# **Employment Limitations and Constraints for Iranian University Graduates in Agricultural Majors**

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The present research aimed at identifying employment limitations and constraints facing the university graduates in agricultural majors, also finding the solutions to enhance opportunities and job potentials for the agricultural graduates. The study used qualitative research methods. Qualitative data collection was done with the help of semi-structured interviews. Data were gathered from 30 employers working on both public and private agricultural related organizations of Iran. Poor practical agricultural competencies of the graduates, limitations of government and private sectors to employ the graduates, irrelevant of curriculum development to labor needs, and the lack of entrepreneurship and self-employment skills identified as the most important employment limitations for the agricultural graduates. Therefore, a supportive mechanism should be installed by government, private sector, bank, universities, legislators' centers, and graduates' organizations to improve present employment situation of agricultural graduates in Iran. [R, Movahedi and M, Mantashloo. Employment Limitations and Constraints for Iranian University Graduates in Agricultural Majors. International Journal of Agricultural Science, Research and Technology, 2011; 1(4):171-176].

**Key words**: Agricultural Graduates, Employment, Job Opportunities, the Labor Market, Higher Education, Iran

### 1. Introduction

Without any doubt, Human resources are one of the most important factors to achieve developmental aims in each society. Skillful human resources can be qualified and trained through research and educational institutes or centers. These resources will consequently able to increase production in each sector both qualitatively and quantitatively and then enhance standard of living (Zamanipour, 2007). Agricultural sector also requires skillful human resources who capable to work in agricultural and rural centers about producing, proceeding, and supplying various agricultural products.

Universities and higher institutes in agriculture usually respond to prepare main part of specialists, researchers, change agents, and farmers. Over the years, the world has changed and, in many of the developing countries, agricultural education has failed to adapt and respond to the realities of rural societies. Curricula and teaching methods and tools often have been developed that are not relevant to the development objectives of individual countries, to the needs of farmers and the labor market. In many developing countries, the public sector used to absorb the large majority of agricultural graduates and consequently, agriculture graduates are finding it

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increasingly difficult to become employed. Their education in agriculture has not been oriented to the needs of an increasingly sophisticated commercial sector (FAO, 1997).

Employment situation of agricultural graduates in Iran shows that 22% of agricultural gradates are unemployed and 35% are being employed in non-agricultural jobs (this is 5 % in developed countries) (Zamani and Azizi, 2006). During 25 years ago, about fifty thousands agricultural graduates (including natural resource sciences) have been employed in Iran, of them thirty five thousands graduates (equal to 70%) were being employed in public sectors and fifteen thousands graduates (equal to 30%) were being employed in non public sectors (Zamani and Azizi, 2006). One of the reasons for graduates' unemployment seems to be lack of adaptability between graduates abilities and skills needed by labor and productive unites (Shahbazi and Alibeigi, 2007). Lack of coordination and cooperation between employers and higher education institutes is another reason unemployment in developing countries (Sabouhi, 2000). According to Zamani (2001), poor practical abilities of agricultural graduates, irrelevancy of university subjects and curricula with labor market needs, governmental limitations about decreasing

personnel in terms of structural downsizing policies, not to thrive private and self-employment sectors, severe incensement of agricultural graduates are the most obstacles facing to agricultural graduates.

Unemployment rates in developing countries continue to increase (Shunxin and Changhong, 2012) and, therefore, higher agricultural education institutions are faced with a challenge to prepare graduates to find job. Therefore graduates, whether employed by someone or self-employed, must be able to articulate a vision, and, provide direction for change, pointing unequivocally to the future (Johnson, 2003). Today, jobs for graduates are no longer guaranteed and the government can only hire a small range of agricultural graduates (Shao and Bruening, 2005a, b; Bruening et al., 2005).

As a result, it is becoming increasingly difficult for agricultural graduates to find jobs in the public sector. Consequently, graduates need to find employment in the private sector or be self-employed (Movahedi et al., 2011). Students' education must become more purposive and selective, since it now must relate to their area of work and to employment opportunities in the labor market. Feedback to schools has shown that agricultural graduates have difficulties finding jobs that reflect their educational knowledge and skills (Shao, 2004). The structures of the labor market and working life are continuously changing (Chong et al. 2008). Technological progress and globalization are reshaping the structures of working life and the contents of work, generating new demands and expectations. Consequently, the transition to working life seems to be changing in many ways. The skills and knowledge needed to access the labor market seem to be increasing. Problems of relevance and responsiveness of education and training to changing work tasks and employment structures are of particular concern in many countries (Saarnivaara and Saria, 2007).

