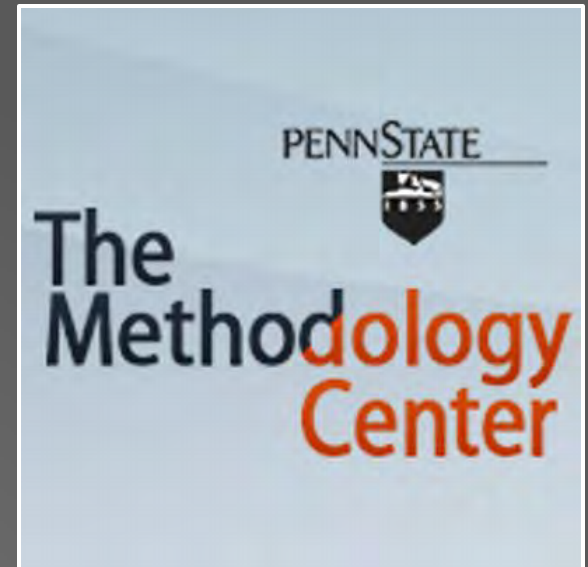
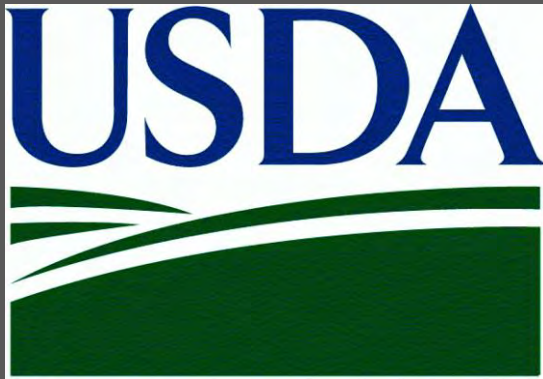


BMSB Nuisance Survey Results

Kevin Rice, Cara Rice, George Hamilton, and Tracy Leskey



2014-2016 BMSB IPM WG Objectives

Objective 2. Identify and address needs of consumer and pest management professionals.

For this objective, we will use 1) use pre/post survey tools to measure knowledge gained by our BMSB IPM Working Group membership regarding needs of consumer and pest management professionals and 2) pre and post knowledge surveys to measure knowledge gained and IPM practices implemented by pest management professionals through our targeted webinar series

BMSB Nuisance Survey

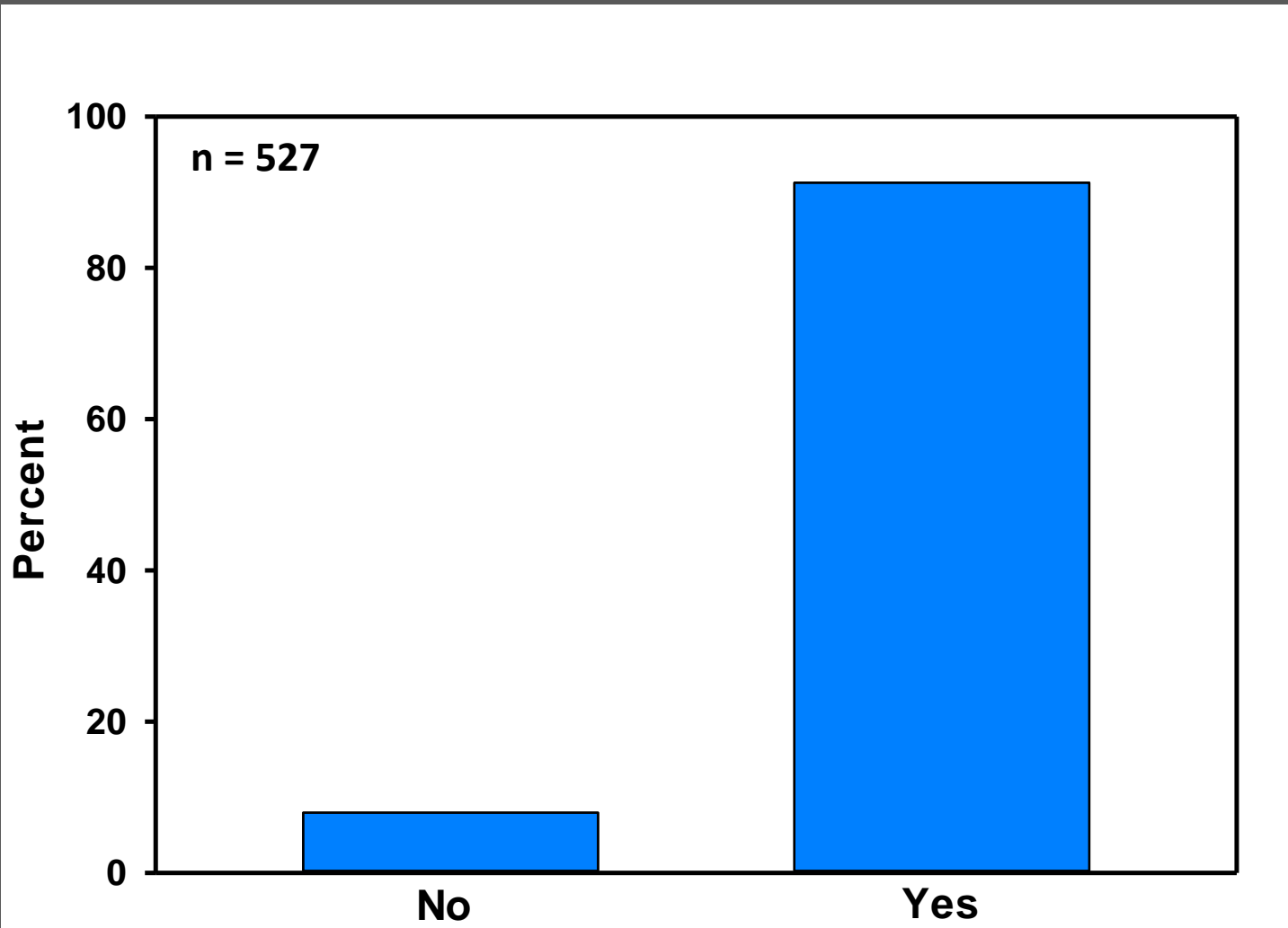
- 2015-2016
- Survey administered via StopBMSB.org
 - SurveyMonkey
 - Website
 - Media interviews
 - Extension
- 527 respondents



