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INTERNATIONAL MONETARY FUND

ALGERIA

Selected Issues and Statistical Appendix

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Approved by the Middle Eastern Department

August 25, 1998

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Algeria: Basic Data

Area:	2.4 million square kilometers
Population (1997)	29.2 million
Population growth (1997)	1.9 percent
Employment in the nonagricultural sector	4.3 million
GDP per capita (1997)	US\$1,608

IMF Position (May 30, 1998)

Quota	SDR 914.40 million
Fund holdings of dinars	SDR 2,505.27 million
Holdings of SDRs	SDR 2.39 million
Exchange rate	US\$1 = DA 58.38

	1997	1993	1994	1995	1996	1997
	In billions of dinars at current prices			(Percentage change in constant prices)		
National accounts						
Nongovernment consumption	1,466.6	-2.0	0.2	2.6	1.9	-1.1
Government consumption	400.4	2.3	4.0	4.1	2.0	2.0
Gross fixed investment	556.4	-3.2	0.5	3.0	3.5	-0.1
Total domestic demand	2,423.4	-3.5	1.0	2.7	-1.7	-2.0
Exports of goods and services	874.0	-1.9	-3.4	6.3	9.6	11.2
Imports of goods and services	589.8	-6.7	6.1	2.0	-13.3	-4.4
Gross domestic product	2,716.0	-2.2	-0.9	3.9	3.8	1.3
				(Annual percentage change)		
Money and prices						
Consumer prices (end of period)		16.1	38.6	21.9	15.1	6.0
GDP deflator		22.0	27.7	28.4	22.3	6.1
Broad money		20.8	15.4	10.5	14.4	18.5
Bank credit to the nongovernment sector 1/		-52.7	38.9	85.0	37.3	-3.0
				(In billions of U.S. dollars)		
Balance of payments						
Merchandise exports		10.4	8.9	10.3	13.2	13.8
Merchandise imports		8.0	9.2	10.2	9.1	8.1
Services and transfers, net		-1.9	-1.6	-2.4	-2.9	-2.2
Current account balance		0.8	-1.8	-2.2	1.2	3.5
(In percent of GDP)		1.6	-4.3	-5.6	2.7	7.2
Gross official reserves (excluding gold)		1.5	2.6	2.1	4.2	8.0
Gross official reserves (in months of imports)		1.8	2.9	2.1	4.5	9.4
				(In percent of GDP)		
Government finances						
Revenue		27.6	29.5	30.6	33.1	34.1
Expenditures 2/		36.2	33.9	32.0	30.1	31.7
Balance		-8.6	-4.4	-1.4	3.0	2.4

Sources: Data provided by the Algerian authorities; IMF, **International Financial Statistics**, and Fund staff estimates.

1/ For comparison purposes, the data on credit to the nongovernment sector for December 1993 need to be adjusted upward by DA 275.5 billion, representing the conversion into government bonds of public enterprises' commercial debt. This adjustment would yield an increase of 6.6 percent. Adjustment for a similar operation (DA 187 billion) for 1997 results in a rate of increase of 21 percent.

2/ Including net lending, special accounts, operations of the Rehabilitation Fund.

Algeria: Basic Economic and Financial Indicators , 1995-98

	1995	1996	1997		1998	
			Prog. 1/	Prel.	Proj. 2/	Proj.
(Percent change)						
National income and prices						
GDP at constant prices	3.9	3.8	4.5	1.3	5.5	5.5
Hydrocarbon sector	4.4	6.3	8.2	6.0	6.6	6.5
Other sectors	3.8	3.4	3.2	-0.7	5.1	5.2
GDP deflator	28.6	22.2	6.6	6.1	2.0	-0.1
Consumer price index (end of period)	21.9	15.1	7.0	6.0	4.0	6.7
Consumer price index (average)	29.8	18.7	8.1	5.7	5.0	5.7
External sector 3/						
Exports, f.o.b.	15.4	28.8	-1.1	4.6	-5.4	-17.7
Of which:						
Hydrocarbons	13.0	23.0	-2.0	4.3	-6.2	-19.0
Imports, f.o.b.	10.4	-10.0	10.2	-10.6	10.3	12.3
Terms of trade	-2.6	16.0	-10.8	3.2	-10.6	-22.4
Real effective exchange rate 4/	-16.2	2.5	...	9.6	...	...
Money and credit						
Net foreign assets 5/	-4.7	13.5	5.5	23.7	6.2	-2.0
Domestic credit	26.6	11.3	13.6	13.4	11.7	13.4
Credit to the government (net) 5/ 6/	-9.3	-15.1	-4.4	-4.5	-0.7	4.0
Credit to the economy 5/ 6/	35.9	26.4	18.0	17.9	12.5	8.5
Money and quasi-money	10.5	14.4	12.5	18.5	12.4	6.4
Liquidity ratio 7/	38.7	34.4	35.0	37.1	39.0	39.1
Interest rate (repurchase rate in percent)	23.0	20.0	...	13.3	...	...
(In percent of GDP)						
Overall budget balance (deficit-)	-1.4	3.0	1.3	2.4	0.7	-1.9
Revenue	30.6	33.1	32.1	34.1	31.2	31.0
Hydrocarbons 8/	18.2	20.8	19.3	21.8	18.5	17.8
Nonhydrocarbons 9/	12.3	12.2	12.8	12.3	12.7	13.3
Expenditure 10/	32.0	30.1	30.8	31.7	30.6	32.9
Current expenditure	22.6	22.1	23.0	23.7	23.4	23.7
Investment	7.4	7.0	7.0	7.4	7.2	9.1
Other 10/	2.0	1.0	0.8	0.6	0.0	0.1
Domestic bank financing	-5.4	-5.6	-3.3	-3.7	...	1.5
External current account (deficit -)	-5.4	2.7	0.3	7.3	3.8	-0.1
External debt	78.6	73.4	67.8	63.4	67.2	66.1
Domestic debt	22.3	22.3	24.0	21.2	20.2	20.8

