

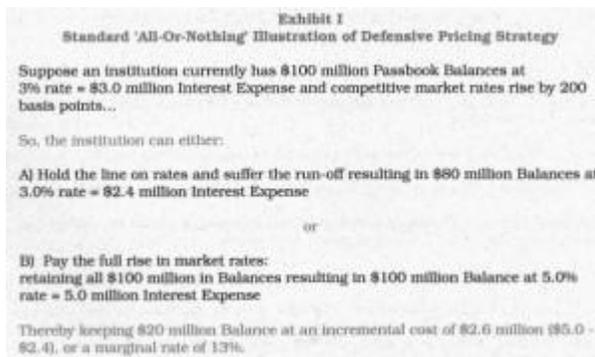


Everybody agrees that the rates on retail deposits are likely to react sluggishly to rising money market rates, precisely because of the exorbitant marginal cost associated with raising the rates paid for existing balances. This sluggish pricing response will be especially likely, given the amount of otherwise rate-sensitive balances residing in both passbooks and transaction accounts. After all, with interest rates as low as they are, liquidity has such a reduced opportunity cost that potentially rate-sensitive CD money is lying on top of core deposit balances, like oil on water. And when rising money market rates ignite competitive fires, most institutions will be content to let the rate-sensitive money %burn-off,+once again isolating the less rate-sensitive core deposit balance.

So, for the purposes of our example, let's assume that competitive rates on retail deposit products increase enough for our institution to expect it to require a 200 basis point increase in the passbook rate, back to 5.0%, for it to be able to retain 100% of the \$100 million in passbook balances.

The institution further speculates, using the core deposit decay rate methodology, (described by Tom Farin in this management report) that to leave passbook rates at 3.0% would result in the loss of \$20 million in balances.

Exhibit I shows the institution facing two alternatives: (a) leave the rate at 3.0%, suffer account erosion of \$20 million, leaving \$80 million on which it'd be paying an annualized expense of \$2.4 million, or (b) raise the rate to 5.0%, the full extent necessary to retain all \$100 million in balances, at an annualized cost of \$5.0 million.



The net impact on the institution of raising the rate to 5.0% would be for it to experience a %marginal+or %incremental+or %additional+cost (you choose the adjective that you're comfortable with) of \$2.6 million for the \$20 million in balances that it was able to keep from walking out. Now this \$2.6 million of additional interest cost on \$20 million in additional balances represents a marginal cost of 13%!

We're reminded that this high marginal interest expense is composed of the \$1.6 million (2.0% x \$80 million) paid to keep existing balances that could have been kept without the rate increase, added to the \$1.0 million (5.0% x \$20 million) expense of the new money. The resulting 13% cost of new money from raising retail rates on this account serves as a target or break-even rate that has to be exceeded by available asset yields, or reduced by choosing cheaper alternative funding sources. Otherwise, the profitability of the institution will clearly suffer. However, the institution certainly faces more than two alternatives.

### Introducing 'Marginal! Marginal' Analysis

Most institutions will react cautiously to increases in competitive deposit rates. Nevertheless, they will increase their own deposit rates somewhat.

SOMEWHAT? you say. What's the term 'somewhat' supposed to mean?

Well, I'm expecting that institutions will raise their rates by the smallest amount necessary to retain the most balances. After all isn't this what all that service, convenience, and other non-rate features, which you provide are supposed to be getting you, a little less rate-sensitive depositor? Or perhaps, it's just that the average balances are low enough to water-down the effects of rate changes on transaction accounts, especially when compared to fees. Let's look at Exhibit II for an example.

In part A of Exhibit II, let's suppose that our institution raises its passbook rates from 3.0% to 3.5% in response to a competitive rate increase of 200 basis points. So, instead of suffering the run-off of \$20 million, it retains \$5 million, winding up with balances of \$85 million, costing it \$2.975 million in interest expense. The incremental interest expense of the \$5 million it retained is \$575,000 that is a marginal rate of 11.5%. This is certainly a little better than the 13% marginal cost the institution would have incurred in the base case shown in Exhibit I, but that's no longer a relevant comparison.

