

Armenia Labor Market Evaluation and Strategy Assessment

***Promoting Jobs in Armenia: Which Labor-Oriented
Policy Approaches Are Worth Pursuing?***

Submitted to USAID/Armenia

Global Workforce in Transition (GWIT) IQC

USAID Contract No. GDG-1-00-02-0003-00

April 25, 2003

Education Development Center

1000 Potomac Street, NW, Suite 350, Washington DC 20007

202-572-3735

On the Web at www.gwit.us

Table of Contents

EXECUTIVE SUMMARY	3
INTRODUCTION	6
THE CURRENT SITUATION	11
Labor Market Overview.....	12
Demand Side Overview.....	16
Supply Side Overview.....	20
OPTIONS FOR CROSSCUTTING USAID TECHNICAL ASSISTANCE	24
Criteria for Prioritizing Options.....	25
Assistance Options to Create a More Efficient Labor Market to Support a Dynamic Market Economy.....	28
Assistance Options to Create More and Better Jobs.....	34
Assistance Options to Create A More Demand-Driven Workforce Development System:.....	42
NEXT STEPS IN MOVING TO IMPLEMENTATION	46
Recommendations for Project Integration.....	47
Developing Ownership for Sustainability.....	48
THE ROAD NOT TAKEN	50
APPENDIX A: INTERVIEWS & FOCUS GROUP PARTICIPANTS	
Trip 1 Interviews	
Phone Interviews in the United States	
Trip 2 Interviews	
Focus Groups	
APPENDIX B: INITIAL SWOT ANALYSIS	

This assessment was prepared by the Global Workforce in Transition Assessment Team, comprised of Team Leader/Competitiveness Analyst Patricia Dusenbury (Independent Consultant pdusenbury@earthlink.net), Sr. Workforce Generalist Evelyn Ganzglass (GWIT Project Director, Education Development Center, eganzglass@edc.org), and Hal Salzman (Sr. Researcher, University of Massachusetts/Lowell, hal_salzman@uml.edu). The team was ably assisted by Robert Lerman, (Director Labor and Social Policy Center, Urban Institute, blerman@ui.urban.org), Ruzan Balayan, Sona Danielyan, Jennifer Gaudet, Gayane Ghukosyan, Zara Khanjyan, Shishan Kurkchian and Aram Ohanian.

The GWIT assessment team is grateful to the numerous USAID, Government of Armenia, private sector, and other labor market partners who met with the team during their visits to Armenia. A full list of interviews held by the team is presented in Annex A.

The views presented here, however, are those of the authors and do not necessarily reflect those of the U.S. Government or USAID.

Armenia Labor Market Evaluation and Strategy Assessment

Promoting Jobs in Armenia: Which Labor-Oriented Policy Approaches Are Worth Pursuing?

EXECUTIVE SUMMARY

Excess supply in the Armenian labor market causes high unemployment and under-employment. It depresses wage levels, leaving many employed individuals and their families living in poverty, and leads many of Armenia's most employable people to leave Armenia for jobs elsewhere. Unemployment exists alongside vacant jobs, because of skill shortages. Demand exceeds supply for jobs in, for example, computer-related occupations and in industrial maintenance. The labor market itself is neither efficient nor effective due to missed and non-existent connections between employers, people seeking jobs, and the education and training system that should be preparing people for careers. Many labor market participants have not changed their "Soviet" era attitudes or behaviors to ones that are more compatible with a competitive market economy. The poorly functioning labor market creates a drag on the economy.

In developed countries and countries that have made the transition from a command and control to a market economy, intermediaries contribute significantly to labor market function. Armenian intermediaries consist of the Republic Employment Service, an emerging industry of private employment agencies in Yerevan, placement offices linked to colleges and universities, and a few NGOs engaged in workforce-related activities. These labor market intermediaries are new and as a group are just beginning to develop needed capacity. Significant gaps in institutional capacity are exacerbated by inadequate information about job openings, the characteristics of the unemployed and the level of unemployment itself.

To date, neither GOAM nor donor organizations have made the labor market a high priority. Extremely slow progress by the GOAM in reforming the laws governing the labor market has left in place rigidities that work to the detriment of workers, companies and communities. Donor organizations support multiple interventions that concentrate upon the demand side of the market with programs and projects designed to promote economic growth and create jobs. Other donor-funded interventions focus on the supply side of the labor market through reform of the education and training system, particularly vocational education. Few efforts focus on the labor market itself.

Occasional labor market surveys have received donor funding, and Armenia has a national observatory, but there is no source of consistent information. An expensive but failed project, SEVAN, sought to create an electronic data system. More successful is a smaller scale Swedish International Development Agency (SIDA) project that has been working with three of the 51 territorial employment centers to enhance their capacity to function as labor market intermediaries. Also, all regional employment centers are getting computers through a PADCO USAID-funded program and staff will be trained to be computer literate.

Our highest priority recommendations focus on improving the capacity of labor market intermediaries, starting with the GOAM Republic Employment Center and territorial employment centers. This system is housed in the Ministry of Social Security, and the primary function for most centers is defining eligibility for and providing unemployment allowances. Although people register at centers to receive unemployment allowances *and* to look for work, centers currently are seen more as tool for poverty reduction than for stimulating economic growth. The centers have uneven capacity and some, very poor performance. They are, however, the public institutions responsible for matching workers with vacancies, and in our opinion, the starting point for building an effective labor market.

The territorial centers have to be the focus, because other participants are so few and far between. There are about two dozen private employment agencies in Yerevan, fewer than there were two or three years ago. Most are paid for performance; a fee on the first month salary is their major source of revenue. To prepare applicants for available openings, the agencies often offer training in (English) language, computer use and business ethics. Because they tend to be demand-driven, the private agencies provide a useful model. Unfortunately, we found none outside Yerevan and even there, few potential customers are well informed about the private agencies, the services they offer, and how well or poorly the individual agency performs.

Although, they are currently not active in this arena, employer associations have the interest and the potential to be important labor market intermediaries or partners to other intermediaries. Funding an initiative to build the capacity and increase the participation of employer and worker associations in the labor market is our second high priority recommendation. Employer and worker associations can help their members acquire the skills needed to become more effective participants in the labor market by disseminating knowledge about model practices and promoting concepts such as continuous process improvement. This, in turn, can be expected to have positive impacts upon productivity, a demand side factor.

The focus on the labor market should not be interpreted to suggest that the demand side (economic development) and supply side (workforce development) strategies are not important. As the above recommendation illustrates, there is considerable overlap. Also, this report contains several recommendations regarding opportunities for USAID to make a positive impact on economic and workforce development. Economic development is needed for job creation to address the basic imbalance in the labor market, and so our third priority recommendation calls for more strategic use of public service employment. By more strategic use, we mean using public jobs not only as a temporary means for transferring income to vulnerable people but also as a tool for creating sustainable economic growth with permanent jobs and for imparting useful skills. The skill development aspect also speaks to the supply side of the labor market.

Overall, we have paid less attention to the supply side, because other international donors are filling this gap. The World Bank is active in education reform, and TACIS is just starting a large vocational education reform initiative. We do, however, recognize that a skilled labor force is an advantage that Armenia must preserve and enhance. In particular, we emphasize the strategic importance of nurturing positive work-related attitudes, skills and behaviors among young people. Thus, our fourth priority addresses what can be done in this area to support, coordinate with, and build upon the efforts of

other donors. In all, this assessment suggests more than 20 possible interventions to create a more efficient labor market, create jobs and a more demand-driven workforce development system.

This assessment drew upon information obtained from a large number of interviews and several focus groups. During discussions, we also tested proposals for their relative importance and feasibility. Still, the need for local stakeholder support is on-going, and broad involvement to build and sustain support for sustainable interventions should continue throughout implementation. Thus, the first step toward implementation should be a series of meetings with the relevant GOAM officials and donor organizations to discuss the specific recommendations made in this assessment and to gain support for coordinated implementation.

We propose a menu of options that in our best judgment will contribute to economic growth, job expansion, poverty alleviation and reduction in unemployment. It will, however be up to the partners in Armenia's labor market- employers, workers, their representatives, educators and government to reach agreement on what the problems are, what should be done about them and what they individually and collectively are prepared to do. None of the proposed strategies are sustainable without their ownership of the problem and the solutions.

Armenia Labor Market Evaluation and Strategy Assessment

Promoting Jobs in Armenia: Which Labor-Oriented Policy Approaches Are Worth Pursuing?

INTRODUCTION

This labor market assessment provides information about the current state of the labor market in Armenia and a list of prioritized development assistance options that USAID Armenia should consider in developing its 2004-2008 strategy. We believe these proposed initiatives or sets of initiatives have the best potential for expanding the number of Armenians employed in the private sector at good wages.

The assessment was conducted in response to USAID Armenia's request that the Global Workforce in Transition (GWIT) project "investigate the constraints and opportunities in the supply and demand for labor and to generate a menu of options on designing possible future technical assistance under the Economic Reform and Energy Office (EREO) portfolio."¹ Furthermore, the Mission's Scope of Work (SOW) for this assessment requested GWIT to identify "strategic program interventions that position human capital in sync with private sector demand now and in the future." To do this, we assess the current situation and develop options to move Armenia toward the following goal:

Armenia has an efficient, transparent labor market with skilled workers able to contribute to the country's economic growth and their personal advancement and with a dynamic economy that creates good jobs that help families and communities prosper.

This goal implies the need to:

- create new and better jobs in a competitive private sector
- improve labor market information and processes that bring workers and employers together; and
- make the education and training system more responsive to workforce requirements.

Thus, the assessment considers the labor market from three perspectives:

1. The demand side of the labor market, which provides the jobs, is the employer's need for workers with certain capacities,
2. The labor marketplace itself - the connection between firms seeking employees and people seeking jobs, and the regulatory, tax, and policy environment in which this occurs - is our primary focus.
3. The supply side of the market comprises workers, job seekers and potential job seekers. It also includes the education and training institutions that help people gain the skills and knowledge needed for employment.

Our assessment finds that broad and deep reforms are needed in Armenia's labor market policies and programs if the goal is to be achieved. We also believe that bringing

¹ USAID/Armenia Scope of Work for this Labor Market Evaluation and Strategic Assessment

about such reforms will require strategic coordination across donor portfolios and among donor organizations, much as has been done in support of comprehensive social reforms.

Several crosscutting themes underpin our recommendations. The first three themes seek to create new conditions that promote rather than impede job creation and employment in the formal sector. The fourth theme recognizes that young people represent the most important asset for the future and are more likely than their elders to have the flexibility needed to make a successful transition from a command to a market-based economy. These themes are compatible with broader USAID activities and support cross-program coordination; i.e. Economic Reform and Energy Office (EREO) technical assistance to micro, small and medium enterprise; Democracy and Governance programs to build local government capacity; and Social Protection poverty reduction efforts. The themes are:

Increase Access to Information and Promote Transparency. An underlying emphasis on transparency is consistent with the overall mission of USAID in Armenia. This theme also reflects the understanding that a perfect market is one where all participants have perfect and complete information. In all aspects of the labor market, we found lack of information that impeded effectiveness and efficiency. We emphasize the importance of strengthening mediating mechanisms to improve communication and linkages among labor market participants.

Develop Countervailing Powers. The public private partnership that characterizes successful economic and workforce development programs is most effective when both partners are strong. In a transition economy, it is necessary to build up the capacity of non-governmental entities so that they can become strong partners for government, providing multiple options and channels for learning/ mediating institutions. It is also important to promote leadership and more entrepreneurial behavior among labor market participants.

Focus on System Building Through Cross-Sectoral Initiatives. Because the labor market is the point where workforce development and economic development meet, strategies to create a more dynamic labor market necessarily address both spheres of policy and practice. Addressing labor market issues systemically through strategic interventions on multiple fronts and through different policy lenses can create a new social context for solving seemingly intractable problems.

Help Youth Become Productive Members of Society. The high level of unemployment and under-investment in the education system create special problems for young people seeking to become responsible adults and contributing members of society. We offer a variety of options for expanding opportunities for this important segment of Armenia's population.

Our thinking about how to approach the problem of creating a more efficient and transparent Armenian labor market is guided by the idea of reaching a tipping point at

which the rate of economic progress is accelerated. The idea of a tipping point² comes from medical epidemiology. “The tipping point is the moment of critical mass, the threshold, the boiling point”³ when things begin to change rapidly. It is the point at which enough people are sick with a certain illness to cause it to grow out of control and become an epidemic. Translated to social science, it is the point at which social conditions or attitudes change sufficiently for enough people to act differently so that they “infect” others to behave in new ways. This idea has been applied successfully to marketing shoes and turning around “social epidemics” such as reducing crime in some of the poorest neighborhoods of New York City and reducing teen pregnancy and highway fatalities in Vermont.

Two related ideas are particularly relevant to what might be done in Armenia. The first idea is that little changes can have big effects because of the mathematical law of geometric progression, especially if the changes address the root causes of the problem. For example, we have argued that lack of transparency in Armenia’s labor market, lack of trust among labor market participants, and unresponsive educational institutions contribute to slow employment growth and high levels of un- and under-employment. (Other causes such as the GOAM’s tax policies and closed borders with Armenia’s neighbors are beyond the scope of this assessment.) Thus, interventions under the Mission’s various Strategic Objectives to build trust among labor market participants and improve labor market transparency will change the conditions within which individuals, firms and educational institutions interrelate with each other and become more entrepreneurial in bringing about needed change. These changes will move the labor market toward its tipping point.

The second concept is “contagiousness,” which recognizes that a small number of people are usually the communicators or spreaders of the “infection,” whether they are truck drivers spreading HIV/AIDS in Africa or hip trend setters in LA. As we discuss below, we believe that there are a number of labor market and education organizations in Armenia that understand what it takes to succeed in a market economy and that have, or potentially have, access to networks of labor market partners so that they can model behavior and spread the word within and across these networks. We therefore place our highest priority on building up the capacity of labor market intermediaries as contagions of effective competitiveness-oriented individual, firm and institutional behaviors and enlisting them in a multi-faceted and coordinated system change strategy. These intermediaries facilitate communication and strong linkages among labor market partners. Strong linkages support an effective labor market that encourages economic growth, increased productivity, and expanded employment opportunities.

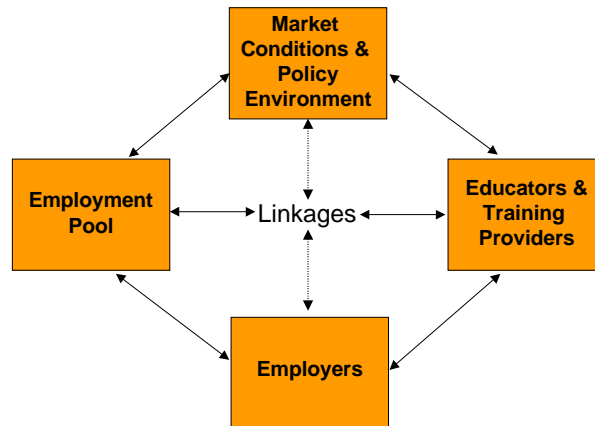
Figure 1 shows the key participants in the labor market and the linkages between them. Interactions among labor market participants are intricate. The employment pool that is the crucial source of competitive advantage in a market economy is the product of the education and training system. Together they comprise the supply side of the labor market. On the demand side, employers create jobs and thus a demand for workers and for training to upgrade worker skills. Without a skilled workforce, however, sustainable

² This idea and the related ones discussed below are discussed by Malcolm Gladwell in his book *The Tipping Point, How Little Things Can Make a Big Difference*.

³ Ibid., p.13.

economic development is not likely to occur. Conversely, economic activity provides the revenues that support the education and training system.

Figure 1: LABOR MARKET PARTICIPANTS



Source: Aring, Monika. (2002) "Workforce Rapid Appraisal Profile (WRAP)." Prepared for USAID Global Workforce in Transition (GWIT) project. Columbus, OH: Center for Employment and Training

A labor market cannot function without jobs. For Armenia with its high unemployment rate, a dynamic labor market requires on the demand side a vibrant economy that exploits the competitive advantages of Armenia so that more jobs are created than are lost. We start with the premise that the demand for labor is derived from the demand for output. In a free market, employers hire when they believe they can use more workers profitably by selling the added production they generate. The SOW calls upon this assessment "to identify where dynamic job creation could be unleashed (and sustained) and what conditions must exist for that to happen."

The demand for Armenian output is linked not only to purchasing power in Armenia (for non-traded goods and services), but also to the ability of Armenian producers to penetrate foreign markets. Armenian firms able to sell a product of world quality at the world price could expand their production even without high levels of internal demand. For these reasons, it is understandable that multiple donor-funded projects are trying to encourage entrepreneurship, to help firms and the self-employed to expand their output, and to increase access to export markets. All these activities seek to shore up the demand side of the labor market.

The goal describes a labor market that has on the supply side, workers with skills and abilities that make them an economic development resource and on the individual level, equip them to get and hold a good job. To achieve this will require supply side interventions that increase the quality (and perhaps quantity) of the labor force so that it becomes an economic development asset. For a small country with limited natural

resources, human resources are an especially crucial contributor to economic development. Potential investors have to regard the workforce as attractive in terms of its productive capabilities relative to labor costs.

Finally, the marketplace itself has to be a transparent, information rich environment that facilitates connections between workers and employers. A smoothly functioning labor market can allocate workers to the highest value uses, avoid disincentives for firms to hire and for workers to take jobs, and encourage workers and firms to invest in training that will yield an adequate rate of return. It generates useful information for all participants. Smoothly functioning does not mean high wages or the best possible world. It only means that, within the context of the production capabilities and demand conditions in the economy, the labor market operates efficiently in the sense that labor market barriers do not inhibit the ability of firms to expand or of workers to find jobs. More positively, a smoothly functioning labor market makes it easier for firms and workers to see and act on opportunities to invest in productive equipment and training to raise productivity and wages.