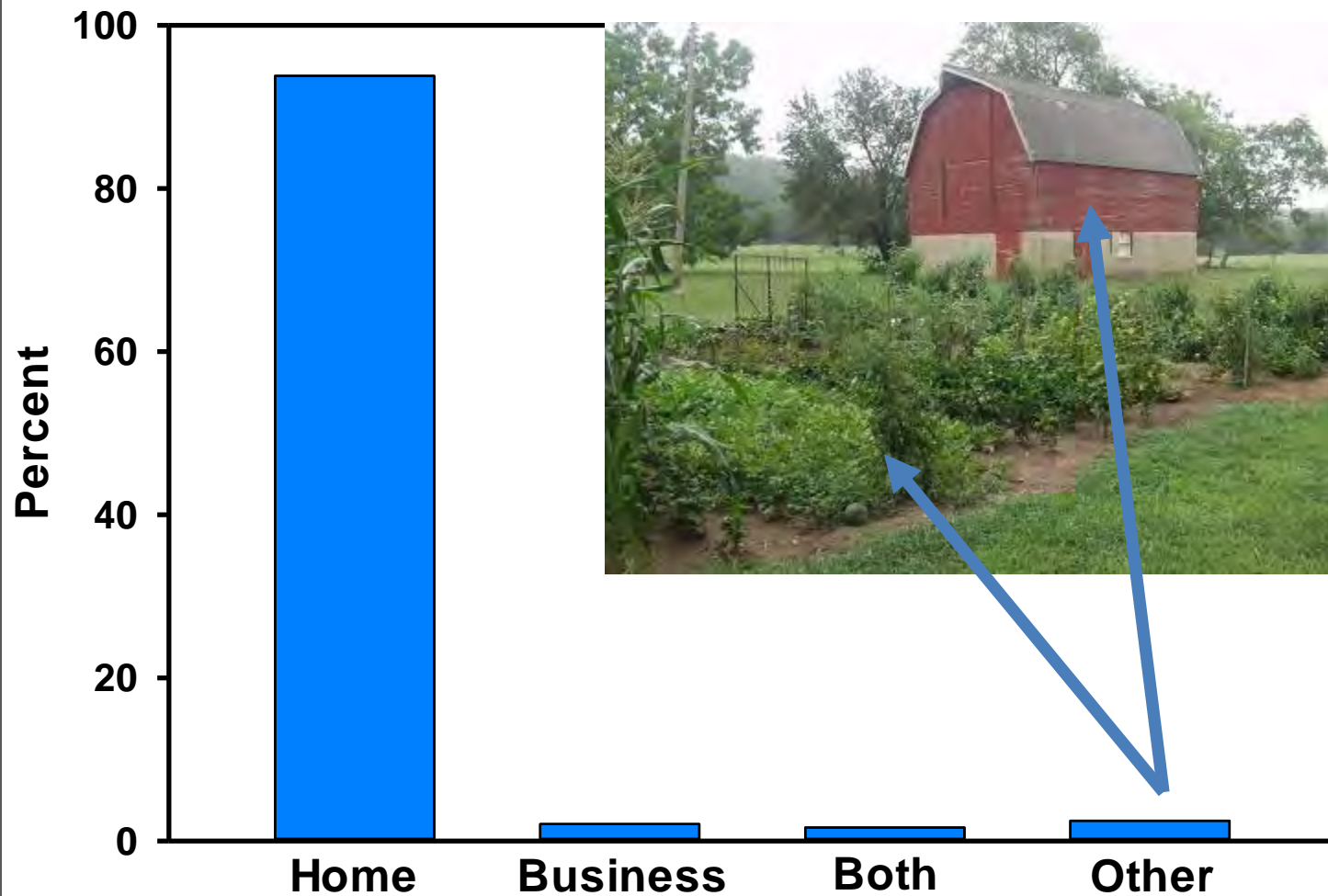
Objectives

- 1) Descriptive data from survey
 - 2) What predicts participant perception of seriousness of BMSB problem?
 - 3) Evaluation of Extension Programs
- *all analyses are preliminary and may be further refined

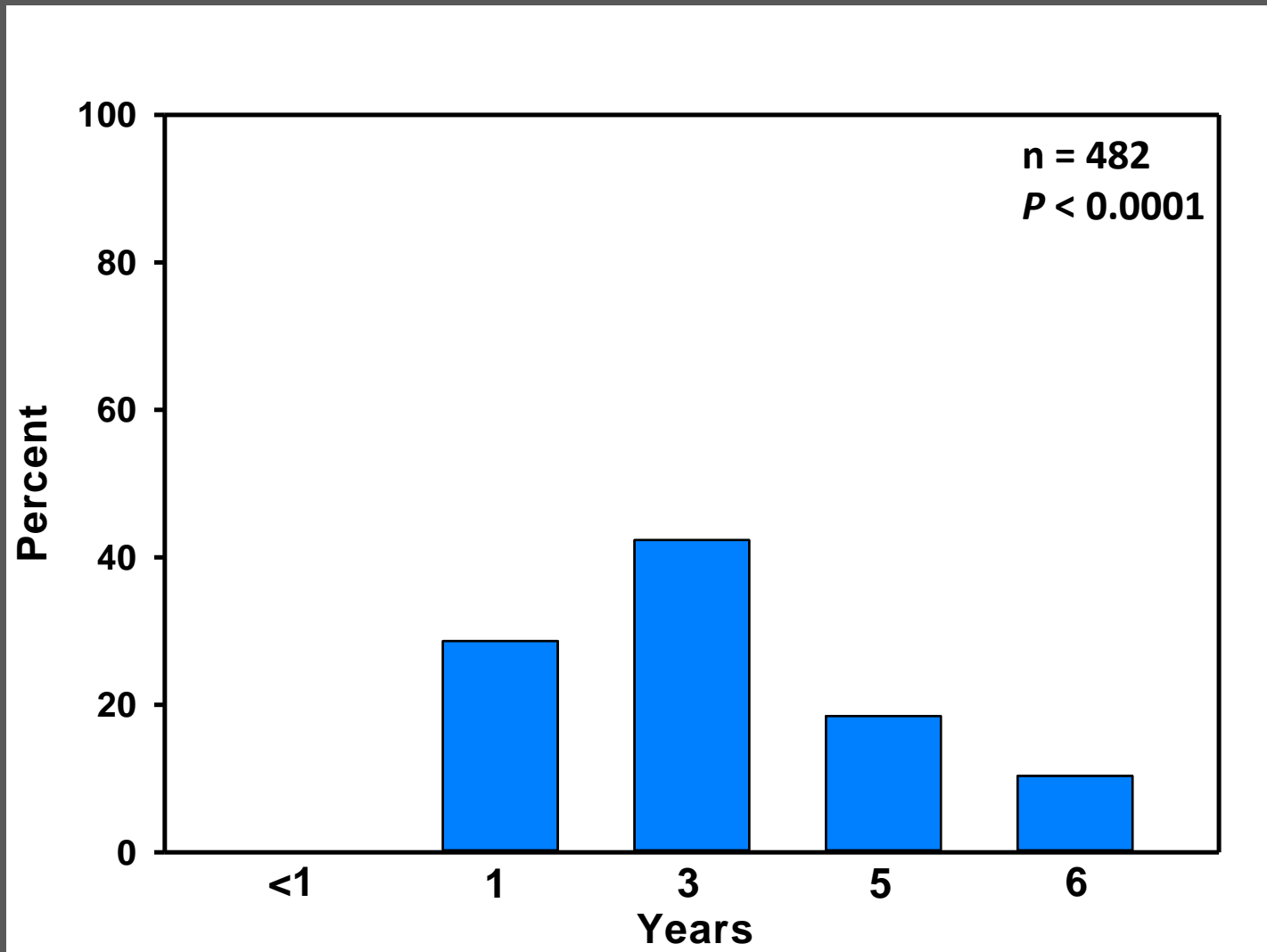
Have you had BMSB problems at your home or business?



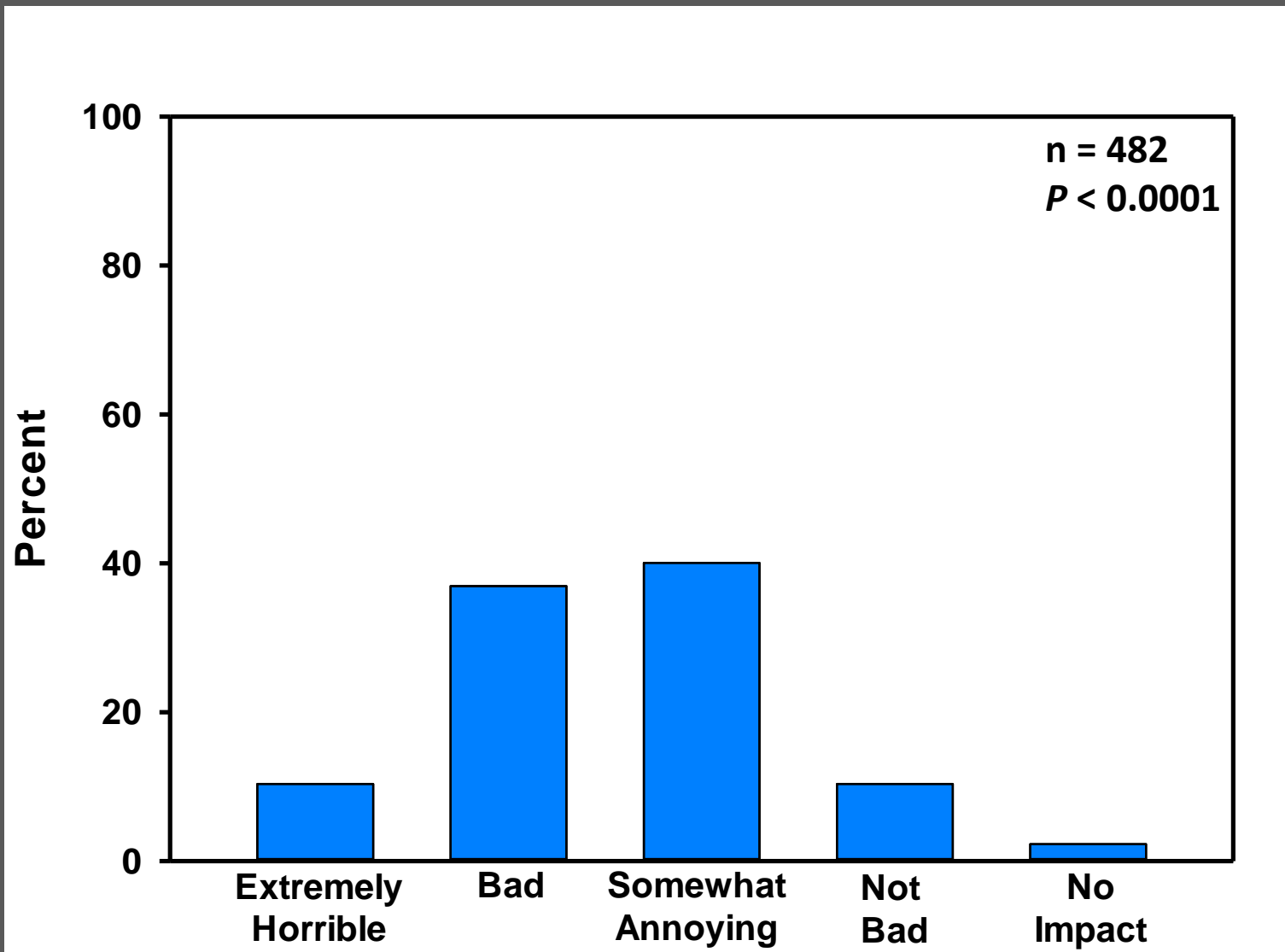
Where are your BMSB problems located?



