

# **Campus Housing Guidelines for Pandemic Planning ACUHO-I**

## **Introduction**

University and college housing operations throughout the world are working with their respective campuses to develop plans to address a pandemic flu. To date there exist 241 cases of bird to human avian flu infection with 141 resulting deaths. The high morbidity of these flu cases lends to the increased need to develop campus and housing plans. Important to recognize in the development of these campus plans are the necessity for campus housing officials to be involved in the planning.

It is also important to note that planning for a pandemic flu is a dynamic process. The data, information, and research are constantly changing. Staff members at the federal, state, and local levels are working to provide the most up-to-date information for planners to use in their efforts to develop a comprehensive pandemic plan. [Pandemicflu.gov](http://Pandemicflu.gov) is the most updated web site on this issue. Federal agencies that conduct modeling, planning, and response all post information to this web site.

## **Background**

Why prepare for a pandemic flu appears to be a growing question among campus officials. Some flu pandemics in the past have caused widespread illness and death, changing day-to-day life. This virus is now spreading to birds and animals, including humans, in new regions of the world. In very rare cases the virus has spread from one human to another. If these rare cases continue to increase, world leaders will face very difficult decisions in an increasingly complicated situation.

A definition of terms is important as many have interchanged important yet different terms when speaking about pandemic flu.

1. Seasonal (or common) Flu is a respiratory illness that can be transmitted person to person. Most people have some immunity and a vaccine is available.
2. Avian (or bird) Flu is caused by influenza viruses that occur naturally among wild birds. The H5N1 variant is deadly to domestic fowl and can be transmitted from birds to humans. There is no human immunity, and no vaccine is available.
3. Pandemic Flu is a virulent human flu that causes a global outbreak, or pandemic, of serious illness. Because there is little natural immunity, the disease can spread easily person to person. Currently, there is no pandemic flu.

Additionally, isolation versus quarantine requires definition.

1. Isolating an individual almost always requires a hospital stay. Isolating a person is done to separate persons with contagious diseases. Isolation may be applied to individuals, cohorts, or populations.
2. Quarantining is restricted to persons who are not ill but who are presumed to be exposed. Quarantining usually occurs at home or at a designated facility. A quarantine may be applied to individuals, groups, or at the community level.

To reduce infection, hygienic measures such as wearing mask barriers, coughing or sneezing into one's sleeve, washing hands, and the like are encouraged. These non-pharmaceutical measures are important and should be encouraged for use with students and staff. Additional, non-pharmaceutical measures include staying home if sick, staying home if family members are sick; reducing social contacts, and if necessary, closing school. The question remains, "Who will make the decision to close school? This question has yet to be answered from a legal standpoint. The difficulty in making the decision to close school is very important. In mathematical modeling, early school closure equates to a large decrease in infected persons. The increase of an attack rate from .01% to .05% to 1% is one week. Each week the increase in diagnosed infections increases tenfold. The second week, the infected persons equal 10%. Anything above 1% is diminishing returns. So, clearly action must be taken during the first week of diagnosed infections.

Many campuses are planning for a de-escalation following two to three weeks. Federal agencies are suggesting a much longer period prior to de-escalation of three to four months. This longer period goes well beyond many thoughts that a few weeks can be made up by extending semesters or instructing on weekends. For housing operations that close for that period of time, the loss of revenue can be devastating. Good accounting practices suggest maintaining a four month operating expense reserve account for situations not unlike a pandemic closing.

### **Guidelines**

These guidelines are offered as a means of discussion for housing officers to use in their campus planning efforts. The guidelines have been divided into three areas for planning purposes: Preparedness and Planning, Response, and Recovery. In several cases, the areas will overlap. Not all statements/guidelines will pertain to each campus and housing operation but should be considered in the planning process.

