# Neighbors for Better Neighborhoods Health and Wellness Community Connector Project

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# **Executive Summary**

Neighbors for Better Neighborhoods (NBN) is a nonprofit organization within Winston-Salem, Forsyth County for over 30 years. The main mission of NBN is to help strengthen voices and leverage resources in a continuing effort to build better neighborhoods. The objectives of the Strengthening Neighborhoods and Families program are to address the multi-faceted issues of poverty by pushing for significant shifts - laws, behaviors, attitudes, policies & institutions - that make a difference to people and their communities. NBN has and is doing this through our Resident Leader Initiative as well as our Health & Wellness Community Connector Project in efforts to address civic engagement, housing & economic stability, education access & quality, social determinants of health (SDOH).

The Health and Wellness Community Connector Projects objective is to understand the social factors that impact neighborhoods within Winston-Salem, Forsyth County. Assessing SDOH forms the best course of action to address these social factors. A first step towards assessing SDOH in the community is learning about residents lived experiences.

NBN facilitated listening sessions with residents in designated neighborhoods within the respective zip codes where there is an NBN presence (27101, 27105, 27107). At the time of writing, for this project, these include neighborhoods with NBN Resident Leaders from the Resident Leader Initiative and United Way of Forsyth County Place Matters Initiative partnership. The listening sessions were aimed at collecting information about residents' wellness experiences and experiences as clients of healthcare services. These discussions were centered around SDOH: "conditions in the environments where people are born, live, learn, work, play, worship, and age that affect a wide range of health, functioning, and quality-of-life outcomes and risks" [1].

The project outline included meeting with the Resident Leaders in January to discuss the proponents of the project and coordinate in establishing listening sessions in each designated neighborhood. The listening sessions took place over the course of six weeks in late-February, March, and early April 2022 and were facilitated by NBN in partnership with Triad Restorative Justice (TRJ). Information was first collected as qualitative data (survey) followed by a brief presentation on SDOH. This was parlayed into a follow-up qualitative semi-structured discussion and post-survey. Participant recruitment was mainly performed by NBN Resident Leaders, in their respective communities utilizing word of mouth, flyers, emails, and an existing database of community partners via newsletter.

A total of 90 participants participated in the eight listening sessions, 62 in-person and 28 online. Of these 46 completed both the pre and post-surveys. This yielded a 51.1% overall response rate<sup>1</sup>. Demographic characteristics of the participants indicate the population was majority female at 63.04%. Half of the respondents indicated an age range of 60 or older (n=23). About 80.43% indicated that they identified with the race/ethnicity of Black or African American.

The primary results showed that the majority of respondents indicated that they rated their overall health as "very good" or "good." Of the six health-related issues (and one open-response) listed as requiring the most urgent attention, 56.25% (25.0% & 31.25%) indicated health screenings and mental health. Notably, oral/dental health and long-term care facilities/life stage counseling pulled substantial weight at 21.875% and 18.75%, respectively. Finally, the majority of respondents indicated that they were "extremely satisfied" with the service provided by healthcare professionals. Despite this thematic analysis indicated issues pertaining to consistency of care, access issues and availability of information.

NBN has had the opportunity to work alongside historically marginalized communities and minorities within Winston-Salem, Forsyth County on various projects. The main way NBN addresses these disparities when it comes to decision making is that a large majority of project ideas and focuses stem out of our Resident Led Neighborhood Association meetings. These allow us to learn about the resident lived experiences within the communities and items which are of high importance. This also allows us to make sure the outcomes involve the community as long-term solutions are created using the ABCD model which builds from the community and its strengths.

In conjunction with the listening sessions, establishing a Resident Health Connector would help address, at a grassroots level, health inequalities<sup>2</sup> and health-related issues. Utilizing asset based community development (ABCD) NBN will build the capacity of a Resident Health Connector with its Resident Leader Initiative model as it creates associational systems to "reduce unequal consequences of illness in social, economic and health terms" [2]. Additionally, taking action by advocating for long-term solutions that build from communities, their contributions and their wisdom will "reduce vulnerabilities of disadvantaged people" in a culturally sensitive manner [2].

