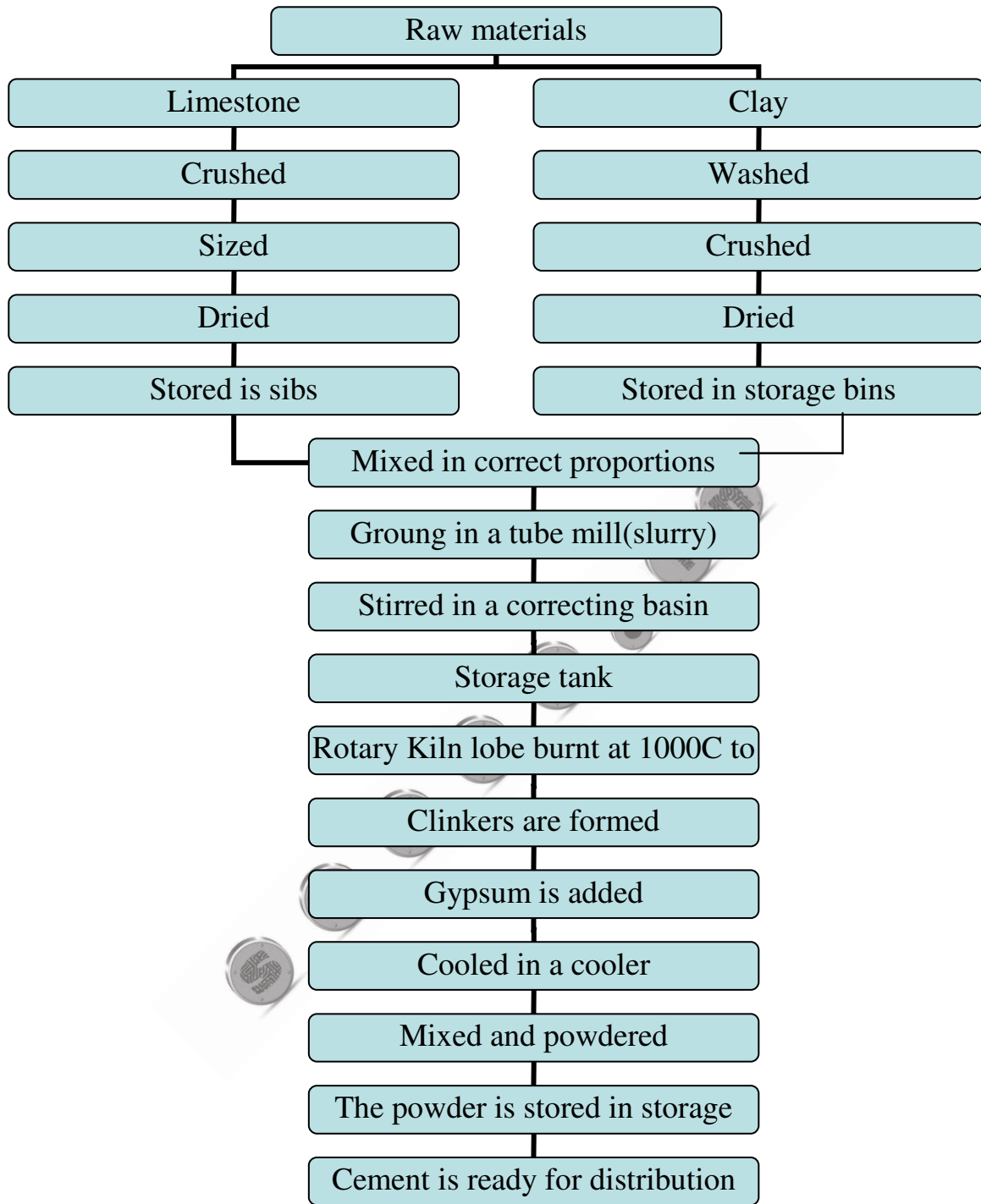


FLOWCHART

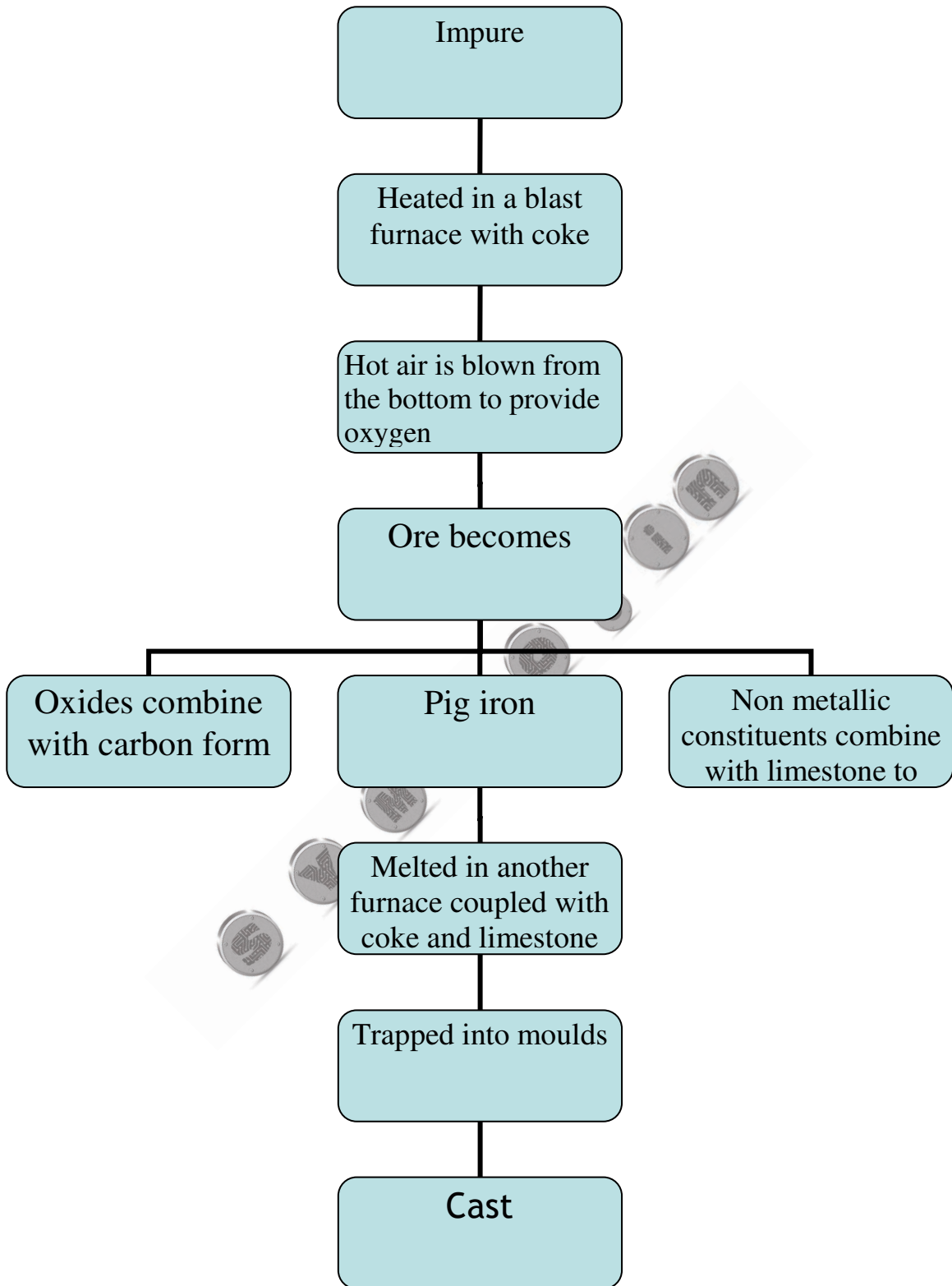
1. Convert the following flow chart into a paragraph of about 150 words.

The process of making cement is described in this flow chart. The two raw materials used in the process are limestone and clay. Limestone is crushed, sized, dried and stored in storage silos. In the same way, Clay is washed, crushed, and dried in storage basins. The two materials are mixed in the correct proportion and ground in a tube mill (This mixture is known as slurry) and stirred in a correcting basin. It is then stored in a storage tank. From there, it is fed into the rotary kiln where it is burnt at a high temperature of 1000 to 1700°C. Here clinkers are formed which are sent to a cooler, to be cooled. At this stage, Gypsum is added to the clinker and this mixture is powdered. The powdered mixture is the finished product, cement, and it is sent to the storage silos ready for distribution.



