Dative covalent bonds

1 What are they?

- type of covalent bond (sharing of e-)
- definition: sharing of e from 1 atom only
- difference w/ normal CBs

normal 两颗atom也会提供电子 两夫妇一起灵楼 dative 一颗atom提供电子,两颗atom共用 老公付钱,但两夫妇一起住

2 Formation

- There are <2> lone pair of e in <0> atom from <H20> molecule.
- There is <no> outermost shell e in <H + ion> -> vacant site
- A lone pair of e-from <0> atom is donated to the vacant site in <H+ion>.

3 Examples

 $H_{3}O^{+}$ $H_{2}O + H^{+} \longrightarrow H_{3}O^{+}$ $H_{3}O^{+}$ $H_{3}O^{+}$

CO - CÉO

 $O_{3} \longrightarrow O_{2} + O \rightarrow O_{3}$ $O(0) + O \rightarrow O(0)O$ $O(0) \rightarrow O(0)O$

 $N_{2}O$ $N_{2} + O \Rightarrow N_{2}O$ $N = N \Rightarrow O$ $N = N \Rightarrow O$