**Exhibit IIA**  
**Defensive Pricing Given Initial Retail Price Response:**  
**The 'Marginal/Marginal' Illustration**

Part A

Our institution actually increases its rate from 3% to 3.5% keeping \$5 million and changing its situation

from: \$80 million balances times 3% rate = \$2.4 million interest expense  
to: \$85 million balances times 3.5 % rate = \$2.975 million interest expense

Resulting in the retention of \$5.0 million in balances at an incremental interest expense of \$575,000 for a marginal rate of 11.5%. Which means...

Marginal/Marginal Calculation:

If the institution could have retained \$5 million through this move in retail rates to 3.5% then to have 'gone all the way' to 5.0% would have netted an additional \$15 million (\$100m - \$85m) at an additional cost of \$2.025m (\$5.0m - \$2.975m) or a marginal rate of 13.5%.

You see, if the institution really could have kept \$5 million by moving to a rate of 3.5%. It would have netted only another \$15 million by going all the way to 5.0%. Thus, the additional \$15 million would have cost an additional \$2.025 million, (\$5.0 million . \$2.975 million) or a marginal rate of 13.5%! The correct comparison should be between the cost of the balances you do retain by moving your retail prices, and the cost of the full market adjustment, that is the cost of going all the way with retail rates to purchase all the liability funding required by the institution.

The fact is, the marginal cost of retail deposits after an initial price adjustment, (the marginal cost, to coin a term) increases proportionately with the success of the initial price adjustment in retaining balances.



Part B of Exhibit II shows what happens if the increase in rates to 3.5% serves to retain \$10 million of the potential \$20 million run-off. The institution pays \$3.15 million on the resulting \$90 million in balances, instead of \$2.4 million that it would have paid on \$80 million. This incremental interest expense of \$750,000 on \$10 million represents a marginal rate of 7.5%. Quite an improvement. But my gosh, just look at the incredible incremental cost the institution would have to bear to retain the whole \$100 million by moving retail rates all the way to 5.0%! The institution would have paid an additional \$1.85 million (\$5.0 million . \$3.15 million) for the additional \$10 million in balances, or a marginal rate of 18.5%! Part C of Exhibit II makes our point in spades. The initial price increase to 3.5% kept \$15 million of the balances at an incremental interest expense of \$925,000, or a marginal rate of 6.16%. For the institution to pay the full 2.0% movement in market rates, suffering the additional expense of \$1.675 million (5.0 million . \$3.325 million) for the last \$5.0 million in balances, would have cost it 33.5%! While it may seem ironic, the less rate sensitive an institution's core depositors, the more it makes sense for that institution to make use of the wholesale funding markets at the margin.

Absolutely no way does it make financial sense to pay-up for that last retail dollar. Even if an institution isn't growing, but merely maintaining its size, or shrinking, it shouldn't pay the retail rates necessary to fund itself completely with retail deposits. There's always room for wholesale funding at the margin in a retail depository institution. That's why excess liquidity at an institution is not a sufficient excuse to avoid borrowing. Whatever the institution's asset structure, wholesale funding is a tactic to reduce the cost of funding the institution at the margin.

Actually, wholesale funding only represents one convenient method to pay for new money and not increase the rates on existing balances. Institutions are continually searching for ways to accomplish the same end, by introducing new types of retail accounts. But even granting considerable ingenuity in designing retail accounts, wholesale funding always represents a profitable funding alternative that needs to be considered by every financial institution.

And finally, all you financial institutions who are going to have to focus on maintaining, even increasing, the market value of core deposits, should recognize that defensive pricing strategies accomplish this critical objective. Maximizing the market value of deposits is synonymous with minimizing the marginal cost of these deposits, period.

So price inefficiently if you choose to. But both you and your board should recognize the true cost of doing so. And you know, I'm not so sure that any institution would choose to price inefficiently if the choices are explained appropriately.

Explain them.