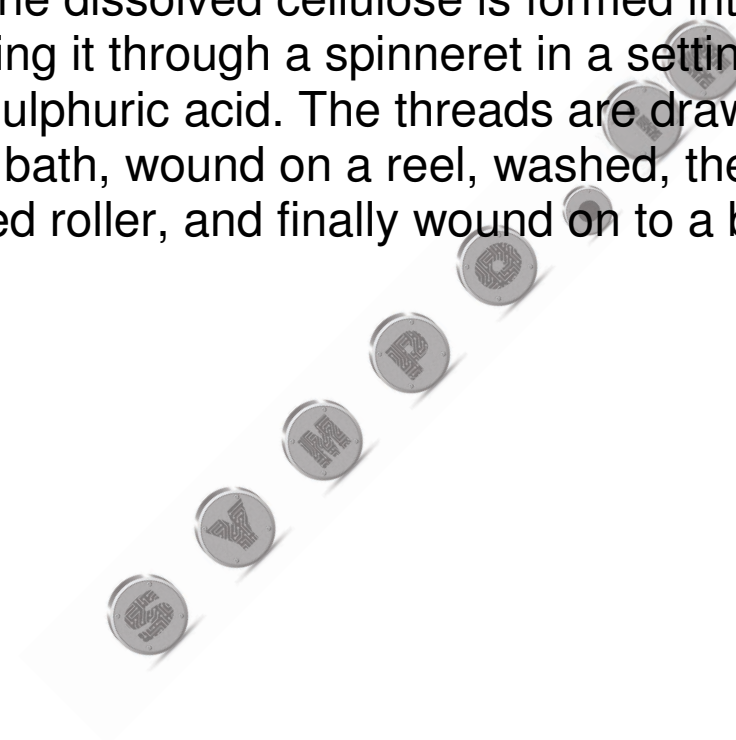
2. Convert the following passage into a flow chart.

The earth contains a large number of metals which are useful to man. One of the most important of these is Iron. The Iron ore which we find on the earth is not pure. It contains some impurities which we must remove by smelting. The process of smelting consists of heating the ore in a blast furnace with coke and limestone and reducing it to metal. Blasts of hot air enter the furnace from the bottom and provide the oxygen which is necessary for the reduction of the ore. The ore becomes molten, and its oxides combine with carbon from the coke. The nonmetallic constituents of the ore combine with limestone to form a liquid slag. This floats on top of the molten iron and passes out of the furnace through a tap. The metal which remains is pig iron. We can melt this again in another furnace – a cupola – with more coke and limestone and tap it out into a ladle or directly into moulds. This is cast iron.

