



NEWSLETTER

Working at the Crossroads: The Importance of Influenza Vaccine for Healthcare Providers

Vaccination is one of the most important public health tools available to reduce severity and spread of influenza infection. Healthcare providers (HCP) are at increased risk for contracting the infection and transmitting infection because of their multiple patient contacts.¹ As providers, we are particularly concerned about patients in high risk groups such as asthma since we know that the severity, hospitalization and complication rates in this group are higher than in the general population.

The CDC's Advisory Committee on Immunization Practices advises influenza immunization for all health care providers.¹ While it may be contraindicated for some (example, those with severe egg allergy), national immunization rates against seasonal influenza have stayed fairly steady in recent years, at about 42% in all healthcare professionals² (59% in nurses³), despite aggressive immunization campaigns and professional education programs. Low

immunization rates of healthcare providers can potentially increase the risk of influenza infection to susceptible individuals since up to 20% of unvaccinated patients will develop influenza⁴.

This year has raised additional concerns with the emergence of a 2009 H1N1 strain of influenza A which reached pandemic levels in the spring of 2009. Since the seasonal influenza vaccine is not expected to provide effective coverage against the H1N1 strain, a new vaccine has been developed which is expected to become available in mid-October of this year.

In the event that insufficient supply of vaccine will be available the CDC has established immunization priorities. Five initial groups have been specifically targeted for priority immunization of the H1N1 vaccine. They are: pregnant women, persons who live or provide care for infants less than 6 months of age, health care and emergency medical services personnel, children and young adults age 6

months–24 years and persons aged 25–64 years who have medical conditions that place them at higher risk for influenza related complications.⁵

Hospitals and other healthcare organizations, including The Joint Commission, are focusing on healthcare providers by mounting campaigns to improve their immunization rates against influenza. Supporting data for these initiatives⁶ includes the significant morbidity and healthcare costs associated with influenza and the effectiveness of the vaccine (70–90% in healthy adults¹). The seasonal influenza vaccine has been shown not only to decrease HCP absenteeism, but to reduce transmission to coworkers, patients and family members.

Help control the spread of influenza and model good healthcare choices for your colleagues and asthma patients. Stay informed and get vaccinated.

For further information about the

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2009 H1N1 Influenza Edition

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Working at the Crossroads: The Importance of Influenza Vaccine for Healthcare Providers

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H1N1 monovalent vaccine see
www.cdc.gov/mmwr.

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CDC Interim Recommendations for Facemask and Respirator Use to Reduce 2009 Influenza A (H1N1) Virus Transmission

Adapted from:

www.cdc.gov/h1n1flu/masks.htm

Information on the effectiveness of facemasks and respirators for decreasing the risk of influenza infection in community settings is extremely limited. Thus, it is difficult to assess their potential effectiveness in decreasing the risk of 2009 influenza A (H1N1) virus transmission in these settings. In the absence of clear scientific data, the **interim recommendations below** have been developed on the basis of public health judgment, the historical use of facemasks and respirators in other settings for preventing transmission of influenza and other respiratory viruses, and on current information on the spread and severity of the 2009 influenza A (H1N1) virus.

In areas with confirmed human cases of 2009 influenza A (H1N1) virus infection, the risk for infection can be reduced through a combination of actions. No single action will provide

complete protection, but an approach combining the following steps can help decrease the likelihood of transmission.

These recommended actions are:

- Wash hands frequently with soap and water or use [alcohol-based hand cleaner](#) when soap and water are not available.
- Cover your mouth and nose with a tissue when coughing or sneezing.
- Avoid touching your eyes, nose and mouth
- People who are sick with an influenza-like illness (ILI) (fever plus at least cough or sore throat and possibly other symptoms like runny nose, body aches, headaches, chills, fatigue, vomiting and diarrhea) should stay home and keep away from others as much as possible, including avoiding travel, for at least 24 hours after fever is gone except to get medical care or for other necessities. (Fever should be gone without the use of fever-reducing medicine).
- Avoid close contact (i.e. being within about 6 feet) with persons with ILI.

