# Allergy and Immunology Summary

# Allergy

The role of the GP in the care of people with allergic disorders

- The UK has one of the highest prevalence of asthma, rhinitis and eczema. Allergyrelated conditions may present in a significant number of consultations. The GP has the lead role in identifying underlying allergic symptoms that can be difficult to distinguish from the range of normality or other illness
- Anaphylaxis is a potentially life-threatening emergency which can often present in primary care. GPs have a role in not only managing emergencies, but supervising the ongoing management of risk factors and prescribing
- Allergy is a multi-system disease. GPs need to understand how to take an allergy focused clinical history and understand the differentiation of different types by appropriate testing and referral. This includes recognising and recording of food and drug sensitivities

# Key Areas for Exam preparation

#### **Common and important conditions**

- Anaphylaxis, including doses of adrenaline and resuscitation
- Autoimmune conditions in primary care
- Drug allergies and their mechanisms
- Food allergies, including milk allergy (types e.g.IgE vs .non-IgE mediated, presentation, primary care management and referral)
- Occupational allergies such as latex allergy and contact allergies such as hair dye, metals, plants
- Pollen Food Syndrome
- Types of allergic reactions: immediate, delayed, possible mechanisms
- Venom allergy: referral and emergency management; the role of immunotherapy.

# Types of allergy

### Anaphylaxis

- <u>https://www.resus.org.uk/anaphylaxis/emergency-treatment-of-anaphylactic-reactions/</u>
- https://bestpractice.bmj.com/topics/en-gb/501

### **Autoimmune Condition**

- <u>https://www.nice.org.uk/guidance/conditions-and-diseases/blood-and-immune-system-conditions</u>
- https://www.evidence.nhs.uk/search?q=autoimmune%20disease

## Drug allergies

- <u>https://www.nice.org.uk/guidance/cg183</u>
- <u>https://www.nice.org.uk/guidance/cg183/resources/drug-allergy-diagnosis-and-management-pdf-35109811022821</u>
- <u>https://www.bsaci.org/Guidelines/bsaci-guidelines-and-SOCC</u>

## **Occupational allergies**

- <u>https://cks.nice.org.uk/allergic-rhinitis</u>
- <u>https://cks.nice.org.uk/dermatitis-contact</u>
- https://oshwiki.eu/wiki/Occupational\_allergens

## Pollen Food syndrome

- <u>https://www.allergyuk.org/information-and-advice/conditions-and-symptoms/11-hay-fever-allergic-rhinitis</u>
- https://www.allergyuk.org/assets/000/001/548/Oral\_Allergy\_Syndrome\_original.pdf?1512985 580

## Venom allergy

- <u>https://www.nice.org.uk/guidance/ta246</u>
- https://www.nice.org.uk/guidance/qs119/chapter/Quality-statement-3-Specialist-assessmentfor-venom-immunotherapy

# **Immune Disorders**

The role of the GP in the care of people with immune disorders

- Increasing numbers of people with secondary immune deficiencies from chemotherapy and use of biologics may present to their GP
- GPs deliver preventive public health strategies through routine immunization and should expand provision of vaccination as new disease patterns emerge.

# Key Areas for Exam preparation

Common and important conditions

- Immune deficiency states (inherited, primary and acquired such as HIV, chemotherapy) as applicable to primary care particularly the different requirements for antibiotics
- Immunisation
  - antibody test results used in guiding management of specific situations such as chickenpox in pregnancy, rubella immunisation, hepatitis B and C;
  - routine primary childhood immunisation schedules, contraindications and adverse reactions; and
  - for occupational medicine such as healthcare workers and Hepatitis B
- Needle stick injuries and risk of Hepatitis B and C, HIV
- Skin manifestations of immune disease such as Kaposi's sarcoma
- Transplantation medicine as applicable to primary care particularly in management of organ transplants such as heart, lung, liver, kidney, cornea
- Indications and complications of transplantation e.g. immunosuppression and immunosuppressant drugs

# Suggested resources:

# General information

## Immunological response

- <u>https://www.immunology.org/public-information/bitesized-immunology/pathogens-and-disease/immune-responses-bacteria</u>
- <u>https://www.newhealthadvisor.org/Primary-Immune-Response.html</u>
- https://www.jacionline.org/article/S0091-6749(14)01585-1/fulltext
- <u>http://www.stomponstep1.com/hypersensitivity-type-1-2-3-4-urticaria-anaphylaxis-immune-complexes-i-ii-iii-ii/</u>
- <u>http://www.microbiologybook.org/ghaffar/hyper00.htm</u>
- https://quizlet.com/21953599/four-types-of-immunity-flash-cards/

## Analphylaxsis

- <u>https://www.anaphylaxis.org.uk/information-training/allergywise-training/for-healthcare-professionals/</u>
- <u>https://www.resus.org.uk/anaphylaxis/</u>
- https://www.rcpch.ac.uk/resources/allergy-care-pathway-anaphylaxis
- https://cks.nice.org.uk/angio-oedema-and-anaphylaxis

## Food allergies

- <u>https://www.nhs.uk/conditions/food-allergy/symptoms/</u>
- <u>https://cks.nice.org.uk/food-allergy</u>
- <u>https://www.guidelines.co.uk/allergy/nice-food-allergy-guideline/454796.article</u>

