August 14, 2014

Administrator Gina McCarthy
U.S. Environmental Protection Agency
1200 Pennsylvania Avenue, NW
Washington, DC 20460

Re: Agricultural Worker Protection Standard Revisions; Docket ID # EPA-HQ-OPP-2011-0184

Dear Administrator McCarthy:

Thank you for the opportunity to comment on the proposed revisions to the Worker Protection Standard. I write on behalf of the American Public Health Association, a diverse community of public health professionals who champion the health of all people and communities. APHA and its 53 affiliated state and regional public health associations represent 50,000 public health professionals. APHA brings a 140-plus year perspective from all fields of public health, including occupational health and safety, environmental health, children’s health and immigrant health. APHA firmly believes that the occupational health and safety of workers is a public health priority, and we have a long history of supporting measures to protect workers and improve occupational health and safety.

We write to support many aspects of the proposed WPS that foster worker health and safety for an estimated 2 million workers across the United States who harvest our food. These workers, the majority of whom are immigrants from Mexico and other Central American countries, are the most overexposed population to pesticides.

Prevention of occupational disease, injury and exposure is fundamental to worker health and safety. APHA believes the protection of agricultural workers and their families, immigrant workers, including farmworkers, and workers exposed to pesticides is a critical public health concern and believes stronger, protective measures are urgently needed.1,2,3,4,5

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More importantly, we wish to underscore the standard and universally accepted public health best practice for control of worker exposure to chemicals – the industrial hygiene “hierarchy of controls.” Under the hierarchy of controls, risk reduction is based on the following preferred order of controls: elimination, substitution with less hazardous materials, engineering controls (such as closed systems), warnings, administrative control, and personal protective equipment. While we commend the U.S. Environmental Protection Agency for proposing to strengthen the WPS, we are concerned that the revised WPS largely relies on the least protective measures for workers – PPE and administrative controls. We therefore urge EPA to apply the hierarchy of controls principle to strengthen protections for farmworkers.

We also emphasize the public health benefit of preventing injury, illness and exposure. While there are costs associated with the protection of this important and vulnerable workforce, there is also an extraordinary cost to workers, farmers and our society for occupational illness and injury in terms of medical care, lost work days, lost wages, and potential workers’ compensation insurance premiums for an occupational injury or illness. At the price of more than $250 billion a year, occupational conditions are the second costliest medical condition behind cardiovascular disease and ahead of cancer. The cost of illness and injury as a result of work-related pesticide exposure is challenging to assess. This is largely due to the current weaknesses in our regulations, formal and informal exclusions from the workers’ compensation systems, challenges in clinically confirming the diagnosis of pesticide poisonings, lack of understanding regarding incident reporting as well as patchwork surveillance systems. Additionally, many workers do not report overexposures as they do not understand their rights and fear losing their jobs. Prevention policies and programs are cost-effective, reduce health care costs, and can improve productivity.

Detailed below are the areas of the rule that we strongly support, and those areas in need of strengthening in order to better protect farmworkers.

**Training Frequency** – APHA supports annual pesticide safety training for farmworkers and pesticide handlers. An informed workforce is an important first step in worker protection. Annual training will reinforce important pesticide safety practices and information to help workers better protect themselves and their families from pesticide overexposure. Studies indicate that workers who have been trained in the preceding year retain more information from new training than those whose previous training is more than two years old; that workers maintain information but begin to show some drop-off at five months; and that knowledge gains are correlated with improved self-reported use of PPE. Pedagogically, it is unreasonable to expect a workforce characterized by limited formal education and low levels of literacy to retain training content beyond one year. Moreover, workers in most other industries receive annual safety training and farmworkers deserve the same protection.

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Training Content – APHA supports expanding the content of the required training for workers and handlers, underscoring the importance of including the proposed topics of worker rights, emergency assistance and ways to minimize paraoccupational exposures or pesticide “take home” exposures. Additionally, we call for the EPA to emphasize training regarding the possible reproductive health effects of pesticide exposure. We also recommend that EPA be mindful of the needs of workers and some handlers due to low income, low literacy and limited English language when revising the training standards. The training should be provided in meaningful interactive formats that include training in a language that the individual understands.

Training Grace Period – APHA supports the elimination of a grace period for worker training. Any training grace period severely undermines the intent of the WPS. An untrained worker is more vulnerable to pesticide overexposure and should not be put at risk.