<sup>&</sup>lt;sup>1</sup> Of the 53 total respondents, 7 (1 in-person and 6 online) did not complete the post-survey sections.

<sup>&</sup>lt;sup>2</sup> Inequality as defined by Global Health Europe. (2009, August 24). *Inequity and inequality in health*. A Platform for European Engagement in Global Health. Retrieved from <u>Global Health Europe</u>.

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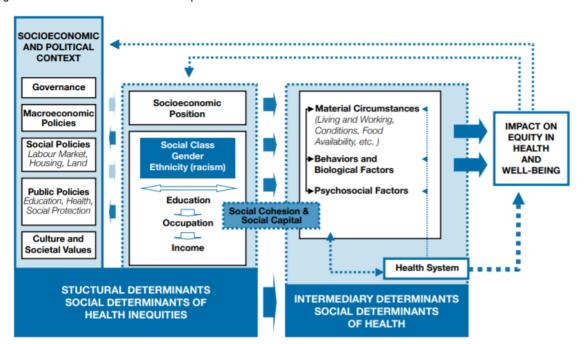
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# Background

NBN received a \$5,000 (USD) pilot grant from Wake Forest School of Medicine (WSFM) -Winston-Salem, N.C. The pilot grant is a Community Engagement Boost Award from the Clinical and Translational Science Institute (CTSI). NBN utilized the funds provided for the Health and Wellness Community Connector Project.

## **Social Determinants of Health**

SDOH, according to the U.S. Department of Health and Human Services (HHS) - Office of Disease Prevention and Health Promotion (ODPHP), can be grouped into five domains: Economic Stability, Education Access and Quality, Healthcare Access and Quality, Neighborhood and Built Environment, Social and Community Context. These domains are broad-reaching, exemplified by the fact that they involve "very different sectors with very different core tasks and very different scientific traditions" [2]. However, despite their traditional<sup>3</sup> policy isolation, they form "long casual chains of mediating<sup>4</sup> factors" [2]. The World Health Organization (WHO) illustrates the conceptual framework (*Figure A*) in which the side effects of these mediating factors compound.





Source: Reproduced from Solar, O., Irwin, A. (2010)

<sup>&</sup>lt;sup>3</sup> Traditional refers to one-dimensional policy formulation as outlined by Grindle, MS., Thomas, JW. (John Hopkins Univ Pr., 1991)

<sup>&</sup>lt;sup>4</sup> The definition of mediating in the context of this quote is "exhibiting indirect causation, connection, or relation." [Merriam-Webster def. 2]

The WHO Commission on Social Determinants of Health (CSDH) identifies structural and intermediary determinants which maintain an impact on equity in health & well-being in their conceptual framework: Structural determinants are a mixture of socio-economic & political contexts whose mechanisms "generate, configure, and maintain social hierarchies;" e.g., political institutions, the welfare state & its redistributive policies (or the absence of such policies), the labour market, educational system, and other cultural & societal values [2]. Hierarchies, i.e., a set of resultant socio-economic positions, are exemplified by proxy indicators, e.g., social class, gender, race/ethnicity, education, occupation, and income.

Diderichsen's model provides the best summarization of how differences in social position give rise to health inequalities:

**Social contexts**, which includes the structure of society or the social relations in society, create social stratification and assign individuals to different social positions.

**Social stratification** in turn engenders **differential exposure** to health-damaging conditions and **differential vulnerability**, in terms of health conditions and material resource availability.

Social stratification likewise determines **differential consequences** of ill health for more and less advantaged groups (including economic and social consequences, as well differential health outcomes per se).

## Materials and Methods

A sequential, explanatory mixed methods design was employed to investigate residents' wellness experiences and experiences as clients of healthcare services [3]. Specifically, we explored attitudes on overall health, satisfaction with healthcare services, and opinions on course of action within seven listening sessions (3 in-person and 4 online). Additionally, we explored the impact of these sessions on understanding of SDOH.

