

## HERE ARE A FEW MORE DETAILS ON DECONTAMINATION

Ward Stone, Wildlife Pathologist at the Wildlife Pathology Unit for the NY Department of Environmental Conservation, has been testing a variety of substances for their ability to kill both the geomyces spore and active fungus. He has learned the following:

1. **GEOMYCES is a “cold loving fungus that is killed after 20 days at 37 C.”** It is therefore unable to grow on humans, birds, other mammals, or even bats when they are not in hibernation. Moreover, if one does some simple cleaning and drying of one’s gear, it is probably impossible for it to survive the transfer from cave to cave. However, the fungus likes the cave environment and, as Tom Tomasi of Missouri State University told me yesterday, this means that we must consider the cave, not the bats, as being infected. To avoid carrying the fungus from cave to cave, we must definitely disinfect ourselves and our gear after each trip.

2. Stone has confirmed two disinfectants that kill the fungus effectively and can be used to clean gear such as boots, ropes, coveralls, gloves, vertical gear, etc. These are:

a. **PROFESSIONAL LYSOL ANTIBACTERIAL CLEANER**, mixed in water at a double dosage, which is a 1 in 64 concentration, or two ounces per gallon. The product, which is available in most supermarkets, can also be found here:

<http://www.reckittprofessional.com/index.jsp>

b. **PROMICIDAL**, which he says his agency has been using for more than a year, and find very effective. From what I can gather, promicidal is a germicidal detergent. It has its own negatives, such that one doesn’t want to let it wash into any natural water systems or streams. Go to this webpage for a pdf of its label instructions and warnings:

[http://www.kellysolutions.com/erenewals/documentssubmit/KellyData%5CMS%5Cpesticide%5CProduct%20Label%5C66114%5C6836-253-66114%5C6836-253-66114\\_PROMICIDAL\\_GERMICIDAL\\_DETERGENT\\_12\\_18\\_2001\\_3\\_03\\_42\\_PM.pdf](http://www.kellysolutions.com/erenewals/documentssubmit/KellyData%5CMS%5Cpesticide%5CProduct%20Label%5C66114%5C6836-253-66114%5C6836-253-66114_PROMICIDAL_GERMICIDAL_DETERGENT_12_18_2001_3_03_42_PM.pdf)

3. He expects that by Monday he will confirm a third disinfectant, **GRENADIER**, that also works to kill geomyces. See this page for a product description:

[http://www.chemsearch.com/productDetail.asp?country=USA&language=English&language\\_id=4&countryName=United+States&pLetter=G&pName=Grenadier%3Csup%3E%3Csmall%3ETM%3C%2Fsmall%3E%3C%2Fsup%3E%0D%0A](http://www.chemsearch.com/productDetail.asp?country=USA&language=English&language_id=4&countryName=United+States&pLetter=G&pName=Grenadier%3Csup%3E%3Csmall%3ETM%3C%2Fsmall%3E%3C%2Fsup%3E%0D%0A)

As Stone noted in an email, **“I do not recommend these (above chemicals) for use in mines or caves, or where the disinfectants will contaminate drinking water or waters containing fish and wildlife, or utilized as drinking water by wildlife and/or domestic livestock. They can be used judiciously for killing fungal elements on things like boots, ropes, nets, hard hats, gloves, and equipment surfaces that can tolerate the disinfectants. They are also good for disinfecting trucks, other vehicles and floors, and refrigerators. Let common sense prevail in their use.”**

As I noted in an earlier email, this email can be forwarded freely to other listservs.

Bob Zimmerman