Minimum Age – APHA supports the establishment of a minimum age of 18 rather than the proposed minimum age limit of 16 for pesticide handlers and early-entry workers. Children younger than 18 are still developing both physically and mentally, and high levels of exposure to pesticides could have life-long health effects. Furthermore, most minors do not have the maturity to follow all label instructions or take the necessary precautions to ensure their safety and the safety of other workers.11,12 Children working in other industries are prohibited from engaging in high hazard tasks.13 Children employed in agriculture should be afforded the same protections as children working in other hazardous industries.

Hazard Communication – APHA does not support EPA’s proposal to eliminate the current requirement for a central posting location for pesticide application information. We support EPA’s clarification that this information, in addition to the Safety Data Sheets and labeling for pesticide applications, must be made available to workers’ representatives such as clinicians, attorneys and union representatives. Particularly in the case of workers injured by pesticides, it is critical for workers’ representatives to be able to obtain accurate, timely information about the pesticides to which workers may have been exposed. However, specific information about the pesticides applied and the hazards they pose must be made available to workers universally, in advance of pesticide applications. Such information should be available in nonemergency situations and it should not require any type of request from the worker or worker representative. Workers may not understand that they have the right to request such information. If workers do understand, many will be reluctant (for fear of job loss) or unable due to language barriers to ask their employer for the information.

Additionally, we recommend requiring availability of SDSs in Spanish as well as English both in a central location and electronically using a smart phone scan code. SDSs in Spanish and other written languages should now be readily available, because format and basic content of SDSs has been harmonized internationally to comply with Globally Harmonized System requirements. Labels should also be made available electronically, as well as at a central location and provided in Spanish and other languages when available.

Monitoring Handler Exposure to Cholinesterase Inhibiting Pesticides – APHA supports medical monitoring of pesticide handlers who mix, load or apply Toxicity Category I or II organophosphates or N-methyl carbamates. Monitoring programs have been successfully implemented for 40 years in California and over 10 years in Washington State, substantially helping to prevent overexposure of handlers. We strongly disagree with EPA’s decision not to implement such a program nationwide based on its determination that these programs are “reactive, catching incidents after they occur rather than working to stop them from happening.” This analysis contradicts some of the very basic tenets of public health. Medical monitoring programs are essential preventive measures, which successfully stop handlers from being overexposed by identifying subclinical evidence of exposure, prompting review of primary prevention practices. Medical monitoring is common in other industries and OSHA has promulgated over 25 specific standards for medical screening of workers exposed to hazardous substances.14 Pesticide handlers deserve the same protections that are afforded to workers in other industries.

Clinical Diagnostic Tools and Monitoring Workers for Pesticide Exposure – APHA believes biomonitoring is critical to protecting agriculture workers from over exposure to pesticides.15 Health care providers have few clinical diagnostic tools readily available to help to better recognize and manage pesticide exposures. Additional information offered by a confirmatory diagnostic test is essential in providing information clinicians need to treat overexposed workers and handlers and to ultimately provide EPA with frontline data necessary to understand the health effects of registered pesticides. Providing clinicians with the clinical diagnostic tools they need to make the most accurate diagnosis possible should be a central part of worker protection, a feature that is glaringly absent in the proposed rule. The Agency for Toxic Substance and Disease Registry, National Conversation on Public Health and Chemical Exposures Action Agenda, also calls for clinical diagnostic tools and states: “To more fully prepare healthcare providers to address chemical exposures, validated clinical diagnostic tools similar to blood lead testing are needed.”16

Emergency Assistance – APHA supports EPA’s proposal to clarify when employers must make transportation to a medical facility available to workers and handlers. However, transportation should be made available within 3–4 minutes if the injury is life-threatening or 15 minutes if it is not life-threatening upon learning of an exposure, and not within 30 minutes. We support the proposal to require employers to provide to the worker, handler or the treating medical personnel the relevant SDS and pesticide label, or all of the pertinent information in an alternate form (as opposed to waiting for it to be requested). In certain circumstances, employers should be required to document the time and length of the exposure and report it to the worker and clinician.

