Operational Concept Description (OCD)

Team No. 3

Istartonmonday.com

Team members	Role
Kandarp Nyati	Project Manager
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12/12/2011

Version History

Date	Author	Version	Changes made	Rationale
09/27/11	Fei Li	1.1	Section 1, 2, 3.1	Initial draft to use
10/03/11	Fei Li, Bharat Shugani	1.2	Section 1.1, 2.1, 2.4, 2.5	Version 1.1 defects resolved and additions
10/07/11	Fei Li	1.3	Section 1.1, 2.2, 2.3, 2.4, 2.5	Respond to evaluation of VC package
10/07/11	Fei Li	2.0	Section 3.2,3.3,3.4	Prepare for FC package submission
10/14/11	Fei Li	3.0	Section 2.1, 2.3, 2.4, 2.5, 3.1.1, 3.1.3, 3.2.1, 3.2.2, 3.2.4, 3.3.1, 3.3.2, 3.4.2.	Respond to evaluation of FC package
10/17/11	Fei Li	3.1	Section 2.2, 2.5, 3.2.1, 3.3.1, 3.4.1, 3.4.2	Corrected it to be more consistent with win conditions. Reworded some sessions according to the template. Updated capability and win condition after new win conditions were added.
10/24/11	Fei Li	3.2	Section 2.4, 3.1.3, 3.2.1,3.3.1, 3.3.2	Respond to feedback from ARB.
11/07/11	Fei Li	3.3	Section 2.4, 2.5, 3.3.1	Respond to evaluation of DC package.
11/13/11	M. Villanueva	3.4	Section 1.1, 2.4, 3.4.2	- Provided more details about purpose of website and email notifications - Reverted to an older version of the BCD
12/05/11	M. Villanueva	4.0	Filename, header/footer Section 1.2	- Rename file to reflect new phase, update header/footer - Added relevant details about phase
12/11/11	M. Villanueva	4.1	Table 3	- Added LOS-4 after comments from ARB
12/12/11	Fei Li	4.2	Figure 1	Respond to the feedback from Version 4.0

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1. Introduction

1.1 Purpose of the OCD

The operational concept description document describes the success-critical stakeholders' shared vision of the project being undertaken. This document also outlines the capabilities of the product and discusses the benefits for different stakeholders

The operational concept description document will be used constantly throughout the project's life cycle as the proposed system is being developed based on the new operational concepts. In addition, it will be heavily used during the beginning of the project as the requirements are still being gathered and the design of the proposed system is being developed.

The success-critical stakeholders:
- Client and Maintainer, Dean L. Jones;
- 6 group members in development team including five on campus members and one off campus member;
- Job seekers who use the website to look for jobs, training, workshops, events, and supportive social service information, basically with low to moderate skill set;
- Job providers who post available jobs through the website, mostly some local large scale organization who need employee very soon, for example, Walmart, goodwill and etc.

1.2 Status of the OCD

The current version of OCD is at version 4.0 in development phase. The benefit chain diagram was also improved to make the casual flow more understandable. We have just finished our DCR ARB and are working to transition the system to the client before the end of the semester.

2. Shared Vision

2.1 Success-Critical Stakeholders

Table 1: Success-Critical Stakeholders

Stakeholder	Authorized Representatives	Organization	Relation to Benefits Chain
Client	Dean L. Jones	Southland Partnership Corporation	CEO of the organization, key decision maker about the requirements.
Maintainer	Dean L. Jones	Southland Partnership Corporation	• Approve jobs positions provided by job providers • Post available jobs on the website. • Resolve technical issues which occur on the website or software he uses.
Developers and IV&V	• Kandarp Nyati • Thammanoon Kawinfruangfukul • Tanya Gautam • Fei Li • Bharat Shugani • Mark Villanueva	University of Southern California	• Redesign the website • Provide functionality according to client's requirement
Website users	Any job seeker who uses the website	Unemployed individuals, people with low to moderate skillset who look for a new job	• Search jobs they are interested in by key word. • Register for the website or subscribe to the website. • Employ the website to apply for jobs.
Job providers	Any employer who provide jobs to the website	Goodwill, Wal-Mart, and etc.	Provide available job positions to client. Search on the website for prospective employees.

