

Economy of Iran under Fourth and Fifth Five-year Development Plans

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Abstract

The Economy of Iran faces many challenges and is predicted to have a negative growth of 1.3 percent, unemployment of above 13 percent, and a wild inflation rate of 27.2 percent in 2013. Various external conditions and bad economic planning have contributed to Iran's current economic difficulties. To transform the Economy of Iran, the 5th Five-year Development Plan (FYDP) and the 20-year vision should be revised to present clear priorities for private sector development, establish improved environment for business operation, and suggest strategies to attract foreign direct investment and modern technology. Integration of a Medium-term Expenditure Framework (MTEF) within the future plans is indispensable for creating a multi-year budgetary framework that links five-year plans. The government could adopt a more conciliatory international posture to allow implementation of the revised plans in an improved domestic and international environment. For many hardworking and deserving Iranian people, this choice facilitates return to normal life.

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JEL Classification: *E6, F5, H6, O2, O4*

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1. Introduction

For many decades, medium-term economic planning has played an important role in Iranian economic life. Before the revolution of Iran, the government designed and implemented several five-year and seven-year economic plans, focusing on private and public sector interactions, their investment requirements, structural reforms, and stabilization policies to achieve sustainable economic growth.¹

With emergence of the Islamic Republic of Iran in 1979, followed by an end to the eight-year war with Iraq, the government concentrated on constructing and carrying out medium-term economic plans. Several five-year economic plans constituted the medium-term framework and a platform to both promote the private sector and embark on public sector reforms aimed at a more equitable and just society.

Following a 10-year hiatus since its formation – the result of revolutionary upheavals, capital flight, migration of skilled manpower, the heavy costs of the influx of great number of refugees from neighboring countries, and the eight-year war with Iraq – the Islamic Republic carried out its first five-year economic plan (FYDP), focusing on the reconstruction of damaged infrastructures. The plan also aimed at tackling the inefficient public sector and the reluctant private sector, both suffering from rapidly changing economic policies and uncertainty. The first FYDP, approved by the Parliament on 31 January 1990, included many ambitious and unrealistic objectives in comparison with the country's capacity; consequently, progress in implementation was inadequate (Ghasimi, 1992).

After a one-year delay from the end of the first FYDP, the authorities initiated the second FYDP in 1996, to implement basic free-market principles. Nevertheless, this plan too, was impractical and only partially implemented (Shahrvand Irani, 2009). The unsuccessful first and second FYDPs prompted development of the third FYDP to strengthen initial but necessary structural reforms, including promotion of the private sector, development of private domestic and international banks and insurance companies, and substitution of tariffs for quantitative trade restrictions. Rising oil prices facilitated a conducive environment to achieve an average GDP growth of 5.5%, close to the

1. For a detailed assessment of economic planning before the revolution, see Behrooz Hadi Zonoz, "Economic Planning in Iran before the Revolution," Majless Research Center, Summer 2011; for a summary of economic conditions before initiation of economic planning see Reza Ghasimi, "Iran's Oil Nationalization and Mossadegh's Involvement with the World Bank", *The Middle East Journal*, Volume 65, No.3, Summer 2011.

plan's target of 6%. Other accomplishments included operation of a private bank, Eghtesade-e Nowin, in August 2001; ratification of the Law on Attraction and Protection of Foreign Investment on 24 August 2000; and allocation of \$7.5 billion of increased oil revenues to a newly established Oil Surplus Fund, to safeguard against oil price fluctuations (Valadkhani, A, 2001) . However, unemployment and inflation remained high, the uncertain financial environment prevented effective banking operations, the anticipated foreign direct investments were imperceptible, and resources allocated under the Oil Surplus Fund were misused. Overall, the plan's implementation fell considerably short of intentions.

The 4th FYDP was comprehensive, contained abundant quantitative targets, and constituted the first of the four pillars of a 20-year economic and social vision to significantly upgrade Iranian economic, political, and social international status. The 4th FYDP underscored a smaller government role in the economy, drew attention to enterprise privatization, and stressed more reliance on market forces. However, responsibility for the plan's implementation was assigned to President Ahmadinejad's government, which had less conviction as to its content, assumptions, and objectives and only modest desire for its success or modification. Under these conditions, the 4th FYDP missed a golden opportunity to use high revenues from oil and gas to facilitate an environment conducive to transforming the Economy of Iran from a state of high inflation, protracted unemployment, and low growth to a platform with the higher standards of living the hard-working Iranian people deserved.

After the 4th FYDP, the government deliberated on a 5th FYDP which uses a list of many targets and much less quantitative than earlier FYDPs. This was really only a compilation of wishes and desires. Although Article 8 of the 4th FYDP obliged the government to submit to Parliament a draft of the 5th FYDP before the last six months of 2009/10 (the last year of the previous plan), the government delayed its compliance until presentation of the 2010/11 budget. However, because Parliament had to give priority to budget review, debate and approval of the 5th FYDP was suspended until 5 January 2011. The plan's unsatisfactory initial implementation constituted the second trembling pillar of Iran's 20-year economic and social vision.

