Allergy skin testing
(Immediate Hypersensitivity)

In the conclusion of this presentation attendees will be able to:

- Explain and give rational for skin testing.
- Demonstrate proper technique with skin testing application.
- Interpret and evaluate skin test results.
- Provide and explain after care instructions post skin testing.
• Skin testing is a method used for making a medical diagnosis

There are three main types of skin testing
• Scratch, prick or percutaneous
• Intradermal testing
• Patch testing

Skin testing is considered:
• Most accurate
• Cost effective
• User friendly
• Causes minimal tissue trauma
• Virtually pain free
• Few false positives
• Few false negatives
• Delivers correct amount of allergen
• Produce reproducible results
Glycerinated allergen concentrates are the most suitable for scratch testing administration because it is more stable and forms coherent drops that are less likely to run than aqueous extracts. Concentrations labeled 1:10 or 1:20 wt/vol. are most commonly used.

Three types of devices used:

- Quintip (Single applicators)
- Quintest (Multi-skin testing with 5 applicators)
- ComforTen (Multi-skin testing with 10 applicators)
Quintip

- (Single applicators)

Patient Assessment

- Greet the patient and introduce yourself.
- Complete Health Connect information.
- Assess patient for any potential complication.
- Asthma (PFT).
- Fever.
- Pregnancy.
- No antihistamine taken within the last 72 hours i.e. (Seldane, Allergra, Atarax, Claritin, Zytrec, Benadryl).
- High dose Vitamin C.
Other contraindicated Medication

- Antidepressants such as: (Elavil, Anafranil, Toranil, Sinequan)
- Medication used for GERD such as: (Zantac, Tagament)
- Beta blocker medications and including any ophthalmic medication that may contain a beta blocker.

Preparation of patient

- Check Health Connect for orders.
- Explain testing procedure to patient.
- Inform patient test usually takes about 45 minutes to complete the skin.
- Common area is the forearm (volar) area for adults and children over 3-4 years of age. For toddlers and infants the best location is the back.
- Wipe with alcohol and make markings with ink stamp
Scratch test application

- Obtain antigen tray
- Select the best area to be tested and wipe location with alcohol and let dry
- Stamp location with a number stamp
- Take applicator device which are setting in antigen trays
- Apply antigen to patients arm or back applying next to corresponding numbers from antigen trays
- Hold applicator vertically against patient's skin with enough pressure to slightly indenting skin

- Next using a gentle rotation move the applicator back and forth.
- Next dispose the applicator
- Inform the patient they will need to wait for about 15 minutes after that time you will call the patient back for a reading of the results
- Also inform patient they may experience itching, site may become very warm, reddened and hives may occur. These are expected results

- Observe the patient closely for any reactions. Such as cough, difficult swallowing, sob, angioedema, wheezing, extensive rash. (Potential signs of anaphylaxis)
- Follow anaphylaxis protocol
Scratch test reading

- Measure diameter of wheal and flare in millimeters
- 3 mm by 3 mm in both wheal and flare is considered a positive result
- The most precise and least ambiguous method for reporting the allergic response obtained from skin testing is simply report the size of the wheal and erythema

Post scratch care

- Wipe off allergens
- Apply anti-itch gel or 1% cortisone cream may be applied to arms to relieve any excessive itching.
- Apply ice bag
  Consider antihistamines
- Inform patient itching may last for short while but will resolve in short time.
• Provide Kaiser branded education materials.
• Discharge patient to waiting room pending Allergist consult.