Los Angeles County Emergency Medical Services Agency

Annex to the Los Angeles County Hospital Regional Response Plan

Recommended Actions for Hospitals To Prepare for and Respond to Pandemic Influenza

Updated April 2010

TABLE OF CONTENTS

BACKGROUND

For hospitals, the winter season is routinely characterized as a time of high volume and taxing demand. Not surprisingly then, during even normal circumstances, the healthcare system in Los Angeles County (LAC) can be easily overwhelmed. The projected tremendous and unprecedented demand for healthcare services during a pandemic will likely challenge our healthcare resources to levels not previously experienced.

All of the preplanning in the world will not eliminate the increased demand that comes with a pandemic, but preparation can ease the burden on hospital personnel and administration. In order to assist hospital to better prepare for and cope with a region-wide pandemic, the LAC Emergency Medical Services (EMS) Agency developed lists of *Recommended Actions to Prepare Hospitals for Pandemic Influenza by Pandemic Phase*, released in June 2007.

In 2009, we gained experience and learned lessons as we responded to the Influenza A H1N1 pandemic. As a result, the LAC Emergency Medical Services Agency has released this updated guidance, *Recommended Actions for Hospitals to Prepare for and Respond to Pandemic Influenza*. The most notable change is the decreased reliance on the World Health Organization's Pandemic Influenza Phases as triggers for action, and the increased need for local situational awareness, assessment and impact as the basis for alterations in operations.

In the vein of all-hazards or generalized planning, these *Recommended Actions* continue to focus on pandemic influenza planning as a whole, rather than specific H1N1 preparedness and response. They can also be applied to any infectious communicable disease outbreak, not just influenza. During a pandemic, all stakeholders will have to collaborate to assure the best achievable coordination and outcome for patients, staff and their families.

NOTE: In the initial response phase to a novel virus, a more conservative approach may be taken, e.g., implementing the use of airborne protection (N95 respirators). This may change to droplet precautions (e.g., the use of surgical masks) or remain at airborne precautions based on the mode of virus transmission, communicability, and virulence of the circulating virus as more information becomes known.

To make recommendations for future updates, please contact Kay Fruhwirth, Assistant Director, LAC EMS Agency, at 562-347-1602 or kfruhwirth@dhs.lacounty.gov.

COMMUNITY WIDE COORDINATION AND CONTROL

Declaration of an Influenza Pandemic Emergency

Responsible for declaring when an outbreak of a novel virus has reached the pandemic stage:

- Globally: World Health Organization (WHO)
- United States: U.S. Centers for Disease Control and Prevention (CDC)
- Los Angeles County: The LAC Health Officer, as Incident Manager for the county's public health response, will determine when the novel virus is present and impacting LAC.

Once the novel virus has been identified locally, the Health Officer may do any or all of the following:

- Activate the operational aspects of LAC's Pandemic Influenza Preparedness and Response Planning Guidelines
- Notify the members of the LAC Emergency Management Council
- Notify the LAC Board of Supervisors
- May declare a local Public Health Emergency and enact legislated public health powers detailed in the State Health and Safety Code, but the Board of Supervisors must approve the declaration of a local emergency
- If the county's Emergency Operations Center (EOC) is activated to manage the county's response effort, the Health Officer will designate personnel to staff the county EOC and represent the Department at the Operational Area level

Coordination of the LAC Health Response

The coordination of the LAC's medical and health response will be a collaborative effort between the LAC Department of Health Services (DHS) and Department of Public Health (LACDPH). The DHS Department Head will activate the DHS Department Operations Center (DOC) to assist with the management of the healthcare system and emergency medical services response. The DOC is organized according to the Incident Command System.

Coordination of the LAC EMS Response

As part of an overall preparedness plan for dealing with periods of excess demand on emergency medical services, LACDHS, in cooperation with EMS Provider Agencies and hospitals, may implement the following actions:

1. Initiate a tracking system for trending the impact of the pandemic on EMS providers and hospitals.
2. The EMS Agency may permit BLS ambulances to honor emergency department diversion and transport patients to the next closest facility.

3. If the trend indicates a region-wide crisis and there is no value in diverting ambulances away from emergency departments, the Director of the EMS Agency may require all hospitals to maintain an "open" emergency department and no emergency department diversions will be honored. Re-evaluation of this policy would take place every 24 hours until the pandemic is over.
4. LACDPH may issue advisories to the public regarding the pandemic and the appropriate use of 9-1-1 services and emergency departments versus clinics, urgent care and/or alternate care centers.
5. The EMS Agency, EMS Provider Agencies, LACDPH, Hospital Association of Southern California, Disaster Resource Centers, Los Angeles County Medical Association, Los Angeles County Emergency Medical Directors Association, Community Clinic Association of Los Angeles County and other stakeholders may participate in ongoing conference calls to assist in the development of appropriate coordination and response planning to the pandemic.

Pandemic Response Guidance

During the pandemic, LACDPH will provide guidance on infection control (including PPE), altered standards of care, alternate care sites, vaccine, antiviral medications, and community containment measures. The guidance will be based on information and best practices from WHO, CDC, California Department of Public Health (CDPH), and other jurisdictions affected by the pandemic.

KEY CONTACTS

Los Angeles County Department of Health Services Emergency Medical Services Agency

- General: 562-347-1500
- 24/7 Medical Alert Center (MAC): 866-940-4401
- http://ems.dhs.lacounty.gov

Los Angeles County Department of Public Health Acute Communicable Disease Control, Biological Incident Reporting

- Business hours: 213-240-7941; After hours: 213-974-1234
- http://www.lapublichealth.org

Los Angeles County Department of Mental Health

- 24/7 hotline: 888-854-7771
- http://dmh.lacounty.gov

Los Angeles County Department of Coroner

- 24/7: 323-343-0714
- http://coroner.lacounty.gov

PANDEMIC INFLUENZA RECOMMENDED ACTIONS FOR HOSPITALS

PREPAREDNESS	ACTIONS
TRIGGERS FOR ACTION **Impact on Day-to-Day Hospital Operations** None; this is a period of preparedness	1. Review and update disaster operations/response, pandemic, surge capacity, and business continuity plans 2. Conduct education and training 3. Review the differences between seasonal and pandemic influenza 4. Conduct hospital surveillance for influenza 5. Assess supplies needed for universal precautions 6. Fit test staff for N-95 masks 7. Educate staff on how they can stop the spread of germs 8. Post 'respiratory etiquette' posters and signs in work areas 9. Provide boxes of facial tissues and trash receptacles 10. Provide alcohol-based hand washing gel 11. Subscribe to LAC Public Health Flu Watch Listserv
ENHANCED OPERATIONS	**ACTIONS**
TRIGGERS FOR ACTION **Impact on Day-to-Day Hospital Operations** Possible impacts that may trigger the need for enhanced or altered operations include: ▪ Confirmed or suspect cases near Los Angeles County ▪ Increased staff absenteeism by x% ▪ Increased emergency department volume by x% ▪ Increased emergency department wait times by x% ▪ Decreased resource availability NOTE: Each facility will need to determine its own thresholds based on baseline assessments of these trigger points and the level of impact upon the facility.	1. Continue to review and update disaster plans 2. Consider placing masks on all patients with flu-like symptoms 3. Seasonal influenza and respiratory illness outbreaks should be reported immediately: LAC Morbidity Unit, 888-397-3993 4. Suspect or confirmed pandemic influenza cases, and laboratory confirmed seasonal influenza-related ICU cases and pediatric deaths should be reported as soon as possible by phone : LAC Acute Communicable Disease Control, business hours: 213-240-7941, after hours: 213-974-1234 5. Plan for infrastructure disruptions 6. Evaluate triage models 7. Educate staff on the current situation regularly 8. For updated information, review: ▪ US DHHS, http://www.flu.gov/ ▪ LAC Public Health, http://lapublichealth.org/acd/Pandemicflu.htm 9. Maintain contact with public health, healthcare, and community partners 10. Implement guidelines received from LACDPH and LACEMS 11. Implement hospital surveillance for pandemic influenza 12. Implement a system for early detection and treatment of ill healthcare workers 13. Reinforce infection control practices 14. Activate external disaster and surge capacity plans 15. Conserve usage of supplies 16. Increase stockpiles for respiratory protection 17. Maintain high suspicion that patients presenting with an influenza-like illness could be infected with pandemic strain 18. Begin creating adjusted staffing patterns 19. Educate staff on staffing and procedures changes

PANDEMIC INFLUENZA RECOMMENDED ACTIONS FOR HOSPITALS

PANDEMIC RESPONSE	ACTIONS
TRIGGERS FOR ACTION	1. Implement disaster plans which may include activating the Hospital Command Center (HCC) 2. Establish segregated waiting areas for patients with influenza symptoms 3. Monitor for nosocomial transmission 4. Establish access control into and within the facility 5. Adjust hospital admission procedures 6. Implement phone triage to discourage ED/outpatient visits 7. Implement adjusted staffing patterns and practices 8. Implement essential staffing and services only 9. Limit the number of healthcare workers that have contact with persons with pandemic influenza to the minimum needed 10. Monitor the health of staff 11. Implement plan to evaluate symptomatic staff before they report for duty 12. Reassess staffing and consider redistribution of resources 13. Consider the use of tents for screening / triage of patients 14. Decontaminate equipment and facility using standard operating procedures 15. Follow LACDPH guidelines for vaccine and/or antivirals, as available
Impact on Day-to-Day Hospital Operations Possible impacts that may trigger the need for enhanced or altered operations include: ▪ Confirmed or suspect cases in Los Angeles County, and/or among staff ▪ Increased staff absenteeism by x% ▪ Increased emergency department volume by x% ▪ Increased emergency department wait times by x% ▪ Decreased resource availability	
RECOVERY	**ACTIONS**
TRIGGERS FOR ACTION	Prepare for a possible next wave: 1. Conduct staff debriefings on what went well and what needs improvement 2. Implement appropriate changes based on debriefing and other analysis, including updating plans 3. Replenish supplies 4. Continue to monitor the health of staff
Impact on Day-to-Day Hospital Operations Possible impacts that may trigger the need for enhanced or altered operations include: All triggers returns to baseline	

RECOMMENDED ACTIONS: PREPAREDNESS PERIOD

TRIGGERS FOR ACTION
Impact on Day-to-Day Hospital Operations None; this is a period of preparedness

1. Review and update disaster operations and response, pandemic, surge capacity, and business continuity plans. Review the Checklist: US DHHS Hospital Pandemic Influenza Planning and the Checklist: CHA Hospital Seasonal - H1N1 Preparedness starting on page 18.
2. Conduct education and training.
3. Review the differences between seasonal and pandemic influenza. See chart on the Comparison of Seasonal, Pandemic and H1N1 Influenza on page 16.
4. Conduct hospital surveillance for influenza. See Hospital Surveillance for Pandemic Influenza on page 47.
5. Assess supplies needed for universal precautions. See Personal Protective Equipment (PPE) guidance on page 54.
6. Fit test staff for N-95 masks. However, surgical masks may be used as needed. See Use of Masks During a Pandemic on page 58. Anticipate that there may be a shortage of PPE, and educate staff on the proper reuse of N95 masks. See page 62.
7. Educate staff on stopping the spread of germs at the work place. See CDC handout on page 51.
8. Post 'respiratory etiquette' posters and signs in work areas. See CDC poster: Cover Your Cough on page 53.
9. Provide boxes of facial tissues and trash receptacles in the work place and for patient areas.
10. Provide alcohol-based hand washing gel in the work place and promote its use.
11. Subscribe to LAC Public Health Flu Watch Listserv. The Influenza Watch LISTSERV of the LAC Department of Public Health is maintained by the Acute Communicable Disease Control Program. The purpose of this LISTSERV is to keep health professionals informed about local, state and national influenza activity. Influenza Watch is sent out to all subscribers every week during flu season. Send an email to LISTSERV@listserv.ladhs.org, and in the body of the email enter SUBSCRIBE FLUWATCH. No information in the subject line is needed.

RECOMMENDED ACTIONS: ENHANCED OPERATIONS

TRIGGERS FOR ACTION

Impact on Day-to-Day Hospital Operations

Possible impacts that may trigger the need for enhanced or altered operations include:

- Confirmed or suspect cases near Los Angeles County
- Increased staff absenteeism by x%
- Increased emergency department volume by x%
- Increased emergency department wait times by x%
- Decreased resource availability

NOTE: Each facility will need to determine their own thresholds based on baseline assessments of these trigger points and the level of impact upon the facility.

1. Continue to review and update disaster plans.
2. Consider placing masks on all patients with flu-like symptoms. Review the Influenza-Like Illness Assessment Tool on page 63.
3. Seasonal influenza and respiratory illness outbreaks should be reported immediately by phone to the LAC Acute Communicable Disease Control Morbidity Unit at 888-397-3993.
4. Suspected or confirmed pandemic influenza cases, or laboratory-confirmed seasonal Influenza-related ICU cases and pediatric deaths should be reported as soon as possible to LAC Acute Communicable Disease Control at 213-240-7941 (business hours) or 213-974-1234 (after hours).
    - Review Initiation of Pandemic Influenza Infection Control Precautions in Healthcare Facilities on page 48.
    - Review the Summary of Infection Control Information for Care of Patients with Pandemic Influenza on page 64.
    - Review Barrier Precautions Depending on Type of Patient Contact on page 57.
5. Plan for infrastructure disruptions that may result due to staffing shortages in other industries. These may include a reduction or lack of services in utility, sanitation, transportation (including fuel), information technology, supply chain, communications, and education fields. Develop contingency plans to maintain operations if one or more of these industries are impacted.
6. Evaluate triage models.
7. Educate staff on the current pandemic influenza situation on a regular basis.
8. For updated information, review: US DHHS, www.flu.gov, and LAC Department of Public Health, http://lapublichealth.org/acd/Pandemicflu.htm.
9. Maintain contact with public health, healthcare, and community partners.
10. Implement guidelines received from LACDPH and the LAC EMS Agency.
11. Implement hospital surveillance for pandemic influenza.

12. Implement a system for early detection and treatment of ill healthcare workers. See Employee Health resources on pages 89-99.
13. Reinforce infection control practices.
14. Activate external disaster and surge capacity plans. Consider activating Hospital Command Center (HCC).
15. Conserve usage of supplies needed for universal precautions and other basics. See guidance on Conservation of Resources on page 59.
16. Increase supplies of hand hygiene supplies, surgical/procedure masks, disposable N95 respirators, face shields, gowns, gloves, facial tissues, central line kits, morgue packs, ventilators, IV pumps, beds, and other respiratory care equipment.
17. Maintain a high suspicion that patients presenting with influenza-like-illness (ILI) could be infected with the pandemic strain.
18. Begin creating adjusted staffing patterns. This may include implementing changes to vacation and on-call policies; adjusting the minimum number of essential personnel required for patient care; adjusting sick leave policies; cross-training staff; and using volunteers/others for non-technical positions. Staff assignments may be affected by influenza/health status; review the Staffing and Human Resource Policy Considerations and additional resources on pages 81-88.
19. Educate staff on staffing and procedure changes.

RECOMMENDED ACTIONS: PANDEMIC RESPONSE

TRIGGERS FOR ACTION

Impact on Day-to-Day Hospital Operations

Possible impacts that may trigger the need for enhanced or altered operations include:

- Confirmed or suspect cases in Los Angeles County, and/or among staff
- Increased staff absenteeism by x%
- Increased emergency department volume by x%
- Increased emergency department wait times by x%
- Decreased resource availability

NOTE: Each facility will need to determine their own thresholds based on baseline assessments of these trigger points and the level of impact upon the facility.

1. Implement disaster plans. For use in the Hospital Command Center, review the Biological Disease – Pandemic Influenza Incident Response Guide, Los Angeles County, on page 69, and the Pandemic Influenza Situation Status Form on page 77.
2. Establish segregated waiting areas for patients with influenza-like symptoms.
3. Monitor for nosocomial transmission. Actions include closing units where there has been nosocomial transmission; cohorting staff and patients; and restricting new admissions to affected units.
4. Establish access control into the facility, such as limiting the number of visitors; screening visitors for signs and symptoms of influenza; limiting points of entry into the facility/campus; limiting access within the facility.
5. Adjust hospital admission procedures, including discharging patients as soon as possible, and deferring elective admissions and procedures.
6. Implement phone triage to discourage ED and outpatient visits.
7. Implement adjusted staffing patterns and practices. Consider reassigning pregnant and high risk staff for complications of influenza; assigning staff recovering from influenza to care for influenza patients; or redirecting staff resources to support patient care. Consider placing all non-essential personnel who cannot be reassigned to support critical hospital services on administrative leave. Consider the needs of staff caring for pandemic influenza patients, such as additional personal and family mental health support, sleeping quarters (if they are not to leave the hospital), additional health monitoring, etc. Consult hospital Human Resources and Legal Counsel for guidance.
8. Implement essential staffing and services only.
9. Limit the number of healthcare workers that have contact with persons with pandemic influenza to the minimum needed.
10. Monitor the health of staff.
11. Implement plan to evaluate symptomatic personnel before they report for duty. This may include taking temperatures of all staff prior to coming to work or inside the facility. Consider sending febrile

staff home. Consider how the use of sick leave will be used; consult hospital Human Resources and Legal Counsel for guidance.

12. Reassess staffing and consider redistribution of resources.
13. Consider the use of alternate sites on hospital campus including tents for screening / triage of patients. See Gaining Approval for Health Care Facilities Use of Surge Tents r on pg 40.
14. Decontaminate equipment and facility using standard operating procedures.
15. Follow LACDPH guidelines for vaccine and/or antivirals, as available.

RECOMMENDED ACTIONS: RECOVERY PERIOD

TRIGGERS FOR ACTION
Impact on Day-to-Day Hospital Operations Possible impacts that may trigger the need for enhanced or altered operations include: ▪ All triggers returns to baseline

Prepare for a possible next wave:

1. Conduct staff debriefings on what went well and what needs improvement.
2. Implement appropriate changes based on debriefing and other analysis, including updating plans.
3. Replenish supplies.
4. Continue to monitor the health of staff. Ensure appropriate follow-up and care of staff who treated or were in contact with influenza patients.

WEB RESOURCES

Los Angeles County

Department of Health Services Emergency Medical Services Agency: http://ems.dhs.lacounty.gov/

- Medical Alert Center: http://ems.dhs.lacounty.gov/MAC/MAC.htm
- Disaster Services: http://ems.dhs.lacounty.gov/Disaster/Disaster.htm
- H1N1 Information: http://ems.dhs.lacounty.gov/Home/SwineFlu.htm
- Manuals and Protocols: http://ems.dhs.lacounty.gov/ManualsProtocols/Manuals.htm
    - Recommended Actions for Hospitals to Prepare for and Respond to Pandemic Influenza
    - Mass Fatality Incident Management: Guidance for Hospitals and Other Healthcare Entities

Department of Public Health: http://www.publichealth.lacounty.gov/

- Pandemic Influenza: http://www.publichealth.lacounty.gov/acd/Pandemicflu.htm
- H1N1 Influenza: http://www.publichealth.lacounty.gov/acd/h1n1.htm
- Biological Incident Plan: Pandemic Influenza Guidelines: http://lapublichealth.org/acd/docs/Flu/pandemicfluexec011106.pdf
- Free health education resources: http://www.publichealth.lacounty.gov/acd/HealthEdH1N1.htm
- Pediatric Surge Pocket Guide: www.lapublichealth.org/eprp/docs/Emergency%20Plans/Pediatric%20Surge%20Pocket%20Guide.pdf

California

Department of Public Health: http://www.cdph.ca.gov/

- Division of Communicable Disease Control: http://www.cdph.ca.gov/programs/dcdc/
- Pandemic Influenza: http://www.cdph.ca.gov/HealthInfo/discond/Pages/PandemicFlu.aspx
- H1N1 Influenza: http://www.cdph.ca.gov/HealthInfo/discond/Pages/H1N1Home.aspx
- Guidance for Infection Control for 2009 H1N1 Influenza in Health Care Settings. CDPH and Cal/OSHA Joint Statement, January 12, 2010: http://www.cdph.ca.gov/HealthInfo/discond/Documents/H1N1-ICGuidanceHealthCareSettings.pdf
- Approval for Health Care Facility Use of Surge Tents, January 20, 2010: http://www.cdph.ca.gov/HealthInfo/discond/Documents/SurgeTentsGuidance.pdf
- All Facilities Letter (AFL) 09-39, H1N1 Response, October 30, 2009: http://www.cdph.ca.gov/certlic/facilities/Documents/LNC-AFL-09-39.pdf
- Vaccination Registration: http://www.calpanflu.org

Division of Occupational Safety and Health (Cal/OSHA): http://www.dir.ca.gov/dosh/

- H1N1 Guidance: http://www.dir.ca.gov/dosh/SwineFlu/SwineFlu.htm
- Cal/OSHA Interim Enforcement Policy on H1N1 and Section 5199 (Aerosol Transmissible Diseases) Issue Date: 2-16-10: www.dir.ca.gov/dosh/SwineFlu/Interim_enforcement_H1N1.pdf

- Appendix A: Respiratory Supply Documentation: www.dir.ca.gov/dosh/SwineFlu/H1N1_Interim_Guidance-Respiratory_Supply_Documentation.pdf
- Aerosol Transmissible Diseases (ATD) Standard. Aug 5, 2009: www.dir.ca.gov/oshsb/atd0.html
- Aerosol Transmissible Diseases Cal/OSHA Standard: http://www.dir.ca.gov/title8/5199.html
- Cal/OSHA Guidance for Employers and Employees Regarding Recent H1N1 (Swine Flu) Cases (7-15-09): http://www.dir.ca.gov/dosh/SwineFlu/Cal-oshaguidanceswineflu.pdf

Federal

Department of Health and Human Services: http://www.pandemicflu.gov/

- Health Professionals: http://pandemicflu.gov/professional/hospital/
- Hospital Planning Checklist: http://pandemicflu.gov/professional/hospital/hospitalchecklist.html
- Medical Offices and Clinics Pandemic Influenza Planning Checklist: http://pandemicflu.gov/professional/hospital/medical.html
- Health Insurer Planning Checklist: http://pandemicflu.gov/professional/business/healthinsurer.html
- Business Planning Checklist: http://pandemicflu.gov/professional/business/businesschecklist.html
- Interim Guidance on Planning for the Use of Surgical Masks and Respirators in Health Care Settings during an Influenza Pandemic: http://pandemicflu.gov/professional/hospital/maskguidancehc.html
- US DHHS Pandemic Influenza Plan, Supplement 4 Infection Control, Hospital Specific Guidance: http://www.hhs.gov/pandemicflu/plan/sup4.html#hosp
- AHRQ Pediatric Hospital Surge Capacity in PH Emergencies: www.ahrq.gov/prep/pedhospital
- EMTALA Requirements and Options for Hospitals in a Disaster: http://www.cms.hhs.gov/SurveyCertificationGenInfo/downloads/SCLetter09_52.pdf
- National Strategic Plan for Emergency Department Management of Outbreaks of Novel H1N1: http://www.flu.gov/professional/hospital/nspemergencydept.html.html
- Medicare Fee-For-Service Emergency and Disaster-Related Policies and Procedures That May Be Implemented Without § 1135 Waivers, January 07, 2010: http://www.cms.gov/H1N1/Downloads/H1N1_Medicare_FFS_Emergency_QsAs.pdf
- H1N1 Vaccine Administration Billing Q & As, October 20, 2009: http://www.cdc.gov/h1n1flu/vaccination/statelocal/vaccing_billing_qa.htm

Centers for Disease Control and Prevention (CDC): http://www.cdc.gov/flu/

- FluSurge: A tool for estimating the surge in demand for hospital-based services (including beds and ventilators): http://www.cdc.gov/flu/tools/flusurge
- Stopping the Spread of Germs at Work: http://www.cdc.gov/germstopper/work.htm
- Cover Your Cough: http://www.cdc.gov/flu/protect/covercough.htm

- Updated Interim Recommendations for the Use of Antiviral Medications in the Treatment and Prevention of Influenza for the 2009-2010 Season: www.cdc.gov/h1n1flu/recommendations.htm
- Infection Control in Health Care Facilities (CDC): http://www.cdc.gov/flu/professionals/infectioncontrol/index.htm
- Interim Guidance for Infection Control for Care of Patients with Confirmed or Suspected Novel Influenza A (H1N1) Virus Infection in a Healthcare Setting at http://www.cdc.gov/h1n1flu/guidelines_infection_control.htm
- Q&A Regarding Respiratory Protection For Preventing 2009 H1N1 Influenza Among Healthcare Personnel: http://www.cdc.gov/h1n1flu/guidelines_infection_control_qa.htm
- Q&A about CDC's Interim Guidance on Infection Control Measures for 2009 H1N1 Influenza in Healthcare Settings, Including Protection of Healthcare Personnel: http://www.cdc.gov/H1N1flu/guidance/control_measures_qa.htm
- Guidance for Businesses and Employers To Plan and Respond to the 2009-2010 Influenza Season: http://pandemicflu.gov/professional/business/guidance.html
- Community Strategy for Pandemic Influenza Mitigation: http://pandemicflu.gov/professional/community/commitigation.html
- Interim Guidance on Infection Control Measures for 2009 H1N1 Influenza in Healthcare Settings, Including Protection of Healthcare Personnel: www.cdc.gov/h1n1flu/guidelines_infection_control.htm

Department of Homeland Security: http://www.dhs.gov/

- Pandemic Influenza Preparedness, Response and Recovery Guide for Critical Infrastructure and Key Resources: http://www.flu.gov/professional/pdf/cikrpandemicinfluenzaguide.pdf

Federal Emergency Management Agency: http://www.fema.gov/

- Continuity of Operations (COOP) Planning Guidance: www.fema.gov/government/coop/index.shtm

Occupational Safety and Health Administration: http://www.osha.gov/

- Guidance on Preparing Workplaces for an Influenza Pandemic: http://www.osha.gov/Publications/influenza_pandemic.html
- Pandemic Influenza Preparedness and Response Guidance for Healthcare Workers and Healthcare Employers, 2007. http://www.osha.gov/Publications/3328-05-2007-English.html

International

World Health Organization: http://www.who.int/en/

- Pandemic Preparedness: http://www.who.int/csr/disease/influenza/pandemic/en/index.html
- Pandemic Influenza Preparedness and Response (WHO guidance document): http://www.who.int/csr/disease/influenza/pipguidance2009/en/index.html

- Pandemic (H1N1) 2009 Influenza: http://www.who.int/csr/disease/swineflu/en/index.html
- Avian (H5N1) Influenza: http://www.who.int/csr/disease/avian_influenza/en/

Other

American College of Emergency Physicians: National Strategic Plan for Emergency Department Management of Outbreaks of Novel H1N1 Influenza, June 2009: http://www.acep.org/WorkArea/DownloadAsset.aspx?id=45781

California Hospital Association Emergency Preparedness: http://www.calhospitalprepare.org

- Hospital Emergency Management Program Checklist: www.calhospitalprepare.org/node/253
- Hospital Surge Planning Checklist: www.calhospitalprepare.org/document/surge-plan-checklist

CIDRAP/SHRM: Doing business during an influenza pandemic: human resource policies, protocols, templates, tools, & tips, Nov 2009: http://www.cidrap.umn.edu/cidrap/files/33/cidrap-shrm-hr-pandemic-toolkit.pdf

HICS Pandemic Influenza Planning Guide (IPG) and Incident Response Guide (IRG): http://www.emsa.ca.gov/HICS/files/Ext_03.doc

NJHA (New Jersey Hospital Association) Pandemic Influenza Planning Modules: http://www.njha.com/paninf/index.aspx

New York City Hospital Guidelines for Pediatric Preparedness: http://www.nyc.gov/html/doh/downloads/pdf/bhpp/hepp-peds-childrenindisasters-010709.pdf

COMPARISON OF SEASONAL, PANDEMIC AND H1N1 INFLUENZA

- Susceptibility to the pandemic influenza virus will be universal.
- Rates of serious illness, hospitalization, and deaths will depend on the virulence of the pandemic virus and differ by an order of magnitude between more and less severe scenarios.
- The typical incubation period (interval between infection and onset of symptoms) for seasonal influenza is approximately 2 days.
- Persons who become ill may shed virus during and before the onset of illness. Viral shedding and the risk of transmission are likely to be greatest during the first 2 days.
- An influenza pandemic could last from18 months to several years, with two to three waves of activity. Waves may last 6 to 8 weeks in affected communities.