2.2 System Capability Description

      The current system could only provide basic functionalities for job seekers. The website to be upgraded will embrace a new user interface, which could provides website users better user

experience and also will be more convenient for our client to manage and update the website. The available positions will be categorized in different fields. Moreover, this new website could achieve a better two-way communication between job providers and job seekers.

The proposed website will allow job seekers to fill in their information for registration and to claim work preference. They could also choose to only subscribe to the website and receive emails when there are new job postings.

Job providers could also set up account and post available positions on the website. They can also search potential candidates from job seekers for their positions.

When client inputs new available positions, the default expiration date will be set to 30 days later, which can also be set manually to any period of time as client wants.

The target users of this website are people with low-moderate skill sets; therefore, the website fulfills a gap for people searching for those low-moderate positions, while most of other job related websites only deal with more higher-wage jobs.

2.3 Expected Benefits

The redesigned website will be more convenient for the client to maintain and update.
- The client will maintain and update the website with less effort.
- Minimize any potential database crashes and keep the back-end maintenance extremely simple.
- The job seekers could find available interested positions by category or searching key word, and the application process is more efficient. Moreover, the job seekers can fill in basic information to register and claim their job preference.
- The job seekers can also choose to only subscribe to the website and receive email of updated job positions.
- The job providers are allowed to search prospective employees from job seekers who are interested in the specific field of jobs they provide.
- Better two-way communication between job seekers and job providers.

2.4 Benefits Chain

Assumptions:
1. Continuously growing job seeker pool and job provider pool;
2. Due to social media, users/employers are able to spread word of the site easily;
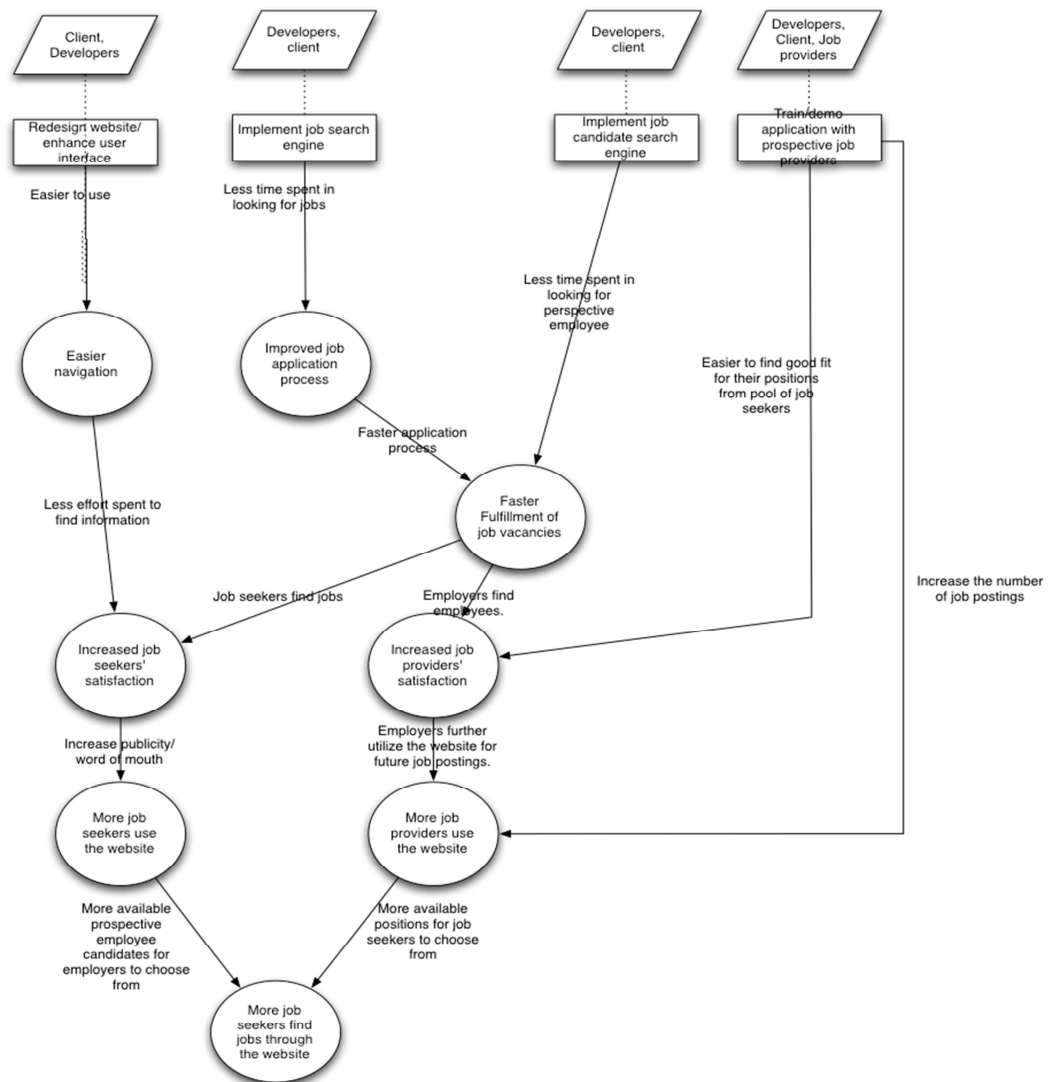3. The average of visitor of the site is moderately skilled with using web-based applications;

