

**ANSWERS TO SEMESTER ONE EXAMINATION JUNE 2006 (MARCH 2006 INTAKE)**

<b>1</b>	PROVE
<b>2</b>	a) $\frac{1}{x} - \frac{2}{x+1} + \frac{1}{x+2}$ ; (b) PROVE
<b>3</b>	i) SHOW ; (ii) SHOW ; (iii) 32
<b>4</b>	<p>Asymptotes : <math>y = x - 1</math> and <math>x = -1</math>.</p> <p>Minimum point <math>(-1 + \sqrt{6}, -2 + 2\sqrt{6})</math> and Maximum point <math>(-1 - \sqrt{6}, -2 - 2\sqrt{6})</math></p> <p>The curve does not cross any of the axes.</p> 