



PROJECT MUSE®

---

## Role of Federal Policy in Building Research Infrastructure Among Emerging Minorities: The Asian American Experience

Chau Trinh-Shevrin, Marguerite Ro, Winston Tseng, Nadia Shilpi Islam,  
Mariano J. Rey, Simona C. Kwon



Progress in Community Health Partnerships: Research, Education, and  
Action, Volume 6, Issue 1, Spring 2012, pp. 83-93 (Article)

Published by Johns Hopkins University Press

DOI: <https://doi.org/10.1353/cpr.2012.0007>

➔ *For additional information about this article*

<https://muse.jhu.edu/article/468614>

## Role of Federal Policy in Building Research Infrastructure Among Emerging Minorities: The Asian American Experience

Chau Trinh-Shevrin, DrPH<sup>1</sup>, Marguerite Ro, PhD<sup>2</sup>, Winston Tseng, PhD<sup>3</sup>, Nadia Shilpi Islam, PhD<sup>1</sup>, Mariano J. Rey, MD<sup>1</sup>,  
Simona C. Kwon, DrPH, MPH<sup>1</sup>

(1) New York University School of Medicine; (2) Public Health Seattle-King County; (3) Asian & Pacific Islander American Health Forum

Submitted 15 February 2011, revised 23 June 2011, accepted 30 June 2011. This publication was made possible by Grant Numbers P60 MD000538 (NIH National Institute for Minority Health and Health Disparities), U58DP001022 (CDC REACH U.S. Program), U48DP001904 (CDC Health Promotion and Prevention Research Center), and UL1RR029893 (National Institutes of Health National Center for Research Resources). The authors acknowledge support from Grant/Cooperative Agreement Number U50/CCU925132 (CDC Capacity Building Program PA 05055).

### Abstract

**Problem:** Considerable progress in Asian American health research has occurred over the last two decades. However, greater and sustained federal support is needed for reducing health disparities in Asian American communities.

**Purpose of the Article:** This paper reviews federal policies that support infrastructure to conduct minority health research and highlights one model for strengthening research capacity and infrastructure in Asian American communities.

**Key Points:** Research center infrastructures can play a significant role in addressing pipeline/workforce challenges, fostering campus–community research collaborations, engaging communities in health, disseminating evidence-based strategies and health information, and policy development.

**Conclusion:** Research centers provide the capacity needed for academic institutions and communities to work together synergistically in achieving the goal to reduce health disparities in the Asian American community. Policies that support the development of concentrated and targeted research for Asian Americans must continue so that these centers will reach their full potential.

### Keywords

Academies and institutes, Asian Americans, capacity building, community-based participatory research, community health planning, community networks, health promotion, minority health, organizational innovation, research institutes

More than two decades ago, the seminal Secretary's Task Force on Black and Minority Health and a pivotal article by Jane Lin-Fu identified the need for data and research on Asian Americans.<sup>1,2</sup> These documents helped to prioritize data collection and increasing research for the Asian American community. Yet, despite tremendous population growth during the last few decades, there has been an overall lack in progress in funding and conducting health research on Asian Americans between 1986 and 2000.<sup>3–6</sup> The need to improve data and increase research for a population

that was and is still relatively small in size, heterogeneous in culture and primary language, and largely unknown or overlooked by the research and policy community continues to be a high priority for Asian American populations, but remains difficult to achieve. Asian Americans continue to experience numerous disparities in health status and access to care, as described elsewhere in this special issue.

The advent of participatory action research, the precursor to community-based participatory research (CBPR), empowered “poor and powerless” populations and communities,

including minorities to engage in research for their own benefit.<sup>7,8</sup> Green and Mercer<sup>9</sup> suggested that participatory action research had been notable in addressing minority health and was a promising strategy “that may help to ensure that research results address real needs and will actually be used.” For overlooked populations, such as Asian Americans, there are clear research and knowledge gaps that can be filled by CBPR, particularly research that accounts for the ethnic diversity among Asian Americans and the contextual factors in the community that influence acceptance and feasibility of health interventions. National meetings of Asian American and Native Hawaiian, and Pacific Islander (NHPI) policymakers, academic researchers, and community members identified CBPR as a primary strategy for addressing the lack of research and data on Asian American health.<sup>10,11</sup> Although federal support of CBPR and participatory research has increased over the last three decades, CBPR still represents a small proportion of the federally supported research dollars (whether for investigator-initiated or program project grants).<sup>12</sup>

This paper reviews federal policies and strategies that supported the development of research centers and CBPR studies in minority communities, with a particular focus on Asian American populations.\* We argue that these types of targeted federal policies and investments are crucial to building national legitimacy for minority health research and CBPR, strengthening the research capacity of communities, and fostering community-engaged research partnerships in emerging minority communities, such as Asian Americans. We argue that this type of capacity building for both community and academic centers is essential to ensuring sustained and ongoing research in the Asian American population. Herein we have reviewed funding mechanisms that spurred major advancements in participatory and minority health research and highlight the New York University (NYU) Center for the Study of Asian American Health (CSAAH) as a potential model for developing research capacity and infrastructure for addressing data and research gaps in small and minority communities. We then discuss what opportunities exist to build on existing efforts and accomplishments.

