FLORIDA BED BUG WORKGROUP

FLORIDA DEPARTMENT OF AGRICULTURE AND CONSUMER SERVICES



FACILITATOR'S SUMMARY REPORT OF THE FEBRUARY 14, 2012 MEETING IV

TALLAHASSEE, FLORIDA

FACILITATION, MEETING AND PROCESS DESIGN BY



REPORT BY JEFF A. BLAIR FCRC CONSENSUS CENTER FLORIDA STATE UNIVERSITY



FLORIDA DEPARTMENT OF AGRICULTURE AND CONSUMER SERVICES SUMMARY REPORT OF THE WORKGROUP'S FEBRUARY 14, 2012 MEETING

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FLORIDA DEPARTMENT OF AGRICULTURE AND CONSUMER SERVICES SUMMARY REPORT OF THE WORKGROUP'S FEBRUARY 14, 2012 MEETING

SUMMARY OF FLORIDA BED BUG WORKGROUP'S KEY ACTIONS

THURSDAY, FEBRUARY 14, 2012

OPENING AND MEETING ATTENDANCE

The meeting was opened at 10:00 AM, and the following sixteen (16) Workgroup members were present: Agency: Rick Akin, Steven von Bodungen, Jon Hamrick, Faith Oi, and Mike Page. Industry: Jennifer Fowler, Chip Guy, Alison Berry for Scot Haislip, Tom Jarzynka, Jennifer Leggett, Geoff Luebkemann, Tanya Peak-Smith, Chip Tatum/Laura Heiselman, Kathy Torian, Jim Warneke, and Louis Witherington.

*Members participating by teleconference are italicized.

Members Absent:

Agency: Rosanna Barrett, Julie Dudley, Phil Koehler, and Cheryl Urbas.

Industry: John Cooksey, Monique Donahue, and Mark Ruff.

FDACS Staff Present

Dale Dubberly and Joe Parker.

(ATTACHMENT I—MEETING PARTICIPATION)
(ATTACHMENT II—MEMBERS AND REPRESENTATION)

MEETING FACILITATION

The meeting was facilitated by Jeff Blair from the FCRC Consensus Center at Florida State University. Information at: http://consensus.fsu.edu/



PROJECT WEBPAGE

Information on the project, including agenda packets, meeting reports, and related project documents may be found in downloadable formats at the project webpage below: http://consensus.fsu.edu/DACS/bbwg.html

AGENDA REVIEW AND APPROVAL

The Workgroup voted unanimously, 16 - 0 in favor, to approve the agenda as amended, including the following objectives:

- To Approve Regular Procedural Topics (Agenda, Report, Workplan and Meeting Schedule)
- To Review Workplan Prioritization Exercise Results
- To Engage In Action Planning on Workplan Tasks/Issues
- To Hear a Report and Discuss Project Reference Documents
- To Discuss Bed Bug Self-Treatment Fact Sheet
- To Consider Public and Workgroup Member's Comments and Issues
- To Identify Needed Next Steps, Assignments, and Agenda Items For Next Meeting

Amendments:

Discussion of Bed Bug Self-Treatment Fact Sheet.

APPROVAL OF NOVEMBER 9, 2011 FACILITATOR'S SUMMARY REPORT

The Workgroup voted unanimously, 16 - 0 in favor, to approve the November 9, 2011 Facilitator's Summary Report as presented/posted.

Amendment(s):

None were proposed.

UPDATED WORKPLAN AND MEETING SCHEDULE REVIEW AND APPROVAL

Following a review of the Workplan, included as pages 7 - 10 of the agenda packet, and an invitation to propose any updates, the Workgroup took the following actions.

2012 MEETING SCHEDULE			
I.	February 14, 2012	Tallahassee and via teleconference/web	
II. April 25, 2012 Alachua and via teleconference/web		Alachua and via teleconference/web	
III.	June 19, 2012	Tallahassee and via teleconference/web	
IV.	August 22, 2012	Tallahassee and via teleconference/web	
V.	October 24, 2012	Tallahassee and via teleconference/web	
VI.	December 19, 2012	Tallahassee and via teleconference/web	

Workgroup Action:

Motion—The Workgroup voted unanimously, 16 - 0 in favor, to approve the updated Workgroup meeting schedule as presented/posted.

