwanted sexual and romantic attention. When multiracial individuals do not have this phenotype, then they can experience bullying and shame around their appearance (Rondilla et al., 2017). In the present day, multiracial individuals are still defined by society and its standards that are based on debunked assumptions and theories, as opposed to being recognized by their own self-identification (Ahnallen et al., 2006).

Furthermore, multiracial individuals are often still left out of research due to the United States’ society still having a predominantly mono-racial perspective (Shih et al., 2007). Unfortunately, the same is true for research on multiracial college students in the United States.

Multiracial college students are often left out of diversity, equity, and inclusion efforts at the institutional level (Malaney & Danowski, 2015). For example, there is a small amount of multiracial student centers on United States college campuses. Also,
many cultural centers and diversity centers do not offer initiatives and programs specifically focused on multiracial students. Furthermore, multiracial college students have reported feeling as though mono-racial cultural centers force them to choose a side or ignore a portion of themselves (Gasser, 2002). Additionally, multiracial college students have stated that they feel like they need to prove themselves in mono-racial student organizations, especially if their appearance does not match the phenotype that is mostly attributed to the specific mono-racial group (Malaney & Danowski, 2015).

Due to this lack of institutional support, multiracial college students have been forming their own student organizations and student initiatives on college campuses in the United States since the 1990s (Malaney & Danowski, 2015). The main reasons that multiracial students create their own organizations are a) to claim an identity-based space on campus, and b) to claim acceptance of their multiracial identity (Renn, 2004). These identity-based spaces allow multiracial college students to receive affirmation and validation in their self-identification as a multiracial person, and also provide a space to be in community with parallel experiences (Ozaki & Johnston, 2008). While the multiracial student organizations built by students have proven to be successful over time, multiracial college students still need institutional support for identity development, curriculum development, and navigation of barriers to student organizing (Malaney & Danowski, 2015).

**Multiracial Identity Development Models**

In reference to the self-identification process, a myriad of factors contribute to mixed-race students identifying as multiracial. These factors include (but are not limited to): family influence, physical appearance, cultural knowledge, and peer culture (Renn,
In terms of family influence, some multiracial students may not have spoken about race in their household, so they create their own identity of multiracial or biracial once they come to college (Talbot, 2008). On the other hand, multiracial individuals may choose to identify the way other family members do, or may choose to identify with all of their racial backgrounds because of their upbringing. For example, Stepney et al. (2015) found that White, biracial Americans perceive their ethnic identity to be strongly linked to their parental racial identities, especially when they had close relationships with their parents.

Further still, some multiracial students identify as multiracial or White (if they have a White parent) because that is what their parents taught them to do as children. For example, in the United States, racial hierarchy puts Black and Indigenous individuals at the bottom, which also leads to inequitable resource allocation and opportunities (Bonilla-Silva & Glover, 2004). Thus, some parents of multiracial children have their children identify as multiracial or White in order to appear “racially neutral”. This idea of racial neutrality was found to be more prevalent in Asian/White children and Hispanic/White children versus Black/White children (Bonilla-Silva & Glover, 2004). Additionally, physical appearance can cause multiracial and biracial students to feel like they are obligated to identify a certain way, whether that be mono-racial or multiracial (Plaza, 2011). In Talbot (2008), all participants reported being able to place themselves along a continuum of skin color, hair texture, eye color, and facial structure at a young age. This was especially prevalent for participants who identified as Black and/or African American.
Moreover, external input from peers, teachers, and others in students’ lives about their physical appearance can also impact how a multiracial student identifies. For example, if a student considers themself multiracial, but others think they look mono-racial, then the student’s self-identification may be questioned (Williams, 2013). On college campuses, multiracial students have reported being told they are in the wrong place or that they do not belong when participating in race-oriented student programs. In Narvaez and Kivlighan III (2021), one multiracial student described how they identify as Asian American, but because they have phenotypes associated with Blackness, that the advisor of the Asian American student group told them they were in the wrong place. When the student explained that they were both Black and Asian, the advisor of the Asian American group told them that they were “better suited” for the Black identity group.

Another factor that affects multiracial and biracial students’ identification decision is cultural knowledge. For example, in Talbot (2008), multiracial individuals who do not have a White parent reported that explicit discussions or communications about race, especially the topic of being biracial, were nonexistent between parents and children. This was consistent even for individuals who reported being immersed in both parents’ cultural backgrounds. Depending on a student’s cultural knowledge, they may try to learn more in college, or use their previously known knowledge to feel confident in identifying as multiracial (Wallace, 2003). For example, per Renn (2004), multiracial students who had not learned about their cultural heritage before college reported taking classes, studying abroad, or participating in co-curricular activities to learn about their backgrounds. In addition, bilingual students who identified as multiracial reported that this quality assisted them in fitting in with other students belonging to the same, shared
racial background. This language knowledge allowed the students to be viewed as an “authentic” representation of their racial identity (Renn, 2004). Furthermore, peer culture is a very important aspect that impacts students’ decisions to identify as multiracial (Renn, 2008). For example, mixed-race children were more likely to identify as multiracial or with a minoritized identity (if one parent was White) if their school population was predominantly minority students (Brunsma, 2005). Parents were also more likely to label their mixed-race children in this way if the school the student attended did not have a predominantly White student population. Additionally, multiracial individuals reported popular culture’s impact on peer culture as affecting their identity development. For multiracial individuals who grew up seeing famous multiracial individuals (e.g., Tiger Woods, Barack Obama, etc.) choosing to identify outside of the mono-racial binary, they were provided with a role model of how to identify, and also felt that they could be more accepted by their peers because of these peoples’ notoriety (Townsend et al., 2012).

Multiracial students have also cited the availability of a community of other multiracial and biracial students as having a big impact on their identification decision (Renn, 2008). Additionally, resistance from mono-racial students of color, as well as racism among White students, have both been reported as aspects of peer culture that influenced students’ decisions to identify as multiracial (Renn, 2000). This experience of racism was expanded to White acquaintances in other research studies. For example, a Latinx and White multiracial individual stated that they could not go over to their friend’s house in high school if her grandfather was over because he did not like Mexican people (Miville et al., 2005). Additionally, an Asian and American Indian multiracial individual
reported being turned down for a job twice due to their Asian surname, until they showed up in person to inquire about the job. Finally, the extent to which a campus peer culture supported or worked against students moving between identity-based social groups impacted the choice to identify as multiracial. Specifically, at campuses where movement between racial groups was more fluid, multiracial students felt like they had the freedom to belong to multiple groups, whereas these students felt like they had to make a choice and maintain said choice on campuses where there was a clear delineation among groups, and/or where membership in one group precluded membership in another group (Renn, 2004).

One of the first multiracial identity development models was Poston’s Biracial Identity Development model (Poston, 1990). This model states that biracial individuals will experience conflict and periods of maladjustment during the development process (Poston, 1990). Poston’s model consists of five stages: personal identity, choice of group categorization, enmeshment/denial, appreciation, and integration. Individuals are usually very young in the personal identity stage. The individual may be aware of race and ethnicity, but their sense of self is not centered on race or ethnicity (Hud-Aleem & Countryman, 2008). The next stage, choice of group/categorization, is when an individual is forced to choose an identity in an ethnic group.

The factors that affected individuals’ decisions to choose a mono-racial or multiracial identity are divided into three groups: status factors, social support factors, and personal factors (Poston, 1990). Status factors include: group status of parents’ ethnic backgrounds, ethnicity of neighbors and parental peers, and ethnicity and influence of peer group. Social support factors include: parental style and influence, acceptance and
participation in cultures of various groups, and parental/familial acceptance. Personal factors include: physical appearance, knowledge of languages other than English (if applicable), cultural knowledge, age, political involvement, and individual personality differences (Poston, 1990).

The third stage, enmeshment/denial, is characterized by confusion and guilt at having to choose one identity that is not fully encompassing of an individual’s background. Individuals in this stage can also feel self-hatred and unacceptance from one or more groups. The fourth stage, appreciation, is when individuals started to appreciate their multiple identities and broaden their reference group orientation (Poston, 1990). Their identification decision is still impacted by the factors in stage two, and they still tend to identify with one racial group. In the fifth and final stage, integration, multiracial individuals experience wholeness and integration. They tend to both recognize and value all of their racial identities, and thus develop a secure identity (Poston, 1990).

Another influential multiracial identity development model is the Continuum of Biracial Identity Model. This model attempts to reflect the diverse ways that multiracial individuals see themselves racially, without placing judgment on the individuals if they do not see themselves the way biracial and multiracial identity development models suggest they should (Rockquemore & Laszloffy, 2005). This model focuses on the multiple racial identifications that exist in the multiracial population, as opposed to trying to highlight a single, correct identity for individuals. The continuum has singular identities on each end, which represent each racial group that an individual belongs to, with blended biracial identity in the middle.
On the continuum, individuals can identify exclusively with one racial identity, blended racial identity with an emphasis on one identity over the other, or have an equally blended biracial identity (Hud-Aleem & Countryman, 2008). The belief is that this identification is fluid and subject to change, as opposed to remaining stagnant. The Continuum of Biracial Identity Development acknowledges that multiracial individuals can identify mono-racially while still having a high self-esteem. However, this model still assumes that a multiracial individual can only have two, distinct racial identities, which excludes a large portion of the multiracial population.

Another multiracial identity theory that is specifically utilized in higher education is Renn’s Multiracial Identity Theory (Renn, 2000; Renn, 2003; Renn, 2004; & Renn, 2008). Renn utilized Bronfenbrenner’s ecology theory to frame biracial and multiracial college student identity and experiences (Renn, 2003). Renn identified five patterns of identities among mixed-race students: mono-racial identity, multiple mono-racial identities, multiracial identity, extraracial identity, and situational identity (Quaye & Harper, 2015). In the mono-racial identity, a student identifies with only one racial category that makes up their heritage with which to identify. In the multiple mono-racial identities identity, a student alternates between the racial groups that make up their heritage. Different factors impact which racial group a student identifies with at a given place or time. In the multiracial identity, a student identifies with more than one racial group that makes up their heritage. In the extraracial identity, the student does not identify with any racial group. This specific identity pattern represents resistance from a student to what they consider an artificial category (Renn, 2008). In the situational identity, a student moves between or among the other four patterns. Students change
identity based on circumstances and the shift is based on interactions between a student and their environment (Renn, 2000).

Renn’s studies on multiracial identity theory illustrate the significance that peer culture has on the identification decision and its process (Renn, 2000). Additionally, Renn (2003) found that students’ characteristics, skills, and cultural knowledge, combined with the intensity for which they seek or avoid exploring their racial identity, led them to certain campus microsystems and away from other campus microsystems. The interaction with students and their microsystems strongly influenced where students fit in and how easily they could move from one identity space to another. The mesosystem also influenced that movement and the interest of identifying with various groups on campus. The exosystem helped with students’ racial awareness of racial identity by paying attention to racial issues through experiences such as curriculum and institutional forms (Renn, 2003).

However, Renn’s research findings are limited by sample size and geographic location. Combined, the three studies have a sample size of 56 students from six different institutions. The institutions were located both in the Northeast and the Midwest regions of the United States (Renn, 2003). The first study had a sample size of 24 students, where 20 of those students had one white parent and one BIPOC parent. Thus, Renn’s findings are not easily generalizable to an overall multiracial student population, especially for multiracial students who do not have a White parent (Renn, 2008). Moreover, Renn’s model helps to better understand the multiracial student experience on campus, but does not illustrate student multiracial identity development. Renn’s theory provides a
framework for the student identity at a given point in time, but it does not allow the tracking of how the identities are developing through time (Renn, 2003).

While not an explicit identity development model, it is still important to review the work of Johnston-Guerrero and Pecero on mixed heritage student identity exploration. Johnston-Guerrero and Pecero (2016) conducted a qualitative study where they explored the factors of race, culture, and family in the identity construction of twenty-five mixed heritage students. Their goal was to reexamine multiracial student identity development, as the higher education landscape had changed since Renn’s ecological study was conducted over ten years earlier. Through this study, it was determined that culture and race were both important for describing students’ identities, but culture seemed slightly more descriptive (Johnston-Guerrero & Pecero, 2016). For example, one participant described culture as something that can be adopted and adapted, while race was unable to be changed. Another participant stated that they gravitated toward the word culture over race because the term race was not specific enough. Secondly, family served as a source of both culture and race, but the extent varied across students’ experiences. Some participants stated that race was not really discussed in their home, but talked about the cultural appreciation they learned from their families. Another participant mentioned a clash of cultures between both sides of his family, which in turn made his familial relationships more difficult.

Additionally, participants’ familial experiences provided different cultural knowledge that influenced their navigation of racialized environments (Johnston-Guerrero & Pecero, 2016, p. 286). For example, one participant stated that people always thought she was adopted because she lived with her father who was White, but she
looked Asian. However, her father’s family appreciated her Asian culture and celebrated those customs, which allowed the participant to still feel culturally included, even though statements outside of her family were made to make her feel excluded. Another participant stated that she was the only mixed-race individual in her family, but that her White family members did not make her feel excluded because they utilized a colorblind approach to society. However, she did recognize that her father wanted her to have more access to Black culture, but that this was different messaging than what she was used to receiving from her White family, as they did not discuss race. Implications from this study include: the need for multiracial students to have the opportunity to seek out ethnic and cultural capital at higher education institutions, the need to partner with parents about racial and cultural socialization, and the importance of higher education institutions aggregating racial data correctly so multiracial students get access to all of the initiatives for which they identify.

Finally, it is important to note that identifying as multiracial has not been reported as being a linear process. Across studies on multiracial identity development, it was found that identity fluctuated based on life circumstances (Hud-Aleem & Countryman, 2008). Additionally, multiracial participants have reported that their self-racial labels changed from childhood to adolescence to adulthood (Lee & Bean, 2004). For example, a cognitive dissonance between self-identity and self-labeling was found, and multiracial individuals reported the processes to differ from one another. Self-labeling was reported as taking longer and sometimes being more difficult, as multiracial participants were trying to find a name or label for themselves that felt authentic and real. While many multiracial students self-identified as multiracial, their self-labeling was sometimes a
combination of their racial identities, or a new classification made to represent the identities that are most salient to them. For example, a Black and Asian identifying multiracial individual reported identifying as multiracial, but their self-identification label is “BlAsian” (Lee & Bean, 2004). Most multiracial individuals reported not finding a self-label that they were satisfied with until college or adulthood (Renn, 2003).

