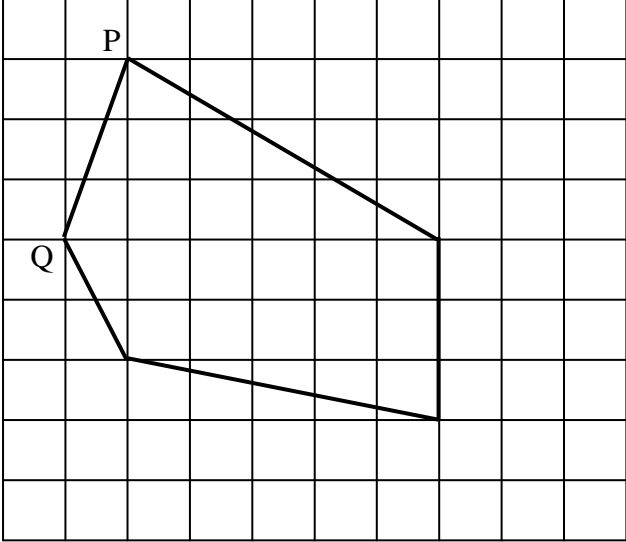
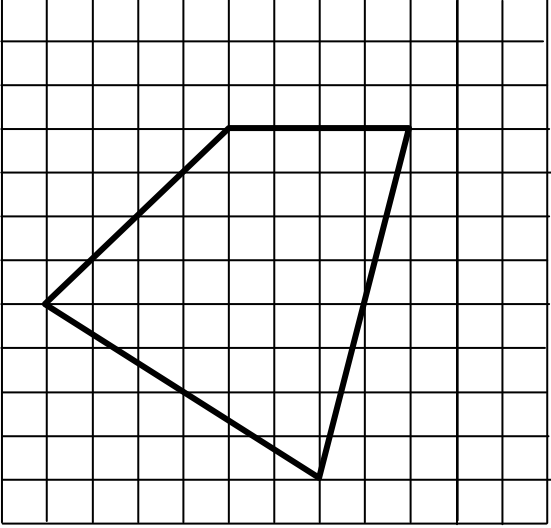
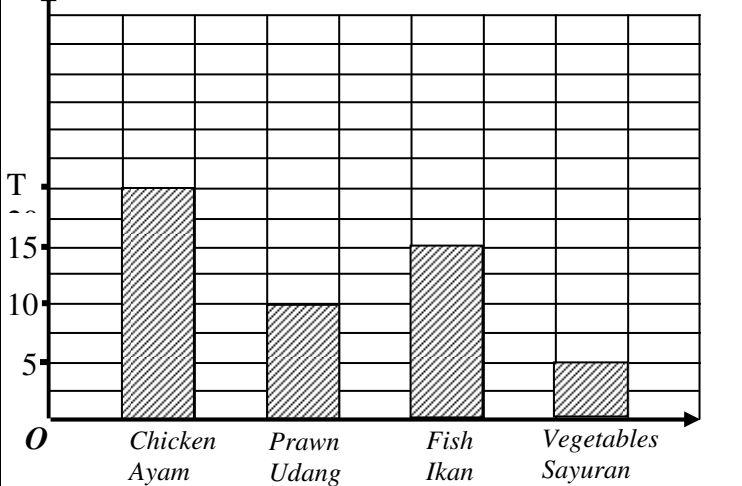
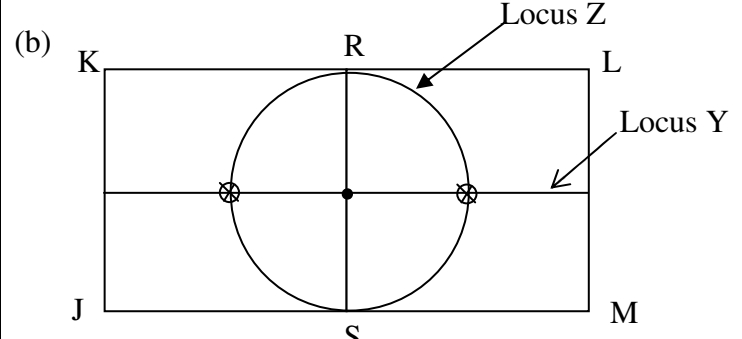


