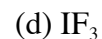
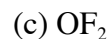
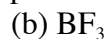


LECTURE 12

1. For the molecules or molecular ions in the problem above, give the formula type (Example: AX₂E), the steric number (SN), indicate the geometry (Example: bent), and give expected bond angles.

Compound	Formula Type	SN	Geometry	Bond angle(s)
(a) AlCl ₄ ⁻¹				
(b) XeF ₃ ⁺¹				
(c) PCl ₆ ⁻¹				
(d) IF ₅				

2. For each of the following molecules, write the Lewis structure and predict whether each molecule is polar or nonpolar:



Note that you do not need to indicate formal charges (FC) on your Lewis structures, but you should consider FC to draw most stable Lewis structures.

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