**White Identity Development Models**

While multiracial identity development does include individuals who may have a White parent, it is important to review White identity development too, as some multiracial students do identify with aspects of Whiteness, or entirely as a White person. For example, Helms stated there were two different phases to White identity development, “Abandonment of Racism” and “Developing a Non-Racist Identity” (Helms, 1990). There are thirteen stages in total, but White people may go back and forth during their development.

Additionally, a White person may not make it past the first phase. There is no guarantee that a White person will develop a non-racist identity. Helms’ model assumes that all White people begin in the contact status, which is described as being oblivious to racism, lacking an understanding of racism, having minimal experiences with People of Color, and potentially also professing to being colorblind (Helms, 1990). Eventually, the White person becomes conflicted over unresolvable racial moral dilemmas frequently perceived as polar opposites. This may include: believing one’s self is not racist yet having an issue with a relative dating a BIPOC person, subscribing to meritocracy, and/or viewing oppression, yet still refusing to acknowledge that oppression based on racial identity exists in society. The second stage is disintegration. This is when White people
gain an increased awareness of racism and white privilege due to personal experiences. Common emotional responses to this new information include shame, guilt, denial, anger, depression, and withdrawal. White people in this stage may also attempt to persuade other White people to abandon racist thinking. However, White people may also feel caught between racial realities (Helms, 1990). The next stage, reintegration, may look like regression for some individuals, as a good amount of White people blame BIPOC people for their problems, as well as have an instilled conviction for White supremacist ideals (Helms, 1990). This is because of cognitive dissonance and disequilibrium that White people experience in the disintegration stage. When an equilibrium cannot be reached, this is when White people recommit to White supremacist ideals, thus making the reintegration stage the most racist stage in Helms’ identity development model.

The next stage is pseudo-independence, which is when a White person attempts to understand cultures, races, and ethnicities that are different from their own. White people in this stage may befriend BIPOC individuals, but the rationale for the friendship is based off of similarities, and said similarities are usually surface level, like mutual music and television interests. Furthermore, they look at issues of racism from a logical standpoint as opposed to using emotion. This is also when White people attempt to make BIPOC individuals more like them, which White people view as helping or assisting BIPOC people. If a White person is motivated to continue moving forward, then they will move onto immersion. The person searches for an understanding of the personal meaning of racism, their own racial identity, and the ways by which one benefits from White privilege. There is an increasing willingness to truly confront one’s own biases, to redefine Whiteness, and to become more active in directly combating racism and
oppression (emersion). Immersion/Emersion is marked with increasing experiential and affective understandings that were lacking in the previous status (Helms, 1990).

The final stage of Helms’ model is autonomy. White people in this stage begin to develop a non-racist White identity (Helms, 1990). There is increased awareness of one’s own Whiteness, reduced feelings of guilt, acceptance of one’s own role in perpetuating racism, and renewed determination to abandon White entitlement. The person is knowledgeable about racial, ethnic, and cultural differences, values diversity, and is no longer fearful, intimidated, or uncomfortable with the experiential reality of race (Helms, 1990).

Another aspect of White racial identity development is White racial consciousness. The concept of White racial consciousness refers to the ways that White people think about individuals whom they do not consider to be White, or the racial out-group (Rowe et al., 1995). The White racial consciousness model attempts to identify commonly held attitudes that White people hold, and if any best characterize the racial attitudes held by White individuals (Leach et al., 2002). White racial consciousness assumes that racial attitudes are formed in the same way as non-racial ones, and that they change over time due to inconsistencies in experiences. There are seven types of attitudes, and they are grouped into two categories named unachieved status and achieved status.

The three attitudes in the unachieved status are: dependent, dissonant, and avoidant (Rowe et al., 1995). Dependent attitudes lack exploration, dissonant attitudes lack commitment, and avoidant attitudes lack both exploration and commitment. The four types of attitudes in the achieved status are: conflictive, dominative, integrative, and
reactive. Conflictive attitudes are based on individualism yet support overt fairness. Dominative attitudes are ethnocentric and pro-White. Integrative attitudes are pragmatic, positive racial attitudes. Reactive attitudes are strong pro-minority attitudes (Rowe et al., 1995). As previously stated, multiracial individuals can also go through aspects of White racial identity development if they have a White parent. Thus, it is imperative to be aware of White racial identity development and its processes as a multiracial student navigates their self-identification journey.

**Implicit Racial Bias & Implicit Anti-Black Racial Bias**

Implicit attitudes have been found to impact how individuals view themselves and the world around them. Implicit attitudes are evaluations that occur without conscious awareness by an individual towards the self, others, objects, and other entities (Greenwald & Banaji, 1995). Specifically, implicit bias refers to the attitudes or stereotypes that affect one’s understanding, actions, and decisions in an unconscious way, thus making them difficult to control (Greenwald & Banaji, 1995). Therefore, implicit anti-Black racial bias is when individuals have attitudes towards Black or African American groups, or associate specific stereotypes with Black and African American individuals without their conscious knowledge.

Previous research on implicit racial bias and age shows that children understand the concept of race at a young age, and their understanding may be commensurate with that of adults (Baron & Banaji, 2006). North American children as young as four do not rely on perceptual information alone when categorizing people. Instead, children appear to essentialize racial kinds, including using skin color as a racial identifier, regarding race as a property that is fixed at birth and resistant to change across time and surface features
(Hirschfeld, 2001). This means that children begin to rely on implicit attitudes, thoughts, and perceptions about race very early on in order to help them categorize individuals. Among adults, older adults are more likely to express both implicit anti-Black racial bias and implicit racial bias when compared to younger adults (Henry et al., 2009). White older adults demonstrated more implicit anti-Black racial bias on the race IAT than did younger White adults (Stewart et al., 2009). Stewart et al. (2009) hypothesized that older adults have less control of their automatic prejudicial associations when compared to younger adults, as opposed to simply harboring more prejudices than individuals who are younger than them.

In the United States, anti-Black racism is systemically, explicitly, and implicitly integrated into society (Kendi, 2019). Due to this fact, a bias towards White individuals has been found in White individuals. For example, when White participants looked at pictures of White and Black faces and rated each person’s apparent friendliness, the explicit measure of racial attitudes (ratings of friendliness for White versus Black people) revealed bias in favor of Black people, but facial EMG activity served as a measurement of implicit racial attitudes, and the EMG activity revealed bias against Black people (Vanman et al., 1997). In reference to multiracial individuals and implicit racial bias, multiracial individuals may have less of a bias towards White individuals than their White counterparts (Neto & Paiva, 1998). Neto and Paiva (1998) administered Portuguese translations of the Preschool Racial Attitude Measure to Black, White, and biracial eight-year olds. White children displayed a stronger pro-White/anti-Black bias than the biracial children, and also showed a more pro-light skin bias than their biracial peers.
While multiracial children appeared to have less of a bias towards White people than White children, multiracial college students have still been found to use racial stereotypes and generalizations when talking about racial identification (Talbot, 2008). Talbot (2008) found that multiracial participants still used descriptions of stereotypical behavior associated with race and physical attributes associated with race when describing themselves, even though they did not identify as mono-racial, nor with Whiteness. One proposed reason for this phenomenon is that implicit racial bias is impacted by both family and peer influence (Hughes et al., 2009). For example, a White and Latinx identifying individual reported receiving messages from their mother about marrying a White individual in order to appear more successful in life. Additionally, an Asian and White identifying individual reported being scolded by their parents for having a Black friend because they viewed Black people as inferior to their own races (Hughes et al., 2009).

In addition, multiracial individuals have reported feeling more prepared for discrimination and bias from White people, the dominant group, than members of minority groups with whom they share an identity (Root, 1996). When this notion was explored further, participants reported expecting to experience racism at the hands of White people, but were not prepared for both the explicit and implicit bias some mono-racial individuals had against multiracial individuals. Interestingly, while multiracial individuals report being upset about microaggressions and stereotypes from mono-racial individuals, some do not view their experiences as oppression. For example, when interviewed about monoracism and multiracial oppression, some multiracial college students described their experiences as “annoying” or “not being taken seriously” when
they identified as multiracial, but the students did not consider these experiences oppression, as they viewed oppression from a mono-racial lens (Johnston-Guerrero et al., 2020). Some of the experiences described by students included not fitting into a mono-racial group phenotypically, and also being quizzed by peers in a mono-racial group about the group’s culture and history. Further still, a myriad of multiracial individuals do not believe that monoracism exists. Monoracism is defined as the systemic social oppression that targets individuals who do not fit into mono-racial categories, groups, or phenomena (Harris, 2016). For example, one multiracial college student stated that what was called monoracism was in actuality oppression due to having membership in a racially minoritized identity (Johnston-Guerrero et al., 2020). While multiracial individuals could recognize when they felt their experiences aligned with oppression, they often minimized the idea that said experiences were tied to their multiracial identity.

When reviewing the concepts of citizenship and education level, both have been found to have an association with implicit anti-Black racial bias (Rowe et al., 1995). Specifically, individuals with less formal education have been found to be more likely to have more racial biases towards White people and have more of an anti-Black bias than individuals with college degrees (Hipolito-Delgado, 2016). One hypothesis for this finding is that individuals meet other individuals who are different from them in the higher education setting, and are thus introduced to different opinions and perspectives. Another hypothesis for this finding is that individuals are introduced to broader and more neutral educational material and information than what they were taught in the primary and secondary school systems. In practice, education that specifically addresses implicit
racial bias can decrease the occurrence of racial implicit bias in individuals (Bruster et al., 2019).

Additionally, individuals who have citizenship in a specific country have been found to exhibit implicit racial biases against perceived immigrants during times of hardship (Vautier, 2009). For example, after the September 11th attacks that occurred in the United States in 2001, Middle Eastern, Southeast Asian, and African individuals reported lower employment rates and less inclusion in the workplace, even when their peers did not show any explicit racism or prejudice towards them (Shepherd, 2018). Because citizenship status and education level are both factors that have been found to be associated with implicit anti-Black racial bias, it was imperative that they be included as variables in this study.

**IAT (Implicit Association Test)**

One way that implicit attitudes are measured is through the Implicit Association Test. The IAT seeks to understand implicit attitudes by measuring their underlying automatic evaluation (Greenwald et al., 1998). The IAT assesses the association between concepts and evaluations (Greenwald et al., 1998). The IAT’s measure is based on latencies for two tasks that differ in instructions for using two response keys to classify four categories of stimuli (Greenwald et al., 2003, p. 197). The main idea is that making a response is easier when closely related items share the same response key. The theory behind the IAT is Heider’s Balance Theory. Balance Theory states that a system of liking and disliking relationships is balanced if the product of the valence of all relationships within the system is positive (Heider, 1958). It conceptualizes the cognitive consistency motive as a drive toward psychological balance. Unbalanced structures are associated
with an uncomfortable feeling of negative affect, and this negative feeling leads people to strive for balanced structures and avoid imbalanced ones. For example, an individual who takes the race IAT may believe they are racially neutral. However, while taking the race IAT, the individual has a slower response time when positive words are associated with faces of African American individuals. During this slower response time, it is very likely that the individual would have been feeling uncomfortable because implicitly, they do not relate positive words as quickly with African American faces as they do with European American faces. The time required to overcome racist associations shows up on the test.

The IAT was created in 1995, and its scoring procedure was evaluated and revised in 2003. The updated scoring algorithm improved construct purity when compared to the original scoring procedure. Additionally, the new algorithm reduced sensitivity to prior IAT experience, which assists in pretest-posttest designs, as well as studies with multiple IAT measures. Furthermore, the updated scoring algorithm: a) better reflects underlying association strengths, (b) more powerfully assesses relations between association strengths and other variables of interest, (c) provides increased power to observe the effect of experimental manipulations on association strengths, and (d) better reveals individual differences that are due to association strengths rather than other variables (Greenwald et al., 2003, p. 215).

The IAT is offered through a website called Project Implicit. The goal of the organization is to educate the public about hidden biases and to provide a “virtual laboratory” for collecting data on the Internet (Nosek et al., 2016). Research comparing Internet and laboratory studies found that participants are somewhat more honest in web
studies versus lab studies for dimensions like racial biases and illegal drug use (Evans et al., 2003).

Project Implicit

Project Implicit is a non-profit organization and international collaborative of researchers who are interested in implicit social cognition (Project Implicit, 2021). It was initially founded as a multi-university research collaboration in 1998 by Tony Greenwald, Mahzarin Banaji, and Brian Nosek. The mission of Project Implicit is to educate the public about implicit bias and to provide what the founders call a “virtual laboratory” for collecting data on the internet. Project Implicit also has a section called Project Implicit Health, (formerly Project Implicit Mental Health) which measures implicit reactions to mental health illnesses and related factors like alcohol, eating, and exercise (Project Implicit, 2021). Additionally, Project Implicit offers Education Services, Programming Services, and Consulting Services. The educational services offered are sessions facilitated by research scientists. The topics of these sessions are diversity and inclusion, leadership, and mitigating factors in decision making. The programming services consist of scientists and programmers building studies for a researcher to use. The researcher is provided a private link to the study so they can then distribute it to a study sample, or they can run the study through the Project Implicit volunteer pool (Project Implicit, 2021). Finally, consulting services consist of scientists from Project Implicit consulting with a client about collecting, analyzing, and interpreting organizational data. They also assist with developing and evaluating organizational interventions and initiatives.

Currently, Project Implicit offers 15 IATs that are free to take through what is called their Demonstration Site. These IATs are: Age, Arab-Muslim, Asian, Disability,
Gender-Career, Gender-Science, Native, Presidents, Race, Religion, Sexuality, Skin-tone, Transgender, Weapons, and Weight. The IATs have been collecting data online since 2010. The archived data sets with codebooks are provided for researchers who are interested in the demonstration site data and who want to conduct their own analyses. Individuals who visit the site voluntarily participate in IATs of their choosing. They can either make an account using their email address, or they can choose the language they speak and take an IAT without making an account. Individuals are asked to select the IAT that they want to take. They are then asked for demographic information, as well as optional questions regarding their attitudes and beliefs about the specific IAT they are about to take. These questions are asked for two reasons: a) the IAT results can have more meaning if context around self-understanding of an attitude or stereotype is provided, and b) Project Implicit likes to compare differences between people and groups for potential, future studies (Project Implicit, 2021).