In addition, influenza antiviral

medications are an important tool for the treatment and prevention of influenza, including 2009 H1N1.

Recommendations for the uses of facemasks and/or respirators can be found at:

<http://www.cdc.gov/h1n1flu/masks.htm>

These recommendations differ based on whether the person exposed to 2009 H1N1 is in a group at increased risk for severe illness from influenza infection. More information on preventing influenza transmission in health care settings can be found in the [Interim Guidance for Infection Control for Care of Patients with Confirmed or Suspected Novel Influenza A \(H1N1\) Virus Infection in a Healthcare Setting](#).



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CDC Interim Recommendations for Facemask and Respirator Use

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In community and home settings, the use of facemasks and respirators generally are not recommended. However, for certain circumstances, a facemask or respirator may be considered, specifically for persons at increased risk of severe illness from influenza.

Use of N95 respirators or facemasks generally is not recommended for workers in non-healthcare occupational settings for general work activities. For specific work activities that involve contact with people who have ILI, such as escorting a person with ILI, interviewing a person with ILI, providing assistance to an individual with ILI, the following are recommended:

- workers should try to maintain a distance of 6 feet or more from the person with ILI;
- workers should keep their interactions with ill persons as brief as possible;
- the ill person should be asked to follow good cough etiquette and hand hygiene and to wear a facemask, if able, and one is available;
- workers at increased risk of severe illness from influenza infection should avoid people with ILI (possibly by temporary reassignment); and,
- where workers cannot avoid close contact with persons with ILI, some workers may choose to wear a facemask or N95 respirator on a voluntary basis.

In the occupational healthcare setting, respiratory protection is recommended. Because infection control precautions, including respiratory protection, are imperfect, workers who are at increased risk of severe illness from influenza, and who are caring for a patient with known, probable, or suspected 2009 H1N1 or ILI, may consider temporary reassignment to avoid exposure.

There are important differences between facemasks and respirators.

Facemasks do not seal tightly to the face and are used to block large droplets from coming into contact with the wearer's mouth or nose. Most respirators (e.g. N95) are designed to seal tightly to the wearer's face and filter out very small particles that can be breathed in by the user.

For both facemasks and respirators, however, limited data is available on their effectiveness in preventing transmission of H1N1 (or seasonal influenza) in various settings. However, the use of a facemask or respirator is likely to be of most benefit if used as early as possible when exposed to an ill person and when the facemask or respirator is used consistently.

Facemasks: Unless otherwise specified, the term "facemasks" refers to disposable facemasks cleared by the U.S. Food and Drug Administration (FDA) for use as medical devices. This includes facemasks labeled as surgical, dental, medical procedure, isolation, or laser masks. Such facemasks have several designs. One type is affixed to the head with two ties, conforms to the face with the aid of a flexible adjustment for the nose bridge, and may be flat/pleated or duck-billed in shape. Another type of facemask is pre-molded, adheres to the head with a single elastic band, and has a flexible adjustment for the nose bridge. A third type is flat/pleated and affixes to the head with ear loops.

Facemasks cleared by the FDA for use as medical devices have been determined to have specific levels of protection from penetration of blood and body fluids. Facemasks help stop droplets from being spread by the person wearing them. They also keep splashes or sprays from reaching the mouth and nose of the person wearing the facemask. They are not designed to protect against breathing in very small particle aerosols that may contain viruses. Facemasks should be used once and then thrown away in the trash.

Respirators: Unless otherwise

specified, "respirator" refers to an N95 or higher filtering face piece respirator certified by the CDC/National Institute for Occupational Safety and Health (NIOSH). A respirator is designed to protect the person wearing the respirator against breathing in very small particle aerosols that may contain viruses. A respirator that fits snugly on the face can filter out virus-containing small particle aerosols that can be generated by an infected person, but compared with a facemask it is harder to breathe through a respirator for long periods of time.

