Potential Impact of COVID-19–Related Racial Discrimination on the Health of Asian Americans

Anti-Asian discrimination and assaults have increased significantly during the Coronavirus disease 2019 (COVID-19) pandemic, contributing to a "secondary contagion" of racism. The United States has a long and well-documented history of both interpersonal and structural anti-Asian discrimination, and the current pandemic reinforces longstanding negative stereotypes of this rapidly growing minority group as the "Yellow Peril."

We provide a general overview of the history of anti-Asian discrimination in the United States, review theoretical and empirical associations between discrimination and health, and describe the associated public health implications of the COVID-19 pandemic, citing relevant evidence from previous disasters in US history that became racialized.

Although the literature suggests that COVID-19 will likely have significant negative effects on the health of Asian Americans and other vulnerable groups, there are reasons for optimism as well. These include the emergence of mechanisms for reporting and tracking incidents of racial bias, increased awareness of racism's insidious harms and subsequent civic and political engagement by the Asian American community, and further research into resilience-promoting factors that can reduce the negative health effects of racism. (Am J Public Health. Published online ahead of print September 17, 2020: e1-e4. https://doi.org/10.2105/AJPH.2020. 305858)

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Coronavirus disease 2019 (COVID-19) has been accompanied by a dramatic increase in discrimination against Asian individuals worldwide, creating a form of socially mediated "secondary contagion." Asians of all ethnicities have been scapegoated, verbally attacked with racial slurs, coughed at, spat on, and physically assaulted. Natural language processing analyses of social media platforms (e.g., Twitter, /pol/) from October 2019 to March 2020 revealed increases in Sinophobic slurs.¹ Stop AAPI Hate, a US-based Web site created in March 2020 to track attacks against Asian Americans, received 1135 reports nationwide within the first two weeks of launching.2 Moreover, the Federal Bureau of Investigation has warned of increased hate crimes against Asian Americans. The cumulative burden of these incidents, along with their coverage in the media, has the potential to exert significant negative health effects.

Increases in racially motivated attacks have led to a range of efforts to combat anti-Asian discrimination. US House Representative Grace Meng (D, NY) introduced a resolution calling on officials to condemn, document, and investigate COVID-19—related hate crimes. Los Angeles County, California, is recommending that instances of COVID-19—related discrimination be reported to their 211 hotline, and Chicago, Illinois,

encourages reporting COVID-19–related hate crimes to police. The New York City, New York, attorney general's office also launched a hotline to track these incidents.

Asian Americans comprise just 5.6% of the US population. However, they are the fastestgrowing racial/ethnic group in this country, with a 72% increase from 2001 to 2015, and are projected to become the largest immigrant group by 2055.3 Asia comprises nearly 50 countries and languages, and the Asian American population is a correspondingly diverse and vibrant tapestry of ethnicities, cultural and religious backgrounds, and immigration histories. Yet many Americans of Asian ancestry have been uniformly assumed to be Chinese, as evidenced by such comments as "I can't tell vou people apart." The fact that Asian Americans are frequently associated with East Asians contributes to the erasure of the visibility and perspectives of other Asian communities—a phenomenon described by psychologist Derald Wing Sue as "invalidation of interethnic differences"4(p95)___ further challenging the definition

and experience of Asian Americans as a unified racial group.

Asians in this country share a long and well-documented history of discrimination and have been the frequent targets of both interpersonal and structural persecution. We define key terms, including "discrimination" and "racism," provide a general overview of the history of anti-Asian discrimination in the United States, review theoretical and empirical associations between discrimination and health, and describe the public health implications of the COVID-19 pandemic for the Asian American population.

DISCRIMINATION, RACISM, AND ASIAN AMERICANS

Current attacks against Asian Americans occur in a context of historically entrenched attitudes regarding race and social structures that reflect and reinforce racially based power disparities. Discrimination refers to prejudicial attitudes, beliefs, and behaviors that contribute to a person's marginalized social status⁵ and that decrease their ability

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This article was accepted June 20, 2020. https://doi.org/10.2105/AJPH.2020.305858 to control the environment. Discrimination can take the form of blatant or subtle actions that produce unpredictable or threatening interpersonal interactions. Racial discrimination refers to negative differential treatment of racial or ethnic minorities by individuals and social institutions.⁵