The listening sessions took place over the course of six weeks in late-February, March, and early April 2022. Eight sessions were scheduled in predominantly low income neighborhoods within Winston-Salem, NC. Each session lasted approximately 90 minutes and were partitioned into three segments. Information was first collected as qualitative data (survey) followed by a brief presentation on SDOH. This was parlayed into a follow-up qualitative semi-structured discussion and post-survey. Participant recruitment was mainly performed by NBN Resident Leaders, in their respective communities utilizing word of mouth, flyers, emails, and an existing database of community partners via newsletter. There was no specified inclusion criterion for the sessions,

although participants were encouraged to attend the session within or adjacent to their neighborhood(s).

## Quantitative

We administered two surveys (pre & post-survey) using a cross-sectional, mixed-mode (online, face-to-face) design. The surveys asked questions related to attitudes on overall health, satisfaction with healthcare services, and opinions on the course of action. The surveys were developed using previously validated scales and demographic variables in the literature [3-5]. Each measure is briefly described below.

Section one of the pre-survey consisted of two questions on participants' attitudes towards their overall health. Both questions were paired with identical post-survey questions. The response options were based on 5-point Likert scales of quality and difficulty [8]. The difficulty scale had negatively worded (4 items) that were reverse coded for scoring purposes. Section two consisted of a seven-item multiple choice question. The nominal data points represent major public health issues and are paired with identical points in the post-survey. Section three consisted of questions on participants satisfaction with healthcare services. This scale comprised three validated subscales [4]. This scale was based on a 7-point Likert scale of satisfaction [5]. A high score indicates high levels of perceived satisfaction stemming from consistency with levels of difficulty and influence.

Both the pre and post-surveys also included a question regarding participants' understanding of SDOH. The question was "How knowledgeable do you feel about social determinants of health." Additionally, the post-survey included a question regarding satisfaction with the listening session itself.

#### Demographics

Age was a continuous variable. Gender was represented with categories of male, female, and non-binary gender identity. Race was represented with American Indian/Alaska Native, Asian or Asian-American, Black or African-American, Hispanic American, White or Caucasian or multiple ethnicity. The categories of multiple ethnicities and other were compressed.

#### Qualitative

We conducted semi-structured discussions with 90 community participants<sup>5</sup> within the eight listening sessions. These included five discussion questions related to participants' wellness experiences and experiences as clients of healthcare services. These portions were moderated by the first and second authors as well as TRJ and NBN staff. Additionally healthcare representatives were present in order to help with concept clarity and participant questions. These sessions were audio-recorded via Zoom and notes were taken by the first or second authors. Participants provided written acknowledgement prior to the discussion.

#### **Statistical Analysis**

To analyze the data, we utilized <u>GStat</u> functions and standard packages available through CRAN for R version 4.2.0. Before analysis, survey responses were recorded, and sum scores were calculated for scales, as needed, per instrument scoring instructions. Data analysis was conducted on those who completed both the pre and post surveys. Participant results were summarized by neighborhood as well as overall. The Cochran-Mantel-Haenszel test (CMH) for bivariate/categorical variables determined differences in pre and post-survey results in attitude on overall health, satisfaction with healthcare services, and opinions on the course of action. Differences between survey scores were calculated for each question. Then independent samples *t*-tests were applied to determine if differences exist between those that took the survey online versus in-person. Elements of conditional logistic regressions and Pearson's product-moment correlation coefficient (PPMCC) were employed on scales with Conbrach's alphas ( $0.8 \le a$ ). The significance alpha level was assumed at *p*-value  $\le 0.05$ , as is standardized in the literature [4].

Thematic analysis was conducted in which codes and themes were created. Data triangulation was used to establish rigor. Axial coding was used to place codes in categories. The constant comparison method was used to compare codes for identifying emerging themes [3]. This mixed methods analysis strategy, with data consolidation, allowed for the creation of consolidated data sets to be appropriately used for future analysis.

<sup>&</sup>lt;sup>5</sup> 59 residents, predominantly older adults, were unable to participate as our Andrew Heights community listening session was postponed due to inclement weather.

# Results

A total of 90 participants participated in the eight listening sessions, 62 in-person and 28 online. Of these 46 completed both the pre and post-surveys. This yielded a 51.1% overall response rate<sup>6</sup>. There were no significant differences in participant characteristics or mode of delivery.

