Question	Answer	Marks	Guidance
11(c)	$\overrightarrow{YZ} = \mu\mathbf{a} - \frac{1}{3}\overrightarrow{AB}$ oe soi	**M1**	
	$\overrightarrow{YZ} = \mu\mathbf{a} - \frac{1}{3}(\mathbf{b} - \mathbf{a})$ oe	**A1**	Allow unsimplified ISW from correct answer
11(d)	$\mu\mathbf{a} - \frac{1}{3}(\mathbf{b} - \mathbf{a}) = \lambda\left(\frac{2}{3}\mathbf{a} - \frac{7}{15}\mathbf{b}\right)$ soi	**M1**	For equating *their* (b) and *their* (c) **and** attempt to equate coefficients of **a** or **b** at least once.
	$\lambda = \frac{5}{7}$	**A1**	**nfww**
	$\mu = \frac{1}{7}$	**A1**	**nfww**
12	$\sin\left(\frac{2x}{3} - \frac{\pi}{3}\right) = \pm\frac{\sqrt{3}}{2}$ or $\tan\left(\frac{2x}{3} - \frac{\pi}{3}\right) = \pm\sqrt{3}$	**B1**	Allow if $\pm$ is missing
	$x = \pi, \frac{3\pi}{2}, \frac{5\pi}{2}, 3\pi$	**4**	**M1dep** on **B1** for obtaining $\frac{2x}{3} - \frac{\pi}{3} = \frac{\pi}{3}$ or any valid value **A1** for one correct solution **A1** for a 2nd correct solution **A1** for a 3rd and 4th correct solutions and no extras in the range