	Seasonal Flu	Pandemic Flu	H1N1 Influenza
Cause	Known circulating flu viruses	A novel virus *Implication*: Since no previous exposure, **humans will have little or no pre-existing immunity**	Novel virus: Influenza A 2009 H1N1
Transmission	Large droplet and fomites	Large droplet and fomites	Large droplet and fomites. Appears to be transmitted from person to person through close contact in ways similar to other influenza viruses. All respiratory secretions and bodily fluids, including diarrheal stools, of patients with 2009 H1N1 influenza are considered to be potentially infectious.
Infectious Period	▪ Adults: 1 day prior to symptom onset, 5 days post illness ▪ Children: 10 days ▪ Immune-compromised shed for weeks to months	▪ Unknown ▪ Likely similar to seasonal flu, but unknown. *Implication*: Complicates the use of quarantine, isolation and masks for protection.	▪ Adults: 1 day prior to symptom onset, 7 days post illness or until 1 day after fever is gone
Prevention & Treatment	▪ Annual vaccination ▪ Respiratory hygiene ▪ Four antivirals for treatment and prophylaxis ▪ **However**, viral strains are becoming resistant	▪ Unknown ▪ No vaccine currently exists ▪ Antiviral effectiveness is unknown. *Implication*: Still using a 1950s model for vaccine production. Availability and effectiveness of antivirals for pandemic flu is uncertain.	▪ Tamiflu® (oseltamivir) or Relenza® (zanamivir) ▪ 2009 H1N1 vaccine

	Seasonal Flu	Pandemic Flu	H1N1 Influenza
When does it occur and how is it spread?	Winter seasons in the Northern and Southern Hemispheres	▪ Unknown ▪ Year-round without warning ▪ Rapid worldwide spread. *Implication*: Most important differentiating factor.	Cases began in Mexico, and spread to the US in April 2009. Proximity to Mexico and tourist travel hastened its spread in the US. Appears to be transmitted from person to person through close contact in ways similar to other influenza viruses.
Who is seriously affected?	▪ Elderly ▪ Young children ▪ Chronic conditions	Everyone including the young and healthy. *Implication*: Could greatly impact community infrastructure.	▪ Children ▪ Pregnant women ▪ Immunosuppressed or compromised ▪ Serious cases of pneumococcal disease coincident with increases in influenza-associated hospitalizations
How many are affected?	In US…varies each season, on average: ▪ 36,000 deaths ▪ 200,000 hospitalizations	In US*… ▪ 314,000–734,000 hospitalizations ▪ 89,000–207,000 deaths *Implication*: Can have a devastating impact on hospitals, funeral homes, etc.	CDC updated estimates from April 2009 and January 16, 2010: ▪ 57 million people were infected with 2009 H1N1. ▪ 257,000 H1N1-related hospitalizations. ▪ 11,690 2009 H1N1-related deaths. Latest updates: http://www.cdc.gov/h1n1flu/estimates/April_January_16.htm

* A wide range of estimates exists. This is a midrange estimate provided by the Centers for Disease Control and Prevention.

HOSPITAL PANDEMIC INFLUENZA PLANNING CHECKLIST

This checklist is adapted from the US DHHS CDC Hospital Pandemic Influenza Planning Checklist (June 04, 2007), available at http://pandemicflu.gov/professional/hospital/hospitalchecklist.html

Planning for pandemic influenza is critical for ensuring a sustainable healthcare response. The Centers for Disease Control and Prevention (CDC), with input from other Federal partners, have developed this checklist to help hospitals assess and improve their preparedness for responding to pandemic influenza. Because of differences among hospitals (e.g., characteristics of the patient population, size of the hospital/community, scope of services), each hospital will need to adapt this checklist to meet its unique needs and circumstances.

An effective plan will incorporate information from local and state health departments, emergency management agencies/authorities, hospital associations and suppliers of resources. In addition, hospitals should ensure that their pandemic influenza plans comply with applicable state and federal regulations and with standards set by accreditation organizations, such as The Joint Commission (TJC). Comprehensive pandemic influenza planning can also help facilities plan for other emergency situations.

This checklist should be used as one of several tools for evaluating current plans or in developing a comprehensive pandemic influenza plan.

Checklist Sections

1. Structure for planning and decision making
2. Development of a written pandemic influenza plan
3. Elements of an influenza pandemic plan

---

1. Structure for planning and decision making

Done	In Progress	Not Started	Actions
			Pandemic influenza has been incorporated into disaster planning and exercises for the hospital.
			A multidisciplinary planning committee has been identified specifically to address pandemic influenza preparedness planning and testing.

1. Structure for planning and decision making

Done	In Progress	Not Started	Actions
			Primary and backup responsibility has been assigned for coordinating pandemic influenza preparedness planning. Primary (name, title and contact info): _____ Backup (name, title and contact info): _____
			Members of the pandemic influenza planning committee include (as applicable to each setting) the following: (Check categories below that apply and develop a list of committee members with the name, title, and contact information for each personnel category checked below, and attach to this checklist.) ☐ Hospital administration ☐ Disaster coordinator ☐ Infection control/hospital epidemiology ☐ Medical staff (e.g., internal medicine, pediatrics, hospitalist, infectious disease) ☐ Nursing administration ☐ Human resources ☐ Facility personnel representative (e.g., union rep) ☐ Occupational health / employee health ☐ Legal counsel/risk management ☐ Public relations coordinator/public information officer ☐ Physical therapy ☐ Intensive care ☐ Emergency department ☐ Respiratory therapy ☐ Diagnostic imaging (radiology) ☐ Discharge planning ☐ Staff development/education ☐ Engineering and maintenance ☐ Environmental (housekeeping) services ☐ Central (sterile) services ☐ Security ☐ Dietary (food) services ☐ Pharmacy services ☐ Information technology ☐ Purchasing agent /materials management ☐ Laboratory services ☐ Expert consultants (e.g., ethicist, mental/behavioral health professionals) ☐ Other member(s) as appropriate (e.g., volunteer services, community representative, clergy, local coroner, medical

1. Structure for planning and decision making

Done	In Progress	Not Started	Actions
			examiner, morticians)
			Contact for information on pandemic influenza planning resources have been identified at the local health department and hospital association. ▪ County: LAC DHS EMS Agency, Disaster Management Unit, 562-347-1500 ▪ Local hospital association: Hospital Association of Southern California, Regional Hospital Surge Planning Coordinator, 213-538-0700
			Local and regional emergency preparedness groups (including bioterrorism/communicable disease coordinators) contacts have been identified. ▪ City (name, title and contact info): _____ ▪ County: LAC DHS EMS Agency, Disaster Management Unit, 562-347-1500
			Local or regional pandemic influenza planning groups have been contacted for information on coordinating the facility's plan with other pandemic influenza plans.

2. Development of a written pandemic influenza plan

Done	In Progress	Not Started	Actions
			Copies of relevant sections of the US DHHS Pandemic Influenza Plan (http://www.hhs.gov/pandemicflu/plan/) and policy documents that may be forthcoming have been obtained and reviewed for incorporation into the facility's plan.
			Copies of relevant sections of other available plans have been obtained and reviewed for incorporation into the facility's plan.
			A copy of the facility plan and other relevant materials are available in Administration and Infection Control. (List other locations where information is available, including facility intranet sites.) Additional locations: _____
			The plan includes strategies for collaborating with local and regional planning and response groups and hospitals and other healthcare facilities in order to coordinate response efforts at the community level (e.g., staffing, resources, triage algorithms, etc.).
			The facility plan includes the elements listed in #3 below.
			The plan stratifies implementation of specific actions on the basis of

2. Development of a written pandemic influenza plan

Done	In Progress	Not Started	Actions
			pre-identified triggers.
			The plan identifies the person(s) authorized to implement the plan and the organizational structure that will be used, including the delegation of authority to carry out the plan 24/7.
			Responsibilities of key personnel and departments within the facility related to executing the plan have been described.
			Personnel who will serve as back-up (e.g., B team) for key personnel roles have been identified.
			A tabletop simulation exercise or other exercises have been developed to test the plan. Date performed: _____ Date performed: _____
			Functional and/or full scale drill/exercise has been developed to test the plan. Date performed: _____
			The plan is updated regularly and includes current contact information and lessons learned from exercises and drills.

3. Elements of an influenza pandemic plan

Done	In Progress	Not Started	Actions
			A plan is in place for surveillance and detection of pandemic influenza in hospital patients and staff.
			▪ A method for performing and reporting syndromic surveillance for persons with influenza-like illness (ILI) has been tested and evaluated during the regular influenza season in preparation for using the system for pandemic influenza surveillance. Hospital sites for syndromic surveillance should include the emergency department, hospital clinics, and occupational health. Surveillance reports are sent to hospital epidemiology/infection control personnel and to the LACDPH ACDC. (The frequency of reporting should be determined by the LACDPH and reflect the pandemic severity level, as well as any applicable federal or state recommendations.)

3. Elements of an influenza pandemic plan

Done	In Progress	Not Started	Actions
			▪ Responsibility has been assigned for monitoring public health advisories (local, state and federal) and for updating the pandemic response coordinator and members of the pandemic influenza planning committee when pandemic influenza has been reported in the United States and is nearing the geographic area. Primary (name, title and contact info): _____ Backup (name, title and contact info): _____
			▪ A written protocol has been developed for monitoring and reporting seasonal ILI among hospitalized patients, volunteers, and staff (e.g., weekly or daily number of patients and staff with ILI). (Having a system for tracking illness trends during seasonal influenza will ensure that the hospital can detect stressors that may affect operating capacity, including staffing and supply needs, during a pandemic.) Information on the clinical signs and diagnosis of influenza is available at www.cdc.gov/flu/professionals/diagnosis/.
			▪ A protocol has been developed for the evaluation and diagnosis of hospitalized patients and/or staff with symptoms of pandemic influenza. Information on the clinical signs and diagnosis of influenza is available at www.cdc.gov/flu/professionals/diagnosis/.
			▪ A protocol has been developed for the management of persons with possible pandemic influenza who are seen in the emergency department, hospital clinics, or are transferred from another facility or referred for hospitalization by an admitting physician. The protocol includes criteria for detecting a possible case, the diagnostic work-up to be performed, infection control measures to be implemented, medical treatment, and directions for notifying infection control.
			▪ Protocols include triggers for different levels of action that are based on the Pandemic Severity Index.
			▪ A system is in place to monitor for and internally review nosocomial transmission of seasonal influenza among patients and staff in the facility. Information used from this monitoring system is used to implement prevention interventions (e.g., isolation, cohorting). (This system will be necessary for assessing pandemic influenza transmission.)
			A facility communication plan has been developed and is coordinated with the local health authority.

3. Elements of an influenza pandemic plan

Done	In Progress	Not Started	Actions
			▪ Key health department contacts for communication during an influenza pandemic have been identified. o LACDPH ACDC: 213-240-7941 o LACDPH PIO: 213-240-8144, media@ph.lacounty.gov o LACDHS EMS MAC: 866-940-4401
			▪ Responsibility has been assigned for communication with LACDPH and LACDHS (i.e., case reporting, status updates) during a pandemic. Primary (name, title and contact info): _____ Backup (name, title and contact info): _____
			▪ Responsibility has been assigned for communicating with the public. *Clinical Spokesperson:* Primary (name, title and contact info): _____ Backup (name, title and contact info): _____ *Public Relations Spokesperson:* Primary (name, title and contact info): _____ Backup (name, title and contact info): _____
			▪ Methods of communicating with the public and the subjects that will be addressed have been discussed.
			▪ Plans and responsibilities for communicating with hospital staff, volunteers, and private medical staff have been developed. Anticipate employee fear/anxiety and plan communications accordingly.
			▪ Plans and responsibilities for communication with patients and their family members have been developed.
			▪ Responsibility has been assigned for internal communication with staff regarding the status and impact of pandemic influenza in the hospital. Primary (name, title and contact info): _____ Backup (name, title and contact info): _____

3. Elements of an influenza pandemic plan

Done	In Progress	Not Started	Actions
			▪ The types of communication needs (e.g., staff briefings, community updates) and methods of communication (e.g., intranet, posters, fliers, newspaper reports) have been identified and are appropriate for individuals with visual, hearing, or other disabilities, or limited English proficiency.
			▪ A list has been created of other healthcare entities, including their points of contact, within the region (e.g., other hospitals, long-term care and residential facilities, local hospital's emergency medical services, clinics, relevant community organizations [including those involved with disaster preparedness]) with which it will be necessary to maintain communication in real-time and be able to report information in a timely and accurate manner during a pandemic (Insert location of the list of contacts and attach a copy to the pandemic plan) ▪ Location: _____
			▪ The facility has been represented in discussions with other hospitals regarding local plans for inter-facility communication during a pandemic.
			A plan is in place to provide education and training for personnel and information for patients and visitors to ensure that the implications of and basic prevention and control measures for pandemic influenza are understood.
			▪ A person has been designated with responsibility for coordinating education and training on pandemic influenza (e.g., identifies and facilitates access to available programs, maintains a record of personnel attendance). (Insert name, title and contact information.) _____
			▪ Current and potential opportunities for long-distance (e.g., Web-based) and local (e.g., health department or hospital-sponsored) influenza training programs have been identified.
			▪ Language, format (i.e., prepared for individuals with visual, hearing or other disabilities) and reading-level appropriate materials for clinical and non-clinical personnel have been identified to supplement and support education and training programs (e.g., materials available through local, state and federal public health agencies and through professional organizations), and a plan is in place for obtaining these materials.
			▪ Education and training for hospital personnel includes information on differences in pandemic influenza infection prevention and control measures if necessary and are provided in languages and format appropriate for hospital personnel. Regular education and training should include, but not be limited to: training in Standard and Droplet Precautions; use of respiratory protection; social distancing and respiratory hygiene/cough etiquette.

3. Elements of an influenza pandemic plan

Done	In Progress	Not Started	Actions
			▪ Education and training includes information on the hospital's pandemic influenza plan, including relevant personnel policies and operational changes that will occur once the plan is implemented.
			▪ Informational materials (e.g., brochures, posters) on pandemic influenza and relevant hospital policies (e.g., visitation) have been developed or identified for patients and their families. These materials are language format (i.e., prepared for individuals with visual, hearing or other disabilities) and reading-level appropriate and a plan is in place to disseminate these materials to hospital patients and visitors.
			A plan has been developed for triage (i.e., initial patient evaluation) and admission of patients during a pandemic that includes the following:
			▪ A designated location, separate from other clinical triage and evaluation areas, (utilizing the principles of social distancing) for the triage of patients with possible pandemic influenza.
			▪ Assigned responsibility to specifically-trained healthcare personnel overseeing the triage process.
			▪ Use of signage to direct and instruct patients with possible pandemic influenza on the triage process that is language, format (i.e., prepared for individuals with visual, hearing or other disabilities) and reading-level appropriate.
			▪ A telephone triage system for prioritizing patients who require a medical evaluation (i.e., those patients whose severity of symptoms or risk for complications necessitate being seen by a physician).
			▪ Criteria for prioritizing admission of patients to those in most critical need.
			▪ Communication with LAC EMS MAC/ReddiNet for transport of suspected flu patients.
			▪ A method to specifically track admissions and discharges of patients with pandemic influenza
			A plan has been developed to address the needs of specific patient populations that may be dispropor-tionately affected during a pandemic or that may need services normally not provided by the hospital (e.g., pediatric and adult hospitals may need to extend services to other populations).

3. Elements of an influenza pandemic plan

Done	In Progress	Not Started	Actions
			▪ Populations to consider o Children and their families o Frail elderly and their caretakers o Young adults o Patients with chronic diseases (e.g., diabetes, hemodialysis) o Physically or mentally challenged / individuals with disabilities o Pregnant women o Immunocompromised children and adults o Others (specify)_____
			▪ Issues to consider o Clinical expertise available o Need for specialized equipment, medical devices, and medications o Transportation o Mental health concerns o Need for social services o Translation services/medical interpreters o Cultural issues affecting behavioral response
			A plan has been developed for facility access during a pandemic that includes the following:
			▪ Criteria and protocols for modifying admission criteria on the basis of current bed capacity.
			▪ Criteria and protocols for closing the facility to new admissions and referrals to other facilities.
			▪ Criteria and protocols for limiting or restricting visitors to the hospital, including specific plans for communicating with patients' families about hospital rules for visiting hospitalized family members.
			▪ A contingency plan has been developed in the event of hospital quarantine in conjunction with local jurisdictions to ensure quarantine is enforced and necessary supplies, equipment, and basic necessities can be delivered and maintained.
			A plan has been developed for facility security during a pandemic that includes the following:
			▪ Hospital security personnel input into procedures for enforcing facility access controls.
			▪ Plans for facilitating identification (e.g., special badges) of non-facility healthcare personnel and volunteers by security staff and facilitating their access to the facility when deployed.
			▪ The identity of key and essential personnel who would have access to the facility during a pandemic.

3. Elements of an influenza pandemic plan

Done	In Progress	Not Started	Actions
			▪ Training security personnel.
			▪ Share plans with local law enforcement if access control includes closing/blocking streets.
			▪ Plans for establishing a controlled, orderly, flow of patients within the facility.
			An infection control plan that includes the following is in place for managing hospital patients with pandemic influenza:
			▪ An infection control policy that requires healthcare personnel to use at a minimum Standard Precautions and Droplet Precautions (i.e., mask for close contact) with symptomatic patients. o www.cdc.gov/ncidod/dhqp/gl_isolation_standard.html o www.cdc.gov/ncidod/dhqp/gl_isolation_droplet.html
			▪ A communication plan is developed to inform all hospital staff and employees about appropriate need for and use of infection control measures, social distancing practices, and personal protective equipment.
			▪ Use of respiratory protection (i.e., N-95 or higher-rated respirator as feasible) by personnel who are performing aerosol-generating procedures (e.g., bronchosocopy, endotrachael intubation, open suctioning of the respiratory tract). Use of N-95 respirators for other direct care activities involving patients with confirmed or suspected pandemic influenza is also prudent. If supplies of N-95 or higher-rated respirators are not available, surgical masks can provide benefits against large droplet exposures.
			▪ A strategy for implementing Respiratory Hygiene/Cough Etiquette throughout the hospital.
			▪ A plan for cohorting patients with known or suspected pandemic influenza in designated units or areas of the facility.
			▪ Responsibility has been assigned for regularly monitoring www.pandemicflu.gov for updates of infection control recommendations and implementing recommended changes. Once a pandemic influenza virus is detected and its transmission characteristics are known, US DHHS/CDC will provide updated guidance on any need to modify infection control recommendations. Primary (name, title and contact info): _____ Backup (name, title and contact info): _____
			▪ A plan for monitoring adherence to infection control procedures and for monitoring the effectiveness of the infection control plan.

3. Elements of an influenza pandemic plan

Done	In Progress	Not Started	Actions
			The facility's human resource and payment policies should be reviewed to identify and eliminate language that may encourage staff to work when ill or even when they are symptomatic with influenza-like illness and especially when they are within the period of communicability. **An occupational health plan for addressing staff absences and other related occupational issues has been developed that includes the following:**
			▪ A liberal/non-punitive sick leave policy that addresses the needs of ill and symptomatic personnel and facility staffing needs during various levels of a pandemic health crisis. The policy considers the following: o The handling of personnel who develop symptoms while at work. o Allowing and encouraging ill people to stay home until no longer infectious. o When personnel may return to work after having pandemic influenza. o Personnel who need to care for family members who are ill. o Personnel who must stay home to care for children if schools and childcare centers close o A plan to educate staff and volunteers to self-assess and report symptoms of pandemic influenza before reporting for duty; consider a phone triage system similar to that used for patients. o A list of mental/behavioral health, community and faith-based resources that will be available to provide counseling to personnel during a pandemic. o A system to track annual influenza vaccination of personnel. (Having a system in place to track annual vaccination will facilitate documentation and tracking of pandemic influenza vaccine in personnel.) o A plan for managing personnel who at the time of a pandemic are at increased risk for influenza complications (e.g., pregnant women, immunocompromised workers, employees 65 yrs of age and over). A plan might include, for example, placing them on administrative leave, altering their work location, or other appropriate alternative.
			A vaccine and antiviral use plan has been developed.
			▪ Websites have been identified for obtaining the most current recommendations and guidance for the use, availability, access, and distribution of vaccines and antiviral medications during a pandemic.
			▪ Contact for obtaining vaccine and antiviral prophylaxis: LAC DHS via the Medical Alert Center, 866-940-4401, or the EMS Duty Officer at emsalert@dhs.lacounty.gov

3. Elements of an influenza pandemic plan

Done	In Progress	Not Started	Actions
			▪ LACDPH and the hospital have agreed upon the hospital's role, if any, in a large scale program to distribute vaccine and antivirals to the general population.
			▪ A list has been developed of key healthcare and other personnel who are essential for maintaining hospital operations during an influenza pandemic who would be the first priority for influenza vaccination.
			▪ A plan is in place for expediting administration of influenza vaccine to patients as recommended by the CDC, CDPH and LACDPH.
			▪ A plan is in place for expediting provision of antiviral prophylaxis/treatment to patients as recommended by the CDC, CDPH and LACDPH.
			▪ A plan is in place for expediting administration of influenza vaccine to staff as recommended by the CDC, CDPH and LACDPH.
			▪ A plan is in place for expediting provision of antiviral prophylaxis/treatment to staff as recommended by the CDC, CDPH and LACDPH.
			▪ The vaccine/antiviral plan considers the following: o How decisions on allocation of limited vaccine or antivirals will be made. o How persons who receive antiviral prophylaxis/ treatment will be followed for adverse events.
			▪ Security issues have been identified and addressed in the influenza vaccine and antivirals use plans.
			Issues related to surge capacity during a pandemic have been addressed and discussed with the local health department and other pandemic influenza planning partners.
			Healthcare services
			▪ Plans include strategies for maintaining the hospital's core missions and continuing to care for patients with chronic diseases (e.g., hemodialysis and infusion services), women giving birth, emergency services, and other types of required care unrelated to influenza.
			▪ Criteria have been developed for determining when to cancel elective admissions and surgeries.
			▪ Plans for shifting healthcare services away from the hospital, e.g., to home care.
			▪ Ethical issues concerning how decisions will be made in the event healthcare services must be prioritized and allocated (e.g., decisions based on probability of survival) have been discussed.
			▪ A procedure has been developed for communicating hospital status to LACEMS, LACDPH, and the public.

3. Elements of an influenza pandemic plan

Done	In Progress	Not Started	Actions
			Staffing
			▪ A contingency staffing plan has been developed that identifies the minimum staffing needs and prioritizes critical and non-essential services on the basis of essential facility operations.
			▪ The contingency staffing plan considers how health professions students will be utilized.
			▪ A plan has been developed for utilizing non-facility volunteer staff, such as those who may be made available through the Emergency System for Advanced Registration of Volunteer Health Professionals (ESAR-VHP) to provide patient care when the hospital reaches a staffing crisis.
			▪ The contingency staffing plan includes a strategy for training of non-facility volunteers (e.g., retired clinicians, trainees) and includes a procedure for rapid credentialing and privileging and badging for easy identification by security and access to the facility when deployed.
			▪ The contingency staffing plan includes a strategy for cross-training and reassignment of personnel to support critical services (consider impact on those represented by a union).
			▪ The contingency staffing plan considers alternative strategies for scheduling work shifts in order to enable personnel to work longer hours without becoming overtired.
			▪ Responsibility has been assigned for conducting a daily assessment of staffing status and needs during an influenza pandemic. Primary (name, title and contact info): _____ Backup (name, title and contact info): _____
			▪ Define criteria for declaring a “staffing crisis” that would enable the use of emergency staffing alternatives.
			▪ Strategies have been developed for supporting personnel whose family and/or personal responsibilities or other barriers prevent them from coming to work (e.g., strategies that take into account the principles of social distancing when schools are closed, care of elders, transportation, reasonable accommodation or governmental mandate).
			▪ The staffing plan includes strategies for collaborating with local and regional planning and response groups to address widespread healthcare staffing shortages during a crisis, including the development of memorandums of advanced agreement (MAAs) and memorandums of understanding (MOUs) with regional healthcare partners.

3. Elements of an influenza pandemic plan

Done	In Progress	Not Started	Actions
			▪ Legal counsel has reviewed emergency laws for using healthcare personnel with out-of-state licenses.
			▪ Legal counsel has made sure that any insurance and other liability concerns have been resolved.
			Consumable and durable medical equipment and supplies
			▪ Estimates have been made of the quantities of essential patient care materials and equipment (e.g., intravenous pumps and ventilators, pharmaceuticals, diagnostic testing materials) and personal protective equipment (e.g., masks, respirators, gowns, gloves, and hand hygiene products), that would be needed during an eight-week pandemic with subsequent eight-week pandemic waves.
			▪ Estimates have been shared with local and regional planning groups to better plan stockpiling agreements.
			▪ A strategy has been developed for how priorities would be made in the event there is a need to allocate limited patient equipment (e.g., ventilators), pharmaceuticals (e.g., antiviral and antibacterial therapy), and other resources.
			▪ A plan has been developed to address related shortages of supplies (e.g., intravenous fluids, personal protective equipment), including strategies for using normal and alternative channels for procuring needed resources.
			▪ Consider contacting primary vendors about their business continuity plans.
			▪ A list of alternative vendors for medical devices, pharmaceuticals, and contracted services (e.g., laundry, housekeeping, food services) has been developed.
			▪ A plan has been developed for maintaining critical laboratory testing capability in-house and priorities for tests that require shipping; back-up plans are in place for testing services that will remain in-house.
			▪ A process is in place to track and report to public health and other response partners, in real-time, information regarding the status of the hospital and resources available that would identify burden on the system.
			Bed capacity
			▪ Surge capacity plans include strategies to help increase hospital bed capacity.
			▪ Facility space (including the consideration to use tents and where they will be located on campus) has been identified that could be adapted for use as expanded inpatient care areas.

3. Elements of an influenza pandemic plan

Done	In Progress	Not Started	Actions
			▪ Plans are in place to increase physical bed capacity (staffed beds), including the equipment, personnel and pharmaceuticals needed to treat a patient with influenza (e.g., ventilators, oxygen, antivirals).
			Postmortem care
			▪ A contingency plan has been developed for managing an increased need for post mortem care and disposition of deceased patients.
			▪ An area in the facility that could be used as a temporary morgue has been identified.
			▪ Logistical support for the management of the deceased has been discussed with local and regional planning contacts and County coroner.
			▪ Mortality estimates have been used to anticipate and supply needed body bags and shroud packs.
			▪ Plans for expanding morgue capacity have been discussed with local and regional planning contacts.
			▪ Local morticians have been involved in planning discussions.
			▪ Risk communications plans in case traditional, religious or cultural practices are not able to be maintained.

HOSPITAL H1N1 – SEASONAL INFLUENZA PREPAREDNESS CHECKLIST

This checklist has been developed by the CHA Hospital Preparedness Program and is intended to be used as one of several tools to assist in preparation for H1N1/Seasonal Influenza. The checklist recommendations are general in nature with a purpose of prompting review and action. As public health is the lead agency in this event, every effort should be made to remain up to date with rapidly changing local, state, and federal guidance and regulations.