(ATTACHMENT IV—UPDATED WORKPLAN)

WORKPLAN PRIORITIZATION EXERCISE RESULTS

Jeff Blair, Workgroup Facilitator, reminded members that the Workgroup conducted a "Workplan Prioritization Exercise" on-line between November 9, 2011 and December 16, 2011, and that the rankings are the key input for deciding Workplan priorities.

Jeff Blair reviewed the results from the 2012 Workplan Prioritization Exercise and answered member's questions. Workgroup members were asked to rank each of thirty-four (34) key *Workplan* topics on a five-point continuum-scale where a 5 equals the highest level of priority and a 1 equals the lowest level of priority. Members were asked to rank the priority of each topic independently and not in relation to the other topics. Each of the *Workplan* topic's rankings were tallied and arranged in order of highest priority (1) to lowest priority (34). The ranking results ranged from a high of 4.56 to a low of 2.78 out of a possible 5.

Following are the results of the Workgroup's 2012 Workplan Prioritization Exercise:

OVERALL	WORKPLAN TOPICS (TASK/TOPIC #)	AVERAGE
RANKING	, , , , , , , , , , , , , , , , , , ,	(5 TO 1)
1	Science-based info/IFAS (C3 a.)	4.56
1	Develop toolkits to educate others (G1 a.)	4.56
3	Evaluate educational materials (G1)	4.50
4	Research subcommittee (B2)	4.44
5	Bed bug treatment methods (C2 c.)	4.33
6	Treatment strategies (B3)	4.25
7	Bed bug control methods (C2 b.)	4.22
7	Bed bug management principles (C2 a.)	4.22
7	Comprehensive database (C1)	4.22
7	Treatment professionals rec's (G4)	4.22
7	Hospitality industry functions training (G2 b.)	4.22
12	Evaluate training materials (G2)	4.12
12	Guidelines for proper use & handling of pesticides development (G5)	4.12
14	Economic impact analysis of costs (B1)	4.11
14	Treating specific venues (C2 d.)	4.11
16	Hospitality industry guidelines (C2 e.)	4.00
16	Stakeholder responsibilities guidelines evaluation (E2)	4.00
16	Post treatment and monitoring rec's. (G3)	4.00
16	Develop joint training materials (G2 a.)	4.00
16	Targeted venue specific fact sheets (G1 b.)	4.00
21	Communication strategy evaluation (E1)	3.89
22	Consumer protection evaluation (D1 b.)	3.88
23	Media strategy evaluation (E3)	3.78
23	Targeted PSAs (C3 b.)	3.78
25	Workplan development/prioritization (A3)	3.75
26	Federal funding strategies (B4 a.)	3.62
27	Stakeholders database (D3 d.)	3.56
27	K-9 inspections standards (F3)	3.56
29	Agency authority flowchart evaluation (D1 a.)	3.44

30	Agency reporting and tracking evaluation (D2)	3.33
30	Incentives for PCO collaboration (F2)	3.33
32	Government allowance program (B4 c.)	3.22
32	Regulatory/enforcement framework evaluation (F1)	3.22
34	Tourist tax (B4 b.)	2.78

BED BUG PROJECT REFERENCE DOCUMENTS DISCUSSION

Jeff Blair provided the Workgroup with an overview of the project Reference Documents Tracking Chart and answered member's questions. Jeff explained that the tracking chart matrix is organized by five document types: federal agency documents, state agency documents, university documents, journal articles and industry documents.