To fully understand the Asian American experience during the COVID-19 pandemic, it is necessary to move past interpersonal dynamics and consider the broader concept of racism. According to sociologist David Wellman, racism "extends considerably beyond prejudiced beliefs" and at its core refers to "defense of a system from which advantage is derived on the basis of race." (6(p210) In other words, racism is the reinforcement of one race's privileged position over another. By this definition, Asians in this country have a complex relationship with racism. Even outside the context of COVID-19, most Asian Americans have experienced direct racism, and nearly all have experienced vicarious racism or witnessed other Asians experience racism.7 However, Asians have also at times benefited from proximity to the dominant White power structure in this country and, therefore, inadvertently or explicitly contributed to racism against other minorities, particularly Black Americans. The current COVID-19-related rise in racial discrimination against Asians has once again revealed this group's tenuous position in a larger system of privilege and oppression.

HISTORY OF ANTI-ASIAN DISCRIMINATION

Stereotypes and scapegoating of Asian Americans as disease

carriers are not new. They have perpetuated longstanding racist tropes of Asians since Asians arrived in large numbers during the 19th century as the "Yellow Peril"—dirty, diseased, sinister, sexually depraved, invasive, and perpetually foreign. Propagated by newspapers, medical journals, and government officials alike,8 these stereotypes have exerted significant harms. In the 1890s, the Vancouver, Canada, municipal council listed Chinatown as a separate category for supervision, along with "sewerage" and "slaughterhouses." In the early 1900s, officials imposed extreme and inhumane measures to contain an outbreak of bubonic plague, including quarantining and burning down entire Chinatown neighborhoods.8

The Chinese Exclusion Act, passed in 1882 to prevent Chinese laborers from entering the United States, was the first immigration law to exclude an entire ethnic group and was an early example of economic scapegoating of East Asians. The Immigration Act of 1924 extended these restrictions to other Asian immigrant groups. During World War II, President Franklin Roosevelt ordered the forced relocation and incarceration into concentration camps of about 120 000 individuals of Japanese ancestry, more than 60% of whom were US citizens. During the 1992 Los Angeles riots following the acquittal of four police officers accused of beating Rodney King, Koreatown suffered extensive and disproportionate property damage from looting and arson yet received little protection from police authorities compared with majority White areas. 10

The "Yellow Peril" label was gradually replaced in the 1950s by the "model minority" stereotype, which describes a group that is uniformly successful, with high levels of educational attainment and income but limited political activism. The model minority stereotype has been criticized for erasing significant heterogeneity between groups, misleading policymakers to overlook significant problems affecting different subpopulations, setting up a divisive contrast with other minorities, and minimizing the impact of discrimination.

Other modern-day pandemics, including severe acute respiratory syndrome (SARS) in 2003, have similarly been characterized by widespread public fear, intolerance, and distrust of Asian Americans, with negative social, political, and economic implications. In an echo of SARS. New York Chinatowns reported losing up to 50% to 70% of their business as early as January 2020, when the first cases of COVID-19 surfaced in the United States. 11 Mainstream and social media's focus on uncommon Chinese culinary practices as the source of disease paralleled coverage regarding the rise of China as a global hegemon, highlighting its threat to the United States. 12 Increasing reports of hateful COVID-19related attacks on Asians in the news media mirrored political leaders' attempts to pin blame on specific groups of people (e.g., through President Donald Trump's early repetition of the phrase "the Chinese virus" and Representative Paul Gosar's [R, AZ] use of the term "the Wuhan virus").

The racialization of disease that results in entire groups of people being portrayed as dangerous "others" based solely on physical appearance or skin color subjects Asian communities to persistent marginalization. As we discuss in Discrimination and Health, these social and political

dynamics have negative health implications. Public health professionals and clinicians should be aware of the deeply rooted US history of anti-Asian bias as they address the current pandemic.

DISCRIMINATION AND HEALTH

Historical precedent suggests that COVID-19-related racial discrimination will exert harmful effects on Asian American health. Japanese Americans who had been confined to internment camps during World War II exhibited roughly double the rates of both suicide and cardiovascular disease as did their noninterned counterparts.9 Following the 9/11 attacks, increased Islamophobia, anti-Muslim rhetoric, and hate crimes were linked to both shortand long-term health problems among Arab and Muslim Americans. Perceived post-9/11 discrimination was associated with greater psychological distress and worse health. 13 Although the stereotypes applied to Arab and Muslim Americans (e.g., being labeled as terrorists) differ from those applied to Asian Americans (e.g., being labeled as disease carriers), these findings support the potential for lasting harm to Asian Americans resulting from the current pandemic.

