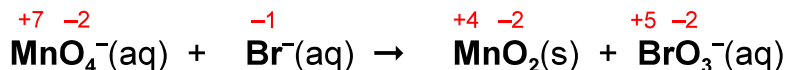


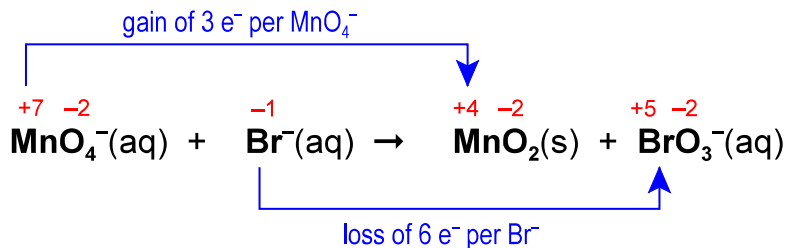
Textbook Page 613 #3
ANSWERS

3(a)

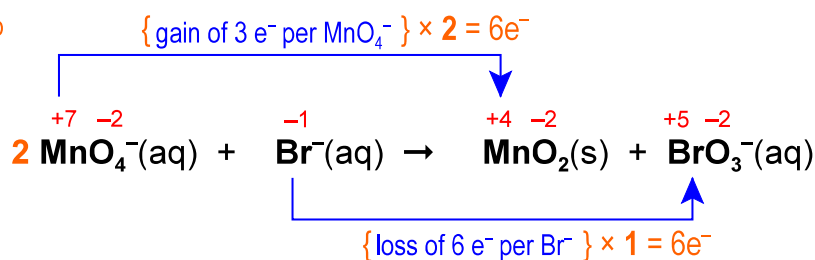
1. Assign oxidation numbers.



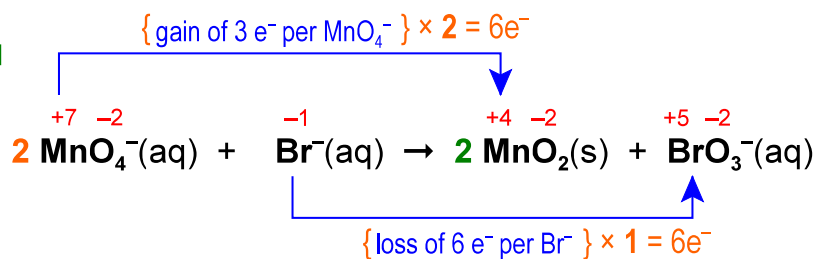
2. Determine number of electrons lost/gained per reactant.



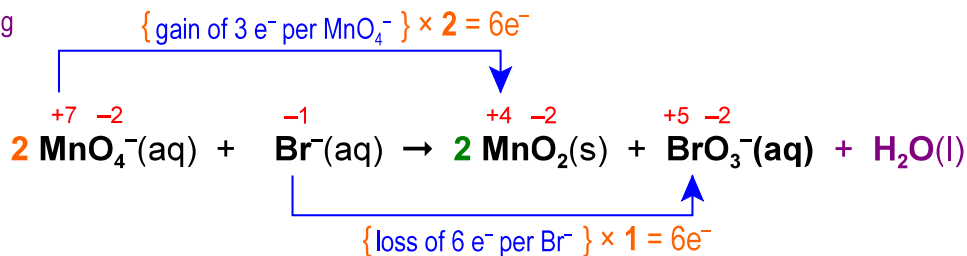
3. Assign coefficients to reactants to balance the charge transfer.



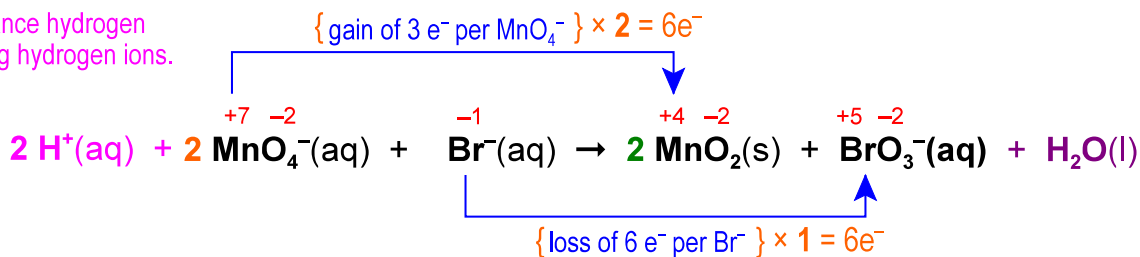
4. Balance all atoms except hydrogen and oxygen.



