

Question Number	Acceptable Answers	Reject	Mark
<b>1(a)</b>	London (forces) / van der Waals (forces) / temporary dipole-induced dipole (attractions) / dispersion forces / instantaneous dipole-dipole	Dipole-dipole Permanent dipole-dipole Just abbreviations, eg ID-ID, VdW	<b>1</b>

Question Number	Acceptable Answers	Reject	Mark
<b>1(b)</b>	18 /eighteen		<b>1</b>

Question Number	Acceptable Answers	Reject	Mark
<b>1(c)</b>	(Permanent) dipole-dipole attractions (also) present	Hydrogen bonds  Reference to CH <sub>3</sub> F having more electrons than F <sub>2</sub>	<b>1</b>

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<b>1(d)</b>	Hydrogen bonds (also) present <b>(1)</b>  Which are stronger / which require more energy to break than dipole-dipole / London forces / van der Waals' forces / Or strongest intermolecular force <b>(1)</b>		<b>2</b>

Question Number	Acceptable Answers	Reject	Mark
<b>1(e)</b>	HCl does not have hydrogen bonds (between molecules)  IGNORE references to electronegativity	Just 'chlorine does not have hydrogen bonds'	US035563