

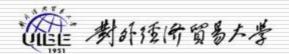
Chapter 6

Managing Liabilities

Composition of Bank Liabilities

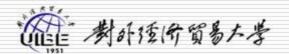
Different types of liabilities

- Interest-bearing and non-interest-bearing
- Transaction accounts:
 - Low explicit interest rates
 - □ High non-interest processing costs
- Other accounts:
 - Limited check writing capabilities
 - Higher rates
- Liabilities with long-term fixed maturities
 - Highest interest rates
 - Lowest non-interest transaction



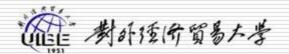
Prior to 1960

- Banks relied on standardized demand and savings deposits as their primary source of funds.
- Gov't determined allowable interest rates, and all banks paid the maximum.
- Banks compete for funds only by differentiating the quality of service and paying implicit interest.
- Primary strategy: office and branches.



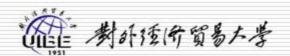
From 1961 on

- 1961: Citibank, CD
- Market rate fell below the ceiling.
- Other market rate instruments emerged.
- Today, virtually all bank liabilities are free of regulatory restrictions on allowable rates, maturities, and minimum denominations.
 - Banks can offer any deposit product.
 - Price competition is the dominant consideration.



Problems created by the freedom

- Customers have become much more rate conscious: interest elastic.
- Customers prefer shorter-term deposits strongly: lower interest rate risk.
 - Liabilities become more rate sensitive
 - Pricing assets becomes more difficult



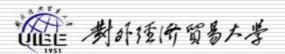
Recent trends

□ For all banks (compared with 1992):

- Fewer total deposits, transaction accounts, and core retail deposits
- More time deposits (CDs) and equity.

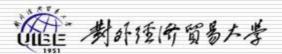
Large banks:

- Fewer transactions accounts, large time deposits and equity
- More MMDAs, foreign deposits, and other borrowings



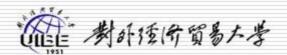
Core deposits

- They are stable deposits that customers are less likely to move when interest rates on competing investments rise.
 - Not rate sensitive as large-denomination purchased (volatile) liabilities.
 - Influenced more by location, availability, price of services.
 - For large banks, core deposits/total assets: 51%→42% (from 1992 to 2001)



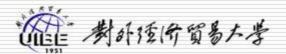
Volatile liabilities

- Purchased funds from rate-sensitive investors
- They will move their funds
 - If other institutions pay higher rates
 - If it is rumored that the bank has financial difficulties
- With more such liabilities (34% v.s. 15%), larger banks are paying market rates on a greater proportion, with less customer loyalty and thus greater liquidity risk.



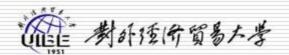
Cost of funds

- Competitive pressures pushed the average cost of funds between small banks and large banks to be comparable.
- While small banks' overall costs of interestbearing deposits was 69 basis points higher, they paid lower rates on transaction costs and on hot money sources.
- Small banks' overall cost of interestbearing funds was 45 bp higher than large banks.



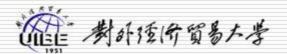
Small denomination liabilities

- Under \$100,000 (v.s. multiples of \$1 million)
 - Normally held by individual investors
 - Not actively trade in the secondary market.
- Transactions accounts
 - Demand deposits
 - Interest-checking
 - Negotiable orders of withdrawal, NOWs
 - Automatic transfers from savings, ATS
 - Money market deposit accounts, MMDA
- Banks differentiate between deposits in the number of checks permitted, minimum denomination required, and the interest paid.



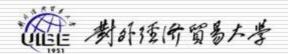
Service charges

- For many years banks priced checkhandling services below cost, because banks paid below-market rates on most deposits.
- This low interest subsidy implicitly covered the losses. 20% customers subsidize 80%.
- Because banks now pay market rates on deposits, they want all customers to pay at least what the services cost.
- Many banks have unbundled services and price each separately.



