

Assessment Schedule – 2005

Mathematics: Solve straightforward number problems in context (90151)

Evidence Statement

AT SCHOOL

	Achievement Criteria	Q	Evidence	Code	Judgement	Sufficiency
Achievement	Solve straightforward number problems in context.	1(a)	Boys = 32, Girls = 48	A	No alternative.	Achievement: 3 × code A
		(b)	132	A		
		(c)	$\frac{52}{950} \times 100 = 5.4736 \dots \approx 5\%$	A	Accept 5.4, 5.5	
		(d)	$950 \times 1.09 = 1035.5 \dots \approx 1036$	A	Accept 1035. Must be a whole number. Units not needed.	
Achievement with Merit	Solve number problems in context involving manipulation, several steps or reversing processes.	2	$240 \div 1.12 = 214.28 \approx 214$ (or 215)	A/M	Must be a whole number.	Achievement with Merit: EITHER As for Achievement plus 2 × code M OR 3 × code M
		3	$\frac{5.811 \times 10^6}{44\,700} = 130$	A/M		
		4	Y9 and Y10: $\frac{1}{4} \times 520 = 130$ Y11 and Y12: $-0.1 \times 540 = -54$ Y13: -15 Change is 61 % Increase = $\frac{61}{1185} \times 100 = 5.147\%$ (increase)	A A A/M	Accept 650 Accept 486 Any correct rounding/truncation.	
Achievement with Excellence	Devise a strategy and solve a number problem.	5	After 5 years of interest the amount is $250\,000 \times 1.0875^5 = \$380\,264.98$ Total with subsidy is $380\,264.98 \times \frac{5}{3} = 633\,774.97$ Cost of building without GST is $750\,000 \times \frac{8}{9} = \$666\,666.67$, so there are insufficient funds. OR: After 5 years of interest the amount is $250\,000 \times 1.0875^5 = \$380\,264.98$ Subsidy on original 250 000 $250\,000 \times \frac{2}{3} = \$166\,666.66$ Total raised \$546 931.64 Cost of building without GST is $750\,000 \times \frac{8}{9} = \$666\,666.67$, so there are insufficient funds.	A A/M A/M E	Clear statements are used to outline what is being calculated. Minor calculation error may be accepted. Decision consistent and clearly stated.	Achievement with Excellence: As for Merit plus code E

Judgement Statement

Achievement	Achievement with Merit	Achievement with Excellence
<p>Solve straightforward number problems in context.</p> <p>3 × A</p>	<p>Solve number problems in context involving manipulation, several steps or reversing processes.</p> <p>Achievement <i>plus</i></p> <p>2 × M</p> <p><i>or</i></p> <p>3 × M</p>	<p>Devise a strategy and solve a number problem.</p> <p>Merit <i>plus</i></p> <p>1 × E</p>