

Question Number	Scheme	Marks
7(a)	$5mg - T = 5ma$ <b>OR</b> $5mg - T = -5ma$	M1 A1
	$T - 3mg = 3ma$	M1 A1
	Solve for $T$	DM1
	$T = \frac{15mg}{4}$ oe (allow unsimplified and not in terms of $mg$ at this stage)	A1
	Force on pulley = $2T$	M1
	$\frac{15mg}{2}$ oe (must be a single positive term)	A1
		(8)
(b)	The tension is the same on both sides of the pulley.	B1
	Tension is same across the pulley	(1)
		(9)
<b>Notes for Question 7</b>		
7.(a)	M1 Correct number of terms, condone sign errors (M0 if $m$ 's missing)	
	A1 Correct equation	
	M1 Correct number of terms, condone sign errors (M0 if $m$ 's missing)	
	A1 Correct equation	
	DM1 Solve for $T$ , dependent on previous two M marks, and must be in terms of $m$ .	
	A1 Correct expression for $T$	
	M1 Correct method	
	A1 Correct answer	
(b)	B1 Any equivalent statement. B0 if any incorrect extras B0 if pulley not mentioned.	