Respirators are not recommended for children or people who have facial hair. Where respirators are used in a non-occupational setting, fit testing, medical evaluation and training are recommended for optimal effectiveness. When respiratory protection is required in an occupational setting, respirators must be used in the context of a comprehensive respiratory protection program as required under OSHA's Respiratory Protection standard (29 CFR 1910.134). This includes fit testing, medical evaluation and training of the worker. When required in the occupational setting, tight-fitting respirators cannot be used by people with facial hair that interferes with the face seal.

Employers should continue to evaluate workplace hazards related to the 2009 H1N1 influenza A situation in accordance with CDC and OSHA guidance. Mandatory use of respiratory protection may be required when work activities in occupational settings confer risk that is task/function based, and risk analyses conducted by the employer could identify hazardous work activities.

For additional information on facemasks and respirators, please visit the [CDC/NIOSH website](#), the [Food and Drug Administration website](#), and the [Occupational Safety and Health Administration website](#).

H1N1 and Implications for Pregnant Women

Typically women who become pregnant during the influenza season are at high risk for dehydration and hyperthermia. This can lead to adverse peri-natal outcomes such as preterm labor, premature rupture of membranes or even delivery complications such as preterm birth. This year, due to the emergence and global spread of the new influenza A virus (subtype H1N1), there is an increased concern among health care providers for pregnant women and their unborn children. According to U.S. government researchers, pregnant women infected with the new H1N1 swine flu have a high risk of severe illness particularly if they develop pneumonia or require mechanical ventilation.

The Centers for Disease Control and Prevention (C.D.C.) guidelines recommend that any pregnant woman who is suspected to have the swine influenza A (H1N1) virus infection be tested. See the CDC guidelines for testing at <http://www.cdc.gov/h1n1flu/specimenscollection.htm>.

Typical symptoms reported among patients with H1N1 this past spring 2009 included fever (97%), cough (77%), vomiting (46%), and shortness of breath (43%). Diarrhea was present in only 3 patients (10%). It has been reported that during the first trimester, the influenza virus can double the risk for neural tube defects and may be associated with other birth defects and adverse outcomes. Maternal fever during labor has been shown to be a risk factor for adverse neonatal and developmental outcomes, including neonatal seizures, encephalopathy, cerebral palsy, and neonatal death. Therefore, and at the time of this writing, the CDC recommends that pregnant women who meet current case definitions for confirmed, probable or suspected H1N1 should receive empiric antiviral treatment. See the website for details at: <http://www.cdc.gov/h1n1flu/casedef.swineflu.htm>.

Also, pregnant women who are

close contacts of persons with *confirmed*, *probable*, or *suspected* cases of swine influenza A (H1N1) should receive chemoprophylaxis since maternal hyperthermia may lead to fetal distress.

Recommendations for treatment & prophylaxis of 2009 H1N1 during pregnancy may be updated during the influenza season. Providers considering the use of antiviral medications during pregnancy should refer to the CDC guidelines at <http://www.cdc.gov/h1n1flu/recommendations.htm>.

According to the CDC, even though the Advisory Committee on Immunization Practices (ACIP) and the American College of Obstetricians and Gynecologists recommend the flu vaccine for their patients, less than 14% of all pregnant women get a seasonal flu shot. Decisions will be made very soon about who should be the first to get the new H1N1 vaccine. Pregnant women will probably be among the high risk groups who are targeted to receive the vaccine.

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H1N1 and Asthma

Adapted from www.cdc.gov/flu/professionals/acip/recommendations.htm#increasedrisk

Anyone with asthma is at higher risk for flu-related complications, such as pneumonia.

Along with everyone else, if you have asthma you should:

- wash your hands often with soap and water, especially after coughing or sneezing,
- cover your nose and mouth with a tissue when coughing or sneezing, and throw the tissue away, or cough into your elbow or shoulder *not* your hands;
- avoid touching your eyes, nose or mouth (germs spread that way); and
- stay home when you are sick, except to get medical care.

If you have asthma, you should have and use an updated, written [Asthma Action Plan](#), developed with your doctor for daily treatment and for control of asthma symptoms.