Figure 1: Benefits Chain Diagram
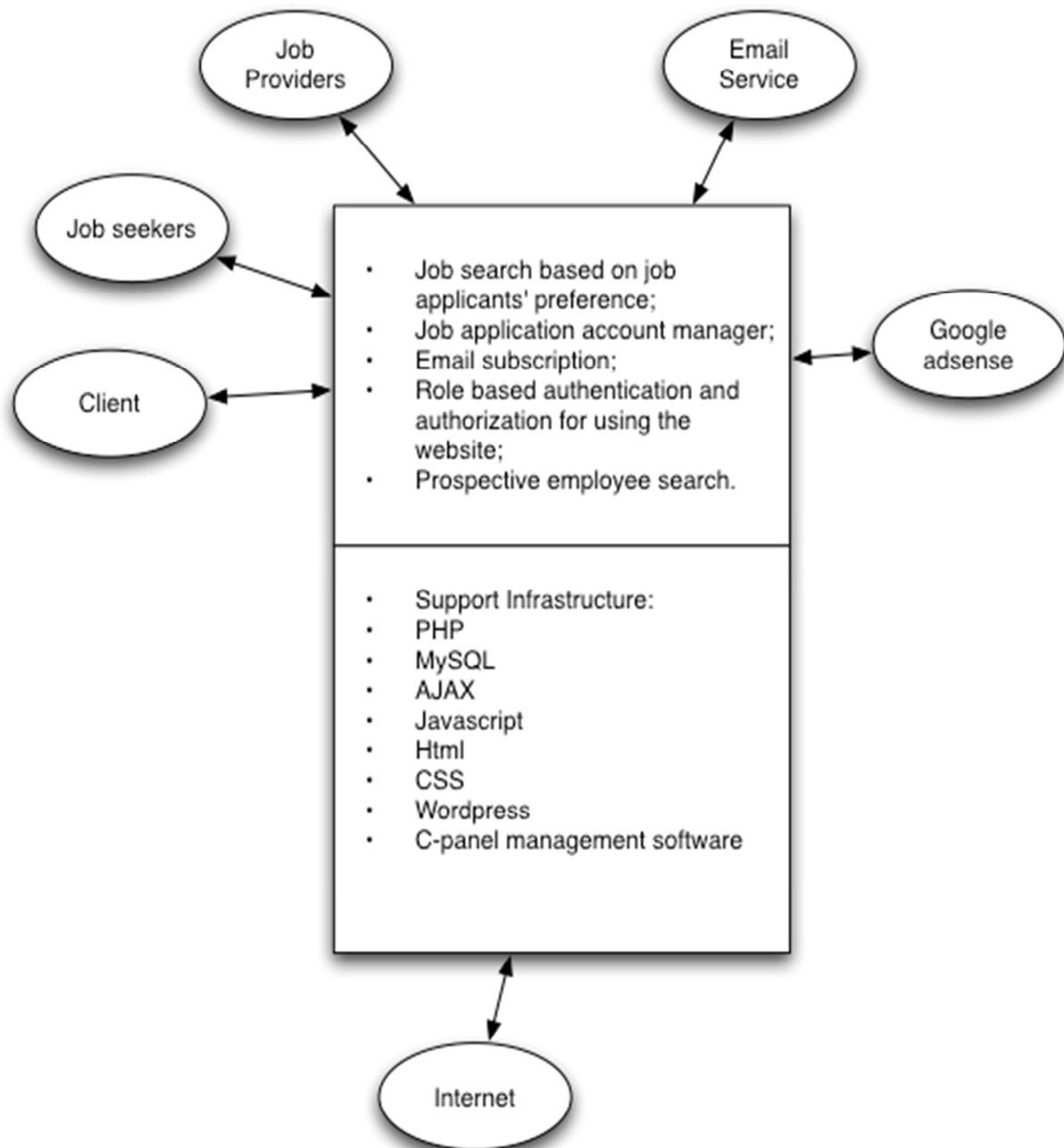
2.5 System Boundary and Environment