Participants are then shown a message that explains that their data are secured, and informs participants that Project Implicit uses the same encryptions that banks use to secure information. Participants are then shown a message that says if they are unprepared to encounter interpretations to the IAT that they may find objectionable, that they should not proceed in taking an IAT. Then, participants are provided the contact information for Project Implicit to report any questions, concerns, or problems regarding their participation in an IAT on the Project Implicit website. Finally, participants receive a message that says “I am aware of the possibility of encountering interpretations of my IAT test performance with which I may not agree. Knowing this, I wish to proceed”
(Project Implicit, 2021). The words, “I wish to proceed” are hyperlinked, so participants must click that in order to proceed with taking an IAT.

On the demonstration site, information about Project Implicit is listed, as well as education about the IAT. The education section includes a brief overview of the IAT and how it measures attitudes and beliefs that people may be unwilling or able to self-report. This section also explains how the IAT works when taking it, and lists ethical considerations regarding what the IAT should and should not be used to do. For example, Project Implicit states that the IAT should not be used for diagnostic purposes (Project Implicit, 2021). Lastly, the education section contains frequently asked questions about the IAT and how to interpret results. There is also a blog that shows participants how different IAT results have been used, as well as a help section for any technical issues relating to taking the IAT. There is also a contact information category, and a donate button for anyone who is interested in supporting the initiatives being done by Project Implicit.

Project Implicit also has a Research Site on their website, which is consistently updated with new studies related to the topic of bias (Project Implicit, 2021). Registered participants are randomly assigned to studies from a pool of available psychological studies. When participants navigate to the research site, they receive the same preliminary information as participants who take the IAT. Participants in the research site also receive the same options that IAT participants do in regards to education, blog, help, contact information, and the option to donate to Project Implicit.

After data are collected through the demonstration site, the data are made publicly available with the datasets updated annually. The following information is also provided:
interpretation of the IAT results, the scientific status of the IAT, and what the IAT specifically measures (Project Implicit, 2021). Because the data sets and codebooks from the demonstration site are large, each of the IATs’ data are archived based on their popularity, importance, and difficulty. If an individual has special interest in any of the specific data sets, they are advised to contact Project Implicit for a special request of data processing. Each IAT section provides information about that specific IAT, as well as provides the data set and codebook for each year that data has been collected. The datasets for each IAT contain all of the demographic information and optional questions asked before the IAT begins for a participant, as well as the actual IAT results. The codebooks for each IAT explains all of the variables, how the variables were defined, which questions were optional, and which optional questions were randomly assigned and not asked of every participant.

**Study Cognates**

As previously stated, there were four cognates in this study: Internalized Racism, Colorism, Respectability Politics, and Horizontal Racial Oppression. Internalized racism can have an impact on implicit anti-Black racial bias, especially if an individual is unaware that they have internalized racist, anti-Black ideologies. Colorism can impact how an individual interprets race, which in turn can impact an individual’s implicit anti-Black racial bias. Respectability politics require individuals to use standards acceptable by the dominant culture to demand social change. In the United States of America, the dominant culture is Whiteness. Thus, an individual’s implicit anti-Black racial bias can be impacted by their opinion of respectability politics. Finally, horizontal racial oppression is when BIPOC racial groups enforce the ideals of White supremacy onto one
another. Horizontal racial oppression utilizes a racial hierarchy where Black individuals are at the bottom. If a multiracial individual engages in horizontal racial oppression through thoughts and/or actions, then it can have an impact on their implicit anti-Black racial biases.

*Internalized Racism*

One of the cognates in this study was internalized racism. Internalized racism is the personal conscious or subconscious acceptance of White society’s stereotypes and biases of one’s ethnic group, and is an internalized reaction to externally opposed oppression (Sosoo et al., 2020). Internalized racism comprises private beliefs and biases about race and racism, and can also impact how an individual interacts with others (David et al., 2019). According to Freire (1970), the oppressed hear so often that they are good for nothing, that in the end they become convinced of their own unfitness.

Additionally, internalized oppression is considered a major psychological effect of racism and White supremacy (Pyke, 2010). Specifically, that the ongoing injustice that People of Color experience lead to doubting one’s abilities, feeling conflicted about one’s identity, feeling like one is of lesser value, and believing messaging that People of Color racial groups are inferior to the White racial group (David et al., 2019).

Previous research supports this theory, as it has been found that people who experience more explicit racism also tend to have higher levels of internalized racism (David & Okazaki, 2010). Additionally, previous research also found that people who are frequently exposed to degrading messages about their racial group from relatives, peers, and the general community tend to have higher levels of internalized racism (David & Nadal, 2013). Internalized racism creates conflicts between and within racial groups, and
it may push racial minority groups to emulate and identify with oppressors (Padilla, 2001).

Internalized racism manifests differently among the various, minoritized racial identity groups. For example, bell hooks (2004) states that young African American men are groomed to devalue educational achievement due to societal messages that are internalized and reinforced by Black families and peers. This results in both increased levels of internalized racism and implicit anti-Black racial bias. Additionally, Hipolito-Delgado (2016) found that internalized racism was inversely related to ethnic identity for Latinx students, such that as sense of pride in belonging to one’s heritage increases, the level of internalized racism decreases. One factor that was found to impact internalized racism is family input. For example, in Sosoo et al. (2020), participants reported negative comments and opinions from family members as contributing to one’s own feelings about their BIPOC racial identity. Peer influence was also cited as a factor in internalized racism – this was especially true for individuals whose phenotype or personality followed the racial stereotypes that White people hold about their racial identity group. Additionally, internalized racism was also shown to be impacted by implicit racial bias and implicit anti-Black racial bias. Specifically, African American and Afro-Caribbean adults in the United States were found to have higher levels of internalized racism if they had an implicit racial bias towards White people, versus their peers who did not have an implicit racial bias towards White people (Molina & James, 2016). While previous, peer-reviewed research on internalized racism has focused primarily on how this phenomenon affects mono-racial individuals, multiracial individuals have also reported feelings of internalized racism (Roberson & Pieterse, 2021).
**Colorism**

Colorism is the prejudice or discrimination against individuals based on skin tone, usually dark skin tone, and can occur among people of the same ethnic or racial group (Dixon & Telles, 2017). In the United States, it is important to note that the concept of colorism is separate from racism. Additionally, its origins have been traced to European colonization and enslavement. Colorism is also rooted in White supremacy, as White skin is viewed as the most desirable and a way to have a proximity to Whiteness, which is viewed as superior (Wilkerson, 2020). For example, in the seventeenth and eighteenth centuries, European enslavement of Black and African individuals was justified using biblical interpretations of the very dark skin color of African individuals so that having dark skin became synonymous with enslavement (Jablonski, 2012).

Furthermore, for enslaved people in the United States, those with lighter skin (generally the product of enslaved Black women raped by White male enslavers) usually worked inside the house, whereas enslaved individuals with darker skin were forced to work outside (Drake & Clayton, 2015). Enslaved people with lighter skin were also more likely to be taught a trade skill or be taught to read by their White enslavers. After the Civil War, formerly enslaved Black individuals who had lighter skin were viewed more favorably, and were also more prosperous than darker skinned Black individuals (Dixon & Telles, 2017). For other People of Color, research has shown that lighter skin is generally associated with better life chances for them in the United States (Keith & Monroe, 2016). Colorism results in actions like limiting one’s child’s sun exposure so that they do not appear too dark to fit a skin tone that is deemed acceptable by society.
Recent research on colorism shows that it still has a big impact in the United States. For example, Weaver (2012) found that the skin color of political candidates shaped the perceptions of White voters, such that White voters rated BIPOC candidates higher if their skin tone was lighter. Additionally, Dixon and Maddox (2005) found that the United States criminal justice system discriminates based on skin color, including using darker skin as a perception of criminality. Moreover, colorism seems to be perpetuated and passed down through different generations, as adolescents with darker skin and those who pass for White both reported feeling internal discomfort based on skin color (Harris, 2018). In reference to multiracial individuals, colorism tends to be a prevalent experience for them, especially since their racial distinctions are often viewed as blurred or ambiguous (Telles & Sue, 2009). Because racial identity is literally mixed for multiracial individuals, individuals tend to use skin color as a way to find a grouping or distinction for this population.

Colorism is a direct result of anti-Black racism (Jablonski, 2012). Colorism has been utilized to deliberately maintain the status quo of White supremacy in the United States, which puts Black and African individuals at the bottom of the racial hierarchy. It is also related to implicit racial bias and implicit anti-Black racial bias. Individuals with implicit racial bias towards White individuals were found to rate individuals with darker skin tones more negatively than those with lighter skin tones (Reed, 2017). Additionally, individuals with an implicit anti-Black racial bias were shown to more likely convict individuals with dark skin as opposed to individuals with lighter skin tones, even when the evidence presented and criminal backgrounds were the same (Levinson & Young, 2010).
**Respectability Politics**

The third cognate in this study was respectability politics. Respectability politics refers to the use of respectability narratives as representations of marginalized individuals meant to construct an image of the marginalized group as people sharing similar traits, values, and morals with the dominant group (Richardson, 2019). The inception of respectability politics in the United States can be traced back to the Black Baptist Church in the post-Civil War era. The Black Baptist Church was a meeting place and rallying center for resistance against racism, and one of its main goals was to make the White majority in the country view Black people as humans (Richardson, 2019). In order to do that, Black people needed to disprove the stereotypes that the White majority held about their population. This resulted in the Women’s Convention of the National Baptist Convention’s creation of a message that was drawn from the bible, philosophies of racial self-help, Victorian ideology, and democratic principles from the United States Constitution (Higginbotham, 1993, p. 187). Examples of adherence to respectability politics for both Black men and women include: straightening one’s hair, wearing modest clothing, sexual purity, and adherence to temperance (Richardson, 2019).

When other BIPOC races came to the United States, they saw how respectability politics could be used to elevate their own statuses, and many adopted the idea that being viewed as respectable by the White majority would bring them equality (Cooper, 2017). Many BIPOC races felt that ignoring racism perpetrated against them by White people would allow them to be viewed more favorably in United States society (White et al., 2006). This included separating themselves from Black people in order to create a visual of being in closer proximity to Whiteness. For example, many non-Black, People of
Color have reported being told by parents or family members to not date or marry a Black person for fear that it will hinder their current privileges and status (Richardson, 2019). In the present, respectability politics still impact the employment, healthcare, education, housing, and other life aspects of Black, Indigenous, People of Color in the United States (Pitcan et al., 2018). For multiracial individuals, respectability politics may affect their decision to identify as multiracial, mono-racial, or with Whiteness if they have a White parent (Stepney et al., 2015).

While respectability narratives and politics were both created and utilized to assist Black and African American individuals after the Civil War, in the present day, they are associated with implicit anti-Black racial bias (Landor & Barr, 2018). For example, respectability narratives encourage Black people to dress in white collar professional attire. A 2021 study showed that Black men wearing sweatshirts and jeans were viewed as more threatening than Black men wearing business suits (Alinor & Tinkler, 2021). However, Black men were viewed as posing more of a threat than White men overall, regardless of their wardrobe. This includes if a White male was wearing a sweatshirt and jeans while a Black male was wearing a business suit. When implicit racial bias was measured, it was determined that individuals with a higher level of bias towards White individuals were more likely to use respectability politics to negatively judge Black individuals (Alinor & Tinkler, 2021).

**Horizontal Racial Oppression**

The last cognate in this study was horizontal racial oppression. Horizontal racial oppression refers to the phenomenon in which members of racial minority groups express unfavorable attitudes towards members of other racial minority groups, and hold them to
standards set by the White majority and systemic White supremacy (White & Langer, 1999). One example of horizontal racial oppression in the United States is the sentiment of anti-Blackness and anti-Black racism that is present amongst most non-Black, racial minority groups (Campion, 2019). This came from the White majority setting standards that framed Black people as inferior and undesirable, while also framing Whiteness as superior to other races, which in turn created a racial hierarchy (Gines, 2013). The framing of Black people as inferior and undesirable also created implicit anti-Black racial bias (Campion, 2019). This racial hierarchy began a societal competition amongst BIPOC racial groups to be the most respected and successful, and thus created animosity and negativity amongst BIPOC racial groups as they fought to get to the top of the social and economic hierarchy.

Horizontal racial oppression can manifest itself through entities like colorism and respectability politics. For example, one racial minority group may view another racial minority group as inferior because said minority group’s members tend to have darker skin. Additionally, respectability politics can also be utilized to portray another racial minority group as unfavorable in order to elevate another minority group’s societal status. Horizontal racial oppression relies on stereotypes and generalizations that have been engrained into United States society by the White majority group (Schmitt et al., 2003). For example, throughout United States history, Asians have been painted as the “model minority”, which has caused horizontal racial oppression between Asians and other racial minority groups. Additionally, some Latinx individuals have intentionally distanced themselves from any Afrocentric roots that they have in order to be separated from Blackness (Hipolito-Delgado, 2016).
For multiracial individuals, horizontal racial oppression can come from both mono-racial and other multiracial individuals (Aspinall, 2003). Mono-racial individuals may view multiracial individuals as not belonging to their own racial group, and also as inferior since they are “only half” of a specific racial identity (Caballero, 2013). This sentiment is especially prevalent if a multiracial individual has a White parent, and can come from White or BIPOC mono-racial individuals (Caballero, 2013). In addition, mono-racial individuals from minority groups may feel animosity towards multiracial individuals if they seem to be more successful or be more accepted by the White majority (Campion, 2019). Similarly, multiracial individuals who have a White parent may also view themselves as superior to other racial minority groups if they can pass for White, or if they move through White society without much issue (Johnston & Nadal, 2010). In reference to BIPOC multiracial individuals, they have still reported experiencing horizontal racial oppression from mono-racial and multiracial individuals, but for different reasons: not being White, not presenting as White, having darker skin or non-Eurocentric phenotypes, and not belonging to one specific racial identity group (Pérez Huber & Solorzano, 2015). Due to the fact that multiracial individuals can both experience and perpetuate horizontal racial oppression, it is important to research whether there are differences in implicit anti-Black bias between White and BIPOC multiracial people.

