

ERRATUM to Algorithms in Differential Diagnosis: How to Approach Common Presenting Complaints, for Medical Students and Junior Doctors (Dr. Nigel Fong)

Updated 13 Mar 2019

The first print run contains the following errors. These will be corrected in subsequent prints.

1. Page 41, Table 4.2.

In an effusion, vocal resonance is decreased, not increased (corrected arrow circled).

	Collapse	Pneumothorax	Fibrosis	COPD	Bronchiectasis	Effusion	Consolidation
Trachea deviation	Towards affected side (if upper lobe)	Away from affected side (if tension)	Towards affected side (if upper lobe)	Nil. May have tracheal tug	Nil	Away from affected side (if massive)	Nil
Chest expansion	↓ On affected side	↓ On affected side	↓ On affected side	↓ Bilaterally Hyperinflated	—	↓ On affected side	↓ On affected side
Percussion	Dull	Hyperresonance	—	Hyperresonance	—	Stony dull	Dull
Added sounds	—	—	Fine crackles ^a	Expiratory wheeze ± coarse crackles	Coarse crackles, changes with cough ^b	Crackles if there is pulmonary oedema	Coarse late inspiratory crackles
Breath sounds	↓	↓	↓	↓ Or normal	Normal or bronchial ^b	↓	Bronchial
Vocal resonance	↓	↓	—	—	Normal or ↑ ^b	↓	↑

2. Page 111, Discussion Question 3 ‘Going Further’.

The correct serological test should be anti-HBc rather than HBcAg.

3. **GO FURTHER!** Read up on hepatitis B and C. (a) What is their natural history, and at which stages are LFTs abnormal? (b) How do you interpret hepatitis B serological results? Complete the table:

	HBsAg	anti-HBs	anti-HBc	HBeAg	anti-HBe	Interpretation
a	—	—	—	—	—	

3. Page 148, point 4.

The formula for the expected anion gap was erroneous. The corrected formula is shown.

- Calculate AG and compare with expected AG:

$$\text{Calculated AG} = \text{Na}^+ - (\text{HCO}_3^- + \text{Cl}^-) \quad (\text{all units in mmol/L})$$

$$\text{Expected AG} = 10 - [(40 - \text{albumin})/4] \quad (\text{albumin in g/L})$$

(for every albumin ↓10, expected AG ↓ by 2.5)

4. Page 156, box: normal electrolyte values

The reference ranges for K^+ , Cl^- , and Ca^{2+} were incorrectly transcribed. The correct ranges are shown (these are approximate values; the exact range is lab-dependent):

Normal Electrolyte Values	
<i>[check laboratory reference range]</i>	
Na^+	135–145 mmol/L
K^+	3.5–5.0 mmol/L
Cl^-	90–105 mmol/L
Ca^{2+}	2.2–2.6 mmol/L*
PO_4^{3-}	0.8–1.6 mmol/L
Mg^{2+}	0.7–1.0 mmol/L

*Corrected Ca^{2+} = Measured Ca^{2+} + 0.02 (40 – Albumin)

5. Page 194, aetiologies of nephritic syndrome, part (a)

The workup of IgA nephropathy and infection-associated GN were switched. The correct workup should be:

(a) **Known history of infection**

- **IgA nephropathy** (synpharyngitic haematuria): This is the most common cause of nephritic syndrome. Clinically, it presents as one or several episodes of haematuria, each < 5 days after a viral respiratory illness. Haematuria may persist between episodes. Progressive proteinuria and renal insufficiency can develop over time, especially if the patient already has proteinuria or raised creatinine. Henoch–Schonlein purpura is a closely related IgA deposition disease, which develops in children and teenagers, classically with a purpuric rash on lower limb extensors, arthralgia, abdominal pain ± nephritic syndrome.
- **Infection-associated GN**: This used to be called *post-infectious* GN, where skin or throat infection with a nephritogenic *Streptococcus pyogenes* strain results in haematuria 1 to 3 weeks later. Recently, it was recognised that GN can occur concomitantly with staphylococcal and streptococcal infection. Prognosis is good, typically with complete resolution of haematuria.

Workup

- Normal complement levels
- No serology available, no role for IgA levels

- Evidence of streptococcal infection, for example, anti-streptolysin O titre
- Complement levels: low C3 with normal C4