4th and 5th FYDPs, Main Economic Targets

Objectives	4 th FYDP Targets 1384-1388 (2005/06-2009/10)	4 th FYDP Actual Performance	5 th FYDP Targets 1390-1394 (2011/2012-2015/16)	1390 2011/2012 Actual Performance	1391-94 2012/13- 2015/2016 Estimates
GDP growth (%)	8.0	5.1	8.0	3.0	2.0
Inflation (%)	9.9	15.3	12.0	21.5	26.8
Liquidity growth (%)	20.0	30.0	20.0	24.5	28.8
Unemployment rate (%)	9.9	11.1	7.0	12.5	15.0
Labor productivity (%)	3.5	1.9		1.2	0.8
Capital productivity (%)	1.0	-1.2		-0.2	-0.2
Total factor productivity (%)	2.5	-0.1		0.5	0.3
Share of total factor productivity in growth	31.3	0.0	31.3	20.0	8.0
Poverty reduction, GINI	0.38	0.40	0.35	0.37	
Exports, oil, (\$B)	120	346.0		118.2	204.0
Exports, non-oil,(\$B)	53	80.6		29.0	160.0
Imports, (\$B)	185	287.8		77.8	154.0
Investment %GDP	12.3	5.5			
Foreign Direct Investment (%GDP)	3.0	0.9	3.0	0.9	0.6

Sources: Central Bank of Iran, Iran Statistical Center, International Monetary Fund, World Economic Outlook, April 2013, and private estimates.

As will be reviewed in this article, the 4th and 5th FYDPs, similar to previous Iranian development plans, were both based on an unconvincing and unattainable range of assumptions and objectives. The Iranian authorities lost the opportunity to learn from the results of implementation of the 4th FYDP and did not attempt to revise many similar and improbable assumptions under the 5th FYDP. While there is no doubt that both the 4th and 5th FYDPs were comprehensive encompassing most of the country's desires in social, security, and foreign relations and in scientific, technological, cultural, and economic areas they were nevertheless unachievable and unworkable. Implementation of the 4th FYDP, 1384-1388 (2005/06-2009/10), and the 5th FYDP, 1390-1394 (2011/12-2015/16), focusing on economic areas, is the subject of the current article.¹

Following a discussion of economic growth under the 4th and 5th FYDPs, this article will review the failure of both plans to achieve employment targets. Analyses of inflation, liquidity, factor productivity, domestic and foreign investment, poverty reduction, and research and development expenditures under the plans will be explored. External sector developments, including oil and non-oil exports, will be next appraised. The final section deals with subsidy reforms, the 20-year economic and social vision, the need for a Medium-Term Expenditure Framework (MTEF), and the newly referenced "resistance economy plan."

2. Growth

The average GDP growth was 5.1% during the 4th FYDP, well below the anticipated growth objective of 8%. During 2005/06, the first year of the 4th FYDP, real GDP grew 4.7%, mainly due to high oil prices. The positive trend continued in 2006/07 and 2007/08, reaching growth rates of 6.2% and 6.4%, respectively, due to high budgetary capital expenditures and strong banking credit. However, a fall in oil exports and a severe agricultural drought deteriorated growth performance in 2008/09, with GDP growth confined to

¹ The Iranian fiscal year ends March 20

0.6%. With the agricultural sector's improvement, the final year of the 4th FYDP witnessed a rebound in economic growth to 3.9%. The assumptions of average daily oil exports of 2.5 million barrels, an average price of \$20 per barrel, and targeted oil and gas earnings of US\$120 billion supported the plan's annual growth rate of 8%. However, actual implementation of the plan deviated sharply. While actual oil and gas export earnings in the 4th FYDP was US\$346 billion, three times more than planned, its economic impact was less, resulting in an actual average growth rate far less than the plan's goal.

The authorities failed to learn from the 4th FYDP's performance and repeated their adherence to an ambitious growth target of 8% during the 5th FYDP. Notwithstanding a rebound in the agricultural sector in the first year of the 5th FYDP, aggregate demand was constrained due to subsidy reforms and higher energy prices, resulting in GDP growth of 3.0% in 2011/12. For the remaining plan period, the harmful impact of international economic sanctions, has led to forecasts for economic growth at -1.9% in 2012/13 and -1.3% in 2013/14, implying a likely average growth of about 2.0% for the 5th FYDP, far less than the plan's target.

Real GDP Growth (Annual Change)

2000-05 (average)	2005/06	2006/07	2007/08	2008/09	2009/10	2010/11	2011/12	2012/13	2013/14- 2015/16
5.5	4.7	6.2	6.4	0.6	3.9	5.9	3.0	-1.9*	2.0*

Sources: Iran Central Bank, and the International Monetary Fund, World Economic Outlook, April 2013.

* Estimates.

3. Employment

High Iranian unemployment has remained a major economic and social concern for both the government and the Iranian people. The 4th FYDP aimed at bringing the unemployment rate down to 9.9% by the end of the plan period. Based on official data from the Statistical Center of Iran, the average unemployment rate was 11.5% during the 4th FYDP.

The 5th FYDP strived for a 7% unemployment rate by the end of the plan period and full employment by the end of the 20-year economic vision period.

The initial stage of the 5th FYDP experienced an unsatisfactory outcome, with an official unemployment rate of 12.5% in the first year. At the same time, many observers questioned the reliability of the official unemployment rate and maintained that a realistic rate was almost twice that, or at least between 40-50% above what authorities reported (Salehi Djavad, 2011). Based on available evidence, the average unemployment rate is expected to remain at about 15% during the 5th FYDP. Even with a higher employment growth elasticity of 0.5 and adoption of much more labor-intensive activities, it is highly unlikely that the unemployment rate will be lower than twice the plan's target by the end of the plan period. In any case, a proposal by the Ministry of Cooperative, Labor, and Social Welfare to send up to 100,000 workers abroad by the end of the 5th FYDP to ease the country's unemployment anxiety avoids the real burden for adopting growth and employment creation measures envisioned under the plan.