Members discussed the best strategy for reviewing bed bug project documents and agreed that stakeholder sector teams with a team leader should formed to review the documents relevant to their topical stakeholder sectors. Each team will review existing documents and determine if there are any data gaps, whether there is a need to develop any Florida specific documents, which documents should be posted to the project webpage, and which documents should be posted for the public to view on the comprehensive bed bug website (to be developed). Team leaders will be responsible to organizing the review of their stakeholder sector relevant documents. The stakeholder sector teams will report to the full Workgroup at each meeting as needed. Following are the project documents review teams (document review stakeholder sector teams):

Rental Housing and Retail Industry Sectors (landlords and residents/tenants): {Leads: Chip Tatum and Chip Guy}

Tourism Industry & Hotel/Motel Industry (Hospitality) Sectors: {Leads: Kathy Torian and Tanya Peak-Smith}

Schools Sector: {Leads: Faith Oi, Jon Hamrick and Jennifer Fowler}

Pest control operators will serve as technical consultants to each team as needed: {Leads: Jennifer Leggett, Tom Jarzynka and Jim Warneke}.

University scientists will serve as technical consultants to each team as needed: {Leads: Faith Oi and Phil Koehler}.

Sectors requiring evaluation: public housing (Section 8) and migrant/transitory worker's housing.

The reference documents and presentations are available on the project webpage at the following URL: http://consensus.fsu.edu/DACS/bbwg-documents.html

(ATTACHMENT V—REFERENCE DOCUMENTS TRACKING CHART)

DEVELOPMENT OF BED BUG SELF-TREATMENT FACT SHEET

Mike Page reported that FDACS has been receiving calls from individuals who have bed bug infestations and are unable to afford professional pest control. Mike suggested, and the Workgroup agreed, that the development and dissemination of a one-page fact sheet on self-treatment for bed bugs should be the first Workgroup project. Faith Oi reported that the University of Florida is in the process of developing a self-treatment fact sheet and provided the Workgroup with an overview of the Fact Sheet's content. Faith reported that the Fact Sheet will include the following information:

The best recommendation for homeowners who cannot afford pest control is to tell them that they have to approach Bed Bug control with the mindset of a "seek and destroy" mission.

To Do:

- 1.) The vacuum is your best friend. Vacuum daily. Focus on the bedding, furniture and any other cracks and crevices where Bed Bugs may hide.
- Suck up a little corn starch or talc into the crevice tool, hose and bag of the vacuum. The powder will clog the spiracles that the Bed Bugs use for breathing and they will suffocate.
- Empty the vacuum after each use. Seal vacuum content and put it in an outside receptacle.
- Create a clear living space. Clear places that bed bugs can hide. Fewer nooks and crannies will also make your seek and destroy mission more effective because you will have fewer places to search and vacuum.
- 2.) Bed Bugs are easy to smash. Use a tissue in a smearing motion to kill the bug and wipe up any remnants.
- 3.) Use a credit card to smash the Bed Bugs in cracks and crevices.
- 4.) You may want to try some diatomaceous earth (DE) which can be purchased a local hardware stores. Follow the label directions. Be warned that DE can cause lung and throat irritation so be careful of air currents during application.

Do NOT:

- 1.) Use foggers. They are ineffective.
- 2.) Apply pesticides directly to skin and/or bedding. Always follow label directions for use.

Faith will provide the Workgroup with a status report regarding development of the *Bed Bug Self-Treatment Fact Sheet* at the next meeting.

BED BUG TREATMENT PRESENTATION: SCIENCE AND TECHNOLOGY, AND APPLIED PRACTICES

Faith Oi provided Workgroup members with a PowerPoint presentation titled "Bed Bug Research Update" and answered member's questions.

Jennifer Leggett provided Workgroup members with a PowerPoint presentation titled "Bed Bugs (treatment statistics)" and answered member's questions.

Dale Dubberly reviewed the results of the "Florida Bed Bug Survey 2011" and answered member's questions.

The complete presentations are available on the project webpage at the following URL: http://consensus.fsu.edu/DACS/bbwg-documents.html

(ATTACHMENT VI—BED BUG SURVEY 2011 RESULTS)

GENERAL PUBLIC COMMENT

Jeff Blair invited members of the public to address the Workgroup. Following are general public comments: There were no public comments offered.

WORKGROUP MEMBER COMMENTS AND ISSUES

Workgroup members were offered an opportunity to make any additional comments they wished to offer. Following are Workgroup member's comments and relevant answers:

Workgroup Action:

Motion—The Workgroup voted unanimously, 16 - 0 in favor, to create a Workgroup Contact List including names, e-mails and phone numbers for distribution.

