

# SUBCUTANEOUS IMMUNOTHERAPY

## CODE OF GOOD PRACTICE

### BEFORE THE INJECTION

#### > Check the emergency kit:

- Adrenaline 1:1000 (IM).
- Oxygen.
- A short-acting  $\beta_2$ -agonist in spray form (+ spacer).
- Nebulisers (salbutamol and/or terbutaline).
- Oral or intravenous corticosteroids.
- Antihistamines (oral & for injection).

*Check that the oxygen source is working properly and that the drugs have valid expiry dates.*



#### > Check the patient's condition: Inquire about:

- Any reaction that might have followed the last injection (eg asthma attack).
- Any event that might be relevant (infection, poorly controlled or brittle asthma attack or an exacerbation of allergic symptoms).
- Any drugs taken in the interval. Patients who should not receive immunotherapy are those taking beta-blockers (including local treatment).
- Check that PEFr reading is > 80% of "personal best" for patients with asthma.

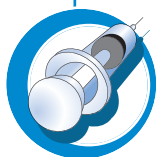
#### > Check the vial:

- Correct allergen composition, concentration and expiry date.
- Check the dose to be administered by comparing it to the previous dose and the dosage schedule.

*When should the maintenance dose be reduced?*

- **When starting a new maintenance vial: Inject 50% less than the usual maintenance dose and, if well tolerated, revert to the full maintenance dose for the next injection.**
- **During the pollen season: Inject 50% less than the usual maintenance dose and revert to the full maintenance dose at the end of the pollen season.**

### THE INJECTION



- Check the interval since last injection.
- Use a disposable 1 ml syringe (with 1/100 graduations).
- Shake the vial and, using regular aseptic technique, aspirate the exact volume to be administered.
- Administration by strict deep subcutaneous route in the lower deltoid region of the arm or in the upper thigh. Always draw back on the syringe to ensure that the needle has not entered a blood vessel.

### AFTER THE INJECTION



- **Keep the patient under medical observation for at least 30 minutes after the injection.**
- Advise the patient to avoid strenuous exercise, hot baths and sauna for the rest of the day.

*Record all the details of the injection in the case notes or desensitisation booklet.*

**In the event of an adverse reaction or an accident, the medical practitioner should proceed as follows:**

### **LOCAL REACTIONS**

**(œdema involving neighbouring joints) or simple, acute, generalised urticaria:**

- Oral corticosteroids: 2 mg/kg up to 60 mg/day for 2 or 3 days.
- Oral H1-Antihistamines.

### **BRONCHOSPASM OR A DROP IN PEFR**

**(± coughing or respiratory distress):**

- 4 puffs of a short-acting  $\beta_2$ -agonist, with a spacer for children (to be repeated if necessary after 4 min).
- or nebulisation of a  $\beta_2$ -agonist (salbutamol at a dose of 0.02 ml/kg of a 0.5% solution or one vial of terbutaline) – this is equivalent to 14 puffs.

### **GENERALISED REACTION**

**(urticaria + asthma + laryngeal œdema ± drop in blood pressure + tachycardia in children):**

- Lay the patient down on his/her back with legs raised, or in recovery position.
- Adrenaline IM: 0.01 mg/kg which can be repeated after 10 minutes:
  - weight < 20kg = dose 0.15 mg;
  - weight > 20kg = dose 0.30 mg;
  - 1 dose of 0.30 mg for patients > 75-80 kg, followed by a 2nd dose after 5 minutes if there is no response or an inadequate response.
- Nasal oxygen.
- Intravenous antihistamines.
- Methylprednisolone: 2 mg/kg IV.
- Intravenous fluid (where available) if the patient is hypotensive.

For more information on Immunotherapy visit [www.allergy.org.au](http://www.allergy.org.au), the website of **ascia** the peak professional body of Allergists & Clinical Immunologists in Australia & New Zealand.

**The information in this document is intended as a guide for medical practitioners who already have expertise in immunotherapy & management of acute asthma & anaphylaxis.**