## MOVEMENT TOWARD CBPR IN ASIAN AMERICAN POPULATIONS

Studies evaluating the effect of CBPR to reduce health disparities in Asian Americans are sparse. A MEDLINE literature review conducted in 2007 determined that most CBPR studies in the Asian American communities have been observational in nature with few examples of evaluated interventions.<sup>13</sup> Some examples of the effectiveness of CBPR approaches include a cervical cancer prevention study conducted with Vietnamese Americans in California<sup>14</sup> and a diabetes intervention for Korean American diabetics.<sup>15</sup> CBPR has also proven to be a practical and successful approach for data collection in hard-to-reach Asian American communities.<sup>16</sup>

The growth of a strong advocacy network of Asian American and NHPI organizations, including partnerships with multicultural health coalitions and policymakers on a national level, have and continue to conduct data and research advocacy in efforts to raise the national visibility of Asian Americans and NHPIs.<sup>17</sup> For example, advocacy efforts by the Asian & Pacific Islander American Health Forum (APIAHF), the Association of Asian Pacific Community Health Organizations (AAPCHO), and other Asian American and NHPI health organizations led to the launching of the White House Initiative on Asian Americans and Pacific Islanders in June 1997. The signing of Executive Order 13125—Increasing Participation of Asian Americans and Pacific Islanders in Federal Programs—in June 1999 resulted in the establishment of the White House Initiative on Asian Americans and Pacific Islanders and subsequent White House Initiative on Asian Americans and Pacific Islanders initiatives to support federal Asian American and NHPI data collection.<sup>18</sup> The collective efforts of national Asian American and NHPI leaders and champions at the National Institutes of Health (NIH), Centers for Disease Control and Prevention (CDC), and other federal agencies in support of community relevant data and research to address health disparities have spurred critical research investments that have formed a research knowledge base that can inform future research investments and be leveraged for subsequent research ventures.

\* The authors focused on the Asian American population because the federal research centers highlighted in this article specifically targeted Asian American populations and/or had limited research on NHPI populations. Although the manuscript’s conclusions and recommendations have implications for other racial and ethnic minority communities, including NHPI populations, the authors did not want to misrepresent these communities in the case study discussion.

## FEDERAL MANDATE CALLING FOR THE DEVELOPMENT OF RESEARCH CENTERS<sup>†</sup> TO ADDRESS MINORITY HEALTH AND CONDUCT COMMUNITY INTERVENTIONS

For vibrant and effective CBPR research agendas focused on Asian Americans, several components are necessary: Building a linguistically and culturally proficient research workforce, ensuring community participation and relevance, and creating sufficient funding opportunities to break through both the academic and community barriers to advancing research.<sup>19</sup> In particular, the exclusion of non-English-speaking populations in health research, the community's distrust of research owing to parachute research experiences, and the limited capacity of Asian American community partners to engage and conduct research are critical barriers that must be overcome for research to be successfully conducted in Asian American communities. There have been several milestone funding mechanisms that support minority research and health disparities infrastructures, but there continues to be very few funded research projects focused on Asian American health.

### Prevention Research Centers

In 1984, congress authorized the CDC to “undertake research and demonstration projects in health promotion, disease prevention, and improved methods of appraising health hazards and risk factors, as demonstration sites for the use of new and innovative research in public health technique to improve public health.”<sup>20</sup> This led to the development of what is now commonly known as the Prevention Research Centers (PRCs). Housed at academic health institutions, PRCs were charged with developing sound research and programs focused on health promotion and disease prevention and translating research findings into community-based interventions. Before 2000, it was the only major federal research center mechanism that supported CBPR and minority health.

The 1997 review of the PRCs by the Institute of Medicine<sup>21</sup> found that nearly every PRC conducted research on underserved populations. Among the PRC network's major contribution is establishing the early foundation for promoting

CBPR infrastructures and partnerships between academic and community partners, and fostering the development of a small pipeline of researchers on CBPR in underserved populations.<sup>22,23</sup> However, there was limited indication that Asian American populations were included among study populations, with the exception of two interventions, one through the PRC at the University of California—Berkeley and another at the University of Washington. In 2009, the CDC established a second PRC that specifically focused on Asian American populations, out of a network of 37 PRCs. However, PRC research on Asian Americans is still limited; a March 2011 search of the PRC research project database indicated that only 7 projects have included Asian Americans since the inception of the PRCs. This compares with 18 projects targeting American Indians or Alaskan Natives, 40 projects targeting Hispanic or Latinos, and 60 projects targeting African Americans or Blacks.

