

1. The definition of terms : (a) Locking Factor (b) Hindered-settling (c) Spiral Separator (d) Autogenous Grinding Mill (e) Paramagnetic. (20%)
2. The purpose of sizing? The definition of particle size? What is major sizing techniques in industry? What is the definition of meshes and standard sieve? (10%)
3. Please describe the grinding circuit and derive the circulation ratio through mass balance. (15%)
4. In flotation operations, please list five major modifiers, and give one example of chemical to describe their usage in five categories? (15%)
5. What is concentration criterion for gravity concentration, and give one example to explain mineral separation? (10%)
6. Describe three main controlling factor of shaking table in detail. (15%)
7. Please describe and illustrate three major effects can be distinguished as contributing to the stratification in jigs. (15%)