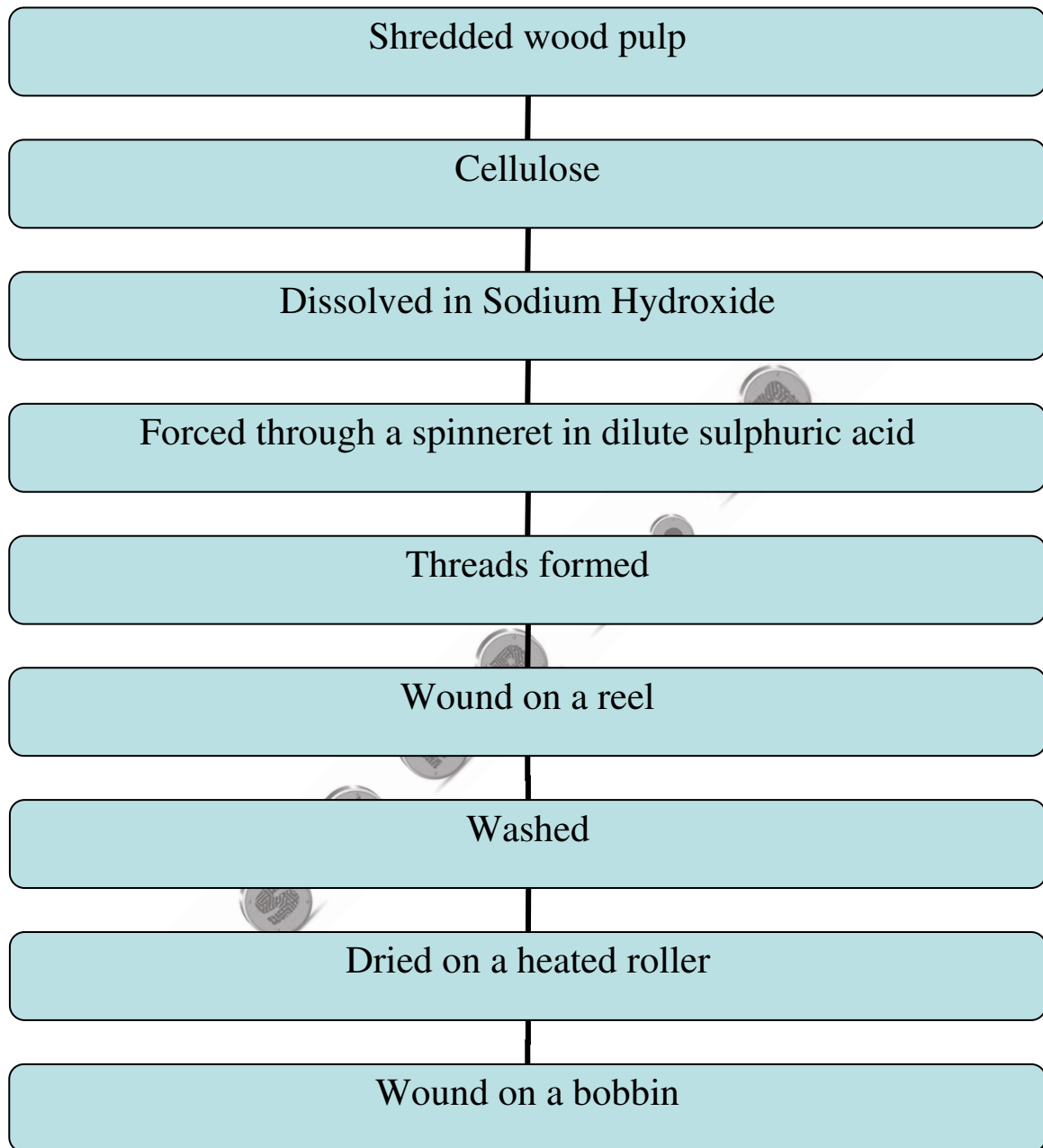


3. Given below is a process description. Read it and draw a flow chart representing the process described.

Rayon is a man-made fibre. It is a reconstituted natural fibre-cellulose. Rayon is made by dissolving cellulose in a solution of sodium hydroxide, or caustic soda. The cellulose is obtained from shredded wood pulp. The dissolved cellulose is formed into threads by forcing it through a spinneret in a setting bath of dilute sulphuric acid. The threads are drawn from the setting bath, wound on a reel, washed, then dried on a heated roller, and finally wound on to a bobbin.