Demographic characteristics of the participants that completed both surveys showed that the population was majority female at 63.04%. Half of the respondents indicated an age range of 60 or older (n=23). About 80.43% indicated that they identified with the race/ethnicity of Black or African American.

## **Univariate Analysis**

We tested the mean difference in pre and post-survey scores between in-person and online. Initially the differences in variance between pairs was performed using Levene's test and determined the variance of each pair of groups was not different. Independent of these results, as discussed a priori based on the study design<sup>7</sup>, Welch's unequal variances *t*-test (two-tailed independent samples *t*-test) was conducted. We found no difference in scores for attitude on overall health, satisfaction with healthcare services, and opinions on the course of action.

## **Bivariate Analysis**

After stratifying by mode of delivery, we further sought to explore if differences exist in the mean score of the pre and post-surveys using a paired *t*-test. We found no difference in scores for attitudes on overall health, opinions on the course of action, or understanding of SDOH. This indicates despite a few response changes in which health-related issues require the most urgent attention there was no significant deviation.

Finally, we explored if a correlation exists in the mean scores of pairs between different neighborhoods using a sample PPMCC with bootstrapping. While overall scores for attitude on overall health, satisfaction with healthcare services, and opinions on the course of action stayed the same neighborhood to neighborhood there were a few notable exceptions.

<sup>&</sup>lt;sup>6</sup> Of the 53 total respondents, 7 (1 in-person and 6 online) did not complete the post-survey sections.

<sup>&</sup>lt;sup>7</sup> For the purposes of minimizing type I error.

The majority of respondents indicated that they rated their overall health as "very good" or "good." However, the Eastgate Village community had a significantly worse perceived overall health of "not so good" or poor (M = 2.0 versus M = 3.48). Additionally, the majority of respondents indicated that the COVID-19 pandemic had only a "moderately" or "slightly negative" impact on their overall wellness experiences. However, the Eastgate Village community was "very negatively" affected (M = 2.33). Interestingly Bowen Park reported a significantly better overall health at M = 4.128 compared to the average M = 3.0, however, this is likely a statistical artifact<sup>8</sup>. These results indicate a generally good level of quality and minimal difficulty in Winston-Salem communities accomodations for overall health, yet general wellness does not exclude neighborhoods from continued struggle<sup>9</sup>.

Of the six health-related issues (and one open-response) listed as requiring the most urgent attention, 56.25% (25.0% & 31.25%) indicated health screenings and mental health. Notably, oral/dental health and long-term care facilities/life stage counseling pulled substantial weight at 21.875% and 18.75%, respectively. These opinions on the course of action to address health-related issues are consistent with the predominant causes of mortality and morbidity. Highlighting the community's unified stance on the need for mental health awareness, screening for common diseases, and proper oral hygiene. All items that also represent aspects of preventative medicine.

The majority of respondents indicated that they were "extremely satisfied" with the service provided by healthcare professionals. These results were similar throughout all the measured neighborhoods with high levels of satisfaction with the choice of primary care providers present under their respective health plans. This coupled with a reported ease in finding local doctors and "somewhat reasonable" health insurance rates indicated overall satisfaction with healthcare services.

## **Thematic Analysis**

Three themes with related subthemes emerged from the data: (1) Consistency of care; (2) Access Issues; (3) Availability of Information. These themes reflect the discussion questions and the outcome variables. Subthemes and paraphrased areas are collected below.

<sup>&</sup>lt;sup>8</sup> With a sample size of n=8 the large percentage (62.5%) of respondents selecting C likely skewed the normal distribution.

<sup>&</sup>lt;sup>9</sup> These results are correlated with the fact that Eastgate Village is the only neighborhood measured with a large population (44.4%) which has not received a primary care check-up in the last thirteen months. All other neighborhoods measured are no greater than 16.667%.

