The I_D versus V_{GS} and I_D versus V_{DS} plots for the n-channel MOSFET are quite accurate to the ones predicted by theory. The only noticeable nonideality occurs when the MOSFET operates in the saturation region an exponential-like increasing curve. This is explained by the fact that V_{DS} becomes high enough to force electrons through the channel. Increasing V_{GS} is a potential way to get a more ideal curve because the linearity of the channel resistance can be maintained if enough electrons are in the channel. The experiment demonstrates the switching behavior of a MOSFET and its similarity to the behavior of a BJT, though the physical specification is different.