AGENDA ITEMS FOR THE APRIL 25, 2012 MEETING

- Summary report of the February 14, 2012 meeting—Blair
- Review of updated Workplan—Blair
- Review of updated Reference Documents Tracking Chart—Blair
- Update on development of bed bugs self-treatment fact sheet—Oi
- Updates from sector reference documents review teams—BBWG
- Topical issue presentations and discussions based on Workplan Prioritization results—Page/TBD

ASSIGNMENTS FOR THE APRIL 25, 2012 MEETING

- Create a Workgroup contact list with e-mails and phone numbers—Blair
- Contact migrant worker representatives regarding Workgroup participation/consultation—Dubberly
- Contact DOH regarding their participation status—Page
- Contact DOH regarding representation/consultation for Section 8 housing, nursing home, hospitals health care, and childcare facilities—Page
- Contact elder affairs representatives regarding Workgroup participation/consultation—Page

NEXT MEETING DATE AND LOCATION

April 25, 2012—Alachua, Florida and Teleconference Members are requested to attend the April meeting in person.

MEETING DATES AND LOCATIONS

2012 MEETING SCHEDULE			
I. February 14, 2012 Tallahassee and via teleconference/web		Tallahassee and via teleconference/web	
II.	April 25, 2012	Alachua and via teleconference/web	
III.	June 19, 2012	Tallahassee and via teleconference/web	
IV.	August 22, 2012	Tallahassee and via teleconference/web	
V.	October 24, 2012	Tallahassee and via teleconference/web	
VI.	December 19, 2012	Tallahassee and via teleconference/web	

ADJOURN

After checking for any final comments Jeff Blair, Workgroup Facilitator, adjourned the meeting at 11:35 AM.

ATTACHMENT I MEETING PARTICIPATION

Affiliation			
STATE AGENCIES/LOCAL GOVERNMENT			
DBPR (Division of Hotels and Restaurants)			
DBPR (Division of Hotels and Restaurants)			
Florida Department of Education (Office of Educational Facilities)			
University of Florida (College of Entomology and Nematology)			
FDACS (Division of Agricultural Environmental Services)			
DUSTRY/ASSOCIATIONS/OWNERS			
Florida School Plant Managers Association (BCSB)			
Rental Industry (Rent-To-Own/Rental Industry)			
National Apartment Association			
Pest Control Operator			
Pest Control Operator			
Florida Restaurant and Lodging Association			
Walt Disney World Pest Management			
Florida Apartment Association			
Visit Florida (Tourism)			
Cruise Ship Industry Pest Management & Resort Industry			
Pest Control Operators			
Louis Witherington Pest Control Operators FDACS STAFF			
FDACS			
FDACS			
FACILITATION AND PROCESS DESIGN			
FCRC Consensus Center @ Florida State University			

ATTACHMENT II

WORKGROUP MEMBERS AND REPRESENTATION/AFFILIATION

MEMBER	Affiliation		
STATE AGENCIES/LOCAL GOVERNMENT			
Rick Akin DBPR (Division of Hotels and Restaurants)			
Rosanna Barrett	Florida Department of Health (Healthy Homes)		
Steven von Bodungen	DBPR (Division of Hotels and Restaurants)		
Julie Dudley	Florida Department of Health (Public Housing)		
Jon Hamrick	Florida Department of Education (Office of Educational Facilities)		
Phil Koehler	University of Florida (College of Entomology and Nematology)		
Faith Oi	University of Florida (College of Entomology and Nematology)		
Mike Page/Dale Dubberly	FDACS (Division of Agricultural Environmental Services)		
Cheryl Urbas	Florida Department of Health (Healthy Homes/Public Housing)		
In	INDUSTRY/ASSOCIATIONS/OWNERS		
John Cooksey	Pest Control Operator		
Monique Donahue	American Hotel and Lodging Association		
Jennifer Fowler	Florida School Plant Managers Association (BCSB)		
Clifford (Chip) Guy	Rental Industry (Rent-To-Own/Rental Industry)		
Scot Haislip	National Apartment Association		
Tom Jarzynka	Pest Control Operator		
Jennifer Leggett	Pest Control Operator		
Geoff Luebkemann	Florida Restaurant and Lodging Association		
Tanya Peak-Smith	Walt Disney World Pest Management		
Mark Ruff	Legal Advisor Pest Control Industry		
Chip Tatum/Laura Heiselman Florida Apartment Association			
Kathy Torian	Visit Florida (Tourism)		
Jim Warneke	Cruise Ship Industry Pest Management & Resort Industry		
Louis Witherington	Pest Control Operator		
FACILITATION AND PROCESS DESIGN			
Jeff Blair FCRC Consensus Center @ Florida State University			

