

LEWIS STRUCTURE EXAMPLES

EXAMPLE	STEP 1 - Identity of central atom	STEP 2 - Total number of valence electrons (show work)	STEP 3 - Electron pair placed in each bond	STEP 4 - Complete octet of atoms bonded to central atom	STEP 5 - Place any remaining electron pair around central atom	STEP 6 - Use double and triple bonds where needed to ensure central atom has (at least) an octet.	FINAL ANSWER
N_2O_4 dinitrogen tetroxide	N - N						
PH_3 phosphine							
CO_3^{2-} carbonate ion							
SF_6 sulfur hexafluoride							
XeF_4 xenon tetrafluoride							
NO_2^- nitrite ion							
C_2H_5OH ethanol							

LEWIS STRUCTURE EXAMPLES

EXAMPLE	STEP 1 - Identity of central atom	STEP 2 - Total number of valence electrons (show work)	STEP 3 - Electron pair placed in each bond	STEP 4 - Complete octet of atoms bonded to central atom	STEP 5 - Place any remaining electron pair around central atom	STEP 6 - Use double and triple bonds where needed to ensure central atom has (at least) an octet.	FINAL ANSWER
NH ₃ ammonia							
CO ₂ carbon dioxide							
PCl ₅ phosphorous pentachloride							
ClO ₂ ¹⁻ chlorite ion							
SO ₃ sulfur trioxide							
BeCl ₂ beryllium dichloride							
BCl ₃ boron trichloride							