### Special Populations Networks and the National Latino and Asian American Study

In December 1997, the NIH National Cancer Institute (NCI) convened a meeting in Boston to discuss cancer control issues for Asian Americans that laid a foundation for action. The conference pioneered awareness of cancer education needs for Asian Americans and resulted in the subsequent funding of the NCI program, Cancer Concerns for Asian Americans and Pacific Islanders.<sup>24</sup> The development of the NCI Minority Field Program, as well as the cancer chapter in the Secretary's Task Force Report on Black and Minority Health, set the stage for subsequent interventions to advance Asian American cancer research. These initiatives promoted key changes in NCI policy on Surveillance, Epidemiology, and End Results cancer data reporting.<sup>12</sup> In 2000, the NCI funded the Special Populations Networks to build robust and sustainable infrastructures within minority and medically underserved communities to promote cancer awareness, conduct cancer control research, initiate cancer control activities, and promote the career development of minority junior biomedical and

<sup>†</sup> For this paper, the authors focused on federally funded, in particular NIH, research centers, and investments. The authors acknowledge the CDC's investment in community participatory work that has been accomplished through the REACH (Racial and Ethnic Approaches to Community Health) program. Since 1999, REACH has been the cornerstone of CDC's efforts to eliminate racial and ethnic health disparities through community-based participatory approaches to identify, develop, and disseminate effective strategies for address health disparities across a wide range of health priority areas.

behavioral researchers. By this time, three milestone research events occurred: The launch and funding of the NCI Special Populations Network, including the Asian American Network for Cancer Awareness, Research and Training (AANCART) and the Asian Tobacco Education & Cancer Awareness Research Initiative (ATECAR); and the NIH-funded National Latino and Asian American Study (NLAAS).

AANCART brought together investigators with portfolios of cancer control grants focused on Asian Americans as well as deeply committed Asian American community and clinical leaders, national and community-based Asian American organizations, the American Cancer Society, and federal and state health agency partners.<sup>10</sup> ATECAR, an academic–community partnership funded by the NCI, was the first long-term federal effort on tobacco and cancer control targeting multi-ethnic Asian American communities in the Delaware Valley Region of Pennsylvania and New Jersey. Major contributions of AANCART and ATECAR were the development of the first major pipeline of NCI-funded researchers from Asian American communities, its influence in changing the system of national and regional data collection for cancer among small populations such as Asian Americans, the implementation of several regional CBPR cancer control interventions, the creation of an infrastructure for sharing lessons learned among cancer disparities researchers, and its role in shaping the program mechanisms within NCI for supporting community-based models and Asian American research.

The NLAAS is a nationally representative community household survey that demonstrated the viability of conducting a national, multilanguage survey on Asian Americans. The NLAAS used a national, transdisciplinary network led by a research center to lay out a road map for designing future national surveys conducted in Asian languages. Step by step, a national research infrastructure and associated research workforce to carry out CBPR and Asian American health disparities research was being built through these select academic institutions. However, these successes, although a step in the right direction, were not sufficient, and there remained substantial work and investments needed to build and sustain the newly developed research infrastructure. Investments in building and sustaining the capacity of Asian American communities to engage and conduct research outside of academic research centers continued to be lacking.

The concurrent developments of the thematic PRCs and the NIH-supported NLAAS, ATECAR, and AANCART suggest that a targeted focus on specific populations, in this case Asian Americans, could spur advancements in research to overcome some of the challenges that are unique to emerging populations. These successful investments in developing Asian American research initiatives set the stage and acceptance for developing a NIH research program through academic institutions that focused solely on the study of Asian American health and health disparities.

It should be noted that the CDC, in a similar vein, instituted the Racial and Ethnic Approaches to Community Health (REACH) programs (i.e., REACH 2010 in 1999 and REACH U.S. in 2007). Although not reviewed here, the foundation of REACH is the role of community coalitions in addressing health disparities through dissemination and training of evidence-based strategies.<sup>25</sup> Significant contributions to advancing Asian American health disparities research and strategies using a CBPR approach have been made by REACH grantees including, Vietnamese REACH for Health Initiative,<sup>26–28</sup> PATH for Pacific Islander and Southeast Asian Women,<sup>29</sup> and B Free CEED.<sup>30–32</sup>

## STRENGTHENING ASIAN AMERICAN RESEARCH INFRASTRUCTURE AND CAPACITY

This section focuses on the development of CSAAH and the implications for advancing similar federally supported health disparity research infrastructures. Public Law 103-43, the Health Revitalization Act of 1993, established the Office of Research on Minority Health in the Office of the Director at NIH. In 2000, Public Law 106-525 transformed the Office of Research on Minority Health into the National Center on Minority Health and Health Disparities (NCMHD). The NCMHD was mandated to establish Project Excellence in Partnership Outreach Research and Training (EXPORT) Centers in 2002, focused on understanding and eliminating health disparities for racial and ethnic minority and medically underserved populations in the United States. The Project EXPORT mechanism required academic institutions to have a history of active and ongoing collaboration with community-based partners to address and reduce health disparities.