The consistency of care amongst primary care providers (PCP) was noted to be troublesome to multiple members of each community in each listening session. Despite an indicated overall satisfaction with healthcare services community members expressed a multitude of issues related to quality of care. Many members noted feelings of being rushed in appointments and not having enough time to properly develop questions. Questions included confusion about types of screenings and early warning signs as well as why specific medications were being prescribed. A general feeling of not being heard, particularly on the discussion of holistic issues precipitated low connection with PCPs.

These issues trickled down into access issues. Many participants noted that confusion over prescription drug reactions and alternative methods prompted lower levels of follow through on recommended treatment plans. This coupled with distance issues to both pharmacy and specialist appointments meant many grew frustrated with the process. Frustrations which have been normalized in the experience of healthcare related items. These extend to lack of transportation options which also make it difficult to keep early appointment hours (in-part extending from transit schedules) as well as schedule specialist appointments months in advance.

While many of these issues are in part meant to be solved in part with more user friendly MyChart interfaces and responsive hospital/clinic telecommunication staff, those items have also been less than convenient. Communities overwhelmingly indicated a need for a centralized information system to be able to answer questions quickly as well as contact proper helplines. These include information on items ranging from patients rights, pharmaceutical information, and testing locations to urgent care locations, advanced directives, and billing information.

# Discussion

A century ago, the American Medical Association (AMA) endorsed "periodic medical examinations of apparently healthy persons" [6]. These examinations, as described by the AMA's Committee on Health and Public Instruction, were "designed to detect the early evidence of disorder before discomfort, inconvenience, interference with work, or anxiety of established disease" [6]. In the decades since then, the value of general health check-ups and annual medical examinations has been debated. An equilibrium point in maintaining proper health surveillance while also not exposing patients to the harms of over-testing has been a research inquiry. A Cochrane Review in 2019 found that for the purposes of reducing morbidity and mortality that "general health check-ups are unlikely to be beneficial" [7]. As such the Society of General Internal Medicine (SGIM) has stated that "for asymptomatic adults without a chronic medical

condition, mental health problem, or other health concern, don't routinely perform annual general health checks that include a comprehensive physical examination and lab testing" [8]. Importantly this does not indicate not performing general health check-ups, comprehensive physical examinations or laboratory testing themselves but merely diminishes the rate at which all three are concurrent in annual medical examinations. Indeed SGIM, alongside many healthcare institutions such as the U.S. Preventive Services Task Force (USPSTF), recommend general health check-ups to "maintain effective doctor-patient relationships, attend to preventive care, and facilitate timely recognition of new problems" [8].

#### **Wellness Checks**

Keeping these ideas in mind, the distribution of general health check-ups to address disparate community needs in a neighborhood-specific fashion provides potential positive aspects. Wellness checks, for example, may serve as pathways to strengthen provider-patient relationships without the adverse effects of over-screening. Regular contact may build trust and rapport with "recent review [indicating] that continuity of care may supplement patients' trust in providers by strengthening the aspect of vigilance in care" [8]. An area of importance given the highlighted concerns over the consistency of care.

Utilizing already available assets and place-based institutions in coordinated care teams would be an optimal format. Having cross-sectional teams of specialists, PCPs, certified volunteers drawn from both the clinical and community arenas increases physician's roles as community-oriented public health workers and elevates residents as change agents in their communities.

With the growing need for long-term and palliative care amongst the aging older adult population, wellness checks provide a unique care option. However, maintaining adequate numbers of trained professionals for such projects is a well-documented challenge. An ABCD approach would allow a community-accepted peer-support team to reduce that burden. Specialist care could be supplemented with assistance from teams of locally trained volunteers, such as retired healthcare professionals, working inclusively with PCP or senior support staff. Therefore providing sustainable community-based care in a more relational methodology.

This framework could also extend to neighborhoods with communities that require home-bound care for alternative reasons. As highlighted previously, many residents experience a variety of access issues with general health check-ups. Having grassroots organizations, like NBN, who utilize the ABCD model and are able to leverage connections with local healthcare providers would be an effective way of connecting residents with health screenings to facilitate timely

recognition of new problems. NBN can also serve as a connector to other forms of preventative care, i.e., mental health, dental/oral care and nutritional counseling. Forming a necessary community point of reference for information around directly accessible care options.

