Commercial banking and finance

Finance, Banking

There are two reasons why income would affect demand. First, an expansion of the economy and an increase in income cause the wealth to increase, pushing the people to want to hold more goods as a store of value. Second, people will use these goods to carry out more transactions which will also lead to their possession of more goods. It can be inferred that the direct relationship between income and demand shifts the demand curve to the right (Mishkin 1989).

People care about the amount ofmoneyor goods they hold in real terms. But that quantity of goods becomes no longer as valuable as the price of, say, oranges increases. It cannot be used to purchase as many a certain number of oranges as it could before the occasion of the price hike. This shifts the demand function for oranges to the left and the demand for more goods to the right to restore the people’s holdings of money in real terms to its former level.

Concept Map

(1. 1) There is no truth to the notion that debtfinanceand equity finance are similar to one another. Both may involve an issuer who takes a risk in proliferating the borrowed funds but the relationships are different worlds from one another. In debt Finance, the borrower issues a debt instrument under legal agreement to pay the saver (lender) fixed dollar amounts plus interest until a specified date when the final payment is made (Mishkin 1989). Inequity finance, the business sector issues ownership of the firm to investors, both receiving payments that depend on the profits of the firm (Taylor 1995). Moreover, equities do not have an expiration or maturity date.

(1. 2) The fact that indirect financing allows the transfer of funds to flow through some kind of go-betweens does not render it entirely similar to direct financing. Indirect financing frees the savers and borrowers from any legal liabilities with each other and passes the burden to intermediaries. Conversely, direct financing involves a legal commitment that obliges the borrower to pay the lender certain amounts plus interest come maturity date.

(1. 3) Not all go-betweens are intermediaries. Although such go-betweens as brokers, dealers, and merchant banks bring the lenders and borrowers together, they do not necessarily split the legal commitment between the two but merely serve as conduits of the securities. Intermediaries are legally committed to savers, and in turn, borrowers have legal liability with the intermediaries.

(1. 4) Although finance can be accessed directly in the money market, there are many more advantages when obtaining it from banks, which makes them special. Intermediaries provide high-interest income for savers and help small borrowers get the loans they would otherwise not get. More funds are also made available to large borrowers in the money market courtesy of intermediation. These are the things that could not probably be achieved by indirect financing (Mishkin 1989).

(1. 5) However conceptually similar in the task of bringing buyers and sellers together, brokers and dealers are quite apart from how they act as go-betweens. Brokers serve to match buyers with sellers and get paid with brokerage commissions. On the other hand, dealers engage in a buy-and-sell

manner. They buy securities from sellers and sell them to buyers for a slightly higher price than they paid for them. In short, dealers hold inventories of instruments.

(1. 6) Although most banks hold reserves in the form of currency, which is also called vault cash, the funds they acquire as deposits likewise form part of the reserves.

(2. 1) Notes do not carry a coupon payment in the same way that bonds are not offered at discount. The reverse is true. Bonds carry coupon payments paid to the owner of the bond annually until the maturity date. Also, notes are issued at discount without interest.

(2. 2) There is no similarity between coupon payment and coupon rate however both are directly related to bond. The coupon payment is a fixed interest payment paid to the owner of the bond every year while the coupon rate is the dollar amount of the annual coupon payment expressed as a percentage of the face value of the bond (Henderson 1991).

(2. 3) In direct finance, borrowers sell securities or financial instruments, and lenders buy them. Securities then become the lender’s claims on the future income or asset of the borrowers, making them the assets of the lenders and liabilities of the borrowers.

(2. 4) The price of a bond is its present value (PV) in the secondary market which is equal to the sum of its discounted coupon payments according to the formula PV = Σ[CFt/(1+R)t].

(2. 5) The formula used for calculating the price of a bond is identical with that of the consol, which describes the calculation of the yield to maturity.

(3. 1) All market rates of interest rates are equivalent to the pure, or base, rate of interest if and only if there is no risk premium, that is, inflation risk, liquidity risk, and default risk are equal to zero.

(3. 2) Following the formula for determining the net present value, NPV = PVk – Ck, the project is unprofitable since the PV of the capital project, PVk, is less than the cost of capital, Ck. Generally, if rates fall to 10% pa the project becomes profitable because of the inverse relationship between rates and PV. This is the same relationship that rates have with business demand for capital goods. When projects become profitable due to a fall in rates, the business demand for capital goods increases.

(3. 3) Despite the inverse relationship between rates of interest and demand for capital goods, savings remain unaffected by rates because of the 1: 1 ratio of lender and borrower. The rise in rates does not give incentives to save more.

(3. 4) The RBA does not shift the cash rate to a new target. What it does is to target the cash rate itself because this affects the other rates. It follows, then, that ESA funds do not vary at all. An increase in the supply of bank reserves lowers the Fed rate, which shifts the function of the supply of reserves to the right.

(3. 5) It is not always safe to disqualify the distinction between current yields and yields to maturity. Although the current yield is a close approximation

for the yield to maturity in a long-term coupon bond, the relationship does not easily apply to a shorter time to maturity of the same (Mishkin 1989).