Algeria: Basic Economic and Financial Indicators , 1995-98

	1995	1996	1997		1998	
			Prog. 1/	Prel.	Proj. 2/	Proj.
(In billions of U.S. dollars)						
Exports, f.o.b.	10.26	13.21	13.07	13.82	13.39	11.38
<i>Of which:</i>						
Hydrocarbons	9.73	12.64	12.39	13.18	12.81	10.68
Imports, f.o.b.	10.10	9.09	10.02	8.13	9.08	9.13
Interest payments	2.31	2.24	2.24	2.11	2.06	1.96
Current account (deficit -)	-2.23	1.24	0.14	3.46	1.91	-0.05
Overall balance (deficit -)	-6.32	-2.11	-1.49	1.17	0.58	-1.07
Gross official reserves (end-period)	2.11	4.23	5.52	8.04	8.71	7.53
External debt	32.50	33.49	33.01	30.03	33.74	31.49
(In billions of Algerian dinars, unless otherwise indicated)						
GDP (current prices)	1,967	2,495	2,777	2,716	2,914	2,864
Crude oil export unit value (US\$/bbl)	17.6	21.7	19.0	19.5	18.0	15.0
Exchange rate (DA/US\$) (end of period)	52.2	56.2	57.4	58.0	58.6	60.1

Sources: Algerian authorities; and Fund staff estimates and projections.

1/ Programmed at the Fourth Review of EFF in June 1997; EBS/97/104 (6/13/97).

2/ Projected at the Fifth Review of EFF in November 1997; EBS/98/4 (01/08/98).

3/ In U.S. dollars terms.

4/ Annual average changes in the total trade-weighted INS index. A decrease in the index implies a depreciation.

5/ Annual change as a percentage of broad money at the beginning of the period.

6/ Excluding the impact of financial restructuring package involving the swap of Government bonds for public enterprises' commercial debt. The amounts involved are DA 186.7 billion in 1997 (20.3 percent of end-December 1996 money stock).

7/ Ratio of the average broad money (M2) stock during the year to GDP.

8/ Including dividends on current profits paid by Sonatrach.

9/ Including grants.

10/ Including special accounts, net lending and allocation to the Rehabilitation Fund.

I. MACROECONOMIC IMPLICATIONS OF AN OIL PRICE DECLINE AND POLICY RECOMMENDATIONS¹

A. Introduction

1. Algeria is highly dependent on its hydrocarbon resources. In 1995–97, hydrocarbon revenue accounted for 95 percent of exports and 60 percent of total budgetary revenue, even though the share of this sector in GDP is 30 percent. As a result, fluctuations in oil prices have a major impact on the overall macroeconomic equilibrium, and complicate the formulation of economic policy.
2. During 1996–97, Algeria benefited from relatively high oil prices (the highest since the Gulf conflict in the early 1990s) which helped achieve the objectives of its adjustment program (Chart 1). In particular, the authorities were able to strengthen dramatically the country's external position by saving most of the windfall from higher than expected oil prices and bringing the level of international reserves to about 10 months of imports by early 1998, from the equivalent of 2 months of imports in 1994 when the Fund-supported program started. However, the recent fall in world oil prices—from about US\$20 per barrel in October 1997 to US\$13 in June 1998—threatens to reverse this trend.
3. This latest deterioration in the terms of trade comes at a particularly difficult moment for Algeria, as the country goes through an extensive structural reform process and new external financial resources remain limited. Moreover, the current situation is rendered even more difficult by the social unrest that has prevailed in the last years and the necessity for the government to gather support to maintain its reform agenda.
4. Against this background, this chapter discusses the possible policy responses to the reduction of fiscal revenue and the deterioration of the external balance, and more generally the negative wealth effect on the country, stemming from the decline in oil prices.

B. Weathering the Shock in the Short Run

5. Algeria, like other countries that rely heavily on oil resources, has been confronted in the last 25 years with sharp reversals in its terms of trade stemming from major changes in the price of oil. A crucial question for policy makers under those conditions has been to assess whether these shocks were temporary or permanent, and the course of action that was called for.
6. More often than not, political pressures to spur economic growth and alleviate social conditions induce governments to raise expenditure when revenue from hydrocarbon

¹This chapter was prepared by Sebastian Paris Horvitz and draws extensively from previous work by Przemysław Gajdeczka.

Chart 1: Oil Export Price
(Composite)

1/ Price divided by the index of export prices of industrialized countries (base 100 in 1990).

resources increases, but it would be more difficult and painful to cut outlays when oil prices decline and national income shrinks. As a result, governments are inclined to consider an improvement in terms of trade as permanent and to view a deterioration as only temporary.

7. It could be argued that if a deviation of the oil price from the expected trend were to be short-lived, accumulated reserves or external financing could be used to smooth consumption over time, in essence restoring the long run equilibrium.² A temporary shock would therefore justify a larger reduction in saving and the current account balance than a longer-lasting one. Moreover, the higher the volatility of oil prices and the less diversified the structure of exports, the higher would be the level of precautionary savings that needs to be built to dampen the swings in consumption over time. Unfortunately, the past experience of most oil exporting countries in dealing with sharp changes in oil prices has been somewhat different in terms of the actual policies implemented.

