

Checklist for UCC Laboratory Biosafety Inspections: **1st Visit**

Department: _____	Building: _____	Room: (PI) _____
Room: (Lab) _____	Autoclave Location: _____	
PI: _____	Responsible Person: _____	
Containment Level (GMM):	2 <input type="checkbox"/>	
Inspected by: _____	Date: __/__/__	

GMM Class 2

Key: X = no ✓ = yes N/A = not applicable
(example documents available for items in **bold**)

(A) Other Requirements	
<input type="checkbox"/>	Annual Report Submitted (2010)? <i>deadline 31st March 2011</i>

(B) Good Microbiological Practice (GMP) [GMM Class 2]	
<input type="checkbox"/>	The laboratory should be easy to clean. Bench surfaces should be impervious to water and resistant to acids, alkalis, solvents and disinfectants
<input type="checkbox"/>	Benches should be clean and free from clutter & Bench tops should be cleaned after use
<input type="checkbox"/>	The laboratory door should be closed when work is in progress
<input type="checkbox"/>	Biohazard sign at entrance to lab, autoclave area, freezer area
<input type="checkbox"/>	Minimise the production of aerosols
<input type="checkbox"/>	The identity of GMOs should be regularly checked to avoid the culturing of incorrect strains.
<input type="checkbox"/>	Appropriate training of personnel - Staff training record
<input type="checkbox"/>	Maintenance of equipment – Autoclave/Fume cupboards/Laminar Flow Hoods
<input type="checkbox"/>	Inactivation Record (Autoclave)
<input type="checkbox"/>	Washing and decontamination facilities
<input type="checkbox"/>	Hands must be disinfected or washed immediately when contamination is suspected, after handling viable materials and also before leaving the laboratory

<input type="checkbox"/>	Effective disinfectants should be available for immediate use in the event of spillage
<input type="checkbox"/>	Used laboratory glassware and other materials awaiting disinfection must be stored in a safe manner
<input type="checkbox"/>	Use of sharps should be avoided. Contaminated syringes and sharps must be disposed of in a "sharps bin" and incinerated
<input type="checkbox"/>	Materials for disposal must be transported in robust and leakproof containers without spillage
<input type="checkbox"/>	Eating, chewing, drinking, taking medication, smoking, storing of food and applying cosmetics must not take place in the work area
<input type="checkbox"/>	Mouth pipetting must not take place
<input type="checkbox"/>	Laboratory coats should be worn in the laboratory and removed when leaving the laboratory suite
<input type="checkbox"/>	Personal protective equipment, including protective clothing, must be <ul style="list-style-type: none"> - stored in a well defined place - checked and cleaned at suitable intervals - when discovered to be defective, repaired/replaced before further use
<input type="checkbox"/>	Personal protective equipment which may be contaminated by biological agents must be: <ul style="list-style-type: none"> - removed on leaving the working area - kept apart from uncontaminated clothing - decontaminated and cleaned, or if necessary, destroyed
<input type="checkbox"/>	Biosafety Manual with SOPs
<input type="checkbox"/>	All accidents and incidents should be immediately reported to and recorded by the person responsible for the work or other delegated person
<input type="checkbox"/>	Animals must not be allowed to enter into the laboratory
(C) Physical Control Measures: Facility Design [GMM Class 2]	
<input type="checkbox"/>	process with viable micro-organisms separated from the environment (closed system)
<input type="checkbox"/>	<i>restricted access to the facility (e.g. electronic cards, camera)</i>
<input type="checkbox"/>	Accessibility of window that opens
<input type="checkbox"/>	biohazard sign on the door
<input type="checkbox"/>	signs at laboratory entrance: <ul style="list-style-type: none"> - special hazard signs if an organism containing rDNA needs special provision for persons entering the laboratory - names of occupants who have access to the laboratory
<input type="checkbox"/>	Outward opening of Laboratory doors
<input type="checkbox"/>	Observation window or alternative to enable occupants to be seen