EDC's previous study of 20 best practice cases of workforce development systems around the world⁴ identified nine characteristics of any effective workforce development program or system – leadership and accountability, demand-driven design, open access, portable skills, continuous improvement, public-private partnerships, sustainable financing, replicability, positive economic and social impact. This assessment looks at opportunities to improve the functioning of the labor market in Armenia with that perspective. In our analysis, we looked for bright spots in the Armenian labor market, examples of programs or policies that promote these nine characteristics – of leadership, or demand-driven design, etc. - and for opportunities to build upon them. As a group, our recommendations are designed to promote development of a labor market environment that promotes and rewards these nine characteristics.

The assessment begins with a summary overview of the current situation in the labor market itself, on the demand side, and on the supply side. The statement of work (SOW) provided a great deal of information that became the foundation for further research. The assessment uses information to identify barriers to an efficient labor market, to job creation, and to development of a trained workforce. It highlights efforts that could provide models for improving the labor market in Armenia. Analysis of this information guides development of strategies and options for crosscutting program interventions. The final section briefly discusses the roads not taken, strategies and interventions that were considered and discarded during the process.

The SOW, a review of previous studies, interviews conducted in both Armenia and the United States, and focus groups in Armenia along with the experience and knowledge of the project team provide the information for this assessment of the labor market. A bibliography, list of interviews and focus group participants is in Appendix A.

⁴ Monika Aring, Cathleen Corbitt, Gail Greenblatt Saporito, and Luis Salicrú. (1996) *Best Practice Compass for Workforce Development*. Newton, MA: Education Development Center. www.gwit.ud/COMPASStoolkit.pdf

THE CURRENT SITUATION

Under the Soviet system, there was no labor market as we know it. Employment was centrally directed, and people were placed in jobs regardless of efficiency and productivity considerations. The resulting overstaffed firms were ill equipped to survive in the market economy. Many have ceased operations. Those that continued or re-started have gone through extensive lay-offs, and the result is a labor market where supply greatly exceeds demand. Excess supply is the single most crucial characteristic of the Armenian labor market. It causes high unemployment and under-employment, and it depresses wage levels.

Despite the general situation of excess labor supply, employers report difficulty in filling jobs requiring specific skills; for example in computer-related occupations and in industrial maintenance. For a limited number of jobs, demand exceeds supply. Unemployment exists alongside vacant jobs. Clearly, connections are not being made, and as a result, economic activity is not occurring. Improving labor market functioning by creating more effective and transparent processes for bringing workers and employers together will contribute to the growth of a dynamic market economy and poverty reduction by:

- enabling employers to fill current and future vacancies requiring high demand skills more rapidly and with candidates that better meet these requirements thereby reducing the drag on their ability to grow, improve productivity and improve the quality of the goods and services being produced;
- broadening job seekers' access to available jobs, especially good jobs, that they wouldn't have known about or be able to obtain through their existing networks of friends and relatives;
- helping job seekers and students gain career planning and job search skills that will reduce the amount of time they remain unemployed and familiarize them with the concept of career ladders as a way of working their way out of poverty; and
- providing job seekers, students, their families, and education and training providers with better information about the jobs that are likely to be available and their skill requirements so that education and training providers can teach relevant skills and people can better prepare themselves to meet projected demand.

A lot of good things are already going on in the public and private sectors, much of it with support from USAID and other donors. For example, USAID has promoted systemic and institutional reforms to create the financial markets necessary to sustain a market economy. The results provide a platform on which to build, and much work remains to be done not only to improve conditions for workforce and economic development, but also to keep from losing ground.

We used an analytical framework called a SWOT to organize and evaluate the importance of the wide variety and types of information gathered for the labor market assessment. The term SWOT comes from the first letters of four words – strengths, weaknesses, opportunities, and threats. The strengths and weaknesses are respectively the positive and negative factors internal to the labor market in Armenia. The opportunities and threats are respectively the positive and negative factors external

to but likely to have an impact upon the labor market. Full SWOT results are shown in Appendix B. The key findings are listed below.

Table 1. Key Findings from Labor Market SWOT

In the Labor Marketplace

- There is inadequate capacity among intermediaries, especially outside Yerevan
- Employers, government and the education and training community are not working together as a workforce development system
- Lack of information and transparency creates inefficiencies in the labor market
- Employment is described as an important element in the GOAM poverty reduction strategy but in fact, it has been a weak area

On the Demand Side

- The economy produces too few jobs and pays inadequate wages for many jobs
- The private sector is emerging from transition and beginning to create jobs, but the public sector reform is just beginning and it will result in large lay-offs
- The high level of formal and informal taxes pushes firms and jobs into the shadows
- The small domestic market combined with the blockade imposed by Turkey and Azerbaijan limit the types of production with strong growth potential

On the Supply Side:

- A high-skill low-cost workforce has been Armenia's most important economic resource
- The population is well educated and literate, but current workforce skills are eroding because they are not being adequately used
- Weakening education system not connected to the economy threatens to undermine future workforce quality
- Remnants of Soviet mentality undermine initiative and entrepreneurship.
- Skill shortages exist in the areas of English language, computer use, and industrial maintenance

Labor Market Overview

Indicators of labor market dysfunction abound in Armenia. High rates of unemployment and under-employment coexist with skill shortages and unfilled job vacancies. Many of Armenia's most employable people are leaving the country to seek better opportunities elsewhere. Employers, job seekers, students, education and training providers- the participants in the labor market- don't communicate well with each other and therefore all lack good information on which to make employment-related decisions. Many have not changed their "Soviet" era attitudes or behaviors to ones that are more compatible with a competitive market economy. The laws governing the labor market create rigidities that work to the detriment of workers, companies and communities. Labor market institutions

including companies, educational institutions and employment agencies lack the flexibility and resources to respond adequately to changing labor market conditions. Few labor market participants have a vision of, or experience with, more flexible and adaptive approaches.

Intermediaries play important roles in labor market function. Active labor market intermediaries in Armenia consist of the Republic Employment Service, an emerging industry of private employment agencies in Yerevan, placement offices linked to colleges and universities, and a relatively small number of NGOs engaged in workforce-related activities. These labor market intermediaries are new and as a group are just beginning to develop needed capacity. Significant gaps in institutional capacity are exacerbated by inadequate information about job openings, the characteristics of the unemployed and the level of unemployment itself. The following describes labor market intermediaries and highlights areas where progress is being made – where there are opportunities to improve the situation.

The Territorial Employment Centers

The GOAM operates its labor market services through the Republic Employment Service with 51 territorial employment centers throughout Armenia. This system is housed in the Ministry of Social Security, and the primary function for most centers is defining eligibility for and providing unemployment allowances. Thus, the system is seen more as a tool for poverty reduction than for stimulating economic growth. They are, however, the public institutions responsible for matching workers with vacancies. Outside Yerevan, these territorial employment centers are usually the only labor market intermediary. The centers have uneven capacity and some, very poor performance.

People register at centers to receive unemployment allowances and to look for work. Few qualify for allowances or find a job through the centers. Only those who have worked for at least a year are defined as unemployed. Only those unemployed who have no working family member get an allowance, which is provided for 5-12 months depending upon the duration of prior employment. As of February 2003, 127,300 people were registered with the centers as unemployed and 7,000 were receiving an allowance. Sixty-seven percent of the officially unemployed are women over 50 years of age who have not held a job for a long time. One employment center director suggested that women are more likely to register with the employment center in order to qualify for unemployment benefits while men are more likely to seek employment in the gray economy.

During 2002, the territorial employment centers placed 8,400 people. As of February 2003, there were a total of 958 posted vacancies – 204 requiring engineers or higher education and 754 for laborers. Despite more than 80,000 laborers registered with territorial centers and looking for work, the centers have trouble finding unemployed people with the skills needed to meet the requirements of available jobs. It is not as hard to fill jobs for engineers and professionals.

The new director of the Republic Employment Service wants to improve the centers so that more employers and jobseekers will use them. She says that lack of data impedes their ability to anticipate and react to the market. They need to do a better job of getting job vacancy information from employers. Longer term, they need to know the prospects

for development of different industries and the labor demand that growth will bring and to be able to analyze the labor market.

There have been efforts to strengthen the territorial employment centers. The skills and capacities of employment center staff are generally considered poor, with significantly lower capacity outside of Yerevan. All are in need of training in customer relations and job development. The Swedish and Lithuanian governments have been providing technical assistance to the Armenian employment centers since 1999, focusing on employer involvement, active labor market strategies and vocational rehabilitation. They have worked in Gyumri, Vanadzor, and a Yerevan employment center. They plan to use staff from these centers to train staff from the remaining forty-eight centers.

By the end of March 2003 all regional centers will have computers provided through a PADCO USAID-funded program on individual identifier numbers, and staff will be trained to be computer literate. Currently records are handwritten in ledgers. The EU invested significantly in a program called SEVAN, to computerize the employment center information systems. This program has faltered. The Republic Employment Center, working with the government's Nemrout Information-Analytical Center is developing a new, Internet-based version. Pilot testing began in early April 2003. (NOTE: Several government officials we interviewed indicated that they would like USAID funding support for the implementation of the information system).

Territorial employment centers have run a small scale training program that uses a four-party agreement between the center, a job seeker, a training provider, and an employer. The employer agrees to hire the trainee, who commits to stay at the job for a designated period. This was two year commitment for a recent diamond cutting class. People being retrained receive a stipend for up to 3 months. The center originally paid for training but in the latest agreement, the center and a diamond industry employer negotiated shared training costs. In 2002, 184 people were re-educated for carpet weaving or diamond cutting under the four-party agreement, and all were employed. A large-scale computer literacy program run through territorial employment centers trained 500 people. That program, which did not involve employers, had a 70 % placement rate

The program is being expanded in 2003. While most reports on the four-part program have been positive, the Vanadzor Center Director described two shortcomings of the program. One problem is that many employers' reluctance to participate because of the requirement that they must repay the government for the training provided unless they hire trainees immediately after the conclusion of the training. The other problem relates to delays caused by GOAM contracting processes. Employment centers must now go through the central procurement office at the national level to contract for needed training, including a lengthy competitive procurement process. According to the director, these delays make it difficult to respond to employers' needs in a timely manner.

Private Employment Agencies

When asked, most government officials spoke disparagingly of private agencies that exploit jobseekers by charging registration fees and then not helping them. (A notable exception was a territorial employment center director open to the notion of partnering.) That seemed true of only one of the ten agencies surveyed, and so our impression was

more positive. In fact, most private agencies are paid for performance. While half charge 500 to 1000 dram to register jobseekers, all but one of the ten also assess a fee on the first month salary, and that fee is their major source of revenue. Still, few potential customers are well-informed about the private agencies, the services they offer, and how well or poorly the individual agency performs.

The first private employment agency began operating seven years ago, and the newest one interviewed had been open for six months. Today, there are about two dozen agencies in Yerevan. After initial rapid expansion, there has been some contraction and closing of branches during the last two years. One manager spoke of a need for consolidation. We found no private employment agencies operating outside Yerevan and so assume that if any do, they are small.

The typical private agency has 2,000 to 4,000 jobseekers in its databases, but the largest had 8,000 listed, almost half of whom were already employed but seeking a better job. Typically, applicants fill out forms, take tests in such things as keyboarding skills and then are given job counseling. Agencies solicit job orders and have contracts with repeat customers. They draw upon their databases rather than advertise openings. Four agencies reported placing an average of fewer than 15 people a month, while the other six each placed about 40 people per month. None specialized in any industry or type of job. Agency managers report no trouble filling job orders, but often pre-employment training is required. As a result, several agencies have begun offering training - usually in computer skills, language (English) and business ethics. Almost all agencies refuse to list jobs they consider too low-paying.

College and University Placement Offices

After the disintegration of the Soviet Union, universities began to help their graduates find jobs. Based upon responses from eleven placement officers interviewed, about half the graduating students seek this assistance. The quality of help is uneven. Half the centers do not offer job counseling, and only three of the ten reported that the majority of graduates are placed. Placement officers rely upon contacts and alumni networks to learn of openings. The more effective centers aggressively pursue job listings, while others wait to be contacted. American University of Armenia and Yerevan State Polytechnic Institute are discussing cooperative placement activities.

State and private universities also have internships, but most are leftover from the old vocational system and are not designed to give the students the necessary skills for employment in a market economy or to position them for a job upon graduation. A notable exception is the program between U.S. owned Leda Systems and the State Engineering University of Armenia, which trains highly skilled computer specialists. This program is a good example of public-private cooperation to meet an employer's need for workers with specific skills. It is described in more detail on page 21.

NGOs Involved in Workforce Activities

Armenia's more than 2,000 authorized NGOs operate in a rather narrowly defined legal framework and get very little government support because of uncertainty about their roles and contracting issues. Government agencies neither know how to contract with NGO's nor how to evaluate their performance. The NGO Training and Resource Center,

with USAID support, is currently pilot testing a competitive grant mechanism in the primary health field that could become a model for how government agencies can contract with NGOs. However, the Center's director cautions that NGO salaries are often higher than that of government staff and therefore the cost of contracting with NGO's may be a problem.

Currently, NGOs are mostly funded by donors, adjust their activities to donor priorities as they change, and become inactive when grant funds run dry. For example, the NGO Training and Resource Center, which was originally established by the Armenian Assembly of Armenia in 1994 to facilitate linkages between NGOs and focused on democracy and governance issues in the late 1990's with USAID funding. With continued USAID support, it now works in the area of primary health care. Few NGOs are active in workforce related issues. Some NGOs provided workforce training in the mid 1990's but the training was not demand-driven so people didn't get jobs. If NGO's were to get into the training business again, they would have to be linked to labor market institutions so that they would train for jobs and skills that are in demand.

Under Armenian law, NGO's cannot set up commercial enterprises - ostensibly because it would be difficult to monitor such activities. This has been interpreted to mean that NGOs can run job programs only if they set up separate commercial subsidiaries. One NGO that has done so is the Coalition of Rural Women, which participated in the food industry employer focus group. Its food-processing workshop, which is set up through a commercial subsidiary, offers part-time employment to farm wives. It is apparent that the NGO needs management and technical assistance for its food-processing subsidiary. The operation is struggling to expand to meet demand. Also, tax obligations from this operation were described as extremely burdensome, in particular the required 5,000 dram/month pension fund contribution because it applies to part-time low-paid workers – and according to the NGO Training and Resource Center, even to volunteers working in NGOs. The same issues were raised by participants in an NGO focus group that we held.

Demand Side Overview

An overview of the economy provides insight into the underlying dynamics shaping the labor market - what the SOW describes as “the motivation factors, mindsets and behaviors that might induce firms or workers to take risks in new endeavors.” A country with GDP growing at more than ten percent per year should offer a good environment for entrepreneurs and for improving the lot of workers. However, GDP growth in Armenia has not resulted in comparable employment growth. It should be remembered that the dramatic increases in GDP followed steep declines and that it requires a 100% increase to offset a previous 50% decrease.

In general, firms that are expanding tend to be subsidiaries or affiliates of foreign firms. that produce to order or else local firms that produce to the specifications of foreign firms. Their customers are largely outside Armenia. The Armenian firms are in the beginning or middle of the supply chain where they have a competitive advantage because wages for skilled workers are so low. While using cheap labor to attract investment and as a basis for competitive advantage can be an effective short-term

approach, it is not a sound basis for long-term sustainable development or poverty reduction strategies.

Despite Armenia's *wage advantage*, the economy is not producing enough jobs. High costs of capital, transportation, energy, and pervasive corruption reduce the competitiveness of Armenian businesses and thus its job creation potential. Keith Griffin saw "evidence of structural problems, e.g., narrowly based growth, poorly functioning credit markets, biases against small and medium sized enterprises, and inadequate public investment in infrastructure."⁵ These problems persist and continue to impede economic development. However, we also found some bright spots.

The Armenian Paradox

The *Armenian Paradox* has been the failure of job growth to accompany growth in output. For 2002, it could be redefined as an increase in the number of jobs without any decrease in unemployment. Anecdotal information reinforces more detailed statistical data showing significant changes occurring within the employed population during the last several years. There have been continuing structural adjustments – both positive and negative. Many large firms, previously state-owned, ceased operation but remained alive on official records along with their employees who are, of course, no longer actually working there. Over time, the number of these ghost jobs is decreasing – due to retirement, privatization, bankruptcy, and through attrition as workers abandon their claims to ghost jobs to register as unemployed or take a real job in the formal economy. (NOTE: Holders of ghost jobs may participate in the informal economy, but undocumented activity does not affect their claim to the ghost job).

Replacing ghost jobs with real jobs does not affect total employment, but it contributes to increases in GDP and also, wages. Average real wages have been rising, although not as rapidly as GDP and at a slowing rate. Still, the real wage increase in 2002 was 10.3 %. An increase of that magnitude suggests that at least in some areas, the demand for labor has to be catching up with the supply. Overall, however, salaries remain low. According to official data, the average salary in 2002 was 26,444 dram (\$46) a month.⁶

Last year, employment change moved into the positive column as the private sector continued its recovery from earthquake, the collapse of the Soviet Union, and the dislocations of transition. Employment growth in 2002 returned employment to the 2000 level. The official data also reports a slight net in-flow of workers in 2002. It remains to be seen if this is the beginning of sustainable job growth in the private sector or just an anomaly – perhaps caused by greater difficulty in entering the US in the wake of September 11.