8. A recurrent feature of the policy response to drastic changes in oil prices in hydrocarbon-exporting countries has been to seek increasingly short-term financing to accommodate what is thought a temporary reduction of external resources. As a result, external debt not only increases but maturities shorten. Meanwhile, domestically, recourse is often made to inflationary financing, which, by deteriorating the overall macroeconomic environment, discourages private investment and also puts a further burden on the most vulnerable groups of the population. Alternatively, excessive claims by the public sector on national savings limit the room for private activity to expand, and the resulting debt accumulation generally weakens the medium-term sustainability of the fiscal position. Furthermore, exchange rate adjustments are resisted despite the absence of corrections in domestic and external imbalances.

9. Algeria's experience during 1985–93 illustrates the preference of financing over adjustment as a policy response and the difficulty to adopt a more prudent use of oil revenues at times of more favorable prices. Indeed, after the sharp decline of oil prices in 1986, the needed fiscal adjustment came only after several years of growing imbalances. Budgetary revenue fell sharply from 38 percent of GDP during 1981–85 to 28 percent during 1986–90, while public expenditure was cut by only about 5 percentage points of GDP. As a result, large budget deficits started to accumulate, financed mostly by money creation, which resulted in a substantial monetary overhang as direct inflationary effects were repressed through price controls. Gradually, external debt rose from the equivalent of 30 percent of GDP in 1985 to 62 percent of GDP in 1993, while the shortening of maturities raised the debt service ratio from 35 percent of exports to over 80 percent during this period. Moreover, despite a temporary oil price rebound related to the Gulf conflict, international reserves hardly exceeded 2 months of imports between 1986 and 1993. Clearly, the tendency to perceive a negative shock as a transitory disturbance resulted in postponement of the necessary adjustment of

²As discussed in Ghosh and Ostry (1994).

domestic conditions. In the absence of policy corrections, and of an international reserve cushion, the financing of the balance of payments became rapidly unsustainable.

10. In this regard, the program that Algeria started to implement in 1994 with support from the Fund, was a major break with past experiences. The authorities' program emphasized restoring external viability through difficult adjustment. In this connection, the marked improvement of oil prices in 1996–97 was accompanied by large fiscal surpluses and an active policy of accumulation of reserves to help the country cope with the possible reversal of external conditions, particularly as relief in the form of external debt rescheduling was ending by mid-1998. As of May 1998, the amount of gross international reserves stood at US\$8.9 billion. This wise policy provided the authorities some flexibility in phasing in their adjustment response.

C. Medium-Term Adjustment

11. With no assurance of an early rebound of oil prices, the more prudent policy response is to view the decline as permanent and to prepare the population for the need to adjust consumption levels to the lower income well before the external financing dries up. Although Algeria has a substantial reserve cushion, access to external finance remains limited, and borrowing conditions in international market are likely to be onerous, notwithstanding improved credibility following several years of prudent macroeconomic policies.

12. Determining the period over which adjustment can be deferred without violating the solvency condition of external and domestic balances, requires estimating the magnitude of a deviation of a given policy stance from the sustainable position. Under broadly unchanged policies and constant net public wealth, scope for further borrowing to delay adjustment would exist only if the government's net debt were on a declining path in relation to GDP prior to the price shock. If not, the public debt to GDP ratio would begin to rise, and unless addressed via fiscal adjustment could become unsustainable.

13. To illustrate the difficulties in maintaining public debt at reasonable levels and therefore keep the fiscal position sustainable, it is useful to look at the debt dynamics, applied to Algeria. The government debt/GDP ratio would depend on nominal GDP growth, the nominal interest rate and the primary balance.³ Taking into account only the government's gross debt, which in Algeria amounts to around 80 percent of GDP, and assuming a high

³The debt/GDP ratio, dt , dynamic can be written as: (1) with r the nominal interest rate, g the nominal growth of GDP and s_t the primary balance, and d_0 the initial debt stock.

$$(1) \quad d_t = d_{t-1} \frac{1+r}{1+g} - s_t \qquad d_t = d_0 \left(\frac{1+r}{1+g} \right)^t - \sum_{i=0}^{t-1} s_{t-i} \left(\frac{1+r}{1+g} \right)^i$$

growth scenario (an average rate of 8 percent in nominal terms) based on the implementation of comprehensive structural reforms, and a 5 percent nominal interest rate, a primary deficit of 2.4 percent of GDP would stabilize the stock of debt. However, under the same assumptions it would be necessary to achieve a primary surplus equivalent to 1.3 percent of GDP to lower the debt/GDP ratio to 50 percent over a 10 year period.

14. With regard to the balance of payments, if the current low price of US\$13 per barrel were to persist in real terms over the medium term, Algeria's prospects could deteriorate rapidly. Indeed, while the high level of reserves could help absorb the reduction in hydrocarbon revenue for one or two years, reserves might be depleted and the balance of payments would require supplementary financing from 2002 onward to maintain imports. In the event of an external financing crisis, imports would have to adjust in a much more disorderly manner, and the growth potential of the economy would be impaired more severely than under the scenario where adjustment is gradually phased in starting at an earlier date.

15. While a fiscal correction cannot be postponed indefinitely following a lasting fall in export prices, the issue remains whether the policy that restores macroeconomic equilibrium needs to be supplemented by or effected through a change in the exchange rate. The decline in export prices lowers national income, and at unchanged public and private consumption, the lower income is reflected in reduced savings and a deterioration of the external current account. Restoring external equilibrium requires that aggregate expenditure adjusts to the lower aggregate income. The real exchange rate will need to depreciate, requiring a combination of lower domestic prices of nontradables and higher domestic prices of tradable goods.