If your child has asthma, make sure that his or her updated, written [Asthma Action Plan](#) is on file at his or her school or daycare center and that the plan and medication(s) are easy to get to when needed.

Everyone with asthma older than 6 months should get a shot for seasonal flu every year. Children aged 6 months to 8 years who have never had a seasonal flu shot need two doses of the seasonal flu shot. Children who have had a seasonal flu shot in the past need

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only one seasonal flu shot. If you have asthma you *should not* use the intranasal “FluMist” vaccine. Everyone with asthma, aged 6 months to 64 years, should get the H1N1 flu shot when it becomes available. The H1N1 flu shot is not the same as the shot for seasonal flu. If the vaccine is in short supply, some people may not be able to get the shot right away.

Antiviral drugs are prescription medicines that decrease the ability of flu viruses to reproduce. They can reduce the severity of flu symptoms and shorten the time you are sick by 1 or 2 days. They may also prevent serious flu complications. The antiviral drug Relenza® (zanamivir) inhalation powder *is not recommended* for treatment or prophylaxis of influenza in individuals with underlying airways disease (such as asthma or chronic obstructive pulmonary disease). The antiviral drug Tamiflu® (oseltamivir) *is recommended* for treatment of 2009 H1N1 virus infection, and can be used by people with asthma. Because treatment must start within two days of when you get sick for it to work best, people with asthma should make a plan with their healthcare professional for what they should do if they develop [influenza-like illness](#). To learn more and for updates to these recommendations, visit <http://www.cdc.gov/flu/> on the web or contact CDC at 1-800-CDC-INFO.

Highlights of the 2009 H1N1 Influenza Vaccine

There are two types of influenza viruses: A and B, known to cause seasonal illnesses and epidemic infections. Influenza A viruses are subdivided into subtypes based on the two surface proteins. The current subtypes of influenza A viruses circulating are A (H1N1) and A (H3N2).

Influenza A viruses are known for multiple antigenic changes. Small mutations happen continually over time. This process is called “antigenic drift” and is responsible for the formation of new viral strains which are not recognized by the body’s immune system, explaining why reinfection can occur annually. The other type of change that influenza viruses encounter is called “antigenic shift” and results in new surface proteins. Shift results in a new influenza A subtype, and are responsible for cyclic pandemic outbreaks.

Influenza vaccine contains three influenza viruses: influenza A (H3N2) virus, influenza A (H1N1) virus, and influenza B virus. The viruses in the vaccine change each year based on international surveillance and estimates of which types and strains of viruses will circulate in a given year.

In April 2009, toward the end of the traditional influenza season, an increased number of patients presented with flu-like symptoms due to a new influenza A virus. This new virus, named 2009 influenza H1N1 appears to be the result of an antigenic shift hosted by a pig that was probably co-

infected with influenza viruses from different species. The new virus was determined that emerged from a genetic reassortment between swine, human, and avian influenza A viruses.¹ The infection was reported worldwide by June 2009. The 2009 H1N1 virus continued to cause illnesses, hospitalizations and deaths during the normally flu-free summer months, with cases concentrated among children, young adults and pregnant women,² indicating that the upcoming flu season will be more challenging.

The seasonal flu vaccine is unlikely to provide protection against 2009 H1N1 influenza.² As the vaccination against seasonal influenza remains the most important way to prevent the infection, a vaccine against 2009 H1N1 influenza virus may bring the same benefit.

The 2009 influenza H1N1 vaccine is under production and will be available in mid-October. As with seasonal influenza vaccine, an inactivated 2009 H1N1 vaccine and a live attenuated vaccine will be available. The 2009 H1N1 vaccine is not intended to replace the seasonal flu vaccine, but to be used alongside the seasonal flu vaccine, and is recommended for people at risk for influenza-related complications, particularly children and young adults 6 months to 24 years of age. Many of the 2009 H1N1 influenza cases were reported in this age group and they are more likely to live and study in close proximity to one another. It is also recommended for pregnant women,

persons who live with or provide care for infants aged <6 months, healthcare personnel, and persons aged 25-64 years who have medical conditions that put them at higher risk for influenza-related complications.³

Recent preliminary data from a randomized, observer-blind, parallel-group trial evaluated the immunogenicity of monovalent, unadjuvanted, inactivated 2009 H1N1 virus vaccine, and showed that a single 15-µg dose was immunogenic in adults, with mild-to-moderate vaccine-associated reactions.⁴ Other studies assessing the immunogenicity of other inactivated vaccines, in various age groups and of live-attenuated vaccine are ongoing.