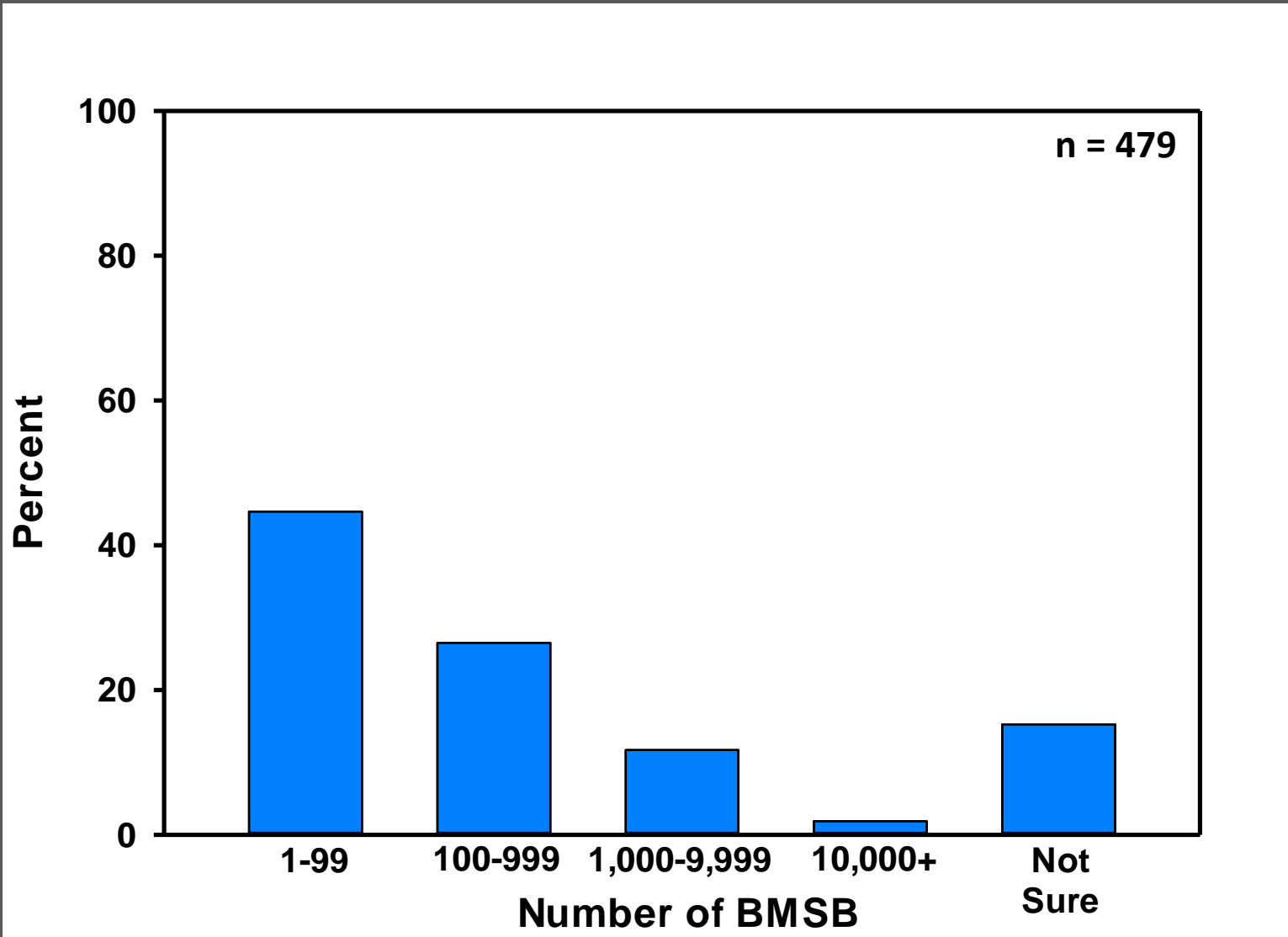
How many years has BMSB been a problem at your home or business?



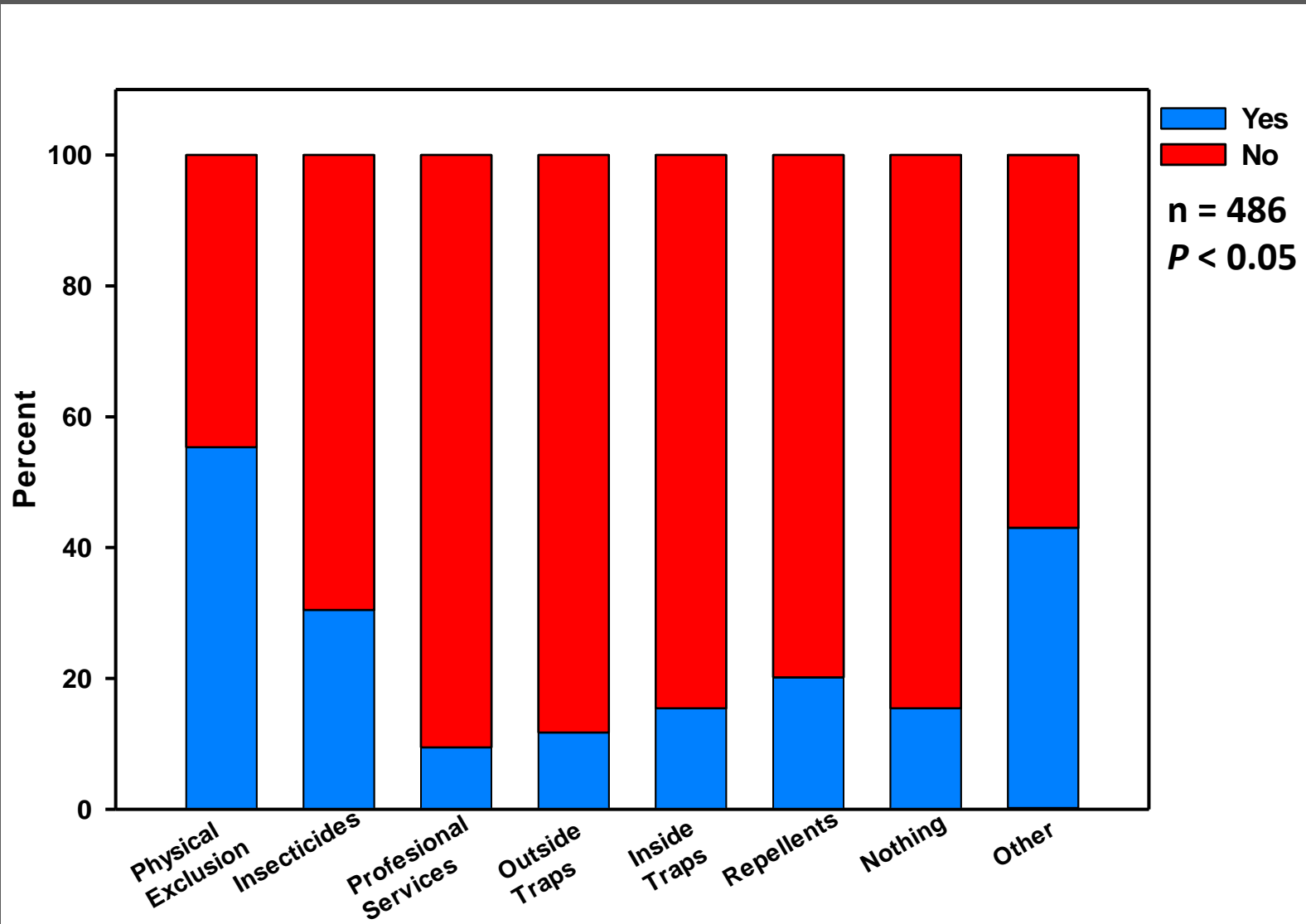
How serious is your BMSB problem?



