Optimal Consumption and Savings with Switching Preferences for Assets

Weidong Tian

Belk College of Business, University of North Carolina at Charlotte, Charlotte, NC 28269. Tel.: 704-687-7702, Email: wtian1@uncc.edu, University of North Carolina at Charlotte.
Optimal Consumption and Savings with Switching Preferences for Assets

Abstract

This paper develops a model on an investor with preferences for different asset class during vary investment period. For an investor with preferences for stock when he is relatively young and preferences for cash after, the model generates a hump-shaped investment curve on the stock. The paper demonstrates that the investor optimally switches preference for different asset rather stay with one asset class. The optimal saving and investment strategies are derived analytically, and these strategies support the construction of the glide path in conventional target-date funds. The paper further explicitly characterizes the consumption-saving rule, the portfolio performance, and the slop of the glide path. However, by switching the preference for different asset, an significant jump occurred on the position across the asset class, the consumption-wealth ratio, the expected return and volatility of the portfolio at the endogenous switching time, which could lead to risk management issues on both the investor level and the market level.

Keywords: Life-Cycle Pattern, Preference for Assets, Optimal Switching Time, Jump

JEL Classification Codes: G12, G13.