January 19, 2016

The Honorable Julián Castro
Secretary
Department of Housing and Urban Development
451 Seventh Street SW
Washington, DC 20410

Re: Instituting Smoke-Free Public Housing; Docket No. FR 5597-P-02 RIN 2577-AC97

Dear Secretary Castro:

As health organizations dedicated to reducing the death and disease caused by tobacco use and exposure to secondhand smoke, we appreciate this opportunity to comment on the proposed rule published in the *Federal Register* on November 17, 2015 (Docket No. FR-5597-P-02) on instituting smokefree public housing (the "proposed rule"). Our organizations strongly support this policy that will greatly improve the health of public housing residents. The publication of the proposed rule represents a major step forward in protecting the millions of Americans who currently live in federally-owned public housing from the harms of tobacco. We urge the Department of Housing and Urban Development (HUD) to adopt a final rule implementing this measure as soon as possible.

At the same time, our organizations believe the proposed rule could and should also include electronic nicotine delivery systems (ENDS) and waterpipe tobacco (hookah) in restricted areas. Our organizations also believe that the rule should apply to all government-subsidized housing rather than just all government-owned housing. Our comments will expand on these recommendations below.

Our organizations want to make clear: the only way to protect everyone from the dangers of secondhand smoke is to make the smokefree policies mandatory and make them apply to everyone. While voluntary smokefree policies have been effective in allowing HUD to determine best practices for smokefree policy implementation, voluntary smokefree policies are not sufficient to protect everyone from secondhand smoke. Our organizations also strongly urge HUD to prohibit any "grandfathering" policies that delay implementation beyond the 18month period or allow case-by-case decisions that would allow some smokers to still smoke indoors. A mandatory policy that applies to everyone from the beginning of the policy is the *only* way to ensure everyone can breathe clean, safe air in their homes and achieve health benefits.

Secondhand Smoke Exposure Poses Serious Health Threats to Children and Adults

Secondhand smoke (SHS) contains many poisons and cancer-causing chemicals, including nicotine, carbon monoxide, ammonia, formaldehyde, hydrogen cyanide, nitrogen oxides, phenol, sulfur dioxide, lead, and others.[1] Twenty years ago, in 1992, the U.S. Environmental Protection Agency classified SHS as a Class A known human carcinogen.[2] As such, SHS poses health concerns for all individuals, particularly children and pregnant women.

The reports of direct health effects of SHS exposure are numerous and growing in number. The most comprehensive report of these effects is the 2006 U.S. Surgeon General's report, *The Health Consequences of Involuntary Exposure to Tobacco Smoke*.[3] The report details how even small amounts of exposure can have serious health effects and concludes that there is no safe level of exposure to SHS. SHS can cause or exacerbate a wide range of adverse health effects, including lung cancer, heart disease, stroke, respiratory infections, sudden infant death syndrome (SIDS) and asthma.[4]

The evidence supporting the association of SHS exposure of children with respiratory illnesses is strong. Increased rates of lower respiratory illness, middle-ear infections, tonsillectomy and adenoidectomy, cough, asthma and asthma exacerbations, hospitalizations, and SIDS have been reported.[5] It has been estimated that SHS exposure causes asthma symptoms in 200,000 to one million children.[6] One study indicated that children with asthma who were exposed to SHS had additional co-morbid conditions including higher levels of obesity and less usage compared with unexposed children.[7] The scope of these illnesses is huge: SHS exposure exacerbates many chronic diseases. Children with sickle cell disease who are exposed to SHS have a higher risk of crises that require hospitalization than do unexposed children.[8] Finally, in addition to the exacerbating chronic conditions, SHS is immediately life-threatening, especially among vulnerable populations such as infants. In one year alone, SHS exposure is estimated to have resulted in the death of 900 infants.[9]

Another effect of SHS exposure is increased school absenteeism. Analysis of data from the National Health Interview Survey (NHIS) indicated that 24 to 36 percent of school absenteeism was related to SHS exposure in children ages 6 to 11. The study also showed that the number of days that a child was absent from school predictably increased with the number of active smokers in the household.[10] Even very low levels of SHS exposure, such as those seen in a child with a parent who smokes only outside,[11] have been associated with decreases in reading and math scores.[12]

In addition to SHS exposure for developing children and adolescents, prenatal exposure to SHS has been associated with low birthweight, prematurity[13], and future susceptibility to nicotine addiction as well as significant adverse events in childhood development. One of the significant consequences of prenatal

tobacco exposure is sensitization of the fetal brain to nicotine, which results in increased likelihood of addiction when the brain is exposed to nicotine at a later age. Studies of rodents[14] and primates[15,16] that were exposed prenatally to tobacco have demonstrated subtle brain changes that persist into adolescence and are associated with tobacco use, nicotine addiction, and reduced cognitive function.[17] Population-based human studies have demonstrated associations between prenatal tobacco exposure and early tobacco experimentation[18] as well as increased likelihood of tobacco use in adolescence and adulthood.[19] In addition, further research has indicated adverse developmental effects on infants, children, and adolescents including lessened perceptual skills, deficits in information processing, and a significantly higher likelihood of being diagnosed with attention deficit hyperactivity disorder (ADHD).[20]