Sector Trends

An in-depth analysis describes Armenia's economy as a steep pyramid with three tiers. On the bottom is the subsistence economy with low productivity and high self-employment operating largely in the shadows. The second tier is the inherited economy

⁵ UNDP 2002, page 163

⁶ Economic data is from AEPLAC, *Monitoring Armenia's Economic Development*. February 2003.

of state-owned and privatized organizations operating at a fraction of previous levels. It has low productivity and essentially no self-employment. The third and by far the smallest layer comprises new SMEs that have made the successful transition to the market economy. The approximately 7,000 employees, in the third tier produce about US\$230 million in output, a level of productivity that is seven times that for the inherited economy.⁷

Heavy industry, which was dominant during the Soviet era and now dominates the second tier, is not recovering despite Armenian hopes for its revival, The service sector is growing, but as in other countries, many service sector jobs are low-wage. One manager of a private employment agency described a labor market in development producing an increase in job orders but mostly in service jobs that do not pay well. Although finding jobs for graduates is the hardest part of their job, all but one of the eleven college placement officers interviewed reported an increasing number of suitable job openings for their graduates. Graduating lawyers, economists, accountants and especially programmers are in demand. The placement officers consistently named IT and food processing as the fastest growing industries in terms of jobs. Tourism, light industry, jewelry, and services also were mentioned as growth industries. All described heavy industry as an area of continuing job loss.

The persistence of the blockade imposed by Turkey and Azerbaijan dims any hope for revival of heavy industry in Armenia, because it greatly restricts Armenian access to international markets. One analyst estimated that the impact of the blockade was to decrease Armenia GDP by a third.⁸ Rail and road transit through Georgia and Iran are expensive and difficult. The other alternative is air travel, which favors export of products with high value to weight ratios; i.e. diamonds, software or luxury foods.

Unfortunately for unemployment levels, the public sector is about to begin reform processes that will greatly reduce the bloated public payroll. The World Bank will invest \$10-15 million and DFID, another \$5 million in broad-based civil service reform projects. The thousands of long-term unemployed from old heavy industries – many of them older workers - will be joined on unemployment rolls by the employees of hospitals that are closed and other health care workers, by teachers, and by civil servants from national ministries, starting with the Ministries of Finance, of Trade and Economic Development, and the Prime Minister's Office. Many civil servants are already on unpaid leave, but more will be laid off. Reform will not begin until after the May parliamentary elections and may be delayed further for political reasons, but it is impending.

The labor market assessment looked at the overall functioning of the labor market and then probed more deeply into the specific situation for three target industry clusters – information technology, food processing, and textiles and apparel. The three industry clusters were chosen to provide insights into the labor market dynamics of industries with a significant presence and strategic importance to the economic base, plus strong

⁷ World Bank Report No. 22854-AM, *Armenia Growth Challenges and Government Policies*, page 3-4.

⁸ Richard Beilock, *Helping Armenia Without Helping the Blockade*, presented at Armenia: Recent Economic Trends and Growth Prospects, The World Bank, January 25, 2003.

growth – current or potential. Together the three industry clusters cover the full-range of labor force skill levels and provide geographic diversity.

The selection of industry clusters guided invitations to six of the focus groups – one for workers and one for managers from each industry. It should not, however, be interpreted as suggesting that these three industry clusters offer the best hope for the future or should be the primary focus of economic development activities. There are other industries that also offer promise of job growth during the next five years. These include jewelry and diamonds, machining/industrial engineering, pharmaceuticals and fine chemicals, environmental science, engineering, and tourism.

The Shadow Economy

Statistics about the Armenian economy describe only the formal, registered economy and leave out the informal or shadow economy. By definition, the shadow economy defies accurate measurement, but UNDP estimated it at 60% of year 2000 GDP and growing. “The tough and inefficient taxation and customs policies, governmental regulations and restrictions, as well as corruption occupy a prominent place among the factors contributing to the creation and expansion of shadow economy.”⁹

In focus groups and interviews, employers consistently complained about the 5000 dram per month pension fund contribution required for all workers, no matter the salary or hours worked. This tax, almost 20% of the official average wage, appears to be a major factor inhibiting expansion of part-time and entry-level jobs in the formal economy, pushing jobs into the shadows where they tend to stay. It should also be noted that the large shadow economy casts doubt upon the validity of official statistics.

The Diaspora Contribution

Diaspora investments have contributed to economic development, but the larger share of Diaspora funds go to charitable foundations. In part, this reflects hard lessons learned by Diaspora Armenians in the early 1990s. Early investment decisions were guided by emotions as well as by analysis, and oversight was not always sufficient to protect Diaspora investors from predatory local partners. The second wave of investing, which appears to be building, is marked by tighter oversight by Diaspora investors who own and manage the businesses. The Diaspora is a convenient doorway to international markets, and all the foreign partners we learned of are Diaspora Armenians. If Diaspora investment continues to revive, it has strong positive implications for job creation.

Today, Diaspora investment is contributing to development of IT, food processing, tourism, electronics, rug, and other industries. In addition to the high profile Diaspora Armenians like James Tufenkian with his rug and tourism businesses or Kirk Kirkorian with the Lincy Foundation, there are numerous smaller investors. Local observers report that Armenians living in Iran appear to be leading investment in food processing, while Russian-Armenians are investing in electronics, and US-Armenians are active in IT. Diaspora Armenians provide more than investment. The Diaspora are providing an export market for Armenian products, a contact point for entrée into foreign markets, and

⁹ UNDP, 2001

technology transfer - often by initiating joint venture agreements between firms in their current country of residence and firms in Armenia. An Iranian-Armenian investor who has recently returned and started a food processing business in Ararat said that many more people like him were on their way.

Temporary Public Service Employment

Temporary public jobs are widely used in Armenia as a safety valve to address high poverty and unemployment rates. Their primary goal is to transfer income to vulnerable people. The UN-sponsored work for food program served 17,000 people in 2002. For the last three years, the GOAM Allowance for Work Program has operated through the territorial employment centers, providing employment and a salary (800 dram/day) to those who desperately need both. Under the GOAM program, an employer submits a proposal for a public works project to a 12 member provincial commission, comprised of representatives from unions, NGOs, and local government. The employer pays for the costs of materials and the employment center recruits and supplies the workers. The average project duration is 4-5 months. Allowance for Work provided temporary employment for 11,000 people in 2002. For example, the program in Gyumri grew from 1200 participants in 2001 to 1700 participants in 2002, and during our visit we saw people sweeping litter off the street. Last year there were 600 people in public works jobs in Vanadzor and 1300 in Lori Marz. Jobs ranged from sweeping streets to reconstruction of public buildings and preservation of historic structures.

Supply Side Overview

The supply side of the labor market, like the demand side, has not yet fully recovered from the shocks of transition, earthquake, and war. Although there is an emerging group of young people who have the knowledge, skills, attitudes and opportunities to succeed in Armenia's economy, a large segment of the older population is being left behind. Poverty and even extreme poverty can afflict those who are working. Large segments of the population, especially older workers, rely on remittances and/or work in the gray economy to make ends meet. Participation in formal education at all levels has declined, in part because people can't afford the fees being charged by the resource starved education system. Many people are discouraged, no longer believing in a brighter future.

We found broad consensus that Armenia's education system needs repair. The consistent message is that schools are not addressing labor market needs, and even current graduates have to get further training in order to become employable. This situation has attracted significant donor attention. The World Bank and the European Union TACIS program are investing heavily in education reform, in elementary and secondary education and in vocation education respectively.

Many of the problems in the education system are covered in the education and human capacity development assessments already prepared for USAID. This assessment addresses educational issues specifically related to the labor market and most specifically in the context of cluster-based economic development. It considers the relevance of educational offerings to changing economic needs and the lack of infrastructure for further education and training or lifelong learning as it is commonly

called. Both public and private sector labor market intermediaries describe the supply side of the labor market as having a skill deficit alongside a labor surplus.

Education and Skill Levels

Armenia's strong tradition of education and highly literate population contributed to a strong economy and relatively affluent position within the Soviet Union. In several ways, this strong education tradition is an asset in today's economic environment. The relatively low cost of skilled Armenian labor has emerged as a key - and perhaps sole - competitive advantage for labor-intensive light industry; for example, hand made shoes and tailored clothing. The skilled-labor cost advantages are sufficient to overcome the expense of importing raw materials and then shipping out product - both by air.

Parents' high level of education provides a strong foundation for supporting the education of their children. There is evidence that many parents are using their meager resources to invest in their children's education. However, because of the poor quality and lack of relevance of many educational offerings, many of these investments are not paying off in terms of their children's employment and earnings. We were told that many young people with degrees remain unemployed for a long period of time after graduation because they and their families think available jobs are beneath them.

Long-term unemployment, which allows skills to erode, and the current decline in education infrastructure (both physical—schools, technology, materials—and human capital/social – teachers, functional social networks) threaten the skill/cost advantage Armenia now has in the global economy. Educational enrollments are falling and drop-out rates have risen, at least in part because of the increased costs of education and people's recognition that the current system does not guarantee a good job. If the generation now in the schools emerges less literate than their parents, Armenia loses an important asset.

The education system under communism produced people with theoretical rather than practical knowledge. Its currency was educational credentials that provided access to good jobs in a planned economy rather than adaptable skills that are marketable in a market-based economy. Today, the information and skills being taught are outdated and other skills that have become necessary post-transition (e.g., project management, marketing, finance, etc.), are not being taught in the education system. Moreover, the disconnect between education and training providers on one side and the business community on the other reinforces these negative impacts upon human resource development.

One notable bright spot is the cooperation for the past two years between U.S. owned Leda Systems Corporation and the State Engineering University of Armenia, which operate a jointly sponsored program for highly skilled computer specialists at the Bachelor, Master and PhD levels. Leda Systems was anticipating a significant increase in employment, but the state university was not able to train people adequately for company needs. Therefore, Leda's Armenian subsidiary decided to invest in preparing its own future employees. To begin with, Leda and another U.S. company, Cadence Design Systems, gave the university electronic design software and services to upgrade the capacity of its microelectronic circuits and systems department. Under this highly competitive program, undergraduate students, who have completed their second year,

are selected for the program and are paid \$75 to \$150 per month living expenses with better students receiving a higher stipend. Students are taught by a faculty made up of both university professors and senior Leda specialists and get their practical experience by doing productive work for Leda. They are required to sign a contracting agreeing that if another firm hires them away; the firm has to compensate Leda. Based on anticipated hiring requirements, the company has taken 30 students into the program each year with the promise of guaranteed employment and a joint degree from the university and Leda at the end of the two-year program.

Further Education and Training

In advanced economies, employers – especially larger firms – are important sources of workforce training for new hires and for incumbent workers. The employers we talked to in Armenia expressed a strong preference for hiring young people and then training them, usually by having an experienced worker take the new hire under his or her wing. However, we found little interest in further training after the initial preparation for employment - except possibly when new equipment, technology or products are introduced. Employers lack resources and are interested in getting a quick return on any investments they make. The concept of the career ladder is not familiar.

Certificate programs are becoming an increasingly important workforce development tool in the U.S. and other countries. Such programs are created in conjunction with industry and prepare people to industry skill requirements. There is already a banking college developed with GTZ support. In addition, the American University, in cooperation with Marriott and several other hotels in Armenia has put together a proposal for a 2-year certificate program in tourism to upgrade the skills of those in the industry and to prepare new entrants to the industry. The employee, perhaps in conjunction with an employer contribution, would pay for the training, using the University's loan fund to front the money.

We found several interesting mechanisms for financing further education and training, but the reach of these mechanisms is very limited. For example, private employment agencies broker arrangements whereby the employer pays for a new employee's training upfront and then the employee pays the employer back over the first several months of employment. Regional employment centers currently operate a small four-partite training program (described in the labor market overview) that is a formal agreement between unemployed person, employer, trainer, and employment center, whereby the government pays for all or some of the cost of training and the employer agrees to hire the graduate.

The American University of Armenia (AUA) has initiated two programs to help students finance their studies. The first is a deferred payment plan, which has had a very low default rate. AUA has recently created a loan fund with private resources and is seeking additional support from the Eurasia Foundation. Students who take advantage of this financing option are projected to graduate with about \$1000 worth of debt, which must be repaid within two years. University officials think that this level of debt should be manageable, given projected earnings for AUA graduates, who are more marketable than graduates from many other universities. Since the loan program is just starting, there is no default rate yet, but based upon the positive experience with deferred payment plan, administrators are optimistic.

Attitudes

Armenia like other transition economies suffers from persistence of the *Soviet mentality*. This tendency to do only what someone in authority tells you to do and to exhibit no initiative is a barrier to entrepreneurship. Excluding individuals who trade goods in the shadow economy as a survival strategy, the small number of enterprises suggests that Armenia has an exceptionally low level of entrepreneurship and new business formation. The statistical data was reinforced by a focus group of workers, where even the young people said *other people* should be entrepreneurs and create jobs for them. No-one considered the possibility of being an entrepreneur and creating their own job plus jobs for others. Another issue is that entrepreneurs were viewed with scorn under communism, and the corruption that accompanied the transition to a market economy has kept alive the perception that to be successful, entrepreneurs must be dishonest.

As noted in the demand overview, Armenian firms draw upon the marketing expertise of their foreign customers and partners. This can be an effective avenue for learning and technology transfer. However, it can also be an excuse for not learning, seeing these tasks as *not my job*. Which attitude prevails depends upon the individual, but the lingering remnants of Soviet attitude encourage the latter. While there are notable exceptions, too many company leaders/entrepreneurs lack the attitudes, skills and behaviors needed to succeed in the competitive global marketplace.

Age and gender issues also affect the supply side of the labor market. As noted above, employers prefer to hire and train young people. Older workers – especially older men - are described as too inflexible and slow to learn. The fact that women make up more than half of those registered as unemployed may be a function of men leaving for jobs in other countries and generally being reluctant to define themselves as unemployed. The private employment agencies interviewed all described women as easier to place and more cooperative, better employees.

The Impact of Remittances

The World Bank estimates that remittances contribute \$ 450 million USD to the Armenian economy each year. To put this in perspective, consider that the GDP for 2003 is projected to be about \$2.5 billion USD.¹⁰ The scale of the remittance contribution skews the Armenian economy toward consumption. Remittances distort the labor market and allow a level of consumption that exceeds income, possibly reducing the incentive of individuals to take jobs – certainly poor-paying menial labor.¹¹ At the same time, remittances help alleviate poverty and are used by at least some individuals to prepare themselves for gainful employment; i.e. by financing education or the start-up of a small business. It appears that the largest impact of remittances is the intended one. Remittances have provided a safety net for many families. They have alleviated the impact upon Armenians of economic problems, and relieved some burdens of poverty.

¹⁰ AEPLAC page 7.

¹¹ Keith Griffin – UNDP page 153-4

The impact of remittances is best considered after separating them by source. One source is the Diaspora. Interviews with recent immigrants to the US reveal that these individuals are supporting whole families in Armenia – sometimes more than one family. Such a situation makes it likely that the remittance will be used for consumption – and perhaps to avoid taking a job deemed beneath one - and not be used for investment. We also found anecdotal evidence that remittances from the Diaspora pay for higher education for young people, education that their families would otherwise not be able to afford.

A second source of remittances is from the earnings of Armenians who have taken temporary jobs abroad. These workers send back their salary in the form of remittances. The latter scenario is not so much a distortion of the labor market as a response to the basic situation of the labor market, inadequate jobs. Few people would chose to leave their families behind to take – often menial – jobs in another country if there were jobs available at home. In our estimation, this second source of remittance does not represent reduced work effort. The individual is simply working in a different location, and the job that enables the remittances is an alternative to unemployment within Armenia. However, a negative aspect of these remittances is that an individual with marketable skills is leaving Armenia to work elsewhere, thus depleting the skill resources of the local labor force.

A question raising valid concerns is what will happen if remittances decline. Clearly reduced support from the Diaspora will have a negative impact upon the domestic economy through reduced demand for goods and services as well as a negative impact upon the standard of living of the individual recipients. The impact of a reduction in the second source of remittances is more complex. If the decline occurs because Armenians are able to find acceptable jobs within Armenia, it will demonstrate economic progress but slow the decrease in unemployment. In fact, official statistics for 2002 suggest this may be occurring, because there was job growth, reduced emigration of workers, and little or no decrease in unemployment. However, if a decline in remittances occurs due to reduced employment opportunities abroad, this has the potential to significantly increase economic hardship within Armenia as well as increase unemployment.

OPTIONS FOR CROSSCUTTING USAID TECHNICAL ASSISTANCE

We propose a full menu of options for future USAID technical assistance to build toward a tipping point and move the Armenian labor market closer to the goal that began this assessment. The options proposed build upon the strengths, address the weaknesses, exploit the opportunities and respond to the threats identified in the SWOT analysis. Recommended options address the labor market itself, the demand side that is creating jobs, and the supply side that is producing workers. Together, the options seek to create new conditions that promote rather than impede job creation and employment growth in the formal sector. Thus, there are links to initiatives undertaken in the contexts of democracy and governance, education, energy and economic recovery programs, macro-economic policy and other elements in the USAID strategy.

Options are described separately, but are not mutually exclusive and can be combined in numerous ways. For example, the option to pilot test dislocated worker strategies in

anticipation of major public sector worker lay-offs would likely involve the territorial employment centers and NGOs and may involve a public service employment component. The option to strengthen employment centers' capacity to serve as a resource for employers and job seekers can easily be combined with another option to pilot test improved linkages between these centers and the vocational training system.