1. Review/Update Plans
❑ Review and update surge plans with an emphasis on infectious disease surge, including Pandemic Influenza Plan and related policies and procedures (e.g. mass fatality, mental health support).
❑ Review the CDC Hospital Pandemic Influenza Planning Checklist. Incorporate local situation/activation levels rather than WHO pandemic phases into plans.
❑ Review and update Emergency Operations Plan (see CHA Emergency Management Program Checklist).
❑ Verify that policies and procedures are consistent with government guidance and regulations (such as Cal/OSHA) regarding protection (infection control), testing, reporting, and treatment of suspected and confirmed cases of H1N1.
❑ Ensure that processes are in place to both update protocols as guidance and regulations change, as well as to communicate changes to staff, physicians, patients and visitors.
❑ Review hospital surge planning (see CHA Hospital Surge Planning Checklist).
❑ Evaluate potential need for external triage to minimize exposure of patients and staff (See S&C-09-52).
❑ Review process to request Licensing and Certification program flexibility (see AFL 06-33).
❑ Review/establish plans for cohorting infectious disease patients.
❑ Document planning for use of alternative/expanded treatment areas to increase patient care capacity.
❑ Plan for increase in pediatric, intensive care unit patients and other specific patient populations that may be disproportionately affected or may need services not normally provided by the hospital.
❑ Ensure effective procedures for expediting admissions and discharges.
❑ Consider using available space to create a “discharge lounge” for patients to await transportation home. Plan to arrange transportation for discharged patients.
❑ Plan for mental health services/psychosocial impacts.
❑ Develop processes to address austere care/ethical decision making.
❑ Review/update Mass Fatality Plan.
❑ Develop or revise Aerosol Transmissible Disease Plan, incorporating new Cal-OSHA regulations.
❑ Review HICS Incident Planning Guides (IPG) and Incident Response Guides (IRG) for Pandemic Influenza and consider pre-assigning staff to relevant Incident Management Team (IMT) positions.
❑ Develop joint contingency plans with physicians, independent physician associations (IPAs), urgent care centers and community clinics, which may include extended and weekend hours.
❑ Ensure triggers for plan activation are in place, realistic, and consistent with guidance.
2. Limited Services and Scarce Resources
❑ Ensure that protocols and processes are in place to prioritize limited services and scarce resources.
❑ Prepare to implement alternate standards of care as permitted or directed by state or federal authorities, with appropriate input from medical staff and legal counsel. In absence of such direction, maintain normal standards of care by all means available.

- ❑ Develop plans for allocating scarce resources as approved by appropriate hospital committee(s) (e.g., ethics).
- ❑ Plan to implement adjusted staffing patterns and practices as allowed by regulation.
- ❑ Implement cross-training of staff in needed roles (e.g. security).
- ❑ Review policies and procedures to evaluate/credential, train and assign volunteers.

3. Equipment, Supplies and Pharmaceuticals

- ❑ Ensure resources and/or supply chain plan to meet surge of influenza patients (e.g., ventilators, masks, N95 respirators, antivirals).
  - ❑ Increase inventory of influenza-related supplies (e.g. procedure masks, N95 respirators, eye protection, gowns, gloves, hand hygiene supplies, facial tissues, nasal swabs, transport medium, disinfectant supplies, central line kits, morgue packs, etc.) as able.
  - ❑ Assess stock and availability of ventilators, other respiratory care equipment, IV pumps, cardiac monitors and beds.
  - ❑ Plan for staff fit testing for alternate brand N-95 respirators for anticipated shortage of current brand.
  - ❑ Maintain modest supplies of antiviral agents as per guidance, including pediatric suspension oseltamivir
  - ❑ Implement plan to track resources.
  - ❑ Document efforts to secure scarce resources
  - ❑ Plan to receive stockpile from local health care agency/public health (PPE, antivirals, vaccine).

4. Workforce Vaccination

- ❑ Plan for vaccination of employees for both seasonal and H1N1 influenza, assuming separate vaccination cycles. Educate and encourage staff to be vaccinated to reduce absences and reduce transmission
  - ❑ Ensure your hospital has pre-registered for H1N1 vaccine at www.CalPanFlu.org.
  - ❑ Develop/update plans for vaccination of healthcare workforce to possibly include up to 4 injections at different times (seasonal, pneumococcal, H1N1 series).
  - ❑ Plan for prioritization of H1N1 staff vaccination in accordance with government guidance.
  - ❑ Maintain robust seasonal influenza vaccination program.
  - ❑ Each vaccination plan will need to address:
    - ❑ Receipt, storage, and security of vaccines.
    - ❑ Tracking of vaccinated personnel to include monitoring for complications and/or adverse events.

5. Triage

- ❑ Ensure triage plan identifies and separates potential H1N1 patients from non-infected patients to minimize exposures.
  - ❑ Develop alternative triage plan for suspected influenza cases as appropriate to response level, such as triage outside the facility, drive-through triage, , or telephone triage.
  - ❑ Establish alternate locations and staffing for triage, medical screening exams and/or care, as appropriate to situation and setting.
  - ❑ Develop health information call centers or coordinate/link with community call centers.
  - ❑ Configure ED waiting rooms with segregated areas for patients with influenza-like symptoms and those without.
  - ❑ Notify California Department of Public Health Licensing and Certification regional office as appropriate.

6. Monitor Workforce for influenza-like-illness

- ❑ Develop plans to monitor workforce for influenza-like-illness to minimize exposure and to comply with hospital exclusion-from-work-policy.

- ❑ Consult hospital human resources and legal counsel for guidance on employee health policies.
- ❑ Implement plan to evaluate symptomatic personnel before they report for duty. This may include taking temperatures of all staff prior to entering the facility.
- ❑ Develop workplace policies to address employee declination of H1N1 vaccination.
- ❑ Consider reassigning pregnant and high risk staff to areas with lower exposure potential.
- ❑ Adopt policies that encourage staff to report illness and stay home.
- ❑ Review Human Resource policies to identify and eliminate language that may encourage staff to work when ill or when they are within the period of communicability.
- ❑ Review sick leave, vacation and on-call policies.
- ❑ Develop an Occupational Health plan for addressing symptomatic staff.
- ❑ Consider work- at- home policies where feasible for business/non-clinical staff.
- ❑ Develop antiviral prophylaxis policies for staff exposure as per guidance.
- ❑ Develop antiviral treatment criteria/plan and resources for staff who become ill.
- ❑ Subject to state and local guidance, consider assigning staff recovered from influenza to care for influenza patients.

7. Staff/Physician Education and Communication

❑ Provide education and cross-training for specific needs (e.g., PPE, pediatric care, ventilator management, security).

- ❑ Ensure Healthcare personnel are properly trained on infection control principles and the appropriate use of PPE.
- ❑ Develop communication plan that addresses the need for staff updates regarding infection control, testing and treatment protocols and infected/exposed staff protocols.
- ❑ Develop education/training programs as necessary to implement hospital plans for surge, cross training to address increased needs (e.g. ventilator care, security), infection control, use of cached equipment/supplies, employee exposure and other needs.
- ❑ Provide guidance and encourage employees to be personally prepared (e.g. childcare, family plans, vaccinations).
- ❑ Poll staff to determine whether they plan to work during an outbreak.
- ❑ Ensure physicians are aware of altered standards of care plans and the potential transition from individual-centered to population-based care.
- ❑ Review the hospital Aerosol Transmissible Disease plan with staff and ensure hospital is in compliance with the Cal/OSHA ATD Standards.

❑ Plan for clear and regular communication with staff regarding guidance, protocols and situation status.

- ❑ Confirm staff is aware of and follows hospital policies and procedures as they relate to treatment of seasonal influenza, H1N1 and other infectious patients.
- ❑ Facilitate situational awareness by providing frequent and consistent pathway of information regarding event to staff.

8. Infection Prevention

❑ Review infection control management protocols for patients, visitors, vendors and others entering the facility.

- ❑ Develop plan based on local public health guidance for infection control practices for visitors and patients.
- ❑ Screen visitors for signs and symptoms of influenza.
- ❑ Provide information to patients and visitors on basic prevention and control measures for influenza.
- ❑ Develop process to monitor for nosocomial influenza transmission.
- ❑ Develop process to cohort influenza-like-illness patients and restrict non-influenza-like-illness admissions to those units.

❑ Develop process to provide for dissemination of accurate and coordinated public information.
❑ Post "respiratory etiquette" signs in high traffic areas.
❑ Ensure that masks, facial tissue and appropriate trash receptacles are in appropriate areas.
❑ Install hand hygiene dispensers in high traffic locations.
❑ Establish plans to limit the number of visitors, which include considering restriction of pediatric visitors, in coordination with other health care facilities/local public health department
9. Operational Area Communication and Coordination
❑ Identify and establish communication protocols with Operational Area medical-health agency(ies) for coordination, resource management/mutual aid, guidance updates and status reporting.
❑ Follow SEMS (Standardized Emergency Management System) guidelines to request mutual aid when unable to secure resources through usual channels (for example, requesting through operational area medical health branch of Emergency Operations Center or LHD Department Operations Center).
❑ Ensure established relationship with LHD/LEMSA for planning and response activities Hospital Infection Preventionists, Emergency Preparedness Coordinator and, Public Information Officer). Ensure that hospital communication channels are in place for timely receipt and dissemination of federal, state and local guidance, regulations, pandemic/influenza status updates and other related information (who, how, when).
❑ Participate in any established conference calls with local health agencies and the California Department of Public Health.
❑ Participate in HAvBED reporting.
❑ Enroll in CAHAN and monitor communications.
❑ Ensure hospital is engaged in any alternate care site (ACS) planning in the community, with consideration of triage/transport policies.
❑ Follow local public health guidelines for vaccine and/or antivirals, as available.
❑ Follow EMS guidelines for patient transport, as available.
❑ Coordinate with the local health department on risk communication messaging for traditional media and other methods to educate public regarding infection control, where to receive vaccinations (not the ED), when to seek care and appropriate home care.
❑ Provide and reinforce public messaging through use of posters, flyers and signs within the hospital, public service announcement messaging on televisions in waiting rooms, mailings to patients, etc.
❑ Coordinate with the local health department on preparation of fact sheets and media messaging.
❑ Facilitate communication between medical staff leadership and public health officials.
❑ Review and consider guidance and regulation (and potential conflict) with the hospital emergency management committee, senior leadership, medical staff and legal counsel when determining any course of action.
❑ Ensure awareness of Healthcare Preparedness and Pandemic Influenza Healthcare funding and how the hospital may use funds. Consult with local Hospital Preparedness Program grant administrator.
10. Business Continuity Planning
❑ Ensure continuity of operations plans assume reduced workforce and potential financial impacts (e.g., reduction in scheduled admissions, registry use, increased use of resources).
❑ Identify critical functions.
❑ Plan for influenza surge for several weeks to months with potential cancellation of elective surgeries and subsequent loss of revenue.

❑ Plan for infrastructure disruptions that may result from staffing shortages in other industries. These may include a reduction or lack of services in utility, sanitation, transportation (including fuel), information technology, supply chain, communications, and education sectors.
❑ Establish charge code for tracking incident-related expenses.
❑ Ensure HICS forms are completed to provide accurate documentation of the hospital's response activities (required for potential reimbursement)
❑ Identify staff that can work from home or in other locations and facilitate any needed IT connections.
11. Security
❑ Address potential need for security to limit/manage facility access, and protect scarce resources (e.g., masks, N95 respirators, vaccine, antivirals).
❑ Establish access control into the facility, such as limiting points of entry.
❑ Plan for secure transport and storage of scarce resources (for example, pharmaceuticals, N95 respirators).

SAMPLE PLAN TABLES OF CONTENTS / ORGANIZATION

Below are several examples of the components of and how a pandemic influenza plan may be organized.

Sample 1	Sample 2
• Surveillance Plan • Communications Plan • Facility Access, Triage and Admission Plan • Surge Capacity Plan • Occupational Health Plan • Clinical Guidelines • Education and Training Plan • Medicines Plan • Psychosocial Plan • Mortuary Plan	• Introduction • Pandemic Influenza Patient Management • Infection Control • Vaccination • Antiviral Prophylaxis and Therapy • Staffing • Equipment and supplies • Risk Communications
Sample 3	**Sample 4**
• Risk Assessment - Most Likely Epidemic Pathogens • Pre-Event Information Dissemination • Detection of Infectious Disease Epidemic • Activation of Hospitalwide Emergency Response • Notifications • HEICS Response Measures and Responsibilities • Infection Control Practices for Patient Management • Post-Exposure Medical Management • Laboratory Support and Confirmation	• Plan Overview • Incident Management • Infection Control • Patient Placement • Patient Care • Equipment and Supplies • Staffing • Employee Health • Communication • Mental Health • Security and Access Control • Mass Fatality Incident Management Procedures
Sample 5	**Sample 6**
• Procedure for Triage of Infectious Patients • Permanent Negative Air Flow Isolation Rooms • Alternate Site for Isolation of Infectious Patients • Inpatient Admissions • Staffing • Healthcare Associated Infection (HAI) • Education • Vaccination and Chemoprophylaxis • Infection Control Measures • Bed Management • Patient Transport • Medical Care at Non-Traditional Facilities • Ongoing Evaluation • Monitoring Protocol Efficacy	• Surveillance and Detection • Communication • Education and Training • Triage and Admissions • Special Populations • Facility Access and Security • Infection Control • Human Resources and Payment Policies • Occupational Health • Vaccine and Antiviral Use • Surge Capacity: Services, Staffing, Equipment and Supplies, Bed Capacity and Postmortem Care

SAMPLE PLAN ACTIVATION TRIGGERS

Each facility will need to determine its own thresholds based on baseline assessments of these trigger points and the level of impact upon the facility.

Sample 1
Impact on Day-to-Day Hospital Operations

- Confirmed or suspect cases near Los Angeles County
- Increased staff absenteeism by x%
- Increased emergency department volume by x%
- Increased emergency department wait times by x%
- Decreased resource availability

Sample 2
If an infectious disease (ID) epidemic incident has impacted -- or is likely to impact -- 10 or more patients and/or may overwhelm the medical center's ability to respond using standard operating procedures,

Sample 3
Identify the outbreak by increased numbers of actual patients, by Syndromic Surveillance or from alerts from the Surveillance Department. When the occurrence increases above baseline and impact is expected to increase the demand for inpatient and intensive care, the Infection Control Manager will alert Hospital Administration and notify the public health department as appropriate.

Sample 4

- Level I includes human infection(s) with a new subtype, but no human-to-human spread, or at most rare instances of spread to a close contact.
- Level II includes small cluster(s) with limited human-to-human transmission but spread is highly localized, suggesting that the virus is not well adapted to humans.
- Level III includes larger cluster(s) but human-to-human spread still localized; suggesting that the virus is becoming increasingly better adapted to humans, but may not yet be fully transmissible.
- Level IV includes the pandemic phase; there is increased and sustained transmission in the general population.
- In this post-pandemic phase, the indices of influenza activity have returned to pre-pandemic levels.

Sample 5
Level 1: Cases in Southern California
Level 2: Cases in Los Angeles County
Level 3: Cases at the hospital
Level 4: Widespread cases
Level 5: Signs that cases are on the decline. Prepare for recovery or second wave.

GAINING APPROVAL FOR THE USE OF SURGE TENTS

The following are excerpts from the California Department of Public Health:

- All Facilities Letter (AFL) 09-39, H1N1 Response, October 30, 2009: http://www.cdph.ca.gov/certlic/facilities/Documents/LNC-AFL-09-39.pdf
- Approval for Health Care Facility Use of Surge Tents, January 20, 2010: http://www.cdph.ca.gov/HealthInfo/discond/Documents/SurgeTentsGuidance.pdf

This guidance is intended to expedite approval of operation of surge tents. Health care facilities and local government are encouraged to preplan for establishing surge tents so that when needed, the tents can be rapidly erected and operated.

Tent Use

Approval to set up a tent is required by California Code of Regulations Title 22 (22 CCR), §70805, which states that, "Spaces approved for specific uses at the time of licensure shall not be converted to other uses without the written approval of the Department." Use of hospital property for tents constitutes a conversion of space. This means that hospitals must obtain CDPH's written approval for tent use. Approval of tents will not be provided unless the hospital has obtained written approval from the local fire authority for tent use.

In the absence of any specific suspension of statute or regulation by Governor's Executive Order, tents will be approved for use only as waiting rooms, to conduct triage and Medical Screening Exams, to provide basic first-aid, and outpatient treatment that meets all applicable rules and regulations. Any other use may require a program flex.

In the absence of any specific suspension of statute or regulation by Governor's Executive Order, tents will be approved for use only as waiting rooms, to conduct triage and Medical Screening Exams, to provide basic first-aid, and outpatient treatment that meets all applicable rules and regulations. Any other use may require a program flex.

Non-Declared Emergency Tent Use Approval

CDPH L&C has been addressing high patient volume at individual hospital Emergency Departments (EDs). This has included approving the use of tents to meet the increased demand for medical care.

To receive approval for tent use, hospitals must contact their L&C District Office (DO), explain their situation, justify their use of tents, and obtain tent use approval.

Additionally, L&C has determined that the present threat of widespread H1N1 infection could cause many hospitals to have a need to convert space almost simultaneously. This determination has resulted in the development of an alternative form for L&C's tent use approval during a declared emergency, in addition to this case-by-case approval process.

Tent Use Approval During a Declared Emergency

This AFL 09-39 is L&C's written approval of tent use as long as the necessary criteria, provided below, have been met. This alternative approval process for the use of tents is only for the current H1N1 response and only during the time of a declared emergency, specifically when:

- The Governor has declared an emergency, as defined in GC Section §8558, for the hospital's geographical area and stated that health care surge exists,

OR

- An authorized local official, such as a local health officer or other appropriate designee, has declared a local emergency, as defined in GC Section §8558, for the hospital's geographical area and stated that health care surge exists,

AND

- Hospitals have reported setting up and using a tent to their local L&C District Office

Hospitals should expect L&C to periodically contact them to get status reports on their use of a tent. When a declared emergency that meets the above criteria is over, there is no further approval for the use of tents for patient care. Please notify your local L&C District Office when the use of the tent is discontinued and the tent is taken down.

Space Conversion Approval:

22 CCR, §70805 requires, "Spaces approved for specific uses at the time of licensure shall not be converted to other uses without the written approval of the Department." Use of hospital property for any purpose other than that approved at the time of licensure, therefore, constitutes a conversion of space and requires L&C approval.

The approval process to convert space is distinct from the program flexibility approval process as described at 22 CCR §70129. The services provided within the expanded capacity must be in compliance with all applicable laws and regulations at all times.

APPROVING SURGE TENTS

This is to provide guidance for hospitals and other health care facilities and local health departments on regulatory requirements from the State Fire Marshal and the OSHPD for tents used to accommodate a surge in demand for health care.

Three entities are required to approve surge tents:

- The State Fire Marshal provides statewide rules for prevention of fire in connection with the use of tents, awnings or other fabric enclosures. Included in these standards is the requirement that all tents be made of material approved by the State Fire Marshal.
- Local fire departments have responsibility to inspect the location and configuration of tents
- OSPHD has responsibility to protect the hospital building from adjacent hazards and exposures, including tents.

The functions of each of these entities are described below.

State Fire Marshal

Health and Safety Code Section 13116 requires the State Fire Marshal to prepare and adopt rules and regulations establishing minimum requirements for the prevention of fire and panic in connection with the use of tents, awnings or other fabric enclosures. The State Fire Marshal has done so in the California Building Code (CBC), California Fire Code (CFC) and Title 19 California Code of Regulations (CCR).

- Section 332, Title 19 CCR requires all tents manufactured for sale, sold, rented, offered for sale or used in California to be made from nonflammable material or material approved by the State Fire Marshal.
- Section 335, Title 19 CCR requires each section of the top and sidewalls of large tents (ten or more occupants) to have the State Fire Marshal label. Small tents (nine or less occupants) may either have the State Fire Marshal label or meet the provisions of CPAI-84. When approving the permit for use of the tent, local fire authorities will be looking for these labels as well as considering other fire and life safety and building code issues (see below).

Due to recent discussions with hospital administrators and local fire authority officials to determine needs, and given the critical/urgent nature of a pandemic outbreak, the Office of the State Fire Marshal is providing the following:

- Expedited certification of tents
- Permitting tent and/or fabric manufacturers to field label tents after contacting the Office
- of the State Fire Marshal
- Permitting tents to be field treated by an State Fire Marshal certified flame-retardant applicator

While many tent manufacturers have had their material approved for fire retardancy, the State Fire Marshal label may not have been affixed to their products prior to being sold. In these instances, tent manufacturers will have copies of the State Fire Marshal Certificate of Registration and this documentation will provide proof of compliance to the local fire authorities.

Hospitals may experience the following when a local fire authority inspects a tent not affixed with the State Fire Marshal label:

- The local fire department authority may accept the manufacturer's copy of the State Fire Marshal's Certificate of Registration and approve the tent; **OR**
- The local fire department may:
    - Perform a flammability test (field test) on the tent prior to approving it;
    - Require alternate means of protection; or
    - Deny approval for the use of the tent.

For assistance in obtaining an approved State Fire Marshal Certificate of Registration, please contact Francis Mateo, State Fire Marshal Flame Retardant Program Coordinator at (916) 445-8396, francis.mateo@fire.ca.gov.

The Office of the State Fire Marshal in partnership with the California Fire Chiefs Association, recognizing the need for expedient placement of tents to provide surge capacity, has issued a letter concerning these tents. This letter can be found at http://osfm.fire.ca.gov.

Local Fire Department

When the local fire department reviews the proposed location for the tent, it will consider many factors. It is always advisable to meet with the fire department well in advance of the time when tents may need to be erected. Accurate site plans are always helpful and in some cases required to be submitted to the local fire department for review and approval prior to erection of the tent.

Different jurisdictions have different requirements relating to the use of temporary structures. It is very common for the fire department to require a permit for a tent which may also include a fee. Some local fire departments require safety inspections prior to using the tent after it has been erected and there may be a fee for that inspection. A few fire departments require a fire safety officer to stand-by for the period of time the tent is to be occupied – similar to a fire watch; this may require a fee as well.

Some of the concerns the local fire department will be watching for include the following:

- Fire apparatus access roads shall be provided to all sides of the tent in accordance with Section 503 of the Fire Code.
- Tents may not be located within 20 feet of lot lines, buildings, other tents, canopies or membrane structures, parked vehicles or internal combustion engines. For the purpose of determining required distances, support ropes and guy wires shall be considered as part of the tent.

- An unobstructed fire break passageway or fire road not less than 12 feet wide and free from guy ropes or other obstructions shall be maintained on all sides of all tents, canopies and membrane structures unless otherwise approved by the fire department.
- Tents and their appurtenances shall be adequately roped, braced and anchored to withstand the elements of weather and prevent against collapsing. Documentation of structural stability shall be furnished to the fire department on request.
- Exit openings from tents shall remain open unless covered by a flame-resistant curtain. Curtains shall be free sliding on a metal support. The support shall be a minimum of 80 inches above the floor level at the exit. The curtains shall be so arranged that, when open, no part of the curtain obstructs the exit. Unless approved otherwise by the fire department, curtains shall be of a color, or colors, that contrast with the color of the tent.
- Smooth-surfaced, unobstructed aisles having a minimum width of not less than 44 inches shall be provided from exits to all portions of the interior of the tent. The arrangement of aisles shall be subject to approval by the fire department and shall be maintained clear at all times during occupancy.
- Exits shall be clearly marked. Exit signs shall be installed at required exit doorways and where otherwise necessary to indicate clearly the direction of egress when the exit serves an occupant load of 50 or more. Exit signs shall be of an approved self-luminous type or shall be provided with an internal back-up battery capable of illuminating the sign for a minimum of 90 minutes after power has failed.
- The means of egress shall be illuminated with light having an intensity of not less than 1 foot-candle at floor level while the structure is occupied. Fixtures required for means of egress illumination shall be supplied from a separate emergency power circuit or from an internal battery.
- The areas within and adjacent to the tent shall be maintained clear of all combustible materials or vegetation that could create a fire hazard within 30 feet of the structure. Combustible trash shall be removed at least once a day from the tent during the period the structure is occupied.
- Smoking shall not be permitted in tents. Approved “No Smoking” signs shall be conspicuously posted.
- Open flame or other devices emitting flame, fire or heat or any flammable or combustible liquids, gas, charcoal or other cooking device or any other unapproved devices shall not be permitted inside or located within 20 feet of the tent, canopy or membrane structures while open to the public unless approved by the fire code official.
- Portable fire extinguishers shall be provided as required by the fire department.
- Heating equipment, tanks, piping, hoses, fittings, valves, tubing and other related components shall be installed as specified in the California Mechanical Code and shall be approved by the fire department. Gas, liquid and solid fuel-burning equipment designed to be vented shall be vented to the outside air as specified in the California Mechanical Code. Such vents shall be equipped

with approved spark arresters when required. Where vents or flues are used, all portions of the tent, canopy or membrane structure shall be not less than 12 inches from the flue or vent. Heating equipment shall not be located within 10 feet of exits or combustible materials. Electrical heating equipment shall comply with the California Electrical Code.

- LP-gas equipment such as tanks, piping, hoses, fittings, valves, tubing and other related components shall be approved and in accordance with Chapter 38 of the Fire Code and the California Mechanical Code. LP-gas containers shall be located outside and safety release valves shall be pointed away from the tent. Portable LP-gas containers with a capacity of 500 gallons or less shall have a minimum separation between the container and structure not less than 10 feet. Portable LP-gas containers, piping, valves and fittings which are located outside and are being used to fuel equipment inside a tent shall be adequately protected to prevent tampering, damage by vehicles or other hazards and shall be located in an approved location. Portable LP-gas containers shall be securely fastened in place to prevent unauthorized movement.
- Generators and other internal combustion power sources shall be separated from tents, canopies or membrane structures by a minimum of 20 feet and shall be isolated from contact with the public by fencing, enclosure or other approved means.

OSHPD

OSHPD jurisdiction is limited for construction projects that relate to the erection and use of temporary tents. OSHPD has the responsibility and authority to protect the hospital building from adjacent hazards and exposures, and will therefore need to review drawings for the mobile unit installation and any utility hookups that originate in or pass through any hospital buildings.

When located adjacent to hospital buildings, the fire resistance and opening protection requirements for the exterior walls of the hospital building shall be determined by the local fire department based on the distance between the tent and the building in accordance with Section 704.3 and Tables 601 and 602 of the 2007 CBC. The fire department may or may not request an assumed property line be placed between the hospital building and the tent and the fire separation distances specified above may be reduced when the local fire department determines that the need for patient safety or protection warrants a reduction. Projections between the hospital building and the tent which comply with Section 704.2 of the 2007 CBC are not limited when they are protected with automatic fire sprinklers.

OSHPD will review utility connections (electricity, heating, air conditioning, etc.) for tents that originate in, pass through, or pass under buildings regulated by OSHPD.

OSHPD will not review the tents for conformance with California Building Standards Code requirements, including seismic anchorage of the tent and location of the tent as it relates to required side yards, when the tent is considered temporary.

Tents shall not obstruct the required means of egress from the hospital or obstruct fire department access, or access to fire protection equipment including fire hydrants, sprinkler control valves and fire department hose connections unless expressly permitted by the fire department.

For assistance with questions or concerns regarding OSHPD approval of tents, hospitals may contact Gary Dunger, Chief Fire & Life Safety Officer, at (213) 897-3111, GDunger@oshpd.ca.gov.

HOSPITAL SURVEILLANCE FOR PANDEMIC INFLUENZA

Adapted from the Los Angeles County Department of Public Health Pandemic Influenza Plan, Guidelines for Acute Care Hospital Settings, 3-1-06, available at http://search.lapublichealth.org/acd/Pandemicflu.htm.