The experience of racial discrimination has been associated with worsened psychological and physical health outcomes, including increased pain and disability and higher all-cause mortality. ¹⁴ Among Asian Americans specifically, discrimination is a robust and consistent predictor of diminished wellbeing and increased mental health problems. Asian American adults' experiences of racial

discrimination are associated with reduced life satisfaction and selfesteem, increased symptoms of anxiety and depression, and suicidal ideation. 15 In addition to overt discrimination and racism, microaggressions—"brief everyday exchanges that send denigrating messages to people of color because they belong to a racial minority group"4—have been linked to increased mental health problems among Asian American adults.¹⁶ Internalized racism—the acceptance of negative attitudes or stereotypes held by the majority group—appears to amplify the distress of discrimination and is associated with poorer mental health among Asian Americans.¹⁷

Discrimination also exerts negative effects on Asian American physical health, although the body of evidence is less robust. The literature to date suggests that discrimination exacerbates a range of chronic health conditions, including cardiac disease, respiratory conditions, and pain among Chinese, Vietnamese, and Filipino individuals in the United States¹⁸

Several theoretical frameworks have been proposed to explain discrimination's health harms. Psychiatric epidemiologist Ilan Meyer's minority stress theory 19 posits that the accumulation of prejudice, discrimination, and internalized stigma contributes to poor mental and physical health in minorities through physiologic pathways mediated by stress. Specifically, acute stress results in increased cortisol levels, blood pressure, and heart rate, and chronic stress results in allostatic overload (wear and tear on the body),²⁰ with significant short- and long-term effects on homeostatic neuroendocrine systems. These problems contribute to chronic health conditions such as cardiovascular

and metabolic diseases as well as cognitive decline over the lifetime.²⁰

Direct racist encounters can inflict emotional trauma on minorities and elicit a posttraumatic stress response. According to Carter's race-based traumatic stress theory, the experience and magnitude of the trauma is linked to individuals' perception of their ability to cope with the event.²¹

IMPLICATIONS FOR **PUBLIC HEALTH**

Our country's long history of racial bias and discrimination against Asian Americans, taken together with the documented experience of other scapegoated minority groups following national crises, suggests likely implications for the health and well-being of Asian Americans during the COVID-19 pandemic and beyond. The field of public health must be prepared to understand both short- and longterm effects of racial discrimination on health to propose and study appropriate interventions at multiple levels.

Discrimination can lead to reduced access to health services and discourage help seeking. Asian Americans are already among the lowest utilizers of mental health services,²² likely a result of the model minority stereotype colluding with cultural values that deemphasize psychological explanations and solutions for emotional distress. Stigma associated with the COVID-19 pandemic may further inhibit Asian Americans from seeking help for their problems. Among those who do pursue mental health care, stereotypes and cross-cultural differences can alter expectations, impair communication, and limit

the benefits of treatment. Structural racism and institutional barriers also challenge help seeking given ongoing severe shortages of bilingual and bicultural providers and culturally appropriate services. Cumulatively, these factors are likely to exacerbate health inequities for Asians and Asian Americans.

Discrimination's harmful effects may extend beyond Asians to affect other ethnic groups. Increases in the perception of discrimination after 9/11 were found not only among Arab and Muslim Americans but among other minorities as well, suggesting that persecution can spill over to affect a range of individuals from nondominant groups.²³ This finding highlights the importance of cross-racial and interethnic coalitions joining together in solidarity to combat discrimination as a broader issue. The well-being of one vulnerable group reflects the well-being of all others within a society.

To date, Asian Americans are the most understudied racial/ ethnic group in the peerreviewed literature,24 and research focused on their experiences has been severely underfunded, with only 0.17% of funding from the National Institutes of Health over the past 26 years supporting Asian American health research.²⁵ COVID-19 has revealed a dearth of data and infrastructure to support the health and well-being of Asian Americans, as well as a pressing need to develop multiple levels of support to this community. Public health professionals and policymakers must continue to develop strategies to limit the racialization of diseases and subsequent harmful effects on minority groups. 12 The pandemic has devastated Black and Latinx communities, underscoring the health consequences of structural

racism and socioeconomic inequality. All sectors of society have a role to play in combating the rise of racism and its pernicious effects on the social fabric.