Between 2002 and 2005, approximately 76 Project EXPORT grants were awarded to institutions in 29 states,

Puerto Rico, and the U.S. Virgin Islands. Only one focused on Asian American health (NYU CSAAH), and another on the health of NHPI populations. When the initial Project EXPORT Request for Applications was released in 2003, Asian Americans were left out of the list of eligible populations designated as health disparity populations. The language of the Request for Applications focused on African Americans, Latino Americans, and other medically underserved populations. In developing the case for a center focused on Asian Americans, the NYU application included documentation that the target populations fell under the criteria of the medically underserved. In subsequent Request for Applications for Project EXPORT Centers and the COEs, Asian Americans were included as a target group facing health disparities.

What is striking about the EXPORT funding is its departure from a disease-specific infrastructure grant to one that aimed to strengthen and leverage the health disparities research infrastructure at academic institutions to create synergistic campus–community research partnerships. A major contribution of Project EXPORT has been its pioneer efforts to standardize NIH models for academic–community research partnerships to reduce minority health disparities and its innovative partnership models across communities of color for engaging community partners in research design and community capacity building for research from the beginning. For example, in 2004, the NCMHD established a R24 grant mechanism to specifically support CBPR studies. The mechanism includes three phases: Pilot, implementation, and dissemination phases over an 11-year period in recognition of the significant time and investment needed to support true CBPR studies.

### NYU'S CSAAH: A CASE STUDY

In 2006, the NCMHD established P60 Research Centers of Excellence (COE) that provided continuation funding for eligible Project EXPORT Centers. Leveraging the community partnerships, scientific expertise and experiences of these EXPORT Centers, The NCMHD<sup>‡</sup> strove to foster the conduct of

community-engaged and transdisciplinary translational research as a mechanism for understanding, addressing, and eliminating health disparities. Of the 88 COE awardees since 2002, one center focuses solely on Asian American health issues.

The CSAAH serves as an important case study on the value of having academic research infrastructures focused on Asian American health disparities. From its inception, CSAAH strived to use a CBPR approach as a guiding framework for developing a health disparities Research Center and, in particular, as a Project EXPORT Center. From 2003 to 2007, three principles guided CSAAH's work: 1) Creating and sustaining multiple partnerships, 2) promoting equity in partnerships, and 3) commitment to action and research. A detailed description of this process and framework has been described in an earlier publication.<sup>33</sup> Since 2007, with its designation as a COE, the CSAAH's guiding framework has evolved to include strengthening capacity of both academic and community partners to fully engage in the research endeavor and conducting multicultural evaluations as a means to foster ownership, sustainability, and impact.

The CSAAH played a critical role in the development and/or maintenance of several ethnic-based coalitions that resulted in health research, education, training, and dissemination partnerships. The CSAAH's roles in these coalitions ranged from catalyst, facilitation, maintenance, and participant at different phases of the coalition developmental process. Through these partnerships, the CSAAH demonstrates the significant role an academic institution can play in coalition development and community engagement activities that lead to successful health disparity research partnerships (Table 1).

The CSAAH also played an ancillary role in supporting community-initiated efforts to build research infrastructure. For example, working in partnership with AAPCHO and its affiliate community health center members, the CSAAH serves as a research and evaluation arm for a Health Resources and Services Administration-funded initiative in which the AAPCHO is the lead applicant. The aim of the Health Resources and Services Administration application is to build

<sup>‡</sup> With the passage of the Patient Protection Affordable Care Act of 2010, the National Center for Minority Health and Health Disparities became the National Institute of Minority Health and Health Disparities. The law transfers all of the responsibilities of the NCMHD provided under the Minority Health and Health Disparities Research and Education Act to the new institute. This includes responsibility for coordinating the development of the NIH health disparities research agenda. In addition, it expands the eligibility criteria of the NIMHD Research Endowment program to include active NIMHD Centers of Excellence.

the research infrastructure of a network of community health centers to conduct comparative effectiveness research focused on Asian American and NHPI populations.

In addition, the CSAAH, APIAHF, and AAPCHO have forged a national partnership on several projects aimed at developing national strategies for advancing data collection, training, and research infrastructure among Asian American and NHPI communities across the nation. This national partnership has strengthened the CSAAH’s national visibility and legitimacy as a leading Asian American health research center. Through this partnership, a National Advisory Committee on Research Development of community champions and leaders of community-based organizations serving Asian Americans and NHPI populations across the nation was established and has worked together to develop a set of national recommendations on research capacity building that will shape the CSAAH’s goals and actions as a COE over the next 5 years. The major National Advisory Committee on Research Development recommendation components include strategies for advancing CBPR and training, standardizing national data collection and reporting, strengthening government–community engagement in research, and raising the visibility of health issues for Asian American and NHPI communities.

Essential for each of CSAAH’s partnerships are concerted efforts to preserve and maintain equity between academic and

community partners. This has manifested in an open relationship-building process and a commitment to revisiting these processes on an ongoing basis to facilitate the maintenance of equitable partnerships. The CSAAH acknowledges and incorporates partner contribution and feedback to balance partner needs in programmatic activities and research by involving partners in the evaluation, decision-making, and dissemination process. The APIAHF, AAPCHO, and other community partners also value CSAAH’s research expertise and contributions to data advocacy and research capacity building to advance Asian American health at the local and national levels.