(3. 6) The yield curve depicts the level of interest rate over time and can be used to infer default risk. When you expect rates to rise, the price of securities would fall.

(4. 1) Notes, bonds, and equity held by any investors are not entirely free of major risks even though they can be sold very quickly in the secondary market. Financial assets that are bound to be sold at some later time face the risk that their price might fall.

(4. 2) There is no general prescription as to what contract, futures or forward, to take to protect the firm from probable changes in rates in the future. Either way, the financial futures market, and the forward market can enable both buyers and sellers of contracts to hedge against the risks of interest rates. That is particularly so because the forward market performs like the futures market and prices of contracts in the two markets are almost identical. However, forward differs in futures in that the latter is an organized exchange while the former is organized by banks over the counter. Moreover, available contracts in the futures are standardized. Finally, the futures market requires a settlement of any gains or losses in the price of the contract at the end of each trading day (Mishkin 1989).

(4. 3a) The best futures strategy the shirt manufacturer could employ is to lock in the purchasing price of a bale of cotton to $1, 500 before it rises and the selling price of a shirt to $20 before it falls. In this manner, the shirt

manufacturer could protect him from future changes in rates that might wreak a domino effect on the price of the contracts.

(4. 3b) The gain on the futures trade when the manufacturer closes out at $1, 650 would be $100, which is enough to cover the increase in the spot price of cotton. But even if the futures price increased only up to $1, 600, there would still have been again on the trade, though it is only half of the gain needed to cover the increase in the spot price.

(4. 4a) The wheat farmer should set up closing out a strategy to lock in the price of wheat to $90 before it might fall at some later time.

(4. 4b) The gain on the futures trade when the farmer closes out at $70 would be $10, enough to cover the decrease in the spot price of wheat. There would still be again on the futures trade if the price of wheat futures decreased to $75, but this is not enough to cover the decrease in the spot price.

(4. 5a) The best hedging strategy for this case is to sell five $100, 000 IRFs contracts now for $98 per $100 FV and closeout prior to expiration by buying IRFs for 94$. Gain on the future trade at the end of closing out is $4, 000 and on the trade, itself is $20, 000, which can offset a decrease in the spot price for bonds.

(4. 5b) if the price on IRFs fell from $98 to $96 per $100 FV, the gain on the futures trade would be $2000, half of the gain if the price on IRFs was $98 per $100 FV.

(4. 5c) The hedging strategy does not change if the corporation expects interest rates to increase.

(4. 6a) The best hedging strategy for this case is to buy four $50, 000 IRFs contracts now for $98 per $100 FV and closeout later at $99 per $100 FV. The corporation bought $49, 000 IRFs and sold them for $49, 500. The gain on each IRFs contract is $500. The total gain is $2000.

(4. 6b) The gain on the futures strategy if the price on IRFs was $97 per $100 FV and increased to $99 per $100 FV would be $1000.

(4. 6c) The hedging strategy would not change if the corporation expects interest rates to decrease.

(4. 7a) If interest rates increase, the corporation will face the risk of a decrease in the price of the bond sold.

(4. 7b) The conclusion above would not change even if the maturity of the bond the corporation purchased is longer than the one it has issued.

(5. 1) The notation NI = NII + B speaks of the net income, where NII is net interest income and B is a burden that can be thought of as net non-interest income. If we add PLL to the equation returns can be expected.

(5. 2) Banks basically expand their profits from the returns they get from loans. A loan is a liability for the individual or corporation receiving it, but an asset for a bank because of the income it generates. However, loans are less liquid than other assets because they have to mature first before turning into

cash. Loans also have a higher probability of default than other assets. For these reasons, banks earn their highest profit on loans (1989: 167).

(5. 3a) The simple condition of marginal cost, from being equivalent to the rate of interest on deposit liabilities, is greatly altered upon the addition of non-interest expenses because, in reality, acquiring and maintaining deposits require additional labor time so that operating costs cannot be neglected.

(5. 3b) The marginal cost of funds, given I = 2% pa, servicing and acquisition costs = 4% pa, and non-earning assets = 12%, is equal to 0. 0655.

(5. 3c) In this case, the return is not the interest rates charged on bank advances, but an expected marginal return, E (r) = ? (1+r), where ? is the probable marginal return on non-defaulting performing loans. The marginal return now equals the marginal cost.

(5. 4a) It is true that the second bank is safer because it holds $5m more equity than the other bank. That is so because more of the assets of bank 2 are protected by equity such that it can absorb $15m of its assets when defaulting, while bank 1 can only absorb $10m of its assets on a similar occasion.

(5. 4b) Equity finance is not remarkably more expensive than debt finance. So banks cannot afford to hold low levels of equity because the share of profit in this market is evenly distributed to all holders, as opposed to interest rates paid in debt financing.

(5. 4c) Return on equity (ROE), equity multiplier (EM), and the return on assets (ROA) are interrelated with each other. ROA and EM are components of ROE.

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