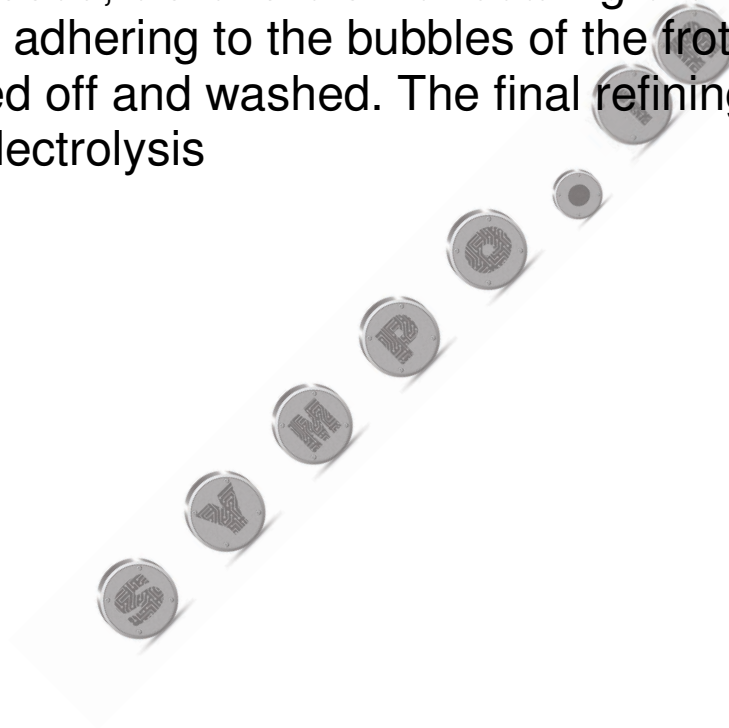


Process of making RAYON

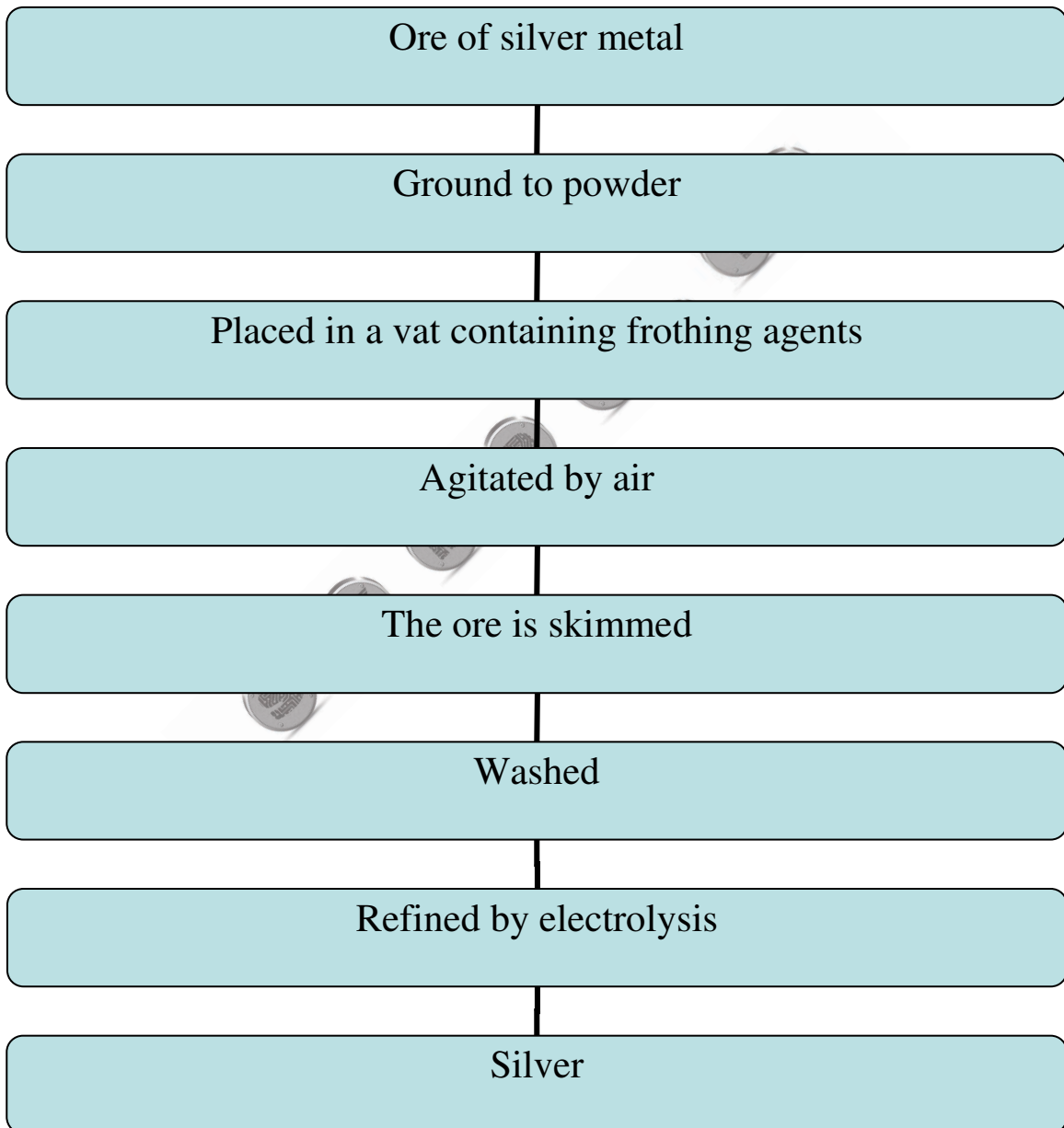


4. Read the following passage carefully. Represent this by means of a flow chart.

Silver occurs in the ores of several metals. The froth process of extracting silver, accounts for about 75% of all silver recovered. Here the ore is ground to a powder, then placed in large vats containing a water suspension of frothing agents, and thoroughly agitated by jets of air. Depending on the agents used, either the silver bearing ore or the gangue adhering to the bubbles of the froth, is skimmed off and washed. The final refining is done using electrolysis



Extraction of silver



5. Using the information provided in the given text, draw a flow chart describing the different stages involved in the making of coins. Remember to give an appropriate title to your flow chart:

Coins are manufactured in a factory known as 'mint'. There are three mints in India: Bombay, Calcutta and Hyderabad. Production of coins at the mints is a complete process. It starts with the buying of unmixed metals and their testing by the Assay Department. Then the metals are alloyed in oil-fired or electric arc furnaces, and cast into ingots 40 cm wide, 15 cm thick and 6 m long. These ingots are reheated until the temperature is hot enough for hot rolling. During this stage, the ingots pass through a series of rollers until they form long, thin sheets which are of the thickness of a coin. From these thin strips, blank discs are punched. These are the basic raw materials for the manufacture of coins. The blanks are heated to soften them, and they are rolled so that the rim is raised. Finally they are stamped with the design of the coin. At every stage, defective pieces are carefully sorted out, and (with the frequent checking and returning points) strict quality control maintained. Rejects are returned to the alloying stage, together with the waste from the alloy strip.