In the following section on Moving to Implementation, we combine these options in four projects that we recommend for first order USAID/Armenia investment. These projects are timely and strategically designed to promote systemic change in basic labor market institutions and potentially reach large numbers of labor market participants with relatively low levels of additional USAID investment. These changes will make the labor market a positive rather than negative factor in the business climate and therefore job creation.

Criteria for Prioritizing Options

As called for in the SOW, we have prioritized the options proposed and suggested how their implementation might be sequenced recognizing certain "windows of opportunity" and the reality that institutional capacity needs to be built before other steps can be taken.

We considered the following criteria in prioritizing the menu of options:

- Providing a mix of strategies that stimulate growth, create jobs and reduce poverty
- Cost related to likely impact
- Timeframe - can USAID achieve results quickly (3-5 years) or will it take a long-term investment
- Number of problems addressed by the intervention
- Political feasibility
- Cultural feasibility
- Likely ease or difficulty of implementation
- Whether or not other donors are already addressing this adequately
- Likely ability to reach scale/ move the numbers enough to demonstrate impact
- How it builds on current/previous USAID investments
- Whether or not this is a unique window of opportunity
- Relationship of opportunities to risks

Tables 2 A through C summarize the technical assistance options proposed below, beginning with those that address the labor marketplace followed by those that address the demand side and the supply side. The table shows how the proposed options are aligned with the Mission's Strategic Objectives and Interim Results included in the current draft of the 2004-08 strategic plan. This latter information draws on feedback we got from Mission staff after the debriefing session we conducted on April 10, 2003.

Guiding strategies are in bold type with related interventions listed below them. Each intervention has a suggested relative priority of high, medium or low, according to its likely impact upon the labor market. Please note that these priorities are relative, not

absolute. (We have eliminated any options we consider truly low priority or in appropriate, and they can be found in the final section, The Road Not Taken.)

The next column is the suggested implementation timeframe. The assessment feeds into the USAID five year strategic plan and the timeframe suggests early (years 1 and 2), mid (years 3 and 4) or late (year 5) project start date within that five-year period. The last column provides an estimate of the cost of implementing this option. Estimated costs below \$500,000 are deemed low while costs in the \$500,000-\$3 million range are considered mid cost and those above \$3 million are high cost. Actual costs for USAID would depend on the scope and length of activities as well as the amount of resources leveraged from other sources. More specific estimates would be developed within the statement of work and subsequent contract negotiation processes.

Table 2A: Priorities for Proposed Options to Create a More Efficient Labor Market

STRATEGY/INTERVENTION	PRIORITY	TIMEFRAME	COST
Enhance the Capacity of Territorial Employment Centers (SO 3)			
Strengthen employment center capacity to serve as a resource for employers and job seekers (SO 1)	HIGH	EARLY	MID
Pilot Test Improved Linkages with the Vocational Training System	HIGH	EARLY to MID – work with TACIS schedule	MID
Strengthen Employment Center’s In-house Training Capacity	LOW	MID to LATE	HIGH
Strengthen Labor Market Information and Technology for Territorial Employment Centers	MEDIUM	MID	LOW
Enhance the Capacity of Business and Professional Associations to Provide Leadership in Workforce Development and Productivity Improvement (SO 1)			
Conduct seminars and other knowledge sharing activities about human resource and quality issues	HIGH	EARLY	LOW
Establish Recognition Awards	MEDIUM	EARLY to MID	LOW
Establish Mentoring Relationships with US Firms	MEDIUM	EARLY	LOW - MID
Facilitate development of Regional Skill Alliances (linked to clusters)	HIGH	MID to LATE	HIGH
Use the Media to Change Attitudes, Promote Entrepreneurial Behavior and Provide Information about the Labor Market (SO 2)			
Sponsor Regular Newspaper Columns on Workplace Rights and Responsibilities	MEDIUM	MID to LATE - after labor law reform	LOW
Sponsor a Weekly Call-In Show on Job Issues – Job Search, Self-Employment, Resources Available To The Job Seeker	MEDIUM	MID to LATE - after labor law reform	LOW
Embed Workforce Themes in Soap Operas	MEDIUM	EARLY	LOW-MID

Advertise and Market Employment Center Services	HIGH	MID to LATE	LOW
Pilot Test Dislocated Worker Strategies in Anticipation of Public Sector Lay-Offs (SO 3)			
Pilot Test Dislocated Worker Strategies	MEDIUM	MID	
Build Up NGO Role in the Labor Market as a Complement to the Public Sector (SO 1)			
Support demonstration projects on: <ul style="list-style-type: none"> • Alternative learning programs • Job Clubs • Community-based training enterprises 	HIGH	MID to LATE (After addressing other issues re NGOs)	MID - HIGH

Table 2B: Priorities for Proposed Options to Create More and Better Jobs

STRATEGY/INTERVENTION	PRIORITY	TIMEFRAME	COST
Encourage Development of Industry Clusters to Enhance Competitiveness (SO 1)			
Define and map target industry clusters	HIGH	EARLY	MID
Promote strategic interventions to address cluster weaknesses and gaps	HIGH	MID	MID-HIGH
Make workforce development central to any cluster development programs; i.e. promote RSAs	HIGH	MID	HIGH
Use Public Service Employment More Strategically to Create Permanent Jobs (SO 3)			
Add requirements for sustainability, business plans, job creation, local government involvement	HIGH	EARLY	MID
Integrate training into PSE programs	HIGH	EARLY to MID	HIGH
Establish/Expand Youth Service Programs	HIGH	MID	HIGH
Improve the Business Climate (SO 1)			
Facilitate Access to Capital – mezzanine financing and operating capital	HIGH	EARLY	MID
Continue to Promote Tax and Regulatory Reform and to Support Implementation	LOW	MID to LATE	LOW
Support Labor Code implementation	MEDIUM	MID to LATE	LOW

Table 2C: Priorities for Proposed Options to Create a More Demand-Driven Workforce Development System

STRATEGY/INTERVENTION	PRIORITY	TIMEFRAME	COST
Tap Diaspora Resources to Develop the Skills of Armenia's Workforce (SO 1)			
Organize a mentoring program for young Armenians with US-based Diaspora organizations of young professionals	HIGH	EARLY	LOW

Establish a fund to leverage donor-sponsored travel and training opportunities	MEDIUM	MID to LATE	LOW
Support youth returning from study abroad	LOW	MID	LOW
Make the Education System More Relevant, Flexible and Responsive (SO 1)			
Support development of certificate programs	HIGH	EARLY	LOW-MID
Promote entrepreneurship education through school-based enterprises	HIGH	EARLY	MID
Pilot test career academy model	LOW	LATE	HIGH
Broaden Access to Further Education and Training			
Evaluate AUA student loan program	MEDIUM	EARLY	LOW
Study other financing options	MEDIUM	EARLY	LOW

Assistance Options to Create a More Efficient Labor Market to Support a Dynamic Market Economy

Enhance the Capacity of Territorial Employment Centers

We start with recommendations regarding strengthening the GOAM employment centers because their functions are a necessary, if not sufficient, component of Armenia's labor market system. While an effective public-sector labor market intermediary system is not the only thing needed, it is the starting point. Many of our other recommendations connect back to the employment center system. Therefore, we give the following set of recommendations a high priority level, but prioritize among the recommendations and suggest how the recommendations might be sequenced.

Even though employment is a key element of the GOAM's poverty reduction strategy, the territorial employment centers are the weakest link in the government's capacity to address either this goal or its economic growth targets. The centers are under-resourced. Staff is poorly paid and for the most part lack the skills to do their jobs well. Centers operate with few, mostly out of date computers, inadequate information systems, and inadequate access to training and other services that could help people obtain good jobs. The centers' performance is poor even in the rather narrowly defined functions they now perform. Most of the jobs that are listed with the employment centers are poorly paid even by Armenian standards.

We propose the following options, discussed in priority order, for strengthening this system:

- Strengthen employment center capacity to serve as a resource for employers and job seekers.
- Pilot test improved linkages with the vocational training system
- Strengthen employment center's in-house training capacity
- Improve labor market information and technology for territorial employment centers

Strengthen Employment Center Capacity to Serve as a Resource for Employers and Job Seekers. The territorial employment centers depend upon employers to list openings with them. While some center directors recognize that employers are an essential customer of their centers' services, for the most part they have neither done much in terms of establishing good relationships with employers in their jurisdiction, nor

in providing them information and other services to help them address their workforce needs.

USAID should consider helping the centers create local data bases on NGOs and other training and consultation resources for employers and job seekers so that they become aware of these resources and can serve as a central community resource on labor market issues. The process of doing this will require employment centers to reach out to employers, labor unions, NGOs, other community organizations, including vocational education and private employment service, training and business consultation providers and thus facilitate longer-term communication and linkages among these organizations.

This activity should be complemented by cross-training on labor market issues of staff of employment centers, NGOs and other community organizations. The training should include a focus on best practices in such things as dealing with long-term unemployed, at-risk youth, and working with dislocated workers. This latter group is especially important given the pending lay-offs of civil servants. Cross training should be followed up to facilitate on-going coordination and communication. We suggest that the project be carried out in places other than Yerevan where the need for better services is greatest and so as not to compete with small, but emerging private employment services industry.

We recommend that these activities be initiated in the first year of the Mission's new strategy because it will take time to build capacity. In addition, once employment center capacity improves beyond current levels, USAID should consider assisting employment centers in strengthening their services to employers. Currently, employers list either very poorly paid jobs with the employment centers because they cannot get people to take these jobs or they list jobs for which there is an inadequate supply of skilled labor. Instead of just accepting these listings, the employment centers could work with employers either to improve job quality and/or provide training to people to meet these skill shortages. (See recommendation on strengthening in house-training capacity below)

Pilot Test Improved Linkages with the Vocational Training System. USAID should consider pilot testing improved communication and collaboration between the employment centers and vocational education system in the 3 Marz in which TACIS will be working with the vocational education system to develop new "competence centers." These centers are intended to provide opportunities for further education and training. Linking the employment centers to these new centers would accomplish two things: First it would help ensure that the training provided through these competence centers is demand-driven so that trainees can acquire commercially viable skills. Second, it would provide employment centers with greater access to training opportunities in high demand skills such as computer skills, English, machine maintenance and business ethics.

We place a high priority on this recommendation because the long-term payoff from such pilots is significant. Improved linkages should have an impact on improving the market relevance of the employment center and vocational education systems. Lessons learned from these pilots could then serve as a model and be exported to the broader employment service and vocational training systems. In addition, because of the tie-in to TACIS activities, this is a time sensitive window of opportunity that should be addressed early in the strategy.

Areas of coordination could include the provision of labor market information including projections on demand occupations and skill requirements to assure relevance to economic needs, arrangement of internships with employers so that students can gain practical experience, and placement activities for program completers so that they can apply their skills in productive ways. Since the TACIS effort is still in the early stages of development, site selection and the specifics of coordination strategies could be worked out by USAID, TACIS and their respective implementing contractors. In addition, this should be coordinated with the Swedish initiative to provide assistance to the employment center system.

Strengthen Employment Center's In-house Training Capacity. Employment Centers currently are limited to providing training through the previously mentioned four-partite training program. The benefit of this training is that it is directly tied to employer demand and therefore results in immediate employment for those trained. However, as discussed earlier, this strategy has its limitations and it is not a useful vehicle for a broader effort to enhance local human resources capacity in high demand skills such as computer literacy, English and business ethics.

In the future USAID may want to consider pilot testing the creation of an in-house training capacity for such generic skills and perhaps a limited number of more job-specific skills in high demand within their jurisdiction. Private employment agencies with experience in conducting training programs might be brought into such a project. In addition, an employer advisory group could be established to oversee such training to make sure that the really is a demand for such skills and that the training meets employer requirements. Such an advisory group could also be given authority to decide that a specific training course is exempt from current limitations of employment center sponsored training – i.e. the 90 day limit and ineligibility of college graduates.

We place a lower priority on this option and think that a decision on how to proceed can be postponed to see first whether collaboration with the vocational system can adequately address this need and second whether the contracting problems with the current four-partite program can be resolved. Furthermore, creating an in-house training capacity is likely to be an expensive undertaking. If a decision is made to go forward with this option, we recommend that initial efforts be pilot tested as part of a response to the upcoming dislocation of civil servants. (This issue is discussed further below.)

Strengthen Labor Market Information and Technology for Territorial Employment Centers. It is very clear that the territorial employment centers are lagging in producing or using labor market information or using computers to manage information. It is equally clear that they would like USAID to finance data collection and equipment purchases. We do not recommend the USAID do any more to finance equipment purchases than is already being done through the contract with PADCO. The EU involvement in development of the SEVAN system was a very expensive mistake, and it is too early to tell if the system being developed by the Nemrout Center will be effective. Its reliance upon the Internet certainly raises a concern, given the severe telecommunications infrastructure problems in Armenia. At this point, it would be easy to spend a large amount of money on computer equipment that was not well used, and in fact, that appears to be a danger. Pilot testing of the new system has just begun.

However, USAID may want to consider supporting staff training in how to use the computer system once it is operational. Experience has shown that such training is a crucial component of computerization. This is a relatively low-cost option.

Enhance the Capacity of Business and Professional Associations to Provide Leadership in Adoption of Best Practices in Workforce Development and Productivity Improvement.

One of the major challenges to improving Armenia's competitiveness is changing the mindset and behavior of business owners, managers and labor leaders. Armenian businesses tend not to cooperate. They lack a vision of how they could operate differently and evidence that adoption of other practices would work to their advantage. USAID could address this need by strengthening the capacity of business, professional and labor associations to facilitate knowledge sharing among their members and to provide greater leadership in promoting adoption of best practices in workforce development and productivity improvement.

We place a high, but somewhat lesser, priority on this recommendation because many business assistance and competitiveness activities are already underway in Armenia. However, we suggest that with a relatively small investment the following ideas could be incorporated into or coordinated with such activities.

These associations could:

- Host a series of seminars on effective human resources practices or the workforce implications of companies seeking ISO certification. Best practices among Armenian companies could be drawn from all of the existing networks of companies being supported by USAID and other donors. Best corporate and labor practices from other countries, especially CIS countries in similar circumstances could also be showcased.
- Jointly sponsor a program that recognizes leaders (based on best practice criteria) in such areas as workplace modernization, compliance with ISO standards, continuous improvement and working with schools to make the curriculum more relevant to industry needs and expanding opportunities for students to gain practical experience. The process of reaching agreement on the best criteria to be used in the recognition program would be a learning process for all involved. In addition, the criteria could be widely publicized once they are developed and companies could be encouraged to formally or informally benchmark their practices against these criteria. Also, recognized leaders could be recruited as spokespeople for reach out to others to urge them to adopt these practices. Finally, companies could be shown how recognition could become an important competitiveness tool as it has for Baldrige award winners in the U.S. or companies receiving the Investors in People designation in the UK.
- Facilitate the development of one or more skill alliances (as discussed under cluster-based development) as a way of demonstrating the benefits of collaborative action to employers.

In addition, USAID could support partnerships between the Armenian Manufacturers Association and the US National Association of Manufacturers to establish mentoring relationships between companies, and between Armenian labor unions and the AFL-CIO Working in America Institute to learn about successful labor management practices.

Conducting seminars and developing criteria for use in a recognition program are low cost activities that could begin immediately. The cost of actually operating a recognition program would depend on how it is constructed. For example, would it be based on some form of peer review or include a formal assessment and certification process and would employers be expected to pay for these activities? Operating a skill alliance would cost in the mid-level range, but the number and scope of activities would influence costs. Finally, establishing mentoring relationships could be done rather inexpensively, but costs could escalate depending on the number and kinds of joint activities envisioned.

Use the Media to Change Attitudes, Promote Entrepreneurial Behavior and Provide Information about the Labor Market.

A variety of media-related activities could be undertaken to increase information and transparency in the labor market. We place a medium priority on these options for the short run because we believe it is important to build up system capacity before you try to get the public to use it. However, some of these ideas would be inexpensive to implement because they could build on and use materials developed under previous USAID funded activities in Armenia or other relevant countries. For example,

- A regular newspaper column could be created to focus on workplace rights and responsibilities under the law (including but not limited to the soon to be revised Labor Code), workplace best practices, jobs, and training issues;
- An employment related call-in show could be sponsored on local radio or television. The show would provide advice on job search, self-employment, information on resources available, including loans and grants to pay for training, the services available through territorial employment centers and many of the other organizations funded by donors;
- Scripts addressing workforce related themes could be developed in conjunction with the producers of locally viewed or listened to soap operas or youth-oriented shows. The purpose would be to change education and work-related attitudes and demonstrate ways to function successfully in a market-based economy; and
- Once employment centers develop capacity, promote the use of their services by employers and jobseekers. (We understand that the Vanadzor employment center has requested funding from TACIS for developing a brochure and bill boards advertising the center).

Pilot Test Dislocated Worker Strategies in Anticipation of Major Public Sector Worker Lay-Offs Resulting from World Bank and DFID Supported Civil Service Reform.

As indicated, significant public sector layoffs will occur over the next several years threatening to increase the number of officially unemployed even more. USAID, in

cooperation with the World Bank and DFID, should pilot test a number of interventions in Armenia that have proven to be successful in addressing dislocation-related problems in other countries, especially other CIS countries. Many of the strategies discussed earlier could be targeted at former civil servants and implemented in areas that will be particularly hard hit. Other models that combine labor management action teams, job clubs, peer counseling, quick start training and local economic development and have proven to be successful in the US, Hungary, Poland, Bulgaria and other CIS countries could also be considered.

We give this recommendation a medium priority because the layoffs are still somewhat down the road and the interventions will be relatively expensive to implement. However, piloting dislocated worker strategies could be a focus of efforts to strengthen NGOs or employment centers. Identifying relevant best practices and lessons from the US and other countries could be done with a small investment of resources.