Public health institutions, including the World Health Organization, have been leaders in recognizing the dangers of the racialization of infectious disease outbreaks and advocating the adoption of less-stigmatizing nomenclature. Impacts of these efforts should continue to be researched. Relatedly, registries for reporting incidents of racial bias have been a recent and important development that can support data collection and tracking, guiding societal and public health responses.²

FUTURE DIRECTIONS

Despite the many challenges presented by this pandemic, there are also reasons for optimism. Increased civic engagement and mobilization among Asian Americans as a result of COVID-19² directly challenge the model minority myth that has dampened political activism in Asian American communities and may indicate increased recognition of the insidious harms of racist stereotyping. Recent Asian American social media advocacy efforts, such as #WashTheHate and #stopAAPIHate, have increased broader awareness of discrimination. Asian Americans have mobilized to protest anti-Black racism following the death of George Floyd. Increased motivation to tackle stigma and discrimination may facilitate cross-racial political and civic engagement among Asian American communities.

A number of individual-level factors potentially moderate the association between discrimination and health and may present opportunities for intervention. For instance, whereas internalized racism may amplify discrimination's negative mental health effects, ¹⁷ strong ethnic identification has been found to moderate the impact of racial microaggressions and reduce depressive symptoms ¹⁷ and, therefore, may serve as a protective factor that is a promising area for future research and intervention.

Clinicians and researchers should continue to develop specific interventions targeting the negative health effects of racism among minority groups, building on previous innovations such as cognitive behavioral therapy for individuals facing oppression. For children and youths, family-level supports and racial/ethnic socialization are critical for adaptive coping with racism.

Researchers should increase purposeful sampling of a range of Asian ethnic groups, with attention to generation, acculturation, and linguistic- and epidemiologically based representative sampling to increase the generalizability of findings. Additionally, they should advocate data disaggregation to enrich our understanding of how different groups experience racism. Structural interventions focused on the redistribution of power dynamics, such as community mobilization focused on raising awareness about rights and strategies for demanding them and advocacy with power brokers, are needed to address systemic and institutional public health challenges.

The COVID-19 pandemic has upended life for billions of people worldwide and directly contributed to incalculable emotional, financial, and health-related damage. Hopefully, it can also serve as a catalyst to increase attention to the struggles of our society's most vulnerable members, especially in light of inevitable future pandemics. AJPH

CONTRIBUTORS

J. A. Chen was the primary author. E. Zhang performed the literature review. C. H. Liu guided overall execution. All authors participated in conceptualization, research, drafting, and editing of the commentary.

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CONFLICTS OF INTEREST

All authors report no potential conflicts of interest related to this article.

REFERENCES

- 1. Schild L, Ling C, Blackburn J, Stringhini G, Zhang Y, Zannettou S. "Go eat a bat, Chang!": an early look on the emergence of Sinophobic behavior on Web communities in the face of COVID-19. 2020. Available at: http://arxiv.org/abs/2004.04046. Accessed April 15, 2020.
- Jeung R, Nham K. Incidents of Coronavirus Discrimination: A Report for A3PCON and CAA. Los Angeles, CA: Asian Pacific Policy and Planning Council; 2020.
- 3. Lopez G, Ruiz NG, Patten E. Key facts about Asian Americans. 2017. Available at: https://www.pewresearch.org/fact-tank/2017/09/08/key-facts-about-asian-americans. Accessed April 10, 2020.
- Sue DW, Bucceri J, Lin AI, Nadal KL, Torino GC. Racial microaggressions and the Asian American experience. Cultur Divers Ethnic Minor Psychol. 2007;13(1): 71–101. https://doi.org/10.1037/1948-1985.S.1.88
- 5. Williams DR, Mohammed SA. Discrimination and racial disparities in health: evidence and needed research. *J Behav Med*. 2009;32(1):20–47. https://doi.org/10.1007/s10865-008-9185-0
- 6. Wellman DT. Portraits of White Racism. Cambridge, UK: Cambridge University Press; 1993. https://doi.org/10.1017/ CBO9780511625480
- 7. Alvarez AN, Juang L, Liang CTH. Asian Americans and racism: when bad things happen to "model minorities." *Cultur Divers Ethnic Minor Psychol.* 2006;12(3): 477–492. https://doi.org/10.1037/1099-9809 12 3 477
- 8. Power JG. Media dependency, bubonic plague, and the social construction of the

