

## 4. Distributing the Vaccine and Related Supplies

The adjuvant and antigen for the GSK H1N1 influenza vaccine come in separate vials that must be mixed just prior to administration. **Therefore, make sure to distribute:**

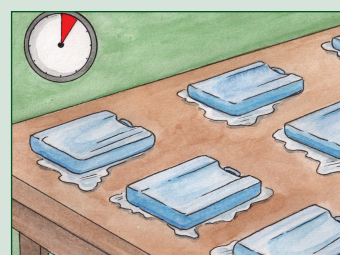
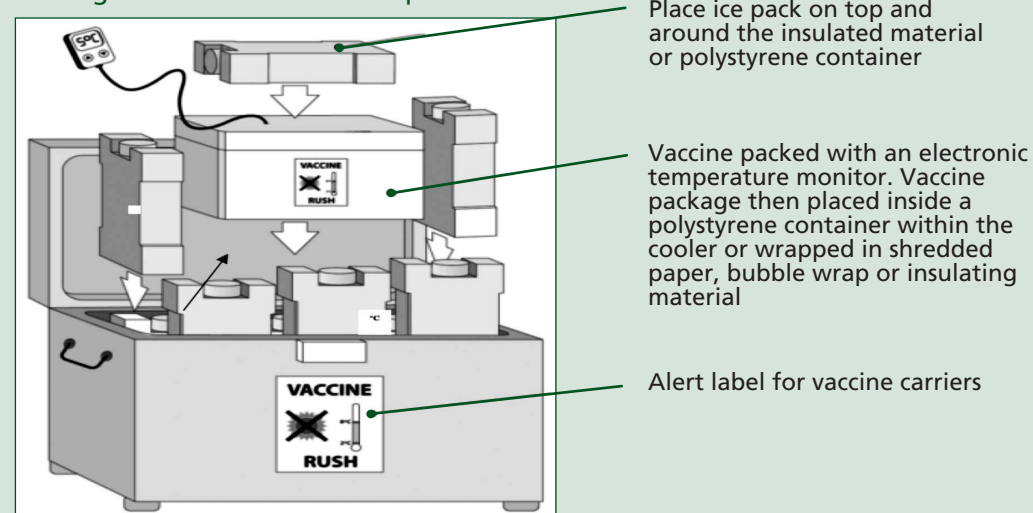
- The same numbers of adjuvant and antigen vials from the same manufacturer.
- The same number of mixing syringes as vials of vaccine.
- One (1) safety box per 100 syringes.
- The same number of injection syringes as the number of doses provided.

**For example**, for each 2,500 doses of vaccines (5 boxes, each containing 1 inner antigen box with 50 vials and 2 inner adjuvant boxes with 25 vials), distribute the following number of supplies:

- 2,500 AD syringes 0.5 ml (25 boxes of 100);
- 250 mixing syringes 5 ml (2.5 boxes); and
- 28 safety boxes (1 carton of 25 plus 3 safety boxes).

**For transportation of vaccines**, it is preferable to use cold boxes. If cold boxes are not available, polystyrene boxes from manufacturers can be used.

### Packing vaccine cooler for transport



Ensure that there are enough frozen ice packs available 24 hours prior to vaccine shipment. For example:

- A large cold box requires 30 ice packs; it can contain 3500 doses, weighs 35 kg and occupies 0.172 m<sup>3</sup>
- A small cold box requires 20 ice packs; it can contain 1200 doses, weighs 22 kg and occupies 0.102 m<sup>3</sup>

To avoid freezing the vaccine, spread the frozen ice packs on a table in a single layer and thaw them for at least 1 hour before packing them with the vaccines. Shake the ice pack and hear the ice moving before you use the ice pack. You can also use chilled water to keep the vaccines cool.

**Do not** put the H1N1 influenza vaccine in direct contact with the frozen ice packs to avoid freezing the vaccine

**Provided that all stability/sterility conditions are met, GSK vaccines may be used for 24 hours after the antigen and adjuvant are mixed, after which it must be discarded.**

## 5. Managing Vaccine and Related Waste

Follow the routine waste management procedures for the facility.