ATTACHMENT III

KEY TO COMMON ACRONYMS

ACRONYM	DEFINITION
AES	Agricultural Environmental Services (Division of FDACS)
BMP	Best Management Practices
DACS or FDACS	Florida Department of Agriculture and Consumer Services
DBPR	Department of Business and Professional Regulation
DEP or FDEP	Florida Department of Environmental Protection
DOE of FDOE	Florida Department of Education
DOH or FDoH	Florida Department of Health
EPA	U.S. Environmental Protection Agency
FAW	Florida Administrative Weekly
FBBWG	Florida Bed Bug Workgroup
FCCMC	Florida Coordinating Council on Mosquito Control (FDACS)
FIFRA	Federal Insecticide, Fungicide, and Rodenticide Act
IFAS	University of Florida Institute of Food and Agricultural Sciences
IPM	Integrated Pest Management
NIH	National Institutes of Health
NSF	National Science Foundation
PCEAC	Pest Control Enforcement Advisory Council (FDACS)
PCO	Pest Control Operator
PRC	Pesticide Review Council (FDACS)
RUP	Restricted Use Products (pesticides)
	'

ATTACHMENT IV

WORKGROUP'S UPDATED PROJECT WORKPLAN (ADOPTED UNANIMOUSLY FEBRUARY 14, 2012)

WORKPLAN BY TOPICS (A-G)

A. Workgroup Functionality—Communication, Planning, Participation, Representation, Process, Decision-Making

The Bed Bug Workgroup shall strive to achieve consensus on substantive recommendations made to FDACS, other agencies and state universities. The Bed Bug Workgroup shall operate under clear, concise, consistent, and fair policies and procedures.

- 1. Workgroup adopted procedures and polices, and consensus-building and decision-making procedures September 2011.
- 2. Workgroup shall meet bi-monthly, as needed.
- 3. Workgroup will develop, prioritize and maintain a project *Workplan* with relevant *Topics*, *Tasks* and *Sub-Tasks*, and completion milestones.
- A. Workgroup conducts Workplan Prioritization Exercise annually at the October meeting.
- B. Workgroup conducts Effectiveness Assessment Survey annually at the October meeting.

B. RESEARCH AND FUNDING PRIORITIES AND STRATEGIES

Recommend, based upon review of state Bed Bug laws and regulations, appropriate scientific studies regarding the control, prevention and treatment of Bed Bugs.

- 1. Economic impact analysis of the cost(s) of bed bugs to Florida (cost/benefit analysis of providing funding for research, training, education, PSAs/public outreach).
- 2. Research Subcommittee to the BBWG to vet all documents (research, guidelines, BMPs, fact sheets, etc.) posted to project website (and the eventual Comprehensive Bed Bug Website), and to recommend research priorities based on identified data gaps. The subcommittee should evaluate, catalog and compile currently available bed bug information (research, guidelines, BMPs, principles, fact sheets, etc.).
- 3. Develop safe and effective, practical and affordable treatment strategies.
- 4. Develop recommendations for specific funding mechanisms.
- A. Federal Funding: develop strategy for Florida to collaborate with other states and urge the NIH, NSF and USDA to fund research at a level commensurate to the potential economic importance of this pest.
- B. Evaluate a tourist tax surcharge to fund research strategies.
- C. Evaluate a government allowance program to reduce the cost of treatment to consumers for PCOs that are collaborating with the development of cost effective strategies.