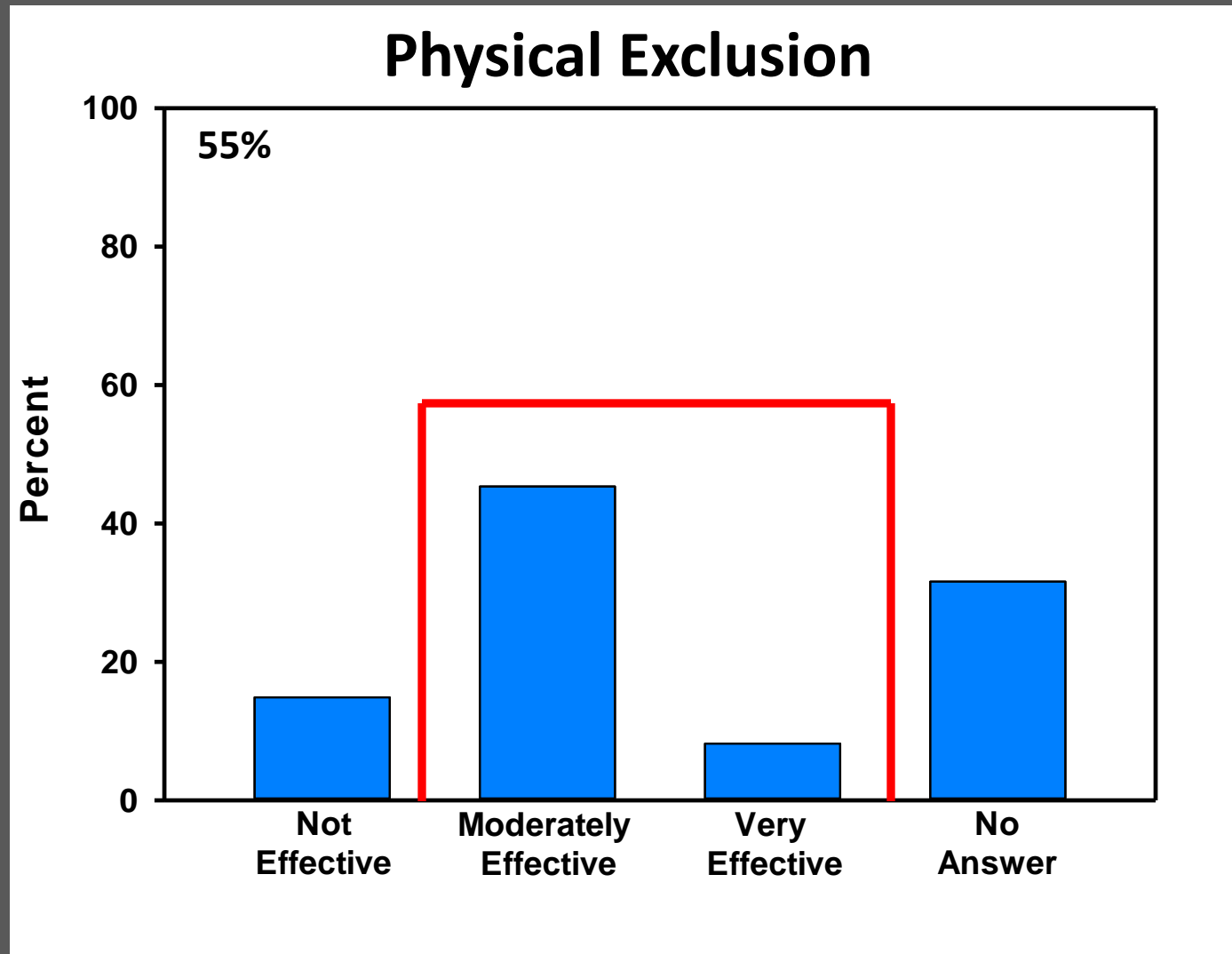
Estimate the number of BMSB that are inside your home/business



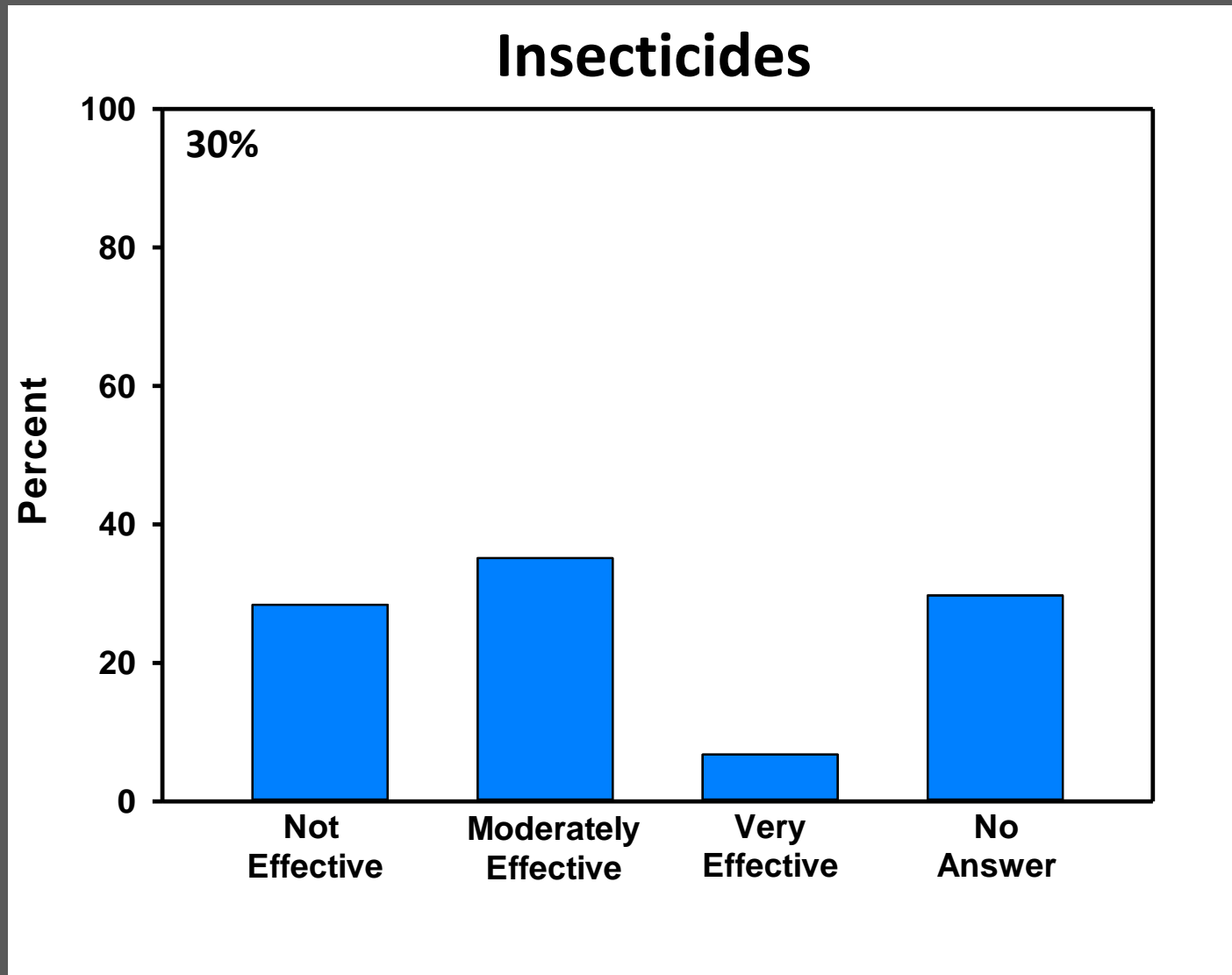
Which of the following have you used to mitigate your BMSB problems?