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2009 H1N1 Influenza (Swine Flu) and You

Adapted from:

www.cdc.gov/H1N1flu/qa.htm

What is 2009 H1N1 (swine flu)? 2009 H1N1 (referred to as “swine flu” early on) is a new influenza virus causing illness in people. This new virus was first detected in people in the United States in April 2009. This virus is spreading from person-to-person worldwide, probably in much the same way that regular seasonal influenza viruses spread. On June 11, 2009, the [World Health Organization](http://www.who.int) (WHO) signaled that a pandemic of 2009 H1N1 flu was underway.

Why is 2009 H1N1 virus sometimes called “swine flu”?

This virus was originally referred to as “swine flu” because laboratory testing showed that many of the genes in this new virus were very similar to influenza viruses that normally occur in pigs (swine) in North America. But further study has shown that this new virus is very different from what normally circulates in North American pigs. It has two genes from flu viruses that normally circulate in pigs in Europe and Asia and bird (avian) genes and human genes. Scientists call this a “quadruple reassortant” virus.

Are there human infections with 2009 H1N1 virus in the U.S.?

Yes. Human infections with the new H1N1 virus are ongoing in the United States. Most people who have become ill with this new virus have recovered without requiring medical treatment.

CDC routinely works with states to collect, compile and analyze information about influenza, and has done the same for the new H1N1 virus since the beginning of the outbreak. This information is presented in a weekly report, called [FluView](#).

Is 2009 H1N1 virus contagious?

CDC has determined that 2009 H1N1 virus is contagious and is spreading from human to human.

How does 2009 H1N1 virus spread?

Spread of 2009 H1N1 virus is thought to occur in the same way that seasonal flu spreads. Flu viruses are

spread mainly from person to person through coughing or sneezing by people with influenza. Sometimes people may become infected by touching something – such as a surface or object – with flu viruses on it and then touching their mouth or nose.

What are the signs and symptoms of this virus in people?

The symptoms of 2009 H1N1 flu virus in people include fever, cough, sore throat, runny or stuffy nose, body aches, headache, chills and fatigue. A significant number of people who have been infected with this virus also have reported diarrhea and vomiting. Severe illnesses and death has occurred as a result of illness associated with this virus.

How severe is illness associated with 2009 H1N1 flu virus?

Illness with the new H1N1 virus has ranged from mild to severe. While most people who have been sick have recovered without needing medical treatment, hospitalizations and deaths from infection with this virus have occurred. In seasonal flu, certain people are at “high risk” of serious complications. This includes people 65 years and older, children younger than five years old, pregnant women, and people of any age with certain chronic medical conditions. About 70 percent of people who have been hospitalized with this 2009 H1N1 virus have had one or more medical conditions previously recognized as placing people at “high risk” of serious seasonal flu-related complications. This includes pregnancy, diabetes, heart disease, asthma and kidney disease.

One thing that appears to be different from seasonal influenza is that adults older than 64 years do not yet appear to be at increased risk of 2009 H1N1-related complications thus far. CDC laboratory studies have shown that no children and very few adults younger than 60 years old have existing antibody to 2009 H1N1 flu virus; however, about one-third of adults older than 60 may have antibodies against this virus. It is unknown how much, if any, protection may be

afforded against 2009 H1N1 flu by any existing antibody.

How does 2009 H1N1 flu compare to seasonal flu in terms of its severity and infection rates?

With seasonal flu, we know that seasons vary in terms of timing, duration and severity. Seasonal influenza can cause mild to severe illness, and at times can lead to death. Each year, in the United States, on average 36,000 people die from flu-related complications and more than 200,000 people are hospitalized from flu-related causes. Of those hospitalized, 20,000 are children younger than 5 years old. Over 90% of deaths and about 60 percent of hospitalization occur in people older than 65.

