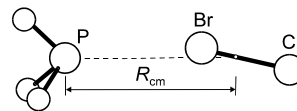


88	BrClH₃P	Bromine chloride – phosphine (1/1)	C_{3v}
MW		(weakly bound complex)	(effective symmetry class)
			(large-amplitude motion)
			BrCl · PH ₃

Isotopic species	$r_0(R_{\text{cm}})$ [Å]	$r_0(\text{P} \cdots \text{Br})$ [Å]
H ₃ P · ⁷⁹ Br ³⁵ Cl	3.6071(5)	2.8692(5)
H ₃ P · ⁸¹ Br ³⁵ Cl	3.5955(5)	2.8692(5)
H ₃ P · ⁷⁹ Br ³⁷ Cl	3.6336(5)	2.8697(5)
H ₃ P · ⁸¹ Br ³⁷ Cl	3.6218(5)	2.8697(5)
D ₃ P · ⁷⁹ Br ³⁵ Cl	3.6484(5)	2.8537(5)
D ₃ P · ⁸¹ Br ³⁵ Cl	3.6374(5)	2.8541(5)



The intermolecular stretching force constant is 11.5 N m⁻¹.

Legon, A.C., Thumwood, J.M.A., Wacławik, E.R.: J. Chem. Phys. **113** (2000) 5278.