Children and the elderly represent a disproportionately large share of fire victims, and smoking materials are the most common ignition source of fatal residential fires.[21] It has been estimated that smoking causes approximately 30 percent of US fire deaths overall, and that smoking-material fires accounted for nearly 20 percent of the 90,000 home structure fire deaths in 2011 according to National Fire Protection Association data.[22] However, the rate of fire deaths has decreased as smoking has decreased, although part of the reduction has been attributed to modifications to cigarette-ignition resistance in mattresses and upholstered furniture.[23]

Residents of Public Housing are Involuntarily Exposed to Secondhand Smoke

SHS is clearly a significant public health hazard, and maintaining a smokefree home is a wise decision to decrease a family's exposure to SHS. Unfortunately, this step alone is not sufficient to prevent all exposure to SHS for residents of multi-unit buildings. Tobacco smoke does not stay confined within a single room nor does it stay confined within a single unit in multi-family apartment buildings. Ventilation systems can distribute SHS throughout a building.[24] SHS can seep through walls and cracks.[25]

Data clearly demonstrate that the residents of smokefree units in multi-family buildings without smokefree air policies are not safe from tobacco smoke exposure. A Boston-based study published in 2009 measured levels of nicotine, an indicator of SHS exposure, in 49 low-income units in multi-unit buildings. Overall, 94 percent of units had detectable nicotine levels, including 89 percent of units where no one smoked in the home.[26]

A 2011 nationally representative study, conducted through the Social Climate Survey, found that among individuals who lived in multi-family housing where no one smokes inside the home, 31 percent smelled smoke in their building. Of these respondents that reported smelling smoke in their building, approximately half (49 percent) reported smelling smoke in their own units, 38 percent reported smelling smoke in their unit at least once per week, and 12 percent reported smelling smoke in their unit at least once per day.[27] This nationally representative study confirms the results of several state- and community-level studies measuring prevalence of smoke incursions into smokefree units.[28] This trend is echoed in a 2012 study that indicated that although 63 million of the 79 million Americans who live in multi-unit housing do not allow smoking in their homes approximately 28 million of those reported secondhand smoke infiltration in their home.[29]

Studies published in 2011 and 2012 confirmed that children who live in multi-unit housing have significantly higher exposure to SHS than those who live in detached housing, and that 15 million children aged 3-11 years were exposed to SHS, representing the highest prevalence of SHS exposure among all age groups. The studies, using data from the National Health and Nutrition Examination

Survey (NHANES), showed that levels of cotinine, a chemical marker of nicotine in the blood, among children living in multi-unit housing were significantly higher than those of children living in detached housing; and that SHS prevalence compared with adults was second-highest among adolescents aged 12 to 19, only superseded by young children.[30,31]

Prevention of Secondhand Smoke Exposure Requires Smokefree Policies

The above evidence clearly demonstrates that residents of multi-family housing are exposed to SHS even if they live in a unit where no one smokes. Therefore, the only way to fully protect children and adults who live in multi-family housing from secondhand exposure is to implement building-wide smokefree air policies. In 2007, the World Health Organization (WHO) presented its clear conclusion that "implementing 100 percent smokefree environments [is] the only effective strategy to reduce exposure to tobacco smoke to safe levels in indoor environments and to provide an acceptable level of protection from the dangers of SHS exposure."[32] The organization reaffirmed its recommendation in 2014 and called for a prohibition on the use of ENDS indoors due to the risks presented by secondhand exposure to the devices.[33]

Partial smokefree policies, such as those that prohibit smoking in common areas such as hallways, will not protect all residents from SHS. The 2011 Social Climate Survey showed that multi-unit residents in buildings with the strongest smokefree air policies were the least likely to report smelling smoke. The data also showed that policies that only prohibited smoking in common spaces—and not individual units—did little to prevent residents from smelling smoke.[34] Research published in the *American Journal of Public Health* has further shown that SHS exposure for nonsmokers persists despite separating smokers from nonsmokers within housing, indicating that partial smokefree policies are not effective in protecting nonsmokers from harm.[35]

Experts in building ventilation agree that keeping individual units smokefree is not sufficient to remove health risks. The American Society of Heating, Refrigerating and Air-Conditioning Engineers (ASHRAE) explained in a policy statement that the only means of effectively eliminating the health risks associated with indoor exposure to SHS is to make the entire indoor area smokefree.[36] Recent research by public health professionals has reinforced the fact that scrubbing and ventilating the air in buildings, cannot completely eliminate exposure SHS and the other harmful substances associated with it.[37]