16. Movements in the exchange rate to accommodate the impact of the deterioration in the terms of trade would depend on the exchange rate regime adopted by the authorities. In particular, in countries with a high level of inflation where the exchange rate has been used as a principal instrument to anchor expectations and achieve a decline in the rate of domestic price increase, the authorities might delay a nominal exchange rate adjustment with a view to avoiding a resurgence of inflationary pressures. In this case, the adjustment would mostly be supported by restrictive demand management policies. If the exchange rate is given a wider range to fluctuate, it is likely that it would depreciate, particularly under limited external borrowing capacity of the authorities and in the absence of restrictions on capital outflows.

17. In Algeria, most of the receipts from hydrocarbon exports are surrendered to the central bank and the domestic currency counterpart is transferred to the government. This simplifies the mechanism of intervention by the authorities to achieve some of the objectives of macroeconomic policies. Indeed, this institutional arrangement gives the central bank a preponderant role in the determination of the exchange rate. In 1996–97, sterilization of the monetary impact of the oil price windfall was achieved directly by an increase in government deposits mirrored by the accumulation of international reserves.

18. Since the beginning of 1998 the exchange rate has remained fairly constant at DA 58–59 per U.S. dollar. At the same time, international reserves continued to increase to US\$8.9 billion by end-May 1998. This further accumulation of reserves reflects in part the still low level of imports that stems from sluggish economic activity, in particular due to the absence of a significant recovery in the industrial sector. In these circumstances, the authorities' strategy has been to tailor the supply of foreign exchange to the prevailing low demand, thereby protecting official reserves and ensuring that the exchange rate adjusts in a direction consistent with the change in fundamentals.

19. In Algeria, the net impact effect on the government budget of a depreciation of the exchange rate by 10 percent is an improvement of the fiscal balance of more than 1 percent of GDP. However, any exchange rate adjustment has an adverse impact on real disposable income and could further add to social tension. One should keep in mind the substantial decline in real per capita income since 1985. As a result, the central bank would have to weigh the necessity to allow enough flexibility to the exchange rate to adjust to the new macroeconomic conditions and to maintain a favorable environment to stimulate growth. This policy in any event would have to be supported by tight demand management and wage policies to keep in check the emergence of inflationary pressures.

20. As an alternative to exchange rate based expenditure switching, the Algerian authorities have in the past relied on restrictions to limit the availability of foreign exchange and on formal or informal nontariff barriers to imports. For instance, prior to the implementation of the 1994 program formal payment restrictions were introduced to repress excess demand for foreign exchange, and reduce access to imported products. These measures were detrimental to economic activity, leading to scarcities and black market premia, as well as a fall in capacity utilization and capital accumulation.

D. Preparing the Future and Fiscal Sustainability with Exhaustible Resources

21. Because most export revenue from oil is transferred to the central government, an evaluation of fiscal sustainability based on the aggregate fiscal balance could be misleading. Fiscal policy based on a rapid depletion of natural resources could be unsustainable even if government budgets were balanced. Such an approach would not adequately capture the impact of a given policy stance on the net worth of the government and national wealth. This suggests the need to separate the government's fiscal position into a non-oil fiscal deficit and the permanent income from hydrocarbon exploitation. In the context of a price shock, such an approach would permit to assess by how much government revenue and discretionary expenditure would need to adjust to maintain fiscal sustainability.⁴

22. In the case of Algeria, the "usable" amount of reserves for fiscal purposes was estimated at around 12 percent of 1997 GDP. For this exercise, oil and natural gas reserves

⁴See Liuksila et al. (1994).

were estimated at around 33 billion barrels at end 1997.⁵ Assuming a 5 percent annual rate for growth of extraction, it would take 24 years for the reserves to be exhausted.⁶ Assuming an oil price of US\$13 per barrel, which remains constant in real terms, the present value of Algeria's hydrocarbon reserves was estimated at around 355 percent of 1997 GDP. If the per capita use of these reserves remains identical over the period of their existence, the "usable" amount of reserves would be around 12 percent of 1997 GDP. This compares with actual budgetary revenue from the hydrocarbon sector equivalent to about 20 percent of GDP.

23. It is worth pointing out that because permanent income from such wealth is subject to frequent and large fluctuations, there may be a need for precautionary saving over and above the level implied by the above analysis. For Algeria, under the current low oil prices, it seems that there is a need for an early return to a fiscal surplus and for keeping 1998 expenditure at a level that would be sustainable over the medium term. Indeed, for 1998–99, the projected budget deficits of around 2–1 percent, and around 19–18 percent excluding hydrocarbon revenue, would appear to exceed the more prudent policy prescriptions that would seek to restore medium-term sustainability of the fiscal position. In addition to the crowding-out effect on private investment, in the absence of significant revenue-yielding measures the level of expenditure might need to be reduced sharply in subsequent years with a strong likelihood that investment projects would need to be suspended, resulting in waste of public resources.

24. In the same vein, the Algerian authorities may consider the advantages of different institutional arrangements for managing the long-term use of the hydrocarbon revenues. Some countries that extract substantial revenue from nonrenewable resources have put in place stabilization funds to reduce the distortion effects stemming from short-term fluctuations of prices and to ensure an efficient allocation of those resources within the economy. However,

⁵However, this level could substantially underestimate the "real" stock of hydrocarbon resources in Algeria's soil given the generally acknowledged scope for development and the rapid rate at which recent discoveries have been made.