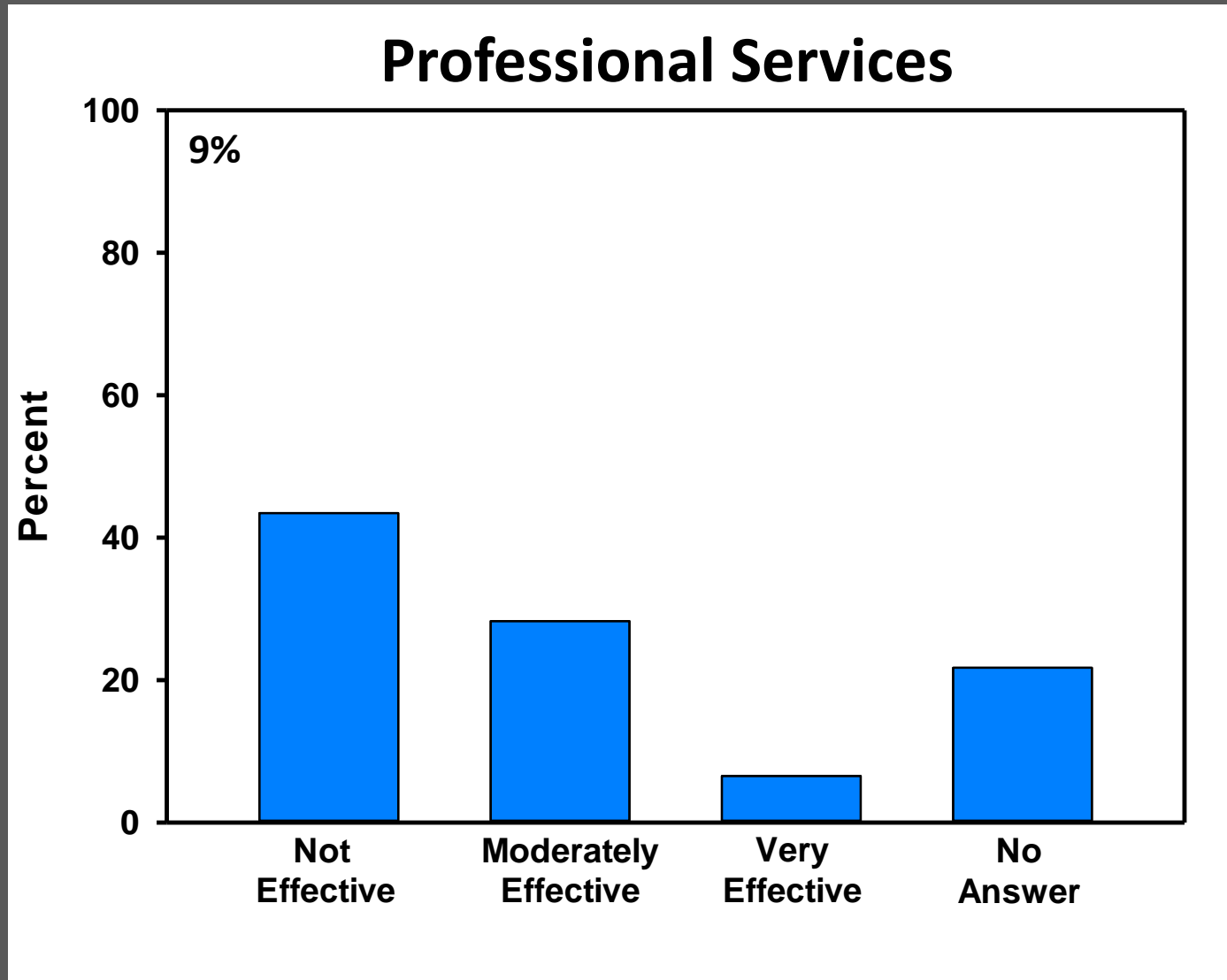
How effective was each tactic you used against BMSB?



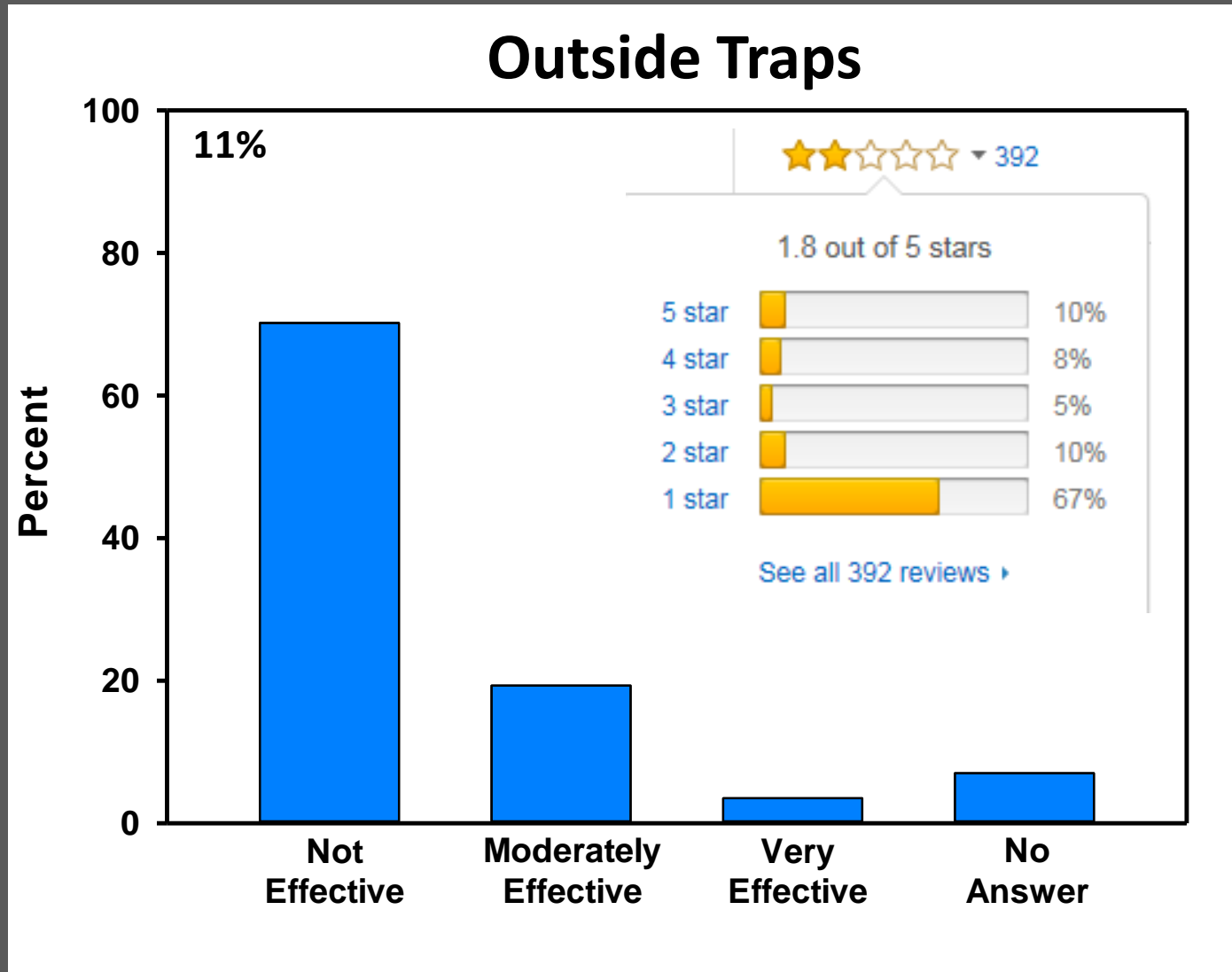
How effective was each tactic you used against BMSB?



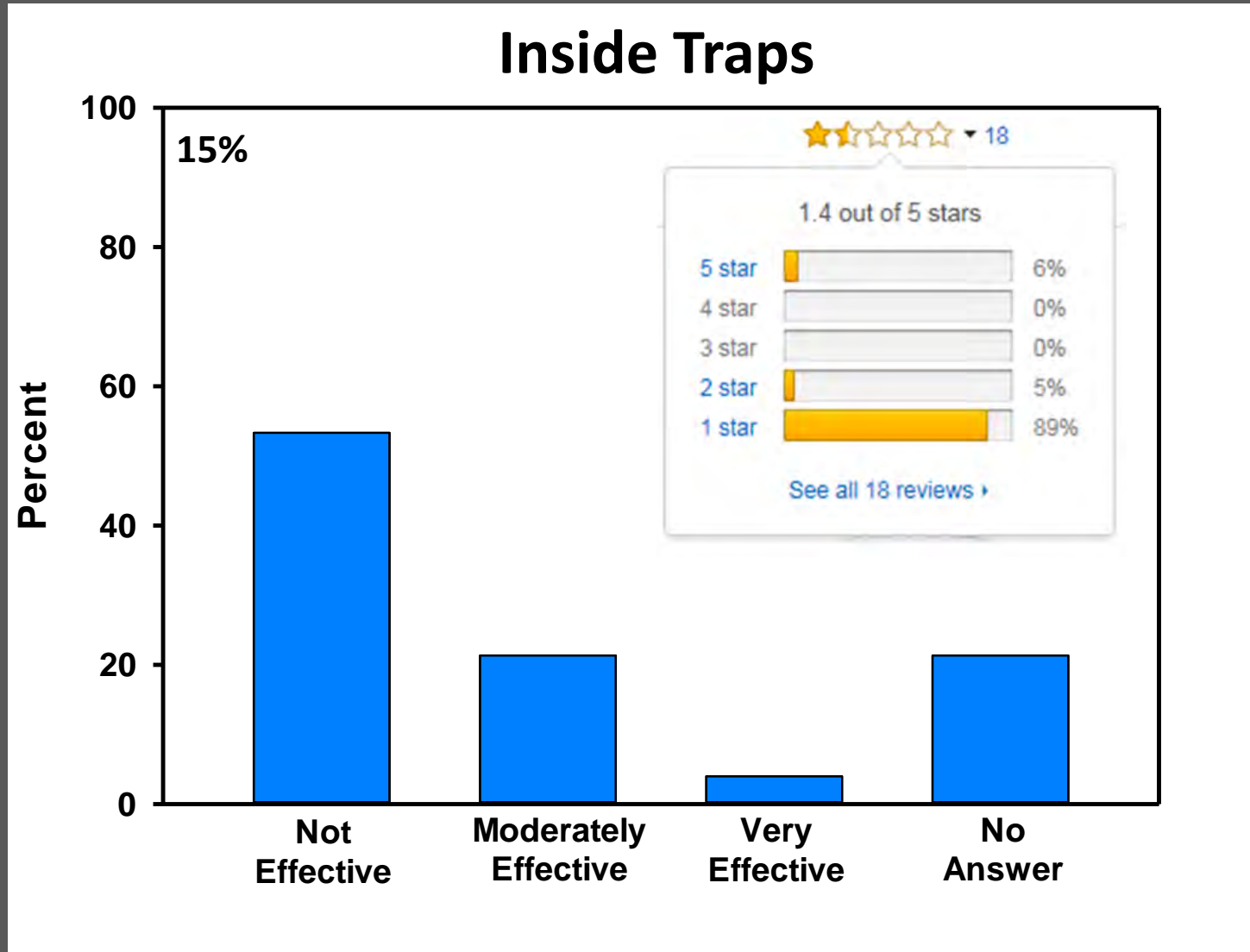
How effective was each tactic you used against BMSB?