**Study Purpose**

This study was conducted to determine if there are implicit anti-Black racial bias differences across multiracial people who identify as Black/White compared to multiracial people who do not identify as Black/White, accounting for age, citizenship
status, and education level. The data analysis approach was a hierarchical multiple linear regression analysis that also tested for interaction effects. This approach was chosen to determine if there are any relationships between multiracial identity, age, education level, citizenship status, and implicit anti-Black racial bias. The independent variables were: race (Multiracial – Black/White, Multiracial – Not Black/White), age, education level (Elementary School, Junior High School, Some High School, High School Graduate, Some College, Associate’s Degree, Bachelor’s Degree, Some Graduate School, Master’s Degree, J.D., M.D., Ph.D., Other Advanced Degree, MBA), and citizenship status (United States citizenship vs. No United States citizenship). The dependent variable was overall IAT score, which is the measurement of implicit anti-Black racial bias.

Race is defined as multiracial, meaning made up of more than one race. Race is a social construct that utilizes physical characteristics and shared cultural experiences to create groupings of human individuals (Bonilla-Silva, 2004). Education level is defined as having gone to elementary school up to having a terminal degree, which is the highest academic degree that can be awarded in a particular field. Citizenship status is defined as either having official citizenship from the United States or not having official citizenship from the United States. On the IAT, there is a distinct demographic question asking which country an individual resides in and a distinct question asking which country an individual has citizenship in so that citizenship status and residential status are clearly defined. Finally, overall IAT score is defined as a value between -2 to 2 on the 2015 Race Implicit Association Test.

**Research Questions & Hypotheses**
RQ1: Are there differences in implicit anti-Black racial bias across multiracial people who identify as Black/White, compared to multiracial people who do not identify as Black/White, accounting for age, citizenship status, and education level?

RQ2: Do age, citizenship status, and education level moderate the relationship between multiracial identity and implicit anti-Black racial bias?

H1: Multiracial people who do not identify as Black/White will have less implicit anti-Black racial bias than multiracial people who do identify as Black/White.

H2: Age will moderate the relationship between multiracial identity and implicit anti-Black racial bias, such that older multiracial people will have more implicit anti-Black racial bias than younger multiracial people.

H3: Citizenship status will not moderate the relationship between multiracial identity and implicit anti-Black racial bias.

H4: Education level will moderate the relationship between multiracial identity and implicit anti-Black racial bias, such that multiracial people who have a college degree will have less implicit anti-Black racial bias than multiracial people who do not have a college degree.
METHODOLOGY

Participants

For this study, data were obtained from Project Implicit (https://osf.io/uysrd/), a non-profit organization and intentional collaboration between researchers who are interested in implicit social cognition. The data were taken from the 2015 Race IAT, and included a total of 1,028,518 participants. The target population for this study was multiracial individuals who are 24 years of age or older. Out of the 1,028,518 people who completed the 2015 Race IAT, 53.9% (554,769 participants) did not answer the question that asked for the participant’s race. Out of the 46.1% (473,749 participants) who answered the question that asked for the participant’s race, .3% (2,879 participants) identified as American Indian/Alaska Native, 3.7% (38,179 participants) identified as Asian, .3% (2,890 participants) identified as Pacific Islander or Native Hawaiian, 4.4% (45,718 participants) identified as Black, 31.2% (320,689 participants) identified as White, 2.5% (25,266 participants) identified as Multiracial – Black/White, 3.3% (34,346 participants) identified as Multiracial – Other, and .4% (3,781 participants) identified as Other or Unknown. Multiracial - Other is defined as being of two or more races that are not Black and White (Project Implicit, 2015). For the purpose of this study, the label of Multiracial – Other was changed to Multiracial – Not Black/White. Their ages ranged from seven to 78. In this study, the variable education level ranged from elementary
school to terminal degree. However, this study was most interested in seeing if there were specific differences in implicit anti-Black racial bias between multiracial individuals who had attended a higher education institution and those who had not attended a higher education institution. Thus, participants with ages below 24 were removed because the average age for college degree attainment in the United States is 24 (National Center for Education Statistics, 2021).

After ages below 24 were removed, the sample size for this study was 2,104 participants. It should be noted that in the original data set from Project Implicit, only 8.66% of all participants filled out the age question on the 2015 Race IAT. Additionally, in the original data set from Project Implicit, the average age of the Multiracial – Black/White group was 24.13, and the average age of the Multiracial – Not Black/White group was 25.20. According to Project Implicit (2021), IATs are utilized by educational institutions on an international scale as tools in lessons about implicit bias, so it is unsurprising to see the large decrease of eligible participants after ages below 24 were removed. The racial breakdown of the sample is 26% (551 participants) Multiracial – Black/White, and 74% (1,553 participants) Multiracial – Not Black/White. The biological sex breakdown of the sample is 57% (1,199 participants) female, and 43% (905 participants) male, and their ages ranged from 24 to 78. The citizenship breakdown of the sample is 83% (1,746 participants) are United States citizens, and 17% (358 participants) are not United States citizens. The education level breakdown of the sample is as follows: .0004% only finished elementary school, .7% completed some high school, 2.9% obtained a high school degree, 17.1% took some college courses, 10.9% obtained an associate’s degree, 23.6% obtained a bachelor’s degree, 11.2% took some graduate
school courses, 18.4% obtained a master’s degree, 4.3% obtained a Juris Doctorate, 1.6% obtained a Medical Doctorate, 4.6% obtained a Doctorate of Philosophy, 1.1% obtained another type of advanced degree, 2.9% obtained a Master of Business Administration, and .8% did not answer the question.

**Instrumentation**

The purpose of the race IAT is to measure for implicit racial bias between European American and African American individuals (Greenwald et al., 2002). While the race IAT states that it measures implicit racial bias, in practice, it actually measures implicit anti-Black racial bias since the two groups to choose from are European Americans, which belong to the White racial group, and African Americans, which belong to the Black racial group. The race IAT compares whether an individual is quicker to link European Americans or African Americans with words associated with the concept “bad” and then with words associated with the concept “good” (Project Implicit, 2011). An example of a “good” word is “Loyal”, while an example of a “bad” word is “Dangerous”. The IAT measures the strength of associations between concepts (e.g., Black people) and evaluations (e.g., good, bad) or stereotypes (e.g., athletic, clumsy). The race IAT offered on the Project Implicit website includes one IAT test, sets of explicit measures on racial attitude, sets of personality and political opinion questions, sets of demographic questions, and debriefing questions about how participants thought about their IAT score after the fact (Xu et al., 2014). The race IAT requires the ability to distinguish faces of European and African origin. Responses are recorded electronically as participants take the IAT. The overall IAT score is calculated by the Project Implicit
website after participants complete the IAT, and the score is presented to the participant upon completion.

The theoretical foundation for the IAT is based on Heider’s Balance Theory, which states that a system of liking and disliking relationships is balanced if the product of the valence of all relationships within the system is positive (Heider, 1958). Balance-Congruity Principle, derived from Heider’s Balance Theory, states that when two weakly linked nodes are linked to the same node, the association between these two should strengthen. For example, two weakly linked nodes would be laundry and ball. When linked to the same node, basket, the link between laundry and ball strengthens. The nodes in the Balance-Congruity Principle are equivalent to the concepts in Heider’s theory.

The race IAT consists of a series of seven tasks, and takes individuals ten minutes to complete. In the first task, the participant is asked to assign a word to a category. The categories are European and African. Participants designate a category using the “E” and “I” keys on their computer keyboards. The exercise begins with the “E” key designating the European category, and the “I” key designating the African category. For example, the participant would assign the name “Ben” to either the European or African category, dependent on which category they deem most appropriate. The word appears in the middle of the screen, and then participants press the “E” or “I” button to assign the word to either the European or African category (Lane et al., 2007). On the second task, the participant completes the same categorization activity with an attribute. Once again, they would click the “E” or “I” key to categorize the attribute to a specific category. On the third task, participants complete a combined task that includes the categories and attributes from the first two tasks. For example, one category could be European/Lazy
and the other could be African/Hardworking. Participants would then have to use the “E” or “I” key to assign the attribute or word to one of the categories. The fourth task is the same as the third task, but with more repetitions of names, attributes, words, and images (Lane et al., 2007). The fifth task is the same as the first task, but it reverses the categories’ key distinction, so now “E” and “I” have switched categories. The sixth task is the same as the third task, but the categories are again reversed. The seventh task is a repeat of the sixth task, but with more repetitions of the names, words, images, and attributes. The main idea is that making a response is easier for participants when closely related items share the same response key (Greenwald et al., 1998).

The IAT score is based on how long it takes a participant to sort the words in the third task of the IAT versus the fifth task of the IAT (Greenwald et al., 2003). The score is presented on a scale of -2 to 2, with a score above .65 or below -.65 indicating a strong link to either a bias towards European Americans or African Americans. A score of .65 or higher would indicate a strong link that a participant has a bias towards European Americans, whereas a score below -.65 indicates a strong link that a participant has a bias towards African Americans. Scores between 0 and .15 and 0 and -.15 indicate no link of bias towards European Americans or African Americans. Scores between .16 and .34 indicate a slight link of bias towards European Americans, while scores between -.16 and -.34 indicate a slight link of bias towards African Americans. Scores between .35 and .64 indicate a moderate link of bias towards European Americans, while scores between -.35 and -.64 indicate a moderate link of bias towards African Americans. (Greenwald et al., 2003). The IAT has a test-retest reliability value of .5 (Brunel et al., 2004), which is considered poor reliability (Shavelson, 1996). In terms of construct validity, about twenty
percent of the variance in the race IAT score reflects racial preferences (Schimmack, 2019). However, the creators of the IAT argue that most social psychology measures use arbitrary metrics, but that they sufficiently provide general feedback regarding what the specific IAT scores may mean on the Project Implicit website (Kurdi et al., 2019). The creators of the IAT say that IAT scores are a learning tool for participants, and give participants a starting point in learning about their own implicit biases. The IAT creators view the feedback provided after an IAT is taken as an educational device to get the general public thinking about implicit bias and how it may impact their personal and professional lives.

Measurement of Variables

Independent Variables

The independent variables in this study were: race, age, education level, and citizenship status. The variable race is categorical, and has two levels: Multiracial – Black/White and Multiracial – Not Black/White. The variable age is continuous. The variable education level is ordinal, and has 14 levels: Elementary School, Junior High School, Some High School, High School Graduate, Some College, Associate’s Degree, Bachelor’s Degree, Some Graduate School, Master’s Degree, J.D., M.D., Ph.D., Other Advanced Degree, and MBA. The variable citizenship status is categorical, and has two levels: United States Citizenship and No United States Citizenship.

Dependent Variable

The dependent variable in this study was overall IAT score. The overall IAT score is a continuous variable. The score range for overall IAT score is -2 to 2. The score is presented on a scale of -2 to 2, with a score above .65 indicating a strong link of bias
towards European Americans, and a score below -.65 indicating a strong link of bias towards African Americans.

**Procedures**

The 2015 Race IAT was offered online through Project Implicit, which allowed for any person from anywhere in the world to take it (Project Implicit, 2011). All IAT tests offered online through Project Implicit can be taken at no cost to the participant. The 2015 Race IAT was taken by 1,028,518 individuals from 141 countries. There were thirty-nine demographic questions asked, which included identifying participants’ race, sex, occupation, education status, annual income, country of citizenship, and country of residency. For the purpose of this study, data were utilized from individuals who identify as multiracial. Country of citizenship was utilized over country of residency in order to create a focus on higher education in the United States. By using citizenship status over country of residency, it is more likely that participants would have been born in the United States, or young enough when becoming a citizen of the United States that they have been immersed in the country’s cultural norms. Additionally, the higher education system in the United States is vastly different compared to other countries, so focusing on country of citizenship versus country of residency increases the likelihood that a participant’s only higher education experience has been one in the United States.

Individuals who visit the site voluntarily participate in IATs of their choosing. They can either make an account using their email address, or they can choose the language they speak and take an IAT without making an account. Individuals are asked to select the IAT that they want to take. They are then asked for demographic information, as well as optional questions regarding their attitudes and beliefs about the specific IAT.
they are about to take. These questions are asked for two reasons: a) the IAT results can have more meaning if context around self-understanding of an attitude or stereotype is provided, and b) Project Implicit collects data on differences between people and groups for future potential studies (Project Implicit, 2021).

Participants are then shown a message that explains that their data are secured, and informs participants that Project Implicit uses the same encryptions that banks use to secure information. Participants are then shown a message that says if they are unprepared to encounter interpretations to the IAT that they may find objectionable, that they should not proceed in taking an IAT. Then, participants are provided the contact information for Project Implicit to report any questions, concerns, or problems regarding their participation in an IAT on the Project Implicit website. Finally, participants receive a message that says “I am aware of the possibility of encountering interpretations of my IAT test performance with which I may not agree. Knowing this, I wish to proceed” (Project Implicit, 2021). The words, “I wish to proceed” are hyperlinked, so participants must click that in order to proceed with taking an IAT.

**Data Analysis**

First, the data were screened to examine the relationship between multiracial individuals and implicit anti-Black racial bias. Next, descriptive statistics were used to examine the scores of study participants to inspect for outliers. The descriptive statistics are measures of central tendency and variability. Then, the variables of interest for this study (race, age, education level, citizenship status, and overall IAT score) were transferred from the initial Project Implicit dataset into a new dataset.
Hypothesis testing was based on multiple linear regression, which explains the relationship between multiple independent or predictor variables and one dependent or criterion variable (Osborne, 2016). This study used hierarchical linear multiple regression for hypothesis testing, based upon entering the independent variables into the model using individual blocks. Specifically, two variable blocks were used in this study. Block one included race, citizenship status, education level, and age. Block two included race, citizenship status, education level, age, race*age interaction, race*citizenship status interaction, and race*education level interaction. Multiple regression was chosen as the data analysis method because multiple regression estimated the relationship between race, age, education level, citizenship status, and overall IAT score, and also tested for interaction effects.

Diagnostic information was used to judge overall model performance. This includes: multicollinearity, homoscedasticity, and influential observations. The residuals in a linear regression model quantify the distance each point is from the straight line. Normally distributed residuals have a difference of zero between the predicted data and the observed data (Osborne, 2016). A scatter plot between the outcome variable and the independent variables was made to determine if the assumption of linear relationship was met. A scatterplot of the standardized residuals against the standardized predicted values of the dependent variable was used to test the assumptions of independent errors, homoscedasticity, and linearity (Field, 2013).