⁶The estimate of the number of years, n , is based on the following calculation:

$$R_0 = \sum_{j=0}^n X_j \quad \text{with} \quad X_j = X_{j-1}(1+x)$$

$$R_0 = X_0 \frac{(1+x)^{n+1} - 1}{x} \quad \text{thus} \quad n = \frac{\log\left(\frac{xR_0}{X_0} + 1\right)}{\log(1+x)} - 1$$

with R_0 as reserves at the initial period, X_0 is the amount extracted at the initial period and x is the rate of extraction.

under those systems, policy makers have to solve the difficult problem of the determination of the optimum level of extraction of resources,⁷ and need to ensure that funds are used in an effective way and contribute to the diversification of the economy to achieve gradually, in a sustainable way, the substitution of those revenues by renewable resources. Norway has developed this kind of framework with some success.

E. Policy Recommendations and Conclusions

25. In policy making a distinction between permanent and temporary shocks is necessarily blurred and does not contribute to working out pragmatic solutions. The uncertainty of price movements lends itself inevitably to a wide range of interpretations, especially if that could support delaying unpopular policy actions. What matters more, instead, is the assessment of the sustainability of the current policy stance in the aftermath of a terms of trade shock, assuming that the “post shock” price were to prevail indefinitely and would form the basis for a new price projection.

26. For Algeria, after several years of impressive results in achieving macroeconomic stability, the deterioration in the terms of trade poses a new challenge for policy formulation. The persistence of a lower oil price than projected under the 1998 budget has already triggered measures to restore budgetary revenue. However, increased capital expenditure has pushed the budget deficit to a level that could be perceived as unsustainable. Indeed, a further increase of public debt, given the already high levels, is not advisable, and recourse to monetary financing would reignite inflationary pressures. At the same time, given the current high level of foreign reserves, a progressive fiscal adjustment over a period of 2 years, coupled with a flexible exchange rate policy should help maintaining the macro stability needed to encourage domestic and foreign private investment. In this regard, the policy adopted thus far by the central bank to allow the exchange rate to adjust to the change in fundamentals seems to be appropriate.

27. However, this adverse shock has highlighted the urgent need to accelerate the reform process in all areas that could help the economy to diversify and become less vulnerable to swings in oil prices. In this regard, privatization of public enterprises could play a catalytic role in attracting foreign investors and developing a dynamic private sector (see Chapter II).

⁷The optimum rate of resources extraction would be one at which the accumulation of reproducible capital exactly offsets the decline in the stock of nonrenewable resources.

II. PRIVATIZATION IN ALGERIA: PROGRESS TO DATE AND FUTURE CHALLENGES⁸

28. The Algerian authorities are committed to privatization and to reducing state control over the economy. Progress so far has been uneven, with substantial success in the privatization and liquidation of the small local public enterprises, but little results so far regarding the actual sale and transfer of ownership of the large national-scale enterprises, although large-scale liquidations and layoffs have taken place. In the coming year, reducing the share of the public sector in the economy will continue to constitute a major pillar of the authorities' strategy to allow the emergence of a dynamic private sector, essential to revive growth.

A. Background

29. From the 1960s until the early 1990s, state-owned enterprises played a dominant role in the Algerian economy. The creation of a substantial state enterprise sector was an important component of the Algerian development strategy, and was considered the best way to attain certain objectives: to deal with externalities and natural monopolies; to serve the public interest and advance social objectives (such as the provision of some services at low prices to the population at large); and to reduce the vulnerability of the economy to external shocks. In addition, the growth of the state sector was accompanied by the development of comprehensive framework of regulations that hampered the freedom of action of the private sector.

30. As was the case in many transition economies, by the 1980s, Algerian public enterprises were incurring major losses. Most public companies were operating with obsolete technologies and antiquated management under central planning, resulting in lack of competition which, coupled with a high degree of protection, distorted resource allocation and resulted in the provision of poor-quality products and services. The state companies' losses imposed a heavy burden on public finances, fueling inflation. With state resources dwindling, both public and private investment were stifled. In fact, government dominance undermined private activity instead of supporting it.⁹ As a result, Algeria, like other countries in the Middle east and North Africa, lagged behind in growth—per capita income declined from 1985 to 1994.¹⁰ The reverse oil shock of 1986 and an overvalued exchange rate aggravated the problem and led to mounting external debt. These fragilities were exacerbated by attempts at partial liberalization in 1992-93, soon reversed, which led rapidly to even greater losses and imposed an unsustainable burden on the financial system.

⁸This chapter was prepared by Patricia Alonso-Gamo.

⁹Bisat, Amer, Mohamed A. El-Erian, Mahmoud El-Gamal, and Francesco Mongelli (1996), "Investment and Growth in the Middle East and North Africa," IMF Working Paper WP/96/24.

¹⁰Alonso-Gamo, Patricia, Annalisa Fedelino, and Sebastian Paris Horvitz (1997), "Globalization and Growth Prospects in Arab Countries," IMF Working Paper WP/97/125.

31. The new reform strategy initiated in 1994 was geared toward the creation of an open, market-oriented, private sector-led economy in Algeria, and thus the massive financial imbalances had to be tackled. The only option was to cut down on transfers, while the challenge of lower oil prices added pressure to relieve the burden on the budget by reducing subsidies and the state's extensive welfare role. As a consequence, loss-making and inefficient public enterprises had to be restructured or closed. Since 1994, major achievements have been registered on the stabilization front, partly attributable to external factors, such as high oil prices in 1996-97, but essentially to the success in moving away from years of inward-looking public sector-led development strategies, with transfers having been curtailed, subsidies phased out and the emergence of a fiscal surplus. Once macro-economic stabilization is in place, the attention must turn to structural reforms in which privatization features prominently. While higher oil prices have helped strengthen the fiscal and external accounts, Algeria's growth potential can only be lifted if the reforms initiated over last four years are followed through and complemented by second-generation structural reforms.