The most important reasons unemployment of graduates in higher education system of Iran include: irrelevancy of economic growth and employment capacities of society with increasing number of graduates, lack of relationship between educational system and employment system, lack of skills needed for labor market among graduates, enhance work force participation in society special women, graduates interest to central cities, graduates interest to public sector, poor coordination between educational institutes and employers, and low knowledge of graduates about needs of labor market (Chitsazeghomi 2005).

Zamani and Lari (2004) indicated that obstacles and problems facing to agricultural graduates to find job are respectively: Too many agricultural graduates, lack of drastic governmental

support, inadequate of the graduates' asset, lack of practical abilities of the graduates, old personnel in agricultural organizations, poor coordination between organizations, gender discrimination, low self-confident among the graduates, low knowledge about agricultural fields and future, absence of new economic activities, and family relations or belongings to political parties.

Despite of drastic shortages and urgent need to agricultural specialists, why are available graduates not totally employed in agricultural sector? To answer this question following recruitment problems can be mentioned: structural problems on educational system, attractions of non-agricultural jobs, lack of financial facilities, governmental problems, problems in private sector and low investment on it, and lack of a strong information system for the graduates (Ostowari, 2003).

The high unemployment rate among college and university graduates is due to the mismatching of Iran's education with the country's occupational needs; this is a great dilemma. Furthermore, the broad curricula, complex unrelated courses in bachelor degrees in relation to the requirements of the market and lack of indigenous textbooks, especially technical and vocational ones addressing the local and national issues in higher agricultural education in Iran case (Hamdhaidari et al. 2008).

In Iran, the value of practical on handexperiences in agricultural education has been neglected. The major approach of student assessment is through written exams that primarily test the student's memory. The traditional term of internship as well as of short duration (2 months) which entails that student cannot learn in depth about employment opportunities in the marketplace(Movahedi, 2009). In addition, absence of appropriate linkages between employers and higher agricultural education system has prompted a situation in which it is difficult to identify career requirements or vocational competencies needed by graduated students as expected by the concerned employers (Movahedi et al., 2011). Therefore, employment issue appears as one of the most important problems facing higher agricultural education as relates to the mentioned literature review. Therefore the first idea for conducting this research was to study conditions for the improvement of agricultural graduates to be better prepared for specific occupations in the agricultural fields. The major problem addressed in this research study was, accordingly, to reveal how the agricultural graduates can overcome to the employment constraints and problems. This research was therefore an attempt to identify limitations facing the agricultural graduates and how to enhance

opportunities and job potential for the agricultural graduates.

#### 2. Materials and methods

The study employed qualitative research methods. Qualitative data collection was done with the help of the semi-structured interviews. The survey tools were finalized after empirical observations and an extensive literature review in Iran during 2010. The study population included 64 employers both in public and private agricultural organizations in three regional divisions of the country. The numbers of 30 employers concluding heads of the agricultural organizations were purposefully selected for interview process. Content analysis method has been employed for analyzing interview data which was former structured according to observations and literature review.

#### 3. Results and discussion

Employers who participated in this research ranged in age from 33 to 49 years. The mean age of respondents was 41.23 years. The majority of employers were males (94 %) and just 6 % were females. About the highest level of education, 53.3 % of employers had M.Sc education, 26.6 % had M.Sc education and 20.1 % had Ph.D education. Years of job experience ranged from 10 to 25 years with an average on 18.2 years. 73.4 % of respondents in public sectors and 26.6 % in private sector or agriculture banks were being worked.

## Competencies needed for the labor market

The employers both in public and private sectors were asked to give their ideas about competencies needed by the labor market for the agricultural graduates. After summarizing the same ideas expressed by different employers, the repeating ideas were emerged and classified in term of common subjects then; a theme was developed regarding each group of repeating ideas. From the employers' ideas, four main groups of competencies were found out as necessary for graduate employment: agricultural technical competencies (37 %), specialization competencies (30 %), communications and leadership competencies (20 %), and individual competencies (13 %).