The frequency, distribution, and rotation of care options are vitally important. Having Resident Health Connectors who are knowledgeable and trusted members of the community allows for effective connection with neighborhood strengths and advocacy for neighborhood needs.

## **Medication Costs**

In addition to connecting people and leveraging resources, the NBN Resident Leader model would assist Resident Health Connectors in strengthening the voices of residents on pertinent health-related barriers. Advocacy for the availability and affordability of prescription medications is one such example. The topic of copay deductibility is a county-wide issue, particularly for low-income communities.

## **Neighborhood and Built Environment**

While items such as physical infrastructure, sanitation & litter, and speed bumps fall under the neighborhood and built environment domain they are intrinsically linked to health disparities. Both the ODPHP<sup>10</sup> and American Public Health Association (APHA) identify mental and physical health as being directly tied to quality of housing and environmental health [1, 9-11]. Additionally, "self-reported health and cost-related healthcare nonadherence, showed significant interaction effects between housing tenure and affordability" [11]. Elements of which were seen in the statistically significant results of the Eastgate Village community who identified during their listening session "apartment conditions, particularly vermin and mold" as health-related issues. Therefore, continued effort in the elucidation of where built environment and substandard housing are associated with health disparities in the Winston-Salem, Forsyth County communities/neighborhoods is required [12]. Particularly, the partnership between local organizations and resident leaders to promote the recognition of issues for effective interventions.

One such issue voiced by Northwood Estates community members was sanitation and litter. A study on enhanced solid waste management conducted in 2009 noted three types of negative impacts associated with litter: "aesthetic blight, medical, cost associated with litter collection and the economic losses (direct and indirect) caused by the presence of litter in public places" [13]. Of particular interest are the medical implications of pollutants such as glass bottles. In the Ludlow

<sup>&</sup>lt;sup>10</sup> Elements of "Quality of Housing" for Healthy People 2030 heavily cited <u>Healthy People 2020</u>.

community of Philadelphia, Pennsylvania, a review of the incidence and cause of lacerations sustained by urban children identified that "34% had been cut at least once while walking outdoors," with "86% [being a result of] broken glass" [14].

Furthermore, injury from broken glass is so frequent it accounts for approximately 15-27%<sup>11</sup> of all lacerations seen in urban emergency departments. Interestingly, a study in Massachusetts found that after the enactment of the 1982 Beverage Container Recovery Law (which incentivized improved beverage container recycling), "the incidence of glass-related lacerations presenting [in] emergency wards decreased dramatically, dropping by 60 percent. Glass-related admissions and complications in 1983 were virtually eliminated" [15].

A possible surrogate for the legislative policy could be a collaboration between existing resident-led neighborhood cleanup projects and county-wide efforts. Shifting to address the insufficient availability of litter cans alongside beautification would result in a 43% willingness to volunteer in public street cleaning campaign(s) and 21.6% effectiveness in preventing littering [13]. Efforts further supplemented by public awareness campaigns from the municipality, local businesses, and hospitals with economic incentives. For example, the decrease in glass injury cost could save a hospital roughly \$550,000<sup>12</sup> (USD) and the North Carolina Department of Transportation (NCDOT) approximately \$223,000<sup>13</sup> (USD) in collection costs.

Alongside the built environment are elements of the neighborhood environment. Issues such as social cohesion, gun violence, and substance abuse all compound to influence higher levels of stress. These individual and community factors are increasingly prevalent and contain major negative health implications. Chief among these are trauma and adverse childhood experiences (ACEs), which precipitate in the form of mental health issues, high-risk health behaviors, and comorbity conditions [16]. Having Resident Health Connectors who utilize ABCD approaches and wellnessness in conjunction with community-wide trauma informed training is a method of diminishing ACEs [16-17]. Elements which can be increasingly effective when implemented in organizations, such as NBN, that have an established standing with residents and a program of already existent trainings [17].

<sup>&</sup>lt;sup>11</sup> Statistic lifted from Baker, MD., Selbst, SM., Lanuti, M. (<u>American Journal of Diseases of Children, 1990</u>). It is important to highlight that little's known about the out-of-hospital incidence or cause of lacerations due to analysis of such injuries typically using emergency department data. Therefore, prevalence of injury may be higher, particularly between May & September and 3pm to 9pm.

