

## 4.2.2 Concept 2 – Perlite Removal Machine

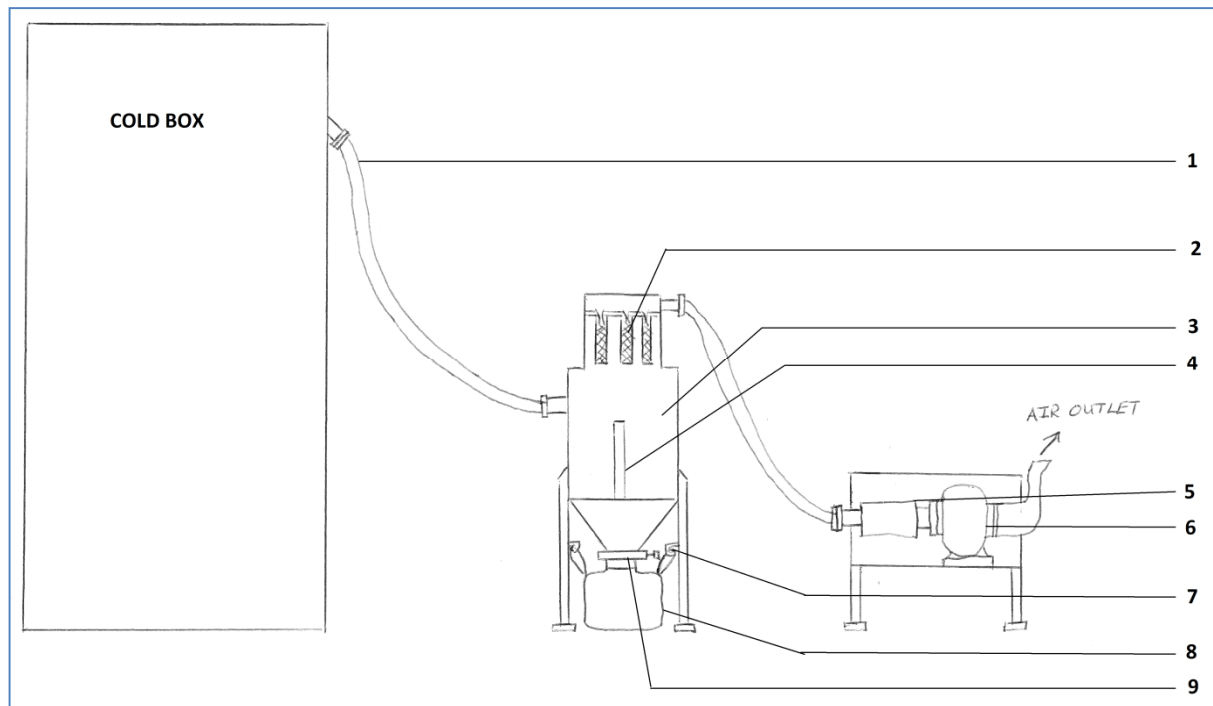


Figure 4-2: Concept 2 – Perlite Removal Machine

### Components of Concept 2:

#### 1. Pipeline

The pipeline will be used to connect the cold box extraction points to the cyclone separator. This will be the conveying route of the perlite.

#### 2. Dust filters

Dust filters will be used to separate the perlite from the conveying air.

#### 3. Storage Hopper

A storage hopper will be used to remove the perlite into from the cold box. Another function of the hopper will be to discharge the removed perlite into bulk storage bags.

#### 4. Level indicator

On the side of the hopper there will be a clear section that will be used to indicate to personnel the level of the perlite inside the hopper. If the perlite reaches a certain point the suction blower will have to be switched off to ensure that the perlite level does not reach the filters, this will serve the purpose to prevent the hopper from