Specific Resistivity as a Function of Temperature

Here is a plot of the specific resistivity vs. temperature for some metals.

The resistivity seems to go to 0 for 0 K. This is not really true, cf. the detailed curve for Na.

Still, simple free electron theory predicts zero resistance at **0** K, and trying to see if that is true was one of the driving forces behind the discovery of superconductivity by Kammerlingh Onnes in **1911**.