Build Up the NGO Role in the Labor Market as a Complement to the Public Sector.

Even with a stronger government employment center system, it is important to build up nongovernmental organizations that can facilitate communication and linkages among employers, unions, educational institutions and other stakeholders in the labor market. Creating this intermediary capacity outside of government is especially important at this point in Armenia's development because of the rigidities of government and the fact that neither employers nor workers trust government enough for it to serve as honest brokers among stakeholders. NGOs also bring community intelligence on needs and resources, often about the needs of special populations such as youth, orphans, women and refugees. Building up the NGO sector also provides an opportunity to demonstrate the effectiveness of strategies that cannot presently be provided through government because of legal and resource constraints. Furthermore, strengthening the NGO role in the workforce arena builds on USAID's current and previous investments in this sector.

Assuming that the NGO Center's current USAID supported pilot test of a competitive grants mechanism for delivery of primary health services will prove a success, the government could be urged to use NGO's in the workforce arena, especially in two areas:

- Meeting the employment needs of special populations such as refugees, out-of-school youth population and youth making the transition from secondary school to work; and
- Focusing workforce development activities in ways that will directly contribute to local economic development.

We recommend that USAID work through the NGO Center to identify 2-3 existing NGOs that have the interest and potential capacity to serve as intermediaries in the employment field. USAID should then support projects with these NGOs to demonstrate different ways in which a labor market intermediary can serve the needs of individual job seekers while being demand-driven and contributing to local economic development. The demonstration projects should draw on relevant workforce development models that have proven to be effective in the US and other countries. These models include:

- Alternative learning programs that combine education and work for out-of-school youth. Such programs should incorporate a strong focus on youth development. They could be used to facilitate the transition from school to work and as a way to keep long-term unemployed youth engaged. Such programs are needed particularly in communities outside of Yerevan in which the dropout rate is increasing.
- Job clubs that help make workers aware of the way their interests and qualifications might mesh with the market, how the labor market works, how they can improve an employer's business, and, where appropriate, how they might start a business themselves. Job clubs support people in their job search by providing career counseling and networking opportunities as well as instruction in how to look for a job, how to write a resume and how to interview for jobs successfully. Job clubs may be particularly appropriate for use with older dislocated workers who not been working in the formal sector for quite some time and newly laid off civil servants.
- Creation of community-based training enterprises whose main purpose would be to provide skill development and relevant work experience to enhance the employability of participants. These enterprises would be designed to generate income to provide stipends for participants and to sustain the operation of the enterprise. They are a natural complement to the kinds of public service employment innovations we discuss below. If USAID is interested in pursuing this option, it should explore options for how best to do this. Based on information gleaned from focus groups and interviews, it appears that to do this NGOs might be required to set up separate commercial subsidiaries so as to comply with current legislation enacted in 2001, which has been interpreted as preclude NGOs from engaging in employment generating activities.

Alternatively, these models could also be pilot tested through employment centers. In either case, it will be important to find sites that have the capacity to undertake such activities.

Although we think it is important to build up the capacity of NGOs to serve as labor market intermediaries, we recognize some of the problems in doing so. Therefore, we recommend that action on this recommendation be postponed until the third or fourth year of the new strategy cycle. This will leave some time for clarifying the status of NGOs and resolving a variety of policy issues surrounding them. We caution that pursuing this option will require a significant investment in NGO staff development and building capacity so that they can implement the kinds of strategies suggested below. Furthermore, since NGOs have not been active in the workforce arena, they will require linkages to labor market institutions to assure that their activities are truly demand-driven resulting in improved labor market outcomes for the people they serve. These labor market institutions, themselves, need to be strengthened before they can serve as a resource to NGOs.

Assistance Options to Create More and Better Jobs

Encourage Development of Industry Clusters to Enhance Competitiveness

A geographic agglomeration of businesses with similar or complementary products and common inputs provides a basis for competitive advantage by attracting suppliers, support service and a skilled workforce. This effect is intensified when the sources of information for the industry – education and training institutions, research and development and marketing intelligence are also close-by. Together, they form the industrial cluster, which has come to be recognized as a highly competitive structure in the global market economy. Promoting cluster development has been shown to be an effective economic development strategy. It should be a high priority for USAID as it promotes economic development in Armenia. Although the activities recommended will as a group require significant investment, many of the recommended interventions are already occurring – just not in a cluster-focused manner.

USAID has pursued cluster-based economic development in other countries, but workforce development has not been central to those efforts. This immediately limits the potential benefit of a cluster-based approach, because the flow of knowledge within a cluster and the skills of the workforce are the crucial components of competitive advantage. Thus, implementation of cluster-based economic development should, from the very initial stages, recognize the central position of workforce development. Consistent with this, our recommendations here acknowledge the importance of workforce, and our recommendations that address the supply side of the labor market refer back to cluster-based development.

For USAID to design a cluster-based strategy to increase competitiveness of Armenian industry requires additional information. From the perspective of the labor market assessment, recommended activities to promote cluster-based development include:

- The first step - and thus the highest priority in temporal terms - is to contract with competitiveness expert(s) to define and map potential industry targets for cluster development. This will make it possible to assess how complete - or more accurately, incomplete - the industry clusters are. The cluster map identifies gaps that are promising targets for interventions and can provide a framework for multiple efforts – possible involving multiple donor organizations - aimed at developing and strengthening the cluster. The industries targeted for this assessment plus the additional industries listed above offer a good starting point for cluster definition and mapping.
- Once potential targets for cluster-based strategies are defined and mapped, USAID can further a cluster-based strategy by promoting strategic interventions that address identified gaps or weaknesses in the cluster. An early intervention is to encourage development of networks and cooperative activities among firms; for example, joint marketing and representation at trade shows. In the Armenian environment, training in business ethics should also accompany efforts to promote inter-firm cooperation.
- Cluster-based strategies should from the beginning speak directly to workforce issues. An example at the high level is encouraging relationships between research universities, higher education and leading firms such as in the Leda example described on page 21. A broader tool is the Regional Skill Alliance (RSA). These are consortia of firms, educational institutions and other community partners that tackle common workforce development problems facing a targeted

industry or geographic area. We recommend that USAID facilitate the development of one or more RSAs as a way of demonstrating the benefits of collaborative action to employers. For example, the RSA may design and deliver industry-focused training that meets industry standards and leads to better jobs for workers. Skill alliances have proven successful in preparing unemployed workers for entry-level and higher-level jobs, upgrading the skills of incumbent workers and tackling industry-based skill shortages. We believe that this concept is likely to find immediate acceptance. Currently one of the employers, who participated in the Gyumri focus group, is seeking financing for a training facility that will prepare workers for the area's light industry, noting that people who sew apparel need skills similar to those of people who sew leather shoes.

The costs of such activities range from the mid to high levels depending on the number of industries targeted and the activities undertaken. Such decisions can't be made until potential industries are defined and mapped. The cost of this first phase depends on the quality and amount of analytical study already done.

As part of this assessment, one team member looked in greater depth at the opportunities in the "high tech" arena, taking a cluster-based approach and integrating demand and supply side initiatives. The resulting suggestions for development of clusters in IT and related industries and in environmental science and services illustrate the interaction between supply side, demand side, and labor market interventions. Comparable combinations of interventions could be used to strengthen clusters in lower-tech industries such as food processing, textiles and apparel. The initial work produced suggestions regarding target clusters. These suggestions should be confirmed or modified by the more in-depth cluster mapping recommended above.

The current IT sector initiative is too limited a sector to provide the development impact at the scale targeted by USAID. The World Bank's Enterprise Incubator Foundation (EIF), funded at \$5 million over three years, is probably sufficient for this sector. Moreover, the EIF's director has outstanding qualifications and understanding of how to develop this sector. We suggest that coordination would be useful, but caution USAID not to duplicate nor engage in much additional program work specifically in IT. IT as a sector initiative is too narrow, particularly given the recent industry declines. However, an expanded Science, Engineering, Education, and Technology sector initiative (of which IT would be part), is an area that should be developed. The historically strong science, technology, and engineering skills and education in Armenia provide a strong base for targeting development in this area.

Environmental sciences and services are a cluster that may have significant potential not just for specific business development for also as a cluster that connects many elements of the labor market system. The pressing infrastructure needs, ranging from transportation to water and energy, require a large pool of engineers and technicians, technology innovation (both significant innovation and incremental innovation such as technology localization), and skilled and unskilled labor. It is an area that cuts across a number of science, technology, and engineering fields, builds on an existing base of knowledge in Armenia, and is the focus of significant aid by donors, NGOs, and Diaspora.

Use Public Service Employment¹² More Strategically - as a Tool for Developing Marketable Skills, Developing Infrastructure for Economic Growth and Enhancing Local Government Capacity

Public Service Employment (PSE) has been widely used by donors and GOAM to transfer funds to vulnerable and unemployed populations. It has proven an effective tool for income transfer and produced positive results in Armenia. PSE could have greater impact in terms of sustainable economic growth and social entrepreneurship if it were used strategically as well as tactically. We recommend that USAID build upon existing investments in public works programs to take the concept of public service employment to the next level by linking it with the creation of self-sustaining economic activity, social entrepreneurship, and capacity building for local government. Involving local authorities and citizens in planning both promotes sustainability as well as tying into USAID programs that promote more democratic and open government. Recommended parameters for a modified PSE program include the following:

- The activity or product of the activity must create a public good or an economic development resource with a strong potential for more permanent job creation
- The proposal be accompanied by a business plan that demonstrates sustainability of the project or activity and the expected job creation impact
- The program includes a training component - linked to demonstrated skill needs - so that participants learn or upgrade skills that will improve their prospects for more lucrative permanent employment, including self-employment.
- Program planning and project selection involves the local government and its citizens in a transparent participatory process

Potential activities include but are not in any way limited to:

- Building renovations to increase energy efficiency of public buildings and to demonstrate the economic benefits of retro-fitting to private owners – the potential market;
- Planting trees to reclaim land for productive use and/or establish orchards;
- Building and operating a community canning/drying factory for fruits and vegetables;
- Building and staffing a community kindergarten, health care clinic, or other needed facility;
- Providing care for elderly and disabled individuals; and/or
- Supporting tourism development through research and publications on historic and cultural or even culinary traditions, preservation of historic buildings and sites, documentation of significant events, etc.

Save the Children Federation (SCF) is moving in this direction with its USAID-funded public works employment program. The program started with one-month employment and expanded to two and now three months. The other change has been increased involvement of the local authorities. Both changes are intended to promote sustainability, creating long-term economic benefit and lasting jobs. In an interview, SCF staff described projects such as kindergartens, sports complexes, water systems, clinics, bath-houses, rehabilitation of public buildings, etc. Projects completed in 2001-2002 created 220 permanent jobs, and another 60 are projected for 2003. Another benefit is

¹² We use the term public service employment rather than public works employment to include service provision as well as construction and maintenance.

that participation in the Civic Action Groups trains leaders, and 60 have become local elected officials.

It will be necessary to calculate an appropriate wage for the PSE program. Like other job creation strategies, this approach should avoid offering wages too high to draw workers from the private sector, yet should allow some wage dispersion to attract unemployed moderate to high skill workers. The World Bank and USAID have commissioned a salary study, which is about to be updated, that could offer useful insights despite its office worker focus. Other guidance comes from existing programs and wage data. For the last three years, the SCF programs have been paying the equivalent of \$90/month for temporary, full-time work. In contrast, the GOAM Work for Allowance program pays 800 dram/day, which is about \$30/month, and official (but unreliable) statistics put the average wage below \$50/month.

Workers in focus groups said that the unemployed and people working in trade in the shadows do not want to work for \$50/month. Considering the increased costs for transportation, clothes and food, it would take a salary of \$100/month to make a job worthwhile. However, young people apprentice at no salary when they know that in a few months, they will be getting a \$100-\$150/month job. The nature of the work, the length of the employment, the training that is provided, and the likelihood of a permanent job, and the local cost of living all should be considered when setting the wage rate.

Implementing this recommendation is high priority. While it is a high cost, some of this- for example developing better work sites an involving local government and citizens in program planning- can be achieved in the near future with relatively little additional expenditure through modification of existing programs that are consistent with current program directions. However, building a training component into the program may involve curriculum development, teacher salaries and training and other operational costs. It is of course, also possible to make an even larger investment through expansion of existing programs as well as the creation of new ones. There are no prerequisites or changes that have to occur to make implementation feasible.

Youth Service. Youth service is a specialized form of public service employment that builds citizenship and work readiness skills, provides multiple avenues for positive youth development and contributes to community and economic development. A universal youth service program, possibly an alternative to military service, at least for some, could be developed to help young people completing secondary or postsecondary education make a smoother transition from school-to-work. Despite the fact that they are not officially considered unemployed, dropouts as well as school completers are often unemployed for long periods of time before they gain meaningful employed. During this period, they become discouraged, have few if any earnings, their skills erode, and they, their families and the society as a whole lose much of the benefit of their joint investment in young people's education. This is a drain on Armenia's human capital that it can ill afford to continue if it is to improve its economic standing in the world

Alternatively, a smaller program could be designed to reach one or more target populations- out-of-school youth who have not completed secondary school, orphans, and youth from vulnerable populations – and to complement vocational education and apprenticeship programs, especially in areas outside of Yerevan. Youth service can

provide an alternative learning program for those young people who drop out before completing secondary school.

In either case, many of the elements of the program would be similar to those suggested above. However, a strong youth development component should be included tailored to the needs and interests of young people at different stages of development. This activity is likely to be expensive and take several years to implement since we are not aware of any current youth service program that could be modified or expanded.

Improve the Business Climate

Improving the business climate promotes job creation and thus addresses the basic imbalance in the Armenian labor market. The business climate has multiple components, which are addressed by a wide range of policies and programs.

An efficient labor market contributes significantly to a good business climate. This section of recommendations addresses other aspects of the business climate that surfaced during focus groups. Employers expressed deep frustrations centered on two factors directly impacting job creation. The *gap in the system* for entrepreneurs and investors is the difficulty in accessing adequate capital. The other major barrier to job growth lies in the tax and regulatory environment, especially the regressive pension fund contribution.

In addressing issues related to the business climate, the labor market assessment acknowledges the importance of USAID and other donor efforts to expand access to capital and to promote tax and regulatory reform. While these initiatives are important to the labor market as strategies for job creation, they are central to finance, economic and micro, small and medium business development strategies. Including them in the labor market assessment reinforces the inter-related nature of economic and workforce development.

Facilitate Access to Capital. Armenian businessmen complain that their capacity to expand to meet market demand is limited because banks prefer gold as collateral for loans, interest rates are high, and loan terms are short. The greatest difficulty is experienced by businesses in the regions outside Yerevan. The banks, which are concentrated in Yerevan, assign very low value to the machines, buildings, and land these businesses might offer as collateral. The types of capital most difficult to access are mezzanine financing, which would provide the investment to support business expansion, and operating capital, which is needed when a business expands. The inability to access mezzanine financing means that business owners cannot make the investment needed to move small firms to the next level. Should an entrepreneur find the funds to expand the business, inadequate operating capital can doom an investment that otherwise would succeed. One businessman said that it would be foolish to give him half the money he needed – that was the road to a failed investment.

It is also true that the managers and owners of businesses frequently are not good loan risks because they lack the business skills needed for operating in a market economy. This lack of skills is itself a barrier to obtaining capital. Information from interviews and focus groups suggest that the need for management and technical assistance remains most acute in the areas of:

- Customer service;
- Cost accounting – product and service pricing;
- Developing new products and markets; and
- Technology transfer.

To avoid an unnecessarily high default rate, management and technical assistance – not limited to the topics listed above - should be part of any effort to improve access to capital. For example, parameters for mezzanine loan programs would include:

- Required business plans (as for any business loan program);
- Embedded technical assistance and possibly mentoring;
- At least a year follow-up monitoring assistance for both borrowers and lenders; and
- Building capacity of private sector lenders.

Addressing the mezzanine financing and operating loan gaps in the capital market is a high and immediate priority from the perspective of job growth, but implementation will require significant investment. USAID/Armenia staff reported that they were out of the business of capitalizing revolving loan funds. If other sources are found, USAID investment could provide management assistance, which will require specialized expertise. USAID is already supporting programs that provide management and technical assistance. We estimate that the start-up and management costs related to such a fund is in the mid range. Although the cost of capitalizing such a fund is high, funds would come from sources other than USAID.

The Diaspora has proven to be one source of investment capital, and Armenians living abroad are a potential resource for capitalizing a national mezzanine loan program. The investment experience of Diaspora Armenians has been mixed at best and conflicts between foreign and local partners have generated a climate of distrust. This must be addressed if the Diaspora is to be recruited to support and capitalize a mezzanine loan program. Aggregating the funds from individual investors and making loans to multiple businesses allow a loan fund to reduce overall risk. In this environment, other safeguards to reduce the risk to the individual investor should include incorporating management and technical assistance for borrowers, as well as careful oversight to prevent fraud.

The administrative entity for this fund will need to establish its credibility by operating in a transparent, consistent manner and following an established and publicly available set of procedures. USAID, through ex-pat consultants hired to oversee administration, should be actively involved in implementation through the start-up period and beyond. This participation would be designed to establish credibility and proper procedures and then to cease, leaving the fund to continue as a self-sustaining entity.