The banking system's funds available for making loans play a crucial part in stimulating a private sector role in production and employment expansion. However, the banking system remains constrained by ineffective evaluations of clients' creditworthiness and inadequate Central Bank supervision, especially since the commencement of quick-return projects in 2005. Directing credits to quick-return projects was initiated by the Ministry of Labor to promote rapid employment creation through Central Bank allocation of resources to the banking system. Soon, the flood of applications accompanied by short technical plans overwhelmed the banking system's oversight capacity by advancing credits to clients without thoroughly assessing their creditworthiness. Most of these credits were used for purposes other than those specified by applicants in the technical plans and were mostly channeled to trade and distribution activities which had little effect on unemployment. Needless to say, most of these credits were not repaid, swelling the already-soaring number of non-performing loans, which in 2010 amounted to 25% of total loans (Shajari, 2011).

Unemployment Rate (Annual Change)

2005/06	2006/07	2007/08	2008/09	2009/10	2010/11	2011/12	2012/13	2013/14 2015/16
11.5	11.3	10.5	10.4	11.9	13.5	12.5	13.4*	16.0*

Sources: Statistical Centers of Iran, IMF, and Personal Estimates.

* Estimates.

4. Inflation and Liquidity

Both the 4th and 5th FYDPs strongly emphasized the need for control of inflation. The 4th FYDP proposed adoption of various reforms to reduce inflation to 9.9% by the end of the plan period. However, the actual average annual inflation rate was 11.1% during the plan. In the first year of the 4th FYDP, inflation reached to 10.4%. However, expansionary monetary policy and deficit financing by the government through Central Bank borrowing augmented liquidity growth to over 39% in 2006/07 and fueled inflationary pressures in the economy. To dampen inflationary pressures, the Central Bank tightened credit expansion and reduced government reliance on credit; consequently, liquidity growth was confined to 24 -25% and the inflation rate was narrowed to 10.8% and 12.4% in 2009/10 and 2010/2011, respectively.

The first year of the 5th FYDP corresponded with subsidy reform implementation. Using input-output data, Zonoz concluded that an additional annual inflationary impact of 21.6% was inevitable, given the subsidy reforms. Zonoz assumed that without subsidy reform inflation in 2011/2012 would approach the past five-year average (15.7%); with subsidy reform, he projected inflation to reach 37.3% (15.7+21.6). Despite the considerable undesirable effects of international sanctions and government reliance on Central Bank financing for a large portion of cash compensation deficits, the authorities reported an inflation rate of 21.5% and a liquidity growth of 24.5% for 2011/2012. During the second year of the 5th FYDP, inflation and liquidity are expected to grow to approximately 30.0% and 29.0%, respectively. The

average annual inflation rate and liquidity growth are reckoned to be 23.0% and 25.0%, respectively, for the remaining years of the 5th FYDP.

Inflation and liquidity (Annual change, percent)

	2000-05 (average)	2005/ 06	2006/ 07	2007/ 08	2008/ 09	2009/ 10	2010/ 11	2011/ 12	2012/ 13	2013/14 -2015/16
Inflation	15.3	10.4	11.9	18.4	25.4	10.8	12.4	21.5	30.6*	23.0*
Liquidity	29.3	33.6	39.2	27.9	25.4	23.7	24.9	24.5	28.7*	25.0*

Sources: Iran Central Bank and Personal Estimates.

* Estimates.

5. Productivity

The 4th FYDP's Article 5 maintains a share of total factor productivity of at least 31.3% in economic growth as a result of an increase in output due to efficiency and effectiveness of factors of production such as labor and capital. This implies that the plan anticipated about a third of growth of output would originate from qualitative improvements, including upgrading and introducing new technology, employing modern management techniques, and enhancing labor education and skills development. To achieve this, the same article stipulates targets for the annual growth of labor, capital, and total factor productivity as 3.5%, 1.0%, and 2.5%, respectively. None of these targets was met. Available evidence confirms that the annual growth rate of labor, capital, and total factor productivity were 1.9%, -1.2%, and -0.1%, respectively, during the 4th FYDP implementation period (Alimardi, Lila and Amir Khaleri, 2011). The negative average annual growth of total factor productivity during the plan period suggests no progress toward achieving the goal of at least 31.3% of growth through an increase in productivity.

Although the 5th FYDP did not indicate quantitative goals for the growth of labor, capital, and total factor productivity, it envisioned the same objective of at least 31.3% of growth originating from total factor productivity growth. Available evidence illustrates that during the first year of the 5th FYDP, 15% of output growth stemmed from total factor productivity growth. In the second and third year of the 5th FYDP, only 8% of growth is estimated to derive from total factor productivity growth, making the 5th FYDP target in this area doubtful. Many factors contributed to low productivity, as witnessed during implementation of the 4th FYDP, including lack of training and an insufficient number of qualified workers, job insecurity along with general uncertainty about the future, outmoded machinery and technology, and a lack of emphasis on civilian research and development in favor of non-civilian activities (Amuzegar, Jahangir, 2010).

6. Domestic and Foreign Investment

The 4th FYDP predicted an annual real domestic investment growth of 12.8% and a ratio of investment to GDP of 35% by the end of the plan's period. The actual real annual average investment growth was much lower, less than 6%, and the investment to GDP ratio was confined to 26%, contributing to low GDP growth, high unemployment, and surging inflation. An uncertain economic environment, relatively more attractive returns on trade and speculative activities, and difficulties of financing private investment through the banking system have been among the main contributing factors (ibid).