32. Indeed, if privatization is high on agenda, it is mainly due to the fact that Algeria needs to achieve sufficient growth to create jobs for a rapidly growing population, more than half aged under 25. The very high unemployment rate, around 28 percent, is of great concern and contributes to aggravate existing social tensions. Only private sector-led growth in the non-hydrocarbon sector can generate the required employment. Algeria will also need to compete in the global economy and meet the productivity requirements and challenges of an Association Agreement with the European Union, currently under discussion, which can only be achieved by gradually turning over production and services to the private sector and developing key sectors such as telecommunications.¹¹ Moreover, as in other MENA countries, future infrastructure requirements for Algeria are immense; if these needs are to be met, the private sector will have to shoulder a large share of the cost.¹² An acceleration of the privatization effort would contribute to attract foreign capital and the transfer of needed technology. In countries of the MENA region in which privatization has been successful (for instance, Egypt, and Morocco) its benefits have become quickly apparent, with trading in the domestic stock exchange soaring and the emergence of a domestic investors' market. Privatization has also sent the right signals to foreign investors and has been the driving force behind higher foreign investment inflows.

¹¹For instance, the development of infrastructure alone in the MENA countries would cost over US\$350 billion over the next decade. See Smith, Graham, Nemat Shafik, Pierre Guislain and James Reichert (1997), "Getting Connected, Private participation in Infrastructure in the Middle East and North Africa," World Bank.

¹²Shafik, Nemat (1997), Public Policy and Private Initiative: Towards New Partnerships in the Middle East and North Africa," paper in the conference on "Globalization and the Middle East and North Africa" organized by the Institut du Monde Arabe and the World Bank.

B. Progress to Date

33. Algeria's centrally planned approach to development left as a legacy a loss-making and large public enterprise sector—about 1300 local public enterprises (EPL) and around 400 national enterprises (EPE) that accounted for about 80 percent of value added and 75 percent of employment in the manufacturing sector in 1993. In addition, a “group of 12” companies included 10 food-importing monopolies that sold basic commodities domestically at highly subsidized prices—and thus incurred heavy foreign exchange losses following the dinar devaluations of 1994—as well as the railway (SNTF) and utilities (Sonelgaz) companies, burdened by uneconomic pricing. Public sector employment at end-1991 stood at about 2.2 million workers (52 percent of the labor force), accounting for 70 percent of industry, more than half of construction and 30 percent of services, with agriculture dominated by small private farms.

34. In the **early stages** of the transition to the market, the **authorities favored a comprehensive restructuring and rehabilitation of public enterprises**, to restore their financial viability. Prereform financial practices had resulted in the accumulation of a massive amount of nonperforming loans by the banking sector. The adjustment and liberalization process exacerbated the problem, as inefficient state enterprises, unable to withstand competition and increasing external debt-service costs, which had more than doubled owing to the dinar devaluation, saw their financial position deteriorate further.

35. To address the problem, banks were progressively recapitalized and public enterprises received large transfers from the treasury mainly through the **Rehabilitation Fund** created in 1991. During 1991–96, public enterprises received DA 110 billion (1.3 percent of 1991–96 GDP) in cash transfers through this Fund. In addition, legal and financial autonomy was progressively granted to all public enterprises, accompanied by a program of financial rehabilitation, mainly through debt forgiveness from the treasury and swaps of government bonds for nonperforming debts to commercial banks and the housing bank. Debt conversion operations amounted to DA 357 billion in 1991–96 (4 percent of 1991–96 GDP), with DA 187 billion (6.8 percent of GDP) devoted in 1997 to cleaning up the balance sheet of the food importing agencies, SNTF and Sonelgaz. These partial measures, however, did not suffice. Public enterprises continued to lose market share, industrial production declined, and low productivity impaired their ability to meet future financial obligations and make adequate use of new resources.

36. In view of the rapidly **mounting restructuring costs and poor results**, the Rehabilitation Fund was wound up in December 1996, putting an end to government bailouts.¹³ The Algerian authorities then embarked on a **new strategy** that moved away from financial transfers from the budget and was geared toward strengthening the financial sector and restoring the medium-term profitability of public enterprises, while shifting the **emphasis**

¹³Some disbursements authorized in December 1996 took place in the first quarter of 1997.

toward privatization. The process of government disengagement from productive activities called for the adoption of a comprehensive legal framework. The 1994 complementary budget law had allowed for the first time the sale of units of public enterprises, the offer of public enterprises for private management contracts, and the private participation up to 49 percent in the equity of public enterprises. The legal framework was further extended by the 1995 Privatization law, which allowed 100 percent private ownership in most public enterprises. Furthermore, in 1994 the Government approved a law removing the state's monopoly in the insurance market and amended the 1994 Investment Code to allow foreign participation in the capital of commercial banks. In addition, a 1995 law restored to original owners certain lands that had been nationalized in the aftermath of independence. After the enactment of the 1995 privatization law in April 1996, a first privatization program was launched with the support of the World Bank.