PRE-PANDEMIC - PREPAREDNESS PERIOD

Hospitals should be on the alert for suspected cases of infection with novel strains of influenza. For detection of cases, hospitals should have:

- □ Procedures in place for on-site laboratory testing using proper biosafety levels and reporting of unusual influenza isolates through local health department channels
    - If appropriate methods or biosafety levels do not exist at the hospital, specimens should be shipped to the Los Angeles County Department of Public Health (LACDPH) Laboratory, 562-401-8991
- □ Predetermined thresholds for activating pandemic influenza surveillance plans

General surveillance information:

- Influenza is NOT a reportable disease in Los Angeles County
- Individual cases of influenza should not be reported to the LACDPH
- Seasonal outbreaks of influenza and respiratory illness should be reported immediately to the LACDPH Morbidity Unit, 888-397-3993
- Suspect or confirmed cases of pandemic influenza; and laboratory-confirmed seasonal influenza-related ICU cases and pediatric deaths should be reported as soon as possible after laboratory confirmation of influenza by phone to the LACDPH Acute Communicable Disease Control Unit, business hours: 213-240-7941, after hours: 213-974-1234

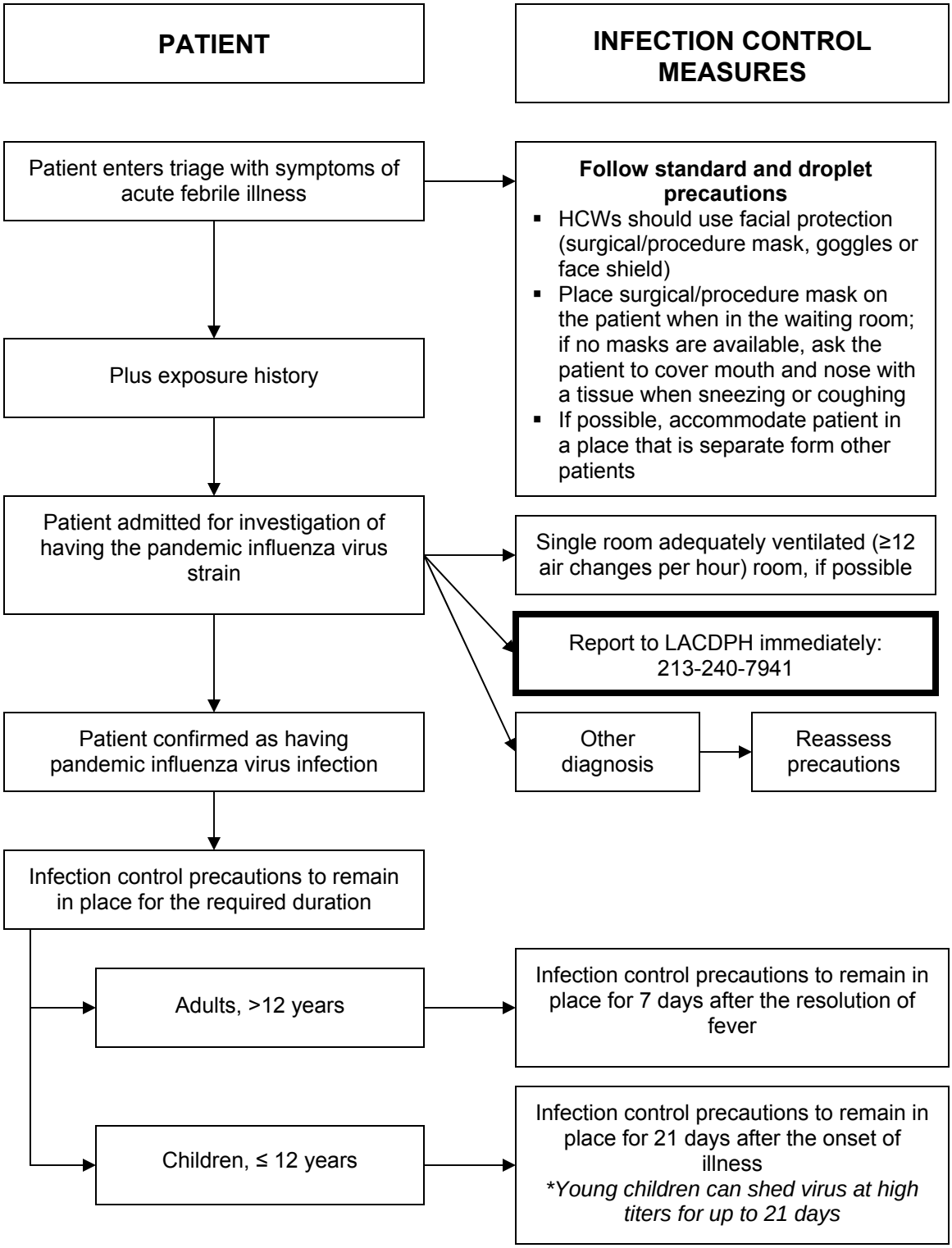
PANDEMIC RESPONSE PERIOD

Hospitals will play an essential role in pandemic influenza surveillance. For detection of cases, hospitals should have mechanisms to:

- □ Conduct surveillance in emergency departments to detect any increases in influenza-like illness during the early stages of the pandemic
- □ Monitor employee absenteeism for increases
- □ Track emergency department visits
- □ Track hospital admissions and discharges of suspected or laboratory-confirmed pandemic influenza patients

INITIATION OF PANDEMIC INFLUENZA INFECTION CONTROL PRECAUTIONS IN HEALTHCARE FACILITIES

Adapted from WHO Interim Infection Control Guideline for Health Care Facilities, Revised 10 May 2007:
www.who.int/csr/disease/avian_influenza/guidelines/infectioncontrol1/en/index.html



EXAMPLES OF USE OF A HIERARCHY OF CONTROLS TO PREVENT INFLUENZA TRANSMISSION

Adapted from CDC Interim Guidance on Infection Control Measures for 2009 H1N1 Influenza in Healthcare Settings, Including Protection of Healthcare Personnel, October 14, 2009: http://www.cdc.gov/h1n1flu/guidelines_infection_control.htm

Elimination of sources of infection

- Postponing elective visits and procedures for patients with suspected or confirmed influenza until they are no longer infectious
- Denying healthcare facility entry to those wishing to visit patients if the visitors have suspected or confirmed influenza
- Minimizing outpatient and emergency department visits for patients with mild influenza-like illness who do not have risk factors for complications
- Keeping personnel at home while they are ill to reduce the risk of spreading influenza
- Limiting visitors to healthy adults only

Engineering controls

- Installing partitions (e.g., transparent panels/windows/desk enclosures) in triage areas as physical barriers to shield staff from respiratory droplets
- Using local exhaust ventilation (e.g., hoods, tents, or booths) for aerosol-generating procedures
- Using hoods for the performance of laboratory manipulations that generate infectious aerosols
- Installing hands-free soap and water dispensers, and receptacles for garbage and linens to minimize environmental contact
- Conducting aerosol-generating procedures in an airborne infection isolation room (AIIR) to prevent the spread of aerosols to other parts of the facility
- Using closed suctioning systems for airways suction in intubated patients
- Using high efficiency particulate filters on mechanical and bag ventilators
- Ensuring effective general ventilation and thorough environmental surface hygiene

Administrative controls

- Vaccinating as much of the healthcare workforce as possible (once vaccine is available)
- Identifying and isolating patients with known or suspected influenza infections
- Implementing respiratory hygiene/cough etiquette programs
- Setting up triage stations, managing patient flow, and assigning dedicated staff to minimize the number of healthcare personnel exposed to those with suspected or confirmed influenza.
- Screening personnel and visitors for signs and symptoms of infection at clinic or hospital entrances or badging stations and responding appropriately if they are present
- Adhering to appropriate isolation precautions

- Limiting the number of persons present in patient rooms and during aerosol-generating procedures
- Arranging seating to allow 6 feet between chairs or between families when possible
- Ensuring compliance with hand hygiene, respiratory hygiene, and cough etiquette
- Making tissues, facemasks, and hand sanitizer available in waiting areas and other locations
- Establishing protocols for cleaning of frequently touched surfaces throughout the facility (elevator buttons, work surfaces, etc.)
- Locating signage in appropriate language and at the appropriate reading level in areas to alert staff and visitors of the need for specific precautions
- Placing facemasks on patients, when tolerated, at facility access points (e.g., emergency departments) or when patients are outside their rooms (e.g. diagnostic testing).
- Placing facemasks on patients during transport; when tolerated; limiting transport to that which is medically necessary; and minimizing delays and waiting times during transport

Personal protective equipment

- Wearing appropriate gloves, gowns, facemasks, respirators, eye protection, and other PPE

STOPPING THE SPREAD OF GERMS AT WORK

To download this in PDF, Spanish, Chinese, Vietnamese, or Tagalog, visit the CDC site http://www.cdc.gov/germstopper/work.htm

How Germs Spread

Illnesses like the flu (influenza) and colds are caused by viruses that infect the nose, throat, and lungs. The flu and colds usually spread from person to person when an infected person coughs or sneezes.

How to Help Stop the Spread of Germs

Take care to:

- Cover your mouth and nose when you sneeze or cough
- Clean your hands often
- Avoid touching your eyes, nose or mouth
- Stay home when you are sick and check with a health care provider when needed
- Practice other good health habits.

Cover your mouth and nose when you sneeze or cough

Cough or sneeze into a tissue and then throw it away. Cover your cough or sneeze if you do not have a tissue. Then, clean your hands, and do so every time you cough or sneeze.

Clean your hands often

When available, wash your hands -- with soap and warm water -- then rub your hands vigorously together and scrub all surfaces. Wash for 15 to 20 seconds. It is the soap combined with the scrubbing action that helps dislodge and remove germs.

When soap and water are not available, alcohol-based disposable hand wipes or gel sanitizers may be used. You can find them in most supermarkets and drugstores. If using a gel, rub the gel in your hands until they are dry. The gel doesn't need water to work; the alcohol in the gel kills germs that cause colds and the flu.*

*Source: FDA/CFSAN Food Safety A to Z Reference Guide, Sept 2001: Handwashing, www.cfsan.fda.gov/%7Edms/handwashing

Avoid touching your eyes, nose, or mouth

Germs are often spread when a person touches something that is contaminated with germs and then touches their eyes, nose, or mouth. Germs can live for a long time (some can live for 2 hours or more) on surfaces like doorknobs, desks, and tables.

Stay home when you are sick and check with a health care provider when needed

When you are sick or have flu symptoms, stay home, get plenty of rest, and check with a health care provider as needed. Your employer may need a doctor's note for an excused absence. Remember: Keeping your distance from others may protect them from getting sick. Common symptoms of the flu include:

- fever (usually high)
- headache
- extreme tiredness
- cough
- sore throat
- runny or stuffy nose
- muscle aches, and
- nausea, vomiting, and diarrhea, (much more common among children than adults).

Practice other good health habits

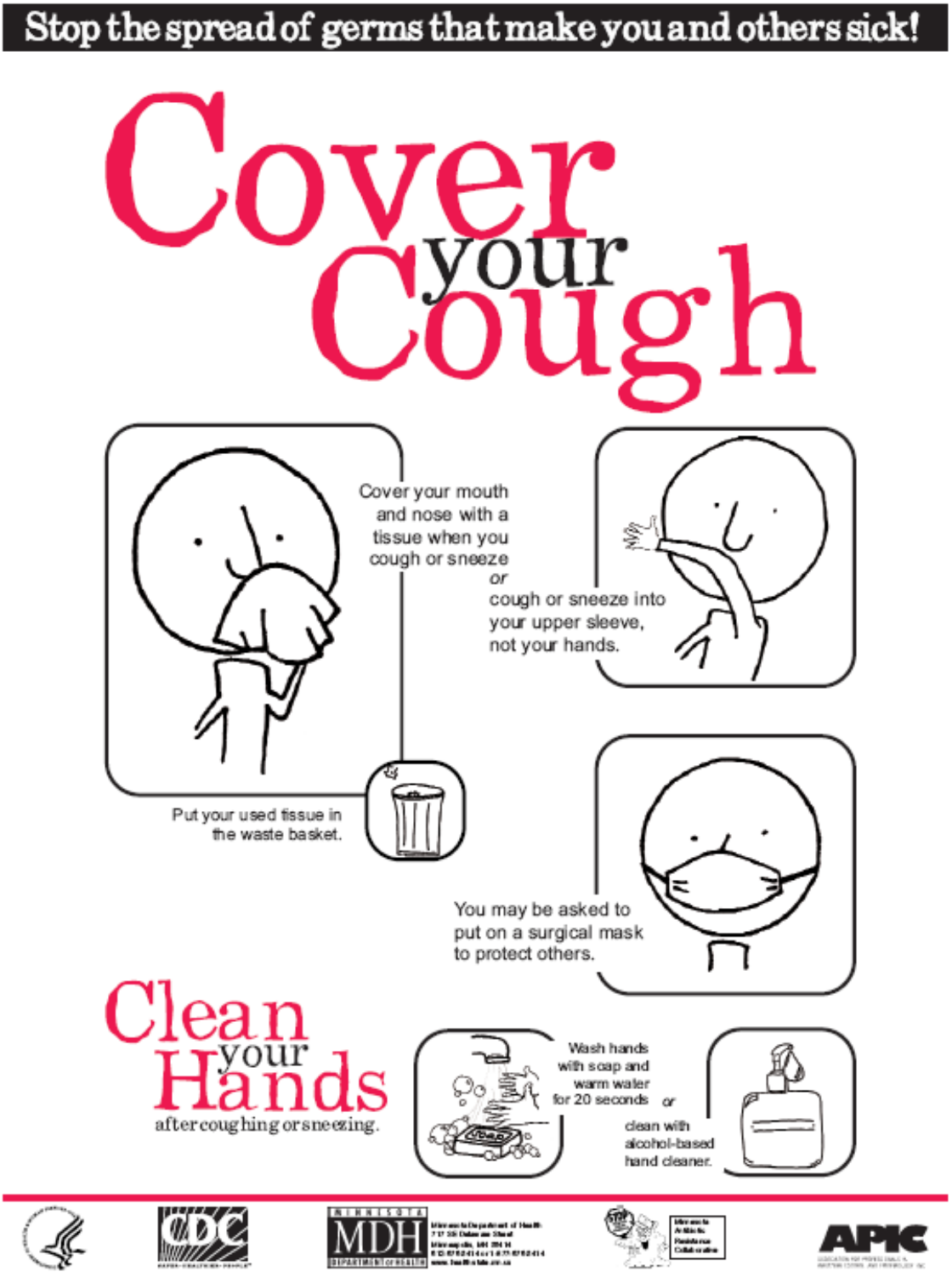
Get plenty of sleep, be physically active, manage your stress, drink plenty of fluids, and eat nutritious food. Practicing healthy habits will help you stay healthy during flu season and all year long.

More Facts, Figures, and How-To Ideas

CDC and its partner agencies and organizations offer a great deal of information about handwashing and other things you can do to stay healthy and avoid the germs that cause flu, the common cold, and other illnesses. See Other Resources (http://www.cdc.gov/germstopper/resources.htm) and Posters (http://www.cdc.gov/germstopper/materials.htm) on this Stop the Spread of Germs site for a select listing of Web sites, materials, and contact information.

COVER YOUR COUGH

To download this in PDF, Spanish, Portuguese, French, Chinese, Vietnamese, Hmong, Khmer or Tagalog, or to get a poster size version, visit the CDC site http://www.cdc.gov/flu/protect/covercough.htm.



PERSONAL PROTECTIVE EQUIPMENT (PPE)

Based on Recommendations from the US Centers for Disease Control and Prevention (CDC), August 05, 2009: http://www.cdc.gov/h1n1flu/guidance_ems.htm; LA County EMS Agency and LA County Department of Public Health Influenza A H1N1 (Swine Flu) – First Responder/EMS Guidance #1, April 28, 2009: http://ems.dhs.lacounty.gov/Home/SF-FirstRespGuidance1.pdf; LA County EMS Agency H1N1 Interim Guidelines, October 01, 2009: http://ems.dhs.lacounty.gov/Home/SF-H1N1InterimGuidelines.pdf.

Until more is known about this disease, the Centers for Disease Control and Prevention (CDC) and Cal/OSHA recommends the use of approved N95 respirators when providing care to patients with flu-like symptoms (fever, cough and sore throat) or anyone a provider suspects may have the pandemic virus.

When treating a patient with a suspected case of the novel or pandemic influenza, the following PPE should be worn:

- Fit-tested disposable N95 respirator and eye protection (e.g., goggles; eye shield), disposable non-sterile gloves, and gown, when coming into close contact with the patient.
- When treating a patient that is not a suspected case of pandemic influenza but who has symptoms of acute febrile respiratory illness, the following precautions should be taken:
    - Place a standard surgical mask on the patient, if tolerated. If the mask cannot be tolerated, encourage the patient to cover his/her mouth/nose with a tissue when coughing or sneezing. Provide a receptacle (e.g., trash bag) to discard used tissues. If available, use a small surgical mask for children; however, children may have difficulty wearing a mask correctly and consistently.
- Use good respiratory hygiene – use non-sterile gloves for contact with patient, patient secretions, or surfaces that may have been contaminated.
- Follow hand hygiene including hand washing or cleansing with alcohol based hand disinfectant after contact.

Hospitals should ensure that they have the equipment and supplies readily available to meet any local requirements for personal protective equipment.

PPE Controversy and H1N1 PPE Guidance

It should be noted that, while the LAC EMS Agency recommends following local, state and federal guidelines, there is some controversy in those guidelines being disseminated. The Society for Healthcare Epidemiology of America (SHEA), Infectious Diseases Society of America (IDSA), and Association of Professionals in Infection Control and Epidemiology (APIC) expressed significant concern with the federal guidance concerning the use of PPE by healthcare workers in treating suspected or confirmed cases of H1N1 influenza. These organizations content that the federal PPE guidance and requirements do not reflect the best available scientific evidence, which demonstrates that N95 respirators are not superior to surgical masks in the prevention of transmission of influenza in most patient care settings.

Cal/OSHA Aerosol Transmissible Diseases Policy

While protection with appropriate PPE is the best strategy for reducing risk of contracting the disease, any novel virus such as that causing pandemic influenza, it may be unclear whether the virus is transmitted via droplet or aerosol. Based on this and the fact that there is a limited supply of N95 respirators, on September 08, 2009, Cal/OSHA in their Interim Enforcement Policy on H1N1 and Section 5199 (Aerosol Transmissible Diseases) stated:

"Where an extreme shortage of respirators exists despite all reasonable efforts to maintain a sufficient reliable supply, the employer may shift to a prioritized respirator use mode in which respirator use is assured for employees exposed to H1N1 in connection with high hazard procedures. In this mode, respirator use may be temporarily discontinued for employees in H1N1 exposure scenarios considered less likely to cause disease transmission as necessary to maintain the supply for employees exposed to high-hazard procedures."

This policy also states "If the employer is unable to provide a respirator to employees who provide care to H1N1 suspected and confirmed cases, the employer should provide those employees with surgical masks. While surgical masks are not designed or certified to prevent the inhalation of small airborne contaminants, it is likely they will provide droplet protection and should therefore be chosen over no protection at all."

Inventory the airborne respiratory protection equipment available to employees and providers:

- N95 Filtering Facepiece Respirator (NIOSH Certified)
  - Fit-testing must be conducted to ensure a well-fitting respirator model and size and ensures the user can achieve a good seal between the respirator and the face
    - OSHA requires that workers be medically cleared and fit tested prior to the first use of a filtering facepiece respirator.
    - N95 respirators will not form a seal on the face if there is facial hair or the bone structure precludes the respirator conforming to the face.
  - Plan for three N95 respirators per person/per day (current Cal/OSHA recommendation):
    - Respirator can be reused by the same wearer until the respirator becomes damaged, moist, difficult to breathe through while wearing, or visibly soiled.
    - N95 respirators are considered disposable. There are currently no recommendations for cleaning and disinfecting them for reuse.
  - Use appropriate hand hygiene before and after removal of the respirator
  - Wearing a full faceshield over the respirator may prevent surface contamination of the N95 and prolong life.

- Reusable elastomeric respirators - full and half face piece:
  - Have a face piece that can be cleaned, disinfected, reused, and worn by multiple users. Some offer eye protection (full facepiece).
  - Use filters that are multi-use until difficult to breathe through.
  - Require fit-testing (as described above) and users with facial hair or certain types of bone structures will not be able to obtain a seal.
  - Consider the reusable respirator to ensure employee protection should supplies of disposable (e.g., N95) respirators be limited (e.g., pandemic).
    - Replacement filters should be stocked by providers for exchange as needed.
  - Provider infection control programs should address proper donning, doffing, cleaning/disinfection, and reuse of the elastomeric respirator.
- Powered air-purifying respirators (PAPRs):
  - There are lightweight PAPRs (e.g., the 3M Breathe Easy™) that provide protection but are much lighter and cooler than the PAPRs for chemical exposures.
  - PAPRs provide a higher level of protection than N95 respirators, meet the OSHA recommendation for protection during high hazard procedures (e.g., intubation, nebulizer treatment, deep suctioning), and may be considered for extended use.
  - PAPR components (battery pack, hose, belt) can be cleaned and disinfected for multiple users. There are currently no recommendations for cleaning disposable headgear/ hoods, although guidance may be provided during a pandemic when supplies are scarce. Headgear/hoods can be worn multiple times by the user until soiled or damaged.
  - Fit-testing is not required for PAPRs. Medical screening may be required as directed by the employer's respiratory protection program.

Other Personal Protective Equipment

In addition to respiratory protection, PPE during a pandemic includes:

- Clean, non-sterile gloves: should be single use only and changed between patients
- Eye protection (e.g., goggles, face shield):
  - Face shields may be cleaned and reused. Plan for reuse X 10. Face shields can also protect N95 respirators, as described above.
  - Goggles are usually non-disposable and can be cleaned when soiled or between users. Plan for reuse X 50.
- Long sleeved, fluid resistant gown.
  - Disposable gowns are single use and disposed of after each patient contact,
  - Cloth gowns should be changed between patient contacts and laundered before reuse.

BARRIER PRECAUTIONS DEPENDING ON TYPE OF PATIENT CONTACT

Adapted from WHO Interim Infection Control Guideline for Health Care Facilities, Revised 10 May 2007:
www.who.int/csr/disease/avian_influenza/guidelines/infectioncontrol1/en/index.html

Barrier precautions for healthcare workers (HCW) providing care for patients with acute febrile respiratory illness, including patients with suspected or confirmed pandemic influenza virus infection

BARRIER PRECAUTION	Close contact (<3 feet) with patients with acute febrile respiratory illness who have no known pandemic influenza virus risk factors	Entry to pandemic influenza virus isolation room/ area, but no anticipated patient contact	Close contact (<3 feet) with pandemic influenza virus infected patient in or out of isolation room/area	Performance of aerosol-generating procedure on pandemic influenza virus patient[a,b]
Hand hygiene[c]	Yes	Yes	Yes	Yes
Gloves	Not routinely[d]	Risk assessment	Yes	Yes
Gown	Not routinely	Risk assessment[e]	Yes[f]	Yes[f]
Medical mask on HCW (e.g., surgical or procedure mask)	Yes	Not routinely	Not routinely	Not routinely
Particulate respirator (e.g., N95)	Not routinely	No	No	Yes[g]
Eye protection	Risk assessment	Risk assessment[h]	Yes	Yes
Medical mask on patient (e.g., surgical or procedure mask)	Not routinely[i]	No	Not routinely[i]	No

a. Aerosol-generating procedures create aerosols of different sizes (large and small-particle aerosols). Examples of aerosol-generating procedures include: endotracheal intubation; aerosolized or nebulized medication administration; diagnostic sputum induction; bronchoscopy; airway suctioning; tracheostomy care; chest physiotherapy; nasopharyngeal aspiration; positive pressure ventilation via face mask (e.g. BiPAP, CPAP); high-frequency oscillatory ventilation; postmortem excision of lung tissue.
b. Wherever possible, aerosol-generating procedures should be performed in adequately ventilated (≥12 air changes per hour) rooms, side rooms or other closed single-patient areas with minimal staff present. PPE should cover the torso, arms, and hands as well as the eyes, nose, and mouth.
c. Standard precautions are the minimum level of precautions indicated for all patients at all times.
d. Gloves should be worn in accordance with standard precautions. If glove demand is likely to exceed supply, glove use should always be prioritized for contact with blood and body fluids (ambidextrous non-sterile gloves), and contact with sterile sites (sterile gloves).
e. Gloves and gown should be worn during cleaning procedures.
f. If splashing with blood or other body fluids is anticipated, and gowns that are not fluid-resistant are used, a waterproof apron should be worn over the gown.
g. If particulate respirator is not available, avoid aerosol-generating procedures as much as possible.
h. Use eye protection if close contact (< 3 feet) with patient is possible.
i. Provide medical mask for patient (if tolerated), when patient is outside the isolation room/area.

USE OF MASKS DURING A PANDEMIC

Adapted from the Los Angeles County Department of Public Health Pandemic Influenza Plan, Guidelines for Acute Care Hospital Settings, 3-1-06, available at http://search.lapublichealth.org/acd/Pandemicflu.htm.

WHEN TO WEAR A MASK *

- **Early phase of a pandemic**, it may be prudent for healthcare workers to wear masks when interacting in close face-to-face contact with coughing individuals to minimize influenza transmission
    - This use of masks is advised when immunization and antivirals are not yet available.
- Masks should be worn by healthcare workers to prevent transmission of other organisms from patients with undiagnosed cough
- When the **virus is circulating widely in the community**, there is no evidence that the use of masks in general public settings will be protective

** The term mask refers to surgical masks or procedure masks, not to special masks or respirators.*

USING SURGICAL MASKS

- Use only once and change if wet (masks become ineffective when wet)
- Cover both the nose and the mouth
- Avoid touching the mask while it is being worn
- Do not dangle around the neck
- Discard masks into an appropriate receptacle

SPECIAL MASKS

- I.e., N-95 respirators, high-efficiency dust/mist masks
- Should be worn by staff performing aerosol-generating procedures

Additional mask information can be found at:

- OSHA Guidance on Preparing Workplaces for an Influenza Pandemic: http://www.osha.gov/Publications/influenza_pandemic.html#mask_respirator_difference
- US DHHS Interim Guidance on Planning for the Use of Surgical Masks and Respirators in Health Care Settings during an Influenza Pandemic: http://pandemicflu.gov/plan/healthcare/maskguidancehc.html
- OSHA Pandemic Influenza Preparedness and Response Guidance for Healthcare Workers and Healthcare Employers: http://www.osha.gov/Publications/OSHA_pandemic_health.pdf

CONSERVATION OF RESOURCES

Adapted from Cal/OSHA *Interim Enforcement Policy on H1N1 and Section 5199 (Aerosol Transmissible Diseases)*, Issue Date: 10-22-09: http://www.dir.ca.gov/dosh/SwineFlu/Interim_enforcement_H1N1.pdf

Prioritization of PPE

Although during a pandemic, PPE may be in short supply and resupply delayed, respiratory protection must be given high priority, especially during high risk procedures (e.g., intubation) and for actively coughing, sneezing patients. Facial protection should be ensured as resources permit.

Measures to maximize and conserve respirator supplies

Given the increased demand for respirators created by a pandemic and the finite supply, measures to conserve respirator supplies to the extent reasonably possible should be implemented. This will help ensure that a sufficient supply of respirators will remain on hand to treat patients with the pandemic virus, tuberculosis, or any other disease requiring respiratory protection. These conservation measures are consistent with the ATD standards and the CDC Interim Infection Control guidance dated October 14, 2009, that delineates a hierarchy of controls to prevent influenza transmission in healthcare settings. These policies should include:

1. Reviewing patient flow and work organization to determine whether unnecessary employee contact with suspected or confirmed pandemic influenza cases can be reduced.
2. Taking full advantage of opportunities to obtain respirators through non-medical supply chains, such as safety equipment suppliers. These respirators are of comparable quality and efficacy to those provided by medical distributors.
3. Taking full advantage of opportunities to use the variety of NIOSH-certified respirators available and appropriate for use in work involving close contact with pandemic influenza patients. For example, if an institution's policy has been to order only fluid-resistant or "surgical" N95 respirators, other N95 respirators not designated as "surgical" can be used in patient-care scenarios where contact with splashes or sprays of body fluids is not anticipated as long as they are NIOSH-certified. Surgical N95s are required when needed to protect against splashes or sprays of bodily fluids, and may also be required for infection control during surgery, but are not required in situations where fluid contact is not an issue.

Extended use and re-donning as conservation measures

Cal/OSHA regulations require employers to develop policies for the use, cleaning, and decontamination and/or disposal of respirators as appropriate so that they remain effective in protecting employees and do not become a hazard. A respirator should always be removed and discarded if it becomes damaged or deformed, or it no longer forms an effective seal to the employee's face. A reuseable respirator may be shared between users, but only if cleaned and disinfected between users. In addition, in health care settings, respirator use may be affected by infection control policies.

Disposable respirators should never be shared between users. A disposable respirator should always be discarded if (1) it becomes contaminated with a hazardous substance, (2) it becomes contaminated with blood, respiratory or nasal secretions, or other bodily fluids from patients, (3) it has been used during an aerosol generating procedure or during surgery, (4) it becomes wet or visibly dirty, or (5) breathing through it becomes more difficult.

Studies have consistently found that materials that are captured in a respirator filter will not be released, even if the user coughs or sneezes, or if the respirator is dropped. However, materials that may be on the outside of the respirator can be transferred to the employee's hands, just as materials that are on the employees face or clothing can be transferred. Therefore employees should be instructed to perform hand hygiene whenever their hands touch the outside of the respirator. Respirators can be continuously worn between patients without removal ("extended use") without creating a hazard for the patients or the employees, so long as hand hygiene and other standard precautions are maintained. Respirators should not be worn between patients after high hazard procedures or surgery, or if the respirator has become contaminated with bodily fluids.