C. DEVELOPMENT AND DISSEMINATION OF INFORMATION—CONTROL, PREVENTION AND TREATMENT

Coordinate agency efforts to develop a consistent message (among state agencies and industries) targeted toward the development of "bed bug awareness" for consumers in Florida.

- 1. Develop and maintain a comprehensive, fully searchable, integrated and linked, "one stop" database website for consumers (homeowners, tenants, students, travelers, tourists), pest control operators, property owners, and regulators. Include a comprehensive listing of federal, state and local services and resources for bed bugs. Include reporting and tracking functionality. {Include: IPM, BMPs, guidelines, fact sheets, response flow charts, tracking registry, relevant links (URLs), etc.}
- 2. Evaluate, and as needed, develop/compile BMPs, Guidelines and Principles for all stakeholders (homeowners, tenants, rental housing, students, travelers, tourists, pest control operators, regulators) for prevention, detection, control, and treatment.
- A. Develop/compile sound *bed bug management principles* that stress integrated pest management (IPM) relevant to avoidance and control (to educate the public and change behaviors).
- B. Develop/compile and disseminate information on effective control methods as part of "bed bug awareness".
- C. Develop/compile a series of pamphlets/brochures that help people understand how to react to and control bed bugs.
- D. Develop/compile materials for reacting to and treating specific circumstances, such as for homeowners, hotels, movie theaters, transit facilities, schools (day care), fireman and first responders, assisted living and nursing homes, and other medical establishments, and government.
- E. Develop/compile guidelines specific to the hospitality industry (prevention, detection, control and treatment).
- 3. Develop/compile strategies for dissemination of science-based information.
- A. Evaluate using UF IFAS' Cooperative Extension service to assist with the dissemination of information.
- B. Develop targeted PSAs regarding prevention, detection, control and treatment strategies.

D. COORDINATION AND TRACKING—COMMUNICATION AND COOPERATION BETWEEN AND AMONG RESPONSIBLE AGENCIES AND AFFECTED INTERESTS

Provide advice or information to appropriate governmental agencies, including the State University System, with respect to those activities related to their responsibilities regarding regulating and controlling Bed Bugs.

- 1. Compile a flowchart of all existing agencies/entities authorities and responsibilities (regulation, enforcement, response, and education).
- A. Evaluate, and as needed, develop flowchart (above) to determine whether changes are needed to provide a unified, coordinated and consistent approach to response, treatment and prevention of bed bugs across all agencies and entities with bed bug responsibilities.
- B. Evaluate, and as needed, develop and coordinate consumer protection activities.
- 2. Evaluate, and as needed, develop a means of tracking and reporting bed bug infestations to help control the spread of bed bugs, helping to identify trends in areas where resources can be focused to prevent the spread of this pest. {Part of Task C.1}
- 3. Evaluate and compile a comprehensive catalog of bed bug stakeholders and their particular stakeholder segment's perspectives.

E. ENHANCING COMMUNICATION BETWEEN AND AMONG AGENCIES, INDUSTRY AND PUBLIC

The Bed Bug Workgroup shall serve as an accessible liaison between the Division of Agricultural Environmental Services, the regulated industry, and consumers thereby protecting the interests of the public.

- 1. Evaluate, and as needed, develop a consistent communication strategy and message for all agencies/entities with bed bug authorities and responsibilities.
- 2. Evaluate, and as needed, develop and disseminate clear guidelines detailing the rights and responsibilities of landlords, tenants and homeowners.
- 3. Evaluate, and as needed, develop a media strategy to ensure factual science-based information is conveyed to the public.

F. DEVELOPMENT OF REGULATION AND ENFORCEMENT STRATEGIES

- 1. Evaluate the current regulatory and enforcement framework for consistency and efficacy. Identify gaps, redundancies, conflicts and deficiencies and recommend strategies for enhancements to the regulatory and enforcement structure (i.e., coordination, consistency, effectiveness, health and safety, affordability)
- 2. Develop incentives for PCOs to collaborate in the development of effective, safe, and cost effective treatment strategies and methodologies.
- 3. Evaluate, and as needed, develop/recommend bed bug inspection standards for the use of K-9 scent dogs.