#### Preparedness and Planning

1. Complete an annual review of Emergency Operations Plans that include Pandemic Planning.
2. Identify and prepare lists of essential functions that designate essential personnel who will be expected to report to work during an emergency to continue business

- operations. This list should contain all pertinent contact information (i.e., home phone, cell phone, etc.).
3. Conduct succession planning and identify at least three staff members who can perform each essential function.
  4. Encourage staff to keep work spaces clean. Disinfecting commonly touched work surfaces and items should be routinely practiced (i.e., computer keyboards, door handles, etc.).
  5. Identify campus housing that may be used for quarantine or isolation units for students who may not be able to be housed off campus or at home. Quarantine/isolation units must have private baths and air handling units that do not re-circulate air to other units.

#### Preparedness and Planning/Response

6. Review or establish plans for remote work strategies.
7. Prepare an employee sick leave/extended absence policy. Generally, peak absenteeism during a pandemic is estimated to be about 40%.
8. Consider using FEMA trailers for quarantine or isolation housing if current housing inventory does not provide separate bathrooms and does not eliminate re-circulated air.
9. Stockpile soap, alcohol-based/waterless hand hygiene products, tissues, N95 masks, and disinfectant for housing purposes.
10. Establish a housing and dining command center where essential personnel report.
11. Develop plans to assure the on going provision of food services in the event of a reduction of work force.
12. Stockpile appropriate types and amounts of non-perishable food.
13. Stockpile appropriate amounts of prepackaged utensils.
14. Establish procedures to ensure that stockpiled foodstuffs that have expiration dates have not exceeded those dates.
15. Ensure that medical personnel have trained essential food service staff on the risks and response to flu exposure.

#### Response

16. Establish evaluation centers to send students who believe they have been exposed or who exhibit flu-like symptoms as identified by staff in the campus housing units used for quarantine or isolation.
17. Limit housing staff face-to-face meetings during pandemics.
18. Review event schedules and consider cancelling any events that are not critical.
19. Provide designated essential personnel to receive N95 mask barriers including providing fit testing and training on respirator protection from emergency personnel.
20. Plan for the monitoring/delivery of medications and other goods and services to isolation and quarantine cases within housing units.
21. Identify the meal delivery need and method for quarantine or isolated students.
22. Announce schedule changes for dining locations. Retain or establish take-out only options to minimize contact. Consider the use of web-based technology for ordering as well as for communicating schedule changes.

### Recovery

23. Activate a business continuity plan program for essential personnel.
24. Work closely with health services staff regarding which students should be able to go home. To reduce infection, students who are sick should stay as well as roommates of sick students should stay. Consider plans to develop an “all clear” group that could go home.
25. Disinfect all surfaces and ductwork in rooms where students were held in isolation/quarantine once quarantined or isolated students have moved out.
26. Schedule a post-event debriefing to determine areas of process and procedure improvement.
27. Complete an event financial impact analysis.

### **Conclusion**

The use of these non-pharmaceutical guidelines will greatly reduce the spread of a pandemic flu and the voracity of the virus. Housing staff have historically planned well for environmental disasters, natural disasters, and the like. Pandemic flu planning is an essential aspect of the housing comprehensive crisis management plan. Chief housing officers are encouraged to designate one housing staff member to be tasked with coordinating the comprehensive crisis management plan. The pandemic flu aspect of the

overall plan is one that necessitates constant review. Research is on going at all levels of government to develop the best approaches, equipment, techniques, and processes when dealing with pandemics.

### References

[www.pandemicflu.gov](http://www.pandemicflu.gov)

[www.cdc.gov](http://www.cdc.gov)

[www.buildingdatabook.eren.doc.gov/docs/7.4.4](http://www.buildingdatabook.eren.doc.gov/docs/7.4.4)

University of Florida, Pandemic Planning Matrix, March 20, 2006.

University of Illinois Champaign-Urbana, University Housing Plans to Address Pandemic Flu, June 30, 2006.

New York University, Pandemic Influenza Response, August 29, 2006.

Wake Forest University, Avian Influenza Response, November 15, 2005.

### Authored by:

Norbert W. Dunkel, University of Florida, Chairperson  
Jim Rooney, University of Illinois Champaign-Urbana  
Tom Ellett, New York University  
Tim Burton, Wake Forest University

September 29, 2006