Another important element has been the integration of a strong training component for research staff and all partner members on the value of research geared toward action. This strategy resulted from the need to balance research priorities with the goals of community partners, whose efforts and principles were committed to both advocacy and action. Similarly, the evaluation of such programs must account for and integrate the perspectives, needs, and interests of diverse stakeholders. This participatory, multidirectional process demands ongoing relationship building, meaningful collaborative actions for all partners, and strategic utilization of all the partners’ combined strengths.

Another outcome of the P60 funding for the CSAAH has been the fostering of capacity within NYU to develop an interdisciplinary and interuniversity program focused on understanding, addressing and reducing health disparities in a specific population. The CSAAH has become an academic home for many investigators, particularly junior faculty, interested in Asian American health research and, therefore, laying the foundation for research training and workforce development.

THE BENEFITS AND CHALLENGES OF A RESEARCH CENTER’S STRATEGY

Centers that are focused on using participatory research principles to address, reduce, and eliminate racial and ethnic health disparities offer great promise in overcoming challenges in conducting research in emerging communities by creating culturally sensitive and contextualized approaches with long-term impact and sustainability. Table 2 illustrates the considerable benefits and challenges to creating and sustaining Research Centers dedicated solely to the study of Asian American population health and research.

Table 1. Coalitions Developed Through the NYU Center for the Student of Asian American Health (CSAAH)		
	Health Disparity Issues	Targeted Populations
Asian American Hepatitis B Coalition	Hepatitis B prevention	Chinese, Korean, South Asian, Southeast Asian
DREAM Coalition	Diabetes prevention	Bangladeshi
Kalusugan Coalition	Hypertension prevention Health promotion	Filipino
RICE Coalition	Diabetes prevention	Korean, South Asian
Vietnamese Community Health Initiative	Community health needs assessment Cancer prevention	Southeast Asian

**Table 2. Benefits and Challenges of a Research Center**

Benefits	Challenges
Impact on funders	
Research Centers provide a readily available network of researchers with relevant scientific expertise that funding agencies can access for advice on priority areas and culturally appropriate research design strategies for minority populations, such as emerging Asian American subgroups.	The “model minority” myth that all Asian Americans are well off and therefore healthy can bias funders and grant reviewers and negatively influence the level of priority placed on research or health promotion programs targeting this population.
Funding and support for Research Centers can be a mobilizing factor in garnering support from community-based organizations representing different ethnic constituencies.	Grant reviewers may have a lack of understanding of the diversity of minority populations such as the Asian American community, and may question the need to include emerging subgroups in research studies
Researcher Center’s partnerships with community-based organizations can help them quickly identify candidates to serve in leadership positions (e.g., advisory committees, funding review panels.)	Research Centers have a primary mission of advancing academic research and are supported by funders primarily focused on advancing science, priorities that may not necessarily align with those of the target underserved communities.
Research Centers can readily leverage the expertise of partner national/local advocacy organizations to carry out media campaigns and other dissemination efforts supported and promoted by funding agencies (e.g., CDC-supported social marketing campaigns)	Many funding opportunities for Research Centers dictate that academic agencies must be the lead applicant, thereby restricting opportunities for community-based organizations to lead such efforts.
Research Centers provide critical infrastructure and develop track records of research accomplishments that can be leveraged to sustain and increase levels of research among targeted populations.	CBPR projects through Research Centers funded by the NIH and other federal agencies are inherently unequal between the academic research centers and community partners in terms of the distribution of financial and human resources.
Impact on academic institutions	
Research Centers raise the visibility of otherwise overlooked issues, such as Asian American health, internal and external to their host academic institution.	Academic institutions place greater value on bench and clinical research—with less perceived value of the scientific contributions made by Research Centers that focus on CBPR or other types of community-based research.
Research Centers engaging in minority health disparities research raise the profile of academic institutions to communities. Additionally, communities may perceive these academic institutions as more cognizant and responsive to their needs.	The academic health research paradigm is based on observations of controlled scientific trials which often discounts or undervalues community placement and engagement in research as scientifically unsound and lacking objectivity.
Research Centers that are mandated to conduct CBPR can spur improvements in community–academic relations by engaging in research that is responsive to the needs of the community.	Because Research Centers typically invest a significant amount of time to developing community partnerships, “scientific results” may not be produced until well into a funding cycle. Academic institutions value productivity in the form of peer-reviewed publications containing scientific results, and may undervalue process-oriented publications, community reports, policy briefs, and other types of dissemination products.
Research Centers are better positioned than individual investigators to compete for funding and can leverage resources from their academic institutions to perform interdisciplinary research.	Faculty associated with Research Centers may have a more challenging time securing tenure or faculty promotion due to lack of understanding of CBPR-type research efforts by academic review committees
Research Centers engaged in CBPR efforts provide important training and capacity building opportunities for students and junior faculty interested in community-engaged research.	
Research Centers support faculty that can provide instruction on CBPR and other community-engaged research frameworks in the classroom setting.	