HUD Must Adopt a Nationwide Smokefree Policy

Our organizations commend the Department of Housing and Urban Development (HUD) for its efforts over the last several years to protect the health of residents of federally assisted housing by encouraging broader adoption of smokefree policies in public housing. In 2009, HUD first encouraged public housing agencies (PHAs) to adopt smokefree policies, and in 2010, HUD extended this recommendation to owners and management agents of other federally assisted housing programs such as the Housing Choice Voucher program (also known as Section 8 housing). A short time after HUD's recommendation for voluntary adoption of smokefree policies, HUD partnered with the American Academy of Pediatrics, the American Lung Association, and the Department of Health and Human Services to publish smokefree housing toolkits for both residents and managers of federally assisted housing, which were intended to help in the implementation of smokefree policies. Most recently, in 2014, HUD released further guidance for PHAs and owners of subsidized housing on implementing successful voluntary smokefree policies in their units.

To date, over 600 PHAs have successfully implemented smokefree policies in some or all units. None of these PHAs have chosen to reverse smokefree policies after implementation. These are important indications that smokefree policies are achievable and have widespread acceptability after they are put in place. However, the current voluntary approach leaves many residents, including 775,000 children, unprotected from the dangers of tobacco smoke in their own homes. Our organizations strongly support HUD's proposed rule to make all public housing smokefree because the only way to protect all residents of public housing is to adopt a nationwide smokefree policy.

All people, regardless of income, should be able to enjoy healthy housing, free of SHS and other dangerous conditions. As private, higher-rent, market-rate buildings increasingly go smokefree, it is important that our poorest and most vulnerable citizens not be left out. The existing lack of smokefree air policies in public housing disproportionately impacts lower-income families who cannot move due to economic, health or other reasons. Higher-income individuals are better able to relocate their families to remove them from an unhealthy environment. Public housing residents are more likely to be members of vulnerable populations: 38 percent are children, 31 percent are seniors, 30 percent are disabled, and 89 percent are classified by HUD as "very low income."[38] Further, many residents in multi-family public housing are renters from low-income populations and are more likely to be racial or ethnic minorities, disproportionately exposing these populations to the dangers of SHS exposure.[39] The 2011 Social Climate Survey showed that multi-family housing residents were more likely to smell smoke in their building if they received government subsidies for their housing.[40] Clearly, the status quo discriminates against vulnerable populations.

Multi-unit housing residents consistently report that they desire smokefree air policies. A majority of residents want smokefree air policies implemented where they live.[41] One study examined the 2012 voluntary implementation of a smokefree policy by the Boston Housing Authority in its housing, indicating that a year after implementation 91 percent knew of the policy prohibiting smoking indoors and 82 percent were strongly supportive of such a policy in their building.[42]

While our organizations believe the health and other benefits of making public housing smokefree are overwhelming, it is likely HUD will receive some comments opposing smokefree housing. One argument that may be raised is that a smokefree policy infringes on a legal activity or a person's right to smoke. While it may be legal to some in some places, it is subject to restrictions on the time and place of smoking in order to protect the rights of non-smokers. Many jurisdictions in the United States have placed restrictions on where smoking is permitted to protect the health of nonsmokers, and these restrictions have been almost universally upheld in court cases.

U.S. law supports many restrictions on the conduct of individuals that affects their neighbors, including prohibitions on nuisances such as excessive noise levels. Smokefree air policies in buildings do not prohibit residents from smoking altogether; they only prohibit residents from smoking in locations that can cause harm to their neighbors. People who smoke could still be allowed to smoke in outdoor locations away from the building that would not pose harm to others. Building-wide smokefree air policies, therefore, do not infringe on any protected liberties or freedoms afforded to a person who smokes. Rather, such policies protect the right of all the children and nonsmokers who reside in shared indoor environments.[43]

Smokefree air policies also have collateral benefits for building managers as nonsmoking units are significantly less expensive to turn over than smoking units when a tenant moves out. Because turnover

costs are two to seven times higher in homes when smoking is allowed, smokefree policies in public housing can result in millions of dollars in savings to PHAs and property managers annually.[44,45] Because the risk of fire is also reduced when smokefree air policies are implemented, some insurance companies offer discounts on property casualty insurance.[46] Reductions in SHS will also lead to lower costs to society, both from decreased health care costs and improved productivity. Smokefree policies may also encourage existing smokers to quit.

As with any worthwhile public health innovation, there will undoubtedly be implementation challenges. However, as HUD points out, hundreds of PHAs have already implemented smokefree air policies and found that these challenges are anything but insurmountable. We urge HUD to closely analyze the comments received in this docket in order to fully understand how these obstacles have been successfully addressed and overcome in many communities around the nation. We believe that many commonly cited objections to smokefree air policies—such as a concern that such measures will increase undesirable loitering outside buildings—have not posed significant problems when a policy is actually implemented.