The more sophisticated Diaspora investors could also be a source of technical assistance and mentoring. Improving access to capital is an active area for interventions, and so USAID interventions should seek to complement and not duplicate activities by the GOAM and by other donors

Continue to Promote Tax and Regulatory Reform and to Support Implementation of Reform Legislation. Armenia looks toward Europe and has a long-term strategy to join the European Union. The Armenian-European Legal Advice Center (AEPLAC) is

working with the GOAM to align Armenia law with European standards under the Partnership and Co-operation Agreement (PCA) with the European Union. AEPLAC also helped Armenia make the legal and regulatory changes necessary for WTO membership. There have been numerous, very positive changes in the law, but implementation, administrative and enforcement capacity have lagged. The slow, problematic implementation is a concern for the labor market because entrepreneurial development – with its power to create jobs - only flourishes where there is a supportive, transparent, predictable legal framework.

The *UNDP 2001 Ten-Year Review of Armenia's Transition* described year 2000 changes in taxation legislation that created two major groups of taxpayers: (i) fixed and simplified taxpayers and (ii) those taxpayers who prefer paying profit tax. The intent was to let taxpayers choose and to gradually decrease the tax burden on businesses. However, tax changes have not had the desired impact on job creation. Employers interviewed and in focus groups noted that the tax change was accompanied by imposition of a flat 5000 dram per month tax on all employees, regardless of salary. The pension fund contribution as currently structured is discouraging the hiring of entry level employees and of part-time employees. This impact reverberates through the labor market because employers have expressed a strong preference for hiring at the entry-level and training in-house. An adjustment to the funding formula that removed the strongly regressive nature of the employer's pension fund contribution for lower paid workers could remove a barrier to job creation at the low end. This could be done by encouraging GOAM to make a revenue neutral change in the pension tax by calculating the employer's contribution as a percent of salary. The tax as written today is pushing jobs into the shadows.

Problems with the tax system extend beyond the regressive pension fund contribution. Employers described interactions between the business tax reforms and the VAT tax that actually raised their tax burden. Moreover, there is pressure on business to pay profit taxes in advance so that IMF targets can be met. One employer described paying taxes in advance as a way to avoid trouble with tax collectors. Confusing and constantly changing tax regulations make it difficult for the best-intentioned business to be in full compliance. Widespread confusion about the specifics of tax calculations creates opportunities for rent-seeking behavior by tax officials and headaches for entrepreneurs.

The lack of information about tax requirements is having a significant negative impact on the business climate. Clarification is beyond the scope of this labor market assessment. However, it is clear that successful implementation requires clarification, perhaps fine-tuning, and certainly dissemination of accurate information. USAID could play a strong constructive role in promoting implementation of tax reform legislation through training, workshops, and other information dissemination activities. This also would contribute to a transparent process and reduce opportunities for corruption.

Implementation of this recommendation is a lower level priority, in part because it awaits actual legislative changes and in part, because the European Union has taken a lead policy role here, given Armenia's goal of eventual EU membership. It will, however, not require significant additional expenditures. USAID sponsored workshops on tax and regulatory issues could be integrated into existing activities such as support of business and professional associations and of NGO involvement in labor market and related issues. See program options on pages 31-34.

Support Labor Code Implementation. The labor code is a legislative and regulatory issue with direct relevance to the labor market, and so it is considered separately. Armenia is still operating under the Soviet era labor code. Revisions have been the subject of extensive work over the last two years. Adoption of a new labor code is a second tranche condition under the World Bank SAC 5 for Armenia, and so it is reasonable to expect legal changes soon. There is a potential role for USAID to promote implementation of the new labor code once it has been enacted. This is particularly important given the negative impact on job creation of the current labor code and Armenia's previous problems, described above, in implementing new laws. Implementation assistance might include the following:

- Support a public awareness campaign related to implementation of the labor code to inform employers and employees of their rights and responsibilities under the new law. This might be done by:
 - Sponsoring a media campaign;
 - Posting mandatory notices in companies of workers rights and what employers must do;
 - Publishing brief handy guides as we do in the U.S. under the National Labor Relations Act; and/or
 - Sponsoring workshops for lawyers, perhaps in conjunction with the legal association.

- Collaboration with the World Bank to establish and build the capacity of an independent enforcement and appeals capacity. USAID could make Armenians aware of various private, non-legal models for resolving labor-management disputes that are used in the U.S. and assist with implementation.

While the labor code reform is both directly relevant and important to this assessment, we see it as a mid-to-low level priority for USAID. The World Bank has taken the lead on this and has the power to secure legislative change. However, it is still important for USAID to monitor progress and ensure that the US perspective is brought to the table. Other activities are a lower priority. The World Bank perspective on implementation – based on their experience in other countries – is that the legislation should be passed and established as law. It will be observed by foreign firms and the larger Armenian firms, and this solidifies the changes. Then after two years, broader effort to secure compliance would become appropriate. As in the workshops regarding tax and other regulatory changes, USAID has the low-cost implementation option of working through existing programs supporting business associations and NGOs.

Assistance Options to Create A More Demand-Driven Workforce Development System:

For Armenia to move out of poverty, it will have to move to higher value-added products and services, upgrade its production processes and improve the quality and consistency of what it produces. Doing this will require strengthening connections between Armenia's education system and the economy and expanding options for skill development at all levels during people's lifetimes.

As discussed previously, Armenia's higher education system is very theoretically and

degree-oriented. While this system served the country well during Soviet times, it no longer meets the needs of Armenia's population or its emerging market economy. Currently, Armenia lacks educational institutions whose mission focuses on workforce and economic development. It also lacks sufficient alternative learning opportunities for adults to upgrade their skills and for youth, who have dropped out of school, to gain the skills they need for labor market success.

We suggest that USAID consider taking actions in the coming years to do the following:

- Tap Diaspora Resources to Develop the Skills of Armenia's Workforce
- Make the Education System More Relevant, Flexible and Responsive
- Broaden Access to Further Education and Training

Tap Diaspora Resources to Develop the Skills of Armenia's Workforce

The Diaspora, which is estimated to be twice the size of the Armenia population, is a unique resource for interventions on the supply side as well as the demand side of the labor market. The greatest attention has been on the demand side where Diaspora investments, charities, development projects, joint ventures and other partnerships have created new economic activity. Our recommendation for a mezzanine loan fund suggests Diaspora resources as a source of capital. However, there are also opportunities on the supply side to use the Diaspora to promote human resource development within Armenia.

On the supply side, Diaspora Armenians already support study abroad programs. There is, however, no organized program to link Diaspora resources with workforce development. Interviews in Armenia surfaced frustration with Diaspora preferences to invest in charity rather than business development. Creating a framework for Diaspora investment in human resource development links the impulse toward charity with economic development. Potential sponsored activities include:

- Create mentoring relationships between young Armenians and their countrymen and women living abroad. One possibility is organizing a mentoring program with US-based organizations (Armenian Professional Society, Armenian Professional Network, Armenian Students Association)
- Establish a fund to leverage existing donor-sponsored training programs by subsidizing fees or travel costs for study tours
- Work with Diaspora Armenians to set up a support program for the students returning to Armenia after a year abroad. International Research and Exchanges Board (IREX) sends students to the US for a year (USIS program), and there are other scholarships, but when they return, no-one does anything with or for them. Something as basic as creating a formal organization of IREX alumni could help them make the transition back to Armenia and become a resource for their community.

Diaspora Armenians are likely to be especially sympathetic to programs designed to help young people become productive members of society. Youth programs also could be targeted; for example, to help orphans (many children were orphaned by the earthquake) coming into the labor market acquire the necessary skills and behaviors.

Using the Diaspora resource more effectively is a broad strategy that we recommend be adopted in the near term and continued throughout the term of USAID presence in Armenia. However, establishing the framework for using the Diaspora resource more fully may require some legal changes. According to UNDP, “there are certain problems, which require that the status of Diaspora Armenians in the Homeland be changed. Flexible laws should clearly outline certain obligations and privileges. The status of Armenians who left this country in the new wave of emigration in the 1990s should be clarified within the traditional Diaspora structures, facilitating their integration into organizations that operate in the communities abroad.”¹³ Promoting the necessary legal changes would be an important initial step in USAID efforts to mobilize Diaspora resources. This should be a relatively low-cost activity. Absent knowledge of the resource situation for USAID Armenia, it is difficult to assign a priority to this activity, but mid-level seems appropriate.

Make the Education System More Relevant, Flexible and Responsive

In addition to supporting a project that creates connections between the employment centers and vocational education, USAID should consider supporting pilot or demonstration projects on how to make Armenia's secondary and postsecondary education system more relevant to the needs of the economy. We think these should be a lower priority for USAID funding as stand alone activities than our other recommendations because the European Union and World Bank are investing in education reform. However, we recommend that USAID consider implementing some of these options in conjunction with cluster-based development initiatives or other activities being undertaken with industries targeted by the EREO. The following approaches are useful for addressing immediate and anticipated skill shortages and enhancing education system capacity in high priority areas:

- *Promote joint sponsorship of degree programs.* The Leda- State Engineering University of Armenia partnership discussed earlier could be adapted to other specialized fields needing advanced training.
- *Use Expatriate Experts as Guest Lecturers.* Another coordination opportunity is to invite the consultants that come to Armenia for the USAID-funded International Executive Service Corps or the Geek Corps to serve as guest lecturers in relevant program areas.
- *Co-locate firms with colleges.* Again, Leda can serve as a model for this approach in which the college and firm share facilities and close proximity makes it easier for industry practitioners to teach courses and offer seminars. Based on our interviews, firms appear to have sufficient capacity for current employees to teach a course without significant cost to their work productivity. Under this model, below market rental rates could be offered in return for a teaching requirement. While attracting firms to locate in new offices should not be difficult, it would be important to not let current occupancy/investment in large soviet-era buildings either inhibit co-location or drain on resources for physical maintenance.

¹³ 2001

Physical space can also be provided for co-location of firms across a broad spectrum of engineering and technology companies to spark innovation. Experience has shown that physical proximity can be a key determinant to collaboration and development of technologies that span more than one discipline.

Two-year certificate programs. We were told that the Eurasia Foundation is interested in funding the development of the tourism certificate program at the American University of Armenia, but that they will not be able to fund it until the next program year because they can't fund more than one project with one grantee at a time. USAID could coordinate with the Eurasia Foundation to support start-up activities in anticipation of their funding next year. USAID might also consider supporting development of such programs in other fields. The AUA is interested in starting IT certificate programs, if they can get Armenian instructors certified. Another potential area for a certificate program is food processing. This might be pilot tested, perhaps incorporating an e-learning component, in a rural college such as one of the ones in which the Germans are already working.

Certificate programs could be implemented using USAID's Association Liaison Office (ALO) contracting mechanism to support partnerships with US community colleges that have programs in these areas. Since many certificate programs already exist, we estimate the cost of adapting them to Armenian needs, teacher training and certification to be in the mid-level range.

School-based enterprises. School-based enterprises are a model for providing secondary students with practical experience that is relevant to the labor market. Such programs teach entrepreneurship as well as other business skills and business ethics. They also have a positive spill over effect on parents, who often learn from their children's experiences. Junior Achievement now operates school-based enterprises as a one-semester elective course in a subset of Armenia's secondary schools. These activities could be expanded and linked to other strategies discussed throughout this report. Desired scale will influence cost, but we estimate that a two-three project should cost in the mid range.

Career Academies. USAID may want to consider pilot testing implementation of various Career Academies at the secondary school level to create a pipeline of well-prepared prospective workers for targeted industries. Career academies are "schools within schools" that focus student learning on a specific industry and career cluster (e.g., health, electronics, business). In career academies, each student takes a core of academic courses, and receives workplace exposure and career counseling, all of which integrate occupational and academic material based on an occupational theme. Local employers help design school curriculum, donate equipment, and provide mentoring, and summer internships. Career academies are a proven model for raising the educational achievement of at-risk youth, preventing them from dropping out and encouraging them to go on to further education and training beyond secondary school. American Express has pioneered career academies in banking and tourism that might be particularly relevant to Armenia's needs. The cost of such a project would be high because it would entail staffing, facilities and other operational costs as well as start-up curriculum development and staff training costs.

Broaden Access to Further Education and Training.

Armenian people are highly motivated to gain the knowledge and skills needed to get a good job in Armenia's changing economy. However, many don't have the money to pay for either their initial preparation or further training. Financing therefore remains a major workforce development challenge. We include the following option in our recommendations because it seems like a low cost “window of opportunity” for addressing this important issue.

Through our assessment, we identified several fledgling financing mechanisms to support lifelong learning that are being implemented at a very limited scale. These strategies include deferred payment plans, loans and various shared funding arrangements involving employers, individuals and government. As indicated, the American University of Armenia has several strategies that might serve as models for the broader system. USAID should consider collaboration with the Eurasia Foundation in evaluating the pilot test of a loan program with American University of Armenia to determine whether this model is adaptable for non-elite institutions in which the return to individuals on their training investment may not be as great. This study might be expanded to consider other options that might be appropriate for Armenia under its current circumstances. Both of these ideas are low cost.

NEXT STEPS IN MOVING TO IMPLEMENTATION

We believe that all the options for USAID assistance proposed above have the potential to contribute significantly to economic growth, job expansion, poverty alleviation and reduction in unemployment in Armenia. In our best judgment all of these options are technically and institutionally feasible, taking into account the issues raised related to some of these recommendations. As indicated, some of the options proposed take advantage of particular “windows of opportunity” for leverage and collaboration.

Our focus in this assessment is on the labor market. Therefore, in this section of the report, we offer further advice on how USAID/Armenia should consider combining various options in timely and strategically designed projects that could be initiated in the first year of the Mission's new strategy; and on the process of getting partner feedback and buy-in to recommendations so that efforts will be sustained and result in real changes in the labor market.

Because of the difficulty of separating labor market issues from those on either on the demand- and supply-side, we begin with two additional comments:

Given the basic situation in the labor market of supply well in excess of demand, the Mission should place a high priority on assistance activities that help create jobs. Our recommendations on strategies to create a more efficient labor market are designed to support this goal, recognizing, however, that other assessments are focused upon program areas directly impacting job creation - such as capital access, support for micro, small and medium enterprises, tax and regulatory reform. We also recommend that USAID adopt a cluster-based perspective in its economic development efforts. An industrial cluster expands the industry definition. It includes the flows of inputs described in the value chain from raw materials to the end user PLUS the flows of knowledge about markets and technologies that enable a firm to succeed in the competitive

environment of a market economy. Cluster theory recognizes that knowledge is crucial to firms' ability to compete in the global economy and highlights the importance of workforce skills and knowledge. Thus, we urge USAID to include workforce development issues and strategies as an integral and important part of any initiative that might be taken in this area. However, to use the cluster perspective requires first an analysis of the economic base to identify and define the industry clusters.

On the supply-side, young people are Armenia's greatest resource for building a successful civil society and market economy. In the options presented above, we have identified numerous ways in which USAID could expand opportunities for youth to develop positive work-oriented attitudes and behaviors and become productively engaged in their communities. Some of the ideas presented such as engaging the Armenia Diaspora in mentoring relationships with youth are relatively simple and low cost while others such as developing a youth service program would require a larger and longer-term investment of resources. We have not clustered these ideas in a youth project per se, but urge USAID to support a range of youth-focused activities across its assistance portfolios.

Recommendations for Project Integration

We propose the following three projects to address our highest priorities for improving the functioning of Armenia's labor market:

Strengthen Employment Center Capacity to Serve as a Community Resource on Labor Market Matters. This project combines two of the options discussed above. The project would involve employment center outreach to local labor market partners, cross-training of staff, and pilot test improved linkages between territorial employment centers and the vocational training system. The project would significantly enhance the capacity of the fledgling employment center system and provide a much needed labor market perspective in the reform of Armenia's defunct vocational training system that is just getting underway with European Union assistance. The project would be conducted in one or more of the 3 Marz in which vocational education reforms will be implemented.

We propose this as a pilot effort and once the most effective interventions have been identified, it should be expanded to other Marz, with the ultimate goal of nationwide implementation. In the long run, this activity would strengthen the employment center system and help make the education system more relevant to changing economic needs thereby improving outcomes for youth preparing to enter the workforce.

Our estimate is that this 3-year project could be done for \$2-3 million dollars. The cost would depend on the number of sites and other parameters determined to be reasonable after discussions with the GOAM, TACIS and the Swedish Development Agency, which plans to continue working with the employment center system.

Enhance the Capacity of Business, Professional and Worker Associations to Provide Leadership in Adoption of Best Practices in Workforce Development and Productivity Improvement. This project also combines several options presented above. The project would strengthen the private sector's capacity to partner with the GOAM in promoting effective workplace practices that have proven to increase

companies' competitiveness. The project would have the following components: Armenia's key business, professional and worker associations (that have already demonstrated a willingness to work together) would jointly host a series of seminars on effective human resource practices, drawing on best practices in other countries. They would develop best practice criteria and a network of recognized leaders who use these best practices to serve as effective role models and communicators with the peers. In addition, the consortium of organizations would explore the feasibility of, and develop plans for, implementing two other options discussed above. These are a media campaign and development of one or more skill alliances (again based on available resources) as a way of demonstrating the benefits of collaborative action among employers.

The associations would be supported in these efforts with outside technical assistance including a partnership with the US National Association of Manufacturers (NAM) and possibly the AFL-CIO Working in America Institute. NAM is one of the partner organizations under the GWIT project and has indicated a willingness to play such a role. It is likely that the Working in America Institute would also be interested in such a collaboration. We estimate that the initial stages of this project could be implemented over a 2-year period for about \$1million. Subsequent funding of activities would depend on plans and relationships developed during the first phase.