*table continues*

Table 2. *continued*

Benefits	Challenges
Impact on communities	
Research Centers are well positioned to tackle immediate or acute issues (e.g., H1N1 epidemic) that arise given their existing infrastructure and relationships with communities.	Federal funds tend to prioritize resource allocation to academic institutions and research rigor without recognizing that experimental designs are not necessarily congruent with addressing community priorities or concerns. Timeline of conducting experimental designs may also conflict with community priorities.
Research Centers can provide technical assistance, expertise, and mentorship for community entities, small and large, that are interested in developing their own research infrastructures by providing resources such as financial support and an accessible pool of researchers.	Tensions regarding the balance of power may exist between community and academic partners and across community partners. This imbalance is often reflected in token allocation of resources for community engagement if principles of CBPR are not adhered to.
Research Centers may serve as a neutral facilitator among a coalition of community organizations and can play a key role in assisting in facilitating coalition development, convening, research agenda building, translating research into community action, and demonstrating the effectiveness of coalition activities.	Research Center and community conflict in goals often exists. Respectively, scientific goals are favored over service/advocacy focused goals.
Research Centers can readily leverage the expertise of partner national/local advocacy organizations to develop targeted participatory designs that may be more effective in engaging these communities in research.	Because Research Centers are expected to have a wide reach and propose innovative studies in each subsequent funding cycle, partnerships with one particular community may be difficult to sustain. This is especially relevant for the Asian American community that is comprised of numerous and diverse subgroups.
Research Centers can increase scientific legitimacy and credibility for issues of relevance and significance to community partners when working together on data dissemination activities, such as conferences and publications.	
Research Centers can provide sustainable and long-term research partnerships for communities.	
Impact on workforce development	
Research Centers provide important mechanisms for training junior investigators and stimulating career interest in addressing population health disparities.	Research Centers that do prioritize health disparities research, continue to face academic institutional misperceptions, that typically undervalue Asian American health research and continue to perceive the work to address other racial populations such as African and Latino Americans to be more medically underserved and a higher research priority. A systems-level and institutional shift in the current health disparities paradigm across academic institutions is needed to ensure that Research Centers do not devalue and exclude health disparities research training opportunities for Asian Americans and other minority populations.
Research Centers can provide important pipeline opportunities for educating and training students in CBPR and about Asian American health, and thus speak to the issue of workforce development; their use of participatory approaches can link communities with federal agencies/programs thus serving as a bridge and a voice for community input. <sup>19</sup>	There is a critical need to build a pipeline of seasoned investigators and decision makers across academic health research institutions to change the institutional paradigm on health disparities research.
Individual researchers working in disparate areas as well as communities working in isolation on community-based research initiatives may also find it difficult to impossible to leverage work expertise or experiences without a Research Center.	Because of their scarcity, Research Centers focused on Asian American CBPR efforts are often overwhelmed with request for training, mentorship, and capacity building.
Research Centers are increasingly engaging with health professionals, such as physicians and other allied health professionals, and can stimulate interest in CBPR and health disparities research among this population.	

## THE NEED FOR FEDERAL SUPPORT

Federal support is critical to continuing the trend toward sponsoring research that uses a CBPR approach to developing a Research Center model focused on the elimination of health disparities. Research that embraces a participatory approach is needed to eradicate health disparities in underserved minority and marginalized communities, particularly Asian American populations, a group expected to grow exponentially by 2050.<sup>34</sup> The strategies to ensure full community–academic equity include (1) supporting NIH and other federal agency efforts to prioritize CBPR, (2) mandating a percentage of grant funds go directly to community partners, (3) expanding the workforce diversity of NIH and other federal funders as well as academic researchers to ensure representation from underserved racial, ethnic, and language communities, and (4) standardizing and requiring cultural competency training for all federal agency officials and researchers and staff at academic Research Centers.

Ensuring Asian American representation on the NIH and other federal advisory committees and workgroups and including community principal investigators as grant reviewers for both scientific and council reviews can transform traditional biomedical research infrastructure at NIH and other federal agencies. Further, national political advocacy through community–academic partnerships in coordination with partners in government, advocacy/media, community, and research are central to advancing a national agenda for Asian American health. Successful Research Center models such as CSAAH and its national and local partnerships can serve as leading examples to promote the CBPR model through NIH and other federal agencies.

The combination of federal support and an adherence to participatory research principles can strengthen national value and legitimacy for conducting Asian American health and health disparities research; it will also ensure that the data generated are representative of the social realities and health concerns of Asian American populations.

