**1. background**

Scientific Social Network System is a project for users to make connections and arrange a group of computational steps and workflows in a scientific application.

To provide a user friendly web service, we implement 5 basic functionalities and 3 extra features as follows:

1). Implement a workflow main page to list all scientific findings.

- Show service URL, name, and brief description.

- When one user clicks the name of a service, e.g. “Deep Learning”, the website will jump to the chosen science service page.

- Under this climate service page, user can comment this page.

- The posts carry information like post contents, post time, author etc.

2). A user can discover a scientific finding

- User can search for a finding using keywords.

- The first 3 search results will be listed.

3). A user can view a scientific finding and add comments

4). A user can make connection with other scientists

5). A user can join a forum or the group

Three extra features:

1). A user can sign up an account and sign in.

2). A user can add a friend when he/she knows another user’s account e-mail.

3). Service can be ranked based on popularity, in another word, clicking frequency.

**2. Motivation**

A scientific workflow system is a specialized form of a workflow management system designed specifically to compose and execute a series of computational or data manipulation steps, or workflow, in a scientific application.

As the Web 2.0 mashup technology is rising and becoming popular, there’s surely no better place for scientists to meet and mingle with other scientists than at a conference. But in this increasingly wired world, more and more of our day-to-day personal interactions are taking place online. And if findings from network science apply to scientists, then building and maintaining an open social network is key when it comes to career success. In this enterprise, more scientists are finding online tools to be instrumental, that is how the scientific targeted workflow social network come out to our mind.

There are a lot of benefits to provide such a web service. First, it is an information-centralized system. Instead of publishing all of the services in different places, we collect them together, thus providing more information and utility to users. Second, since the services are collected in one place, it will be more efficient to manage them. Maintenance cost will be greatly deducted in this way. Most importantly, it is a user-friendly system, because a user can now have an easier way to access multiple services in one stop.