- The program focused mainly on the 1300 **local public enterprises (EPL)**. Of the 274 EPLs covered, 117 had been privatized or liquidated by end-1996. After a relatively slow start, privatization gained momentum in late 1996 with the creation of 5 regional holdings in charge of implementing the divestment operation. By April 1998, 827 EPLs had already been liquidated and 50 more are being sold. Most of these liquidations have resulted in important lay-offs. However, 464 EPLs have been sold to their employees resulting in the creation of 608 new companies, protecting 12,141 jobs. The authorities have announced that by end-1998 the privatization process of the EPLs would be almost completed, culminating in the closure of most regional holdings.
- Considerable progress has also been reached regarding the “**group of 12**”. At end-October 1996, seven of the ten **food-importing and distributing agencies** or “**offices**” launched restructuring plans, conditional on performance contracts, and the other three (ENIAL, ENAFLA, and ONAPSA) were dissolved. In 1997, ENAPAL, which was responsible for importing most foodstuffs until 1994, was dissolved as well, signaling the end of state involvement in those activities, while the 18 units of the 3 dairy agencies were converted into subsidiaries to facilitate their privatization. In addition, the three pharmaceutical companies were recapitalized, all without exceeding the ceiling of DA 143 billion earmarked for the buyback of the agencies' debts. In early 1998, the sale of the large network of 1,139 pharmacies was initiated. Moreover, consolidation of the financial situation of **Sonelgaz and the SNTF** continued with their financial rehabilitation in early 1997—mainly by the treasury's takeover of DA 45 billion of debt to commercial banks—restructuring measures, sizeable lay-offs and the quarterly adjustment of tariffs on electricity and gas, and railroad fares so as to cover their operating costs by end-1997. Since then, government financial assistance is being limited to the budgetary allocation for maintenance of the rail network and rural electrification.
- The more than 400 **large public companies (EPEs)** had been granted financial autonomy by 1996, in an attempt to create incentives to limit losses and hence the burden on the budget. At the same time, as mentioned above, substantial financial resources had been

injected to keep public industry functioning. However, little was achieved initially in terms of tackling in depth the restructuring needs or privatizing these enterprises, with the exception of the construction sector, where increasing difficulties led to very substantial labor shedding. Nonetheless, acceleration in the restructuring process was registered in late 1996, with the grouping of EPEs in 11 sectoral holdings and the introduction of the **bank-enterprise mechanism (BEM)** in September 1996. The BEM's immediate objective was to address the mounting overdrafts at high interest rates of public enterprises and then restore progressively their financial situation. After a comprehensive audit of the enterprises' accounts, the commercial banks and the 11 holdings, together with representatives from the central bank and the treasury, identified viable and nonviable production units. A plan was set up to normalize the financial relationship between economically viable enterprises and the banking system, with a large share of the overdrafts consolidated into medium-term loans at lower interest rates. The amount to be consolidated was estimated at DA 89.8 billion, equivalent to 14.1 percent of the end of March 1997 stock of total credit to the economy (excluding the 10 food importing agencies and the utilities company and the railways). At the same time, stringent programs were adopted to compel enterprises to increase their productivity and to provide them with financial autonomy. Accordingly, the plan included the establishment of more than 440 subsidiary units with competitive prospects operating under tight bank supervision by the end of 1998, as a first step toward their privatization. As a result, by end-1997, 76 EPEs had been dissolved and almost 160,000 workers had been dismissed (about 30 percent of the total number of employees at end-1996).

37. To facilitate the effective privatization of the EPEs and to address the problem posed by the relative scarcity of private domestic savings, the 1995 law was amended in April 1997 so as to introduce more flexibility in divestment procedures, opening the possibility of payment in installments, equity participation by employees, and voucher privatization. Finally, in December 1997, the government announced a list of 250 EPEs to be privatized (around 30 percent of the remaining EPEs in terms of labor and turnover). The authorities are confident that some major privatizations can take place by end-1998. As of now, the EPEs on the list of privatizable enterprises in the chemical and mechanical engineering sector are being evaluated by international consultants, in order to enhance transparency of the privatization process.

C. Issues for the Future

38. A number of issues could be examined by the authorities in order to ensure that the Algerian privatization program succeeds.

- The **organizational and incentive structure** for the implementation of the program may need to be reviewed. Currently, there are two types of privatization: partial and total. The 11 sectoral and 5 regional holdings created in 1996 are in charge of partial privatization (less than 100 percent) by various means: sales of assets to employees; stock market offerings, and joint ventures with domestic or foreign investors. The holdings are also responsible for

choosing which enterprises are to be privatized, and by which method, subject to the approval of the Conseil National de Participations de l'Etat (CNPE). Total privatizations (when 100 percent of ownership is transferred) are decided by the CNPE after a proposal by the relevant holding, and carried out by the Conseil de Privatisation. While the current structure allows substantial flexibility, there is a risk of inadequate coordination. Moreover, the experience of other countries shows that sectoral holdings can constitute an obstacle to a reduced role for the public sector in economic production as there is no motivation for the holdings to speed it up. At the moment, there is no strict time-table nor clear terms of reference that the holdings have to observe. Holdings have little incentive to privatize the profitable enterprises which provide the cash that maintains the holdings. Vested interests against privatization can thus be created and perpetuated, and it becomes very difficult for private firms to enter the sector or compete in it successfully. The problem is aggravated if, as in Algeria, privatization proceeds revert to the holdings and can be reinvested, with no incentive to wind them up.