Similarly, due to economic uncertainty and international sanctions, the goal of foreign direct investment of 3% of GDP by the end of the plan's period was not realized. During the 4th plan period, according to United Nations Conference on Trade and Development (UNCTAD) statistics, foreign investment varied from \$1.6 billion in 2006 to \$3.6 billion in 2010 and accounted for only 0.9% of GDP by the end of the plan period. Iran's ranking in attraction of foreign direct investment was 10th from the bottom; Cuba, Nepal, and Burundi were at the absolute bottom (Nelson I Warren, 2012). The 5th FYDP repeated the aspiration of foreign direct investment at 3% of GDP by the end of the plan. According to the deputy finance minister responsible for

foreign direct investment, Iran would require \$300 billion in foreign direct investment to realize its planned GDP growth of 8% during the 5th FYDP. However, UNCTAD data and private estimates confirm that foreign direct investment amounted to \$4.1 billion during the first year of the 5th FYDP and will not exceed \$3.6 billion during 2012-2013 if the economy continues to remain under international economic and financial sanctions.

Foreign Direct Investment (\$ billions)

2005	2006	2007	2008	2009	2010	2011	2012*	2013*
3.1	1.6	2.0	1.9	3.0	3.6	4.1	3.1	3.6

Source: Iran Ministry of Economics and Finance, UNCTAD and personal estimates.

* Estimates.

It will be difficult, if not impossible, to achieve the growth and employment targets envisioned under the 5th FYDP without giving priority to accelerated private sector investment. A conducive business environment should be created and high priority given to easing business entry and exit. According to the 2012 World Bank report on Doing Business in Iran, the overall ranking of ease of doing business in Iran deteriorated from 140 in 2011 to 144 in 2012, among 183 countries, with Singapore ranking first. Out of ten components explored by the World Bank, all except two for getting electricity (from 163 in 2011 to 162 in 2012) and protecting investors (with no change in its 166 ranking)—deteriorated in 2012 compared with 2011. Iran's 2012 doing business ranking was worse for dealing with construction permits (164) and registering property (163). While the ranking on enforcing contracts was 50, and that for starting a business 53, a great deal must still be improved. According to the 2012 report, it takes 270 days for an average Iranian private company to obtain water and sewerage connections and 505 days to enforce contracts. Clearly these delays are undesirable and are out of line with growth and employment creation envisioned under the 5th FYDP. As in many countries, the authorities should give the highest priority to addressing these costly hindrances to private sector development by supporting necessary and urgent structural reforms.

7. Poverty Reduction

One of the 4th FYDP aspirations was to reduce poverty by 7% by the end of the plan's period. Whether this was achieved remains controversial; available data point in three directions. One group of researchers concluded that poverty in fact increased during the 4th FYDP. According to a United Nations Development Programme (UNDP) report, the Gini coefficient, defined as a ratio between 0, when income distribution is perfect and all the population has equal income, and 1, when only one person has all the income, increased during the 4th FYDP, and thus inequality increased during this period. On the other hand, official data from the Iran Statistical Center indicated that the Gini coefficient declined from 0.4 in 1384, the first year of the plan, to 0.39 in 1388, the last year of the plan period (Mashregh News, 2012). A third group of researchers claimed that the Gini coefficient remained unchanged at around 0.4 during the 4th FYDP, and inequality in Iran remained unchanged.

For the 5th FYDP, the objective was reducing poverty in a way that the Gini coefficient would decline to 0.35 by the end of the plan period. In fact, the Gini coefficient dropped to 0.37 during the initial year of the 5th FYDP, following subsidy reforms and cash compensation payments. Achieving the 5th FYDP's objective to bring down poverty rests upon sustainability of cash compensation payments in the remaining years of the plan plus government success in ensuring that only the poor receive cash compensation. Implementation of growth-oriented policies aimed at low inflation and high employment and attention to rural development will facilitate income distribution improvement.

Other indicators show deterioration in Iranian economic well-being during the 4th and 5th FYDPs. For example, the ratio of returned checks to total number of checks transacted increased twice during the 4th FYDP. This ratio remained at 5% during the initial three years of the 4th FYDP, but increased to 7.8% and 10.7% in 2009 and 2010, respectively, implying that the economic and financial well-being of households and firms sharply worsened, making them unable to honor their financial obligations. The same trend continued during the initial years of the 5th FYDP. During Farwardin of 1391 (21 March-21 April 2012), the returned check ratio reached a peak level of 13.7%, compared to 12.4% during the previous period (Nubakht, Mohammad Bagher, 2012).

8. Research and Development

The 4th FYDP recognized the importance of research and development to enhance the level and quality of production technique. It was therefore expected to increase the share of research and development (R and D) expenditures to GDP to 3% by the end of the plan period. However, this did not occur, and the average R and D expenditures were only 0.36% of GDP, only 12% of the planned target (Mirzadeh, Hamid, 2012). Developed countries allocate much more to R and D, as reflected in the World Bank data for Switzerland, Sweden, and Finland, which offer 3.0, 3.7, and 4% of their GDP to R and D, respectively. Even some developing countries, such as South Korea and Tunisia, are moving forward quickly with their R and D programs and have made available 3.4% and more of their GDP to R and D expenditures, respectively.

The policy makers did not learn from the overambitious R and D goal in the 4th FYDP and continued to project exactly the same target under the 5th FYDP. However, despite the increase in oil prices, according to the Director of the Industrial and Renovation Organization of Iran, the share of R and D expenditures to GDP was 0.8% in the first year of the 5th FYDP; of 100 Iranian industrial units, only one functioned with an operational R and D division; and only 10% of the R and D resources were targeted on areas compatible with the country's industrial policy. The meager attention to R and D in Iran will make it difficult to compete with other countries and creates a formidable obstacle to achieving the 20-year economic vision of placing Iran in the highest ranking position regionally.