Disposable filtering facepiece respirators may be removed, stored, and re-donned by an employee if the employer has established procedures for this type of use, provided appropriate facilities for storage, and trained employees in how to remove, store, inspect, and re-don the respirator. Employees must also be trained in how to recognize a respirator that must be discarded. Employer re-donning policies cannot include an absolute limit on the number of respirators that will be furnished to an exposed employees during a given period of time.

Protecting the outside surfaces of the respirator

It may be possible to prolong the useful life of the respirator by protecting the outer surface from sprays with a face shield, but a face shield may be used only if it does not interfere with the function of the respirator. Cal/OSHA regulations require that respirators be used as approved by the National Institute for Occupational Safety and Health (NIOSH) and must not be altered. Therefore surgical masks should not be placed over the respirator, as they may unseat or deform the respirator and may also make it more difficult to breathe through.

Respirator doffing, storage and re-donning procedures

When an employee removes a respirator in the context of re-donning practices, the employee should lift the respirator straps from the back of the head. The respirator should be handled as little as possible, and the employee should avoid touching the inside surfaces of the respirator. If the respirator is visibly contaminated with blood or other bodily fluids, if it is wet, dirty or deformed, it should be discarded. If it is

in good condition, the respirator should be placed in a clean container labeled with the employee's name or other identifier.

The respirator container should be located in an area free from chemical contamination, and it should be sufficient to protect the respirator against contamination or crushing, but it need not be "airtight." Prior to re-donning, the employee should inspect the respirator, including straps, clips, sealing surfaces and general condition. If it is in good condition, the employee should don the respirator according to instructions provided for the specific respirator, and perform the user seal check. After handling the respirator, the employee should perform hand hygiene.

Additional information about donning and taking off (doffing) personal protective equipment, including respirators, is available from the CDC at http://www.cdc.gov/ncidod/dhqp/ppe.html.

Conserving Essential Resources and Maintaining the Supply Chain

The day-to-day availability of essential EMS supplies, equipment, and services may also be severely disrupted during a pandemic. To maintain or restore the supply chain, Local EMS agencies and providers should contact regular vendors to assess their ability to provide resources, contact alternate vendors as backups, and recognize that the time between order and delivery may increase substantially.

- Assess current inventories of essential response supplies
    - Identify essential equipment, supplies and medications that are used day-to-day and will be needed during the pandemic.
    - Consider stocking additional essential patient care supplies and personnel protective equipment supplies over normal par levels.
- Maintain an up-to-date contact list of suppliers and vendors
- Identify essential services that must be maintained in order to function (e.g., fuel suppliers)
- Continuously monitor and track the use of essential patient care and employee protective equipment and procure/resupply early before supplies are extinguished.
- Establish allocation and use policies for essential equipment and modify practices to preserve equipment and supplies, as feasible.
- Secure essential equipment and supplies and allocate according to plans.

SAMPLE: STEPS FOR SAFE REDONNING (REUSE) OF YOUR N95 RESPIRATOR

- N95 may be reused until crushed, soiled, wet or difficult to breathe through.
- Never use a N95 respirator for longer than one shift!
- Employees are not required to reuse respirators.
- Staff should use the N95 respirators for which they were fit –tested.

 1. Wash hands	 2. Or use alcohol rub if hands are not soiled	 3. Take out new mask
 4. Put on mask and fit check	 5. Get paper bag; write your name on bag, leave on counter, and enter patient room	 6. After exiting patient room, remove N95
 7. Insert N95 for later reuse	 8. Hands are contaminated; perform hand hygiene	 9. Upon return, remove 95 from bag, being careful not to touch inside of mask
 10. Redon N95; perform fit check	 11. Throw away bag after one use	 12. Hands are contaminated; perform hand hygiene

INFLUENZA-LIKE ILLNESS (ILI) ASSESSMENT TOOL

Adapted from the Los Angeles County Department of Public Health Pandemic Influenza Plan, Guidelines for Acute Care Hospital Settings, 3-1-06, available at http://search.lapublichealth.org/acd/Pandemicflu.htm.

An ILI assessment tool is to be used for immediate triage of patients or staff, and for accommodation or cohort of patients *prior* to further clinical management. This is not intended to be used as a clinical management tool.

ILI in the general population is determined by the presence of 1, 2, 3 and any of 4 (a–f) which could be due to influenza virus:

Please check the following.

- ☐ 1. Acute onset of respiratory illness
- ☐ 2. Fever (>100.4°F or 38°C)*
- ☐ 3. Cough
- ☐ 4. One or more of the following:
  - ☐ a. sore throat
  - ☐ b. arthralgia
  - ☐ c. myalgia or prostration
  - ☐ d. diarrhea**
  - ☐ e. vomiting**
  - ☐ f. abdominal pain*

* May not be present in elderly people

** May be present in children

SUMMARY OF INFECTION CONTROL RECOMMENDATIONS FOR CARE OF PATIENTS WITH PANDEMIC INFLUENZA

This excerpt has been adapted from the US DHHS Pandemic Influenza Plan, Supplement 4 Infection Control, http://www.hhs.gov/pandemicflu/plan/sup4.html.

Infection control practices for pandemic influenza are the same as for other human influenza viruses and primarily involve the application of standard and droplet precautions during patient care in healthcare settings (e.g., hospitals, nursing homes, outpatient offices, emergency transport vehicles).

Summary of Infection Control Recommendations for Care of Patients with Pandemic Influenza

Component	Recommendations
Standard Precautions	See www.cdc.gov/ncidod/hip/ISOLAT/std_prec_excerpt.htm
Hand hygiene	Perform hand hygiene after touching blood, body fluids, secretions, excretions, and contaminated items; after removing gloves; and between patient contacts. Hand hygiene includes both handwashing with either plain or antimicrobial soap and water or use of alcohol-based products (gels, rinses, foams) that contain an emollient and do not require the use of water. If hands are visibly soiled or contaminated with respiratory secretions, they should be washed with soap (either non-antimicrobial or antimicrobial) and water. In the absence of visible soiling of hands, approved alcohol-based products for hand disinfection are preferred over antimicrobial or plain soap and water because of their superior microbicidal activity, reduced drying of the skin, and convenience.
Personal protective equipment (PPE) ▪ Gloves ▪ Gown ▪ Face/eye protection (e.g., surgical or procedure mask and goggles or a face shield)	▪ For touching blood, body fluids, secretions, excretions, and contaminated items; for touching mucous membranes and nonintact skin ▪ During procedures and patient-care activities when contact of clothing/exposed skin with blood/body fluids, secretions, and excretions is anticipated ▪ During procedures and patient care activities likely to generate splash or spray of blood, body fluids, secretions, excretions
Safe work practices	Avoid touching eyes, nose, mouth, or exposed skin with contaminated hands (gloved or ungloved); avoid touching surfaces with contaminated gloves and other PPE that are not directly related to patient care (e.g., door knobs, keys, light switches).
Patient resuscitation	Avoid unnecessary mouth-to-mouth contact; use mouthpiece, resuscitation bag, or other ventilation devices to prevent contact with mouth and oral secretions.
Soiled patient care equipment	Handle in a manner that prevents transfer of microorganisms to oneself, others, and environmental surfaces; wear gloves if visibly contaminated; perform hand hygiene after handling equipment.

Component	Recommendations
Soiled linen and laundry	Handle in a manner that prevents transfer of microorganisms to oneself, others, and to environmental surfaces; wear gloves (gown if necessary) when handling and transporting soiled linen and laundry; and perform hand hygiene.
Needles and other sharps	Use devices with safety features when available; do not recap, bend, break or hand-manipulate used needles; if recapping is necessary, use a one-handed scoop technique; place used sharps in a puncture-resistant container.
Environmental cleaning and disinfection	Use EPA-registered hospital detergent-disinfectant; follow standard facility procedures for cleaning and disinfection of environmental surfaces; emphasize cleaning/disinfection of frequently touched surfaces (e.g., bed rails, phones, lavatory surfaces).
Disposal of solid waste	Contain and dispose of solid waste (medical and non-medical) in accordance with facility procedures and/or local or state regulations; wear gloves when handling waste; wear gloves when handling waste containers; perform hand hygiene.
Respiratory hygiene/cough etiquette Source control measures for persons with symptoms of a respiratory infection; implement at first point of encounter (e.g., triage/reception areas) within a healthcare setting.	Cover the mouth/nose when sneezing/coughing; use tissues and dispose in no-touch receptacles; perform hand hygiene after contact with respiratory secretions; wear a mask (procedure or surgical) if tolerated; sit or stand as far away as possible (more than 3 feet) from persons who are not ill.
Droplet Precautions	www.cdc.gov/ncidod/hip/ISOLAT/droplet_prec_excerpt.htm
Patient placement	Place patients with influenza in a private room or cohort with other patients with influenza.* Keep door closed or slightly ajar; maintain room assignments of patients in nursing homes and other residential settings; and apply droplet precautions to all persons in the room. *During the early stages of a pandemic, infection with influenza should be laboratory-confirmed, if possible. Personal protective equipment - Wear a surgical or procedure mask for entry into patient room; wear other PPE as recommended for standard precautions.
Patient transport	Limit patient movement outside of room to medically necessary purposes; have patient wear a procedure or surgical mask when outside the room.
Other	Follow standard precautions and facility procedures for handling linen and laundry and dishes and eating utensils, and for cleaning/disinfection of environmental surfaces and patient care equipment, disposal of solid waste, and postmortem care.
Aerosol-Generating Procedures	During procedures that may generate small particles of respiratory secretions (e.g., endotracheal intubation, bronchoscopy, nebulizer treatment, suctioning), healthcare personnel should wear gloves, gown, face/eye protection, and a fit-tested N95 respirator or other appropriate particulate respirator.

POTENTIAL CHANGES IN STANDARDS OF CARE BY PANDEMIC PHASE

Adapted from the Ventura County Department of Public Health Altered Standards of Care Guidelines.

	Standard of Care			
	Normal	Near Normal	Some Altered	Total Altered
PREPAREDNESS				
▪ No novel influenza virus causing illness in humans ▪ Circulating animal influenza virus subtype poses a substantial risk of human disease	X			
ENHANCED OPERATIONS				
▪ Human cases from the novel influenza virus ▪ No human to human transmission ▪ No cases in the United States	X			
▪ Small clusters with limited human-to-human transmission ▪ No cases in the United States	X	X		
▪ Large clusters of illness ▪ Localized human-to-human transmission ▪ Little to no cases in the United States		X	X	
PANDEMIC RESPONSE				
▪ Widespread illness in the population throughout the world ▪ Sustained human to human transmission			X	X

Operational Definitions

Normal Standards of Care – providing quality care to all patients when allocation of all appropriate health and medical resources are available to improve the health status and/or save the life of each individual patient.

Near Normal Standards of Care – when it becomes necessary to use alternate triage or treatment sites, use of atypical devices, adjusted staffing ratios and expanded scope of practice.

Altered Standards of Care – a shift to providing care and allocating scarce equipment, supplies, and personnel in a way that saves the largest number of lives in contrast to the traditional focus on saving individuals and / or the demand for medical care has exceeded the facility's ability to provide care under normal standards and to be as effective as possible in saving lives. This decision will require a move to expanded functions for staff (e.g., nurses may perform some physician duties). In this case, the decision to move to altered standards of care emanates from the clinical level. Note that it is important that the appropriate higher level of authority has put in place the policies, such as provisions allowing the modification of State scope of practice laws, which support the decision and empower the hospital's nurses or other health care staff to provide an expanded level of care.

PEDIATRIC PATIENT CONSIDERATIONS

Adapted from Childrens Hospital Los Angeles *H1N1 Pandemic Influenza Planning Considerations for Pediatric Patients*.

Overview

Influenza is a serious illness in the age groups at the extremes of life, children less than 5 and adults over 65. In pandemic outbreaks even the healthiest and most robust are at risk for severe disease. Early and accurate identification of influenza in children is important not only for individual patients but for control of the infection in the community.

Complications from influenza in children may include pneumonia due to S. pneumoniae or S. aureus as in adults but other conditions such as bacterial laryngotracheitis, myositis and encephalitis or encephalopathy may occur more commonly in children.

The inability of young children to articulate symptoms that they may be experiencing that are symptoms of influenza i.e. headache, sore throat may prevent early identification and treatment of this illness.

Considerations

Implement “Ultra-Fast Track” or low acuity clinic to treat mild cases quickly and discharge

- It may be difficult to assess children quickly because they are unable to accurately provide information about their own history and symptoms and assessment may need to involve quick but full H & P by MD/PA/NP.
- Children in high-risk of disease complications such as asthma, chronic respiratory illness, immune-compromised illnesses, neuromuscular illness etc should be excluded from this process to allow for full evaluation
- Children with high-risk chronic diseases should be considered for early antiviral treatment to avoid influenza related complications.
- Families that present with multiple children should be triaged to area of care of highest level of treatment needed
- Children appropriate for this assessment/treatment area may include those with vital signs within normal range (except fever), normal level of activity, good perfusion, near normal respiratory effort.
- Children that need laboratory testing, x-rays or treatment should be referred for a full evaluation.

Provide additional beds for influenza patients

- Evaluate early discharge of stable patients and provide out of hospital follow up
- Consider transfer of low acuity children to adult units with staff support,

Visitation policy

- Because it is more difficult to identify influenza like illness in children early and they are likely to transmit disease for 1-4 days prior to overt symptoms, they present a likely source of illness exposure to inpatients.
- Consider limiting the number of visitors per patient for all units, consider restricting visitors to only those over 16 to decrease risk of high-risk contamination from young visitors
- Audit adherence to visitation rules to ensure compliance

Staffing shortages

- Identify staff appropriate to care for pediatric patients, develop plan to call upon them quickly to assist in meeting needs of potential increased pediatric patients

Consider training needs to reorient these employees to specific care that they will be asked to provide

- Free online pediatric disaster training module is available at www.chladisastercenter.org
- Ensure staff teach their own children proper respiratory etiquette to remain well

BIOLOGICAL DISEASE OUTBREAK – PANDEMIC INFLUENZA

INCIDENT RESPONSE GUIDE – LOS ANGELES COUNTY

Adapted from HICS External Scenario 3.

Mission: To effectively and efficiently identify, triage, isolate, treat and track a surge of potentially infectious patients and staff; and manage asymptomatic persons, family members, and the media.

Directions

☐	Use this IRG upon activation of the hospital pandemic influenza plan
☐	Read this entire IRG and incident management team chart
☐	Use this IRG as a checklist to ensure all tasks are addressed and completed

Objectives / Key Activities

☐	Identify, triage, isolate and treat infectious patients
☐	Address issues related to infectious patient surge capacity
☐	Accurately track patients throughout hospital care areas
☐	Assure safety and security of the staff, infectious patients, non-infectious patients, visitors, and facility

Immediate Scale-Up (when pt are in the area or upon first pt admission - whichever is first)

☐ **COMMAND: Incident Commander**

- ☐ Activate the Medical Technical Specialist - Biological/Infectious Disease to assess the incident
- ☐ Activate Command staff and Section Chiefs
- ☐ Implement the pandemic influenza plan, surge capacity plan and other emergency management and operations plans as needed

☐ **COMMAND: Medical Technical Specialist - Biological/Infectious Disease**

Verify the following from Public Health (213-240-7941 or www.lapublichealth.org/acd/Pandemicflu.htm), and report to the Incident Commander. Use the Pandemic Influenza Situation Status form.

- ☐ Type of influenza and its case definition
- ☐ Potential for and scope of communicability, morbidity, and mortality
- ☐ Use and availability of antivirals and vaccines
- ☐ Measures that should be taken (e.g., cultures, supportive treatment)
- ☐ Appropriate PPE and isolation precautions

BIOLOGICAL DISEASE OUTBREAK – PANDEMIC INFLUENZA

INCIDENT RESPONSE GUIDE – LOS ANGELES COUNTY

COMMAND: Liaison Officer

Verify the following from EMS/ReddiNet, and report to the Incident Commander:

☐
- ☐ Number and condition of patients affected arriving via EMS
- ☐ Community medical problems present besides influenza
- ☐ Number and condition of patients expected to be affected, including the worried well

COMMAND: Medical Technical Specialist - Biological/Infectious Disease

Verify the following from the ED attending physician and other affected departments, and report to the Incident Commander:

☐
- ☐ Number and condition of patients affected in the ED, including the worried well
- ☐ Acute medical problems present besides influenza
- ☐ Measures that are currently being taken (e.g., cultures, supportive treatment)

COMMAND: Public Information Officer

☐
- ☐ Monitor media outlets for updates on the pandemic and possible impacts on the hospital. Communicate information via regular briefings to Section Chiefs and Incident Commander
- ☐ Coordinate with Public Health PIO/LAC Field Communication Community Liaison

☐ **COMMAND: Safety Officer:** Conduct ongoing analysis of existing response practices for health and safety issues related to staff, patients, and facility, and implement corrective actions to address

OPERATIONS

☐
- ☐ Provide just-in-time training for all hospital staff regarding the status of the event, precautions they should take, and rumor control
- ☐ Notify the ED of possible numbers of incoming infectious patients, in consultation with the Liaison Officer who is in communication with EMS and Public Health
- ☐ Identify and implement procedures for off-site triage
- ☐ Implement rapid triage of people presenting requesting evaluation. Coordinate with Security, if necessary
- ☐ Implement infection control procedures (lower and higher level precautions) per current CDC guidelines
- ☐ Proper monitoring of isolation rooms and isolation procedures
- ☐ Restrict number of clinicians and ancillary staff providing care to infectious patients
- ☐ Evaluate and determine health status of all persons prior to hospital entry
- ☐ Ensure safe collection, transport, and processing of laboratory specimens

☐ **OPERATIONS: Security:** Implement facility lockdown to prevent infectious patients from entering the facility, except through designated route. Report regularly to the Operations Section Chief. Designate separate patient and staff entry points

BIOLOGICAL DISEASE OUTBREAK – PANDEMIC INFLUENZA

INCIDENT RESPONSE GUIDE – LOS ANGELES COUNTY

PLANNING

☐
- ☐ Establish operational periods and develop Incident Action Plan (IAP)
- ☐ Implement patient/staff/equipment tracking protocols

LOGISTICS

- ☐ Implement distribution plans for mass prophylaxis/immunizations for employees, their families, and others (if antivirals/vaccines are available)

☐
- ☐ Anticipate an increased need for medical supplies, gloves, antivirals, IV fluids, pharmaceuticals, oxygen, ventilators, suction equipment, respiratory protection/PPE, tissues, respiratory therapists, transporters and other personnel
- ☐ Prepare for receipt of external pharmaceutical cache(s). Track dispersal of external pharmaceutical cache(s)
- ☐ Determine staff supplementation needs and communicate to Liaison Officer

Intermediate Response Phase – with patients

COMMAND: Incident Commander

☐
- ☐ Activate and implement emergency management plans
- ☐ If altered standards of care guidelines are released, convene Command staff, Section Chiefs, and activate the Technical Specialist/ Risk Management to review policies and begin implementation

☐ **COMMAND: Public Information Officer:** Establish a patient information center; coordinate with the Liaison Officer and Public Health. Regularly brief hospital staff, patients, and media

COMMAND: Liaison Officer

- ☐ Ensure integrated response with EMS and Public Health
- ☐ Communicate personnel/equipment/supply needs identified by Operations to EMS via ReddiNet or Medical Alert Center (MAC; 866-940-4401)

☐
- ☐ Keep Public Health advised of any health problems/trends identified, in cooperation with infection control
- ☐ Integrate outside personnel assistance into Hospital Command Center and hospital operations (OR have them coordinate with Labor Pool)
- ☐ Report operational status to EMS via ReddiNet or Medical Alert Center (MAC; 866-940-4401)

BIOLOGICAL DISEASE OUTBREAK – PANDEMIC INFLUENZA

INCIDENT RESPONSE GUIDE – LOS ANGELES COUNTY

OPERATIONS

- ☐ Conduct disease surveillance, including number of affected patients/personnel
- ☐ Continue isolation activities as needed. If patient surge is beyond hospital's isolation capacity, consider cohorting influenza patients elsewhere and using isolation/negative pressure/HEPA areas for higher-risk procedures, such as aerosolizing respiratory procedures
- ☐ Consult with infection control for disinfection requirements for equipment and facility. Monitor for nosocomial transmission.

☐

- ☐ Continue patient management activities, including patient cohorting, patient/staff/visitor medical care issues
- ☐ Coordinate with Logistics implementation of mass vaccination/mass prophylaxis plan, if supplies are available
- ☐ Determine scope and volume of supplies/equipment/personnel required and report to Logistics
- ☐ Assess capacity for refrigeration/security of deceased patients. Implement mass fatality plan in cooperation with Public Health

PLANNING

- ☐ Continue patient tracking

☐

- ☐ Collect information regarding situation status and report to IC/Command staff/Section Chiefs regularly
- ☐ Revise security plan and family visitation policy, as needed

LOGISTICS

- ☐ Coordinate activation of staff vaccination/prophylaxis plan with Operations, if vaccine is available
- ☐ Monitor the health status of staff who are exposed to infectious patients

☐

- ☐ Implement plan to evaluate symptomatic staff before they report for duty
- ☐ Consider reassigning staff recovering from flu to care for flu patients; reassign staff at high risk for complications of flu (e.g., pregnant women, immunocompromised persons) to low risk duties (e.g., no flu patient care or administrative duties only)
- ☐ Establish Family Care Unit under Support Branch Director to address family/dependent care issues to maximize employee numbers at work

FINANCE

☐

- ☐ Track response expenses and report regularly to Command staff and Section Chiefs
- ☐ Track and follow up with employee illnesses and absenteeism issues

Extended Response Phase

☐ **COMMAND: Incident Commander:** Continue regular briefing of Command staff/Section Chiefs. Address issues identified

BIOLOGICAL DISEASE OUTBREAK – PANDEMIC INFLUENZA

INCIDENT RESPONSE GUIDE – LOS ANGELES COUNTY

☐ **COMMAND: Public Information Officer:** Continue patient information center, as necessary. Coordinate efforts with Public Health

☐ **COMMAND: Liaison Officer:** Continue to:

- ☐ Ensure integrated response with Public Health and EMS
- ☐ Communicate personnel/equipment/supply needs to EMS via ReddiNet/MAC
- ☐ Keep Public Health advised of any health problems/trends identified

☐ **OPERATIONS**

- ☐ Continue patient management and facility monitoring activities
- ☐ Ensure proper disposal of infectious waste, including disposable supplies/equipment

☐ **PLANNING**

- ☐ Revise and update the IAP and distribute to IC, Command Staff and Section Chiefs
- ☐ Plan for demobilization, next wave preparation and/or termination of incident

☐ **LOGISTICS**

- ☐ Continue monitoring the health status of staff exposed to infectious patients
- ☐ Continue addressing behavioral health support needs for patients/visitors/staff
- ☐ Continue providing equipment/supply/personnel needs. Decontaminate equipment and facility as needed

☐ **FINANCE:** Continue to track response expenses and employee injury/illness and absenteeism

☐ **OPERATIONS**

- ☐ Conduct disease surveillance, including number of affected patients/personnel
- ☐ Continue isolation activities as needed
- ☐ Consult with infection control for disinfection requirements for equipment and facility
- ☐ Continue patient management activities, including patient cohorting, patient/staff/visitor medical care issues
- ☐ Coordinate with Logistics implementation of mass vaccination/mass prophylaxis plan, if supplies are available, per Public Health guidelines
- ☐ Determine scope and volume of supplies/equipment/personnel required and report to Logistics
- ☐ Follow EMS guidelines for patient transport to/from the hospital
- ☐ Assess capacity for refrigeration/security of deceased patients. Implement local mass fatality plan (including temporary morgue sites) in cooperation with Public Health

Current Wave Demobilization

☐ **COMMAND: Public Information Officer:** Provide briefings as needed to patients, visitors, staff, and media, in cooperation with Public Health

BIOLOGICAL DISEASE OUTBREAK – PANDEMIC INFLUENZA

INCIDENT RESPONSE GUIDE – LOS ANGELES COUNTY

☐ **COMMAND: Incident Commander:** Provide appreciation and recognition to solicited and non-solicited volunteers, staff, state and federal personnel that helped during the incident

☐ **COMMAND: Liaison Officer:** Prepare a summary of the status and location of infectious patients. Disseminate to Command staff/Section Chiefs and to Public Health/EMS as appropriate

☐ **OPERATIONS:** Restore normal facility operations and visitation

☐ **PLANNING**

- ☐ Conduct after action debriefing with HCC Command staff, Section Chiefs, and general staff immediately upon demobilization or deactivation of positions
- ☐ Prepare the after-action report and improvement plan for review and approval. Include short-term improvements for next wave, and long term recommendations for improvement.

☐ **FINANCE**

- ☐ Compile time, expense and claims reports and submit to IC for approval
- ☐ Distribute approved reports to appropriate authorities for reimbursement

System Recovery / Preparation for the Next Wave

☐ **COMMAND: Medical Technical Specialist - Biological/Infectious Disease**

- ☐ Continue to monitor the status of the pandemic

☐ **OPERATIONS:** Restore normal facility operations and visitation

☐ **PLANNING**

- ☐ Implement short-term improvements from the after-action report.
- ☐ Forecast needs for the next wave

☐ **LOGISTICS**

- ☐ Conduct stress management as necessary (e.g., Employee Assistance Programs)
- ☐ Monitor health status of staff
- ☐ Inventory all HCC and hospital supplies and replenish and/or stockpile as necessary.
- ☐ Restore/repair/replace broken equipment
- ☐ Return borrowed equipment after proper cleaning/disinfection, or arrange for longer-term borrowing or access to the equipment

☐ **FINANCE:** Distribute approved reports to appropriate authorities for reimbursement

Final Demobilization

☐ **COMMAND: Public Information Officer:** Provide briefings as needed to patients, visitors, staff, and media, in cooperation with Public Health

BIOLOGICAL DISEASE OUTBREAK – PANDEMIC INFLUENZA

INCIDENT RESPONSE GUIDE – LOS ANGELES COUNTY

☐	**COMMAND: Incident Commander:** Provide appreciation and recognition to solicited and non-solicited volunteers, staff, state and federal personnel that helped during the incident
☐	**COMMAND: Liaison Officer:** Prepare a summary of the status and location of infectious patients. Disseminate to Command staff/Section Chiefs and to Public Health/EMS as appropriate
☐	**OPERATIONS:** Restore normal facility operations and visitation
☐	**PLANNING** ☐ Conduct after action debriefing with HCC Command staff, Section Chiefs, and general staff immediately upon demobilization or deactivation of positions ☐ Prepare the after-action report and improvement plan for review and approval. Include short-term improvements for next wave, and long term recommendations for improvement
☐	**FINANCE** ☐ Compile time, expense and claims reports and submit to IC for approval ☐ Distribute approved reports to appropriate authorities for reimbursement
☐	**PLANNING** ☐ Implement short-term improvements from the After-Action Report ☐ Forecast needs for the next wave
☐	**COMMAND: Medical Technical Specialist - Biological/Infectious Disease** ☐ Continue to monitor the status of the pandemic
☐	**LOGISTICS** ☐ Conduct stress management as necessary (e.g., Employee Assistance Programs) ☐ Monitor health status of staff ☐ Inventory all HCC and hospital supplies and replenish and/or stockpile as necessary. ☐ Restore/repair/replace broken equipment ☐ Return borrowed equipment after proper cleaning/disinfection, or arrange for longer-term borrowing or access to the equipment

Documents and Tools

☐	Pandemic influenza and surge capacity plan
☐	Infection control plan
☐	Risk communication plan
☐	Patient/staff/equipment tracking procedure
☐	Behavioral health support for staff/patients plan
☐	Patient/staff/equipment tracking procedure

BIOLOGICAL DISEASE OUTBREAK – PANDEMIC INFLUENZA

INCIDENT RESPONSE GUIDE – LOS ANGELES COUNTY

☐	Hospital security plan
☐	Employee health monitoring/treatment plan
☐	Mass vaccination/mass prophylaxis plan
☐	Mass fatalities plan
☐	All other relevant protocols/guidelines relating to biological/infectious disease/mass casualty incidents
☐	HICS forms
☐	Pandemic Influenza Disease Situation Status form
☐	Job Action Sheets
☐	Hospital organization chart
☐	Television/radio/internet to monitor news
☐	Telephone/cell phone/radio/satellite phone/internet for communication

PANDEMIC INFLUENZA DISEASE SITUATION STATUS

Use this form upon activation of the hospital pandemic influenza plan and periodically throughout the response to document the status of the pandemic in the hospital and the community. Use HICS Form 259 to report overall patient status.