How effective was each tactic you used against BMSB?



How effective was each tactic you used against BMSB?





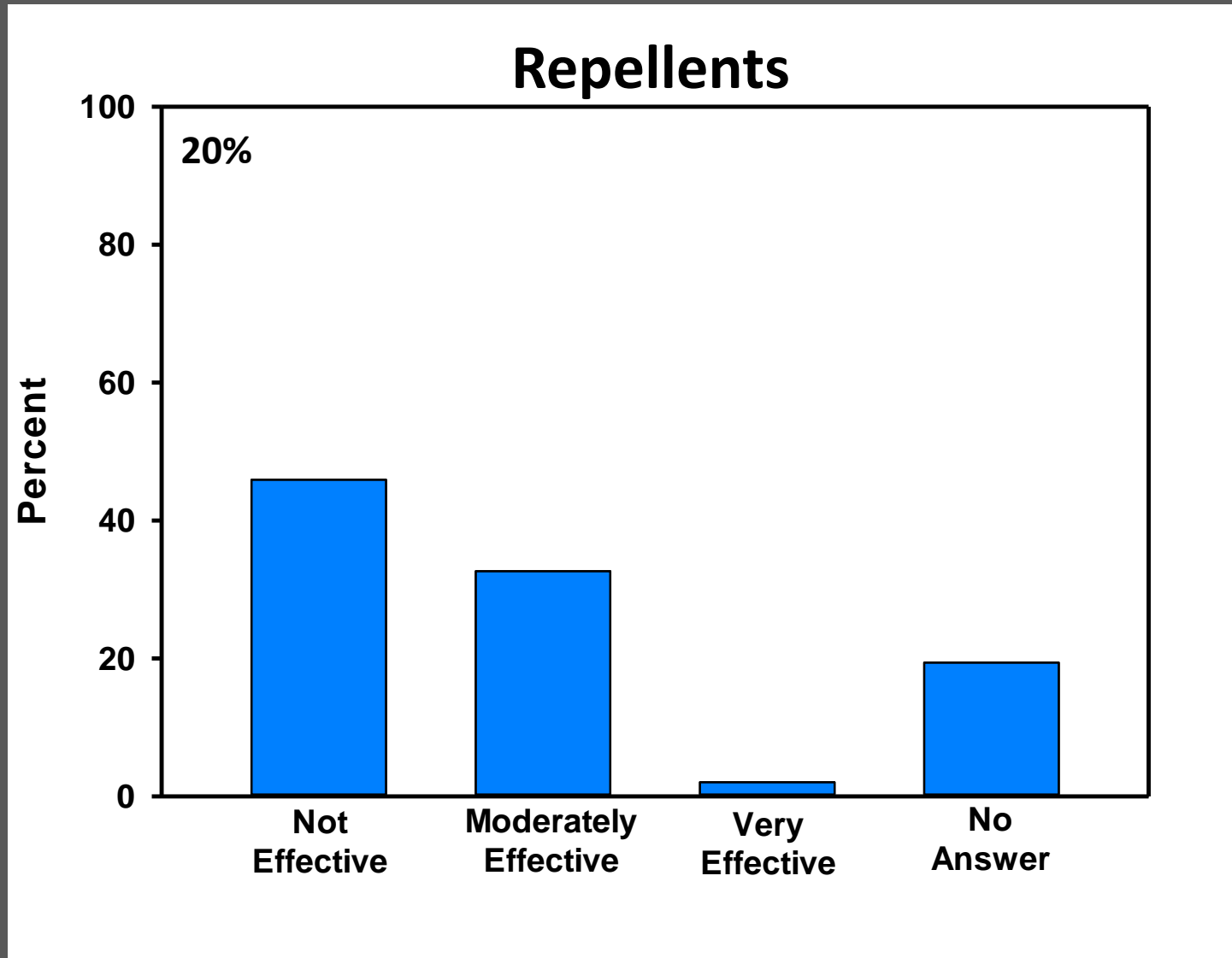
 **Journal of Extension**
www.joe.org

August 2014
Volume 52
Number 4
Article # 4RIB5
Research In Brief

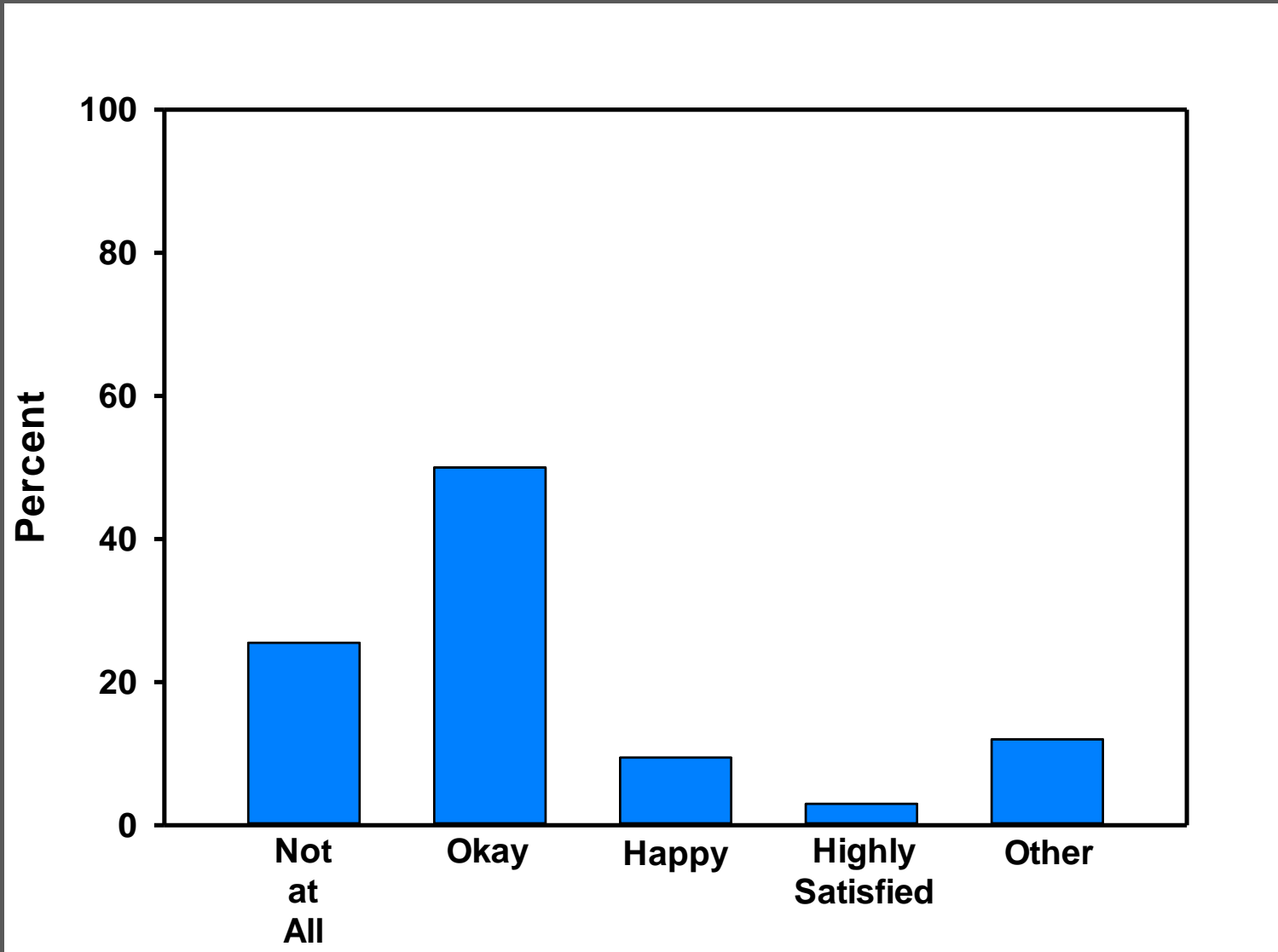
Using Citizen Scientists to Evaluate Light Traps for Catching Brown Marmorated Stink Bugs in Homes in Virginia



How effective was each tactic you used against BMSB?