9. Oil Exports

As mentioned before, based on oil exports of 2.5 million barrels a day at \$20 for each barrel, the 4th FYDP aimed at oil exports revenues of \$92 billion during the plan period. However, although the actual oil and gas earnings in the 4th FYDP were three times this, their economic impact was much less than presupposed. Furthermore, notwithstanding current government expenditures of twice the size

of tax revenues during the 4th FYDP period, the 5th FYDP anticipated that no oil and gas revenues would finance government current expenditures. In other words, revenues from oil and gas were expected to finance only capital and development expenditures. The disengagement of oil and gas export revenues from current government expenditures has long been an Iranian economic dream. Its realization during the 5th FYDP will require considerable expansion of tax revenues and the private sector taking over many government activities. However, the increasing size of government and the expansion of current expenditures during the 5th FYDP makes the fulfillment of this dream highly unlikely. Furthermore, for tax revenues to fully finance government current expenditures, the tax revenues to GDP ratio should reach at least 10% by the end of the 5th FYDP. Without strong tax reforms and the closing of many tax loopholes, reaching this goal will remain highly implausible.

Due to sanctions and embargoes on Iran, the fall in Iran oil exports caused the balance on current account as a percentage of GDP to fall from 12% in 2011 to 4.9% in 2012. The April 2013 IMF World Economic Outlook forecasts a continuous decline in the balance of current accounts as percentage of GDP to 3.6% in 2013, 1.9% in 2014, and -1.8% in 2015.

10. Non-Oil Exports

During the first three five-year development plans, non-oil exports remained below their planned targets. However, in the 4th FYDP, non-oil exports performed exceptionally well and represented the success story of reaching \$80.6 billion against the plan target of \$53 billion.

During the first year of the 5th FYDP, non-oil exports were \$29 billion, 58% of the target set by the High Council for Non-Oil Exports. During the first five months of 1391 (2012), non-oil exports declined by 12%, due to a 30% fall in petrochemical exports and a 35% decline in liquid gas exports. If such trends continue, the second year of the 5th FYDP will produce non-oil exports of \$36 billion (Raffei Baran, 2012), about 60% of the objective.

Exports and Imports (Billions of US Dollars)

	2005/ 06	2006/ 07	2007/ 08	2008/ 09	2009/ 10	2010/ 11	2011/ 12*	2012/ 13*	2013/14- 2015/16*
Exports oil	53.8	62.0	81.5	82.4	66.2	85.6	118.2	67.4	140.0
Exports, non-oil	10.5	14.0	16.0	18.8	21.3	29.0	33.0	40.0	125.0
Imports	43.0	50.0	58.2	70.1	66.5	77.8	58.8	40.7	115.0

Sources: Central Bank of Iran, Iran Statistical Center, International Monetary Fund, and Private Estimates.

* Estimates.

The non-oil exporters of Iran face many challenges. A large portion of non-oil exports is oil-related products, including petrochemicals and liquid gas, which are adversely affected by international sanctions the same way as oil exports. For the remaining non-oil exports, their international demand are determined by the four marketing Ps: price, product or quality, promotion, and place or distribution. The non-oil exporters of Iran have witnessed severe erosion in price competitiveness, especially following implementation of subsidy reform. Adoption of an appropriate exchange rate for the Rial will not only enhance competitiveness of Iranian exporters, but also safeguard against a flood of cheap imports. Exchange rate correction will not, however, secure full success for the Iranian non-oil exporters, who are adversely affected by many non-price marketing factors. Non-oil exporters need to improve the quality of their products to international standards; this poses major concerns, especially as the degree of value added increases as more manufactured goods entering the international market. The low R and D expenditures in Iran and the meager attention given to after-sales services put the Iranian non-oil exporters at a critical disadvantage. Furthermore, the Iranian non-oil exporters need to make international customers aware of their products, using promotional activities, international advertising, and participation in international trade fairs to penetrate new markets and maintain established market shares (Ghasimi M.R.,

1975, 1978). However, international sanctions have created impediments for non-oil exporters' promotional activities, including payments for international advertising, conducting after-sales services, and participating in international trade fairs. With the Iranian international representatives and embassies giving their full attention to political issues, they are reluctant and unable to provide the necessary assistance and services to non-oil exporters. It is also difficult to select and make payments to international distributors.

The so-called "Resistance Economic Plan," which emphasizes expansion of non-oil exports to safeguard against sanctions on oil exports, is silent on how to address the non-oil exporters' marketing issues under international sanctions. If this plan does not adequately deal with these issues, the plan's success as an alternative platform to safeguard against international economic and financial sanctions on oil exports will be doubtful.

11. Subsidy Reforms

For many years, the Iranian subsidized domestic energy prices were considerably out of line with international energy prices. This drove up domestic energy consumption, contributed to environmental pollution, created heavy traffic, and made insufficient financial resources available to upgrade the oil industry's technology and capital equipment. Under these circumstances, the low domestic price of energy products was clearly unsustainable, prompting an urgent need to replace subsidies with direct cash compensation.

Toward the end of the 4th FYDP, Iranian authorities demonstrated interest in carrying out subsidy reforms. Motives for such reforms included earning additional revenues to finance the large budget deficits, distributing cash among people for political reasons, and economizing on energy consumption and energy imports to shield against the impact of international sanctions. Whatever the government's motives in embracing subsidy reforms, the Parliament approved reform legislation on January 5, 2010, expecting to implement it on March 21, 2010, the first day of the Iranian new year of 1389, to correspond with the initial year of the 5th FYDP. However, the government delayed implementation of the 5th FYDP by one year to cover 1390-1394

(2011/12-2015/16), and began subsidy reforms after a similar delay on December 19, 2010.