INCIDENT NAME		INFLUENZA STRAIN
		□ Name/Type: _____ □ Unidentified
DATE PREPARED	**TIME PREPARED**	**OPERATIONAL PERIOD DATE/TIME**

ISSUE	ISSUE
Transmission □ Droplet □ Airborne □ Unknown	**Lab Samples** # submitted: _____ # positive: _____ # negative: _____
Infection Control □ Standard □ Droplet □ Airborne □ Isolation, cohorted □ Non-isolation, cohorted	**Hospital Statistics - Patients** # probable cases: _____ # confirmed (by lab result) cases: _____ # admitted: _____ # sent home: _____ # deceased: _____
Vaccine Available □ Yes: # doses on hand: _____ # doses administered: _____ # doses waiting arrival: _____ □ None arriving to hospital soon □ No: □ In production, but none available yet □ Not developed yet	**Hospital Statistics - Staff** # cases, working: _____ # cases, unable to work: _____ # admitted*: _____ # deceased*: _____ # previously infected: _____ * may also be included in Hospital Statistics
Antiviral Efficacy □ Yes, Type: _____ # doses on hand: _____ # doses administered: _____ # doses waiting arrival: _____ □ Available, but not arriving to hospital soon □ None identified as effective yet □ Other medications/treatments being used: _____ _____ _____	**Community Statistics*** % Morbidity: _____ % Mortality: _____ **Geographic Spread** □ Throughout Los Angeles County □ Throughout California □ Throughout Western United States □ Throughout United States □ Throughout the world * information from Public Health, CDC, or WHO

ADDITIONAL NOTES

PREPARED BY (MEDICAL/TECHNICAL SPECIALIST: BIOLOGICAL/INFECTIOUS DISEASE)

Instructions: Complete this form (2 pages) and email to LAC EMS Agency Duty Officer at emsalert@dhs.lacounty.gov.
An electronic version can be downloaded from: http://ems.dhs.lacounty.gov/Reports/MedHealthRROrderForm.pdf

Medical and Health Resource Request

RR MH (9/09)

Requestor To Complete

1. Incident Name:	2a. DATE:	2b. TIME:	2c. Requestor Number: (Assigned by Requesting Entity)
3. Requestor Name, Agency, Position, Phone / Email:			
4. Describe Mission/Tasks:			
5 - 7. ORDER SHEET - SEE ATTACHED			

MHOAC

8. MHOAC / DOC Review (NAME, POSITION , AND SIGNATURE - SIGNATURE INDICATES VERIFICATION OF NEED AND APPROVAL)	9. Processing Activities: (DESCRIBE DETAILS)

LOGISTICS

NOTE: To be completed by the Level/Entity that fills the request (OA EOC, Region, State, Pre-Allocated).

10. Additional Order Fullfillment Information:	11. Supplier Name / Phone / Fax / Email:	12. Resource Tracking: ☐ Entered into Resource Tracking System (Plans) ☐ Demob Expected: ☐ Demob Completed (if known):
13. Notes:		
14. ORDER FILLED AT (check box) ☐ OA EOC ☐ REGION ☐ STATE ☐ PRE-ALLOCATED		

FINANCE

15. Reply / Comments from Finance:	16. Finance Section Signature (Name, Position & Signature) & Date/Time:

5. ORDER							**17. Logistics Section: Fulfillment** NOTE: To be completed by the Level/Entity that fills the request (OA EOC, Region, State).					
							Quantity			**Tracking #**	**ETA**	**COST**
Line #	**Priority** (See Below)	**Detailed Specific Item Description: Vital characteristics, brand, specs, diagrams, and other info.** (Rx: Drug Name, Dosage Form, UNIT OF USE PACKAGE or Volume, etc.) (STAFF: experience, licensure, etc.)	**Kind/Rx Strength**	**Type/Rx** Unit or Conc.	**Quantity Requested** (See Below)	**Expected Duration of Use:**	**Approved**	**Filled**	**Back-Ordered**		(Date & Time)	
6. Suggested Source(s) of Supply; Suitable Substitute(s); Special Delivery Comment(s):							**7. Deliver to/Report to POC (Name, Position, Tele#/Email, Radio, etc.)**					

PRIORITY: (E)mergent <12 hour (RIMS:FLASH/HIGH), (U)rgent >12 hour (RIMS: MEDIUM) or (S)ustainment (RIMS: LOW)

QUANTITY: Based upon a unit of EACH; Pharmaceuticals are based upon a single regimen of the requested unit.

LOS ANGELES COUNTY DEPARTMENT OF PUBLIC HEALTH: QUARANTINE

Los Angeles County Department of Public Health regulations state that when the Health Officer believes that there is probability that any infectious or contagious disease will invade this county, it shall take such action and adopt and endorse such rules and regulations as it deems efficient in preventing the introduction or spread of such infectious or contagious disease or diseases within this county, and to accomplish these objectives, shall establish and strictly maintain quarantine and isolation at such places as it deems proper.

Isolation and quarantine may have limited use in an influenza pandemic due to the short incubation period of influenza (1-4 days), the short infectious period (from 1 day before symptoms to 5 days after onset of illness), the large proportion of asymptomatic infections, the non-specific nature of clinical illness from influenza infection, and the sheer number of cases that makes contact tracing impossible.

1. The Health Officer will serve as the coordinator of isolation or quarantine activities in the event of an outbreak in Los Angeles County. The powers to quarantine and isolate are state powers delegated by the California Department of Public Health to the local Health Officer. Local and/or state statutes regarding public health authorities for isolation and quarantine of potentially infected and incubating persons shall be followed.
2. A state of quarantine may be instituted only as a last resort to control an outbreak situation when other previously listed containment measures have failed or are falling behind the accrual of new cases.
3. California laws establish adequate authority for the Governor to institute quarantine measures at local, county, or state level in a declared emergency.
4. If quarantine is indicated, the Governor of California, in consultation with the Secretary of Health, Commissioner of Health and the State Epidemiologist, will be responsible for declaring this state of emergency and marshalling resources to implement the quarantine plan.
5. Infectious patients that are manifesting the same disease process may be cohorted in negative pressure isolation rooms in the hospital or other area designed for isolation protocol (e.g., DRC tents with HEPA filters).

STAFFING CONSIDERATIONS

Adapted from CDC Guidance *for Businesses and Employers To Plan and Respond to the 2009-2010 Influenza Season*, Oct 21, 2009: http://pandemicflu.gov/professional/business/guidance.html; CA Emergency Medical Services Authority *Pandemic Influenza Planning and Preparedness Framework For Local Emergency Medical Services Agencies*, October 8, 2009: www.emsa.ca.gov/about/files/PandemicFrameworkForEMSProviders.doc; and CIDRAP/SHRM: *Doing business during an influenza pandemic: human resource policies, protocols, templates, tools, & tips*, Nov 2009.

The entire healthcare system may be severely impacted by illness and absenteeism among employees and the hospital's resources may be in high demand during the pandemic as the system copes not only with the normal patient volume but also with the surge of influenza-like illness.

Rates of absenteeism will depend on the severity of the pandemic. In a severe pandemic, absenteeism attributable to illness, the need to care for ill family members, and fear of infection may reach 40% during the peak weeks of a community outbreak, with lower rates of absenteeism during the weeks before and after the peak. Certain public health measures (closing schools, quarantining household contacts of infected individuals) are likely to increase rates of absenteeism.

Preservation of the Workforce

- Provide education and training for hospital personnel.
- Telecommuting may be an option for employees. Investigate the feasibility of working from home for appropriate employees to decrease exposures and maintain productivity.
- Plan for housing and feeding of employees who must remain close to work.
- Provide psychosocial and employee family support.
- Plan for enhanced security for employees, facilities, supplies and equipment.

Augmentation of the Workforce

- Implement adjusted or flexible staffing plans, especially during peak call times
    - Implement longer shifts (e.g., 12-16 hour shifts) and provide rest periods between shifts, as appropriate.
- Expand the workforce
    - During an influenza pandemic, normal sources of mutual aid personnel are also likely to be affected. The following represent potential sources of skilled personnel with appropriate skills:
        - Reinstate retired personnel to assume support roles (e.g., call triage, restocking)
        - Plan and develop processes for the use of hospital and ancillary support personnel from outside the jurisdiction.
        - Collaborate with clinical training programs to use students as staffing extenders.
- Cross-train existing workers to expand the availability of skills and abilities.

- Plan for succession and delegation of authorities for the key leadership and decision-making/authority positions within the organization
    - Identify 2-3 successors for the key leadership positions to ensure coverage for illness and absenteeism.

Absentee Patterns

Businesses should have an understanding of their normal seasonal absenteeism rates and know how to monitor their personnel for any unusual increases in absenteeism through the fall and winter.

Monitoring absentee patterns during a pandemic can alert you before spikes of sick workers occur in different regions where your organization operates. To do so requires that you (1) know what your typical absentee patterns is, particularly regarding seasonal influenza, (2) provide an efficient way for employees to notify you so that you can collect data, and (3) understand the threshold beyond which your organization's operations will be threatened. Running scenarios about what could happen at different levels of severity is a tool some organizations have used, though its usefulness is more for planning decisions rather than actually predicting changes. Some companies put in place hotlines to allow employees to call in sick if they have symptoms of an influenza-like illness.

HUMAN RESOURCES POLICY CONSIDERATIONS

Adapted from CDC Guidance *for Businesses and Employers To Plan and Respond to the 2009-2010 Influenza Season*, Oct 21, 2009: http://pandemicflu.gov/professional/business/guidance.html; CA Emergency Medical Services Authority *Pandemic Influenza Planning and Preparedness Framework For Local Emergency Medical Services Agencies*, October 8, 2009: www.emsa.ca.gov/about/files/PandemicFrameworkForEMSProviders.doc; and CIDRAP/SHRM: *Doing business during an influenza pandemic: human resource policies, protocols, templates, tools, & tips*, Nov 2009.

Review and modify policies for sick leave, vacation time, and employee compensation (e.g., overtime) as appropriate:

- Leave policies should be flexible and non-punitive.
- Policies should allow and encourage ill personnel to stay at home and away from co-workers, or to stay at home to care for ill family members.
    - Consider not requiring a doctor's note for workers who reported ill with influenza and were off work, if this is a current workplace policy.
- In the event of school closures, allow flexible work schedules or other accommodations to allow employees to attend to child care.
- Review employee assistance programs available to assist with coping and stress during the pandemic.
- Assess the feasibility of clerical and administrative personnel telecommuting from home. Consider the nature of the duties they perform, infrastructure support, etc.

Leave Policies

Employees want and need clarity about your position on sick leave during an influenza pandemic, which understandably is not easy, given the unpredictability of influenza. The CDC asked employers to allow sick workers to stay home without fear of losing their jobs and to plan for two scenarios: (1) mild illness, and (2) that the virus causes more severe illness, in which absenteeism is likely to be more widespread and public health officials invoke more restrictive measures such as school and child care closures. How long they may need to stay home if they have influenza depends on the severity and impact of the outbreak.

For flexible leave policies to effectively encourage sick employees to stay home, an argument can be made that such policies should be communicated as soon as possible to employees and supervisors.

- A mild case of influenza can produce symptoms that resemble other kinds of respiratory illnesses. Some employees may not be able to distinguish the symptoms of a cold or seasonal allergy attack from symptoms of an influenza-like illness.
- Unless managers model staying home when sick, employees will receive a mixed message and not trust that their jobs will be secure if they follow the CDC recommendation

To provide more flexibility, employers discussed having adopted or having considered adopting the following options:

- Allowing employees to exhaust paid time off (PTO) hours and go into negative balances
- Advancing sick time up to a year of accrual (if, for example, the employee normally accrues 5 days of sick time per year and has used all 5 days, then you may want to consider advancing another 5 days)
- Suspending point attendance policies during the influenza pandemic
- Providing a special time off allotment for the influenza pandemic
- Allowing employees to donate leave to others

Pay Policies

When an employee is absent with no paid leave eligibility, the question arises whether federal or state wage and hour laws, nevertheless, may require the employee to be paid. Under the federal Fair Labor Standards Act (FLSA), for example, so-called "nonexempt" employees are required to be paid only for the hours they actually work. So if an employer sends an apparently ill employee home after less than a full day's work, the employer need only pay the employee for the time worked.

For so-called "exempt" employees lacking any available paid leave, time away from work for 1 or more full days for personal reasons or due to sickness can be unpaid as long as it is in full-day increments (and not FMLA leave). For time off mandated by employers (e.g., closing the business for 3 days), the time away from work for exempt employees can be unpaid only if the employee performs no work whatsoever in that workweek; then, the exempt employee would not receive pay for the full week. If, however, an exempt employee performs any work during a given workweek, the employee must receive the entire weekly salary for that week, even though the employer required the employee to take some time off. Many employers are opting to advance employees vacation/PTO to cover pandemic influenza absences to help ensure workers sick with pandemic influenza do not come to work.

SAMPLE PANDEMIC PERIOD STAFFING PLAN

Adapted from the Ventura County Department of Public Health Altered Standards of Care Guidelines.

Assumptions

1. County/state/federal/advisory bodies may dictate level of action to be taken at the local level.
2. Initial response would be consistent with level of caution recommended by regulatory/advisory bodies, phase of the pandemic, or recommendation of local infectious disease specialists and Infection Control Committee.
3. The facility will need to be prepared to function for up to seven days.
4. Facility would progress to more aggressive measures as appropriate.
5. Staffing of all "Essential Function Work On-Site" areas will be progressively limited to patient need.
6. The hospital will experience staffing shortages: volunteers, retired healthcare professionals, and trained but unlicensed personnel may need to fulfill defined roles.
7. Traditional standards of care may be altered pursuant to county/state/federal/advisory body recommendations.
8. Initially, surgical/procedure/testing volumes will include elective cases/procedures/tests. As response becomes more aggressive, surgical/procedure/testing volumes will be restricted to urgent/emergent only.

Department	Information Regarding Personnel/Function Affected	Essential Function - Work On-Site	Essential Function – Work from Alternate Location	Non-Essential Function – Function Delayed
Accounting	CFO Assist. CFO Controller Payroll		X	
Administration	CEO COO CFO Administrative Assistants Medical Director	X Limited	X	
Admitting		X		
Biomedical	Equipment preventive maintenance and repair	X		
Cancer Program				X
Cardiac Rehabilitation				X
Cardiac Testing Electrical Studies		X		
Cardiac Cath Lab		X		
Case Management	Discharge planning	X Limited on-site		
Cashier/Financial Counselor	Cashier Financial Counselor Insurance Verification			X
Central Services	Sterile supplies	X		

Department	Information Regarding Personnel/Function Affected	Essential Function - Work On-Site	Essential Function – Work from Alternate Location	Non-Essential Function – Function Delayed
Chaplain		Limited		
Dietary Department – Food and Nutritional Services Cafeteria	Patient food Nutritional Counseling/Support	X May use pre-packaged to reduce needed staff		
Education		X Limited on-site (staff and patient pan flu education only)		
Employee Health		X Limited on-site (staff monitoring)		
EVS		X		
Gamma Knife		X Urgent/Emergency only		
Gift Shop				X
Health Information Management		X		
Human Resources		X Limited on-site (Assist in obtaining staff)	X	
Infection Control		X		
Information Technology (IT)			X	
Laboratory		X		
Linen Distribution		X Limited on-site distribution	X Delivery	
Marketing/Public Relations			X	
MediCal Eligibility				X
Medical Staff Library	Librarian		X	
Medical Staff Services		X Limited for privileging		
Nursing Administration	CNO Assist CNO Supervisors Staffers	X		
Nursing Clinical Units		X Staffing will be based upon minimal identified for disaster planning purposes. Care delivery model may change. Nurse-patient ratio may be altered with notification of DHS.		
Nutrition Clinic				X
Pharmacy	Pharmacists Pharmacy Tech	X		
Physician Services			X	

Department	Information Regarding Personnel/Function Affected	Essential Function - Work On-Site	Essential Function – Work from Alternate Location	Non-Essential Function – Function Delayed
Plant Ops		X		
Pulmonary Function		X		X (Outpatient)
Pulmonary Rehabilitation				X
Quality Management / Risk Management / Bioethics		X Limited	X	
Radiology	X-Ray CT Nuclear Medicine Ultrasound Transporters	X		
Rehabilitation Services	PT OT Speech	X		X Outpatient
Respiratory Therapy		X		
Security	May require additional staff	X		
Social Services		X Limited on-site	X	
Special Procedures	GI Laboratory Bronchoscopy	X		
Surgical Services	OR PACU Open Heart	X		
SurgiCenter	OR PACU			X
Supply Chain		X		
Transcription Services			X	
Volunteers				X May use selected volunteers

Staffing Contingency Planning

Should a local or national outbreak result in shortage of workers for essential functions identified above, the following resources may be contacted to facilitate hospital operations. The listing below is not in priority order but rather the specific resource will be dependent on the local/national situation.

Resource	Personnel Provided	Comments
In-house staff	General and Clinical Staff	Personnel normally assigned to other duties are reassigned as appropriate to competency/licensure and available support.
Members of the medical staff	Clinical Care Providers	
ESAR-VHP, Medical Reserve Corps (MRC)	Clinical Care Providers	Los Angeles County DHS will coordinate needs and available resources within LAC and with other counties in the state.
Temporary Staffing Agencies	General	
County Mutual Assistance	Clinical Care Providers	Los Angeles County DHS will coordinate needs and available resources within LAC and with other counties in the state.
Local healthcare schools (e.g. nursing, respiratory therapy, laboratory, radiology, etc.)	Clinical Care Assistants	Would use in un-licensed roles (Nurse Assistant or clerical type) roles unless direction received from State licensing agencies or federal mandate. Assignments will be task oriented with level of supervision needed altered based upon the nature of the task. A Registered Nurse or other appropriate professional will be available as a resource.
Staff family members, patient family members, local community residents	General and Clinical Staff	Would use in un-licensed roles (Nurse Assistant or clerical type) unless direction received from State licensing agencies or federal mandate. Pool may include retired or non-working professionals. Assignments will be task oriented with level of supervision needed altered based upon the nature of the task. A Registered Nurse will be available as a resource.

EMPLOYEE HEALTH CONSIDERATIONS

Adapted from CDC Guidance *for Businesses and Employers To Plan and Respond to the 2009-2010 Influenza Season*, Oct 21, 2009: http://pandemicflu.gov/professional/business/guidance.html; CA Emergency Medical Services Authority *Pandemic Influenza Planning and Preparedness Framework For Local Emergency Medical Services Agencies*, October 8, 2009: www.emsa.ca.gov/about/files/PandemicFrameworkForEMSProviders.doc; CIDRAP/SHRM: *Doing business during an influenza pandemic: human resource policies, protocols, templates, tools, & tips*, Nov 2009; and *CDC Interim Guidance on Infection Control Measures for 2009 H1N1 Influenza in Healthcare Settings, Including Protection of Healthcare Personnel, October 14, 2009: http://www.cdc.gov/h1n1flu/guidelines_infection_control.htm*

Screening

The symptoms of influenza can include fever, cough, sore throat, runny or stuffy nose, body aches, headache, chills, fatigue, nausea, diarrhea, and vomiting. If your organization adopts screening of employees, become familiar with CDC guidelines for infection control, which state: "In general, the incubation period for influenza is estimated to range from 1 to 4 days with an average of 2 days. Influenza virus shedding (the time during which a person might be infectious to another person) begins the day before illness onset and can persist for 5 to 7 days. The amount of virus shed is greatest in the first 2-3 days of illness and appears to correlate with fever, with higher amounts of virus shed when temperatures are highest."

Staying Home When Ill

Advise all employees to stay home if they are sick until at least 24 hours after they no longer have a fever (100°F or 38°C) or signs of a fever (have chills, feel very warm, have a flushed appearance, or are sweating). Make sure fever is gone without the use of fever-reducing medicines (any medicine that contains ibuprofen or acetaminophen).

If flu conditions become more severe: Extend the time sick employees stay home to at least 7 days, even if they feel better sooner. People who are still sick after 7 days should continue to stay home until at least 24 hours after symptoms have gone away.

Suspending the Requirement for a Doctor's Note

Consider suspending the requirement for a doctor's note for workers who are ill with influenza-like illness to validate their illness or to return to work, as doctors' offices and medical facilities may be extremely busy and may not be able to provide such documentation in a timely way.

Without question, few employees will be able to produce a doctor's note if they become ill, owing to widespread public health recommendations that people who are sick with mild symptoms not seek medical care, the fact that the healthcare systems will likely be overwhelmed, and the fact that testing for the pandemic virus is reserved for only the sickest who likely will require hospitalization. Requiring a doctor's note for return to work is likely to keep employees away from the workplace longer than

necessary. And yet this is one area with which many organizations are struggling, particularly if legal counsel advises against it.

Sleeping Quarters

- Arrange physical work spaces to provide a 6 foot separation between employees, as possible. (e.g., desks, kitchen areas, recreational areas)
- Provide a 6 foot separation between staff in sleeping quarters
- Cleaning Sleeping Quarters
    - Previous recommendations from the CDC and CDPH referred to the use of disinfectants. However, influenza is an extremely fragile virus that remains infectious for only minutes and is easy to kill after exposure to air. Simple cleaning will remove most of virus along with other material, leaving the remaining virus to be exposed to air and rendered non-infectious within minutes.
    - Clean surfaces and items that are likely to have frequent hand contact by multiple people (e.g., computer keyboards, elevator buttons, shared equipment, doorknobs, and counters).
    - Use the cleaning agents that are usually used in these areas and follow the directions on the label. No additional disinfection beyond routine cleaning is recommended. Special cleaning with bleach and other non-detergent based cleaners is not necessary.

HEALTHCARE WORKER INFLUENZA-LIKE ILLNESS MONITORING FORM

Instructions: To be used for tracking potential exposures.

NAME	HOME TELEPHONE
JOB TITLE	WORK LOCATION
Date/s of exposure (list all, use back of page if necessary): ___/___/___ ___/___/___ ___/___/___ ___/___/___	
Type of contact with influenza patient, patient environment, or virus:	
Was personal protective equipment (PPE) used: No _____ Yes _____	
If yes, list PPE used (e.g., gown, gloves, particulate respirator, surgical mask, eye protection, etc.):	
List any non occupational exposures (e.g., exposure to family or birds with severe acute febrile respiratory illness):	

Please check your temperature twice a day (morning, AM; evening, PM) for 10 days after providing care for a pandemic influenza-infected patient (including 10 days after your last known exposure).

Monitor yourself for any of the following influenza-like illness symptoms including the presence of 1, 2, 3 and any of 4 (a–f) which could be due to influenza virus:

1. Acute onset of respiratory illness
2. Fever (>100.4°F or 38°C)*
3. Cough
4. One or more of the following:
   a. sore throat
   b. arthralgia
   c. myalgia or prostration
   d. diarrhea*
   e. vomiting*
   f. abdominal pain**

* May be present in children

** May not be present in elderly people

If any symptoms of ILI occur, immediately limit your interactions with others, exclude yourself from public areas, and notify _____ at _____.

MONITORING CHART POST-EXPOSURE

Day 1	Day 2	Day 3	Day 4	Day 5
Date: ___/___/___ AM temperature: _____ PM temperature: _____ ILI Symptoms: No ___ Yes___	Date: ___/___/___ AM temperature: _____ PM temperature: _____ ILI Symptoms: No ___ Yes___	Date: ___/___/___ AM temperature: _____ PM temperature: _____ ILI Symptoms: No ___ Yes___	Date: ___/___/___ AM temperature: _____ PM temperature: _____ ILI Symptoms: No ___ Yes___	Date: ___/___/___ AM temperature: _____ PM temperature: _____ ILI Symptoms: No ___ Yes___
Day 6	**Day 7**	**Day 8**	**Day 9**	**Day 10**
Date: ___/___/___ AM temperature: _____ PM temperature: _____ ILI Symptoms: No ___ Yes___	Date: ___/___/___ AM temperature: _____ PM temperature: _____ ILI Symptoms: No ___ Yes___	Date: ___/___/___ AM temperature: _____ PM temperature: _____ ILI Symptoms: No ___ Yes___	Date: ___/___/___ AM temperature: _____ PM temperature: _____ ILI Symptoms: No ___ Yes___	Date: ___/___/___ AM temperature: _____ PM temperature: _____ ILI Symptoms: No ___ Yes___

SAMPLE EMPLOYEE HEALTH EVALUATION AND MANAGEMENT FLOW CHART

Courtesy of American Medical Response.

<table>
<tr><th colspan="3">EMPLOYEE WITH POSSIBLE INFLUENZA EXPOSURE</th></tr>
<tr><td>Employee</td><td colspan="2">Has the employee been exposed to:
• Unprotected exposure or breach of PPE
• Patient with flu symptoms
• AND Community has known pan flu outbreak</td></tr>
<tr><td rowspan="2">Infection Control Coordinator</td><td rowspan="2">NO</td><td>YES</td></tr>
<tr><td>Action: Document detail of exposure</td></tr>
<tr><td rowspan="2">Safety Risk</td><td colspan="2">Does the employee feel sick?</td></tr>
<tr><td>NO</td><td>YES</td></tr>
<tr><td>Actions</td><td>• Go back to work
• Re-evaluate if symptoms develop</td><td>Follow employee with possible influenza symptoms: Evaluation and Management</td></tr>
</table>

<table>
<tr><th colspan="5">EMPLOYEE WITH POSSIBLE INFLUENZA SYMPTOMS</th></tr>
<tr><td>Employee</td><td colspan="4">Does the employee have these possible influenza symptoms:
Fever (>100°F) PLUS
• Respiratory symptoms
• Malaise/fatigue
• Nausea/vomiting</td></tr>
<tr><td>Infection Control Coordinator</td><td rowspan="3">NO
Symptoms</td><td colspan="3">YES</td></tr>
<tr><td colspan="3">Action: Conduct Nasal Swab Test
If not doing nasal swabs, follow positive result flow</td></tr>
<tr><td rowspan="3">Safety Risk</td><td rowspan="3">Negative result</td><td colspan="2">Positive result</td></tr>
<tr><td colspan="2">Action: Conduct investigation: work related?</td></tr>
<tr><td>NO</td><td>YES</td></tr>
<tr><td>Actions</td><td>• Go home if too sick to work (sick leave or unpaid)
• Re-evaluate if flu symptoms develop or worsen
• Return to work when healthy</td><td>• Go home if too sick to work (sick leave or unpaid)
• Re-evaluate if flu symptoms develop or worsen
• Return to work when healthy</td><td>• Recommend visit to primary care provider and get Influenza A and/or pan flu virus testing
• If confirmed pan flu, isolation & antiviral therapy per CDC recommendations
• PTO plan if appropriate
• Return to work per MD</td><td>• MD visit with Influenza A and/or pan flu virus testing
• If confirmed pan flu, isolation & antiviral therapy per CDC recommendations
• Workers Comp plan, if appropriate
• PTO plan, if appropriate
• Return to work per MD</td></tr>
</table>

OCCUPATIONAL HEALTH MANAGEMENT OF HEALTH CARE WORKERS DURING AN INFLUENZA PANDEMIC

Adapted from: Los Angeles County Department of Public Health Pandemic Influenza Plan, Guidelines for Acute Care Hospital Settings, 3-1-06: http://search.lapublichealth.org/acd/Pandemicflu.htm; and CDPH and Cal/OSHA Joint Statement: Guidance for Infection Control for 2009 H1N1 Influenza in Health Care Settings, January 12, 2010: http://www.cdph.ca.gov/HealthInfo/discond/Documents/H1N1-ICGuidanceHealthCareSettings.pdf

The phrases “fit for work” and “unfit for work” are used by occupational health to communicate a worker’s ability to remain at work depending upon their susceptibility to influenza, immunization status and agreement to use antivirals.

