



## Rainbow Connection (*Getting the largest pot of gold*)

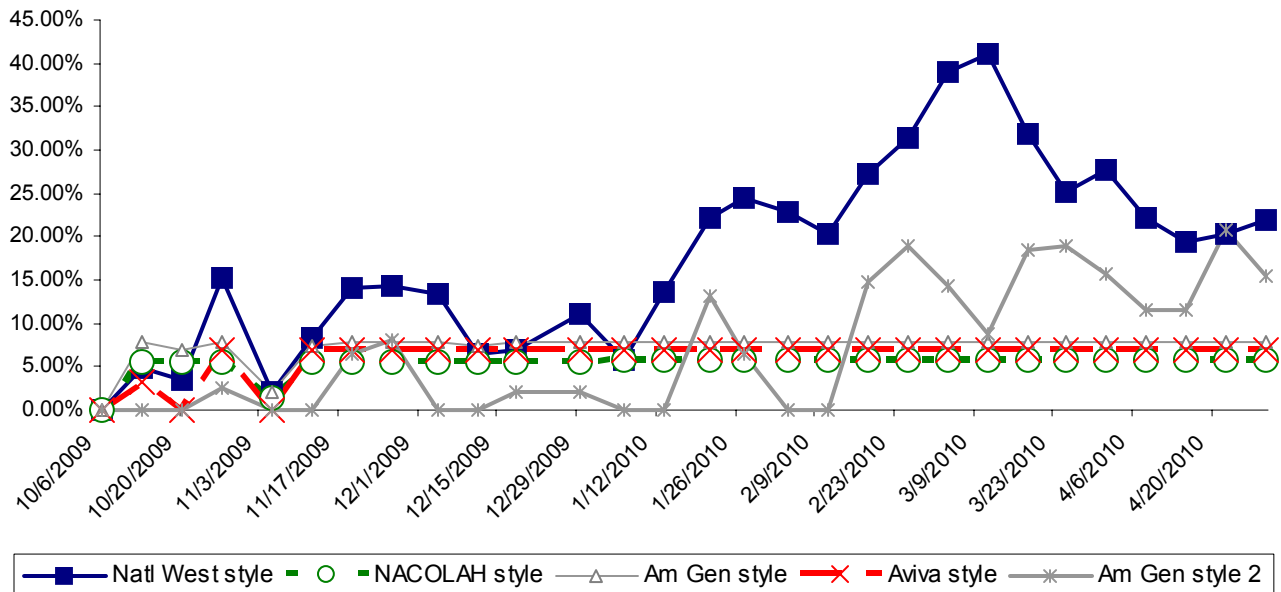
The rainbow crediting method launched towards the end of 2007. Unfortunately the launch coincided with the tail of the previous bull market and annuitybuyers selecting the rainbow method in 2007 and much of 2008 received the same zero returns as other indexed methods. However, as the stock market rebounded in 2009 the rainbow began to show its performance colors and this article looks at the relative performance of the different rainbow methods first reviewed two years ago.

The rainbow method is an option basket whose best-performing indices are weighted more heavily than those that perform less well. It is always a "look-back" because the money is allocated based on the ranking of the performance after the period is over. Rainbows are always index blends, but not all index blends are rainbows. The difference is blended methods state at the beginning what the percentage make-up is of the indices in the blend, but the rainbow method combination is based on the returns calculated with the largest portion going to the best performers. The Rainbow marketing appeal has been expressed by saying that the annuitybuyer gets to bet on the race after it has been run and that most of the bet will be put down on the horses that "win or place."

In my earlier look I said that if the choice was between the S&P 500 method with a cap and a rainbow method with a higher cap that I would pick the rainbow method every time – and I still feel that way. However, I noted that capping the rainbow return somewhat defeats the main attraction of using the method – it'd be like picking the winning horses after the race but being limited to a \$2 bet.

The other point raised was that of correlation, or how closely one index tracks another. For example, the S&P 500 and Dow Jones Industrial Average have over 99% correlation over the last 50 years. If your goal is diversity in returns it doesn't make sense to put together indices that move the same way. My feeling is if you are using the rainbow method you should attempt indices that have the lowest correlation because one might hit a home run. Sure, one index could be a stinker, but the lowest performer is given the least weight thus the impact is minimized.

Hypothetical Rainbow Returns



I examined rainbow products from American General, Aviva, National Western and North American Company. I took the highest rates and caps I could find for the carrier's rainbow method for each time period and calculated returns for yearly periods ending every week from October 2009 through April 2010. The reason for starting with the first week of October 2008 to October 2009 was previous annual returns were all zeros. The last return is calculated from 29 April 2009 to 29 April 2010.

### **Rainbow Styles**

The chart shows returns resulting from the rainbow crediting method style of the carrier and are not actual returns. The hypothetical returns used the following assumptions:

#### American General

The S&P 500, Dow Jones Eurostoxx 50, and Nikkei 225 are allocated 50%/30%/20% at look-back. Style 1 uses 40% of annual gain up to a 7.75% cap. Style 2 uses a 2.85% monthly cap.

#### Aviva

The S&P 500, Nasdaq-100 and Dow Jones Industrial Average are allocated 50%/30%/20% at look-back. The style uses 100% of annual gain up to 7%. Aviva also offered a monthly averaging rainbow with a 5% yield spread in October 2008 that increased later that fall to a 10% yield spread that still would have produced double digit returns in 2010, but the yield spread option was withdrawn on 2 January 2009.

#### NACOLAH

The S&P 500, Dow Jones Eurostoxx 50, and Russell 2000 are allocated 50%/30%/20% at look-back. The results assume 45% of annual gain up to a 5.5% cap for 2009 and a 5.75% cap for 2010 returns.

#### National Western

The S&P 500, Dow Jones Eurostoxx 50, Hang Seng and Nikkei 225 are allocated 40%/30%/20%/10% at look-back. The method uses 80% monthly averaging less a 1.5% yield spread.

### **Results**

The National Western style won hands down. If you had purchased a National Western rainbow method index annuity every week beginning in October 2008 your average annual return through April 2010 was 17.8% based on these assumptions. The capped products returned 5% to 7%.

The reasons for National Western's exceptional performance are no cap and combining indices that tend to zig when the others zag. The other reason is the market rapidly recovered from a severe downturn that National Western's crediting style could take advantage of.

### **Comments**

In more modest market periods the annual point-to-point (APP) cap design should outperform the monthly average less spread method. Averaging drives returns to the middle and in a modest market capped APP returns will modestly beat uncapped averaging. However, I submit the reason you choose a rainbow method in the first place is you're trying to win the race by picking the long shot and maybe turning your \$2 into \$10, and not merely to pick the favored horse to show and win \$2.10. I like uncapped methods when looking for the possible pot of gold at the end of rainbow.