**Why do metals conduct electricity**

Did you know that metals act as conductors, that is they conduct electricity?

Watch this [video](https://www.pbslearningmedia.org/resource/nvtoe-sci-metalconduct/wgbh-nova-treasures-of-the-earth-why-do-metals-conduct-electricity/) to find out how this happens. Then answer the questions.

* What happens when a voltage is applied to metal?
* When electrons “hop” from one atom to another, what happens to the first atom?
* What is the role of electrons in transmitting electricity?

Do this matching exercise

|  |  |
| --- | --- |
| 1. electrons 2. conduct 3. conductor 4. core 5. arrange 6. row 7. column 8. direction 9. hop 10. current 11. apply | * 1. μεταπηδάω   2. κατεύθυνση   3. σειρά   4. στήλη   5. ηλεκτρόνια   6. μεταφέρω, άγω, οδηγώ   7. αγωγός (ρεύματος)   8. εφαρμόζω   9. ρεύμα   10. τακτοποιώ, βάζω σε ορισμένη διάταξη   11. πυρήνας |

**After watching**

* What types of materials conduct electricity?
* What are some examples of electrical insulators—materials that do not conduct electricity?
* Do you think all metals conduct electricity with the same efficiency? Provide some examples for your answer.

Ιf you have any unknown words, look them up [here.](https://www.wordreference.com/engr/)

<https://www.pbslearningmedia.org/resource/nvtoe-sci-metalconduct/wgbh-nova-treasures-of-the-earth-why-do-metals-conduct-electricity/support-materials/>