Why We Should All Support IPM in Schools as a Top Priority for our Nation

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This fall, 50.4 million students and six million staff returned to more than 100,000 schools in 13,500 districts across the US. Unfortunately, only 15-20% of those districts have key indicators of effective IPM programs (Green and Gouge 2015). Key benefits of IPM in schools include:

- 1. **Lowering exposure to pests and pesticides** IPM programs in schools have reduced pest complaints <u>and</u> pesticide use by up to 90% (Reviewed in Chambers *et al.* 2011).
- 2. Improving student attendance and performance.
 - a. Asthma is the number one cause of student and staff absences in schools.
 - b. Cockroach allergen levels in schools have been highly significantly correlated with student asthma prevalence (Amr *et al.* 2003).
 - c. Pest-related asthmagens can be more prevalent in schools than homes; students in classrooms with higher mouse allergens were absent more (Sheehan *et al.* 2009).
 - d. Students missing two or more days of school per month have lower grades (Balfanz *et al.* 2013).
 - e. Schools have increased graduation rates by 8-50% and improved student grades by improving attendance rates (Baltimore Education Research Consortium 2011, Roderick *et al.* 2014).
 - f. Multiple states distribute funds based on attendance; absences can cost school districts as much as \$93 per student per day.
- 3. **Saving money**: Up to \$32,000 in annual pest control cost savings have been reported by school districts transitioning to IPM (reviewed in Chambers *et al.* 2011).
- 4. **Reducing food safety risks**: *E. coli* and *Campylobacter*, *Histoplasma*, *Listeria*, *Salmonella* spp. are among the pathogens with well-documented associations with cockroaches, flies, rodents and/or birds (Bonefoy *et al.* 2008).
- 5. **Additional benefits include** reducing risk of insect stings and allergic reactions, lowering fire risk by eliminating rodent chewing on wires, and reducing heating and cooling losses by installing door sweeps that keep insects and rodents out!

USDA, US EPA and the Centers for Disease Control and Prevention recommend IPM for schools. School IPM has been an EPA Administrator priority since 2010, and in 2016, EPA convened a <u>roundtable</u> with leaders representing 21 national organizations committing to support IPM in schools. The National School IPM Working Group with more than 200 members has been coordinating and collaborating since 2008, and members have led development of <u>Stop School Pests</u> standardized IPM training soon to be launched for nine key roles in schools, including food service, custodial and maintenance which are so critical to pest prevention, and <u>ISchool Pest Manager</u> which is now available as a portal for high quality educational resources. The nationally coordinated effort measured a 4x increase in states with school IPM programs, a 4x increase in IPM communications, and 3x increase in participation in IPM training between 2008 and 2012, and remains committed to <u>IPM in all of our public K-12 schools by 2020</u>.

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