G. EDUCATION AND TRAINING—DEVELOPMENT AND DISSEMINATION

Develop training for state and local government personnel/inspectors on how to avoid contact with bed bugs and serve as messengers to disseminate information related to the prevention of and control of bed bugs. Promote public education regarding Bed Bug prevention and treatment.

- 1. Evaluate, and as needed, develop factual science-based educational materials targeted to specific venues (i.e., home, hotel, workplace, rental properties, transportation) and stakeholders {i.e., consumers (homeowners, tenants, students, travelers, tourists), pest control operators, property owners, and regulators}.
- A. Develop toolkits that can be used to educate others.
- B. Develop targeted fact sheets (appropriately displayed) for posting at various venues (fire stations, schools, day care, assisted living, dorms, hotels, rental properties, etc.).
- 2. Evaluate, and as needed, develop coordinated comprehensive training materials and programs.
- A. Develop joint training opportunities.
- B. Evaluate training opportunities at hospitality industry functions.
- 3. Evaluate, and as needed, develop recommendations for post treatment and monitoring (to prevent re-infestation from occurring).
- 4. Evaluate, and as needed, develop materials specifically for professionals that potentially will come into contact with bed bugs.
- 5. Evaluate, and as needed, develop guidelines for proper use and handling of pesticides (include facts on misuse).

ATTACHMENT V

BED BUG WORKGROUP REFERENCE DOCUMENTS

DOCUMENT	AUTHOR	STATUS	
FEDERAL AGENCY DOCUMENTS			
Acute Illnesses Associated With Insecticides Used to	Center for Disease Control and	Posted	
Control Bed Bugs	Prevention		
HUD Guidelines on Bed Bug Control and Prevention	HUD	Posted	
Joint Statement on Bed Bug Control in the U.S.	CDC and EPA	Posted	
Citizens Guide to Bed Bugs	USEPA	Posted	
Bed Bugs Efficacy Data Development & Testing	USEPA	Posted	
{Presentation}			
STATE AGENCY D	1	D 1	
Bed Bud Identifications and Inspection	State of Illinois	Posted	
Bed Bugs in Healthcare Facilities	State of Illinois	Posted	
Bed Bugs in Multi-Unit Housing	State of Illinois	Posted	
Bed Bugs in Office Buildings	State of Illinois	Posted	
Bed Bugs in Schools and Day Care Centers	State of Illinois	Posted	
If You Enter Places That Might Have Bed Bugs	State of Illinois	Posted	
If You Get Bed Bugs	State of Illinois	Posted	
Ohio Bed Bug Workgroup Report 2011	State of Ohio	Posted	
Guidelines for Bed Bug Response In a School Building	State of Ohio	Posted	
Bed Bugs Facts	State of Colorado	Posted	
Bed Bugs Facts	State of New Jersey	Posted	
Florida Bed Bug Survey 2011 Results	State of Florida (FDACS)	Posted	
University Do	CUMENTS		
Bed Bugs Fact Sheet I	University of Florida	Posted	
Bed Bugs Fact Sheet II	University of Florida	Posted	
A New Option: Localized Heat Treatments	University of Florida	Posted	
Lethal Effects of Heat Treatment and Use of Localized	University of Florida	Posted	
Heat Treatment for Control of Bed Bug Infestations			
Bed Bugs: Containerized Fumigation and Heat	University of Florida	Posted	
Treatment			
Canine Detection of Bed Bugs {Presentation}	University of Florida	Posted	
Ability of FDACS to Enforce Bed Bug Treatments	University of Florida	Posted	
{Presentation}			
GHP Control Applicator Training Manual	University of Florida	Posted	
Bed Bug Research Update {Presentation}	University of Florida	Posted	
What Can I Do to Prevent Bringing Bed Bugs Home?	University of Minnesota	Posted	
Control of Bed Bugs in Residences (Operators)	University of Minnesota	Posted	
Control of Bed Bugs in Residences (Owners/Tenants)	University of Minnesota	Posted	

