## MARK SCHEMES - Chemistry Unit 3 homework

Q1 (a) 2 × 16 (= 32)

1

$$(M_r =) 44$$

1

1

1

(c)  $3.2 \text{ g of } O_2 \text{ produced from } 6.8 \text{ g of } H_2O_2$ 

1

32 (g)

1

Q2 (a) 2Al +  $3H_2SO_4$   $\longrightarrow$  Al<sub>2</sub>( $SO_4$ )<sub>3</sub> +  $3H_2$  formulae correct

1

balancing correct

1

(b)  $40 + 2(14 + (3 \times 16))$ 

1

= 164

1

1

1

allow 164 with no working shown for 2 marks

(c) (17.4 + 17.6 + 16.9) / 3

[6]

allow 17.3 with no working shown for 2 marks

Q3 (a) 408 kg

= 17.3

1

(b) all points correct

± ½ small square

2

allow 1 mark if 5 points correct

1

best fit line

1

(c) 36

1

5525 dm<sup>3</sup>

(d)	relative formula mass of TiCl <sub>4</sub> is 190	1
	25.26 %	1
	Answer given to 3 significant figures = 25.3 %	1
	25.23% with or without working gains 3 marks	•