### Adjusting graduates' competencies to the labor market

To achieve this objective, employers were asked to explain their responses to the question 'how can graduates competencies be adjusted to labor market?' Eventually, after analyzing employers' responses, the following themes were developed as

the most important results to make graduate competencies tailored to the labor market: conform theory and practice into learning process (20 %), change curricula and syllabus based on needs of agricultural sector (16.7 %), skill and work based education (16.7 %), and the emphasis on application of skills (13.3 %). The rest interviewees emphasized on practical teaching and evaluation methods, increasing practical courses, and conducting pre service training and vocational courses for new graduates. Different citations from interviewees showed that most of them imply on incorporating theory and practice, skill based education and actual needs of labor market. Some typical citations from employers were:

I believe that, theory and practice must be taught together and incorporated throughout the Higher Agricultural Education System.... Teaching Agricultural curricula must be brought out from present situation in which university programs simply pay attention to theoretical concepts and principles.... Specific practical classes or labs need to be established to conduct skill based education.... students should Agricultural acquire professional and agricultural competencies and they must capable to apply the mentioned competencies. Therefore, I think the university programs must be absolutely adapted with labor market needs: curriculum programs, contents as well teaching and learning methods should be changed; the more contact between agricultural students and real agricultural working sectors, the more successful preparedness for agricultural related jobs after graduating.

Therefore, in order to adjust graduates' competencies to labor market, real needs of labor market also capacities of agricultural sector should be continuously assessed and accordingly be adjusted into curricula at universities. Current curriculum programs in agricultural education system must be changed in the manner that theoretical concepts within practical ones be related to real working conditions. Furthermore, specific vocational and technical programs should take place out of university education for agricultural students and graduates.

## Problems faced to the graduates' employment

Interviewees were asked to express their ideas by answering the questions "What are the problems faced to graduates' employment?" during the interview, employers' ideas based on a content analysis method were summarized, focused and classified in terms of common subjects and then regrouped under a common theme. As shown in table 1, the following themes were identified as the most

important limitations regarding graduates' employment: problems regarding to inabilities of the graduates, problems concerning to government and public sector, irrelevant of curriculum development to labor needs, Entrepreneurship and self employment limitation, and limitations of private sectors to employ the graduates. Some typical citations of employers about problems faced to agricultural graduates were:

1) I believe the main problem about graduates' employment refers to government. Presently, government has planned and conducted new policies to solve employment problem but there is no control to carry out these policies. Structural problems include lack of appropriate management and administrative problems regarding employment plans are other limitations about employment.2) The students who learn only theoretical subjects without learning practical skills on agriculture would not able to work in future world of labor successfully.3) One of the problems among agricultural graduates is inabilities of management skills and planning thinking or meditation during their tasks.4) Agricultural graduates have no enough experience and practical competencies for doing work in private sectors.

Table 1: Limitations faced to graduates' employment (n = 30)

Limitations regarding	Frequently	%
graduates' employment		
Problems regarding	7	23.3
inabilities of graduates		
Problems related to	4	13.3
government and Public		
sector		
Entrepreneurship and self	4	13.3
employment limitation		
Problems regarding	3	10
private sectors		
Irrelevancy of curricula to	3	10
labor needs		
Limitation of job	2	6.7
opportunities		
Problems related to the	2	6.7
number of graduates		
Lack of capital	30	100
Total		

With regarding to findings about problems faced to agricultural graduates for employment, the conclusion will be drawn that the acquirement of the practical competencies relevant to labor market needs is the main problem of agricultural graduates. This issue deteriorates opportunity of graduates to get a

job particularly in private sectors. Because there is no systematic management and planning about making tailor the curricula with labor market, agricultural graduates wouldn't able to achieve actual capacities and opportunities of working centers. Therefore, focus on both acquirement of practical skills and needs of the working center is recommended to agricultural students during their university programs. Agricultural graduates need to be provided by more supports and facilities regarding self-employment and entrepreneurship activities. Moreover, developing agricultural plans and policies, real needs of labor market should be taken into attention. In order to provide agricultural problems and needs of local farmers, all agricultural graduates should acquire information and competencies about own local agricultural crops.