Figure 2: System Boundary and Environment Diagram

3. System Transformation

3.1 Information on Current System

3.1.1 Infrastructure

Software
- Development platform: Windows
- Database: MySQL
- COTS: Wordpress

Hardware
Internet service provider, powered by small orange panel
Intel Xeon servers with 4GB of RAM and RAID-protected 15K RPM hard drives
Space: 1.5 GB
Bandwidth: 35 GB
MySQL database access
POP3, IMAP, and web-based email access

3.1.2 Artifacts

- The job posting requests: Job providers send client request in form of emails about available job positions.
- The actual job postings in Wordpress: client post available job positions in wordpress, which will show on the website.
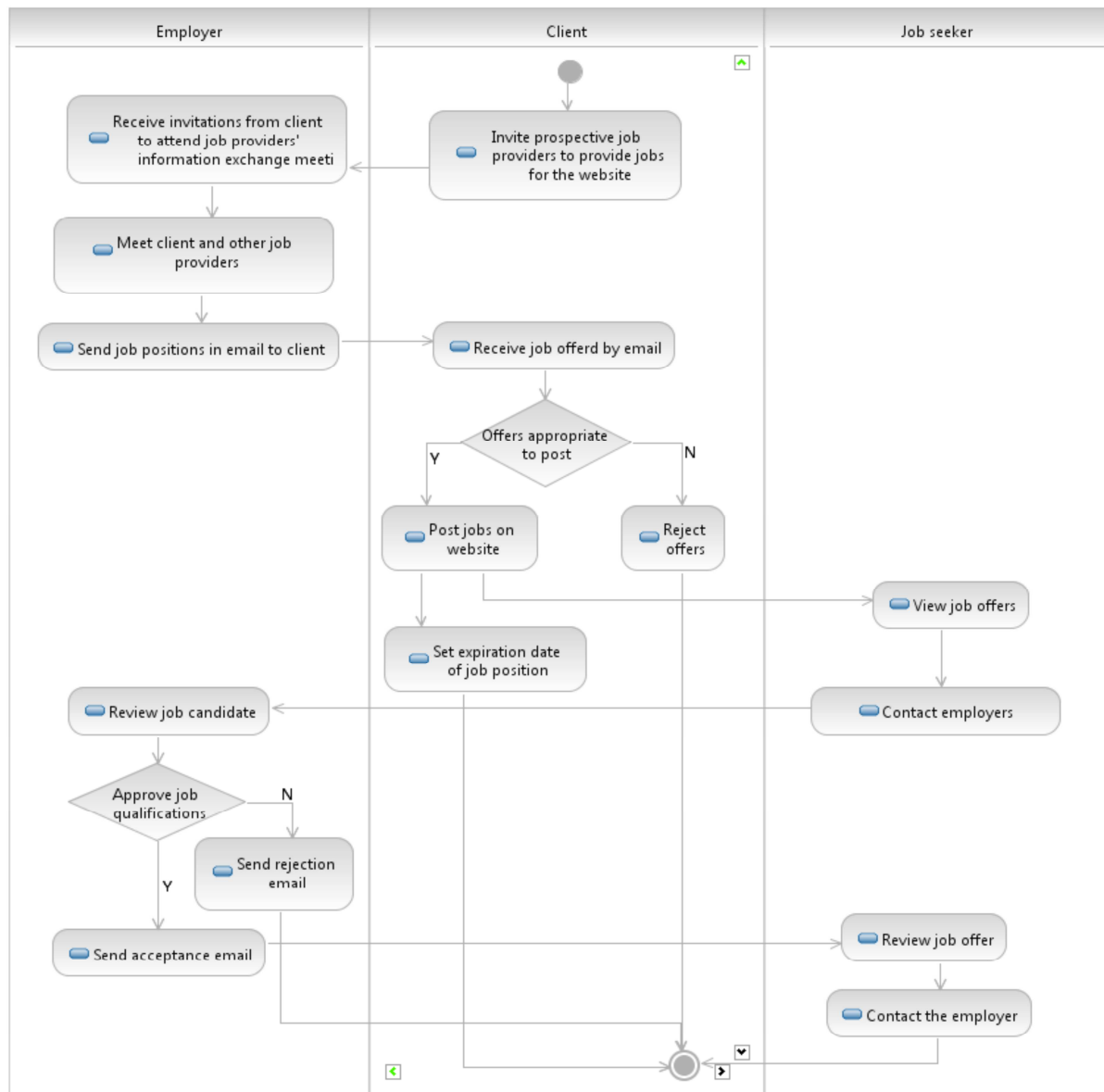
3.1.3   Current Business Workflow