Enforcement has been raised as a particular challenge, with some arguing that smokefree air policies will result in increased evictions. Displacement and/or eviction of residents is an important issue that can have health and other unintended consequences for residents. Our organizations have seen that proper implementation using resources developed by HUD, as well as consistent and uniform enforcement can prevent almost all of these challenges. In addition, smokefree policy violations should be treated like any other housing policy violation, e.g. restrictions on noise levels and should be addressed, enforced and respected in the same manner and consistency as any other housing provision. Eviction is often a means of last resort for any lease violation and public housing officials whose properties have gone smokefree share that evictions are very rare.

Some have also argued that smokefree policies discriminate against disabled individuals who may be less able to smoke outside. In fact, however, smoking inside buildings discriminates against the greater majority of nonsmoking disabled individuals because they cannot escape tobacco smoke infiltrating their own apartments. Smoking is not a basic human need and therefore does not require reasonable accommodation under the Americans with Disabilities Act. Nicotine addiction can be addressed using available, safe, Food and Drug Administration (FDA) -approved options to help smokers quit. These five forms of nicotine replacement therapy are available as gum, patch, lozenge, nasal spray, and inhaler as well as two non-nicotine medications, buproprion and varenicline. Research has shown that with assistance, smokers can quit. Studies have also shown that at least 70 percent of smokers say they want to quit and over half have made a quit attempt in the past year.[47,48] We recognize that some smokers, especially those with behavioral health or substance abuse issues, may need specially tailored cessation treatments that specifically address these issues. In many circumstances those tailored treatments can be accommodated by working with local health departments and partner organizations. Overall, the rights of the disabled population, including disabled children, veterans, and those with respiratory disabilities, are best protected by smokefree building policies that ensure a safe environment for all residents.[49]

Responses to Specific Questions

1. *What barriers that PHAs could encounter in implementing smokefree housing? What costs could PHAs incur? Are there any specific costs to enforcing such a policy?*

Our organizations recognize the greatest challenges to and barriers with implementation are significantly reduced when there is sufficient lead time before a smokefree policy takes effect. This time allows staff to be trained and residents to be empowered to participate in the rollout and implementation of the policy. Resident involvement from the beginning leads to greater buy-in and with that buy-in comes greater compliance. Examples of such involvement can include:

- Educating staff about why smokefree policies benefit everyone's health (including their own), how smokefree policies will lead to reduced fire hazards and how maintenance costs for units are reduced and turn-over costs are lower for non-smoking units.
- Conducting, if resources permit, a pre- and post-implementation air quality study to detect SHS levels in common and non-smoking units.
- Conducting resident surveys (please see Appendix A) and focus groups to inform the development of the smokefree policy.
- Scheduling multiple meetings with residents 2-3 months before the policy will go into effect to share results from the survey, educate residents about the dangers of SHS, and announce and/or provide resources for residents who want to quit smoking.
- Providing sufficient notification, including lease addendums and signage, making the policy known and clear.
- Allowing residents to help decide where the outside gathering spot for smokers will be. A kick-off event for residents to celebrate the start of the new smokefree policy has also been a successful tactic used by PHAs that have already gone smokefree.

Barriers and less successful implementation are more common when there has been a lack of advance communication with and education of residents. In a 2010 survey of all public housing authorities in Minnesota, conducted by the Public and Indian Housing Minneapolis Field Office, the Office of Healthy Homes and Lead Hazard Control and the American Lung Association of the Upper Midwest, respondents were asked about obstacles to implementing a smokefree policy. Compliance and enforcement were the top obstacles named (30%) followed by accommodating current smokers (19%) and losing occupants (17%).[50]

While our organizations urge that everything be done to help smokers quit, our organizations recognize the importance of accommodating those smokers who may not be initially successful. Previous PHAs have found that creating a covered gathering space for smokers or providing ashtrays to be a very worthwhile expenditure. Other costs associated with implementing a smokefree policy mainly relate to informing residents of the policy, including securing signatures on lease addendums, printing fliers and purchasing smokefree signs. However, as previously mentioned, smokefree policies will ultimately save PHAs money through lower operating and turnover costs for smokefree units as opposed to housing that has been partially or never smokefree. A 2012 study found that operating costs were lower for smokefree housing than partially or never smokefree housing properties.[51]

As stated above, our organizations strongly recommend HUD include the prohibition of ENDS and waterpipe tobacco (hookah) in the final smokefree policy. Exempting ENDS and hookah may make effective enforcement of smokefree policies more difficult. For example, the Duluth, Minnesota housing authority, which allowed e-cigarette use after otherwise going smokefree, reported that when their staff smelled cigarette smoke, they would knock on the door and residents told them they were using ENDS.[52]

Several early smokefree policies were not comprehensive and did not address smoking on balconies, patios or by entrances, which also caused implementation challenges. Our organizations support the HUD proposal, which addresses both of these issues and protects tenant health and safety.

As with any policy, staff time will be required for training and communication. PHAs that have already gone smokefree have found that staff time associated with enforcement is minimal and similar to the enforcement of noise and other nuisance complaints.