When the 2009 H1N1 outbreak was first detected in mid-April 2009, CDC began working with states to collect, compile and analyze information regarding the 2009 H1N1 flu outbreak, including the numbers of confirmed and probable cases and the ages of these people. The information analyzed by CDC supports the conclusion that 2009 H1N1 flu has caused greater disease burden in people younger than 25 years of age than older people. At this time, there are few cases and few deaths reported in people older than 64 years old, which is unusual when compared with seasonal flu. However, pregnancy and other previously recognized high risk medical conditions from seasonal influenza appear to be associated with increased risk of complications from this 2009 H1N1. These underlying conditions include asthma, diabetes, suppressed immune systems, heart disease and pregnancy.

How long can an infected person spread this virus to others?

People infected with seasonal and 2009 H1N1 flu shed virus and may be able to infect others from 1 day before getting sick to 5 to 7 days after. This can be longer in some people, especially children and people with weakened immune systems.

Rapid Testing for 2009 H1N1 Influenza

Rapid detection of influenza infection is a key factor in both individual and public health decision making. Prophylaxis of known exposures and antiviral therapy in high risk, affected individuals should be initiated within 48 hours of symptoms or infection.

Several assays have been developed for diagnosing influenza. The rapid influenza diagnostic tests (RIDT) are antigen detection tests which provide results within 30 minutes. They were originally intended to be used for the detection of seasonal influenza.

Recent studies have suggested a difference in performance of rapid influenza kits in the face of the new H1N1 strain.^{1,2,3}

Sensitivity and specificity are statistical terms measuring the performance of a test when compared to the gold standard (Viral culture or RT-PCR). A sensitivity of 100% in this case means recognition of all influenza infected people (that is, it identifies

true positive results). On the other hand specificity of 100% recognizes all healthy subjects (true negatives). Therefore, a good screening test should have a high sensitivity and a good diagnostic test should have an outstanding specificity. Another statistical tool used to evaluate a test is the positive and negative predictive value (PPV and NPV, respectively). These may be very different for the same test considering the prevalence of the disease in the population.

Reports from the Centers for Disease Control (CDC) evaluating all brands of rapid testing showed a sensitivity of 50-70% and a specificity of 90-95%.⁴

The algorithm published by the CDC addresses the low sensitivity found in this assay and recommends consideration of further testing (direct fluorescent antibody or viral culture) on individual basis. It also recommends consideration of initiation of treatment or prophylaxis if clinically indicated even in the negative results.⁴

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Ten Steps You Can Take: Actions for 2009 H1N1 Influenza Planning and Response for Medical Offices and Outpatient Facilities

Adapted from:

www.cdc.gov/H1N1flu/10steps.htm

It is critical to assure that medical offices and other outpatient facilities (e.g., outpatient/ambulatory clinics, outpatient surgery centers, urgent care centers, physical therapy/rehabilitation offices or clinics) that provide routine, episodic, and/or chronic healthcare services can manage an increased demand for services in the midst of a 2009 H1N1 influenza outbreak. Ensuring a sustainable community healthcare response will be important for a likely recurrence of 2009 H1N1 flu in the fall. See [CDC's H1N1 website](http://www.cdc.gov/h1n1flu/) for up-to-date information.

1. Develop a Business Continuity Plan – 2009 H1N1 flu outbreaks will impact

your organization, employees, suppliers of critical materiel, and your family. Identify your office/clinic's essential functions and the individuals who perform them. Make sure you have trained enough people to properly work in these essential functions and allow for potential absenteeism. Develop a plan that will sustain your core business activities for several weeks. Make sure you have alternate plans for critical supplies in case there is disruption in your supply chains. For information about planning see: <http://www.ready.gov/business/plan/index.html>.