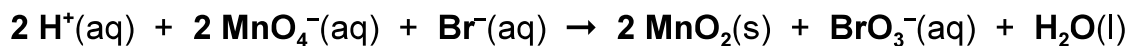
5. Balance oxygen using water molecules.



6. Balance hydrogen using hydrogen ions.

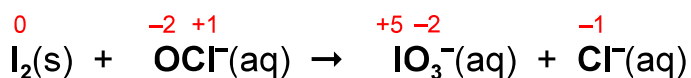


7. Write the balanced equation.

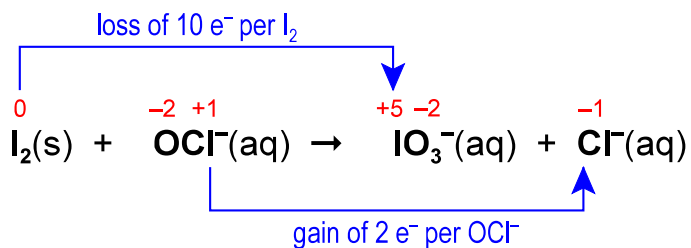


3(b)

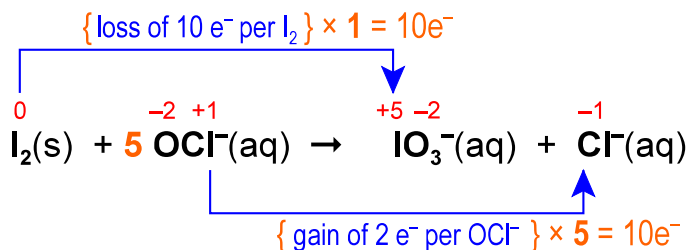
1. Assign oxidation numbers.



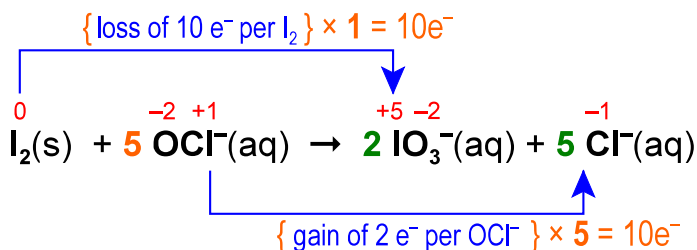
2. Determine number of electrons lost/gained per reactant.
(Note that each iodine atom loses 5 electrons but there are two atoms in an iodine molecule.)



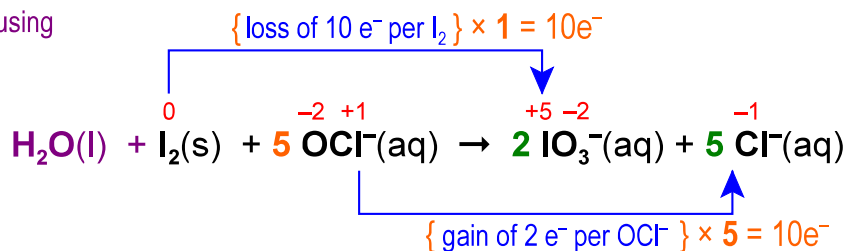
3. Assign coefficients to reactants to balance the charge transfer.



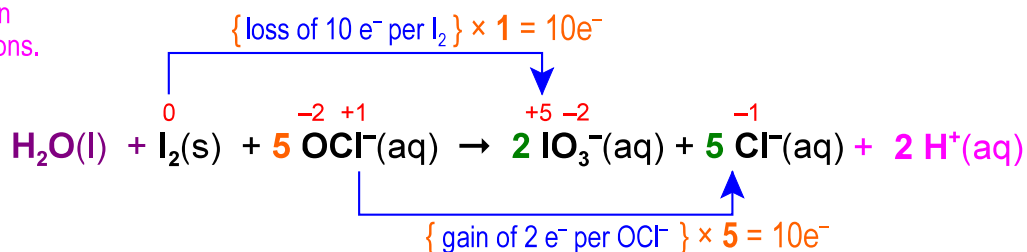
4. Balance all atoms except hydrogen and oxygen.



5. Balance oxygen using water molecules.



6. Balance hydrogen using hydrogen ions.



7. Write the balanced equation.