2. *Does this proposed rule adequately address the adverse effects of smoking and secondhand smoke on PHAs and PHA residents?*

In general, for the reasons described above, this proposal effectively addresses the adverse effects of smoking and SHS. However, the proposal could better address these adverse effects by: (1) ensuring that the policy applies to all federally supported housing, including privately owned housing, (2) extending the policy to playgrounds, (3) extending the policy to electronic nicotine delivery systems (ENDS), and (4) extending the policy to waterpipe tobacco (hookah). Each of these issues is discussed in more detail below.

3. *Does this proposed rule create burdens, costs, or confer benefits specific to families, children, persons with disabilities, owners, or the elderly, particularly if any individual or family is evicted as a result of this policy?*

The U.S. Surgeon General has found there is no safe level of exposure to SHS.[53] Making all PHAs smokefree will lead to an increased quality of life and increased health for every PHA resident, staff member and visitor. Residents with health conditions including asthma, chronic obstructive pulmonary disease (COPD) and heart disease, will see significant health improvements once they are no longer exposed to SHS, which can exacerbate their diseases. Youth, children and infants will also significantly benefit. SHS exposure among infants and children causes ear infections, asthma attacks, lung infections including bronchitis and pneumonia and causes an increased risk of sudden infant death syndrome (SIDS).[54,55,56]

The benefits of PHAs becoming smokefree will be realized by individuals and families who face significant disadvantages. According to the Department of Housing and Urban Development, 45 percent of PHA residents are African American (compared to 13.2% of the general population), 37 percent are children (compared to 23.1% of the general population) and 95 percent are low to extremely low income.[57] Protecting these vulnerable populations from the dangers of SHS is likely to have a dramatic impact and proper implementation will go a long way in addressing the unintended consequences – including eviction and displacement – associated with this policy.

The regulatory impact analysis discusses but does not include the benefits to smokers who will quit as a result of the new smokefree policy. Approximately 70 percent of smokers want to quit smoking, and adoption of this smokefree policy increases the likelihood that smokers will quit smoking. [58]Smokers who successfully quit can dramatically improve the quality and length of their lives.

Another financial benefit not properly accounted for in the regulatory impact assessment is reduction in lost productivity costs attributed to asthma. Asthma is one of the nation's leading causes of school absenteeism and when children miss school, their parents miss work.[59] As a result, asthma has a tremendous economic toll -- $3.8 billion annually – caused by lost productivity resulting from missed

school and work days.[60] In addition to the reduction in healthcare costs that come from a decreased number of asthma exacerbations, improving the health of individuals with asthma living in public housing will also reduce the number of school and work days missed.

The Centers for Disease Control and Prevention (CDC) estimates that cost-savings for renovation costs will total almost $43 million each year.[61] The smokefree policy will have significant benefits for owners, who may also experience reduced fire insurance costs, as well as residents.

The policy would also significantly reduce risk for both human and property losses caused by fires. According to the U.S. Fire Administration, smoking is the leading cause of fatal fires in residential structures.[62] In the proposed rule, it is estimated there will be a $32 million annual cost savings as the result of the reduction of fires in PHAs – 10 times greater than the regulatory impact analysis estimate of compliance by PHAs for this regulation.

Residents who smoke and have mobility issues may have greater challenges with repeat trips outside to smoke and meet a new smokefree policy that requires smokefree balconies and patios, as well as a 25 foot smokefree zone. While it is imperative that smokefree laws be adopted to protect the public's health, some PHAs have worked in advance with residents who smoke to relocate them to units closer to exits or to elevators. This underscores the need to help all residents, especially those who may have these physical challenges, with cessation treatments. A Rhode Island PHA found when it went smokefree that onsite smoking cessation counseling sessions – either group or one-on-one – were especially important for and utilized by the elderly and disabled.[63]

Evictions must be the very last resort to smokefree policy violations. As with any other lease violations, there should be multi-step consequence procedures for infractions. Smokefree PHAs found that regular dialogue and direct engagement with smokers, including providing tips on how to comply with the policy, can lead to success. Lake County, Illinois Housing Authority begin its smokefree policy in 2008 and while there were some documented violations of the policy, there have been no evictions.[64] Duluth, Minnesota – which fully implemented its smokefree policy in 2010 – only had one eviction related to its smokefree policy and PHA officials said that violating the smokefree policy was not the only violation that led to the tenant's eventual eviction.[65]

4. *For those PHAs that have already implemented a smoke-free policy, what exceptions to the requirements have been granted based on tenants' requests?*

The policy proposed by HUD is to make PHAs smokefree in order to protect all residents, especially children and other vulnerable residents, from the proven dangers of SHS. Our organizations oppose "grandfathering" current residents and allowing them to continue to smoke. Such a provision will lead to enforcement challenges but more importantly, will continue to expose residents to the dangers of SHS. For example, the Duluth, Minnesota PHA tries to accommodate residents' requests as long as they do not "fundamentally change the nature" of the program or policy.[66] Any exceptions or allowances for certain tenants to continue to smoke in their units would fundamentally change the nature of the smokefree policy, which is meant to protect everyone from the dangers of SHS. It would also reduce the savings from maintenance costs and increase fire risk relative to a completely smokefree policy.