Figure 3: Current Global Business Workflow of Job Posting and Application Process

3.2 System Objectives, Constraints and Priorities

3.2.1 Capability Goals

Table 2: Capability Goals

Capability Goals	Priority Level
OC-1. **Log in page:** The website should enable users to log in based on their roles: job seekers, employers, or administrator.	Must have
OC-2. **Google AdSense:** Google AdSense ads from current website should maintain as they are.	Must have
OC-3. **Maintain employers' links:** The website should Maintain links to other job-related sites as shown on current website.	Must have
OC-4. **Job seekers subscribe function:** The site should allow users to subscribe or unsubscribe from email notifications (for all job postings).	Must have
OC-5. **Employers' logos:** The site should display employers' or organizations' logos.	Must have
OC-6. **Easily search for jobs:** The UI should allow the user to easily search for jobs. Jobs should be sorted into categories. The current system is just a general search. Dean and the employers determine the categories. All the categories should not be there in the front page, and it is possible to have multiple categories for one job.	Must have
OC-7. **Simple and intuitive user interface:** Use Wordpress, MS word/excel as a base user case.	Must have
OC-8. **Job provider post:** Employers have the ability to post jobs on the site.	Must have
OC-9. **Resemble the current website:** The main page should resemble the current site: it should contain a list of general job postings and announcements.	Must have
OC-10. **Key word search:** Allow key word searches on any match in the job listing. The results could pop-up any references in the job listing.	Should have
OC-11.**Usibility on mobile device:** The site should be usable on mobile devices: iphone, android phone, ipad, kindle, etc. (optimized for viewing on mobile devices)	Should have
OC-12. **Display list of employers:** Provide Dean with a list of employers and their application documents (similar to job-applications.com's layout/design) to maintain the website easily.	Should have
OC-13. **Default setting:** Default 30 day expiration for job postings (i.e. Remove visibility of the posting from the website)	Should have
OC-14. **Feedback from job seekers:** Job seekers can provide	Could have

testimonials once they get the job.	
OC-15. **Job provider registration:** The site should have a sign-up/registration page for employers, which allow them to upload jobs, add profile information.	Could have
OC-16. **Employer search candidate:** Employers should be able to search the job preference data of job seekers.	Could have
OC-17. **Job seekers registration:** The site should have a registration page for job seekers.	Could have

3.2.2 Level of Service Goals

Table 3: Level of Service Goals

Level of Service Goals	Priority Level
LOS-1: Security: Website uses' information are private and need to be secured.	Must have
LOS-2: Usability: The system has to provide a user-friendly interface.	Must have
LOS-3: Accessibility: System should be accessible from anywhere with internet connections, or even on mobile device: iphone, android phone, ipad and other tablet device.	Could have
LOS-4: Security: All web registration forms should be checked for valid input	Must have

3.2.3 Organizational Goals

OG-1: Provide platform for job seekers to find jobs in low to moderate skill set market.
OG-2: Help employers, or job providers to find appropriate candidates to fill in their available positions.
OG-3: Reduce maintenance difficulty of the website.

3.2.4 Constraints

CO-1: Budget: The cost of maintaining the website should be minimized, the limitation of budget is $300/year for the cost of database needed.
CO-2: Schedule: The system should be completed within only one semester.
CO-3: Software: Since the client claimed that he is comfortable with Wordpress and does not want to learn how to use a new software, we will continue to use Wordpress to manage the website.