The subsidy reform legislation stipulated a division of revenues from subsidy removal into three parts: 50% to finance direct cash compensation to households, 30% to facilitate the industrial sector's adjustment to new prices, and the remaining 20% to compensate government agencies against higher prices. The legislation also required gradual adjustment of energy prices during the 5th FYDP, so that by the end of the plan's period, the adjusted prices would account for not less than 90% of FOB Persian Gulf prices for the corresponding products. Being unprepared for this approach, the Statistical Center of Iran found it administratively challenging to identify the Iranian poor; therefore, the government opted for the easy approach of cash compensation payments to everyone, following completion of a simple application form with no means-testing verifications. Initially, about 62 million people (80% of the population) completed the application forms and became eligible to receive cash compensation, with the understanding that the remaining population would be compensated retroactively upon application. Later on, still during the initial phase, almost the whole Iranian population of 74 million completed the application forms and received Rials 445,000 monthly.

12. Subsidy Reforms Implementation Disarray

The idea of lifting subsidies from the Economy of Iran was praiseworthy and supported by many economic factors, including increasing gaps between domestic and international prices of energy products, high industry energy intensity, and considerable environmental pollution. However, the 20 months of subsidy reform implementation received many valid criticisms.

First, the authorities failed to identify and compensate the poorest portion of population. Instead, they embraced a simple approach of reimbursing everyone, poor and rich. During the first 18 months of reform, when direct cash compensation was 620,000 billion Rials, only 48% of this came from subsidy removal, leaving a significant deficit financed from other sources (Khandozi, Ehsan, 2012): 23% from the general budget, 11% from direct oil exports, and

18% from the Central Bank (Nobakhat Mohammad Bagher 2012), none of which was legally permitted under subsidy reform law. Increasing the already high government indebtedness to the Central Bank resulted in further liquidity acceleration and inflationary pressures in the economy, problems that had been expected to be addressed through cash compensation in the first place. The 1391 (2011/12) budget law proposed eliminating 10 million people from the list of cash recipients; subsequently, the government requested that 1.5 million households voluntarily refrain from receiving cash compensation (Golriz, Hassan, 2012).

Second, the 30% and 20% shares of subsidy removal intended as revenues for industry and government, respectively, were totally denied during the first implementation phase; there were simply no resources left to pay for them. This put industries, especially, under significant pressure to pay higher prices for energy inputs, to deal with resulting higher product prices, to realize erosion in both import and export competitiveness, and often to witness their own gradual demise.

Third, because the value of Iranian Rial and the foreign currencies continued to remain immune under subsidy reform, massive imports and low non-oil exports ensued. Notwithstanding some devaluation of the Rial in early 2012 following international financial and economic sanctions, a better-designed approach is needed to correct the exchange rate to an appropriate level; otherwise, the weak industrial sector will not survive the heavy flood of cheap imports and will not be able to maintain its export competitiveness. Further, the subsidy reform law stipulates a gradual increase in energy prices to achieve at least 90% of FOB Persian Gulf energy prices by the end of the 5th FYDP; natural gas and gas derivatives; the objective is to reach 75% of similar export prices. Appropriate exchange rates play a vital role in determining targets for domestic energy price increases (ibid).

Fourth, notwithstanding additional income provided to the poor, whether they benefitted from subsidy reforms is unclear. According to one study, while 35% of the poor were better off following the subsidy reforms, the welfare of the remaining 65% of the poor deteriorated 2.5 times more than the gain by that 35%. An assessment of 270 Iranian households in Azadlo village in Ardebil

province found 20 months of implementation of subsidy reforms brought mixed outcomes: Notwithstanding an increase in saving and a boost in purchasing power and confidence, to qualify for higher compensation payments, households desired to have larger families, the inclination to work declined, and the tendency for purchases of non-essential goods increased (Pashazadeh, Asghar, 2012).

Fifth, no strong and well-designed public relations program to inform the public about the benefits of the reform and to encourage discussions among individuals and groups, both for and against subsidy reforms, was implemented. Nor were the experiences of other countries that adopted similar reforms evaluated. Often, people were waiting to hear from the authorities about the size of price increases, timing for implementation, and compensation payments instead of knowing what to expect.

Finally, many observers maintain that three conditions were necessary for successful subsidy reform implementation: continued high economic growth, low inflation, and government popularity. It is questionable whether all these prevailed at the time of subsidy reform implementation, which was also affected by intensified international economic and financial sanctions.

13. The 20-year Economic and Social Vision

The 4th and 5th FYDPs have passed through almost one-third of the 20-year economic and social vision of Iran; judged by their performance so far, the government has a formidable task for the remaining two-thirds of the journey. Attaining average annual GDP growth of 8% with full employment by the end of the 20-year vision requires an average annual growth rate much greater than 8% during the remaining time to compensate for the inadequate growth performance so far. Much deeper structural reforms are needed, as well as urgent and stronger stabilization policies to address the internal and external imbalances in the economy. Such action will exert heavy pressures on the country's capacity. A more appropriate approach is a thorough revision of both the 5th FYDP and the 20-year vision, having as the highest priority establishing a clear and conducive environment for private sector activities and tangible

improvements in the ease of business entry and exit. Even more important, the revised plans must attract foreign direct investment and access to modern technology. To do so, requires stable rules and regulations, confidence in government policies (especially those related to exchange rates), a supportive judicial and regulatory framework, and an early resolution of international sanctions and political tensions.

14. Medium -Term Expenditures Framework

As the above analysis shows, there is a clear disengagement among Iran's five-year planning process, annual budgets, and economic policy making. Not only are the Iranian annual budgets disconnected both from one another and from the plans' programs, they lack the necessary resource envelopes to undertake the agreed plans programs. Under these conditions, development or integration of a MTEF within the revised FYDPs and in future plans is imperative. As the experiences of many World Bank member countries illustrate, MTEF links three components: (1) projections of aggregate resources to include oil, gas, non-oil, and tax revenues; (2) estimates of sector program costs; and (3) a political /administrative process that integrates components of (1) and (2), (World Bank, Working Paper, 2002). In many countries, the MTEF contains all the planned expenditures compatible with the aggregate resources, thus presenting a multi-year budgetary process with each budget connected to the others and each financing their share of planned expenditures.