<input type="checkbox"/>	Absence of floor drains within the work area
(D) Physical Control Measures: Containment equipment [GMM Class 2]	
<input type="checkbox"/>	check the suitability of equipment used for safety purposes
<input type="checkbox"/>	check the suitability of any chemical disinfectants in use
<input type="checkbox"/>	check position of the autoclave with respect to the GMO installation (in the building)
<input type="checkbox"/>	wash hand basin or sink that can be used for hand washing with: <ul style="list-style-type: none"> - dispenser containing soap - dispenser containing hand disinfectant - paper towels
<input type="checkbox"/>	check position and design of biological safety hoods
<input type="checkbox"/>	Check design of the equipment for the safe storage of GMOs. Storage is not allowed in floors as long it is not part of the facility.
<input type="checkbox"/>	check design of waste transport containers
<input type="checkbox"/>	check design of containers for the transport of GMOs inside the facility
<input type="checkbox"/>	check design of centrifuge buckets
<input type="checkbox"/>	filters have to be sterilised on site or instantly sealed in a plastic bag for later sterilization
<input type="checkbox"/>	Provision of eye wash stations / bottles / equipment (1Y/2Y)
(E) Safety Management – Work Procedures [GMM Class 2]	
<input type="checkbox"/>	doors and windows closed while working
<input type="checkbox"/>	access to the laboratory must be restricted when experiments are in progress
<input type="checkbox"/>	workers should be given adequate information on safety matters and be suitably trained. Training should include the following points: <ul style="list-style-type: none"> a) the existence and application of written work procedures b) the procedures for using particular pieces of equipment c) spillage control and other emergency procedures
<input type="checkbox"/>	check at which process steps hazardous quantities of aerosols are formed. Any operation that may involve the formation of aerosols (e.g. sonicating, centrifuging, pipetting) shall be performed in such a way as to ensure that these do not find their way into the working area.
<input type="checkbox"/>	GMO's are only to be transported within the facility in closed, robust and leakproof containers
<input type="checkbox"/>	work surfaces must be decontaminated daily and after a spillage



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UCC Biosafety



<input type="checkbox"/>	inactivation of GMOs in contaminated material and waste
<input type="checkbox"/>	users should ensure that the performance of safety equipment is validated (e.g. autoclaves and safety hoods) - validation of equipment (e.g. autoclaves, safety hoods) - maintenance of the equipment - markers used to verify the efficiency of autoclaves
<input type="checkbox"/>	skin contact with rDNA material must be avoided
<input type="checkbox"/>	decontaminate protective clothing before laundering
<input type="checkbox"/>	protective clothing and street wear must be kept separate
<input type="checkbox"/> Optional	<i>Gloves</i>
<input type="checkbox"/>	<i>implementation of an insect and rodent control programme</i>
<input type="checkbox"/>	where appropriate make vaccines available
<input type="checkbox"/> Optional	where appropriate serum samples must be taken from workers and stored to provide baseline information in the event of an unexplained illness
<input type="checkbox"/>	sample collection, addition of materials to closed system and transfer of viable micro-organisms to another closed system, should be performed as appropriate
<input type="checkbox"/>	safe storage of biological agents
<input type="checkbox"/>	Regular identification and confirmation of purity of microbial strains
<input type="checkbox"/>	Safe storage of contaminated laboratory equipment
<input type="checkbox"/>	Personnel to remove protective clothing on leaving the facility
<input type="checkbox"/>	Worker required to wear closed shoes
<input type="checkbox"/>	Regular maintenance of safety equipment such as safety cabinets

IMPORTANT: Please refer back to your **EPA GMO registry** to see the **conditions** that apply to your lab. Some items that are **optional** for one lab may be **required** for another. This checklist is for guideline purposes only.

Recommendations/Comments:

Next Visit Date: __/__/__

Copy to be given to Principal Investigator/Responsible person.