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Options are among the most flexible financial instruments. They can serve many functions; profit enhancement, risk management, arbitrage and hedging are but a few. For this reason, options have become an invaluable component of many financial portfolios. Since April of 1973, when a uniform options market was established, the options market has grown more rapidly than any other financial market.

The value of an option depends on several factors. The strike price of the option and the price of the underlying instrument are the most important. Others include the time to expiry, the volatility of the underlying instrument, the risk free interest rate, and cash flows from the instrument. The exact magnitude of the effect that some of these factors have on the value of an option is still unsettled. However traders need some model, to guide them in deciding whether an option is properly valued. Many traders use some version of the Black-Scholes model. A few use more complicated models, such as the model developed by Cox, Ross and Rubinstein. Are these more complex models actually better? This study attempts to find out.

Whatever models traders use, their purpose is to estimate the (unknown) intrinsic value of an option. If this value is greater than the (known) current market price, they would want to buy; if it is less than the current market price, they would want to sell. Thus a good model is one that gives profitable buy and sell signals. This study co
buying and selling according to the signals generated by both the Black-Scholes and the Cox-Ross-Rubinstein models. The profits generated by each model are then compared. If the Cox-Ross-Rubinstein model is actually better, it should generate greater profits.