15. Resistance Economy Plan

To safeguard against international sanction, and to diminish the economy's reliance on oil exports, Iranian authorities have recently made references to formation of a "resistance economy plan" (Addib, Mohammad Hosain, 2012). While authorities have postponed detailed elaboration of this plan until later, the expected resistance economy plan is to emphasis private sector development and non-oil exports expansion to finance the necessary imports. These elements have already been underscored under the 5th FYDP and the 20-year economic and social vision of Iran. However, the international and financial sanctions have already accentuated the uncertain and reluctant nature of the private sector

and heightened complex hurdles not only on oil, but also on non-oil exports (Katzmzn, Kenneth, 2001 and Bassiri Tabrizi, Aniseh, 2011). Under these conditions, there are two difficult choices. First, remaining under current international economic and financial sanctions but also revising the 5th FYDP and the 20-year vision to incorporate elements of a “resistance economy plan” will help avoid design and implementation of a complicated resistance economy plan that would add to an already sizable menu of plans with many unrealized expectations. Second, avoiding and reducing international economic and financial sanctions, and revising the 5th FYDP and the 20-year vision.

16. Conclusions

The first year of implementation of the 5th FYDP has been disappointing. Most macroeconomic variables sharply deviated from the plan’s targets, and as with the 4th FYDP, it will most likely reveal considerable gaps between reality and projections. What lessons can implementations of the 4th and 5th FYDPs and the 20-year vision plan provide?

First, in the 5th FYDP, many macroeconomic variables, including GDP growth, the share of total factor productivity in growth, inflation, and unemployment, remained unchanged from those in the 4th FYDP, even though the 4th FYDP showed considerable gaps between expectation and experience. The policy makers failed to learn lessons from the 4th FYDP in drawing up the 5th FYDP; instead of designing a more realistic and attainable plan, they continued with the same ambitious, unrealistic objectives. Closing the 60-year-old Plan and Budget Organization and replacing it with a planning unit annexed to the President’s office denied technocrats and experienced economists any input into the planning process. The politically motivated and inexperienced parliamentary members neither helped the Ninth Government put the plan into practice nor objected to the government’s lack of interest in its implementation. This failure was aggravated by low tolerance for constructive criticisms and little interest in expert opinions or the experiences of other countries. The 5th FYDP and the 20-year vision should be revised to learn from implementation

of the 4th and 5th FYDPs in such a way to remain compatible with the country's capacity.

Second, lack of both a continuous process and a conducive environment for the design and implementation of the plans accounted for poor performance. Different sets of authorities were responsible for preparation and implementation of Iran's FYDPs. Preparation of the 4th FYDP was under the Eighth Government, the task of approving it into law was undertaken by the Sixth and Seventh Parliaments, and the reluctant Ninth Government of President Ahmadinejad, who had a totally different economic vision, was responsible for putting the plan into operation. Indeed, the Ninth Government disagreed with many of the 4th plan's envisioned goals and reform measures; as was well articulated by a government official (Jomhurieslami, 2009), on a team responsible for designing the 5th FYDP, which had the same ambitious and unattainable targets as its predecessor. Furthermore, the Ninth Government showed little interest in executing its own plan and presented its first and second annual budgets with little coordination with each other and in dissonance with the 5th FYDP programs. The revised 5th FYDP and 20-year vision, and future plans, represent legally binding documents subject to implementation by the executive branch regardless of its economic philosophy.

Third, the results of 20 months of implementation of subsidy reforms, the government's cardinal reform package, have remained unsatisfactory. While the idea of subsidy reform was admirable, and was in many ways a taboo breaker, the law's several shortfalls—cash compensation to everyone, both poor and rich, without taking into account the experiences of other countries—contributed to its problems. These problems included considerable cash payment deficits, intensified government dependence on the Central Bank, acceleration of an already elevated liquidity and expansion of inflationary pressures that the subsidy reforms were expected to address. The response should not be to abandon phase two of the subsidy reforms, but instead to revise the law, organize a group of experienced administrators and economists to supervise daily implementation of reform, and if necessary, amend reform measures.

Fourth, the Iranian planning experience has revealed a clear disengagement between five-year plans, annual budgets, and government economic policies. Iranian annual budgets are disconnected from one another and from the current plan's programs. Under these conditions, development and integration of an MTEF that emphasizes a multi-year budgetary framework within the revised 5th FYDP and future plans is imperative.

Finally, inadequate attention to the adverse impacts of international economic and financial sanctions on the Economy of Iran—especially on oil exports, non-oil exports, imports, foreign direct investment, and financial relationships of businesses with the outside world—resulted the overall low domestic confidence and remains the major shortcoming of both the 4th and 5th FYDPs. Six rounds of sanctions since 2006, and major disruptions in the financial relationships of Iranian banks with their foreign counterparts, have damaged normal economic functioning and have unconstructively influenced implementation of the plans. Neither the 5th FYDP, with 235 articles, nor annual budgets can present a blueprint for a country that denies itself normal international economic relationships. These conditions present two challenging choices. First, Iran can remain under the international sanctions but revise the 5th FYDP and the 20-year vision with the aim of diminishing the adverse domestic impacts of sanctions. Many elements of the recently referenced “resistance economy plan” can be incorporated under a revised 5th FYDP and the 20-year vision. Second, Iran can avoid further international economic and financial sanctions, adopt a more conciliatory international posture, diminish the sanctions and revise the 5th FYDP and 20-year vision to normalize economic activities.

