Problem statement for Hackathon 1, Hardware & Software:

1. A bin that consists of materials which is to be weighed on regular basis, and the measured value must be sent to a remote operator for processing.
2. It should also have level indicators for the processing.
3. Indication should be from the bin once reaches the maximum threshold values in both 1&2 cases.
4. The bin should have tracking facility.

Problem statement for Hackathon 2, Software:

1. In our application there are three parties involved a) Cercle Team, b) Client (Bin location), c) Vendor (the recycler)
2. A value is given by the Client (b), the value should be processed as a request and should be sent to the Vendor (c). The request should be sent to Cercleteam(a) also.
3. The Vendor should be selected on some parameters from a list of vendors.
4. The request can be accepted or declined by the vendor.
   - If the vendor accepts the request the following process should be followed.
     I) Vendor should acknowledge pickup
     II) Vendor must provide the Transportation details.
     III) Vendor should acknowledge when received at the Operations plant.
   - If the vendor declines, next vendor in the list should be given request and I&II process continues.

Problem statement for Hackthon 3, Real time tracking,

1. The raised request to the vendor is sent a to a transportation handler (truck driver).
2. Person should schedule the pickup, in the application.
3. There should be alert for the scheduled date and time for the in the same application and the vendor application.
4. Once when trip has been confirmed, the route should be mapped from the driver location to bin location.
5. Vendor should be able track the driver on the trip.
6. The client should also be able to track the driver.