

UA Biosafety Guidelines for use of Recombinant DNA

The following guidelines are based on current NIH policy guidelines for the use of recombinant DNA, which can be accessed at:

https://osp.od.nih.gov/wp-content/uploads/NIH_Guidelines.pdf

Any use of recombinant DNA for research or teaching purposes needs to be evaluated by the UA Biosafety Committee before use. A protocol can be registered with the committee in an expedited fashion if it falls within Risk Group 1 or will not be propagated in an organismal vector. Such protocols will be approved for three (3) years, provided there is no change to the protocol during that time. Protocols involving agents in Risk groups 2-4 will receive full review from the UA Biosafety Committee.

Appendix B - Table 1. Basis for the Classification of Biohazardous Agents by Risk Group (RG)

Risk Group 1 (RG1)	Agents that are not associated with disease in healthy adult humans
Risk Group 2 (RG2)	Agents that are associated with human disease which is rarely serious and for which preventive or therapeutic interventions are <i>often</i> available
Risk Group 3 (RG3)	Agents that are associated with serious or lethal human disease for which preventive or therapeutic interventions <i>may be</i> available (high individual risk but low community risk)
Risk Group 4 (RG4)	Agents that are likely to cause serious or lethal human disease for which preventive or therapeutic interventions are <i>not usually</i> available (high individual risk and high community risk)

Table 1. NIH risk group categories.

Recombinant DNA Exempt Protocol (Risk Group 1 or will not be propagated in an organismal vector **ONLY**)

Name Date

PI Name

This Exempt Protocol Form is for any researcher using recombinant nucleic acid for research or teaching purposes. This form is only for those protocols that are not associated with disease in healthy human adults (Risk Group 1). If your protocol is in another Risk Group, please submit a protocol for full review ([Institutional Biosafety Committee Homepage : The University of Akron, Ohio](#)).

This protocol involves recombinant DNA RNA Both

This protocol introduces recombinant RNA/DNA into whole animals or plants Yes No

- 1) This protocol uses DNA primers to amplify organismal DNA (PCR/qPCR), OR
- 2) clones DNA into a plasmid vector and propagates that vector in a RG1 bacterial strain, OR
- 3) converts organismal RNA into DNA (cDNA), OR
- 4) sequences isolated DNA or RNA, OR
- 5) manipulates isolated DNA or RNA with restriction enzymes

Yes (circle all the above that apply) No

The target RNA/DNA is toxic to humans or animals Yes No

Briefly describe the how recombinant nucleic acids will be used:

Signature of PI

UA Biosafety Approved Request Modifications Recommend Full Review

Name of Reviewing Committee Member

Signature

Date