2. Inform employees about your plan for coping with additional surge during pandemic – provide clear and frequent communication to ensure that

your staff are aware and understand the plan. Explain any policies and procedures that will be used to protect staff and your patients, and to manage a surge of patients. Improve the resiliency of your staff by advising that employees have a pandemic family plan or personal plans.

3. Plan to operate your facility if there is significant staff absenteeism – Are you ready for 20 to 40% of your employees not being able to come to work? Cross training your staff is key to resilience here. What else can be done to assure continuity of operations with reduced staff?

4. Protect your workplace by asking sick employees to stay home – be sure to ask sick staff to stay home. All

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NEWSLETTER

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The mission of the National Asthma Educator Certification Board is to promote optimal asthma management and quality of life among individuals with asthma, their families and communities, by advancing excellence in asthma education through the certified asthma educator (AEC®) process.



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personnel should self monitor daily for signs and symptoms of febrile respiratory illness. Staff who develop these symptoms should be instructed not to report to work, or if at work, should cease patient care activities and notify their supervisor. Be sure to align your sick leave policies so ill staff can stay home. See [What to Do If You Get Flu-Like Symptoms](#) for more information.

5. Plan for a surge of patients and increased demands for your services – Consider using your telephone system to deliver messages to incoming callers about when to seek medical care at your facility, when to seek emergency care, and where to go for information about caring for a person with flu at home (see [Interim Guidance for H1N1 Flu \(Swine Flu\): Taking Care of a Sick Person in Your Home](#)). Consider extending your hours of operation to include telephone triage of patients during a community outbreak.

6. Care for patients with 2009 H1N1 flu in your facility – make plans to screen patients for signs and symptoms of febrile respiratory illness at entry to the facility. If feasible, use separate waiting and exam rooms for possible 2009 H1N1 flu patients; plan to offer surgical masks to symptomatic patients who are able to wear them (adult and pediatric sizes should be available), provide facial tissues, receptacles for their disposal, and provide hand hygiene products in waiting areas and examination rooms. For information on caring for patients see: [Interim Guidance for Clinicians on Identifying](#)

[and Caring for Patients with Swine-origin Influenza A \(H1N1\) Virus Infection](#).

7. Take steps to protect the health of your workforce during an outbreak of H1N1 – all healthcare personnel who come in close contact with patients who may have 2009 H1N1 flu should take precautions to include use of respiratory and eye protection for all patient care activities (see: [Healthcare Workplaces Classified as Very High or High Exposure Risk for Pandemic Influenza](#)).

8. Provide immunization against seasonal flu at no cost to your staff – In the fall there may be several influenza strains circulating at the same time. Although seasonal flu immunization will not provide protection to 2009 H1N1 influenza, annual influenza vaccination is recommended for health care professionals and will likely protect against seasonal influenza strains. See: [Influenza Vaccination of Health-Care Personnel](#).

9. Make sure you know about the pandemic planning and response activities of the hospitals, outpatient facilities and local public health in your community – actively seek information from and coordinate with key medical, clinical facilities and public health departments in your community to learn about how they will manage patients during a pandemic. Medical offices, emergency rooms, urgent care centers and hospitals in communities with

outbreaks will likely have difficulty managing a large influx of patients; a coordinated community response is important to manage surge and assure optimal patient care. Develop a plan to manage your patients who do not need to seek emergency services.

10. Plan now so you will know where to turn to for reliable, up-to-date information in your local community – staff in healthcare settings should monitor the [CDC H1N1 Flu](#) website and local and State health department websites for the latest information. See these websites for contact information for [local health departments](#) and [state health departments](#).

Be prepared for a range of situations. The true impact of 2009 H1N1 flu outbreaks in the coming months will not be known until it happens. Be prepared for a possibility that your facility will have significant increased demand for services and the possibility that the fall outbreak may have greater impact than the outbreak in the spring, 2009.

For more information see the [Medical Offices and Clinics Pandemic Influenza Planning Checklist](#). Also sign up to receive regular updates about 2009 H1N1 influenza, emerging infectious diseases, and other emergency preparedness and response information by going to www.emergency.cdc.gov/clinregistry.