Instead, as outlined previously, our organizations suggest that building staff work with residents with physical challenges or mental illnesses who smoke to ensure they understand the policy. Staff might

instead relocate smokers so they are closer to elevators or exits to make outdoor access easier on residents. Further, staff may work with residents who refuse to comply with new smokefree policies to allow them to move without incurring expenses related to breaking their lease.

Our organizations also recommend against "phasing in" smokefree policies across buildings in different units. In Duluth, MN, the PHA phased in smokefree policies across a series of buildings, and the last two were phased in after a year. In addition to the SHS exposure continuing for residents in the final two buildings, a fatal fire occurred in one of the two remaining buildings that allowed smoking indoors.

5. *For those PHAs that have already implemented a smoke-free policy, what experiences, lessons, or advice would you share based on your experiences with implementing and enforcing the policy?*

Our organizations fundamentally recognize the importance of clearly articulating that smokefree policies are *about protecting everyone from SHS and not about smokers*. Residents must understand that while they do not have to quit smoking to live in the building, they must help maintain a smokefree environment within the smokefree perimeter established around the building, including inside the structure. While our organizations strongly encourage PHAs to partner with local departments of health, hospitals, community health centers and nonprofit organizations to assist residents who want to quit smoking, the emphasis must be on protecting everyone from the dangers of SHS.

PHAs that have already implemented such policies found that communication and education were key to success. They also found that a long lead time was important to allow for sufficient communication and education. In some cases, education of staff and residents began more than a year in advance of the smokefree implementation date so that residents had time to get the help they needed to make a successful quit attempt. An implementation plan with a long lead time also allows for resident surveys to be conducted, for sufficient notice for residents about the impending change, for staff and resident education sessions, for signage to be created and for cessation services to be arranged for residents.

Basic education about the dangers of SHS and how smoke can migrate between units is necessary. While many staff and residents may understand that exposure to SHS is not healthy, they may not fully understand how dangerous it is and how it infiltrates between units in multi-unit housing. Officials in Rhode Island found that most residents wanted to be good neighbors but did not realize that smoke travelled into nearby units. Another housing authority official found it helpful to ask residents if they could smell their neighbors' cooking from their units or hallways, and pointed out that SHS travels similarly.

Other suggestions from smokefree PHAs and our organizations that worked with them include:

- Working with tenants to determine whether a designated outside smoking area is appropriate and if so, where it should be.
- Ensuring addendums for smokefree policies are included in the lease that outline violations and consequences.
- Documenting each infraction of the smokefree policy so that a record of all communications with residents is created – including efforts to assist tenants in addition to enforcement.
- Listening to residents' concerns and giving them ample lead-in time to adjust to the new policy but also enforce it.

- Helping staff and residents understand how smokefree policies will benefit both them and their neighbors – from the health benefits to the cost savings associated with maintenance and reduction in fire dangers.
- Providing resources to smokers who want to quit smoking to ensure they have help doing so. PHAs that are already smokefree have noted that offering cessation assistance *before* the policy takes effect is critical.

Our organizations also understand and have seen that the vast majority of tenants are happy with smokefree policies after they are implemented. This mirrors satisfaction with smokefree regulations put in place in other environments including bars, restaurants, and workplaces.

6. *For those PHAs that have already implemented a smoke-free policy, what tobacco cessation services were offered to residents to assist with the change? Did you establish partnerships with external groups to provide or refer residents to these services?*

Anecdotal reports from many PHAs that have already implemented a smokefree policy found that providing smoking cessation services well in advance of the implementation date helps smokers prepare for implementation and reduce policy violations. In addition, providing quit smoking resources for a period after implementation helps smokers who are having trouble quitting and can even show goodwill on the part of the PHA.

Many of the PHAs that are already smokefree have referred residents to state Quitlines for services. Some quitlines provide free nicotine replacement therapy to callers in addition to providing counseling services.[67] The U.S. Public Health Service has found that combining FDA-approved quit smoking therapies with counseling services are the most effective for successful quit attempts.[68]

Many PHAs have found it helpful to partner with local public health groups and/or hospitals. The American Lung Association has worked with PHAs to provide cessation resources via door hangers and resident education sessions, tied quitting with promotions such as the American Cancer Society's Great American Smokeout, and provided fliers and quit kits for distribution. In a number of instances, a local hospital provided group counseling to residents. Rhode Island PHA officials found that onsite cessation counseling sessions were most important for elderly and disabled residents, whereas other residents may find Quitline or text messaging to be more accessible.[69]

Recognizing the significant overlap between PHA residents and Medicaid recipients, state Medicaid programs also have the opportunity to increase access to quit smoking benefits including medications and counseling. According to the American Lung Association, only three state Medicaid programs cover a comprehensive quit smoking benefit and another 27 states cover all seven FDA-approved medications. Virtually all states still have significant barriers that make it harder for smokers to access that benefit.[70] Partnerships between PHAs, health departments and Medicaid staff can increase access to coverage and services that will ultimately help residents quit smoking.