Homoscedasticity is when the variance of error terms is the same across all values of the independent variables (Frost, 2019). If the assumption of homoscedasticity is not met, then this causes a problem for the multiple regression model because ordinary least
squares assumption assumes that all residuals are drawn from a population that has a constant variance (Frost, 2019). When the homoscedasticity assumption is met, there is no clear pattern in the distribution on the scatterplot of standardized residuals against standardized predicted values of the dependent variable. Cook’s D was calculated as an estimate of influence. Cook’s D is the estimate of the influence of a data point (Osborne, 2016). For this study, a Cook’s D value of 1 or larger was used to determine if a value was influential. If any values had a Cook’s D value of 1 or larger, these values would have been removed from the multiple linear regression model.

Multicollinearity is when independent variables in a regression model are correlated (Osborne, 2016). If the correlation is high enough, this indicates that changes in one independent variable are associated with shifts in another independent variable. This correlation causes a problem in multiple regression analyses, as it becomes more difficult for the regression model to estimate the relationship between each independent variable and the dependent variable (Frost, 2019). The assumption of no multicollinearity was tested using Variance Inflation Factor (VIF) values for all non-categorical variables. If the VIF value is less than 10, then the assumption of multicollinearity will be met and the multiple linear regression analysis will proceed (Osborne, 2016). A Pearson chi-square test was done to test for independence of cases between the two categorical variables, race and citizenship status. The Pearson chi-square test is applied to sets of categorical data to evaluate how likely it is that any observed difference between the sets arose by chance (Osborne, 2016). It is used to assess goodness of fit, homogeneity, and independence.
In multiple regression, hypothesis testing consists of: test for significance of regression, t-test, and F test. The test for significance of multiple linear regression analysis is tested using ANOVA (analysis of variance), and is used to check if a statistically significant relationship exists between the dependent variable and at least one of the predictor variables (Field, 2013). The t-test is used to check for statistical significance of individual regression coefficients in the multiple linear regression model (Field, 2013). The t-test measures the contribution of a variable while the remaining variables are included in the model. The F-test checks the statistical significance of the regression coefficients in the multiple linear regression model. The F-statistic compares the fit of the multiple regression model. The F-statistic compares the regression model with zero predictor variables with the proposed model to determine if the added coefficients improved the model (Frost, 2019). Adding a variable to the regression model increases the regression sum of squares, and the F-test is based on the increase in the regression sum of squares (Field, 2013).

As previously stated, the independent variables in this study were: race, age, education level, and citizenship status. The variable age is continuous. The variables race and citizenship status are both categorical, which means they have two or more categories, but there is no intrinsic ordering to the categories (Osborne, 2016). The variables race and citizenship status were dummy coded, which means they were coded into dichotomous variables so they could be included in the hierarchical multiple linear regression analysis.
Table 1

Dummy-Coded Variables Race & Citizenship

<table>
<thead>
<tr>
<th>Variable in Original Data Set</th>
<th>Variable DUM 1</th>
<th>% in Each Category</th>
</tr>
</thead>
<tbody>
<tr>
<td>Race</td>
<td></td>
<td></td>
</tr>
<tr>
<td>7 (Multiracial – Black/White)</td>
<td>0</td>
<td>26.2</td>
</tr>
<tr>
<td>8 (Multiracial – Other)</td>
<td>1</td>
<td>73.8</td>
</tr>
<tr>
<td>Citizenship</td>
<td></td>
<td></td>
</tr>
<tr>
<td>1 (United States)</td>
<td>1</td>
<td>82.7</td>
</tr>
<tr>
<td>2 – 239 (Other Countries)</td>
<td>0</td>
<td>17.3</td>
</tr>
</tbody>
</table>

After dummy coding the variables race and citizenship status, frequencies were run to confirm that the dummy coded variables of race and citizenship status had been coded correctly. The dummy coding scheme of zero and one was utilized to show the presence of a categorical effect in the regression equation.

Then, a hierarchical multiple linear regression analysis was run with overall IAT score being the dependent variable, and race, age, education level, and citizenship status serving as the independent variables. Interaction effects were also analyzed to see if citizenship, age, and degree attainment moderated the relationship between multiracial people and implicit anti-Black racial bias. The key statistics used to interpret the hierarchical linear multiple regression analysis were: p-values, regression coefficients (both standardized and unstandardized), residuals, and F-statistic. P-values in multiple
regression test the null hypothesis that the regression coefficient is equal to zero (Osborne, 2016). A regression coefficient is the slope of the linear relationship between the criterion variable and the part of the predictor variable that is independent of all other predictor variables (Frost, 2019). Regression coefficients represent the change in the criterion variable associated with a change of one in the predictor variable when all the other predictor variables are held constant. A p-value of less than .05 indicates that the null hypothesis can be rejected. If the null hypothesis can be rejected, this indicates that the predictor variable is likely to be statistically significant to the regression model because changes in the predictor’s values are related to changes in the response variable (Frost, 2019).

Finally, moderation refers to a change in the relationship between an independent variable and a dependent variable, depending on the level of a third variable, termed the moderator variable (Ho, 2014). In regression analyses, this dependency yields different bivariate regression lines predicting $Y$ from $X$ for different values of the moderator variable, $Z$ (Fairchild & McQuillin, 2010). If the independent variable is categorical, then moderation effect is measured through mean differences, which are plotted on a graph so any differences can be seen (Aiken & West, 1991). If the independent variable is continuous, then its effect is measured through the slope of a regression line. Hypothesis tests and p-values are used to determine if the moderation effect is statistically significant. If the moderation effect is statistically significant, then an interaction plot is made to help interpret the interaction coefficient in the regression equation (Cohen & Cohen, 1983). When moderation effects are statistically significant in a regression model, the main effects cannot be interpreted without taking into account the moderation effects.
In this study, moderation was tested for between race and age, race and education level, and race and citizenship status. All of these statistics were calculated and examined using SPSS statistical software.

**Advantages & Disadvantages**

**Advantages**

One of the advantages of using multiple regression was that it provided the ability to determine the relative influence of the independent variables (race, age, education level, and citizenship status) to the criterion variable (overall race IAT score). Another advantage of using multiple regression was the ability to identify outliers. Finally, utilizing multiple linear regression allowed for potential future studies to expand on this topic, both quantitative and qualitative. The results of this study revealed more about implicit anti-Black racial bias and its relationship to multiracial people. In the future, a qualitative study could be done to gain more contextual information about multiracial individuals and implicit anti-Black racial bias, while another quantitative study could be completed to test different variables or outcomes that are determined by the results of this current study.

**Disadvantages**

One disadvantage in this study was selection bias. Participants chose to take the 2015 Race IAT. There was not a random sampling of who took the 2015 Race IAT. For this study, the groups of interest were unequal in representation. There are more individuals in the Multiracial – Not Black/White group versus the Multiracial – Black/White group. Additionally, there are many more individuals who are United States citizens than those who are not United States citizens. Selection bias is a threat to external
validity, which is the extent to which the findings of a study can be generalized (Shavelson, 1996). The results of this study will not be as applicable to the multiracial population as a whole, especially multiracial people who are not United States citizens.

Another disadvantage in this study was due to the data. Specifically, the data used for this ex post facto study may be considered incomplete by some, as the specific racial breakdown of each individual who identifies as “Multiracial – Other” is not provided for participants. Specific differences between the two multiracial groups cannot be studied further based solely upon specific racial classifications. It is an overall disadvantage for the study because the findings cannot be explored in more depth based on specific racial classifications.

A final disadvantage in this study was its utilization of self-reported data. The use of self-reported data requires the assumption that all participants answered the questions completely and truthfully. Previous research has shown that individuals tend to be more honest in online surveys versus in-person interviews (Dixon et al., 2017; Evans et al., 2003). However, this notion is not a guarantee for each study. Furthermore, it is easier to find false demographic information in an in-person interview setting than an online survey setting. It should be noted that all data is screened by researchers at Project Implicit before being put online in codebooks for free, public use (Project Implicit, 2021). The data is screened by researchers in order to find incomplete entries, as well as falsified entries. Because the IAT takes at least ten minutes to complete, falsified test attempts can be found if the test completion time is severely lower than ten minutes (Project Implicit, 2021). Falsified test attempts can also be found via the demographic questions and
questions about implicit bias that are asked before the IAT begins (Project Implicit, 2021).

**Limitations**

One limitation of this study is that the race IAT says that it measures implicit racial bias, but it actually measures implicit anti-Black racial bias. The title of the race IAT gives the false impression that it examines implicit racial bias in its entirety. However, it only measures implicit racial bias on the Black/White binary, which results in measuring implicit anti-Black racial bias. For the purpose of this study, the 2015 Race IAT assisted in determining levels of implicit anti-Black racial bias in multiracial individuals. However, the study’s results cannot be applied to implicit racial bias as a whole.

Another limitation is that the race IAT provides the most accurate results when participants take it at least three times. In the data set utilized for this study, the majority of participants were taking the IAT for the first time. The scoring for the IAT was updated in 2003 to lessen sensitivity to how many times an individual has taken an IAT. However, the number of times an IAT has been taken still can impact results. After the initial data set was cleaned for the study variables, there were no participants who had taken the IAT more than one time. Thus, this study proceeded utilizing this data where participants had only taken the race IAT one time.

A final limitation of this study is that the multiracial demographics cannot be further investigated due to the way the variables were defined. The multiracial racial categories for the data set were “Multiracial – Black/White” and “Multiracial – Other” (changed to Multiracial – Not Black/White for this study). For participants who selected
“Multiracial – Other” on the 2015 Race IAT, the next question asked for participants to choose the races that make up their multiracial identity. In general, participants got confused on who should answer the question regarding specific racial group designation. For example, participants who did not identify themselves as Multiracial still filled out this question. Additionally, some participants marked themselves as “Other” and then answered the question about specific racial group designation, as opposed to marking themselves as “Multiracial”. When the data from participants who marked themselves as “Other” was inspected, it was found that many mono-racial people marked themselves as “Other”, so the data could not be incorporated in with that of participants who identified themselves as Multiracial. This means that specific racial group differences in implicit anti-Black racial bias were unable to be collected in the data analysis, nor could any potential implicit anti-Black racial bias differences be both differentiated and analyzed in future studies based on specific racial group memberships.

In this study, the participants were 2,104 multiracial individuals. The data were collected via Project Implicit, a non-profit organization and international collaboration between researchers who are interested in implicit social cognition. The data files and codebooks from these IATs are posted on the Project Implicit website for free, public use. The data for this study were collected from the 2015 Race IAT. The independent variables in this study were: race, age, education level, and citizenship status. The dependent variable in this study was overall IAT score. Hierarchical multiple linear regression was used to analyze the data because this method estimated the relationship between race, age, education level, citizenship status, and overall IAT score. There were limitations in this study due to the data and the instrumentation. However, using
hierarchical multiple linear regression provided the ability to determine the relative influence of the independent variables (race, age, education level, and citizenship status) to the criterion variable (overall race IAT score), the ability to identify outliers, and the ability to test for moderation effects.
RESULTS

Descriptive Statistics

The number of participants that met study criteria was 2,104. However, due to 368 participants not answering the questions about age and education level, the total number of participants included in the analysis was 1,736 participants. The means and standard deviations of all variables included in the multiple regression analysis are listed in table two. The mean for overall IAT score is .17 (SD = .47). The IAT is scored on a scale of -2 to 2. A score of .17 indicates a slight link of bias towards European Americans. The mean for race is .74 (SD = .44). The mean of .74 indicates that the majority of the sample is Multiracial – Not Black/White. In this study, Multiracial – Not Black White was dummy coded with the value of 1, while Multiracial – Black/White was dummy coded with the value of 0. The mean for age is 35.02 (SD = 10.64). The mean for citizenship is .84 (SD = .37). The mean of .84 indicates that the majority of the sample is comprised of United States citizens. In this study, United States Citizenship was dummy coded with the value of 1, while No United States Citizenship was dummy coded with the value of 0. The mean for education level is 7.59 (SD = 2.28). The variable of education level was measured on a 14-point scale, with 1 being elementary school, 7 being bachelor’s degree, 13 being other advanced degree, and 14 being an MBA. The mean of 7.59 indicates that the average education level for the sample was a bachelor’s degree. It
should be noted that the average education level in the sample is higher than the national average. There were no outliers found in the data.

**Table 2**

*Means & Standard Deviations of Variables*

<table>
<thead>
<tr>
<th></th>
<th>M</th>
<th>SD</th>
<th>N</th>
</tr>
</thead>
<tbody>
<tr>
<td>Overall IAT Score</td>
<td>.171</td>
<td>.469</td>
<td>1736</td>
</tr>
<tr>
<td>Race</td>
<td>.738</td>
<td>.440</td>
<td>1736</td>
</tr>
<tr>
<td>Age</td>
<td>35.02</td>
<td>10.636</td>
<td>1736</td>
</tr>
<tr>
<td>Citizenship</td>
<td>.840</td>
<td>.366</td>
<td>1736</td>
</tr>
<tr>
<td>Education Level</td>
<td>7.59</td>
<td>2.283</td>
<td>1736</td>
</tr>
</tbody>
</table>

The variables race and overall IAT score were the only variables that had a statistically significant correlation, \((r = .099, p = .001)\). The strength of the relationship is small, and the direction of the relationship is positive. Because the strength of the relationship is small, the positive correlation between race and overall IAT score was not a threat to multicollinearity, so the hierarchical linear multiple regression analysis was able to proceed (Field, 2013).
The means and standard deviations of IAT scores across the categorical variables of race and citizenship status are listed in table three. The mean for overall IAT score for the Multiracial – Black/White group is .63 (SD = .30). The mean for overall IAT score for the Multiracial – Not Black/White group is .65 (SD = .28). The mean for overall IAT score for participants who have United States citizenship is .64 (SD = .29). The mean for overall IAT score for participants who do not have United States Citizenship is .62 (SD = .28). Overall IAT score is measured on a scale of – 2 to 2. A score of .65 or higher indicates a strong link of bias towards European Americans. A score between .35 and .64 indicates a moderate link of bias towards European Americans. It should be noted that the average overall IAT scores for both the Multiracial – Black/White group and the Multiracial – Not Black/White group indicated moderate and strong links of bias towards European Americans.