## SUMMARY

Research Centers that employ CBPR approaches can strengthen and engage both communities and academic researchers in ways that not only empower them but also help develop effective, multilevel solutions and strategies to

eliminating health disparities. When Research Centers target a specific racial/ethnic group, greater energy, efforts, and funding are focused on that community. Asian American issues, however, may be obscured if a research center is also addressing health disparities in multiple racial and ethnic communities, thus diluting the impact on any given community. This is particularly harmful for Asian American communities, which are diverse in language, culture, migration, and immigration experiences.

Notable progress in Asian American health research has occurred over the past 20 years; however, much remains underresearched. The federal research strategy of developing and supporting research centers targeting special populations has led to the development of important breakthroughs in building research infrastructure for Asian Americans. Because of the breadth and reach of CBPR-focused Research Centers, barriers such as workforce/pipeline, community engagement, and adequate support can be overcome. Research Centers focused on CBPR can play a major role in the ability of Asian American community-based organizations to catch up to other ethnically focused community organizations. These Research Centers will provide the capacity needed for academic institutions and the community to work together synergistically in achieving the shared goal to reduce health disparities in the Asian American community. In sum, academic research centers such as the CSAAH, and similarly the ATECAR and AANCART, have demonstrated the significant role of coalition development in reducing health disparities in the Asian American population. For this reason, federal funding strategies and policies that support the development of concentrated and targeted research for Asian Americans are significant to ensure that these research centers can be replicated and continue to reach their full potential.

## ACKNOWLEDGMENTS

The authors are grateful to the many academic, community, foundation, and government partners who contributed in both subtle and pioneering ways over the last few decades to create the foundation and pathway for federal support of research center infrastructures, like the Asian American Network for Cancer Awareness, Research and Training (AANCART), the Asian Tobacco Education & Cancer Awareness Research Initiative (ATECAR), and the NYU CSAAH. It is a testament

to their leadership, wisdom, and perseverance that health disparities and health inequities remain a priority in the national scientific and health agenda.

In developing this manuscript, we are indebted to the leadership at the APIAHF and CSAAH for their support of our efforts: Kathy Lim Ko. We also are grateful to the APIAHF and CSAAH staff who contributed in the manuscript coordination, review, references, and submission process, including

Corina Chung, Won Kim Cook, Rebecca Park, Shilpa Patel, Navita Sahai, and Rhodora Ursua.

The authors thank the support from Health Through Action Program, via support from the W. K. Kellogg Foundation. The article's contents are solely the responsibility of the authors and do not necessarily represent the official views of the NIH, the CDC, and the W. K. Kellogg Foundation.

## REFERENCES

1. Heckler MM. Report of the Secretary's Task Force on Black and Minority Health. Washington (DC): US Department of Health and Human Services; 1985.
2. Lin-Fu JS. Population characteristics and health care needs of Asian Pacific Americans. *Public Health Rep.* 1988;103:18-27.
3. Ghosh C. Healthy people 2010 and Asian Americans/Pacific Islanders: defining a baseline of information. *Am J Public Health.* 2003;93:2093-8.
4. Barringer H, Gardner RW, Levin MJ. Asians and Pacific Islanders in the United States. New York: Russell Sage Foundation; 1985.
5. U.S. Census Bureau. Projections of the resident population by race, Hispanic origin, and nativity. Washington (DC): Government Printing Office; 2000.
6. U.S. Census Bureau. American community survey, 2006. Washington (DC): Government Printing Office; 2007.
7. Chambers R. The origins and practice of participatory rural appraisal. *World Dev.* 1994; 4:953-69.
8. Israel BA, Schulz AJ, Parker EA, Becker AB. Review of community-based research: Assessing partnership approaches to improve public health. *Annu Rev Public Health.* 1998;19:173-202.
9. Green LW, Mercer SL. Can public health researchers and agencies reconcile the push from funding bodies and the pull from communities? *Am J Public Health.* 2001;91:1926-9.
10. Asian & Pacific Islander American Health Forum. Proceedings of The Health Brain Trust on Data & Research: Improving the Health & Well-Being of Asian Americans, Native Hawaiians, & Pacific Islanders. San Francisco: Asian & Pacific Islander American Health Forum; 2007.
11. Asian & Pacific Islander American Health Forum Proceedings of The 2nd Health Brain Trust on Data & Research: Strengthening the Involvement of Asian Americans, Native Hawaiians, & Pacific Islanders in Community-Based Participatory Research. San Francisco: Asian & Pacific Islander American Health Forum; 2008.
12. Minkler M, Blackwell AG, Thompson M, Tamir H. Community-based participatory research: Implications for public health funding. *Am J Public Health.* 2003 Aug;93:1210-3.
13. Tandon D, Kwon SC. Community-based participatory research. In: Trinh-Shevrin C, Islam N, Rey MJ, editors. *Asian American communities and health.* San Francisco: Jossey Bass; 2009. p. 464-503.
14. Nguyen TT, McPhee SJ, Bui-Tong N, Luong TN. Community-based participatory research increases cervical cancer screening among Vietnamese-Americans. *J Health Care Poor Underserved.* 2006 May;17:31-54.
15. Kim MT, Han H-R, Song J-J, Lee J-E, Kim J, Ryu JP, et al. A community-based culturally tailored behavioral intervention for Korean Americans with type 2 diabetes. *Diabetes Educ.* 2009;35:986-94.
16. Nguyen G, Hsu L, Kue KN, Nguyen T, Yuen EJ. Partnering to collect health services and public health data in hard-to-reach communities: A community-based participatory research approach for collecting community health data. *Prog Community Health Partnersh.* 2010;4(2):115-9.
17. Jang D, Tran HL. Health policy advocacy. In: Trinh-Shevrin C, Islam N, Rey MJ, editors. *Asian American communities and health.* San Francisco: Jossey Bass; 2009. p. 589-609.
18. Brooks J. Clinton announces racial and ethnic health disparities initiative. [updated 1998 Apr; cited 2011 June 9]. Available from: <http://1.usa.gov/iheLkV>
19. Ro M. The workforce. In: Trinh-Shevrin C, Islam N, Rey MJ, editors. *Asian American communities and health: Context, research, policy, and action.* San Francisco: Jossey Bass; 2009.
20. Health Promotion and Disease Prevention Amendments of 1984, Pub. L. No. 98-551, 98 Stat. 2815. 1984 Oct 30.
21. Soto MA, Green LW, Bailey LA. Linking research and public health practice: A review of CDC's Program of Centers for Research and Demonstration of Health Promotion and Disease Prevention. Washington (DC): Committee to Review the CDC Centers for Research and Demonstration of Health Promotion and Disease Prevention, Institute of Medicine; 1997.
22. U.S. Department of Health and Social Services. Testimony of David Satcher, Assistant Secretary For Health and Surgeon General U.S. Public Health Service; May 11, 2000 [updated 2011 Jun 20; cited 2011 Jun 21]. Available from: <http://www.hhs.gov/asl/testify/t000511a.html>