- Chinese other. J Commun Inq. 1995;19(1): 89–110. https://doi.org/10.1177/019685999501900106
- 9. Jensen GM. The experience of injustice: health consequences of the Japanese American internment. *Diss Abstr Int. Section A.* 1998;58(7-A):2718.
- 10. Kim RM. Violence and trauma as constitutive elements in Korean American racial identity formation: the 1992 L.A. riots/insurrection/saigu. *Ethn Racial Stud.* 2012;35(11):1999–2018. https://doi.org/10.1080/01419870.2011.602090
- 11. Barron J. Coronavirus in N.Y.: without Chinese tourists, business sags. 2020. Available at: https://www.nytimes.com/2020/02/04/nyregion/coronavirus-nyc.html. Accessed April 10, 2020.
- 12. Keil R, Ali H. Multiculturalism, racism and infectious disease in the global city: the experience of the 2003 SARS outbreak in Toronto. *TOPIA Can J Cult Stud*. 2006;16:23–49. https://doi.org/10.3138/topia.16.23
- 13. Padela AI, Heisler M. The association of perceived abuse and discrimination after September 11, 2001, with psychological distress, level of happiness, and health status among Arab Americans. *Am J Public Health*. 2010;100(2):284–291. https://doi.org/10.2105/AJPH.2009.164954
- 14. Pascoe EA, Richman LS. Perceived discrimination and health: a meta-analytic review. *Psychol Bull.* 2009;135(4):531–554. https://doi.org/10.1037/a0016059
- 15. Hwang W, Goto S. The impact of perceived racial discrimination on the mental health of Asian American and Latino college students. *Cultur Divers Ethnic Minor Psychol*. 2008;14(4):326–335. https://doi.org/10.1037/1099-9809.14. 4.326
- 16. Nadal KL, Wong Y, Sriken J, Griffin K, Fujii-Doe W. Racial microaggressions and Asian Americans: an exploratory study on within-group differences and mental health. *Asian Am J Psychol.* 2015;6(2): 136–144. https://doi.org/10.1037/a0038058
- 17. Millan JB, Alvarez AN. Asian Americans and internalized oppression: do we deserve this? In: David EJR, ed. *Internalized Oppression: The Psychology of Marginalized Groups*. New York, NY: Springer; 2014:163–190.
- 18. Gee GC, Spencer MS, Chen J, Takeuchi D. A nationwide study of discrimination and chronic health conditions among Asian Americans. *Am J Public Health*. 2007;97(7):1275–1282. https:// doi.org/10.2105/AJPH.2006.091827
- 19. Meyer IH. Prejudice, social stress, and mental health in lesbian, gay, and bisexual populations: conceptual issues and research evidence. *Psychol Bull.* 2003;129(5): 674–697. https://doi.org/10.1037/0033-2909.129.5.674

- 20. McEwen BS, Seeman T. Protective and damaging effects of mediators of stress: elaborating and testing the concepts of allostasis and allostatic load. *Ann N Y Acad Sci.* 1999;896:30–47. https://doi.org/10.1111/j.1749-6632.1999.tb08103.x
- 21. Carter RT. Racism and psychological and emotional injury: recognizing and assessing race-based traumatic stress. *Couns Psychol.* 2007;35(1):13–105. https://doi.org/10.1177/0011000006292033
- 22. Park S, Stimpson JP, Pintor JK, et al. The effects of the Affordable Care Act on health care access and utilization among Asian American subgroups. *Med Care*. 2019;57(11):861–868. https://doi.org/10.1097/MLR.00000000000001202
- 23. Rousseau C, Hassan G, Moreau N, Thombs BD. Perceived discrimination and its association with psychological distress among newly arrived immigrants before and after September 11, 2001. Am J Public Health. 2011;101(5):909–915. https://doi.org/10.2105/AJPH.2009. 173062
- 24. Yi SS. Taking action to improve Asian American health. *Am J Public Health*. 2020; 110(4):435–437. https://doi.org/10. 2105/AJPH.2020.305596
- 25. Đoàn LN, Takata Y, Sakuma KK, Irvin VL. Trends in clinical research including Asian American, Native Hawaiian, and Pacific Islander participants funded by the US National Institutes of Health, 1992 to 2018. *JAMA Netw Open.* 2019;2(7):e197432. https://doi.org/10.1001/jamanetworkopen.2019.