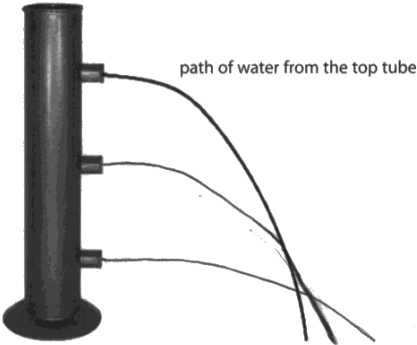



Question number	Answer	Notes	Marks
6 (a) (i)	pressure difference = $\rho \times g \times h$	accept in words or rearranged form allow 'd' for density do not accept 'gravity' must be 'g' or gravitational field strength	1
(ii)	both are curves; lowest curve travels further than top curve (if extrapolated); 		2
(iii)	MP1. water at bottom has greater pressure / pressure increases with depth; MP2. (therefore) force on water at the bottom is greatest;	allow idea that there is more weight above a point, the lower the point is allow water leaves lower holes with greater speed	2
(b) (i)	water level is constant in each vessel; 	ignore lines drawn in gaps between vessels	1
(ii)	any two from: MP1. vessels are connected; MP2. same density / type of liquid in all; MP3. air pressure is the same for all; MP4. pressure only depends on the depth;	allow water flows to other vessels allow pressure does not depend on (surface) area total marks = 8	2