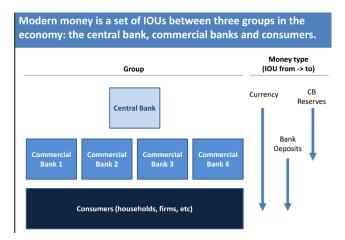
The Evolution of Money – Money has no inherent value, it is a feedback loop with trust in value.

Double coincidence of wants: makes barter inefficient as is requires each party to trade something that the other party wants.

Money plays three roles:

- 1. Medium of Exchange: Solves need for a 'double coincidence of wants' before exchange takes place. Requires everyone to accept money with trust and confidence.
- 2. Unit of account: money should be used to measure the value of goods (divisible), it makes sense if it is also the medium of exchange.
- 3. Store of value: money should be able to hold wealth from one period to the next (doesn't disintegrate)

Types of Money in the modern economy:



Currency i.e. notes and coins are IOUs from the central bank to households

Bank deposits are IOUS from commercial banks to consumers. An electronic number is displayed on screen after a deposit. They are help as they are more convenient than cash, safer than cash and earn interest (term deposits).

Central Bank Reserves are IOUS from the central bank to commercial banks. They settle transactions between banks. i.e. electronic numbers on screen are equivalent to banks holding cash in a vault.

Fractional reserve banking: if commercial banks are only required to hold 10% in reserves, the rest can be loaned out for higher interest. The interest paid on deposits is less than the interest earned on reserves and loans, which is how banks make money. In equilibrium the 90% loaned to farmers is spend so ends back in banks as more deposits, which can be loaned.

Bank Reserves: reserve of cash kept by banks to meet their customers' demands to withdraw deposits

Bank deposits = bank reserves/ (desired reserve – deposit ratio)

2. The extra deposits end up in reserves, which can be loaned out again.

1. The \$900,000 loaned to farmers ends up as extra deposits in commercial banks

 TABLE 7.5
 Consolidated balance sheet of Gorgonzolan commercial banks after guilders are redeposited

ASSETS		LIABILITIES	
Currency (= reserves)	1 000 000 guilders	Deposits	1 900 000 guilders
Loans to farmers	900 000 guilders		

The multiplier effect of the economy means not everything ends up as bank deposits and the effect of fractional reserves on the money supply is less.

 TABLE 7.7
 Final consolidated balance sheet of Gorgonzolan commercial banks



It does not describe how money is made and destroyed. i.e. money supply changes frequently while reserve requirements change infrequently. The central bank creates and destroyed money by changing the interest rate which affects lending of commercial banks. Unconventional policy may include changing reserve requirements in the future. If interest rates don't work (zero lower bound).

How is money created?

The Central bank controls how many notes and coins are produced. Commercial bank deposits can be created at will by the bank.

When a bank makes a new home loan, it adds electronic numbers to the borrower's account increasing total deposits. Bank gets claim on future mortgage repayments (new loan = asset) while borrower gets more money in their account (new deposit = liability).

The borrower will withdraw electronic numbers as cash (reserve) and give it to the house seller, who deposits with their bank.

The bank has to settle the transactions in cash (reserves), it has less. It must borrow from the central bank at the overnight cash rate (1.5% per annum)

Overnight cash rate: the rate of interest applied to loans in the overnight cash market e.g. an increase in funds in the overnight cash market will make it easier for borrowers to negotiate a lower cash rate than was previously the case >> Lower overnight cash rate.

Should the economy experience a **contractionary gap** the Reserve bank can target a lower overnight cash interest rate, to lower all interest rates, in the expectation that this will increase PAE and return the economy to equilibrium at its potential level of output.

But when all banks lend more they will receive more deposits. This leads to credit booms.