3.2.5 Relation to Current System

Table 4: Relation to Current System

Capabilities	Current System	New System
Roles and Responsibilities	• Client uploads positions himself. • Only job seekers can reach out to job providers, not vice versa.	• Employers also have the capability to upload positions. • Employers could also search candidates from job seekers pool, which is two-way communications.
User Interactions	• Job seekers can only look for jobs on the website by looking through all posts on website.	• Job seekers could search jobs in specific field by typing in key word • Job seekers can register to the website and claim work preference in the system and then apply to jobs in the future. • Job seekers could receive emails of newly posted positions.
Infrastructure	• Job posts only in time order.	• Job posts will be categorized according to different fields. • User-friendly graphical interface.
Stakeholder Essentials and Amenities	• Job providers can only wait for job seekers to reach out to them. • Job seekers cannot really keep track of their application history and could not well present themselves.	• Faster and easier information exchange between job seekers and job providers.
Future Capabilities		• The website may become profitable after more job seekers and providers appreciate its value for them to communicate.

3.3 Proposed New Operational Concept
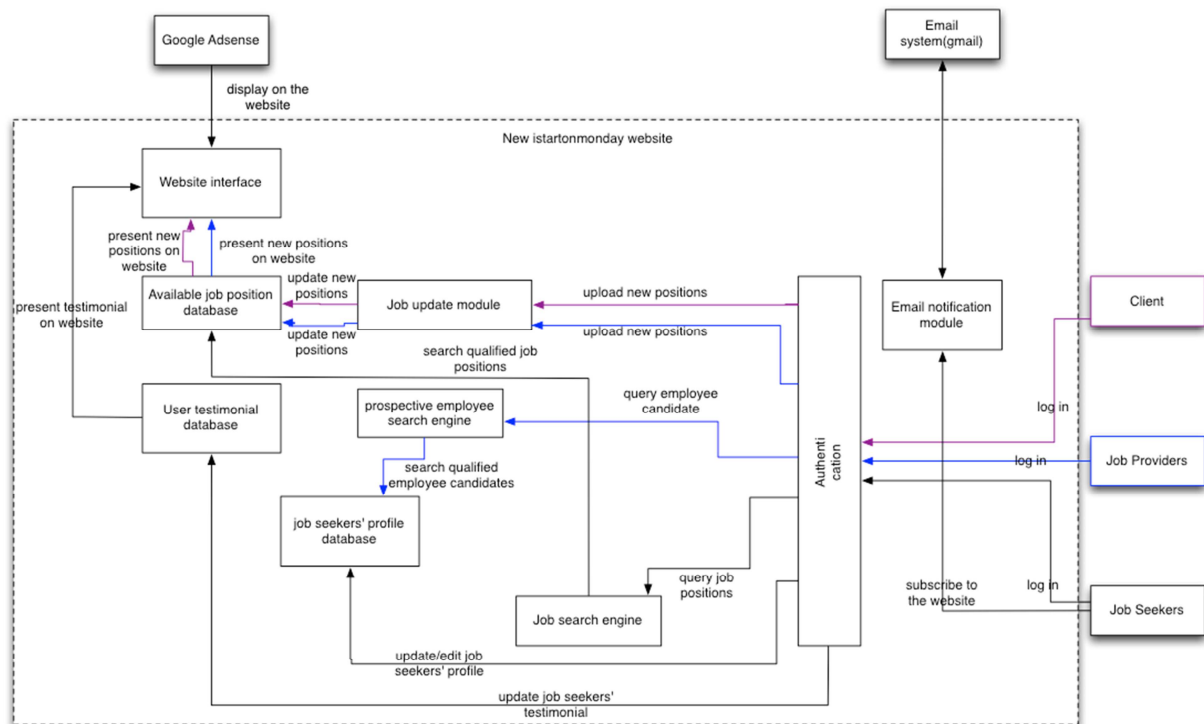
3.3.1 Element Relationship Diagram

Figure 4: Element Relationship Diagram
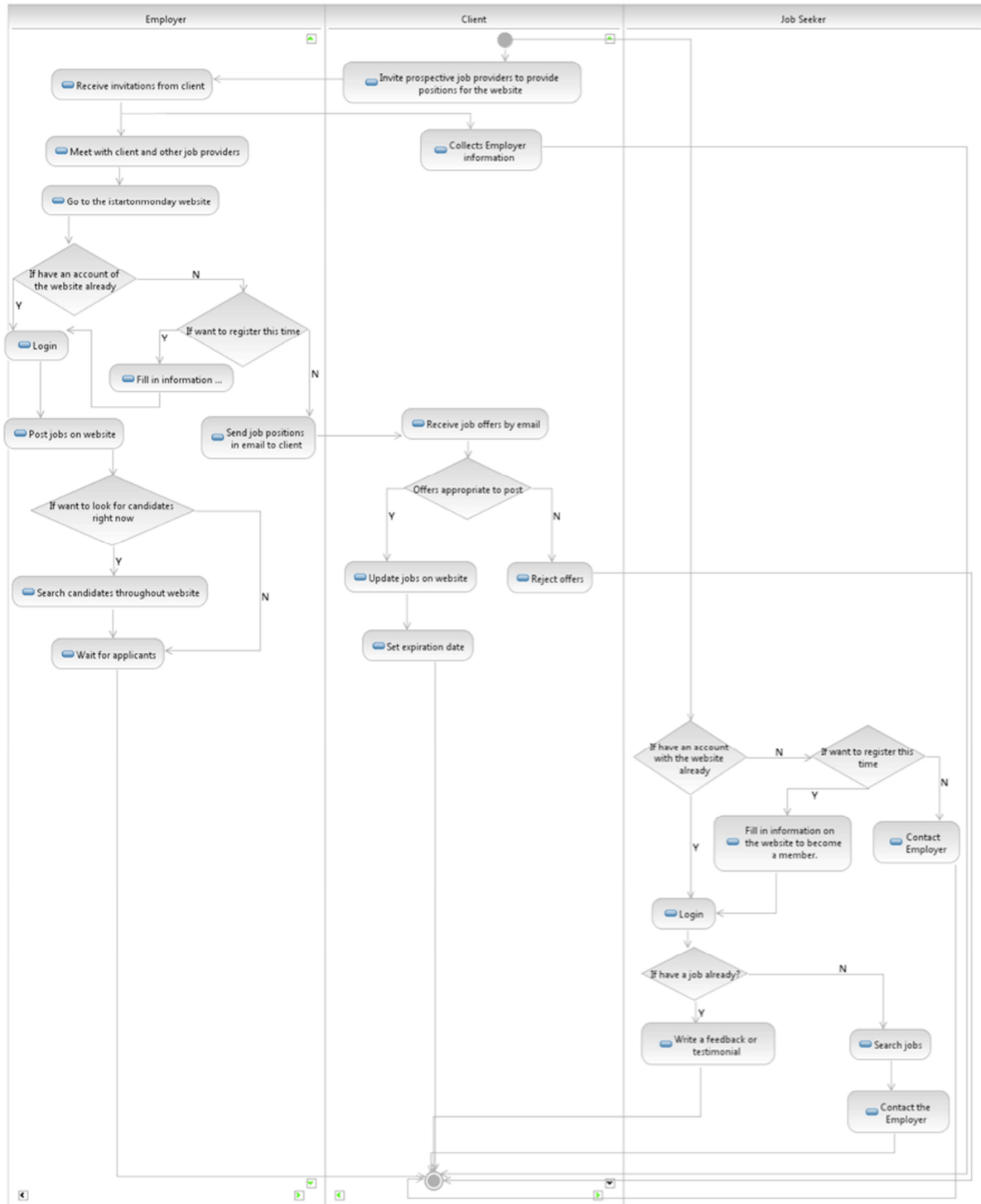
3.3.2 Business Workflows

Figure 5: Proposed Global Business Workflows of Job Posting and Application Process

3.4 Organizational and Operational Implications

3.4.1 Organizational Transformations

- The system will contain the profiles of all the users in the database which will help the organization to match job-seekers to employers mutually in both ways;
- Instead of all anonymous visitors to the website, the system will authorize different types of users as roles will be separated like employer, admin and job-seeker.

3.4.2 Operational Transformations

- The option for all visitors to choose to subscribe to the website: subscribers receive emails (newsletter-type message) notifying users about the new updated jobs;
- The option of website registration for job seekers to claim work preference, making it possible for job providers find prospective employee, which is a more efficient two-way communication between job seekers and job providers;
- The option of website registration for job providers enabling them to edit job positions in a more quickly manner;
- The option for job seekers to search available positions in specific fields according to their interests.