Use Public Service Employment More Strategically - as a Tool for Developing Marketable Skills, Developing Infrastructure for Economic Growth and Enhancing Local Government Capacity. We recommend that the Mission support the provision of technical assistance and supplementary funding to existing GOAM and donor supported initiatives that involve public works or other forms of public service to help them become more effective workforce development and local economic development strategies. Existing initiatives include the UN-sponsored Work for Food program, the GOAM Allowance for Work program, USAID's public works program operated by the Save the Children Federation and Armenia Local Government Program being implemented by the Urban Institute. Assistance would be directed at developing a training component for projects, creating business plans that result in creation of unsubsidized employment and involvement of citizens and local government in project planning and operations. As appropriate, local NGOs would be brought into the projects and trained to provide these additional services.

The materials and models developed through this project could then serve as the basis for the design of new or expanded public employment strategies. As discussed above, the World Bank may be prepared to support such a program for public servants as part of their civil service reform initiative. We anticipate that the technical assistance and demonstration activities would cost between \$1-2 million, depending on the scope and scale of the demonstration project. Full implementation of enhanced public service programs would cost considerably more.

Developing Ownership for Sustainability

We developed the previously discussed prioritized menu of options and priority recommendations with the input of many of the Armenians and others we interviewed for this assessment. We talked with potential partners in the proposed efforts and believe

that the organizations identified would welcome such activities. However, the devil is always in the details and not all partners were consulted on each idea so additional discussion and design work is clearly needed.

Early and full involvement of key labor market partners is essential if any of the proposed strategies are to have lasting impact on Armenia's economy. Beyond needing greater specificity on who among the potential partners will do what and when, it will be important to get feedback from these partners on our definition of the problem and the broad strategies we propose. Even though our analysis is based on what people said to us, we have combined numerous points of views (employers, workers, government officials, educators, private employment agencies etc.) so no group has seen the whole. The key partners will need to develop a common understanding of the problem and take ownership of this problem before they can take responsibility for solving it.

Therefore, we recommend that USAID convene a series of structured conversations with groups of key Armenian partners and other donors to get their feedback on this assessment and to help USAID further refine and prioritize the options proposed. We recommend that the Mission meet first with key GOAM officials (those with whom we met during the assessment as well as others identified by the Mission) to get their feedback on the issues raised and the assistance priorities identified by the assessment.

With the GOAM's priorities in mind, the Mission should then meet individually with other donors to discuss opportunities for specific linkages among projects, including those suggested in this assessment; and their interest in establishing a working group of donors on labor market-related initiatives. We believe improved coordination of efforts and leveraging of investments among donors could improve the results achievable with relatively small investments of USAID resources. We suggest that the GOAM be invited to participate in this working group and that an advisory group of stakeholders in the labor market be established to inform and be informed by the work of the working group. This advisory group should be made up of representatives from employer associations, unions, international and local NGOs, and the education sector.

We also suggest that the working group-including the GOAM- consider adopting a core set of outcome-based performance indicators with specific targets and timelines through which progress in achieving common goals can be monitored. For example, measures indicating expanded capacity of the regional employment centers might include increases in the number of jobs that employers choose to list with the centers and in the number of positions filled through the centers. Both are data already being collected. Measures indicating enhanced capacity –or better still, effectiveness- of business, professional and worker associations to provide leadership in adoption of best practices in workforce development and productivity improvement might include their members' satisfaction with the services provided and changes in company and/or worker attitudes and behaviors. Such information could be collected by surveying attendees before they take part in an activity such as a seminar and then six months or a year later to measure changes in attitudes and reported behaviors. Thus survey costs should be considered when developing project budgets. The ultimate measures would be improvements in productivity and competitiveness, but it would be difficult to attribute any or all such gains to the association activities.

THE ROAD NOT TAKEN

As part of this assessment, we were asked to briefly note the once-promising options that we chose NOT to pursue and to explain why we changed our minds. Before the team traveled to Armenia, we read extensively and drew upon our respective experiences to develop a list of potential target industry clusters and a menu of potential interventions to strengthen the labor market. Some of those were abandoned after the site visits. Overwhelmingly, the reason why an idea was abandoned was not that it was a bad idea, but that it did not seem a good idea for USAID/Armenia during the next five years. The reasons why ranged from a lack of local capacity to build upon, which suggested an intervention was premature, to significant existing or planned interventions by other international donors.

Industry Clusters Not Targeted. The first choice for this assessment was that of target industry clusters. Before traveling to Armenia, the tentative choices were IT, diamonds and jewelry, food processing, textiles and apparel, tool and die/precision tools. After interviews with knowledgeable people in Armenia, the diamond/jewelry industry was dropped. Although this is a promising and growing industry, Armenian firms are closely connected with the international diamond cartel, which is providing the needed skills and training. Simply put, they do not need help. Eventually, we chose IT, food processing, and textiles/apparel, because they offered broad coverage by geography and in types of jobs. That choice was made with the caveat that several other industry clusters also showed promise.

Special Economic Zones. Creating special zones is an effective way to test changes in tax and regulatory policy that might spur business development. Armenia would appear to be a prime candidate for such an approach. However, the pervasiveness of corruption, particularly within the government, puts this strategy in danger of becoming another venue for favoritism. Moreover, there have been special considerations for the earthquake affected area, and despite the passage of thirteen years, progress in reconstruction has been limited. GOAM is adopting this strategy and proposing to create a one kilometer square free trade zone in conjunction with renovation of the Yerevan airport. Accusations of cronyism have already begun to fly, and it will be interesting to see how this experiment proceeds. There is certainly more opportunity on the demand side in this location than there was for the earthquake areas.

Education Reform. This is an important and necessary activity that is being pursued as a high priority by both the World Bank and the European Union – in general education and vocational education, respectively. As a result, we looked for niches where USAID could make a contribution; for example, coordinating territorial employment center activities with the vocational education. Throughout, our emphasis on education linked to economic development is in the context of a cluster-based approach.

Tax Subsidies to Promote Investment in Training. Tax subsidies are a popular tool for encouraging employers to invest in training their workforce, and it appears that few employers in Armenia invest after the initial training when a person is hired. We believe that upgrading worker skills would have broad benefit. However, this proposal got a negative response from both government officials and employers. The former are under significant pressure from IMF to raise the ratio of tax collected to GDP, and wanted

nothing to do with a proposal that would reduce taxes collected. The latter viewed any change to the tax code that complicated it as another opportunity for rent-seeking behavior on the part of tax collectors. We concluded that this was not the time or place for this intervention.

Wage Subsidies/Analysis of Hiring Barriers. An intervention considered at the beginning of the project was providing financial incentives for firms to hire workers. This is usually accomplished through a tax subsidy. Upon learning more about the complexities of the Armenian tax environment described above, that idea was abandoned. Also, more in-depth analysis of employment data suggested that the lag in employment growth relative to GDP growth did not necessarily reflect a reluctance of employers to hire. The slow dissolution of ghost firms with their ghost jobs and the large informal sector was distorting the employment data. We did, however, learn about the hiring disincentive caused by the regressive pension fund contribution and have addressed this with a recommendation under *Improve the Business Climate* for a proportional contribution.

Home Improvement Loans Combined with Construction Trades Training. This early proposal would have created a pilot program to encourage homeowners to renovate homes for residential and possible commercial purposes by making credit more accessible. It would be combined with training in small business management and building trades. This idea in a modified form survives in the recommendation for public service employment. However, the revolving loan fund for home improvements was dropped because USAID Armenia does not want to capitalize a revolving loan program.

Encourage People To Prepare For High Demand Professions. This is an important strategy for linking workforce development to economic development and basic to cluster-based development. We have dropped it as a priority due to lack of capacity in Armenia. There is no available information on which to base occupational projections and lacking that, this strategy could reinforce the unfortunate propensity to over-train for high profile professions that are in demand today, creating an oversupply for tomorrow. Instead, we are recommending improved information systems and capacity building for labor market intermediaries. Once that is achieved, encouraging people to prepare for high demand professions will be a useful strategy.

Appendix A:

Interviews & Focus Group Participants

TRIP 1 INTERVIEWS

American Chamber of Commerce in Armenia

Timothy Papworth, President
Nanik Melkomian, Executive Director

Armenia National Institute of Labour and Social Research

Narine Balayan, Director

Armenian-European Policy and Legal Advice Center

Alexy Sekarev, Chief Advisor

Armenian Development Agency

V.V. Movisisyan, Executive Director
Padriac Murray, Chief Operating Officer
Dr. Natalya Artsruni, Investment Promotion Director

Institute for International Cooperation of the German Adult Education Association (Yerevan branch of Tblisi Office)

Filiale Jerewan,

European Union Delegation for Georgia and Armenia, Yerevan Office

Monica Papyan, Task Manager
Irina Movsesyan, Task Manager

Financial Banking College Foundation (GTZ-funded)

Khachatur Tsokolakyan, Executive Director

GOAM Ministry of Education and Science

Samuel Pipoyan

GOAM Ministry of Trade and Economic Development, SME Office

Ishkhan Karapetyan, Head of Small and Medium Entrepreneurship Development
Department

GOAM Ministry of Social Security

Mr. Vahan Simonyan, Head of Labor Department
Sona Haretyunyan, Director, Republican Employment Service
Mr. Georgij Pogosyan, Director, Nornork Territorial Employment Center (Yerevan City)

GOAM Ministry of Statistics

Lusine Kalantaryan, Chief of Labor Statistics Department

GTZ

Deltef Dix, Country Manager
Aram Aristakesyan, Agriculture Regional Development Education Program

International Executive Service Corps (USAID-funded)

Lisa Scorsolini, Country Director Caucasus
Arman Valesyan, SME Project Officer (IT), IESC Representative Office in Armenia

Hrachya Mkrtchyan, Project Officer (Jewelry), IESC Representative Office in Armenia

Noyan Tapan

Haroutiun Khachatryan, Editor-in-Chief

Republic of Armenia Agribusiness SME Market Development Project (USAID)

Fred Harris, DAI, Managing Director

Republic of Armenia Capital Markets Development Project (USAID)

Stan Manoogian, Price Waterhouse Coopers, NBFI Team Leader

The World Bank,

Naira Melkumyan, Portfolio Manager

Uniland Employment Agency

Aram Simonyan, Manager-Owner

Union of Manufacturers and Businessmen (Employers) of Armenia

Arsen Ghazaryn, President

Gagik Makaryan, Executive Director

Sargis Aghabekyan, Director, Esco-Concern (Legal Advisory) and UMBEA member

United Nations Development Program

Amal-Z M. Medani, Deputy Resident representative

Narine Sahakyan, Portfolio Manager

INTERVIEWS IN THE UNITED STATES (primarily telephone interviews)

Armenia Tree Project

Jeff Masarjian, Executive Director (US)

Armenian Church Organization

(Interviewee asked for anonymity)

Creation Point

Al Eisian, President/CEO

Documentum

Razmik Abnous, Chief Architect

Symantec

Gary Sevounts, Director of Strategic Markets

USAID

Marcus Winter

US State Department

Jerry Oberndorfer

Virage Logic

Adam Kablanian CEO

The World Bank

Lev Frienkman, Sr. Country Economist, ECSPE

TRIP 2 INTERVIEWS

American University of Armenia

Atken Armenian, Dean Extension program and Registrar

Armenia Tree Project

Susan Yacubian Klein, Country Director

Armenian Assembly of America

Margarit Piliposyan, Direct NGO Training and Resource Center

Armenian Forests NGO

Jeffery Tufenkian, Director

Bazum (apparel firm)

Yura Mikayelyan, Director

Bi Line Computer Equipment & Service

Hayk Khanjyan, President

Center for Information Technologies

Alexander Tevosyan, Executive Director
[also several other managers, but no cards]

Enterprise Incubator Foundation

Bagarat Yengibaryan, Director

The Eurasia Foundation

Zakar Boyajyan, Country Director

GOAM Ministry of Social Security

Hoohannes Poghosyan, head of division, International Department
Sona Haretyunyanyan, Director, Republican Employment Service
Amalia Adamian, Director, Gyumri Territorial Employment Center,
Artyom Mkhitaryan, Director, Ararat Territorial Employment Center
Ara Arakelyan, Director, Vanadzor Territorial Employment Center

GTZ

Aram Aristakesyan, Project Coordinator

International Executive Service Corps (USAID-funded)

Lisa Scorsolini, Country Director Caucasus,

International Legal Consulting, LLC

Edith Khachatourian, attorney-at-Law

Jr. Achievement of Armenia

Armine Hovannisian, Executive Director

Leda Inc.

Hovik Musayelyan, director of the Armenia branch

Lycos Europe

Hovhannes Avoyan, Managing Director

Nemrout Center

Andranik Saratikyan, Director

Republic of Armenia National Observatory

Aram Avagyan, Team Leader

Armenia Local Government Program

Sam Coxson, Urban Institute, Chief of Party,

Save the Children – US Armenia Field Office

Rezaul Hassan, Program Director, STP/Public Works Program

Irina Saghoyan, Country Representative

TACIS

Irene Lorisika, consultant on Vocational Education Reform Project

Tufenkian Enterprises

Lilit Hakobyan, Public Relations Manager

The World Bank

Roger J. Robinson, Country Manager, Armenia Office

Union of Manufacturers and Businessmen of Armenia

Susanna Khalatyan, Leader Legislative Monitoring Group

Gagik Makaryan, Executive Director

USAID/Armenia

Diana Avetyan, Program Management Specialist

John Caracciolo, Micro, SME Development Director

Bella Markarian, D&G,

(NOTE: there was also a debriefing meeting with additional USAID/Armenia staff)

VISTAA

Mary Nikoghosyan, Acting director

Artak Harutyuyan, Founder

FOCUS GROUPS

LABOR MARKET PARTICIPANTS (all held in Yerevan office)

Tuesday, April 1, 14:00-16:00 Regional Employment Center Directors

Name	Company
1. Susanna Hovsepyan	Kentron
2. Sonya Soghomonyan	Erebuni
3. Ramona Ktakyan	Malatya-Sebastia
4. Andranik Poghosyan	Ajapnyak
5. Margarita Haykazyan	Davtashen
6. Vahan Grigoryan	Nor Nork
7. Karine Vardanyan	Avan

Tuesday, April 1, 16:30-18:30 State Engineering University of Armenia Students

Name	Faculty
1. Karen Hovhannisyan	Mechanical Engineering
2. Aram	Mechanical Engineering
3. Hayk	Electronics
4. Armen	Mechanical Engineering
5. Shoghik	Radio Engineering
6. Mher	Electronics
7. Shoushan	Radio Engineering

Wednesday, April 2, 10:30-12:30 Job Seekers Registered with Uniland

Name	Occupation
1. Aida	Translator
2. Elena	Painter
3. Vergine	Economist
4. Lusine	Economist
5. Alexander	Engineer

Wednesday, April 2, 14:00-16:00 Employer Association UMB(E)A members

Name	Company
1. Gagik Makaryan	Executive Director, UMB(E)A
2. Susanna Khalatyan	Team Coordinator, Legislative Monitoring Team, UMB(E)A
3. Gegham Sergoyan	Director, Garant Limens (Insurance)
4. Mkrtych Ghuloyan	HR Manager, Ashtarak Kat, (Dairy Products)
5. Samvel Piroyan	HR Inspector, Ashtarak Kat
6. Marine Stepanyan	Financial Director, Punj (Trade/Construction)

Thursday, April 3, 14:00-16:00 NGOs involved in Workforce

Name	NGO
1. Zemfira Hakobyan	Hope for work
2. Silva Harutyunyan	Hask 96
3. Silva Vardanjan	Zartonk-89

4. Rafael Hovhannissyan	War Handicaps Humanitarian Fund
5. Ashik Sahakyan	War Handicaps Humanitarian Fund
6. Juletta Ter-Martirosyan	Family and New World

Friday, April 4, 14:00-16:00 Relevant Donor Project Staff

Name	Company
1. Irina Movsesyan	TACIS
2. Irene Lorisika, consultant	TACIS Vocational Education Reform Project
3. Aram Aristakesyan	GTZ

TARGET INDUSTRIES

Wednesday, April 2 10:30- 12:30 Textile/Apparel Company Managers, Gyumri

Name	Company
1. Gevorg Gasparyan	“Gevorg & Vahan” textile factory
2. Karapet Movsesyan	“Tavros” shoe factory
3. Samvel Janoyan	“Armen Karpet” rug factory
4. Armen Kocharyan	“Hats” sack factory
5. Hakob Aghabekyan	Maralik textile factory
6. Nora Harutyunyan	Akhuryan sewing factory
7. Susanna Astoyan	Gyumri sewing factory

Wednesday, April 2, 14:00-16:00 “Tavros” Shoe Company Workers

Name	Position
1. Legend	Ex. Director
2. Zhanna	Controller
3. Artashes	Production manager
4. Shushan	sewing worker
5. Gurgen	designer
6. Gohar	person who’s making patterns

Friday, April 4, 10:30-12:30 Food Processing Company Managers, Ararat

Name	Company
1. Samvel Begralyan	“BAKSS”
2. Serzhik Movsesyan	“Alishan” Ltd
3. Hakob Badalyan	“GAMMA”
4 Vera Grigoryan	“Tamar Tatic”
5. Svetlanna	“Tamar Tatic”

Friday, April 4, 14:00-16:00 GAMMA Food Processing Company Workers

Name	Position
1. Anahit	Lab. Controller
2. Ashot Arushamyan	Mechanic
3. Onik Harutyunyan	Engineer

4. Armenuhi	Line production worker
5.Vardan	Marketing specialist

Friday, April 4, 10: 30-12: 30 Virage Logic IT Company Workers

Name	Position
1. L.Danielyan	Hardware engineer
2. A. Aristakesyan	Hardware engineer
3. A. Sukhudyan	Software engineer
4. P. Markaryan	Hardware engineer
5. L. Hovannisyan	Software engineer
6. Hr. Aghadganyan	Technical writer
7. A. Khachatryan	Software engineer
8. Lucy Nalbandyan	Manager

Thursday, April 3, 10:30 – 12:30 IT Company Managers, Yerevan

This focus group was not held. The following is a list of invitees - Only the representative of CIT Company came, and the GWIT consultant visited CIT to meet with managers there in lieu of this focus group.