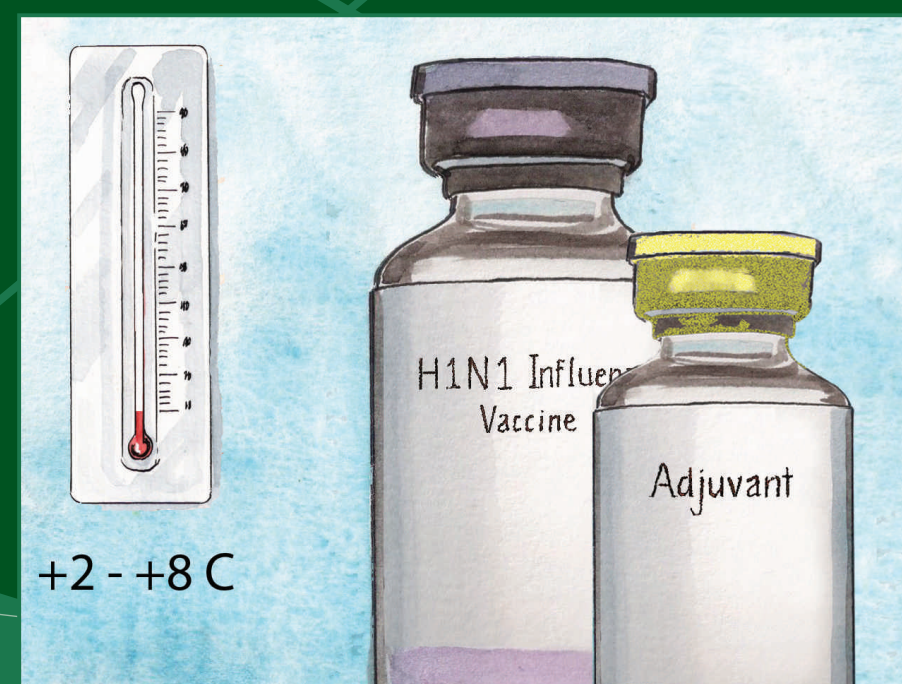
During the immunization session:

- Discard used syringes directly into the safety box immediately after use, without recapping the needle.
- Incinerate, burn, and/or bury the filled safety boxes according to country policy.

Do not overfill safety boxes

Store full safety boxes in a secure area, away from patients or the community

# Guidelines for the Storage and Distribution of the H1N1 Influenza Vaccine manufactured by GlaxoSmithKline (GSK)



# Receiving the Vaccine and Related Supplies

## A. Is there sufficient storage capacity for the GSK H1N1 influenza vaccine?

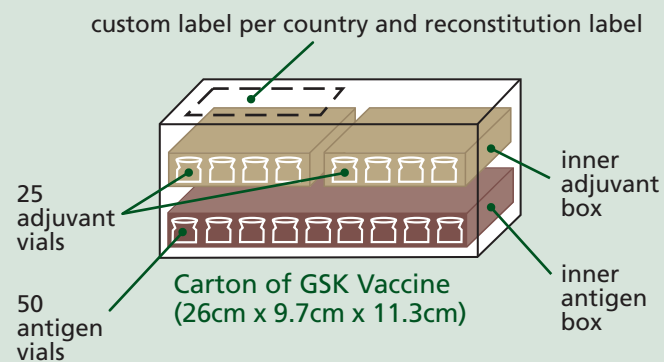
Before receiving the H1N1 influenza vaccines, make sure there is sufficient storage space to accommodate them in cold storage. Are there other vaccines already being stored? Are other vaccines expected to be delivered in the next few weeks?

To calculate the amount of free space you have and will need, generally for 2,500 doses (15 liters) of H1N1 influenza vaccine manufactured by GSK (or 5 boxes, each containing 1 inner antigen box with 50 vials and 2 inner adjuvant boxes with 25 vials), the amount of free space required in cold storage is as follows:

**In cold rooms:** 15 x 3 = 45 liters  
**In chest refrigerators:** 15 x 2 = 30 liters  
**In vertical refrigerators:** 15 x 1.4 = 21 liters

