3

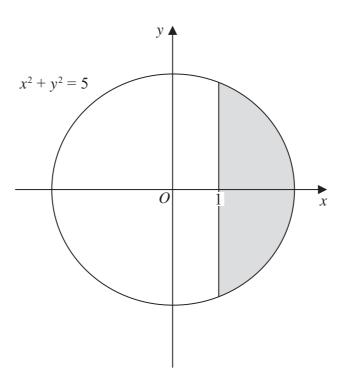


Diagram **NOT** accurately drawn

Figure 2

The region enclosed by the circle with equation $x^2 + y^2 = 5$ and the straight line with equation x = 1, shown shaded in Figure 2, is rotated through 360° about the y-axis.

Use algebraic integration to find the exact volume of the solid generated.

(5)

DO NOT WRITE IN THIS AREA

Question 3 continued	
	(Total for Question 3 is 5 marks)