Table 3
IAT Score Means & Standard Deviations Across Categorical Independent Variable Groups

<table>
<thead>
<tr>
<th>Groups</th>
<th>M</th>
<th>SD</th>
<th>N</th>
</tr>
</thead>
<tbody>
<tr>
<td>Multiracial – B/W</td>
<td>.63</td>
<td>.30</td>
<td>551</td>
</tr>
<tr>
<td>Multiracial – Not B/W</td>
<td>.65</td>
<td>.28</td>
<td>1553</td>
</tr>
<tr>
<td>U.S. Citizenship</td>
<td>.64</td>
<td>.29</td>
<td>1746</td>
</tr>
</tbody>
</table>
No U.S. Citizenship  .62  .28  358

**Multiple Regression Findings**

A hierarchical multiple linear regression analysis was run to see if there are differences in implicit anti-Black racial bias between multiracial people who identify as Black/White and multiracial people who do not identify as Black/White, and to assess the following, three interaction terms: multiracial identity and age, multiracial identity and citizenship status, and multiracial identity and education level. There were two blocks in the hierarchical multiple regression analysis. Block one had the variables race, age, education level, and citizenship status. Block two had the variables race, age, education level, citizenship status, race*age interaction, race*education level interaction, and race*citizenship status interaction.

Linearity was established by visual inspection of a scatterplot and there was no evidence of multicollinearity, as evidenced by no VIF values greater than 10 for all, non-categorical variables. For the categorical variables of race and citizenship status, a Pearson chi-square test was conducted to test for independence of cases. All expected cell frequencies were greater than five. There was not a statistically significant association between race and citizenship status, $\chi^2(1) = .555, p = .456$. Additionally, five unusual points were identified, but none were deemed to need removal. The assumption of homoscedasticity was met, as assessed by visual inspection of the studentized residuals plotted against the predicted values. The assumption of normality was met, as assessed by a Q-Q plot.

Block one was statistically significant, $F(4, 1731) = 5.13, p < .001$, $adj. R^2 = .009$. However, only the variable of race added statistically significantly to the model, $p < .001$. 

Block two was statistically significant, which is where the interaction terms were put into
the model, $F(7, 1728) = 3.17, p = .002$, adj. $R^2 = .009$. As in block one, only the variable
of race added statistically significantly to the model, $p = .04$. There was not a statistically
significant interaction effect for multiraciality and age, $p = .652$. There was not a
statistically significant interaction effect for multiraciality and citizenship status, $p = .543.$
There was not a statistically significant interaction effect for multiraciality and education
level, $p = .316$. The variables in block one were: race, citizenship status, education level,
and age. The variables in block two were: race, citizenship status, education level, age,
race*age interaction, race*citizenship interaction, and race*education level interaction.
The regression equation is: Implicit anti-Black Racial Bias =
\[.05 + .23_{\text{Race}} + .03_{\text{Citizenship}} + 0_{\text{Education Level}} + .001_{\text{Age}} - .001_{\text{Race*Age}} - .04_{\text{Race*Citizenship}} - .01_{\text{Race*Education Level}}\]
This means that the Multiracial – Not Black/White group scored higher on average
on the 2015 Race IAT than the Multiracial – Black/White group. Regression coefficients
and standard errors are listed in Table 4.

\textbf{Table 4}

\textit{Multiple Regression Results for Implicit Anti-Black Racial Bias}
### Implicit Anti-Black Racial Bias

<table>
<thead>
<tr>
<th></th>
<th>B</th>
<th>95% CI for B</th>
<th>SE B</th>
<th>β</th>
<th>R²</th>
<th>ΔR²</th>
<th>F</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Block 1</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Constant</td>
<td>0.175</td>
<td>0.057 - 0.293</td>
<td>0.057</td>
<td>0.293</td>
<td>0.06</td>
<td>0.012</td>
<td>5.127</td>
</tr>
<tr>
<td>Race</td>
<td>0.106*</td>
<td>0.056 - 0.156</td>
<td>0.056</td>
<td>0.156</td>
<td>0.026</td>
<td>0.100*</td>
<td></td>
</tr>
<tr>
<td>Citizenship</td>
<td>-0.004</td>
<td>-0.064 - 0.056</td>
<td>0.056</td>
<td>0.056</td>
<td>0.031</td>
<td>-0.003</td>
<td></td>
</tr>
<tr>
<td>Education Level</td>
<td>-0.009</td>
<td>-0.019 - 0.001</td>
<td>0.001</td>
<td>0.001</td>
<td>0.005</td>
<td>-0.043</td>
<td></td>
</tr>
<tr>
<td>Age</td>
<td>0</td>
<td>-0.002 - 0.002</td>
<td>0.002</td>
<td>0.002</td>
<td>0.001</td>
<td>-0.008</td>
<td></td>
</tr>
<tr>
<td><strong>Block 2</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Constant</td>
<td>0.054</td>
<td>-0.168 - 0.277</td>
<td>0.168</td>
<td>0.277</td>
<td>0.113</td>
<td>0.013</td>
<td>3.173</td>
</tr>
<tr>
<td>Race</td>
<td>0.229*</td>
<td>0.01 - 0.448</td>
<td>0.152</td>
<td>0.448</td>
<td>0.111</td>
<td>0.215*</td>
<td></td>
</tr>
<tr>
<td>Citizenship</td>
<td>0.029</td>
<td>-0.094 - 0.152</td>
<td>0.094</td>
<td>0.152</td>
<td>0.023</td>
<td>0.023</td>
<td></td>
</tr>
<tr>
<td>Education Level</td>
<td>0</td>
<td>-0.02 - 0.019</td>
<td>0.019</td>
<td>0.019</td>
<td>0.002</td>
<td>-0.002</td>
<td></td>
</tr>
<tr>
<td>Age</td>
<td>0.001</td>
<td>-0.004 - 0.005</td>
<td>0.004</td>
<td>0.005</td>
<td>0.002</td>
<td>0.012</td>
<td></td>
</tr>
<tr>
<td>Race*Citizenship</td>
<td>-0.044</td>
<td>-0.185 - 0.097</td>
<td>0.185</td>
<td>0.097</td>
<td>0.072</td>
<td>-0.045</td>
<td></td>
</tr>
<tr>
<td>Race*Education Level</td>
<td>-0.011</td>
<td>-0.034 - 0.011</td>
<td>0.034</td>
<td>0.011</td>
<td>0.011</td>
<td>-0.095</td>
<td></td>
</tr>
<tr>
<td>Race*Age</td>
<td>-0.001</td>
<td>-0.006 - 0.004</td>
<td>0.006</td>
<td>0.004</td>
<td>0.003</td>
<td>-0.023</td>
<td></td>
</tr>
</tbody>
</table>

**Note.** Model = “Enter” method in SPSS Statistics; B = unstandardized regression coefficient; CI = confidence interval; LL = lower limit; UL = upper limit; SE B = standard error of the coefficient; β = standardized coefficient; R² = coefficient of determination; ΔR² = adjusted R²; F = F-statistic. *p < .05, **p < .01.
DISCUSSION

Key Findings

The purpose of this study was to determine if there are implicit anti-Black racial bias differences between multiracial people who identify as Black/White and multiracial people who do not identify as Black/White, accounting for age, citizenship status, and education level. The results of this study suggest that multiracial people who do not identify as Black/White have more implicit anti-Black racial bias than multiracial people who do identify as Black/White. Additionally, age, citizenship status, and education level were all found to not moderate the relationship between multiracial identity and implicit anti-Black racial bias.

Hypothesis One

Contrary to hypothesis one, multiracial people who do not identify as Black/White had more implicit anti-Black racial bias than multiracial people who do identify as Black/White. It should be noted that in this study, 26% of the sample identified as Multiracial – Black/White. It should also be noted that the average overall IAT scores of both the Multiracial – Black/White group and the Multiracial – Not Black/White group indicated moderate to strong links of bias towards European Americans.
The fact that both groups of multiracial individuals showed implicit biases towards Whiteness is not surprising. Multiracial children who have a White parent have been found to have a bias towards White individuals (Neto & Paiva, 1998). In the United States, White supremacy is embedded into society (Kendi, 2019). The United States was built on systemic racism, which interweaves itself explicitly and implicitly into society (Edwards, 2017). Because Whiteness and its values are viewed as the top tier to aspire to in the United States, People of Color are taught from a young age to attempt to gain a close proximity to Whiteness (Brunsma, 2005). This desire to be associated with Whiteness is why many multiracial individuals who have a White parent were told to identify as White, even if their phenotype would not typically be associated with Whiteness (Bonilla-Silva & Glover, 2004). Additionally, the desire to be associated with Whiteness is also why many People of Color, multiracial individuals included, have reported being told by their parents not to associate with Black people, as Black people are viewed as being at the bottom of the racial hierarchy in the United States (Campion, 2019). This desire to be associated with Whiteness also fuels horizontal hostility between People of Color from different racial groups (White & Langer, 1999). The systemic racism embedded in the United States created a competition between People of Color of which race is closest to Whiteness and in turn, its superiority (Kendi, 2019). Furthermore, the desire to be associated with Whiteness also helps internalized racism to permeate in People of Color, including multiracial individuals (David et al., 2019). Thus, the results of this study need to be framed in the context of systemic racism and White supremacy so that this shared bias towards Whiteness by both multiracial groups can be completely understood.
One reason that multiracial people who do not identify as Black/White had a higher level of bias towards European Americans could be family influence. Per Renn (2008) and Stepney et al. (2015), multiracial individuals’ ethnic and racial perceptions are impacted by the influence of family and loved ones. As previously stated, the United States has a racial hierarchy imbedded in its society, where Black individuals are placed at the lowest level (Bonilla-Silva & Glover, 2004). Also, horizontal racial oppression results in People of Color discriminating against one another and imitating the behaviors embedded in White supremacy. Because Black individuals are viewed as being at the bottom of the racial hierarchy, other People of Color racial groups can be prejudiced against them and thus have higher levels of implicit anti-Black racial bias. Similarly, the concept of colorism could also impact the level of implicit anti-Black racial bias belonging to a multiracial individual who does not identify as Black/White. Individuals who have an implicit bias towards White people have been found to rate individuals with darker skin more negatively than individuals with lighter skin (Reed, 2017). This negativity includes thinking that people with darker skin are less successful, less wealthy, and more likely to be criminals when compared to their lighter skinned peers (Wilkerson, 2020). Because White individuals almost always have lighter skin than Black individuals, colorism could contribute to implicit anti-Black racial bias. A contributing factor to this finding could also be lack of exposure to a multiracial community (Renn, 2008). If multiracial individuals have not been exposed to others like them, then they are more likely to utilize racial binaries and aspects of monoracism when judging others (Johnston-Guerrero et al., 2020).
Furthermore, multiracial individuals can experience internalized racial oppression due to external output about their racial identification (Williams, 2013). For example, if a multiracial individual identifies with a certain race, but people in their everyday lives contradict their identification, this could result in internalized feelings of racism towards the particular race that people say is the multiracial individual’s “real” identification (Pyke, 2010). Also, multiracial individuals who do not identify as Black/White may have experienced discrimination from other multiracial people or People of Color, which in turn causes them to discriminate against others, especially if the discrimination negatively impacts a multiracial individual’s self-esteem (Roberson & Pieterse, 2021). Multiracial people have reported expecting racism from White individuals, but being surprised by prejudice and discrimination from People of Color and other multiracial people (Root, 1996). If a multiracial person who does not identify as Black/White has felt discriminated against by a Black individual, this could allow implicit anti-Black racial bias to grow inside of them.

Another reason that multiracial individuals who do not identify as Black/White have more implicit anti-Black racial bias than multiracial individuals who do identify as Black/White could be that some multiracial individuals who have a White parent were raised with the concept of racial neutrality. Multiracial people who have a White parent have reported the concept of racial neutrality being heavily present in their lives and also having a large impact on their personal identification (Bonilla-Silva & Glover, 2004). Specifically, multiracial individuals who identified as White and Asian or White and Latinx reported more use of racial neutrality in their upbringing than other multiracial groups. While racial neutrality is generally viewed as a positive entity in United States’
society, it actually is a form of racism called colorblindness (Kendi, 2019). Colorblindness claims to remove race from being used as a characteristic to judge others, but studies have shown that individuals who claim to subscribe to this ideology still exhibit racist behavior, especially against Black individuals (Bruster et al., 2019).

Additionally, if a multiracial individual identifies as White, then they may be moving through one of the White identity models. For example, if a White multiracial individual is in the reintegration state of Helms’ White identity development model, then they may have regressed back into racist behavior like blaming BIPOC individuals for their problems, or having a strong conviction for White supremacist ideals (Helms, 1990).

Also, a White multiracial individual could be experiencing dominative attitudes while going through the stages of White racial consciousness (Rowe et al., 1995). Dominative attitudes are ethnocentric and pro-White, so it would make sense for a White multiracial individual to exhibit more implicit anti-Black racial bias at this time. Even if a White multiracial individual explicitly states that they prefer Black people to White people, implicitly they could still have a bias towards White people and be unaware of its existence. When White individuals rated the friendliness of Black and White individuals in a study, they rated the Black people as appearing friendlier. However, when EMG facial activity was measured, it was found that the White individuals had an implicit bias towards the White individuals (Vanman et al., 1997).

If a multiracial individual identifies as Black but not Black/White, which cannot be known due to the missing racial classification data in this study, then they could have high levels of internalized racism, which creates a higher level of implicit anti-Black racial bias. Previous studies have shown that individuals who have experienced high
levels of racism in their lives also have higher levels of internalized racism (David & Okazaki, 2010). Experiences of implicit racism and microaggressions are also correlated with higher levels of internalized racism (Kerwin et al., 1993). For example, a multiracial person may internalize being told that they do not “look mixed” if they do not fit the specific phenotype that is associated with multiracial individuals (Sims, 2012). If a Black multiracial individual internalizes the stereotypes and prejudices that White supremacy projects about Black people, then they may also start to emulate their White oppressors (Padilla, 2001). Black multiracial people are at higher risk of internalized racism if they were raised to not have a high level of pride in their Black heritage. Previous studies have shown that People of Color individuals with low levels of pride in their racial heritage were more susceptible to experiences of internalized racism (Hipolito-Delgado, 2016).