Other partnerships might include federally qualified health centers and local health departments that can also assist smokers in getting the help they need to quit. We strongly recommend that HUD continue to provide resources and best practices for PHAs to link their residents who smoke to the cessation services available.

7. *Are there specific areas of support that HUD could provide PHAs that would be particularly helpful in the implementation of the proposed rule?*

Representatives from many of our organizations who have worked with PHAs recommend:

- Template signage, including multiple choices to allow for a variety of building layouts;
- Toolkits containing sample timelines on how best to implement smokefree policies, education materials for staff and residents, including sample resident surveys, lease addendums, a sample "FAQ" document for residents and tobacco cessation materials.

8. *Should the policy extend to electronic nicotine delivery systems, such as e-cigarettes?*

Smokefree policies should extend to the use of electronic nicotine delivery systems (ENDS). The nicotine-containing liquid aerosolized by ENDS has been found to contain several harmful compounds, including heavy metals and tobacco-specific nitrosamines, which can be carried over from the tobacco into the liquid during the nicotine extraction process.[71,72] Even propylene glycol, a main ingredient of ENDS solution that is often claimed to be "harmless" has been shown to cause acute eye and upper respiratory irritation for those exposed to exhaled vapor, even in non-asthmatic patients.[73]

There is insufficient research on the long-term effects of using e-cigarettes, which involves regular inhalation of nicotine, glycerin or some other solvent, and other additives.[74] According to the CDC, e-cigarette aerosol is not harmless "water vapor" and it is not as safe as clean air.[75] E-cigarette aerosol contains nicotine, which is absorbed by users and bystanders.[76] Studies have found other chemicals and toxins present in some e-cigarettes, including formaldehyde, acrolein, volatile organic compounds like toluene, tobacco-specific nitrosamines, and metals like nickel and lead.[77] These compounds are generally present at levels much lower than in cigarette smoke, although the compounds themselves are found on FDA's list of harmful or potentially harmful substances.[78] Because e-cigarettes are not yet regulated by the FDA and are available in hundreds of different brands[79], there is no way for consumers to know for sure what is in the products or the aerosol.[80] Preliminary animal model data has shown damage to growing lungs resulting from second-hand exposure to ENDS aerosols. Two studies show developmental changes and organ effects in mice exposed to ENDS aerosols.[81] The negative health impact of ENDS on non-users, including children, deserves more research.

In addition, the manufacture of ENDS is currently unregulated by the federal government and there is not a standardized method for safety testing. Recent studies have shown that due to the extensive variability in design and function, as well as the relative ease with which users may make modifications to the battery, case, and heating element of these products, explosion and fire hazards have been seen with these products.[82] An October 2014 report from the U.S. Fire Administration found that improper use of charging devices can lead to explosion and fire and that because of the shape and size of ENDS, they can behave like "flaming rockets" when a battery combusts.[83] In 2015, the Federal Aviation Administration released a "Safety Alert for Operators" around ENDS in checked bags. In the alert, the FAA highlighted examples of ENDS that have caught fire when the heating element was activated by accident.[84] The report and alert highlight the risk posed to housing units from ENDS and underscores that from a safety perspective, ENDS use indoors should also be prohibited.

Lastly, use of ENDS in smoking-restricted areas would make it more difficult to enforce smokefree policies since use of ENDS often looks indistinguishable from cigarette smoking.

9. Should the policy extend to waterpipe tobacco smoking? Does such smoking increase the risk of fire or property damage?

Smokefree policies should extend to the use of waterpipe tobacco (hookah). According to the CDC, SHS from hookah – which comes from both the tobacco and the charcoal typically used to heat it – poses health risks to nonusers.[85] A study conducted in Virginia showed that air quality in waterpipe cafes was worse than in restaurants that permitted cigarette smoking. It also showed that air quality in non-smoking rooms in waterpipe cafes was poor, demonstrating how SHS from hookah can easily travel to adjacent spaces.[86] One study showed that the exposure of nicotine, tobacco-specific nitrosamines, and cilia/cardio-toxins such as acrolein in children in the homes of daily, and even weekly or monthly, hookah smokers was significantly higher than in children living in nonsmoking environments, representing a serious threat to child health.[87] The heat source used with hookah also poses risks of fire and other property damage.