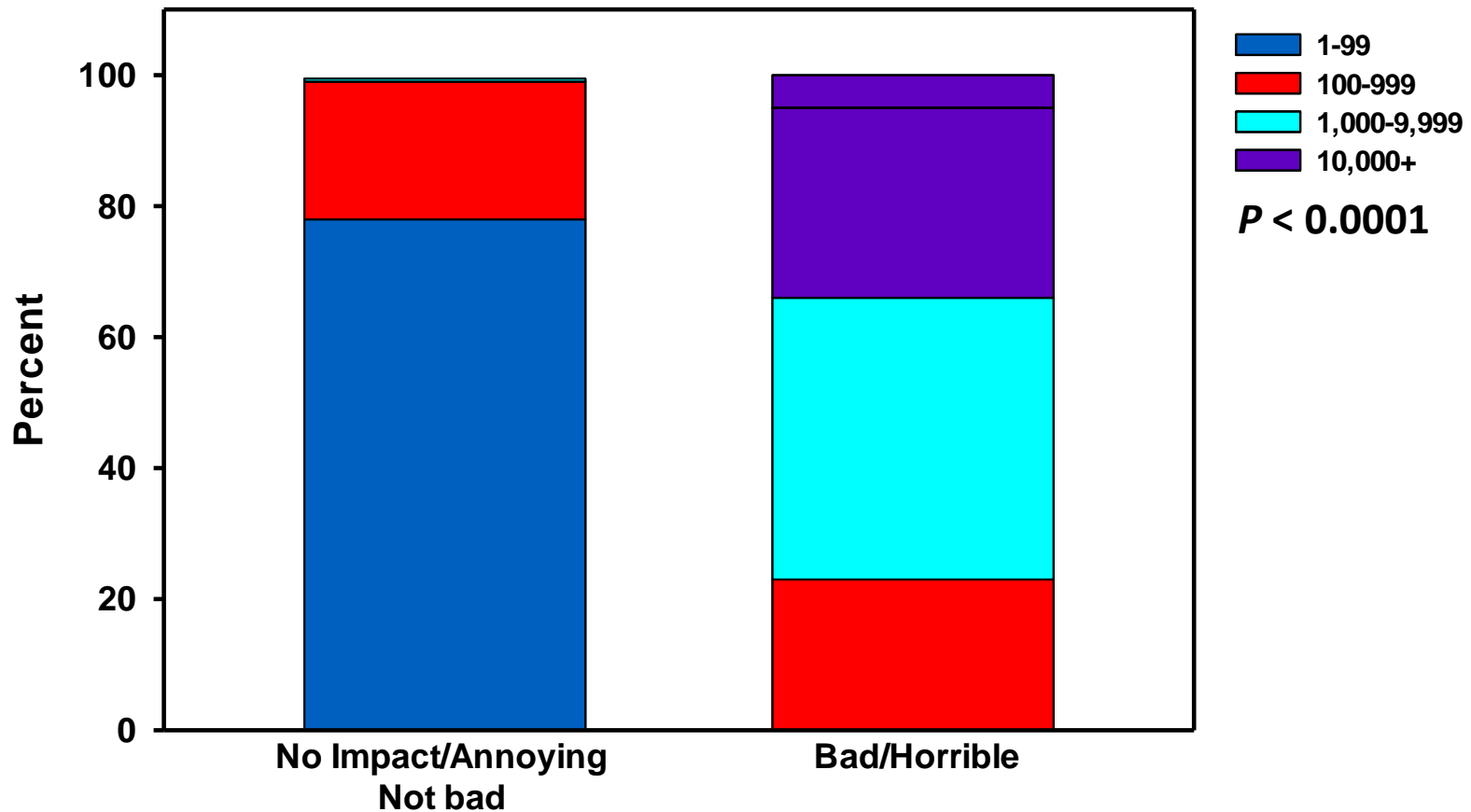
How satisfied have you been with the results?



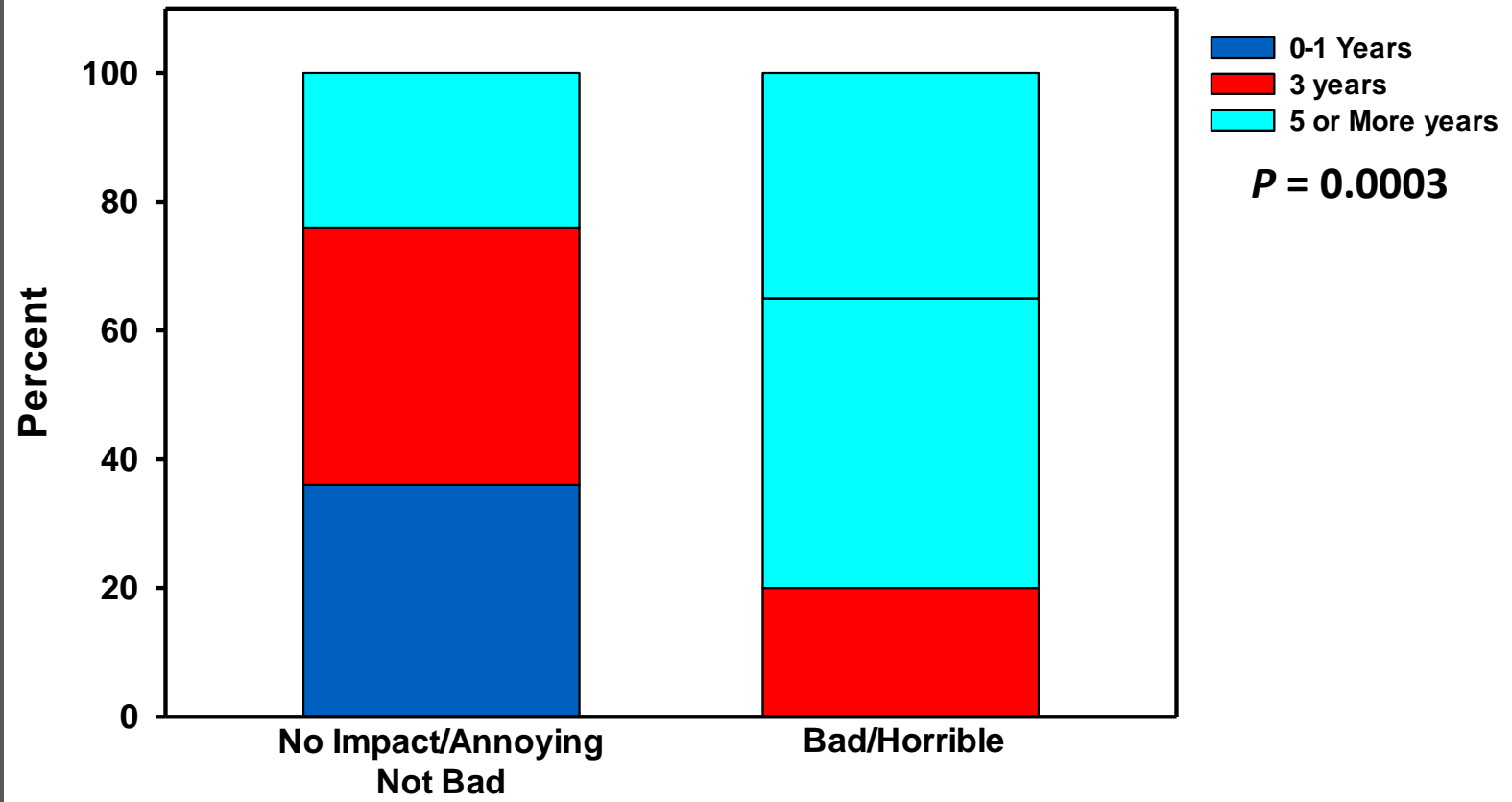
Participant Perception of Seriousness of BMSB Problem

- Evaluate association between # of BMSB and perception of problem
- Evaluate association between # of years since invasion and perception of problem
- Multivariate analyses
 - Regrouped responses
 - Annoying + Not Bad + No Impact
 - Bad + Horrible

As populations increase, perceived problem becomes worse



Perceived problems are greater as invasion time increases



Participants' Perception of Seriousness of Problem

- Multivariate modified Poisson regression model predicting participants' perception
 - # of BMSB reported and time problem has existed used as predictors
 - 1000+BMSB are 5X more likely to report Bad/Horrible compared to 1-99, adjusting for # years
 - 100-999 BMSB 3X more likely to report Bad/Horrible compared to 1-99, adjusting for # years

