

Overview of NAPPO RSPM 22

Guidelines for the Design, Construction, and Operation of a Containment Facility for Insects and Mites used as Biological Control Agents

Purpose: Biological control agents (BCAs) are beneficial organisms used to suppress populations of plant pests such as insects, mites, or weeds. Containment facilities prevent the unintended release of BCAs of foreign origin, or potentially harmful organisms that may be associated with them, into the environment. RSPM 22 provides guidelines for designing, building, and operating containment facilities used for the importation, housing, culture, and release of BCAs.

Contents: RSPM 22 contains references, background information, and requirements for the design and construction of the physical exterior of the containment facility, for its interior structures and equipment, and for its operation and security.



Summary of RSPM 22: A containment facility requires specialized features and practices to prevent the unwanted introduction of non-native BCAs and/or associated potentially harmful organisms into the environment.

Physical Design and Construction of Facility: RSPM 22 describes design and construction features such as: building a containment facility in a location that minimizes risks to agriculture; selecting a location, and including design and construction features that minimize potential risks from natural disasters or adverse weather conditions; keeping adjacent buffer areas free of debris and planted with sentinel plants to aid in monitoring effective

containment; minimization and documentation of people and goods entering and exiting the facility; design and manufacture of surfaces, windows, and doors that minimize hiding places and potential escape of BCAs; installation of a negative air pressure HVAC system so that air rushes inward when facility doors open; installation of light traps to monitor the containment security system.

Facility Operation: Practices for personnel who operate and maintain a facility include: adequate training and supervision; dedicated laboratory clothing and restrictions on food and personal items in the containment area; procedures for disposal, sterilization, collection, destruction, and removal of BCAs from the facility; procedures for facility cleaning, decontamination, recordkeeping, and periodic inspections.

Containment Security: Security practices for containment facilities include: signage to prevent unauthorized access; procedures to monitor and document visitors; an emergency action plan; and procedures for decommissioning the containment facility.

Please read RSPM 22 for a more complete description of guidelines for containment facilities for insects and mites used as BCAs.

Photo by: Robin Stuart <https://www.fdacs.gov/Agriculture-Industry/Pests-and-Diseases/Plant-Pests-and-Diseases/Biological-Control/Biocontrol-Rearing-Facilities>