Moreover, internalized racism has been found to have a positive correlation with implicit White bias, such that as internalized racism levels increase, so does implicit bias towards White people (Molina & James, 2016). Thus, it is entirely possible that a Black multiracial individual who suffers from internalized racism could have a strong implicit bias in favor of White people, which would increase their implicit anti-Black racial bias level. Finally, respectability politics can also impact implicit anti-Black racial bias in Black multiracial individuals. Respectability politics utilize respectability narratives from the White majority and instruct Black people on how to adhere to them in order to appear in a positive light to the White majority. Respectability politics can result in Black individuals separating themselves entirely from Black people and Black culture in hopes that they will now be viewed favorably to White people and will be excluded from stereotypes and racism perpetuated against the Black community (White et al., 2006). If a
Black multiracial individual uses respectability politics to distinguish themselves as “better” than their Black counterparts, this can lead to them believing that they actually are superior to Black people, which can result in higher levels of implicit anti-Black racial bias.

**Hypothesis Two**

Previous research on age and implicit anti-Black racial bias states that older individuals tend to have higher levels of implicit anti-Black racial biases when compared to their younger counterparts (Henry et al., 2009). Previous research on age and implicit bias has also found that older individuals have less control over their thoughts than their younger peers, thus concluding that senior citizens may not have more implicit racial biases, but in fact have a more difficult time not stating racist or prejudice statements (Stewart et al., 2009). However, in this study, age did not moderate the relationship between multiraciality and implicit anti-Black racial bias. It should be noted that in this study, over half of the participants in the sample were age 35 or younger.

One reason for this finding could be that the way race has been talked about in United States context has changed. Race was explicitly a topic in the United States in the 1950s and 1960s, which would have been formative years for individuals in the Baby Boomer generation, as the oldest baby boomer was born in 1946. The Baby Boomer generation and their parents saw a myriad of racial changes with the passing of the Civil Rights Act in 1964. They also saw People of Color continue to fight for equitable rights in the 1970s, and saw racial tensions boil over again in the 1980s and 1990s.

In previous studies, older individuals who are United States citizens have reported being taught to not use racial epithets and to treat people with different skin colors
equally (Evans et al., 2003). These older individuals then taught their children to be colorblind, and to essentially ignore racial differences (Edwards, 2017). The problem with this ideology was that racism still persisted in the United States, and utilizing colorblindness resulted in problems of racial inequity and racial oppression being ignored. In the present day, the children and grandchildren of older individuals have begun to explicitly talk about race, implicit bias, anti-Blackness, racism, and systemic racism (Kendi, 2019). As a result, older individuals could also be changing how they talk about race. If older individuals choose to talk about race more directly, and move away from the colorblind ideology, then these changes could potentially impact their implicit racial biases.

*Hypothesis Three*

As predicted, citizenship status did not moderate the relationship between multiraciality and implicit anti-Black racial bias. It should be noted that in this study, 83% of participants were citizens of the United States. The next highest amount of citizenship to a country was Canada, where 77 participants stated they hold Canadian citizenship. After Canada, the highest amount of citizenship to a country was the United Kingdom, where 38 participants stated they hold British citizenship.

Previous research on citizenship and implicit racial bias found that explicit hardship and tragic events can increase implicit racial bias. Specifically, citizens of a country are more likely to have negative implicit biases about People of Color and immigrants when they are struggling, or when a terrorist attack or other negative event occurs in their country (Vautier, 2009). For example, if a country’s economy is facing a recession, its citizens are more likely to blame immigrants, who are often People of Color
(Vautier, 2009). This was especially prevalent if a country’s citizens saw immigrants to the country working in career fields that they felt they should have access to, thus perpetuating the idea that immigrants were stealing jobs from citizens. Interestingly, in 2015, the United States saw the most deaths by Islamic terrorism since 2001 (Swanson, 2015). Additionally, one million migrants entered Europe, with half of them coming from Syria (Swanson, 2015). However, despite these events, citizenship status still did not have an impact on implicit anti-Black racial bias.

One reason for citizenship status not having an impact on implicit anti-Black racial bias could be that race and implicit racial bias do not vastly differ in how they exist in the westernized countries of the United States, Canada, and the United Kingdom. As previously stated, racism is embedded into society in the United States (Franco, 2019). The United States exists due to the systemic genocide of Indigenous individuals, and then was able to succeed as a country because White individuals enslaved Black individuals to utilize for labor (Ferber, 2004). Throughout its history, People of Color have been systematically oppressed in the United States. While Canada and the United Kingdom try to tout better situations for People of Color than in the United States, in practice, all three of these countries have issues related to systemic racism and racial inequity (Dua et al., 2005; Hackett et al., 2020).

For example, Canada has an extensive history of indigenous colonization, White settlement policies, settlement of People of Color through racialized immigration policies, participation in free-trade regimes, and participation in British and United States imperialist agendas (Dua et al., 2005). Similarly, the United Kingdom has an extensive history of colonizing other countries and committing mass genocide in order to become
one of the world’s superpowers (Keith & Monroe, 2016). Additionally, in a 2017 survey, over a quarter of British citizens stated that they were racially prejudiced (Hackett et al., 2020). For multiracial individuals specifically who are citizens of the United Kingdom, they described similar issues to moving through British society as multiracial individuals who are United States citizens (Aspinall, 2003). While the racial demographics vary in all three of these countries, there are a myriad of similarities in the way racism presents itself in all of them. Due to the fact that racism exists similarly in the United States, Canada, and the United Kingdom, it is likely that implicit racial bias may also present itself similarly in all three countries.

Hypothesis Four

Contrary to the hypothesis, education level did not moderate the relationship between multiraciality and implicit anti-Black racial bias. It should be noted that in this study, over half of the participants had a college degree. Previous research on education level and implicit anti-Black racial bias has found that individuals who have attended a higher education institution tend to have lower levels of implicit anti-Black racial bias than their peers who did not attend a higher education institution (Bruster et al., 2019; Hipolito-Delgado, 2016). Researchers have found that individuals experience a variety of cultures and people who are different from them when they attend college, as well as obtain more cultural competence and knowledge.

One reason for this result could be that cultural knowledge was inherited by multiracial individuals without a college degree through family members and loved ones who did attend college. A 2018 study found that 45% of students enrolled at four-year universities in the United States had parents who had college degrees (NCES, 2018). The
enrolled students whose parents had not attended college still knew individuals who had obtained college degrees. Thus, it is possible that the loved ones of multiracial individuals are increasing their cultural competencies, racial knowledge, and passing it along to their loved ones.

Another reason for this result could be that multiracial individuals are learning positive ways to decrease implicit anti-Black racial biases in their everyday lives without going to college. Education and resources about implicit racial bias are much more readily available than in previous decades (Evans et al., 2003). Outside of books, which can be free at a local library, the internet supplies many free, genuinely helpful resources about implicit racial bias (Project Implicit, 2021). Information that used to be exclusively available at a higher education institution is becoming more mainstream and available to people who either cannot afford to attend college or do not need nor want to attend college.

Additionally, multiracial individuals may also be expanding their own support networks across racial lines. While the population of multiracial individuals in the United States has greatly increased, so has the occurrences of cross-racial relations (Pew Research Center, 2015). Multiracial individuals may be meeting people of different cultural and racial backgrounds at work or through social activities. Peer culture is powerful, and has been cited as a significant influence for multiracial individuals (Renn, 2000; Renn, 2008). Specifically, if multiracial individuals believe that their peer network is supportive of their identities, then they feel more accepted and are more willing to maintain these relationships (Renn, 2000; Renn 2008). Especially as the context of how race is discussed in the United States has lost some of the colorblind ideology, multiracial
individuals may feel more confident talking about race and implicit anti-Black racial bias with individuals who hold a different racial identification from them because these individuals support their multiracial identities and accept their own, individual identifications.

**Implications**

One of the implications of this study is that multiracial people who do not identify as Black/White may be more susceptible to implicit anti-Black racial bias when compared to their multiracial Black/White peers. Being more susceptible to implicit anti-Black racial bias could include utilizing colorism to make racial judgements. Being more susceptible to implicit anti-Black racial bias could also include perpetuating horizontal racial oppression. Being more susceptible to implicit anti-Black racial bias could also include being more sensitive to stereotypes, internalizing said stereotypes, and projecting them on other People of Color (Shih et al., 2007). For Black multiracial individuals, this could include higher levels of internalized racism, and utilization of respectability politics to appear more favorably to White people. This implication matters because multiracial people who do not identify as Black/White may need increased support in navigating implicit racial biases, implicit anti-Black racial bias, colorism, internalized racism, and horizontal racial oppression.

As previously stated, multiracial student initiatives were organized and implemented at higher education institutions in the United States by multiracial students because their needs were not being met (Malaney & Danowski, 2015). While more colleges and universities are including multiracial students in their diversity and inclusion efforts, their feelings and experiences are still often clumped together, which gives the

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messaging that multiracial individuals all have a common experience (Johnston-Guerrero et al., 2020). The implication that multiracial people who do not identify as Black/White may be more susceptible to implicit anti-Black racial bias when compared to their multiracial Black/White peers contradicts the notion of shared multiracial experience, and illustrates the need for more individualized attention and support for multiracial students based on their specific racial identifications, as opposed to assuming commonality based on identifying as more than one race.

A second implication of this study is that racial identification may have a larger impact on implicit anti-Black racial bias than initially believed. Previous research on age, citizenship status, and education level have found all of these entities to have a relationship with implicit racial bias and implicit anti-Black racial bias. However, for multiracial individuals, these factors did not have a significant impact on their levels of implicit anti-Black racial bias. This implication matters because the majority of research on implicit racial bias and implicit anti-Black racial bias has been done on mono-racial individuals (Edwards & Pedrotti, 2008). This implication suggests that implicit anti-Black racial bias may manifest in different ways for multiracial individuals versus mono-racial individuals.

Additionally, strategies on how to decrease implicit racial bias and implicit anti-Black racial bias have generally revolved around exposure to different individuals from different racial groups and cultural backgrounds, as well as obtaining knowledge about different racial groups (Lane et al., 2007). However, for multiracial individuals specifically, the implication that multiracial people who do not identify as Black/White may be more susceptible to implicit anti-Black racial bias when compared to their
multiracial Black/White peers provides a new insight into what impacts their implicit anti-Black racial bias. If racial identification has a significant impact on implicit anti-Black racial bias, then resources around racial identification and phenomena that are impacted by racial identification may be more important to focus on for multiracial individuals to lower levels of implicit anti-Black racial bias, as opposed to cultural exposure strategies utilized for mono-racial individuals.

**Limitations**

One limitation of this study is that the specific racial identifications of the multiracial individuals who do not identify as Black/White are not known. As previously stated, participants who took the 2015 Race IAT incorrectly filled out the question that would have provided the racial identifications of individuals who said they were Multiracial – Other. Specifically, mono-racial individuals and White individuals wrote in both racial and ethnic identifications for the question that asked multiracial individuals to list all of the racial groups for which they held membership. Because mono-racial individuals and White individuals filled out this question, it could not be used to determine racial demographics of the multiracial individuals who did not identify as Black/White. This lack of racial demographic information means that it cannot be determined if certain multiracial individuals had higher levels of implicit anti-Black racial bias than other multiracial individuals. If it could be determined if certain multiracial individuals had higher levels of implicit anti-Black racial bias than other multiracial individuals, then specific initiatives and support services based on individual racial identifications could be created to help decrease implicit anti-Black racial bias.
Additionally, the missing racial demographic information could have provided more context for why the multiracial individuals who do not identify as Black/White had more implicit anti-Black racial bias than the multiracial individuals who do identify as Black/White. For example, if it was determined that White multiracial people had the most implicit anti-Black racial bias, then education and support on White identity development and factors that impact it could be created to assist this population. If multiracial people who do not identify as White nor Black were determined to have the most implicit anti-Black racial bias, then resources and education on horizontal racial oppression, internalized racism, and anti-Blackness could be created to assist in healthy identity development. If Black but not White multiracial people had the most implicit anti-Black racial bias, then initiatives could be created that focus on internalized racism, respectability politics, colorism, and Black identity development to assist this population with overcoming their implicit racial biases. However, without the specific racial demographic information, the context needed to create individualized racial support strategies is not present.

A second limitation of this study is that the results are not generalizable to the overall population of multiracial individuals. This is due to the missing racial identification information and uneven sample demographics. This study utilized secondary data, which resulted in unequal comparison groups for data analysis. As previously stated, 74% of the sample for this study identified as multiracial individuals who do not identify as Black/White. Additionally, over half of the participants were between the ages of 24 to 35. Over half of the participants had a college degree, and 83% of the participants held United States citizenship. Because of the unequal sample
demographics in this study, it cannot be said if age, citizenship status, and education level do not have an impact on implicit anti-Black racial bias. While these factors did not moderate the relationship between multiraciality and implicit anti-Black racial bias in this study, it cannot be said that these factors never have an impact on implicit anti-Black racial bias.

**Recommendations**

**Research Recommendations**

One research recommendation is to replicate this study in the future with equal comparison groups in the sample, as well as where the specific racial demographic identifications of the multiracial participants are documented. Instead of having all participants who take a race IAT have access to the specific racial demographic question, participants could first be asked a question asking if they identify as multiracial. If a participant clicks, “Yes”, then a follow-up question can be populated that then asks for the participant to list all of the racial groups for which they hold membership. Because the race IAT is taken on a computer, it would be fairly simple to set up the coding for the questions so that confusion is avoided in the future. Another option would be to request assistance from the researchers at Project Implicit with creating a race IAT study that specifically focuses on multiracial individuals. This would allow the researcher to have more control over the amount of individuals who fit other categories, such as minimum age of 24, education level, and citizenship status. Instead of being subject to secondary data, this replicated study would only be open to multiracial individuals. By creating a study only with the variables of interest, the researchers would have increased likelihood of sample demographics that would be closer to equal than the present study.
Another research recommendation is to conduct a mixed-methods study about multiraciality and implicit anti-Black racial bias. Participants could take the race IAT to measure their implicit anti-Black racial bias. Then, the participants could be interviewed to gain more context as to why a certain multiracial individual may have a specific level of implicit anti-Black racial bias. For example, if a multiracial individual who does not identify as Black nor White was found to have a high level of implicit anti-Black racial bias, it could be helpful to ask them about their upbringing, familial influence, external influences, and about their own multiracial identity development. The qualitative narratives of multiracial individuals about implicit anti-Black racial bias could illustrate some reasons for why a certain multiracial individual has implicit anti-Black racial bias, and thus lead to prevention strategies and support resources for overcoming said bias. This qualitative piece would be especially important because factors not included in this study could be mentioned as being factors or phenomena that have impacted a multiracial individual’s implicit anti-Black racial bias.