PEPERIKSAAN PERCUBAAN TAHUN 2009
TINGKATAN 3
SKEMA MATEMATIK KERTAS 2

Bil	Skema	
1	$\frac{13}{4} \times 2$ or $\frac{13}{2}$ $\frac{7}{2}$ or $3\frac{1}{2}$ or 3.5	K1 N1
2	0.28 or 0.2 or $\frac{0.14}{0.7}$ or $\frac{0.02}{0.1}$ 0.2	K1 NI
3	(a) $-\frac{1}{3}$ (b) 1.2 or $(-2)^3$ -8	P1 K1 N1
4	6 or 10 or 15 $\cos x = \frac{6}{10}$	K1 N1
5		P2 Note: Ignore label

<p>6</p>		<p>All sides correctly drawn - P3</p> <p>3 sides correct - P2</p> <p>2 sides correct - P1</p>
<p>7</p>	<p>a) 27</p> <p>b) $5^{\frac{3}{2}} @ 3^1 @ 5^2$</p> <p>75</p>	<p>P1</p> <p>K1</p> <p>N1</p>
<p>8</p>		<p>All 4 sides correctly drawn - P3</p> <p>2 sides correctly drawn - P2</p> <p>1 side correctly drawn - P1</p>
<p>9</p>	<p>$6mn @ 8m @ 6mn - 8m$</p> <p>$6mn - 5m$</p>	<p>K1</p> <p>N1</p>

10	a) $3p (q - 6)$ b) $2 (g^2 - 25)$ $2(g + 5)(g - 5)$	N1 K1 N1
11	$\frac{3n}{6n^2} - \frac{n-8}{6n^2}$ $\frac{2n+8}{6n^2}$ $\frac{n+4}{3n^2}$	K1 K1 N1
12	$y = 6 - 4x$ $4x = 6 - y$ $x = \frac{6-y}{4}$	K1 K1 N1
13	(a) 8 (b) $3x - 2x = -2 - 4 @ \textit{equivalent}$ $x = -6$	P1 K1 N1
14	$8g^4h^8 @ g^{-1} @ h^7$ $8g^{-1}h^7$	K1 N1

<p>15</p>	<p>(a) 15</p> <p>(b) <i>Number of Students</i> <i>Bilangan Pelajar</i></p>  <p>Uniform scale – K1</p> <p>All 4 bars correctly – K2</p> <p>3 or 2 bars correctly – K1</p> <p>Correctly drawn – N1 (Note : Do not accept sketch bars- N0)</p>	<p>N 1</p>
<p>16</p>	<p>$x < 10 @ x > 4$</p> <p>5, 6, 7, 8, 9</p>	<p>K1</p> <p>N1</p>
<p>17</p>	<p>(a) RP</p> <p>(b)</p>  <p>Locus Z</p> <p>Locus Y</p>	<p>P1</p> <p>Locus Y completely drawn – K1</p> <p>Locus Z completely drawn – K1</p> <p>Intersection -N1, N1</p> <p>Note: Ignore label for locus Y and Z</p>

<p>18</p>		<p>Arc of P – K1</p> <p>Arc of 60° and line QM – K1</p> <p>Intersection arc at N – K1</p> <p>Arc of 90° – K1</p> <p>Line PR – N1</p>														
<p>19</p>	<p>(a)</p> <table border="1" data-bbox="462 800 727 1094"> <thead> <tr> <th>Score skor</th> <th>Frequency kekerapan</th> </tr> </thead> <tbody> <tr> <td>1</td> <td>4</td> </tr> <tr> <td>2</td> <td>4</td> </tr> <tr> <td>3</td> <td>4</td> </tr> <tr> <td>4</td> <td>6</td> </tr> <tr> <td>5</td> <td>7</td> </tr> <tr> <td>6</td> <td>5</td> </tr> </tbody> </table> <p>(b) 5</p> <p>(c) $\frac{113}{30}$</p> <p>3.77 @ 3.8</p>	Score skor	Frequency kekerapan	1	4	2	4	3	4	4	6	5	7	6	5	<p>All frequency correct - P2</p> <p>5 @ 4 correct-P1</p> <p>P1</p> <p>K1</p> <p>N1</p>
Score skor	Frequency kekerapan															
1	4															
2	4															
3	4															
4	6															
5	7															
6	5															
<p>20</p>	<p>Directions of both axes correct, uniform scales</p> <p>All 8 points are plotted correctly</p> <p>Notes : Award K1 for 6 or 7 points correctly plotted</p> <p>Smooth curve passes through all the correct points</p>	<p>K1</p> <p>K2</p> <p>N1</p>														

Answer for no. 20

