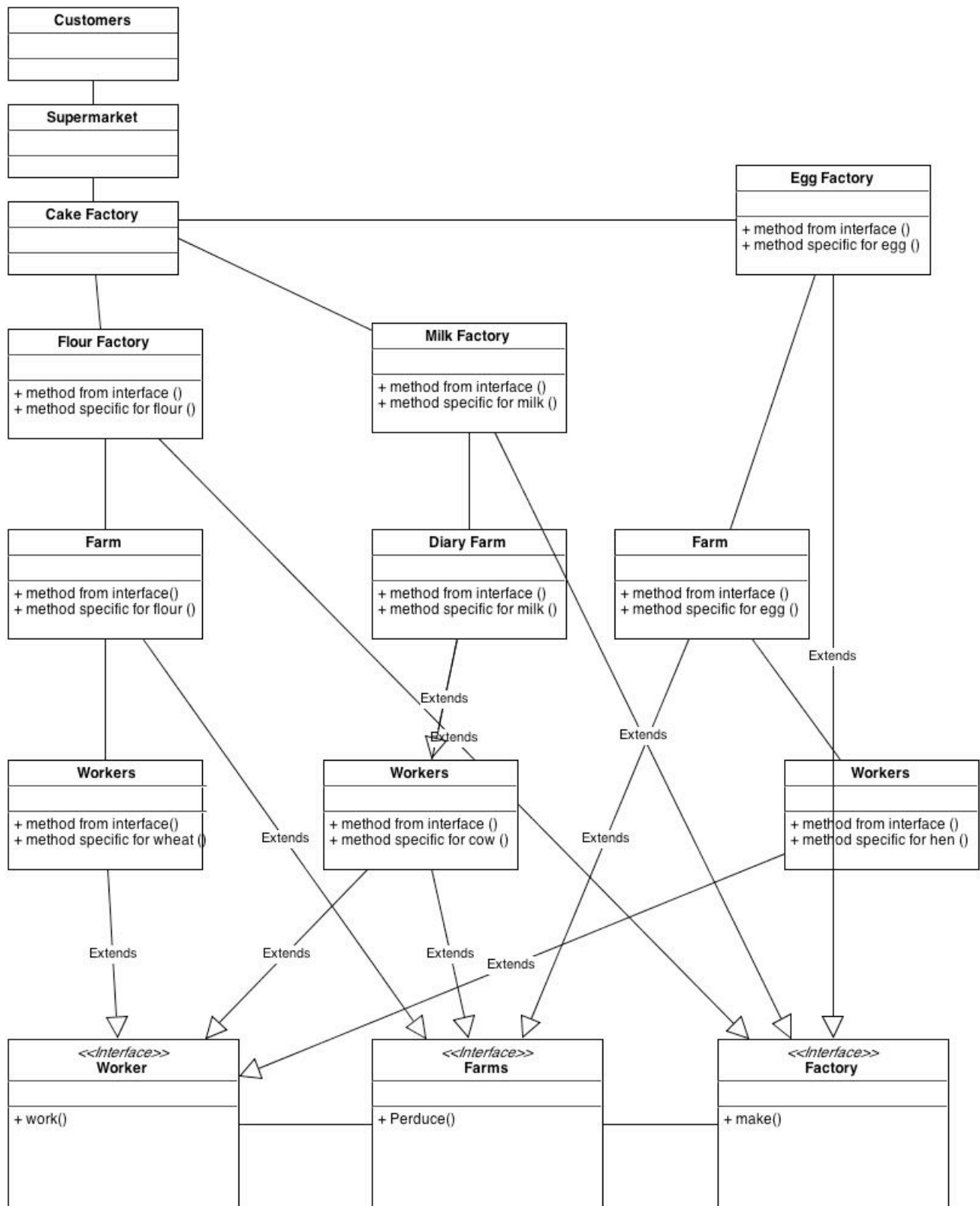


**Question 1: Draw an appropriate class diagram of the example cake factory and draw the connection between them. hint: Using interfaces between different layers.**



**Question 2: What is the difference between implicit invocation and explicit invocation?**

The idea behind implicit invocation is that instead of invoking a procedure directly, a component can announce (or broadcast) one or more events. Other components in the system can register an interest in an event by associating a procedure with the event. When the event is announced the system itself invokes all of the procedures that have been registered for the event. Thus an event announcement implicitly causes the invocation of procedures in other modules.

There is no clear definition for explicit invocation. Based on the definition of implicit invocation, explicit invocation just directly invoke the procedure or procedures to the component or components respectively. The relationships are pre defined in the architecture.

**Question 3: In some cases, UI components (like Adobe Flex) or HTML pages can directly invoke services without communicating with controller in the application server, is there still MVC pattern in this scenario? If is, what turn out to be the M,V and C? Hint: Find them by "What MVC do" not "What MVC are"**

M is the database or the server or where the service comes from.

V is the UI or page or whatever shows the outcomes.

C is the parser which pass the request of the users to the M and pass the result to the V. Here is the language that controls the data flow between the two components such as Java or HTML syntax.