FIT FOR WORK

(a) Ideally, healthcare workers are **fit to work when one** of the following conditions applies:

- **Recovered** from an influenza-like-illness during earlier phases of the pandemic
  - Exclusion period for healthcare workers with febrile respiratory illness is at least 24 hours after they no longer have a fever, without the use of fever-reducing medicines, unless they work with severely immunocompromised patients.
  - For healthcare workers who work with severely immunocompromised patients and are returning to work after a febrile respiratory illness, consider temporary reassignment or exclusion from work for 7 days from symptom onset or until the resolution of symptoms, whichever is longer, unless absence of 2009 H1N1viral RNA in respiratory secretions is documented by rRT-PCR.
- **Immunized** against the pandemic strain of influenza
- Taking appropriate **antivirals**

Scope: May work with all patients

(b) **Healthy, unexposed healthcare workers**

Scope: Should work in non-influenza areas

(c) **Asymptomatic healthcare workers** may work even if influenza vaccine & antivirals are unavailable

Scope: Meticulous attention to hand hygiene; avoid touching mucous membranes of the eye and mouth to prevent exposure to the influenza virus and other infective organisms.

UNFIT FOR WORK

Ideally, **staff with an influenza-like illness** should be considered “unfit for work” and should not work; nonetheless, due to limited resources, these healthcare workers may be asked to work if they are well enough to do so.

VACCINE INFORMATION

Adapted from US DHHS and US DHS *Guidance on Allocating and Targeting Pandemic Influenza Vaccine*, http://www.flu.gov/individualfamily/vaccination/allocationguidance.pdf; LA County EMS Agency H1N1 Interim Guidelines, October 01, 2009: http://ems.dhs.lacounty.gov/Home/SF-H1N1InterimGuidelines.pdf; CA Emergency Medical Services Authority *Pandemic Influenza Planning and Preparedness Framework For Local Emergency Medical Services Agencies*, October 8, 2009: www.emsa.ca.gov/about/files/PandemicFrameworkForEMSProviders.doc; and California Department of Public Health *All Facilities Letter: H1N1 Influenza Vaccination Requirements*, October 1, 2009

Effective allocation of pandemic influenza vaccine will play a critical role in preventing influenza and reducing its effects on health and society when a pandemic arrives. The specific type of influenza that causes a pandemic will not be known until it occurs. Developing a new vaccine in response will take several months and pandemic vaccine may not be available when cases first occur in the United States. Moreover, once vaccine production begins, it will not be possible to make enough new vaccine to protect everyone in the early stages of a pandemic.

Vaccination will be only one of several tools that can be used to fight the spread of influenza when a pandemic emerges. Additional approaches include non-pharmaceutical public health measures in communities, businesses, and households to reduce and slow the spread of infection; using antiviral medications for treatment and prevention; using facemasks and respirators in appropriate settings; and washing hands and covering coughs and sneezes. These strategies will be the initial mainstay of a pandemic response before vaccine is available and continue to have important effects throughout a pandemic. Guidance around vaccine use is meant to be applied in conjunction with and in the context of these other pandemic response efforts.

Vaccine program objectives are most important:

- Protecting those who are essential to the pandemic response and provide care for persons who are ill
- Protecting those who maintain essential community services
- Protecting children
- Protecting workers who are at greater risk of infection due to their job
- Protecting those who are essential to maintaining homeland and national security
- Protecting those most at risk for complications

SB 739: Hospital Infectious Disease Control Program

SB 739 (Speier, Chapter 526, Statutes of 2006) established the Hospital Infectious Disease Control Program, which intended to improve existing disease surveillance and infection prevention measures in all California general acute care hospitals (GACH), thereby preventing prolonged and unnecessary hospitalizations and decreasing mortality rates resulting from healthcare associated infections.

California Health and Safety Code (HSC) section 1288.7(a) provides that each GACH licensed pursuant to HSC Section 1250 must annually offer onsite influenza vaccinations, upon availability, to all hospital employees at no cost to the employee. This HSC section mandates that each GACH must require its employees to be vaccinated, or if the employee elects not to be vaccinated, to obtain a written declaration that the employee declined the vaccination. HSC section 1288.7(b) requires each GACH to institute respiratory hygiene and cough etiquette protocols, develop and implement procedures for the isolation of patients with influenza, and adopt a seasonal influenza plan.

HSC section 1288.7(a) applies to the newly developed Novel H1N1 vaccine. All hospitals must offer the Novel H1N1 vaccination to all healthcare personnel, upon availability, as required by law. The H1N1 vaccination is mandated to be offered in addition to the seasonal influenza vaccination.

It is expected that this policy will also be applied other novel viruses and vaccines that would be developed for these viruses.

HSC section 1288.8(b) requires each GACH to annually report to CDPH infection prevention process measures that have been recommended by the Centers for Disease Control and Prevention (CDC) Healthcare Infection Control Practices Advisory Committee, including but not limited to influenza vaccination measures of patients and healthcare personnel. The requirement for reporting influenza vaccination measures also applies to the Novel H1N1 vaccine.

ANTIVIRAL INFORMATION

Based on LA County EMS Agency H1N1 Interim Guidelines, October 01, 2009: http://ems.dhs.lacounty.gov/Home/SF-H1N1InterimGuidelines.pdf; CA Emergency Medical Services Authority Pandemic Influenza Planning and Preparedness Framework For Local Emergency Medical Services Agencies, October 8, 2009: www.emsa.ca.gov/about/files/PandemicFrameworkForEMS Providers.doc; and CDC Updated Interim Recommendations for the Use of Antiviral Medications in the Treatment and Prevention of Influenza for the 2009-2010 Season, Oct 16, 2009: http://www.flu.gov/individualfamily/prevention/medicine/antiviralsrecommend.html

Treatment

Most people with influenza will recover without complications. Some people are at higher risk of influenza-related complications and are prioritized for treatment with influenza antiviral drugs. In general, the CDC recommends antiviral treatment for:

- People with more severe illness requiring hospitalization
- People with suspected or confirmed influenza who are high risk for complications
- Children younger than 2 years of age
- Adults 65 years or older
- Pregnant women
- People with certain chronic medical or immunosuppressive conditions

Treatment recommendations may be revised by the CDC based upon the epidemiology of the pandemic virus.

Antiviral Therapy

Oseltamivir (TAMIFLU®) and zanamivir (RELENZA®) have been shown to be effective in treating the seasonal flu, H5N1, and the 2009 H1N1 flu. In addition, PERAMIVIR IV, was authorized under an Emergency Use Authorization (EUA) to treat certain patients with suspected or confirmed 2009 H1N1 influenza virus infection.

Chemoprophylaxis for Exposure

The CDC recommends post-exposure chemoprophylaxis for healthcare workers or public health workers who were not using appropriate personal protective equipment during close contact with an infectious patient, co-worker, or household contact. Most of these exposures can be prevented by using recommended infection control measures.

The CDC does include healthcare personnel who have occupational exposures as a group that can be considered for antiviral treatment following direct contact with a confirmed case and a breach in the use of PPE. However, they are recommending an emphasis on early treatment as an alternative to chemoprophylaxis. Anyone who thinks they were exposed should be counseled about the early signs and symptoms of influenza, and advised to immediately contact their healthcare provider for evaluation, if clinical signs or symptoms develop.

WORKFORCE SUPPORT: PSYCHOSOCIAL CONSIDERATIONS

Adapted from US DHHS *Pandemic Influenza Plan, Supplement 11 Workforce Support*: psychosocial considerations and information needs, excerpt – Impact of pandemic influenza on healthcare workers and checklist for workforce support services/resources: http://www.hhs.gov/pandemicflu/plan/sup11.html

Rationale

The response to an influenza pandemic will pose substantial physical, personal, social, and emotional challenges to healthcare providers, public health officials, and other emergency responders and essential service workers. Experience with disaster relief efforts suggests that enhanced workforce support activities can help responders remain effective during emergencies.

During an influenza pandemic, however, the occupational stresses experienced by healthcare providers and other responders are likely to differ from those faced by relief workers in the aftermath of a natural disaster. Globally and nationally, a pandemic might last for more than a year, while disease outbreaks in local communities may last 5 to 10 weeks. Medical, public health, and EMS responders and their families will be at personal risk for as long as the pandemic continues in their community. Special planning is therefore needed to ensure that hospitals, public health agencies, first-responder organizations, and employers of essential service workers are prepared to help employees maximize personal resilience and professional performance. An essential part of this planning effort involves the creation of alliances with community-based organizations and nongovernmental organizations with expertise in and resources for psychosocial support services or training.

Impact of Pandemic Influenza on Healthcare Workers

In addition to the issues faced by all response workers, healthcare workers may experience:

- Increased risk of exposure to pandemic influenza
- Constant need to take special precautions to avoid exposure to the pandemic virus
- Illness and death among patients, as well as among colleagues and family members
- Stigmatization and discrimination associated with being perceived as a source of contagion
- Ethical dilemmas, such as conflicts between one's roles as healthcare provider and parent/spouse, or concern about receiving vaccines or antiviral drugs before other people
- Increased difficulty in performing crucial tasks and functions as the number of severely ill patients increases, the healthcare staff decreases, and medical and infection control resources are depleted
- Frustration regarding the need/expectation to maintain business as usual
- Physical isolation associated with use of infection control measures that limit interpersonal contact

CHECKLIST FOR WORKFORCE SUPPORT SERVICES/RESOURCES

PREPARE			
Completed	**In Progress**	**Not Started**	**Actions**
			Include psychosocial issues in planning:
			▪ Incorporate psychosocial support services into emergency preparedness planning for an influenza pandemic.
			▪ Prepare for a significant surge of individuals who fear they may be infected, but aren't, who may present at emergency departments or other healthcare locations, or contact health information hotlines.
			▪ Develop a demographic picture of your staff (e.g., ethnic, racial, and religious groups; most vulnerable; special needs; language minorities) and plan for how they might be reached in a disaster.
			▪ Identify rest and recuperation sites for staff. These sites can be stocked with healthy snacks and relaxation materials (e.g., music, relaxation tapes, movies), as well as pamphlets or notices about workforce support services.
			▪ Develop confidential telephone support lines to be staffed by behavioral health professionals.
			▪ Use behavioral health expertise to train staff on the psychological impact of the use of personal protective equipment (PPE), and conduct other relevant activities.
			Identify and access existing resources:
			▪ Work with community-based organizations to determine the types of psychological and social support services and training courses available in your area.
			▪ Establish links with the public sector and private mental health resources, such as Red Cross.
			▪ Develop a plan to manage offers of assistance and invited/uninvited volunteers.
			Train behavioral health and related professionals in disaster response strategies:
			▪ Train behavioral health staff in techniques to help people cope with grief, stress, exhaustion, anger, and fear during an emergency.
			▪ Train nonbehavioral health professionals (e.g., primary care clinicians, safety and security personnel) in basic psychological support services.
			Develop resources and materials:
			▪ Prepare educational and training materials on psychosocial issues for distribution to workers during an influenza pandemic.

CHECKLIST FOR WORKFORCE SUPPORT SERVICES/RESOURCES

RESPONSE			
Completed	**In Progress**	**Not Started**	**Actions**
			During the first 4 weeks:
			▪ Meet basic needs such as food, shelter, and clothing.
			▪ Show support and appreciation for the work that staff is doing.
			▪ Provide basic psychological support (psychological first aid).
			▪ Provide outreach and information to staff.
			▪ Foster resilience, coping, and recovery.
			▪ Provide psychological and social support services for staff and their families.
			▪ Address stigmatization issues that might be associated with being a first receiver.
			▪ Address stigmatization issues that might be associated with participation in mental health support services.
			▪ Implement staff resilience programs.
			▪ Work with communications experts to shape messages that reduce the psychological impact of the pandemic.
			▪ Receive educational and training materials from Public Health.
			During subsequent weeks:
			▪ Continue to show support and appreciation for the work that staff is doing.
			▪ Provide continued outreach, triage, and services.
			▪ Monitor staff for signs of chronic or severe psychological distress.
			▪ Provide assistance in reintegration for staff who worked with the ill or were isolated from work and family.

MEDICARE FEE-FOR-SERVICE EMERGENCY AND DISASTER-RELATED POLICIES AND PROCEDURES THAT MAY BE IMPLEMENTED WITHOUT § 1135 WAIVERS, JANUARY 07, 2010

Excerpt. Full text available at: http://www.cms.hhs.gov/H1N1/Downloads/H1N1_Medicare_FFS_Emergency_QsAs.pdf

Urgent Preparedness Initiative: The H1N1 Influenza Pandemic – Vaccination and Related Issues
Note: Although the policies expressed are specific to an H1N1 influenza pandemic, many of the Medicare fee-for-service policies and procedures that apply to all emergencies or disasters may also apply to the H1N1 emergency.

Question: Will reimbursement for H1N1 vaccine administration be the same as for seasonal influenza?
Answer: Yes, the payment amount for the H1N1 vaccine's administration will be the same as the payment for administration of seasonal flu vaccine. Multiple payments for administration will be available if the H1N1 vaccine requires multiple doses.

Question: What are the rules for billing Medicare for the administration of the H1N1 vaccine?
Answer: In general, billing for the administration of the H1N1 vaccine will be similar to billing for the administration of the seasonal flu vaccine. See CMS' Medicare Claims Processing Manual (Publication 100-04), Chapter 18, Section 10, et seq. @ http://www.cms.hhs.gov/manuals/downloads/clm104c18.pdf. The major difference in billing for the administration of the H1N1 vaccine is that if the H1N1 vaccine is made available to providers free of charge, then Medicare will not pay for the H1N1 vaccine itself. Therefore, the HCPCS code for the vaccine need not be included on the bill/claim submitted for payment of the administration of the vaccine. The HCPCS code for the administration of the H1N1 vaccine is: G9141- Influenza A (H1N1) immunization administration (includes the physician counseling the patient/family)). Payment for G9141 will be made at the same payment rate established for G0008 (Administration of influenza virus vaccine) for each administration.
Although the HCPCS code for the H1N1 vaccine need not be appended to the bill/claim, if the provider elects to do so, the bill/claim will be accepted but the claim line for the vaccine will be denied. The HCPCS code for the H1N1 influenza vaccine is: G9142- Influenza A (H1N1) vaccine, any route of administration.

Question: States are distributing drugs from the Centers for Disease Control's (CDC) Strategic National Stockpile (SNS) to hospitals. We are looking for official guidance from a "billing" perspective to share with our members. How should hospitals handle billing for services that involve the use of SNS provided drugs?
Answer: For services rendered to Medicare fee-for-service (FFS) beneficiaries, standard Medicare FFS billing rules apply. This would include following existing policy on no cost items, such as SNS drugs, as noted in Q&A H1N1-1, above. Hospitals and other providers should work with their other payers to determine the acceptable way, if any, to bill those payers for services related to free drugs/tests.

Question: Will Medicare pay for diagnostic tests for H1N1 flu (e.g., nasal swabs) for beneficiaries?
Answer: Under Part B, Medicare will cover diagnostic tests as set forth in 42 CFR 410.32 and other existing policies. Note, however, that the Social Security Act excludes payment for any item or service that was provided free of charge or if neither the beneficiary nor any other person is obligated to pay for such item or service, or if another Federal entity is obligated – directly or indirectly – to pay for such item or service.

Question: Will Medicare cover and pay for a surgical mask to prevent the spread of/infection from H1N1 flu, if prescribed by a physician?
Answer: No. There is no Medicare benefit category that would allow for separate coverage of a surgical mask.

Question: Will Medicare pay for physician services and vaccine administration provided outside the normal setting (e.g., shelters)?
Answer: Yes. Physician services and flu vaccinations can be provided in a wide range of locations. Physicians must enroll with the Medicare carrier or Medicare Administrative Contractor that processes claims for the area where the service is performed and the appropriate place of service (POS) code must be indicated on the claim.

Question: Will Medicare pay for physician services and vaccine administration provided outside the normal setting (e.g., shelters)?
Answer: Yes. Physician services and flu vaccinations can be provided in a wide range of locations. Physicians must enroll with the Medicare carrier or Medicare Administrative Contractor that processes claims for the area where the service is performed and the appropriate place of service (POS) code must be indicated on the claim.

Question: The Centers for Disease Control and Prevention (CDC) is awarding funds to State or local government funded (or operated) public clinics and local public health departments for a mass vaccination campaign for the H1N1 influenza virus. In order to make the vaccine available to all, the CDC has instructed public health departments and local clinics to only bill patients who have the ability to pay for the administration of the vaccine. Can Medicare cover the administration of the H1N1vaccine given to Medicare beneficiaries, when non-Medicare patients who demonstrate no ability to pay receive the vaccine free of charge?
Answer: Yes. Although Medicare payment is generally prohibited when a service is paid for by another governmental entity (see section 1862(a)(3) of the Social Security Act), in light of the H1N1 influenza pandemic we have determined that these administration services meet one of the exceptions to the payment exclusion concerning governmental entities. Pursuant to title 42, Part 411, section 8(b)(4) of the Code of Federal Regulations (42 C.F.R. § 411.8(b)(4), Medicare payment may be made for “services furnished in a hospital or elsewhere, as a means of controlling infectious diseases or because the individual is medically indigent.”

All other Medicare rules will still apply to any claim submitted for vaccine administration.

Question: When is it appropriate to use the diagnosis code 488.1, Influenza due to identified novel H1N1 influenza virus?
Answer: Diagnosis code 488.1 should be used when a patient has already been diagnosed with the H1N1 influenza virus and is being treated for it. Providers and practitioners should continue to use diagnosis code V04.81, Influenza, when the H1N1 preventive vaccine is being administered.

Question: What are the adjustments that Medicare fee-for-service can make in the event of an emergency or disaster?
Answer: Broadly speaking, Medicare fee-for-service has three sets of potential temporary adjustments that can be made to address an emergency or disaster situation. These include:
1. applying flexibilities that are already available under normal business rules;
2. waiver or modification of policy or procedural norms by the Administrator of the Center for Medicare and Medicaid Services (CMS) under his or her authority; and
3. waiver or modification of certain Medicare requirements pursuant to waiver authority under § 1135 of the Social Security Act. This waiver authority can be invoked by the Secretary of the Department of Health and Human Services (DHHS) in certain circumstances.

Question: Regarding the use of the disaster-related condition code “DR”, should this code be used for all billing situations relating to a declared emergency/disaster (i.e., SNF, ESRD, or Hospitals)?
Answer: Yes, the “DR” condition code should be used by providers (but not by physicians and other suppliers) in all billing situations related to a declared emergency/disaster.

H1N1 VACCINE ADMINISTRATION BILLING Q & AS

October 20, 2009. Available at http://www.cdc.gov/h1n1flu/vaccination/statelocal/vaccing_billing_qa.htm.

Note: This is guidance is for the 2009 H1N1 Influenza Pandemic and is provided here for reference. Guidance in subsequent pandemics may be different. Ensure monitoring for latest guidance from the LAC EMS Agency, LAC DPH, and the CDC.

The purpose of this Q&A is to provide guidance about the circumstances under which providers may bill insurance or charge patients when federal funds for H1N1 vaccination are being used.

Receipt of federal Public Health Emergency Response (PHER) funding does not necessarily prevent a provider from billing insurance. The primary purpose of this guidance is to help ensure that duplicate payments are not made for the same service provided to the same patient. Federal funding recipients are subject to audit requirements to ensure that federal funds are spent consistent with applicable law.

NOTE: 2009 H1N1 influenza vaccine and ancillary supplies (syringes, needles, sharps containers, and alcohol swabs) have been purchased by the federal government and provided free of charge to all providers participating in this voluntary vaccination effort. Under the terms of the provider agreement, providers are not permitted to charge for the 2009 H1N1 vaccine itself.

This document does not provide legal advice. You should consult the primary public health counsel for your jurisdiction for any needed legal advice.

1: What is the definition of a "public health clinic"?
For the purpose of this document, a "public health clinic" is a clinic that is conducted by, or on behalf of, a state or local health jurisdiction and that receives Public Health Emergency Response (PHER) implementation funds to administer H1N1 influenza vaccine. This may include a commercial community vaccinator (CCV) or other private provider that has a service contract or similar agreement with the public health entity. Vaccine administration could occur in a variety of settings such as hospitals, provider offices, schools, clinics, and any other setting where vaccine can be appropriately given.

The provider agreement that each H1N1 vaccine provider must sign in order to receive an allocation of H1N1 vaccine does not constitute an agreement for the provider to administer H1N1 vaccine on behalf of the public health department. Providers must enter into separate agreements with state or local jurisdictions in order to provide vaccine on behalf of those jurisdictions. "Public health clinics" are only those clinics in which such agreements have been entered into and for which providers are paid, in whole or in part, with PHER funds.

2: May providers charge patients a co-pay or other out-of-pocket charge in public health clinics or mass vaccination sites/clinics conducted on behalf of a public health entity?
Public health clinics and mass vaccination sites/clinics conducted on behalf of a public health entity should not charge patients a co-pay or other out-of-pocket charge, even if the patient's health plan includes a co-pay for vaccine administration. Many public and private health plans will not require co-pays or other cost sharing for H1N1 vaccine administration.

3: May providers bill third party payers or insurers in public health clinics or mass vaccination sites/clinics conducted by, or on behalf of, a public health jurisdiction?
Providers may bill third party payers or insurers in public health clinics or mass vaccination sites/clinics conducted by, or on behalf of, a public health entity. Public health jurisdictions that do not currently have a billing system in place should not use PHER funds to develop billing systems.

4: May public health jurisdictions give PHER funds to private providers to offset the provider's vaccine administration costs for vaccination of uninsured or under-insured persons?

A public health jurisdiction may give PHER funds to private providers to offset the costs of vaccine administration to the uninsured or under-insured population, provided that the jurisdiction has auditing or other accountability systems in place to track the funds transmitted and ensure they are used appropriately. Jurisdictions that do not have such systems in place should not use PHER funds to develop them.

5: If a private provider is given PHER funds to offset the costs of vaccinating uninsured or under-insured patients, may that provider charge a vaccine administration fee to insured patients?
Yes. Providers may collect copayments and other charges from patients who are insured in order to cover the costs of vaccine administration, if such charges are permitted by the insurer. However, providers should not charge uninsured or under-insured patients a vaccine administration fee if the provider has been given PHER funds specifically for vaccination of uninsured or under-insured patients.

If the provider has been given PHER funds to conduct a clinic on behalf of a state or local public health entity, as described above, the provider is not allowed to collect copayments or any other out-of-pocket charges from any patients, whether or not they are insured.

6: If a provider receives PHER funds to conduct a public health clinic, may that provider charge any patients for administration of H1N1 vaccine at any time?
Providers should not charge any patient who visits a clinic conducted on behalf of public health that is paid for entirely, or in part, by PHER funds. If the PHER funds are only for one clinic on a single day, the provider may charge on any other day, or for patients that are not seen at the PHER-funded clinic. For example, if there is a clinic at the provider site that is paid for with PHER funds, but patients are also being seen one-on-one at that site, the provider may charge for the one-on-one visits as long as those visits are not being paid for with PHER monies, but may not charge anyone seen in the public health clinic.

7: If PHER funds are used to pay the salary of a health department employee, may that employee assist with vaccination clinics in which patients are charged for administration of vaccine?
Yes. Employees hired with PHER dollars may assist with H1N1 vaccination in any setting.

8: What terms and conditions are required in contracts between private providers and public health jurisdictions?
CDC has not established federal requirements or terms and conditions to include in contracts or other agreements between state and local health jurisdictions and providers. Terms of contracts for public health clinics are at the discretion of the state or local health jurisdiction and the contracting provider to negotiate. However, contracts between private providers and public health departments must be consistent with the terms of the H1N1 provider agreement.

9: If a provider receives PHER funds to conduct a public health clinic, can patients with insurance coverage for H1N1 vaccine administration be vaccinated at that clinic?
Yes. PHER funds are intended to cover administration costs of vaccination regardless of insurance status. Providers may bill third-party payers or insurance plans in clinics conducted on behalf of public health if desired. Providers who receive PHER funds and who also bill insurance should ensure that duplicate payments are not received for the same service provided to the same patient.

10: May providers bill private third-party payers or insurers for H1N1 vaccine administration if the level of reimbursement provided by the private insurer is greater than the regional Medicare vaccine administration rate?
Yes. The H1N1 provider agreement states that the provider "may charge a fee for the administration of the vaccine to the patient, their health insurance plan, or other third party payer. The administration fee cannot exceed the regional Medicare vaccine administration fee." This means that the provider may not request out-of-pocket payment from a patient that is greater than the amount that Medicare reimburses for influenza vaccine administration in that jurisdiction. "Charge" refers to collecting an out-of-pocket payment from the patient.

However, the provider agreement does not dictate the level of reimbursement for vaccine administration that is provided by an insurance plan or payer. Providers should bill payers and insurance plans at their regular agreed-upon rates, and may accept whatever level of reimbursement is provided by a plan or payer for H1N1 vaccine administration.

11. Are federally qualified health centers (FQHCs) or rural health clinics (RHCs) permitted to bill third party payers or insurers for administration of H1N1 vaccine?
Yes. FQHCs and RHCs should follow the same rules as other providers. If the FQHC or RHC has received PHER funds from a state or local health jurisdiction, that clinic may bill third-party payers or insurers for H1N1 vaccine administration, but may not collect copayments or out of pocket charges from patients, even on a sliding fee scale. If the FQHC or RHC has not received PHER funds to support H1N1 vaccine administration, it may bill or charge patients for vaccine administration costs (but not for the vaccine itself) as it usually does, when permitted by the insurer or third party payer. Like other public and private providers, FQHCs and RHCs providing H1N1 flu vaccine must abide by the terms of the H1N1 provider agreement.

12: May voluntary donations be collected from patients in public health clinics or mass vaccination sites/clinics conducted on behalf of a public health entity?
It is critical that perceived cost of vaccination not be a barrier to vaccination. Donations are acceptable only if it is clear that they are completely voluntary, and if they are collected after vaccination takes place. Public health clinics should ensure that any donations collected do not constitute duplicate payment for vaccines administered to patients in the clinics.

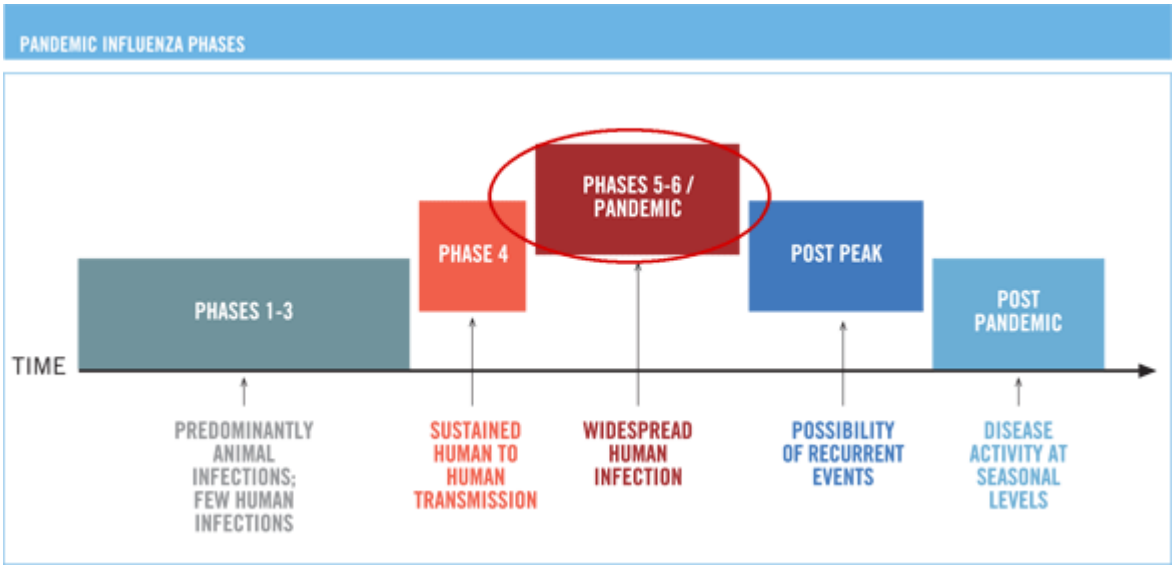
13: May providers bill health insurance plans that require a charge of $0.01 for the vaccine in order to process claims, even though it is not permissible to charge for H1N1 vaccine?
Yes. It is understood that billing software is complex and may require submission of a nominal fee for the vaccine in order to process claims. Providers may bill a charge of $.01 with the vaccine code. However, providers may not bill patients any fee for the vaccine, and should inform patients about the $.01 fee and that it may appear in their insurance statement.