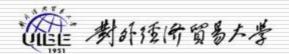
Large denomination liabilities

- Funds purchased in the money markets.
- Denominated in \$1 million multiples.
- Because customers move their investments on the basis of small rate differentials, these funds are labeled "hot money", volatile liabilities, or short-term noncore funding.
- Jumbo CDs (CDs over \$100,000) Federal Funds Purchased Security Repurchase Agreements



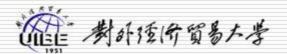
Jumbo CDs

- Brokered deposits
 - Indirectly sold through dealers and brokers
- Variable-rate CDs
 - renegotiated every three months
- Callable CDs
 - Long-term. Worry about rate falling
- Zero coupon CDs
 - Sold at a steep discount
- Stock market indexed CDs
 - yields linked to a stock market index



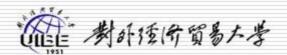
Federal funds purchased

- Federal funds: unsecured short-term loans that are settled in immediately available funds.
- They encompass transactions outside the arena of bank reserve trading by including any participant that holds large balances at FRBs or collected liabilities at depository institutions.
- Most transactions are overnight loans.
- Federal funds rate is a key target variable for the monetary policy.



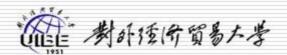
Security repurchase agreements

- RPs (or repos) are short-term loans secured by gov't securities that are settled in immediately available funds.
- They are virtually identical to federal funds in function and form except they are collateralized.
- Technically, the loans embody a sale of securities with a simultaneous agreement to buy them back later (often the next day) at a fixed price plus accrued interest.



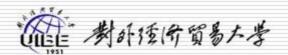
Funding costs and banking risk

- Banks face two fundamental problems in managing their liabilities
 - Uncertainty over what rates they must pay to retain and attract funds.
 - Uncertainty over the likelihood that customers will withdraw their money regardless of rates.
- The basic fear is that they will be vulnerable to a liquidity crisis arising from unanticipated deposit withdrawals.



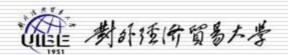
Rates regulation and liquidity

- When deposits rates were regulated and banks paid the maximum rates allowed, deposits were relatively stable and liquidity was less a problem.
- Interest rate deregulation and bank competition have since increased depositors' rate awareness so that many individuals and firms move funds to institutions paying the highest rates.
- Customer loyalty is closely tied to deposit size and the quality of bank service.



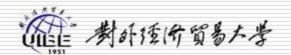
Funding Costs and Banking Risk

- Funding Sources and Interest Rate Risk
- Funding Sources and Liquidity Risk
 Funding Sources and Credit Risk
 Funding Sources and Bank Safety



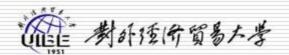
Interest rate risk

- More borrowed funds with shorter maturity
- Increased rate sensitivity of liabilities
- Banks: two measures
 - Pay premiums (incl. attracting core deposits)
 - Reprice liabilities more frequently



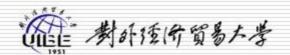
Liquidity risk

- Customer-driven
- Competition-driven
- What can banks do?
 - Monitor potential deposit outflows
 - Periodically contact large depositors
 - Understand (and change) the interest elasticity
 - Build a liquidity buffer



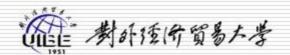
Credit risk & bank safety

- □ Asset quality is forced to be reduced.
 - Riskier loans
 - More important for small banks
- Lowered traditional earnings
 - Slows capital growth and increases leverage ratio
 - Borrowing costs increase



Federal deposit insurance

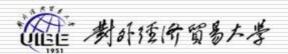
- The Banking Act of 1933
- Insurance funds
 - Funded via premiums paid by member banks
- Objectives of deposit insurance
 - Prevent liquidity crises
 - Protect depositors of modest means



Handling Problem Banks

□ FDIC has five basic options:

- Purchase and assumption
- Open bank assistance
- Insured deposit assumption or transfer
- Bridge bank
- Payout option
- Minimize the costs
- Payouts: small banks
- Large banks: purchase and assumption
 - Going concern value



Thank You Very Much for Your Kind Attention!