# Increase potential and opportunities for employment

Employers in this study were asked to explain their perceptions about knowing how to create or enhance opportunities and job potential for agricultural graduates. As presented in Table 2, the common themes financial and public support, support of graduate's enterprises, and improve quality of university programs were emerged as the most frequent responses about solutions for increasing agricultural graduate's opportunities for employment. Below two selected interviews are cited:

First of all knowledge of agricultural graduates must be verified based on new technology and then tailored to society conditions and needs. A strong network between the graduates and employers should be created in order to support the graduates; on the other hand students and graduates' association must be organized and supported by universities and related organizations.

Agricultural students should be trained in a manner that enable to work on different agricultural jobs self employed and entrepreneurially. Furthermore, in order to access and use new information and services, agricultural graduates need to be subscribed into alumni centers, associations, cooperatives and graduates unions.

Therefore, from the interview findings support from graduates via government, private, legislators' centers, and graduates' organizations can be concluded as the most important factor to improve present employment situation of agricultural graduates in Iran. Organizing graduates into associations, NGOs, cooperatives, and big or small private firms will enable the graduates to enhance their extent of work in different workplaces out of governmental organizations. Furthermore, a relevant and regular change on university curricula is caused

that graduates will learn proper and new skills and competencies. Eventually, some plans like technical and vocational courses for graduates, and engage them in research or executive projects would be affect to improve employment conditions for agricultural graduates.

Table 2: attempts for increasing potential and opportunities for employment

Creating potential and	Frequently	%
opportunities for employment		
Financial and public support	6	20
Support graduate's	5	16.6
enterprises(associations,		7
NGOs, alumni, and		
cooperatives)		
Modify university programs	5	16.6 7
Strengthen training system	4	13.3
after graduation		
Shift to agricultural	3	10
privatization		
Relationship between	3	10
university and labor market		
Support of research activities	2	6.68
by graduates		
Support and organize	2	6.68
graduates to work other		
countries		
Total	30	100

### **Conclusion and Recommendations**

Identifying the constraints and problems facing higher agricultural institutes and agricultural graduates will help planners and practitioners to find key mechanisms and make decision for the future plans effectively. The limitations and problems facing agricultural graduates for employment may fall into different categories including: (1) irrelevancy of agricultural curricula for the market needs: (2) inadequacy of practical agricultural competencies of agricultural graduates; (3) graduate's interest in public employments and governmental limitations; (4) limitation of linkages between university and the labor market; (5) limitation of job opportunities and high number of graduates; (6) the lack of supportive services for the graduates; (7) the lack of self employment and entrepreneurial skills; (8) limitations of private sectors to employ the graduates; and (9) limitation of urban- origin graduates.

It seems that agricultural undergraduates' programs in Iran suffer from two type's problems, first internal academic problems such as irrelevancy of agricultural curricula for the labor market and improper of agricultural courses, and teaching

methods. The second type of problems is external problems which are referred to mismanagement and policy makings of government and other executive sectors i.e. private sector in agriculture.

It is apparent that in order to improve the students and graduates' status for employment, linkages between university programs and the labor market need to be strengthened effectively. Due to the dramatic reduction in employment by government services, and huge number of student enrolments in agricultural higher education, students need to be shifted to learn their knowledge and skills for the private sectors, NGOs, and different enterprises with self-employment and entrepreneurial Universities have to regularly make collaborative relationships with businesses in order to identify career requirements and thus provide their students with both practical skills and theoretical knowledge for the job opportunities in a competitive condition. Therefore, the following cases should be implied when planning for improving the employment's status of the agricultural graduates. 1)labor marketoriented of curriculum development, 2)graduates associations systems, 3) governmental policies, 4) financial supports for the graduates, 5) universities relationships with labor market, 6) practical skills and experiences of the students, and 7) entrepreneurial and internship courses and programs. Furthermore, in order to ensure education relevant for the labor market, the linkages mechanisms should be continually assessed by a feedback system between universities and labor market, to identify new needs, advantages and disadvantages. Based on the results, the following diagram can be drawn for improving the students and graduates' situations related to employment.

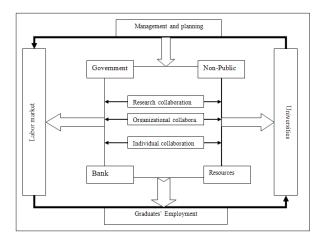


Figure 1: Necessary components for improving the agricultural graduates' employment

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