Participants' Perception of Seriousness of Problem

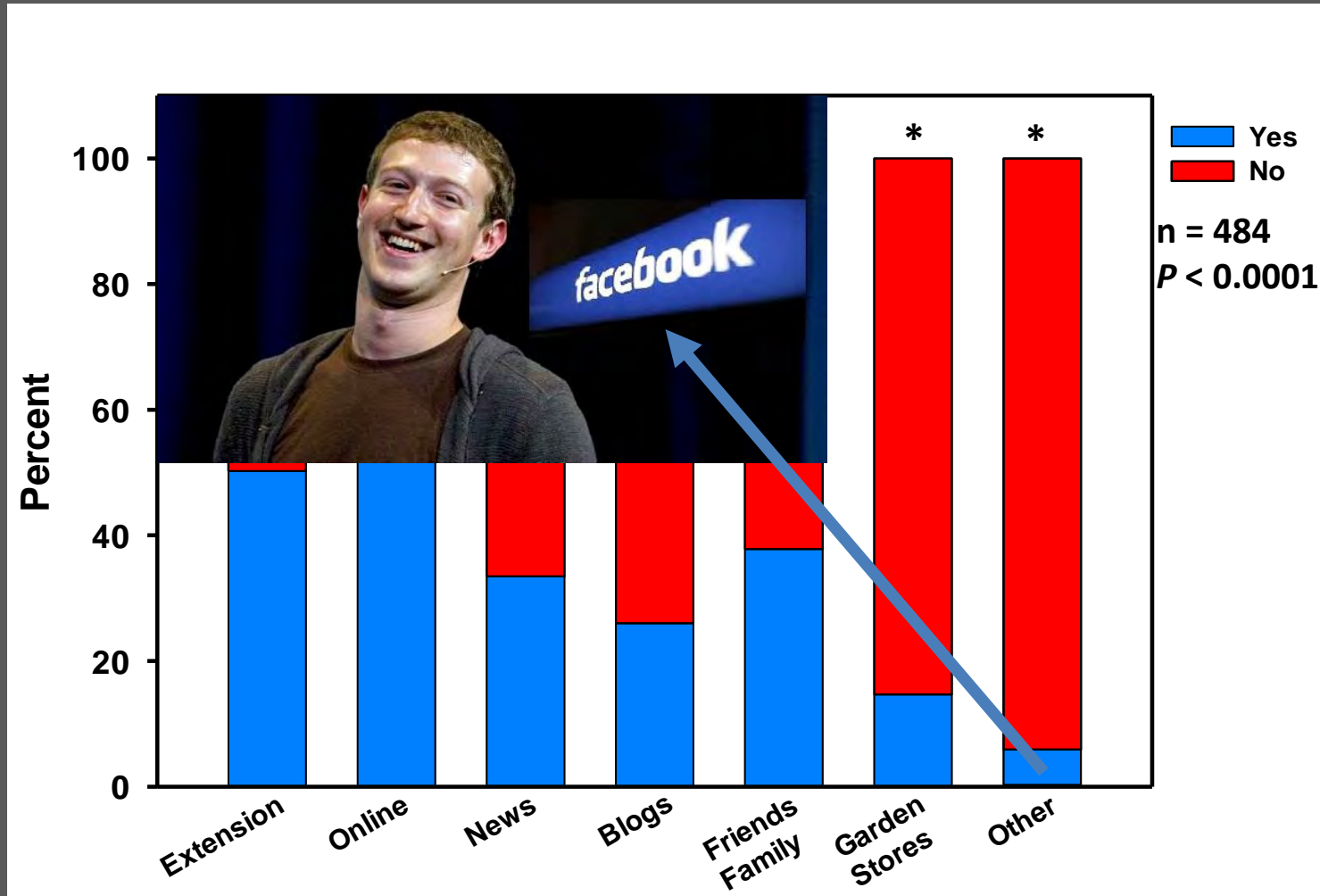
- Participants reporting invasion of 5 years are 1.7X more likely to report Bad/Horrible compared to 1 year invasion
- Participants reporting invasion of 3 years are 1.4X as likely to report Bad/Horrible compared to 1 year invasion

...this association completely disappears if we include # of BMSB in the model

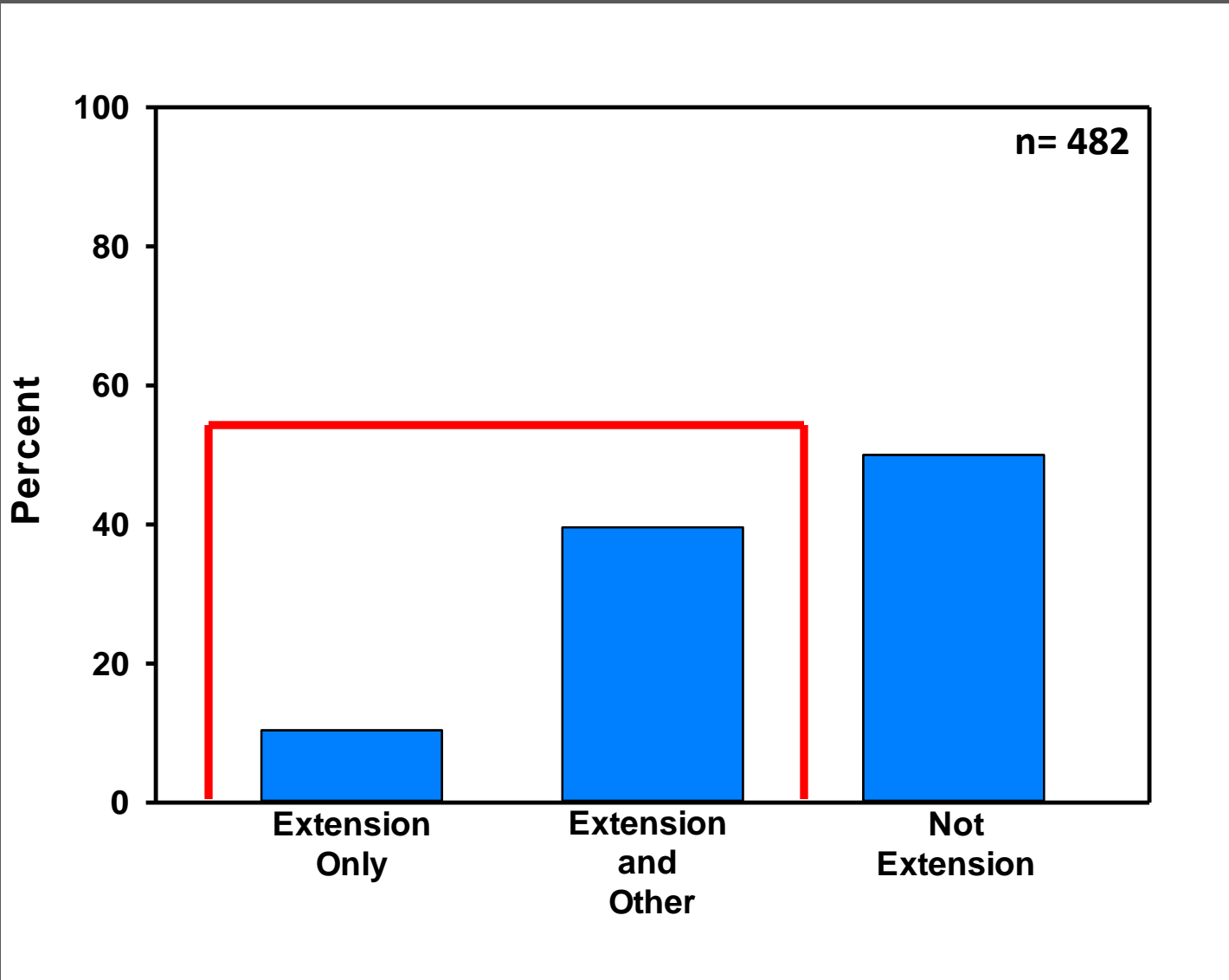
Evaluation of Extension

- How much are extension services used?
- Is information source associated with mitigation tactic?

What sources of information have you used to educate yourself about BMSB nuisance problems?



Extension as an information source



Relationship between information sources and adopted tactics

Tactic	Extension Only (10%)	No Extension (50%)	<i>P</i> value
Exclusion	42%	46%	0.60

Extension + Other (40%)
71%
32%
13%
14%
18%
20%
10%
50%



aphic location!

Relationship between information sources and adopted tactics

Tactic	Extension Only (10%)	No Extension (50%)	<i>P</i> value	Extension + Other (40%)
Exclusion	42%	46%	0.60	71%
Insecticides	20%	32%	0.093	32%
Professional	4%	8%	0.55	13%
Outside Traps	4%	12%	0.13	14%
Inside Traps	10%	15%	0.50	18%
Repellents	2%	25%	<0.0001	20%
Nothing	30%	17%	0.034	10%
Other	40%	38%	0.81	50%

...Does not account for geographic location!