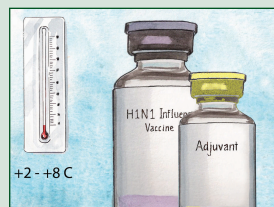


1 box with 50 vials antigen      2 adjuvant boxes with 25 vials each



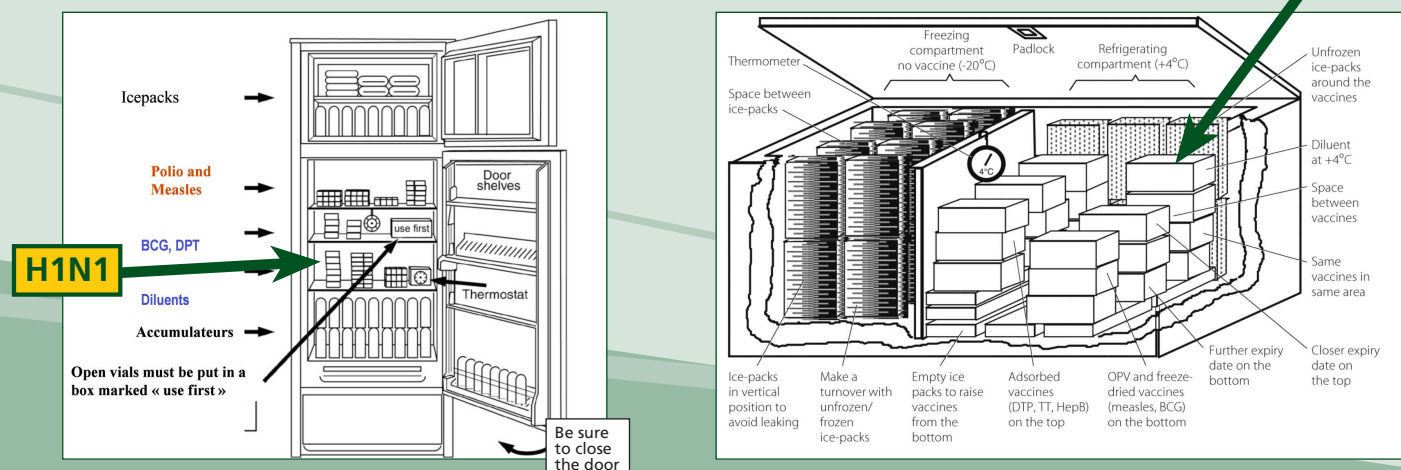
## B. How to store GSK H1N1 vaccine

### 1. Storing the Vaccine



GSK H1N1 influenza vaccine (liquid antigen + liquid adjuvant) must be stored between 2°C and 8°C. **It can never be frozen.** Since the vaccine comes without a Vaccine Vial Monitor (VVM), extra caution must be taken to maintain the proper temperature range during storage and transport to minimize vaccine loss.

To ensure the vaccine does not freeze, but is stored at the proper temperature, store the vaccine in the center shelves of the refrigerator as illustrated below.



Because the vaccine must stay cold and refrigerated, make sure there is a back-up generator or contingency plan if the refrigeration equipment fails, such as during a power outage.

In such circumstances, keep the door of the equipment closed. If power does not return during the holdover time defined by the equipment manufacturer, transfer the vaccines and adjuvant to cold boxes with ice packs.

### If the refrigeration equipment is not working for over 24 hours:

- Move the vaccines and adjuvants to another public or private service cold storage.
- Store ice from a commercial ice maker inside the cold room or freezer room in plastic or metal containers.

## 2. Storing the Related Supplies:

The additional vaccine supplies needed for safe administration of GSK H1N1 vaccine are: auto-disable (AD) syringes for injection, syringes for dilution (mixing of adjuvant and antigen), and safety boxes.

### 1 0.5 ml AD syringes for injection

Units per carton: 2,400 syringes (24 boxes of 100/carton)  
 Carton cubic volume: 0.1029 m<sup>3</sup>  
 Carton weight: 11.49 kg

### 2 5 ml syringes for dilution (mixing of adjuvant and antigen)

Units per carton: 1,800 syringes (18 boxes of 100/carton)  
 Carton cubic volume: 0.1031 m<sup>3</sup>  
 Carton weight: 12.72 kg

### 3 Safety Boxes

Units per carton: 25 safety boxes/carton  
 Carton cubic volume: 0.0211 m<sup>3</sup>  
 Carton weight: 8.3 kg

## 3. Accounting for the Vaccine and Related Supplies

Use your existing EPI stock keeping records and procedures to account for H1N1 vaccines and related supplies.