Informed and Prepared Clinicians – APHA applauds EPA’s recognition that clinicians play an important role in worker protection. In addition to requiring employers to provide treating medical personnel with pertinent pesticide exposure information, we urge EPA to consider

further measures. EPA should help clinicians to improve their recognition and management of pesticide overexposure by 1) supporting the development of clinical diagnostic tools, and 2) providing training and technical assistance for clinicians. A survey of environmental medicine content in U.S. medical schools found that 75 percent of schools require only about seven hours of study in environmental medicine over four years. Not surprisingly, clinicians are often unprepared to recognize, manage, or help prevent exposure-related illness. APHA echoes the recommendation outlined in the ATSDR National Conversation on Public Health and Chemical Exposures Action Agenda that “Clinicians need a set of skills and tools for 1) diagnosing, treating, and intervening to prevent chemical exposures, 2) providing information about chemical exposures to their patients and communities, and 3) participating in surveillance for chemical exposures and health effects.”

Respirator Training and Fitting – APHA supports requiring employers of pesticide handlers to comply with OSHA-equivalent training on respirator use, fit-testing of respirators, and medical evaluation requirements whenever a respirator is required by the labeling. However, the rule should also include the OSHA requirement for each employer to adopt a worksite-specific respiratory protection program to address in detail how respirators are properly selected, cleaned, stored, repaired, and replaced. Furthermore, we disagree with EPA’s decision to exclude dust or mist filtering masks, since a majority of pesticides with label requirements for handlers to wear respirators only require dust/mist filtering respirators. Medical evaluation, fit-testing and training should be required for all types of dust/mist filtering respirators.

Decontamination Supplies – APHA supports the EPA recommendation to require employers to provide decontamination supplies that include one gallon of water per worker for routine washing and emergency eye flushing, soap, and single use towels and at least three gallons of water per worker for decontamination for workers performing tasks in an entry-restricted area. We also recommend that EPA require further decontamination supplies including shower facilities onsite. We recommend following the American National Standard Institute standard (Z358.1-2009) for emergency eyewash and shower equipment and require an emergency shower that can deliver water at 20 gallons per minute for 15 minutes.

Contaminated Personal Protective Equipment – APHA supports the EPA proposal to require employers to render contaminated PPE unusable before properly disposing of PPE that cannot be decontaminated according to the manufacturer’s instructions. Such measures will prevent adverse health effects resulting from the wearing of contaminated garments.

Closed Systems for Mixing and Loading – APHA supports the EPA proposal to clarify the criteria for closed systems by adopting the California standards for system design. However, EPA should go further and adopt, at a minimum, the California standards requiring the use of closed systems for highly-toxic categories of pesticides. As noted above, under the industrial hygiene hierarchy of controls, engineering controls are preferred over PPE. It therefore is

appropriate for EPA to require the engineering control of closed system as the primary protection for pesticide handlers rather than PPE. Closed systems are already used extensively in California, and for some pesticides and certain types of uses across the country. The proper use of closed transfer systems for mixing and loading pesticides reduces the potential for human exposure from spills, splashes and blowing, and this type of engineering control – rather than PPE – should be the first line of defense against pesticide exposure.

**Drift Protections** – APHA supports the EPA proposal to require handlers to cease application if someone other than a trained and properly equipped handler enters treated or surrounding areas. We also support the establishment of entry-restricted areas adjacent to the treated areas in farms and forests. But, as proposed, these protections apply only to fields on the farm that was sprayed. This safeguard should extend to workers in harm’s way who work at a neighboring establishment. Though modest in scope, the proposed entry-restricted areas are a step in the right direction to protect workers and others in the immediate vicinity of pesticide applications.

**Early Entry Restrictions** – APHA believes that early reentry for fieldwork should only be allowed in true agricultural emergencies. Worker protection during early reentry is largely dependent upon proper use of PPE. Many of the tasks involved with early reentry such as moving irrigation pipes and performing hand labor tasks may be cumbersome with required PPE. Given the nature of the tasks as well as the potential for escalating heat stress with PPE, there is potential for improper use or no use of PPE. The proposed improvements in training and age restriction cannot adequately mitigate these risks. In addition, we oppose the relaxing of the early reentry restriction for irrigators, allowing early reentry even if the need for irrigation could have been foreseen before the pesticide application. Irrigators are at high risk of pesticide poisoning because they tend to work long hours. They also often work alone with no coworker to assist in calling for help in case of pesticide or heat illness.

In conclusion, APHA strongly urges you to adopt these recommendations to strengthen the WPS. EPA can better protect the health and well-being of farmworkers by bringing the WPS more closely into line with protections offered to workers in other economic sectors.

Sincerely,

Georges C. Benjamin, MD
Executive Director