 <sup>&</sup>lt;sup>12</sup> This figure was arrived at by taking the equivalent glass injury cost approximated in Armstrong, AM., Molyneux, E. (<u>BMJ: British Medical Journal, 1992</u>). A five-month cost of £62,060 is equivalent to a twelve-month cost £148,944 (GBP). Which converts to \$187,307 (USD) at 5% prevalence or \$558,002 at 15% prevelence.

<sup>&</sup>lt;sup>13</sup> This figure was arrived at by calculating the total cost to date when pounds of litter collected is reduced by 21.6% in Division 9 of the <u>NCDOT 2021 Litter Report</u>.

# Implications and Conclusions

It is important to note that it is beyond the capacity of this report to have an exhaustively detailed description of all relevant health disparities and health-related issues in the Winston-Salem, Forsyth County area. Additionally, while representative of many neighborhoods and residents this report can not be a sole representative piece of all Winston-Salem, Forsyth County communities. That being said, this pilot project has produced insights into areas of concern, demonstrated residents' interest in the subject matter and discussed methods of approach.

Foremost, an accountable community collaboration is required for a comprehensive health improvement process. This can be achieved through interacting cycles that rely on analysis, action and measurement. "An overarching problem identification and prioritization cycle focuses on bringing community stakeholders together in a coalition, monitoring community-level health indicators, and identifying specific health issues as community priorities. ... An analysis and implementation cycle focuses on analyzing a health issue, assessing resources, determining how to respond and who should respond, and selecting and using stakeholder-level performance measures together with community-level indicators to assess whether desired outcomes are being achieved" [18].

Therefore NBN intends to continue its efforts with the Health and Wellness Community Connector Project. Health & Wellness Community Listening Sessions will provide avenues of continuous community insights. Collaboration with local non-profit organizations to perform more large-scale comprehensive studies would both provide evidence-based in addition to the personal account(s) data points to guide prevention strategies and frameworks. Collaboration with local organizations and healthcare providers in an ABCD approach will provide associational support for Resident Health Connectors to advocate for and implement initiatives such as wellness checks and trauma-informed training. Finally, a centralized information hub for residents, community stakeholders & partners will provide an accessible broad-based communication method for health information distribution as well as advance advocacy efforts and goals. All of these elements can be continuously cycled through the various domains of SDOH in order to mitigate all compounding variables, with "more than one analysis and implementation operating at once in response to multiple health issues" [18].

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**Competing interests:** T.C. is an employee of Neighbors for Better Neighborhoods. B.M. is an AmeriCorps VISTA; Program: Wake Forest University (WFU) Office of Civic and Community Engagement (OCCE) Winston-Salem Community Action Coalition (WSCAC), Site: Neighbors for Better Neighborhoods.

**Data and materials availability:** In compliance with the National Institute of Health's (NIH) Public Access Policy the analysis of the source listening session data is openly available.

**Ethics statement:** At initiation, the Health and Wellness Community Connector Project was approved by the institutional review board of Wake Forest (WF) Clinical and Translational Science Institute (CSTI) Community Stakeholder Advisory Committee (CSAC) in partnership with Program in Community-Engaged Research (PCER) leadership. Individuals beginning listening session participation receive written material about participation in the community listening session and are informed by all authors of the purpose of data collection, after which they can consent verbally or opt out. Data is pseudonymized before being provided to Wake Forest School of Medicine (WFSM) faculty and/or staff and may not be used for scientific purposes. Consultation with CSTI PCER safeguards compliance with the Health Insurance Portability and Accountability Act of 1996. Additional written informed consent was obtained for listening session participants who engaged in pre & post surveys.

#### **Supplementary Materials**

**Supplementary Materials:** Materials and methods as well as supplementary text can be made available upon request. Correspondence should be made to B.M.

#### Other Supplementary Material for this manuscript includes the following:

Clinical and Translational Science Institute (CTSI) Community Engagement Boost Award Request for Applications

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