### Asthma

- https://www.netdoctor.co.uk/conditions/allergy-and-asthma/a6099/asthma-1/
- <u>https://www.blf.org.uk/support-for-you/asthma</u>
- <u>https://cks.nice.org.uk/asthma</u>
- https://www.evidence.nhs.uk/search?q=asthma
- <u>https://pathways.nice.org.uk/pathways/asthma</u>
- <u>https://www.rbht.nhs.uk/for-healthcare-professionals/nursing/advanced-nursing-team/advanced-nursing-team-lung/asthma-and</u>
- <u>http://gmmmg.nhs.uk/docs/guidance/GMMMG-Asthma-Inhaler-Guide-v2-4-December-2018-final.pdf</u>
- <u>http://www.hse.gov.uk/asthma/</u>

## Urticaria

- https://cks.nice.org.uk/urticaria
- <u>https://patient.info/doctor/urticaria-pro</u>
- http://www.bad.org.uk/shared/get-file.ashx?id=184&itemtype=document
- <u>https://www.dermnetnz.org/topics/urticaria-an-overview/</u>
- <u>https://www.allergyuk.org/information-and-advice/conditions-and-symptoms/416-urticaria-hives-and-other-skin-allergy</u>
- <u>www.e-lfh.org.uk</u> resources available

### **Occupational allergies**

- <u>https://cks.nice.org.uk/allergic-rhinitis#!scenario</u>
- <u>http://www.hse.gov.uk/asthma/employers.htm</u>
- <u>https://www.nhshealthatwork.co.uk/latex-allergy.asp</u>
- <u>https://www.allergyuk.org/information-and-advice/conditions-and-symptoms</u>
- <u>https://www.bsaci.org/</u>

#### Autoimmune conditions

- <u>http://www.autoimmuneregistry.org/the-list-1</u>
- <u>https://www.aarda.org/diseaselist/</u>
- <u>https://labtestsonline.org.uk/conditions/autoimmune-disorders</u>
- <u>https://www.niaid.nih.gov/diseases-conditions/autoimmune-diseases</u>
- <u>https://www.britishlivertrust.org.uk/liver-information/liver-conditions/autoimmune-hepatitis/</u>
- <u>https://www.healthdirect.gov.au/autoimmune-diseases</u>
- <u>https://www.nice.org.uk/guidance/conditions-and-diseases/blood-and-immune-system-conditions</u>
- <u>https://pathways.nice.org.uk/pathways/blood-and-immune-system-conditions</u>
- <u>https://www.evidence.nhs.uk/search?q=autoimmune+disease</u>
- <u>https://cks.nice.org.uk/hypothyroidism</u>
- <u>http://autoimmunity.co.uk/information/</u>
- <u>https://cks.nice.org.uk/jaundice-in-adults#!diagnosis</u>
- <u>https://www.nice.org.uk/guidance/conditions-and-diseases/neurological-conditions</u>
- <u>https://www.nhs.uk/conditions/antiphospholipid-syndrome/</u>

#### Pollen/food allergies

- <u>https://www.nhs.uk/conditions/food-allergy/</u>
- <u>https://www.bda.uk.com/dt/articles/pollen\_food\_syndrome</u>
- <u>https://www.wsh.nhs.uk/CMS-Documents/Patient-leaflets/PaediatricDepartment/6440-1-</u> Pollen-Food-Syndrome-Oral-Allergy-Syndrome.pdf
- <u>https://www.anaphylaxis.org.uk/wp-content/uploads/2015/06/Oral-allergy-version-8-</u> formatted-with-AC-logo-and-name-updated.pdf

#### Venom allergy

- <u>https://www.bsaci.org/guidelines/venom-allergy</u>
- <u>https://bnf.nice.org.uk/drug/wasp-venom-extract.html</u>
- http://www.gpnotebook.co.uk/simplepage.cfm?ID=x20120321133609331321
- https://www.evidence.nhs.uk/search?q=paediatric%20allergy%20guidance
- <u>http://www.healthcareimprovementscotland.org/our\_work/technologies\_and\_medicines/mta\_</u> resources/appraisal\_246.aspx

#### Immune deficiency states

- <u>https://quizlet.com/ca/174783584/immune-deficiency-states-flash-cards/</u>
- <u>https://www.immunology.org/policy-and-public-affairs/briefings-and-position-</u> statements/immunodeficiency
- https://www.evidence.nhs.uk/search?pa=1&q=Acquired+immune+deficiency+syndrome
- https://www.evidence.nhs.uk/search?q=primary+immunodeficiency+disease
  HIV <u>https://cks.nice.org.uk/hiv-infection-and-aids#!scenario</u>

#### Immunization

- Child health national immunization programme
  <u>https://www.gov.uk/government/publications/the-complete-routine-immunisation-schedule</u>
- Special states eg: pregnancy and chicken pox
  <u>https://www.betterhealth.vic.gov.au/health/healthyliving/immunisation-and-pregnancy</u>

### Needle stick injury

- https://www.evidence.nhs.uk/search?q=needlestick+injury
- <u>https://www.csarevision.com/needlestick.html</u>
- <u>http://www.hse.gov.uk/healthservices/needlesticks/resources.htm</u>

#### Transplant medicine

https://www.nhs.uk/conditions/kidney-transplant/

#### **Complications of treatment**

o https://bts.org.uk/guidelines-standards/