23. Imani Ma'at. Reach 2010: A unique opportunity to create strategies to eliminate health disparities among women of color. *Am J Health Studies*. [FindArticles.com; cited 21 Jun, 2011]. Available from: [http://findarticles.com/p/articles/mi\\_m0CTG/is\\_2\\_17/ai\\_85590927/](http://findarticles.com/p/articles/mi_m0CTG/is_2_17/ai_85590927/)
24. Chen MS. The AANCART's infrastructure: Empirical evidence of transdisciplinary effectiveness. *J Health Care Poor Underserved*. 2005 May;16:237-43.
25. Racial and Ethnic Approaches to Community Health (REACH). About REACH [updated 2011 May 27; cited 2011 Jun 21]. Available from: <http://www.cdc.gov/reach/about.htm>
26. Lai KQ, Nguyen TT, Mock J, McPhee SJ, Doan HT, Pham TH. Increasing Vietnamese-American physicians' knowledge of cervical cancer and Pap testing: Impact of continuing medical education programs. *Ethn Dis*. 2004;14, 3 Suppl 1:S122-7.
27. Mock J, Nguyen T, Nguyen KH, Bui-Tong N, McPhee SJ. Processes and capacity-building benefits of lay health worker outreach focused on preventing cervical cancer among Vietnamese. *Health Promot Pract*. 2006;7 Suppl 3:223S-32S.
28. Nguyen TT, McPhee SJ, Bui-Tong N, et al. Community-based participatory research increases cervical cancer screening among Vietnamese-Americans. *J Health Care Poor Underserved*. 2006; 17 Suppl 2:31-54.
29. Tanjasiri SP, Tran JH, Kagawa-Singer M, et al. Exploring access to cancer control services for Asian-American and Pacific Islander communities in Southern California. *Ethn Dis*. 2004;14, 3 Suppl 1:S14-9.
30. Post SE, Sodhi NK, Peng CH, Wan K, Pollack HJ. A simulation shows that early treatment of chronic hepatitis B infection can cut deaths and be cost-effective. *Health Aff (Millwood)*. 2011 Feb;30:340-8.
31. Trinh-Shevrin C, Pollack HJ, Tsang T, Park J-H, Ramos MR, Islam N, et al. The Asian American Hepatitis B Program: Building a coalition to address hepatitis B health disparities. *Prog Community Health Partnersh*. 2011 Fall; 5(3): 261-71.
32. Van Devanter N, Kwon SC, Sim S-C, Chun K, Trinh-Shevrin C. Evaluation of community-academic partnership functioning: Center for the Elimination of Hepatitis B Health Disparities. *Prog in Community Health Partnersh*. 2011 Fall; 5(3): 223-33.
33. Trinh-Shevrin C, Islam N, Tandon SD, Ho-Asjoe H, Rey MJ. Using community-based participatory research as a guiding framework for health disparities research centers. *Prog Community Health Partnersh*. 2007;1:195-205.
34. U.S. Census Bureau. Population profile of the United States [updated 2011 Apr 21; cited 2011 Jun 22]. Available from: <http://www.census.gov/population/www/pop-profile/natproj.html>

