

Conductivity Investigation

Chemical name/formula	Data From Store Bought Conductivity Meter	Data From Student Made Conductivity Meter	Identify which element classes are present in the formula
Sodium Chloride NaCl			
Distilled water H ₂ O			
Sugar Water C ₁₂ H ₂₂ O ₁₁			
Tap Water H ₂ O – but also has Na, K, Mg, Ca, Fe, etc			
Copper penny			
#1	Using your data and any patterns that you find in that data, create an “argument from evidence” that explains why some chemicals conducted electricity and some did not.		
#2	Using available resources (textbooks, internet, etc) research what types of bonds conduct electricity and what types of bonds do not. Summarize your findings below		
<u>Conduct</u>		<u>Do not conduct</u>	
#3	Looking at the argument you wrote in #1, and the information you gathered in #2, create an “argument from evidence” that explains what classes of elements are required to form which kinds of bonds.		
#4	Using available resources, identify five examples of chemicals that exhibit each of the three main types of bonds you identified above. Make sure you are able to justify your choices using the argument you wrote in #3 – they should “follow the rule” you identified, not be weird exceptions to the rule. Write the FORMULA not the name		
1)	1)	1)	
2)	2)	2)	
3)	3)	3)	
4)	4)	4)	
5)	5)	5)	