WHO PANDEMIC INFLUENZA PHASES

Source: http://www.who.int/csr/disease/avian_influenza/phase/en/index.html

In the 2009 revision of the phase descriptions, the World Health Organization (WHO) has retained the use of a six-phased approach for easy incorporation of new recommendations and approaches into existing national preparedness and response plans. The grouping and description of pandemic phases have been revised to make them easier to understand, more precise, and based upon observable phenomena.

- Phases 1-3 correlate with preparedness, including capacity development and response planning activities.
- Phases 4-6 clearly signal the need for response and mitigation efforts.
- Periods after the first pandemic wave are elaborated to facilitate post pandemic recovery activities.



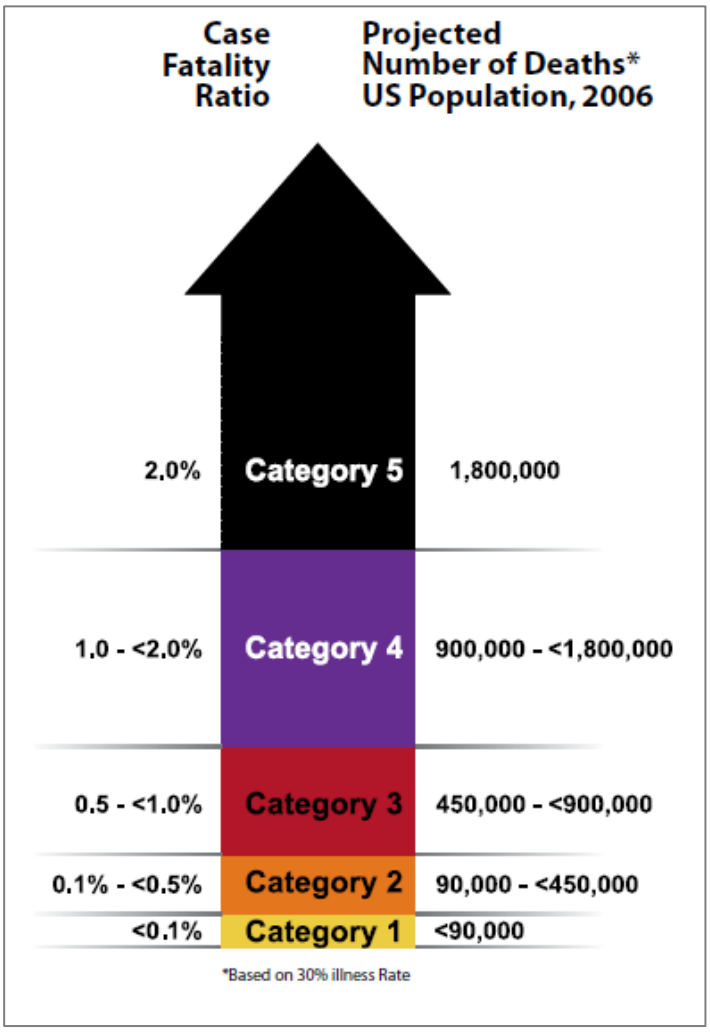
WHO PHASE	KEY INDICATOR	ACTIONS
PHASE 1	In nature, influenza viruses circulate continuously among animals, especially birds. Even though such viruses might theoretically develop into pandemic viruses, in Phase 1 **no viruses circulating among animals have been reported to cause infections in humans**.	Usual surveillance.
PHASE 2	An **animal influenza virus circulating among domesticated or wild animals is known to have caused infection in humans**, and is therefore considered a potential pandemic threat.	Heightened surveillance.

WHO PHASE	KEY INDICATOR	ACTIONS
PHASE 3	**An animal or human-animal influenza reassortant virus has caused sporadic cases or small clusters of disease in people, but has not resulted in human-to-human transmission sufficient to sustain community-level outbreaks**. Limited human-to-human transmission may occur under some circumstances, for example, when there is close contact between an infected person and an unprotected caregiver. However, limited transmission under such restricted circumstances does not indicate that the virus has gained the level of transmissibility among humans necessary to cause a pandemic.	Heightened surveillance for disease outbreaks and disease transmission pathways.
PHASE 4	**Verified human-to-human transmission of an animal or human-animal influenza reassortant virus able to cause "community-level outbreaks."** The ability to cause sustained disease outbreaks in a community marks a significant upwards shift in the risk for a pandemic. Phase 4 indicates a significant increase in risk of a pandemic but does not necessarily mean that a pandemic is a foregone conclusion.	Any country that suspects or has verified such an event should urgently consult with WHO so that the situation can be jointly assessed and a decision made by the affected country if implementation of a rapid pandemic containment operation is warranted.
PHASE 5	**Human-to-human spread of the virus into at least two countries in one WHO region.**	While most countries will not be affected at this stage, the declaration of Phase 5 is a strong signal that a pandemic is imminent and that the time to finalize the organization, communication, and implementation of the planned mitigation measures is short.
PHASE 6	The pandemic phase is characterized by **community level outbreaks in at least one other country in a different WHO region** in addition to the criteria defined in Phase 5. Designation of this phase will indicate that a global pandemic is under way.	Full implementation of pandemic influenza emergency operations plans. Surveillance may be curtailed due to the high number of cases.
POST PEAK	**Pandemic disease levels in most countries with adequate surveillance will have dropped below peak observed levels**. The post-peak period signifies that pandemic activity appears to be decreasing; however, it is uncertain if additional waves will occur and countries will need to be prepared for a second wave. Previous pandemics have been characterized by waves of activity spread over months.	Once the level of disease activity drops, a critical communications task will be to balance this information with the possibility of another wave. Pandemic waves can be separated by months and an immediate "at-ease" signal may be premature.
POST PANDEMIC	**Influenza disease activity will have returned to levels normally seen for seasonal influenza.** It is expected that the pandemic virus will behave as a seasonal influenza A virus.	Maintain surveillance Update pandemic preparedness and response plans accordingly. An intensive phase of recovery and evaluation may be required.

PANDEMIC SEVERITY INDEX

Source: US DHHS / CDC *Community Strategy for Pandemic Influenza Mitigation*, February 2007, http://www.pandemicflu.gov/professional/community/commitigation.html

In February 2007, the CDC released a community mitigation interim guidance to help local communities make appropriate decisions about what actions to take to help delay or mitigate the spread of a pandemic, and when to take those actions. These community mitigation actions would be especially critical in the first six months of a pandemic. The interim guidance introduced a Pandemic Severity Index (PSI), akin to the National Weather Service's hurricane intensity scale. Both scales move up from 1 to 5 as the severity of the situation increases.



Pandemic Severity Index, which uses case fatality ratio as the critical driver for categorizing the severity of a pandemic. **Note that the projected number of U.S. deaths refers to a pandemic in which no response measures are undertaken. Health impacts in the context of an effective response would be much less.**

The index is designed to enable estimation of the severity of a pandemic on a population level to allow better forecasting of the impact of a pandemic and to enable recommendations to be made on the use of mitigation interventions that are matched to the severity of future influenza pandemics.

The Pandemic Severity Index links information about the severity of disease spread (number of fatalities) to specific measures that could be implemented These measures range from encouraging individuals to stay home voluntarily when they become ill, to more stringent "social distancing" measures such as closing schools and canceling public gatherings. By quickly adding these multiple actions, communities could help balance the need to protect the public's health and the need to minimize a pandemic's social and economic disruptions.

Use of Nonpharmaceutical Interventions (NPI) by Severity Category

This interim guidance proposes a community mitigation strategy that matches recommendations on planning for use of selected NPIs to categories of severity of an influenza pandemic. These planning recommendations are made on the basis of an assessment of the possible benefit to be derived from implementation of these measures weighed against the cascading second- and third-order consequences that may arise from their use.

Cascading second- and third-order consequences are chains of effects that may arise because of the intervention and may require additional planning and intervention to mitigate. The term generally refers to foreseeable unintended consequences of intervention. For example, dismissal of students from school may lead to the second-order effect of workplace absenteeism for child minding. Subsequent workplace absenteeism and loss of household income could be especially problematic for individuals and families living at or near subsistence levels. Workplace absenteeism could also lead to disruption of the delivery of goods and services essential to the viability of the community.

For Category 4 or Category 5 pandemics, a planning recommendation is made for use of all listed NPIs. This approach to pre-pandemic planning will provide a baseline of readiness for community response. Recommendations for use of these measures for pandemics of lesser severity may include a subset of these same interventions and potentially for shorter durations, as in the case of social distancing measures for children.

	Pandemic Severity Index		
Interventions* by Setting	**1**	**2 and 3**	**4 and 5**
Home			
Voluntary isolation of ill at home (adults and children); combine with use of antiviral treatment as available and indicated	Recommend†§	Recommend†§	Recommend †§
Voluntary quarantine of household members in homes with ill persons¶ (adults and children); consider combining with antiviral prophylaxis if effective, feasible, and quantities sufficient	Generally not recommended	Consider **	Recommend **
School			
Child social distancing			
-dismissal of students from schools and school based activities, and closure of child care programs	Generally not recommended	Consider: ≤4 weeks††	Recommend: ≤12 weeks§§
-reduce out-of school social contacts and community mixing	Generally not recommended	Consider: ≤4 weeks ††	Recommend: ≤12 weeks§§
Workplace / Community			
Adult social distancing			
-decrease number of social contacts (e.g., encourage teleconferences, alternatives to face-to-face meetings)	Generally not recommended	Consider	Recommend
-increase distance between persons (e.g., reduce density in public transit, workplace)	Generally not recommended	Consider	Recommend
-modify, postpone, or cancel selected public gatherings to promote social distance (e.g., stadium events, theater performances)	Generally not recommended	Consider	Recommend
-modify work place schedules and practices (e.g., telework, staggered shifts)	Generally not recommended	Consider	Recommend

Table Legend

Generally Not Recommended = Unless there is a compelling rationale for specific populations or jurisdictions, measures are generally not recommended for entire populations as the consequences may outweigh the benefits.

Consider = Important to consider these alternatives as part of a prudent planning strategy, considering characteristics of the pandemic, such as age-specific illness rate, geographic distribution, and the magnitude of adverse consequences. These factors may vary globally, nationally, and locally.

Recommended = Generally recommended as an important component of the planning strategy.

*All these interventions should be used in combination with other infection control measures, including hand hygiene, cough etiquette, and personal protective equipment such as face masks.

†This intervention may be combined with the treatment of sick individuals using antiviral medications and with vaccine campaigns, if supplies are available.

§Many sick individuals who are not critically ill may be managed safely at home.

¶The contribution made by contact with asymptomatically infected individuals to disease transmission is unclear. Household members in homes with ill persons may be at increased risk of contracting pandemic disease from an ill household member. These household members may have asymptomatic illness and may be able to shed influenza virus that promotes community disease transmission. Therefore, household members of homes with sick individuals would be advised to stay home.

**To facilitate compliance and decrease risk of household transmission, this intervention may be combined with provision of antiviral medications to household contacts, depending on drug availability, feasibility of distribution, and effectiveness; policy recommendations for antiviral prophylaxis are addressed in a separate guidance document.

††Consider short-term implementation of this measure—that is, less than 4 weeks.

§§Plan for prolonged implementation of this measure—that is, 1 to 3 months; actual duration may vary depending on transmission in the community as the pandemic wave is expected to last 6-8 weeks.

PANDEMIC INFLUENZA PREPAREDNESS AND RESPONSE ACTIONS - ORGANIZATIONAL RESPONSIBILITIES

This table is adapted from:

- *National Strategic Plan for Emergency Department Management of Outbreaks of Novel H1N1 Influenza. American College of Emergency Physicians. June 2009.*
- *Hospital Pandemic Influenza Planning Checklist. US Centers for Disease Control and Prevention.*
- *Recommended Actions for Hospitals to Prepare for and Respond to Pandemic Influenza. Los Angeles County Department of Health Services Emergency Medical Services Agency. April 2010.*

	1. Pan Flu Planning Coordination	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	a) Designate a trained emergency manager the responsibility for coordinating pandemic influenza preparedness planning	X		X	X	X	X
	b) Designate a multidisciplinary planning committee	X		X	X	X	X
	c) Execute/implement ACEP Influenza Surge Preparedness Assessment or similar	X					
	d) Review CDC Hospital Pandemic Influenza Planning Checklist	X					
	e) Maintain awareness of status or threat of pan flu in US, state, and region as reported by CDC and state, keeping hospital in posture of preparedness prior to initiation of any emergency operations	X	X	X	X	X	X
	f) Continue to monitor the status of pan flu status throughout an outbreak and between waves	X	X	X	X	X	X
	g) Look for daily briefings from health authorities	X	X	X	X	X	X
	h) Plan for infrastructure disruptions						

	2. Pan Flu EOP or Annex	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	a) Review and update emergency operations/response, pandemic, surge capacity, and business continuity plans	X	X	X	X	X	X
	b) Establish authority to carry out responsibilities	X	X	X	X	X	X
	c) Identify the responsibilities of key personnel and departments related to executing the plan.	X	X	X	X	X	X

	2. Pan Flu EOP or Annex	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	d) Utilize Web resources to identify and disseminate model EOPs for Pan Flu	X	X	X	X	X	X
	e) Identify triggers for activation of the plan	X	X	X	X	X	X
	f) Assess your Pan Flu EOP using a table top exercise with medical staff, administrators and logistics experts present to ensure that the plan is workable and will maintain operations under anticipated circumstances.	X	X	X	X	X	
	g) Implement selected portions of the plan when cases are in the Region	X	X	X	X	X	
	h) Activate and implement entire plan when cases are local	X	X	X	X	X	
	i) Review lessons learned and identify what went well. Develop a Corrective Action Plan.	X	X	X	X	X	X
	j) Develop After Action Report for each pandemic wave and overall pandemic response.	X	X	X	X	X	X

	3. Education, Training and Exercise Program	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	a) Create and execute a training program based upon your emergency operations plan	X	X	X	X	X	
	b) Execute an exercise to test training and plan validity	X	X	X	X	X	
	c) Use results of the exercise to further improve the emergency operation plan, and then re-exercise	X	X	X	X	X	
	d) Educate staff on how they can stop the spread of germs	X	X	X	X	X	X
	e) Educate staff on current situation	X	X	X	X	X	X
	f) Continue to educate staff on current situation	X	X	X	X	X	X
	g) Conduct staff debriefings	X	X	X	X	X	X

	4. Interagency Coordination, Communication, and Public Information	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	a) Agree on modalities, nodes, thresholds and frequency for multi-directional information flow/ communication during emergency operations	X	X	X	X		
	b) Agree on and establish common language and formats for data sharing during emergency operations	X	X	X	X	X	
	c) Agree on types, degrees (and limitations) of participation in regionalized response to the public health emergency	X	X	X	X		
	d) Confirm that emergency management/public health authorities have coordinated with clinics, private medical practices, extended care facilities re: response plan		X	X	X		
	e) Ensure effective two-way communication among these agencies during an emergency.	X	X	X	X		
	f) Ensure that communications are networked, tested, organized under Incident Command hierarchy, and overseen by a designated regional authority	X	X	X	X		
	g) Confirm connectivity of key subject matter experts and authorities within hospital with their outside counterparts and reporting relationships in-house for common operating picture	X					
	h) Implement and maintain communications with community response partners	X	X	X	X	X	

	5. ICS/HICS and NIMS	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	a) Provide ICS/HICS and NIMS training for all staff appropriate to their assigned positions	X	X	X	X	X	

	5. ICS/HICS and NIMS	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	b) Ensure that those managing an incident have appropriate levels of NIMS certification: Incident management leadership - NIMS IS 700 Individuals responsible for the emergency plan - NIMS IS 800 Personnel who have a direct role in middle management and/or emergency response - IS 100.HC and 200.HC	X	X	X	X	X	
	c) Review HICS Incident Planning Guide: Biological Disease - Pandemic Influenza	X					
	d) Declare an emergency	X		X	X	X	X
	e) Review HICS Incident Response Guide: Biological Disease - Pandemic Influenza	X					
	f) Discuss a framework for how ethical decisions will be made in the event healthcare services must be prioritized and allocated.	X		X	X	X	

	6. Command Center	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	Review and customize command centers functions in ICS/HICS	X	X	X	X	X	
	Establish authority and criteria to activate the EOC/DOC/HCC	X	X	X	X	X	
	Consider activation of Command Center if cases in CA	Partial or Virtual	Partial or Virtual	Partial or Virtual	X		
	Consider full activation of Command center if cases in nearby counties	X	X	X	X		

	7. Infection Control	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	a) Review infection prevention and control guidance from WHO, CDC, OSHA, CDPH, and LACDPH	X	X	X	X	X	X
	b) Conduct surveillance for influenza	X		X	X	X	X
	c) Review the differences between seasonal and pan flu	X	X	X	X	X	X
	d) Post 'respiratory etiquette' posters and signs in work areas	X	X	X	X	X	X

	7. Infection Control	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	e) Provide boxes of facial tissues and trash receptacles	X	X	X	X	X	X
	f) Provide alcohol-based hand washing gel	X	X	X	X	X	X
	g) Consider placing masks on all patients with flu-like symptoms	X	X				
	h) Evaluate triage modules	X	X	X			
	i) Reinforce infection control practices	X	X	X	X	X	X
	j) Maintain high suspicion that patients presenting with an influenza-like illness could be infected with pandemic strain	X	X	X	X	X	X
	k) Report suspect or confirmed pan flu cases	Call LACDPH 888-397-3993	X	X	X	X	X
	l) Monitor for nosocomial transmission	X		X	X	X	
	m) Continue to monitor for nosocomial transmission						

	8. Configuration of ED waiting rooms for distancing	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	a) Configure waiting areas to separate patients with respiratory symptoms from other patients	X					
	b) Establish protocols for those accompanying patients in the waiting area	X					
	c) Develop protocols for visitors in treatment areas and inpatient areas -	X					
	d) Implement protocols for those accompanying patients in the waiting area	X					
	e) Implement protocols for those visiting patients with fever and respiratory symptoms	X					
	f) Implement segregated waiting areas for patients with influenza.	X					
	g) Maximize distance between individuals with respiratory symptoms, at least six feet	X					
	h) Adjust hospital admission procedures	X					

	9. Alternate locations and staffing for triage and medical screening exams	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	a) Select one or more alternate locations for triage and/ or medical screening exams during a pandemic event	X	X	X	X		
	b) Develop a staffing plan for the alternate location(s)	X	X	X	X		
	c) Develop criteria for initiation of use of the alternate location(s)	X	X	X			
	d) Ensure that any alternate site is designated by the hospital as the appropriate site for a medical screening exam	X		X			
	e) Establish local health department sponsorship and staffing plans for mass screening sites			X			
	f) Implement phone triage to discourage ED/outpatient visits	X		X			

	10. Inpatient Surge Capacity	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	a) Devise protocols for use of alternate care facilities to decompress inpatient units	X		X	X		
	b) Establish requirements and investigate process to revise patient staffing ratios	X		X	X		
	c) Identify surge space requirements and capacity	X					
	d) Establish policies and procedures for rapid decontamination of patient treatment areas	X					
	e) Adjust hospital admission procedures	X					
	f) Implement essential staffing and services only	X					

	11. Laboratory testing protocols	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	a) Disseminate guidance to practitioners based on CDC and state health department recommendations and put a system in place to update this information as new data become available	X	X	X	X	X	

	11. Laboratory testing protocols	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	b) Work with your clinical laboratory and public health officials to determine indications for and availability of flu test kits	X	X	X			

	12. PPE for Health Care Workers	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	a) Consult national guidance for recommended PPE use during an influenza pandemic	X	X	X	X		
	b) Estimate PPE needs for multiple waves of pandemic influenza (based upon CDC estimates of epidemic duration)	X	X	X	X	X	
	c) Stockpile appropriate quantities of PPE	X	X	X	X	X	
	d) Train/update medical personnel in use of PPE	X	X	X			
	e) Monitor PPE usage during Pan Flu response, and estimate needs	X	X	X	X	X	
	f) Conserve usage of supplies	X					
	g) Increase stockpiles for respiratory protection	X	X	X	X	X	
	h) Communicate PPE needs to the appropriate agency if unable to procure additional supplies from vendors during the pandemic	X	X	X	X		

	13. Supplies and Equipment	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	a) Assess supplies needed for universal precautions	X	X	X	X	X	
	b) Awareness of SNS surge supplies and capability to receive those supplies	X	X	X	X	X	
	c) Work with state and local public health to establish type and quantity of supplies and resources available to mitigate shortages during a pandemic, for example: Ventilators (including unique operational characteristics), Antivirals, PPE, Antibiotics for secondary infection, Vaccine, Rapid influenza test kits	X	X	X	X		

	13. Supplies and Equipment	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	d) Establish agreements with suppliers to ensure availability	X	X	X	X	X	
	e) Monitor the usage of supplies needed for universal precautions	X	X	X	X	X	
	f) Review MOUs/MOAs with supply vendors to see if they can be activated	X	X	X	X	X	
	g) Develop alternate staffing and training protocols for ventilator management	X					
	h) Conserve usage of supplies	X					
	i) Activate MOUs/MOAs with vendors	X	X	X	X	X	
	j) Request supplies from appropriate higher entity	Contact LACEMS MAC via ReddiNet	X	X	X	X	
	k) Conserve usage of supplies	X	X				
	l) Decontaminate equipment and facility using standard operating procedures	X	X				
	m) Assess supply usage, and replenish as necessary.	X	X	X	X	X	

	14. Surge Staffing Plan	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	a) Estimate expected increases in patients (including those concerned but not ill) during an outbreak, based on the hospital catchment area and public health estimates of transmission and virulence using models available to CDC	X	X	X			
	b) Identify and mitigate special requirements of support personnel (central supply, dietary, housekeeping, pharmacy, radiology, respiratory) to maintain workforce during an outbreak, with attention to transportation, child care, risk education, etc.	X					
	c) Estimate requirements for additional supplies, food, linen, medical gases, pharmaceuticals, etc. during a pandemic event	X					

	14. Surge Staffing Plan	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	d) Assess the requirements (type and quantity) of medical and non medical volunteers needed during a pan flu outbreak	X	X	X	X		
	e) Develop a process for rapid credentialing and just in time training for provider volunteers	X					
	f) Begin creating adjusted staffing patterns	X	X	X	X	X	
	g) Educate staff on staffing and procedure changes	X	X	X	X	X	
	h) Implement essential staffing and services only	X	X	X	X	X	X

	15. Employee Health	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	a) Develop protocol for staff screening including criteria for dismissal from work when symptomatic.	X	X	X	X	X	
	b) Consider furlough or reassignment of staff at high risk for influenza complications	X	X	X	X	X	
	c) Develop criteria and process for return to work	X	X	X	X	X	
	d) Implement a system for early detection and treatment of staff	X	X	X	X	X	
	e) Implement human resource management plans to respond to ill staff or staff who need to stay home	X	X	X	X	X	
	f) Limit the number of HCWs that have contact with persons with pan flu to the minimum needed	X	X	X			
	g) Monitor the health of staff	X	X	X	X	X	
	h) Reassess staffing and consider redistribution of resources	X	X	X	X	X	
	i) Continue to monitor the health of staff	X	X	X	X	X	

	16. Antiviral Prophylaxis and Vaccine	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	a) Perform resource requirement assessment based on the size of your staff and CDC recommendations	X	X	X	X	X	
	b) Develop a plan for prioritization and administration of antiviral prophylaxis and vaccine to your staff	X	X	X	X	X	
	c) Do a resource assessment of what is available in hospital pharmacy, local retail pharmacies and stockpiles.	X	X	X	X	X	
	d) Develop plans for addressing the gap between estimated requirement and what is expected to be available, including agreements with supply sources	X	X	X	X	X	
	e) Off-site vaccine administration: work with public health and emergency management to ensure adequate sites and staffing for vaccine administration to the public.			X	X		
	f) Follow Public Health guidelines for distribution of vaccine and/or antivirals, as available	X	X				

	17. Public Information	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	a) Design and implement special training for public affairs on pan flu	X		X		X	
	b) Discuss with hospital public affairs and public health authorities when and how to inform the public as to when and how to access information and care during an outbreak.	X	X	X			
	c) Establish protocols for the use of your local/regional/ state joint information center that utilizes coordinated health information dispensed by public health officials.			X	X		
	d) Ensure accurate and coordinated public information dissemination	X	X	X	X	X	
	e) Ensure that all personnel adhere to the information dissemination protocols	X	X	X	X	X	
	f) Develop protocols for call screening and management at public service answering points (PSAP)		X				

	17. Public Information	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	g) Work with local public health to establish a resource telephone center to dispense accurate and timely information regarding Pan Flu treatment, home care, criteria for emergency care.			X	X		
	h) Utilize existing resources such as poison centers or nurse help lines for this purpose	X	X	X			
	i) Ensure accurate and coordinated public information dissemination	X	X	X	X	X	X

	18. Security and Access Control	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	a) Develop plan and criteria for implementation for enhanced facility security and crowd management including facility lockdown	X					
	b) Develop plan and criteria for implementation of visitor limitation	X					
	c) Establish an memorandum of understanding (MOU) with law enforcement or other sources for increased security	X		X			
	d) Review plans to limit access control into and throughout the facility	X					
	e) Establish access control into and throughout the facility	X					

	19. Administrative and Legal Support	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	a) Review and incorporate, as appropriate, guidelines from the American Health Lawyers Association	X	X	X			
	b) Incorporate provisions of anticipated or actual federal declarations of public health emergency into regional and hospital emergency operations: e.g. possible time-limited waiver of EMTALA, emergency use authorizations (EUAs) for pharmaceuticals	X	X	X	X		

	19. Administrative and Legal Support	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	c) Establish protocols for rapid credentialing and pre-event credentialing of surge resource personnel	X	X	X	X		
	d) Incorporate provisions of anticipated or actual state declarations of public health emergency into regional and hospital emergency operations: e.g. possible suspension of destination and diversion policies for EMS providers	X		X			
	e) Establish legal protocols for human resources to manage attendance of designated mission-critical personnel	X	X	X	X		
	f) Work with labor and/or staff representatives to develop policies for maintaining staffing, morale, discipline, and safety during emergency operations	X	X	X	X	X	
	g) Discuss with legal and medical staff the implementation of scarce resources allocation" procedures	X	X	X			
	h) Establishment and maintenance of Finance/Administration branch of HICS with assigned functions according to standard protocols and hospital EOPs	X					
	i) Review legislative authorities of relevance for Pan Flu (e.g. HIPAA, EMTALA, Expanded Scope of Practice, Allocation of Scarce Resources, Medical Liability)	X	X		X		

	20. Maintaining EMS operations during pandemic outbreak	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	a) Review and incorporate, as appropriate, plans and protocols in NHTSA's guidelines for EMS in pandemic influenza (http://www.nhtsa.gov/people/injury/ems/PandemicInfluenza)		X		CA EMS Authority		
	b) Develop plan to provide for augmentation of staff during an influenza event using additional personnel (volunteer and paid)		X		CA EMS Authority		
	c) Develop plan for PPE (EMS personnel and patients) acquisition and training				CA EMS Authority		

	20. Maintaining EMS operations during pandemic outbreak	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	d) Following federal and state guidance, develop a plan for prioritization and administration of antiviral prophylaxis to EMS staff and their families		X	X	CA EMS Authority		
	e) Establish protocols for alternate patient transport and destinations for non-emergent patients		X	X	CA EMS Authority		
	f) Develop protocols for pre-transport patient screening		X		CA EMS Authority	X	
	g) Develop policies and procedures for rapid ambulance decontamination		X		CA EMS Authority	X	

	21. Mass Fatality Incident Management	Hospital	County EMS Agency	County Public Health	State Public Health	Federal Govt	WHO / Global Health
	a) Establish plans and protocols to augment community and hospital morgue capacity	X		County Coroner			
	b) Work with local emergency management and local mortuary services providers to expedite handling of decedents	X		County Coroner			
	c) Provide awareness and training for post mortem care and safe autopsy procedures for pan flu	X		X			
	d) Continue to assess the need to establish a surge morgue.	X		County Coroner			
	e) Implement Mass Fatality Incident Management Procedures.	X		County Coroner			