BED BUG WORKGROUP REFERENCE DOCUMENTS		
DOCUMENT	AUTHOR	STATUS
University Do	OCUMENTS	
Bed Bugs Advisory to Returning Students	University of Minnesota	Posted
Bed Bugs IPM In and Around the Home	University of California	Posted
Bed Bugs Facts	University of California	Posted
Bed Bugs Fact Sheet	Ohio State University	Posted
Bed Bugs Facts	University of Kentucky	Posted
Bed Bugs: Biology and Public Health Risk	Purdue University	Posted
Bed Bug Management Flow Chart	Harvard	Posted
Bed Bugs Fact Sheet	Penn State	Posted
Nonchemical Bed Bug Treatment	Virginia Tech	Posted
Bed Bugs Prevention Methods	Virginia Tech	Posted
Bed Bugs Treatment Using Chemicals	Virginia Tech	Posted
Guidelines for Prevention of Bed Bug in Shelters and Group Living Facilities	Cornell University	Posted
An Introduction To the Bed Bug Problem In Schools {Presentation}	Texas Agricultural/Mechanical (TAMU)	Posted
Journal Ar		
Bed Bug Infestations in an Urban Environment	Journal: Emerging Infectious Diseases	Posted
History of Bed Bugs Management	Journal: American Entomologist	Posted
Bed Bugs 101	Journal: American Entomologist	Posted
Bed Bugs Identification Chart	Bugs: Pictorial Guide to Species That May Bite Man	Posted
Industry Do	CUMENTS	
2011 Bugs Without Borders Survey	NPMA	Posted
Best Management Practices for Bed Bugs	NPMA	Posted
Pulling Back the Sheets on the Bed Bug Controversy	American Society for Healthcare Environmental Services	Posted
Bed Bug Treatments {Presentation}	McCall Services	Posted
Bed Bug Treatment Statistics for a Florida PCO {Presentation}	McCall Services	Posted
Bed Bug Treatment Statistics for a Florida PCO {Presentation}	Lindsey Pest Services	Posted

ATTACHMENT VI

FLORIDA BED BUG SURVEY RESULTS 2011

(State-Wide Survey Conducted with Licensed Pest Control Businesses)

- 1. Number of companies responding to survey 2069
- 2. Number of companies licensed in General Household Pest Control 2042
- 3. Number of companies licensed in Fumigation 213
- 4. Number of companies performing treatments for bed bugs 695 (34%)
- 5. Number of companies having increase in 2011 treatments over past two years 436 (63%)
- 6. Names of top pesticides used Bedlam (sumithrin), Temprid (imidacloprid+cyfluthrin), Phantom (chlorfenapyr), Suspend (deltamethrin) and Vikane (sulfuryl fluoride)
- 7. Number of companies performing fumigation for bed bugs -80 (12%)
- 8. Number of companies performing heat treatments for bed bugs 100 (14%)
- 9. Number of companies using freezing method to treat bed bugs 5 (.007%)
- 10. Number of companies using less than 3X sulfuryl fluoride to fumigate bed bugs -3
- 11. Number of companies offering a written contract or guarantee 362 (52%)
- 12. Average length of treatment guarantee, if offered 60 days
- 13. Number of companies that perform an inspection prior to treatment 619 (89%)
- 14. Number of companies using monitoring devices to detect bed bug infestations 171 (25%)
- 15. Average percentage of treatments made to residential structures -70%
- 16. Average percentage of treatments made to commercial/public structures 30%
- 17. Number of companies using K-9's for bed bug inspections -36 (.05%)
- 18. Number of companies with procedure for applicators to prevent infestations at home 440 (63%)
- 19. Total number of treatments performed for bed bugs in 2011 18,133

Notes:

- Several large multi-branch companies account for approximately half of all treatments performed.
- We estimate that we received responses from approximately 65% of all companies licensed to perform treatments for bed bugs.

Additional Comments Received From Survey:

- Customer cooperation is essential for control
- Educating the public should be a priority
- Some companies perform a few treatments and decide it is too difficult and time consuming
- All types of treatments must be thoroughly performed
- Lack of effective pesticides labeled for bed bug control is a problem
- "Clutter" is the a major obstacle to obtaining effective control
- A thorough inspection prior to treatment is very important