Name	Company
1. Gagik Karapetyan	CIT Co Ltd
2. Gurgen Balayan	Boomerang Software
3.Larisa Lalayan	L-soft Ltd
4.Lucy Nalbandyan	Virage Logic
5. Vahan Harytyunyan	X-Alt
6. Naira Mkrtychyan	Lans Co. Ltd

Appendix B:

Initial SWOT Analysis

ASSESSING THE LABOR MARKET – THE SWOT ANALYSIS

We used an analytical framework called a SWOT to organize and evaluate the importance of the wide variety and types of information gathered for the labor market assessment. The term SWOT comes from the first letters of four words – strengths, weaknesses, opportunities, and threats. The strengths and weaknesses are respectively the positive and negative factors internal to the labor market in Armenia. The opportunities and threats are respectively the positive and negative factors external to but likely to have an impact upon the labor market.

The key factors from the SWOT analysis are described in the labor market assessment. In the interest of full disclosure, the SWOT tables developed as working documents are reproduced here although they were never developed beyond working documents. Like the full assessment, the SWOT approached the labor market from three perspectives – the marketplace itself, the demand side and the supply side. There is some duplication because it is possible, for example, for a factor that is a strength (positive internal) from one perspective to be an opportunity (positive external) from another.

IN THE MARKETPLACE

Strengths

Private Employment Agencies. In Yerevan, a small industry of private employment agencies is developing. These agencies provide both job matching and training linked to employment opportunities.

SIDA Demonstration Project. The Swedish International development Agency has been working with three territorial employment centers for more than 2 years, building their capacity. This year, staff from those centers will begin training staff from the other 48 centers.

Four-Part Program. The demonstration site territorial employment centers have operated a small program of demand driven training, working with employers, jobseekers, and training providers that trains for an open job and involves commitments from all participants.

University Placement Offices. Universities compete for students, and one issue is the job prospects of their graduates. Most now have placement offices, and some are very aggressive intermediaries. Collaboration is under discussion between AUA and Yerevan State.

Weaknesses

Overall Lack of Capacity among Labor Market Intermediaries. Across the board there is a lack of capacity in labor market intermediaries – and in many places outside Yerevan, a lack of labor market intermediaries except the territorial employment centers.

Inconsistent Territorial Employment Centers. The public sector labor market intermediary system is mostly weak. Few centers understand anything but their benefit distribution

function – not their job matching function. They don't have working data systems or computers and staff lacks training.

Weak NGO Role. Few NGOs are involved in workforce development despite the high unemployment rates. NGO's inadequate legal framework serves as a barrier to job creation activities, and few are involved in training. Overall, the NGOs suffer from inadequate capacity

Inadequate Information. Overall there is lack of transparency- poor information about job openings that prevent the labor market from operating efficiently Jobs are obtained through clan and family connections or outright corruption. LMI not worth much because of the large size of the formal economy.

Lack of Coordination. Exacerbating the poor flow of information, employers, government and the education and training community are not working together as a workforce development system. Rather than having a labor market that supports human capital development, in Armenia human capital is being allowed to erode due to high under and un-employment.

Limited Government Support. Employment is described as an important element in the GOAM poverty reduction strategy but in fact, it has been a weak area. Funding for employment centers and training comes from a regressive employment tax and is in fact constraining job creation. People often are not paying and employers do not see benefits from programs their taxes support.

Mediation Infrastructure is Inadequate/Missing. There is no system for resolving conflicts between workers and employers-

Limited Access to Employment Center Services. The training sponsored by GOAM is very limited and restricted in terms of eligibility. Young men coming out of the military and new graduates are not eligible for assistance payments when then cannot find work, because they don't have a history of work experience.

No Career Ladders. There are few opportunities for further education and training to upgrade/refresh skills. The whole concept of a career ladder is foreign.

Opportunities

Donor Activities. There is increasing interest in supporting initiatives linked to employment. For example, the World Bank is interested in supporting redundancy programs for civil servants who lose their jobs due to upcoming civil service reform. Teacher civil servant layoffs provide opportunity to demonstrate effective dislocated worker strategy

Economic Up-turn. Job growth could provide an opportunity for labor market intermediaries to demonstrate their potential to employers. Given the basic imbalance in the labor market, economic development and job creation is an opportunity for improved function.

Education Reform. Reform of the general education system is underway – supported by the World Bank. Reform of the vocational education system is beginning – supported by EU-TACIS. Both will improve the quality of the labor supply.

New Labor Code. It is likely a new labor code will be enacted this year – it is a condition of World Bank funding.

Threats

Soviet Era Labor Code. Despite two years of work, the labor code still has not been revised. It is overly restrictive, but widely ignored and therefore does not protect workers. Still, it inhibits foreign investment and creates opportunities for rent-seeking behavior by officials.

Pervasive Corruption. The corruption that pervades Armenian economic activity impacts the labor market and makes jobs an entitlement for those who are well-connected rather than a reward to those who are talented and skilled. If corruption persists or increases, it will hurt the labor market. A less pernicious source of similar behavior is the strength of clans.

Economic Downturn. If the blockade intensifies or there is a worldwide economic downturn that impacts Armenia, the labor market will suffer, because supply already exceeds demand. Similarly, the upcoming lay-off of civil servants could further unbalance the labor market.

Closed Society. Tendencies to hold power and information tightly impede the transparency needed for efficient market operation.

ON THE DEMAND SIDE

Strengths

Emerging Job Growth. The 2002 year over year employment change was positive for the first time since transition, returning employment to the 2000 level. It remains to be seen if this is an anomaly in the long-term trend or the beginning of job growth. The target industries – IT, food processing, and textiles and apparel - all are contributing to job growth.

Rising Wages. Average real wages have been rising, although not as rapidly as GDP and at a slowing rate. Still, the 2002 year-over-year real wage increase was 10.3 %. In a few industries, wages are rising rapidly. The IT industry is a source of both job growth and jobs that pay wages sufficient to support a family above the poverty level. Diamond processing also pays above average salaries.

Replacing ghost jobs with real jobs. Many large firms, previously state-owned, ceased operation but remained alive on official records along with their employees who are, of course, no longer actually working. Over time, the number of these ghost jobs is decreasing – due to retirement, privatization, bankruptcy, and through attrition as workers abandon their claims to ghost jobs and register as unemployed or find a real job

in the formal economy. Replacing ghost jobs with real jobs does not affect total employment, but it contributes to increases in GDP and also, wages.

Agricultural Safety Net. The agricultural sector has provided a safety net for laid off industrial and urban workers. The fact that most families own land has allowed rural farming to serve as a kind of safety net for many workers. Agriculture and forestry recorded an increase in output, plus 13.7%, from 1990 to 2000.

Emerging Inter-Firm Cooperation. Emerging networks of companies are being built by the donors – IESC, DAI – creating business association. The negative side is the low level from which this starts.

Weaknesses

High Unemployment. The supply of jobs is significantly less than the demand. Employment is not sufficient to provide the desired number of jobs, and the result is a high rate of unemployment, much of it long-term unemployment, as well as large numbers of people who have simply dropped out of the labor market. (World Bank data from the SOW) Large lay-offs are expected in the national civil service and will contribute additional people to the unemployment roles. This is particularly true of older people and women.

Large-scale underemployment. Under-employed includes people working part time when they want to work full-time plus people working in jobs that require far lower skill levels than they possess.

Low Salaries. Many working people are earning wages well below poverty levels. The approximately half of Armenians living in poverty include many who are employed or members of families with one or more employed person. Teachers are among the lowest paid workers, receiving the equivalent of less than \$40 per month. Makes the shadows more attractive – informal trade or staying on the farm. (transportation costs, pay-offs, taxes exert downward pressure on salaries.) Wages are so low for some jobs that people don't want them. The government pays very low wages.

Slow, Narrowly-Based Employment Growth. Employment totals have been much slower to begin recovery than has GDP. Just a few industries are showing economic strength. Very much tied to exporting.

Declines in Traditional Industries. Armenia was a heavily industrialized area within the Soviet Union. Its industrial output – chemicals, electronics, metals - was part of the internal USSR supply chain that collapsed along with the Soviet Union Between 1990 and 2000, industrial output in Armenia was down almost 70 percent, followed by construction, off almost a third, and services down 12 percent. (Data from Griffin, UNDP 2002. Page 38).

Weak Management Skills. Many firms are led by individuals with limited business knowledge and experience who have inadequate skills for operating in the market economy. Areas of greatest deficit include cost accounting, market development, new product development, and marketing. Managers tend to be focused on survival rather than addressing strategic issues.

Poor Access To Credit. Firms have difficulty accessing investment funds need to support growth and add jobs. If they do find an investor, they have difficulty arranging the increase in operating credit required to support the growth – without which the investment is likely to lead to failure rather than growth. The most serious gaps are in mezzanine financing and operating capital.

Low Level of Entrepreneurship. While there are numerous people trading in street markets to earn a subsistence living and operating outside the formal economy, there are relatively few people starting a company that they hope to grow into a source of jobs for anyone except themselves. Most new firms that are also employers are created with heavy involvement from foreign partners or investors.

Employers' Reluctance to Invest in their Workers. Employers have a preference for hiring new graduates and training them for the job, but they rarely see a need for training beyond that. Companies looking for short-term return on investment so not willing to spend money things that don't have an immediate pay off.

Opportunities

Reform of the Financial Sector. The World Bank, US AID and IMF are working with the GOAM to reform the banking system, create financial intermediaries, and alternative lending institutions. A reformed financial sector will have the capacity to properly evaluate loan applications and direct capital toward businesses with growth opportunities.

SME Support Programs. The donor community has focused significant resources on supporting small and medium enterprises with management and technical assistance, frequently aimed at improving access to capital. USDA program to TA to agriculture comprehensive approach – is this something to emulate within AID?

Diaspora Investments. Armenians who have emigrated to other countries and become wealthy are investing in projects designed to bolster economic recovery in Armenia. Highly visible investments are being made by the super-rich, but other members of the Diaspora are also investing in Armenia. Kirkorian's Lincy Foundation is providing Armenia with millions of dollars a year – run through the state budget - for reconstruction of important buildings and road repair, reducing transportation barriers within Armenia and creating tourist destinations. James Tufenkian – rugs, hotels – ask Hal for details. One focus group participant, a Persian –Armenia, described large numbers of his counterparts anxious to return to Armenia and coming to realize that one could live here now. AM CHAM

Stronger Local Governments. While still very weak, local governments are beginning to develop independent capacity, including a capacity for promoting local economic development.

Cracks in The Blockade. There is a small amount of trade continuing between Armenia and Turkey. One organization, The Turkish Armenian Business Development Center, headquartered in New York City, is actively promoting commerce between the two, and has demonstrated some success.

Threats

Poorly Functioning Credit Markets. Armenian banks appear still lack the capacity to evaluate loan applications and may base lending decisions on political connections of the applicants. Interest rates are high. Particularly for firms outside Yerevan, banks are not willing to value land or machinery as collateral and require gold. Banks have more potential capital than they have the capacity to administer - large loans are a different animal.

Negative Business Climate. Corruption within the governmental and erratic application of taxes and business regulations, lack of transparency create a hostile environment, particularly for smaller firms that lack the stature to “fight city hall.” Tax reform intended to help business is being undermined by poor implementation. Faced with demands by the IMF to increase tax collections as a percent of GDP, tax collectors are demanding advance payment of business income taxes. Pay-off requirements keep downward pressure on salaries.

Regressive Pension Fund Tax. The pension fund requirement calls for 5000 dram per month for every employee regardless of hours worked or salary earned. This creates a highly regressive tax that strongly discourages firms from adding entry level employees. This impact reverberates through the labor market, depressing job growth.

Inadequate Transportation and Communication Infrastructure. The roads in Armenia suffer from years of under-maintenance. Numerous, large potholes restrict travel by automobile or truck. The monopoly telephone system operates erratically and at a high cost to the customer. While the IT industry is an obvious victim of this problem, all industries that have relationships with foreign customers or suppliers face additional costs.

Small Domestic Market. The population of Armenia has decreased to about 3 million, and incomes are low. The net result is a very small domestic market. Firms that seek growth have to look to foreign markets.

The Blockade. The blockade imposed by Azerbaijan and Turkey greatly increases transport costs for Armenian industry – both for imports of supplies and exports of products. These costs come directly from the bottom line of Armenian firms competing on the international market. This limits export potential to products with a very high value to weight ratio (or a high tolerance for delay in shipment) and distorts the economic base. For example, the goods that are likely to find a domestic market are lower cost, but the economics of shipping make these unlikely candidates for export. The resulting divide between production for export and production for domestic consumption impedes the development of competitive industry clusters. There is not the sophisticated local customer to encourage improvement of products that compete on international markets.

Energy costs. Expensive energy hurts competitiveness.

ON THE SUPPLY-SIDE

Strengths

Low Cost/High Skill Labor Force. Currently Armenia has a significant wage advantage because the cost of skilled labor is so low.

Literate And Smart People. Well-educated populace reflecting the strong tradition of education. This makes them highly trainable. Parents have high levels of education and invest in their children's education.

Good Work Readiness Skills Among Many Unemployed. Many of the women are laid-off teachers and nurses who are highly trainable and have good "soft skills" employers' report that women are flexible and willing to work in lower status jobs than men – more pragmatic.

Diaspora. People who have gone abroad are beginning to return and bringing with them new skills and an understanding of the market economy. Similar dynamic with students who have taken a year abroad – often in the US

Numerous Higher Educational Institutions. Again, reflecting the historic value given education in Armenia, there are many institutions of higher education. The quality is uneven, but the infrastructure these institutions represent has to be considered a strength.

Extensive Education Infrastructure. Despite recent decline, there is a good public education infrastructure in place.

Weaknesses

Obsolete Skills. Most Armenian education and industry lag the west in use of new technologies and have produced a workforce with skills that are often obsolete even at the moment they are taught.

Overall Weaknesses in the Education and Training System. A strong education and training system is needed to support transformation of the workforce into an asset in the market economy. However, the current system suffers from poor connections with employers, weak ties to industry, and ignorance about skill needs. Traditional education curricula are too theoretical and do not prepare people for jobs

Falling Educational Achievement. Declining enrollments in public schools if not stemmed will undermine strong literacy of the workforce. High school drop-out rates increased but may be turning around.

Brain Drain. Employable people with high-demand skills are leaving for jobs abroad – can this be used as an opportunity for people to gain skills and return with them???

Aging Workforce - Concentrated In Certain Skill Areas. In some skill areas such as mechanics/machinists, the workforce is aging and not being replaced with new entrants, because people do not value voc-ed and want kids to go to college,

Loss of Engineering Skills. Declining reservoir of skills in the engineering field, because it is not attractive to students – at least as taught in Armenia (needed for developing infrastructure and innovation)

Shallow High Tech Talent Pool. There are people with needed skills and talents but there are few of them – so few that it inhibits growth of the IT industry (not clear that there is Demand that is unmet.)

Unrealistic Expectations. People – especially men - who have obtained a good educational background and can speak English well expect to start in management positions. But they lack practical skills and are not prepared for the positions they seek. (some say that this is a problem with AUA MBA graduates and people who have degrees from the US or EU schools, but others note that people with these credentials find jobs easily.) There is consensus that many older men who held responsible positions in the Soviet system cannot adjust to lowered circumstances.

Insufficient Customer Service Skills. Hotels have trouble finding people with needed skills – Tukenian did 6 mo training. EK reported difficulty finding office workers with MicroSoft Office AND Eng skills – ended up hiring two people to do one job.

Limited Training Facilities. Due to inadequate training facilities in areas as disparate as agriculture and information technology, people often have to leave the country to get adequate training. Institutions are concentrated in Yerevan.

Poor Connections between Education and Job Requirements. Recent graduate and young men who come out of the military aren't employable because they lack practical knowledge.

Poor Connections Between Training and Jobs, Government and other investors are not getting a good return on investment in education/training because people don't get jobs in the fields in which they were trained and they forget much of what they learned by the time they actually get a job.

Opportunities

Education Reforms. Donor organizations are targeting the education system to reverse the current decline and make it more relevant to the modern, market economy. Major programs include World Bank sponsored curriculum reform and TACIS/EU reform of the VET system, which is about to start.

Diaspora. The Diaspora is a source of funds for individuals to extend their education and get training. It is also a possible source of mentors.

Emerging Job Orientation. Some private education and training providers are developing a niche of trainers more geared to the labor market. Some are performance-oriented and only get paid if the trainee gets a job related to their training.

Employer Training. Employers in IT and banking are beginning to realize the importance of training – these are areas where there is rapid change in skill requirements and a shortage rather than a glut of skilled workers. (NOTE: both industries rely heavily upon third-party certification. Are IT certifications important here?)

Threats

Decline of Public Education System. Public education system is in decline due to under-investment that manifests itself in low pay for teachers, and poor facilities/resources, aging teachers—skills and supply

Poor Return on Investment in Human Capital. Salaries are low, people are over-qualified for positions, and there are so many college graduates that employers require a degree when it has no relevance.

Fiscal Stress. The financial situation impedes the ability of the Armenian government to invest in education and training. It has led to inadequate compensation for civil servants and teachers.