Additional Recommendations

25-Foot Buffer Zone

Our organizations are supportive of the proposed 25-foot buffer zone from entrances, exits, windows and ventilation intakes of buildings in the proposed rule, and including patios and balconies in the policy. This buffer zone will assist with enforcement by ensuring that SHS does not drift back into living units from outside or require residents, staff or visitors to walk through clouds of SHS around entrances or exits from buildings. One study that looked at SHS exposure outside restaurants and bars found that exposure to SHS was higher than normal outdoor air levels.[88] Some early adopters of smokefree policies that did not include a sufficient buffer zone, or allowed smoking to continue on balconies and patios found that residents did not want to walk through a "wall of smoke" on their way into the building and that SHS still came into units when smoking occurred on balconies, patios or outside windows.

Implementation Timeframe

Our organizations strongly support HUD's proposal to ensure all PHAs are smokefree within 18 months of the final regulation being released. Experiences from the PHAs that are already smokefree show that an effective implementation can occur within an 18 month period. That will allow PHAs to educate their staffs, empower and involve their residents in implementation, secure addendums for leases and work with public health partners to ensure residents who want to quit can get the help they need.

Our organizations also encourage HUD to finalize this rule within six months to ensure adequate implementation before the end of the Administration.

Inclusion of All Federally Supported Housing

The proposed rule would only apply to public housing, but would not apply to housing units in mixed-finance developments. It would also not apply to privately owned, federally subsidized multifamily housing such as project-based Section 8 housing. The type of housing program a family participates in should not dictate whether that family is protected from the harms of SHS. We strongly urge HUD to apply the smokefree housing rule to all types of housing that are supported by the federal government.

HUD has been a leader in protecting children living in housing supported by programs such as Section 8 from the hazards of lead-based paint. SHS exposure has been linked to higher blood lead levels in

children.[89] Extending smokefree policies to Section 8 housing would be consistent with HUD's other efforts to protect the negative health consequences associated with lead exposure.

If HUD chooses not to require all supported housing to implement smokefree policies, we suggest that HUD, at a minimum, include smokefree policies in all model lease language published by the agency.

Inclusion of Playgrounds

The proposed rule specifies that PHAs may prohibit smoking near playgrounds, but unfortunately stops short of requiring that smokefree policies extend to outdoor spaces designed for use by children. We strongly recommend that the final rule extend the smokefree policy to playgrounds outside the 25-foot buffer zone around buildings. It would be serious missed opportunity if this rule protects children from SHS in their homes but fails to protect them where they play outdoors. Therefore, we recommend that playgrounds and other outdoor facilities intended for use by children be added to the definition of "restricted areas" in §965.653(a). We further recommend a 25-foot buffer zone around such playgrounds.

Clarification on Indoor Spaces

In §965.653(a), HUD proposes to prohibit smoking in "all public housing living units and interior common areas." We recommend that the word "common" be struck from this paragraph in order to clarify that smoking would be prohibited throughout the entire building. For instance, this would clarify that indoor spaces where residents are not typically allowed, such as utility rooms and maintenance facilities, would also be included in the smokefree policy.

Clarification on Ability to Prohibit All Tobacco Products

In §965.653, HUD proposes policies prohibiting the use of "lit tobacco products." Above we recommended expanding the proposal to include ENDS and hookah. If HUD chooses not to extend the policy to either ENDS or hookah, we urge HUD to specify in §965.653 that PHAs may choose to do so voluntarily.

Conclusion

Thank you for moving forward on this critical public health issue. We look forward to continuing to work with HUD to promote healthy living environments, free of exposure to SHS, for all children and adults. Many of our organizations also advocate for smokefree workplace laws as well as policies to ensure that all smokers have access to proven cessation services to help them quit, particularly smokers who are newly insured, Medicaid-eligible, and uninsured. If you have any questions, please contact James Baumberger at the American Academy of Pediatrics (202.347.8600) or Erika Sward at the American Lung Association (202.785.3355).

Sincerely,

Action on Smoking & Health
Alpha-1 Foundation
American Academy of Family Physicians
American Academy of Oral and Maxillofacial Pathology
American Academy of Otolaryngology—Head and Neck Surgery
American Academy of Pediatrics
American Association for Respiratory Care
American Cancer Society Cancer Action Network
American College of Osteopathic Surgeons
American Congress of Obstetricians and Gynecologists
American Heart Association
American Lung Association
American Osteopathic Academy of Orthopedics
American Public Health Association
American School Health Association
American Society of Addiction Medicine
American Thoracic Society
Association of State & Territorial Health Officials
Campaign for Tobacco-Free Kids
Cancer Prevention and Treatment Fund
ClearWay Minnesota
Community Anti-Drug Coalitions of America
COPD Foundation
Geographic Health Equity Alliance
Green and Healthy Homes Initiative
International Association for the Study of Lung Cancer
March of Dimes
National African American Tobacco Prevention Network
National Association of County and City Health Officials
National Hispanic Medical Association
National Latino Alliance for Health Equity
National Network of Public Health Institutes
Nemours Children's Health System
North American Quitline Consortium
Oncology Nursing Society
Prevention Institute
Society for Public Health Education

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