ABSTRACT

Although interest rate derivatives are traded in large volumes every day, this product is not so well known to most people. Swaption is a combination of two derivatives, namely swaps and options. Swaption can optimize the profit, and minimize the risk of loss by giving an option to the owner to enter the swap (in this case interest rate swap), to be able to change the interest rate from fixed to floating or vice versa at the specified time (maturity), without any obligation to execute such swaption contracts. Therefore, a method is needed to predict the interest rate in order to minimize the risk obtained due to changes in interest rates are not stabilized. Black and Hull-White model will then be modeled using Monte Carlo method.

In this final project Black and Hull-White model will be modeled using Monte Carlo method.

Keywords : swaption, interest rate swap, option, monte carlo, Hull-white one factor