A final recommendation for future research is to replicate this current study with equal comparison groups, but change the independent variables to: multiracial identity, education level, and geographic location in the United States. In this current study, citizenship status was found to not moderate the relationship between multiracial identity and implicit anti-Black racial bias. Requiring participants to be multiracial individuals who are citizens of the United States could lead to new findings that this study was not able to obtain due to its limitations. Additionally, including geographic location as an independent variable could be valuable because race education and socialization vary based on where an individual was raised or spent most of their time during formative
years (Hackett et al., 2020). For example, in the United States, the southern region of the country is stereotyped as having more explicit racism than the northern region (Franco, 2019). However, when implicit racism was measured in both regions of the country, the northern region of the United States scored similarly to the southern region (Evans et al., 2003). Thus, this finding of no significant differences in implicit racial bias could mean that racism and anti-Black racial bias manifest differently based on geographic location. The possibility that geographic location in the United States impacts racism, implicit racial bias, and implicit anti-Black racial bias means that geographic location should be included in future analyses.

**Practical Recommendations**

One practical recommendation is to create specific initiatives for multiracial students at colleges and universities in the United States. One initiative would be specifically about implicit racial bias and implicit anti-Black racial bias. There should be different education tracks based on specific racial identification so individuals who share an identification can learn together, and feel comfortable learning without the judgment of others who do not share their racial identification. If there are enough students involved, then the educational tracks can be broken down by specific racial identification groups. Otherwise, three proposed educational tracks would be: Multiracial – White, Multiracial – Black, and Multiracial – NBPOC (Non-Black, People of Color). Educational topics for this initiative would include: internalized racism, horizontal racial oppression, colorism, respectability politics, implicit racial bias, implicit anti-Black racial bias, and monoracism. Students could then decide which group they want to learn in based on their self-racial identification. The administrators who serve as the facilitators
for each group should facilitate for the group for which they share identification. This commonality of identification allows comfort and community in educational and competency development. An initiative like this would also allow new factors and issues that impact implicit anti-Black racial bias to be discovered, which in turn would allow higher education administrators to revise and improve future initiatives.

Another practical recommendation is to expand multiracial educational initiatives beyond the Black/White binary. Also, Whiteness should stop being centered in multiracial identity. As previously stated, most early research on multiracial identity development assumed that multiracial individuals were the product of one Black parent and one White parent (Deters, 1997; Poston, 1990; Root, 1998). Even after the presence of multiracial People of Color became more prominent, there was still an assumption that if someone was multiracial, that they were the product of a White parent and a Black parent (Gines, 2013). Besides the fact that assuming an individual’s race is wrong, the historical problem in the United States of assuming “mixed race” means Black and White is both harmful and inaccurate (Teo, 2004). In the present day, there is still an assumption that a multiracial individual is the product of a White parent and Person of Color parent (Renn 2004; Renn 2008). As racial demographics continue to change and more people identify as multiracial in the United States, more interracial relationships are happening between People of Color, and the Black/White binary method of thinking about race is being challenged (Dalmage, 2004). In older multiracial identity resources, the concepts of privilege, White privilege, and White identity development are consistently present (Harris, 2016; Johnston & Nadal, 2010). However, these concepts are not entirely relevant to all multiracial experiences, and for multiracial People of Color, including
resources for White individuals can feel repetitive and as if their learning and identity development cannot happen without the presence of Whiteness (Rondilla et al., 2017).

While ideally any multiracial initiatives or resource centers would have multiracial facilitators and administrators, it is unlikely that this would be the case for each resource center and initiative. Furthermore, individuals, especially college students, tend to seek out assistance from individuals with whom they have already built rapport (Johnston-Guerrero et al., 2020). Because multiracial college students may ask for support from mono-racial individuals, it is imperative that higher education practitioners be properly trained to work with multiracial students. One of the main issues that multiracial students say that they experience on college campuses is not having administrators and professors who try to understand their experiences (Ozaki et al., 2008). Thus, a negative experience due to monoracism can stop a student from engaging in healthy identity discernment and development (Renn, 2008). This proper training, cultural competency, and expertise need to expand to counselors at university counseling centers, too. Multiracial college students benefit from mental health support, especially as they go through their identity development process (Narvaez et al., 2021). Thus, multiracial college students require culturally competent and socially aware counselors who are aware of the unique challenges they face navigating the world moving through more than one racial group (Hud-Aleem & Countryman, 2008). Multiracial college students need to know that there is space for them on campuses where they can safely and positively develop their identities, and that there are administrators and faculty on campus who can proficiently assist them in these endeavors.
A final practical recommendation is to create a multiracial student resource guide for the parents and guardians of multiracial college students. As the multiracial population grows in the United States, multiracial individuals are also one of the fastest growing populations to attend higher education institutions (NCES, 2021). While the parents and guardians of multiracial children can be multiracial themselves, a majority of multiracial individuals are still the product of two mono-racial parents (United States Census Bureau, 2021). Because mono-racial and multiracial individuals have different lived experiences, it is important for the parents and guardians of multiracial college students to be aware of the identity discernment, identity development, and other factors that may impact their child. Being aware of what their multiracial college students are experiencing is especially important because multiracial individuals tend to look to their parents when choosing their racial self-identifications (Talbot, 2008). Previous research on multiracial college students has found that parental and familial influence greatly impact multiracial students’ experiences with race, how they talk about race, their cultural competencies, their explicit racial biases, and their implicit racial biases (Ingram et al., 2014; Johnston Guerrero et al., 2020; Renn, 2004; Renn, 2008).

Because familial influence can be such a large factor in multiracial students’ lives, it is important that they receive support from their parents and guardians in their identity development and implicit racial bias awareness and reduction (Johnston-Guerrero & Pecero, 2016). Sometimes when students attend college, they can feel disconnected from their parents or families because the knowledge that they are obtaining may contradict or misalign with what they learned at home. The disconnection from parents and families that multiracial students feel can be especially true for first-generation college students.
(NCES, 2018). In order to combat a divide or lack of support from mono-racial parents or loved ones, parents and guardians should be provided with a multiracial student resource guide. A multiracial student resource guide would allow parents and guardians to obtain a better understanding of their multiracial student’s experiences and potential times of struggle. By acknowledging that their racial experiences differ from their children, mono-racial parents and guardians can show support for their multiracial student’s growth, even if they cannot directly relate to certain experiences or phenomena.
CONCLUSION

This research study was conducted to determine whether there are differences in implicit anti-Black racial bias between multiracial individuals who identify as Black/White, and multiracial individuals who do not identify as Black/White, accounting for age, education level, and citizenship status. It was hypothesized that there would be statistically significant differences in implicit anti-Black racial bias between multiracial people, such that multiracial people who do not identify as Black/White would have more implicit anti-Black racial bias than multiracial people who do identify as Black/White. It was also hypothesized that age and education level would moderate the relationship between multiracial identity and implicit anti-Black racial bias, while citizenship status would not moderate the relationship between multiracial identity and implicit anti-Black racial bias.

The results of a hierarchical linear multiple regression analysis with a test for interaction effects illustrated that there is a statistically significant difference in implicit anti-Black racial bias between multiracial individuals who identify as Black/White and multiracial individuals who do not identify as Black/White, such that multiracial individuals who do not identify as Black/White have more implicit anti-Black racial bias than multiracial individuals who do identify as Black/White. The independent variables of age, education level, and citizenship status were all found not to be statistically
significant in the regression model. Additionally, it was determined that the variables of age, education level, and citizenship status do not moderate the relationship between multiracial identity and implicit anti-Black racial bias.

This study begins to fill in a gap in existing literature, as little research has been done that examines the implicit racial bias and implicit anti-Black racial bias of multiracial individuals. The results of this study illustrate the importance of support for multiracial individuals (especially for multiracial people who do not identify as Black/White) in navigating implicit racial biases, implicit anti-Black racial bias, colorism, internalized racism, and horizontal racial oppression. Additionally, the results of this study contradict the idea of a “shared” multiracial experience that exists in previous research. The results of this study imply that there is a need for more individualized attention and support for multiracial students based on their specific racial identifications.

Furthermore, this study’s findings also differ from previous research on implicit racial bias and mono-racial individuals. Generally, strategies utilized to decrease implicit racial bias and implicit anti-Black racial bias have revolved around exposure to different races and cultural backgrounds, as well as gaining competence about other cultures. However, the results from this study highlight that specific racial identification may have a larger impact on implicit anti-Black racial bias than previously believed. If racial identification has a large impact on implicit anti-Black racial bias, then implicit anti-Black racial bias may manifest in different ways for multiracial and mono-racial individuals, which also means that different strategies need to be implemented when
assisting multiracial individuals in decreasing their own levels of implicit anti-Black racial bias.

However, it should be noted that there were a few limitations to this study. First, the race IAT claims to measure implicit racial bias, but in actuality, it measures implicit anti-Black racial bias. This is because the race IAT measures racial bias on the Black/White binary by having individuals rate the faces of European Americans and African Americans. Thus, this study’s results will not apply to implicit racial bias as a whole. Additionally, the race IAT provides the most accurate results when participants take it at least three times. While the scoring for the race IAT was updated in 2003 to account for this issue, the number of times the IAT is taken can still impact race IAT results. In this study, all of the participants were taking the race IAT for the first time, so accuracy in results may not be as strong as if participants had taken it at least three times.

A third study limitation is that the specific racial identifications of the multiracial individuals who do not identify as Black/White are not known. Because mono-racial and White individuals filled out a question that was specifically for multiracial individuals to document their specific racial identifications, it cannot be determined if certain multiracial individuals had higher levels of implicit anti-Black racial bias than other multiracial individuals. This missing racial identification information means that specific context cannot be determined as to why multiracial individuals who do not identify as Black/White had more implicit anti-Black racial bias than multiracial individuals who do identify as Black/White. This lack of racial categorization data also means that initiatives for assisting multiracial individuals with lowering their own levels of implicit anti-Black racial bias cannot be created based on specific racial identification.
Another limitation of this study is selection bias, which is a threat to external validity. This threat to external validity means that the results of this study are not generalizable to the overall population of multiracial individuals. This study utilized secondary data from participants who chose to take the 2015 Race IAT. Random sampling was not used for participants who took the 2015 Race IAT, which resulted in unequal comparison groups for the data analysis in this study. A final limitation of this study is the utilization of self-reported data. The use of self-reported data requires the assumption that all participants answered all questions completely and honestly. However, there is not a way to guarantee that participants did so, especially in an online survey setting.

Due to the results of this study, it is recommended that this study be replicated in the future with equal comparison groups in the sample study, as well as where the specific racial demographic identifications of the multiracial participants are documented. Instead of utilizing secondary data, this study would be open to only multiracial individuals. By creating a study with only the variables of interest, the researchers would increase the likelihood of more equal sample demographics than what was represented in this study. Another future research recommendation is to conduct a mixed-methods study about multiraciality and implicit anti-Black racial bias. Participants could take the race IAT to measure implicit anti-Black racial bias, and then be interviewed about their individual level of implicit anti-Black racial bias in order to gain more context as to why one multiracial individual may have more implicit anti-Black racial bias than another one with different racial identifications. A final future research recommendation would be to replicate the current study, but center the study on multiracial individuals in the United States.
States, and then include geographic location as an independent variable. Education is shown to vary based on geographic location, so it is probable that where someone grows up or spends most of their formative years can impact implicit racial bias and implicit anti-Black racial bias.

In reference to recommendations for practice, specific initiatives should be created for multiracial college students at higher education institutions in the United States. There should be different educational tracks based on specific racial identification so that individuals who share an identity can learn together, and not feel as though they are being judged by individuals who do not share their racial identification. These educational tracks should cover topics such as: internalized racism, horizontal racial oppression, colorism, respectability politics, implicit racial bias, implicit anti-Black racial bias, and monoracism. Another practical recommendation is to expand multiracial educational initiatives beyond the Black/White binary, and to stop centering Whiteness in multiracial identity. Previous educational initiatives on multiracial identity had a heavy focus on White privilege and White identity development. However, not every multiracial person identifies as White, and as more interracial relationships are happening among People of Color, it is important to update the resources to best represent the current demographics.

Furthermore, mono-racial higher education practitioners need to be trained on assisting multiracial students with their identity development. College students seek out support from individuals that they have a rapport with, and if a multiracial college student only feels comfortable reaching out to a mono-racial higher education practitioner, then said practitioner needs to be ready to proficiently provide support. This need for
proficient competency and training applies to mental health professionals at university counseling centers, too. A final recommendation for practice is to create a multiracial student resource guide for the parents and guardians of multiracial college students. Family influence has a big impact on multiracial student identity development. While the parents of multiracial children can be multiracial themselves, the majority of multiracial students still have two mono-racial parents. Because mono-racial and multiracial individuals have different lived experiences, it is important that parents of multiracial students provide support in identity development and implicit racial bias awareness and reduction. A multiracial student resource guide would allow parents and guardians to obtain a better understanding of their student’s experiences, and help support them through situations and issues that they cannot relate to themselves.

In summary, the multiracial experience is not a monolith. While multiracial individuals share some commonalities, there is a myriad of variety in multiracial identity development, multiracial racial identification, implicit racial biases, and implicit anti-Black racial bias. As the multiracial population in the United States continues to grow, multiracial individuals will also be one of the fastest growing populations to attend higher education institutions. Multiracial college students require individualized support from higher education practitioners, as well as their families and support networks. Finally, future research on implicit racial bias and implicit anti-Black racial bias needs to continue to include multiracial individuals so that this population is able to grow in their own cultural competencies and identity development, a privilege that has already long been provided to their mono-racial peers.
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