Such revisions of the 5th FYDP and the 20-year vision should present clear priorities for private sector development, ease of business entry and exit, attraction of foreign direct investment and modern technology implemented through stable rules and regulations and a supportive judicial and regulatory framework. The second choice will put forward a more appropriate approach to facilitate a return to normal life for many deserving and hardworking Iranian people. The sooner a choice is made and the necessary changes are introduced into the 5th FYDP and the 20-year vision, the more quickly Iran can begin to move toward a healthier economic environment for its people.

References

- Addib, Mohammad Hosain, (2012). “Iran’s Economy Entry to a New Era”, *Tabnak*, September 6, 2012.
- Alimardi Lila and Amir Khaleri, (2011). “Review of Productivity in 4th FYDP,” *Hafteh Nameh Barnemeh*.
- Amuzegar Jahangir, (2010). "Iran’s Fourth Plan: A Partial Assessment", *Middle East Policy Journal*, winter, Vol. XVII, No. 4.
- Bassiri Tabrizi, Aniseh, (2011). *Implications of Sanctions on Iranian Economic Relations with the EU*, London, October 1.
- “Economic Standpoints in 10th Presidential Election”, *Jomhourieslami*, May 29, 2009.
- Ghasimi, M.R. (1975). “Boosting Non-Oil Exports,” *Kayhan International*, March 2.
- Ghasimi, M.R. (1978). “Multinational Companies and Exports of Manufactured Goods from Developing Countries”. Tehran University, *Journal of International Relations*, No. 7 and 8.
- Golriz, Hassan, (2012). “Subsidy Reform Plan in Iran: Preliminary Assessment,” *unpublished paper*.
- *IMF, Article 46*, 4th FYDP.
- *IMF, Staff Report* for the 2011 Article IV "Initial Impact of the Targeted Subsidy Reform", (2011).
- *IMF, Staff Report* for the 2011 Article IV Consultation, July 5, 2011, p. 12.
- Iran 5th FYDP, Part 2, General Section, p. 14.
- Iran Fifth Five Year Development Plan, *Deputy President for Planning*, December 2010, section 34-5, p.14.
- “Iran needs \$300 billion FDI to realize 8% economic growth”, *Tehran Times*, December 17, 2011".

- “Iran to send 5,000 workers abroad by March”, (2011). *Tehran Times*, December 28.
- “Iran’s Economy at a Glance, Trends, Estimates and Forecasts of Economic Indicators” (2011), *Iran Economics*.
- “Iran-The Chronicles of the Subsidy Reform”, *International Monetary Fund Working Paper*, Annex July 1, 2011, p. 24
- Kenneth Katzman, (2001). “Iran Sanctions”, *Congressional Research Service*, February 3.
- Khandozi Ehsan, (2012). “Will the Next President Implement the Subsidy Reform,” *Borhan*, August 8.
- “Limited dependency of the 5th FYDP to oil and gas revenues, a century old dream”, *Siasatrooz*, January 16, 2010.
- M.R. Ghasimi, (1992). “The Economy of Iran after the Revolution: An Economic Appraisal of the Five-Year Plan,” *International Journal of Middle East Studies*, pp. 599-614.
- Malek Fredrick, (2012). “Reduction in Gini Coefficient, does it imply economic improvements for households?” *Khabaronline*, August.
- *Management Bulletin*, No.25, Iranian Ministry of Industry, Mining and Trade, October 24, 2011.
- “Medium-Term Expenditure Framework: From Concept to Practice”. Preliminary Lessons from African Region, *World Bank Working Paper Series*, February 28, 2002.
- Mirzadeh Hamid, (2012). “Research and Development in Iran,” *Shargh Newspaper*, No.1584, July 23, p. 1.
- Nelson I. Warren (2012). “In break with past, regime reveals foreign investments,” *Iran Times*, July 17.
- Nobakhat Mohammad Bagher, (2012). “Two Missed Opportunities,” *Aftab News*, June 14.

- Nubakhat, Mohammad Bagher, Deputy Director of Economic Research, Iran's Expediency Council, (an interview) *Arman News*, August 2, 2012.
- Pashazadeh, Asghar (2012). "An Assessment of Economic and Social Impacts of Subsidy Reform in a Rural Community," *Donye Eghtesad*, September 5, 2012.
- Raffei Baran, (2012). "New Facilities to Safeguard Exchange Rate Fluctuations," *Roznameh Iran*, No. 5150, August 12.
- Salehi Djavad, (2011) "Taking the surprise out of Iran's low unemployment rate," December 13, *personal weblog*.
- *Shahrvand Irani* (2009). "Iran Economic Development Plans, ambitious with little outcomes," January 11.
- Shajari, Parastoo and Houshang (2011). "Non-Performing Loans and Financial Soundness Indicators in Iran's Banking System," paper presented at the *International Iranian Economic Association*, December 8.
- "The situation of the rich and poor in Iran, *Mashreghnews*", June 2012.
- *UNDP*, "Country Programme for the Islamic Republic of Iran", 2005-9.
- *United Nations Conference of Trade and Development*, Foreign Direct Investment Flows, 1970-2011.
- Valadkhani, A. (2001). "An Analysis of Iran's Third Five-Year Development Plan in the Post-Revolution Era (2000-2005)," *Journal of Iranian Research and Analysis*, 17(2), pp. 1-21.
- *World Bank Data on Research and Development Expenditures (several years)*.
- *World Bank*, (2012). "Doing Business in Iran".
- Zonoz Behrooz Hadi, (2011). "The Economic Impact of Subsidy Reform," *Iranian Engineers' Association*, December 20.