- **The strategy and speed of the privatization program** have to be more clearly established. The authorities should forge ahead quickly with some major operations to give a clear signal of their commitment to privatization and their choice for a market economy. Even more important, a more specific calendar of implementation should be established.
- **Greater specificity regarding the methods** in each instance would be helpful. To facilitate privatization and overcome the problem of the relatively low level of domestic private savings and the difficulty in attracting foreign buyers outside the hydrocarbon sector, the authorities are exploring all possible methods, including offers to foreign partners, auctions, and also the sale of some enterprises to the general public, in particular to workers, through a system of coupons that would be freely tradable on a securities market to be created. Most countries use a combination of methods, sometimes with two or more modalities in one firm, and Algeria is not an exception. Each privatization methods has its advantages and disadvantages. The sale of a controlling interest to a private buyer is speedy and generates significant revenue in the short run. Employee buyouts contribute to create political support for privatization. However, the experience of other countries shows that while they work with small enterprises, they may actually hinder adequate governance in large ones. In any case, the transferability of the interests must be assured. Public offerings of shares on the stock exchange—either domestically or internationally—and vouchers help spread ownership, creating a broad constituency of shareholders that support privatization and are concerned with the way the private sector is regulated. Public offerings can increase the international appeal of certain firms and reinforce the message that the government is seriously committed regarding privatization. Nonetheless, the current strategy of limiting the sale of shares in the stock exchange to minority participation might not be optimal. With only minority participation, there is no real transfer of control to the private sector. In addition, the lack of depth of the stock market may distort share prices and hinder the sale of large blocks. Finally, such dispersion of ownership and control might discourage the subsequent entrance of strategic partners.

- It may also prove necessary to reexamine **sectoral priorities**. The state-dominated **banking industry** is inefficient and constitutes an obstacle to productive credit allocation and private sector development. Public commercial banks are not included in the enterprises to be privatized (although the privatization of the BDL is being explored): privatizing them should become a priority. Another important shortcoming in the Algerian privatization program is the fact that **infrastructure** is not included, while **telecommunications** have been specifically postponed until after the year 2000. In fact, the modernization process would require a major improvement in the quality of public services, including telecommunications, electricity, transportation and ports.¹⁴ The long history of failed attempts to increase the efficiency of state-owned enterprises suggests that this can only be achieved through a major participation of the private sector in these areas, especially in view of the prospective costs.¹⁵

- Divestiture programs have important **consequences for public finances**:

- First, privatization **proceeds constitute public sector revenue**, and can improve fiscal accounts in the short run, although these revenues should not be considered permanent income and thus should not be used to finance current expenditures, but rather to reduce debt.¹⁶ There is a risk otherwise to rely on privatization revenue to delay the implementation of other deficit reducing measures. Of concern in the case of Algeria is that revenue from partial privatization reverts to the holdings and not necessarily to the budget and reduction of public debt.

- When **loss-making public enterprises** that have required large and continuous injections of public funds are **sold** to the private sector, the **government is no longer responsible for their losses**. This effect can be very significant. In addition, to the extent that privatized companies become profitable and pay taxes, divestiture will also impact public finances in the long run. On the other hand, when a profitable firm is privatized, the public sector ceases to receive these funds with a negative effect on public finances. On aggregate, the available evidence for a number of countries supports the view that privatization has a positive fiscal impact.¹⁷ In broader terms, reducing the size of the public sector also heralds the reduction in the scope for rents, monopoly profits or directed credit, enhancing the opportunities for private sector growth and efficient credit allocation.

¹⁴Saghir, Jamal (May 1997), "Infrastructure Privatization in the Middle East and North Africa," paper for forthcoming book on "Reforming State-Owned Enterprises: Policy and Performance in the MENA Region," prepared by Economic Research Forum (Macmillan).

¹⁵In a scenario of 6 percent annual growth, infrastructure needs for Algeria over the next decade have been estimated at US\$12 billion in power generation; US\$12 billion in transport; US\$5 billion in telecommunication; and US\$5.5 billion in water and sanitation (Smith et al.).

¹⁶See Mackenzie, George A. (1997), "The Macroeconomic Impact of Privatization," IMF Papers on Policy Analysis and Assessments PPAA/97/9.

¹⁷Edwards, Sebastian (1996), "Public Sector Deficits and Macroeconomic Stability in Developing Economies," NBER Working Paper 5407 (Cambridge, Massachusetts).

- Another issue is **whether the government should restructure loss-making enterprises** financially and technologically before they are sold, or whether the task should be left to the new owners. Restructuring by the government enables it to sell the firm at a higher price, but is expensive (new equipment, severance payments), as illustrated by the Algerian case, where massive amounts of funds were poured into the ailing state sector for a number of years with few efficiency gains and a continuing decline in industrial production. Governments do not necessarily have a comparative advantage in restructuring inefficient firms. As for the layoffs, although they are unavoidable, to the cost of severance payments should be added the costs for the social security system of early retirements and increased outlays for unemployment insurance.

- A related question is the **sale price** of public enterprises. In general, firms suffer from excess labor and ongoing losses, so they are usually sold at a low price. Should the authorities strive to get the maximum price—which may be more difficult in Algeria since security considerations may discourage potential investors—or should they aim to divest as quickly as possible? Should monopolies be broken up before offering them to the private sector? Such a break-up promotes competition but results in a lower sale price. In any event, a credible regulatory framework to protect competition is essential.

- The **social dimension** of privatization must also be considered. In centrally-planned economies, the government was viewed as a provider of employment and the distributor of the country's wealth through large subsidies: privatization requires a radical change of mindset and in the nature of governance. The elimination of subsidies can worsen poverty and must be accompanied by a well-targeted and efficient safety net. And, while privatization will generate sustainable growth and employment in the long run, the reduction in public sector employment that usually accompanies privatization may lead to higher unemployment (already an acute problem in Algeria) in the short run, heightening social tensions. Moreover, higher unemployment would also add to the grave financial problems of the Algerian social security system.

- Privatization must be accompanied by a **facilitating environment**, a new regulatory framework to deal with private sector involvement in areas traditionally reserved to the government.¹⁸ A related priority is the creation of an institutional and legal framework to safeguard property rights, to encourage domestic and foreign private investment. As a step in this direction, in 1998 the authorities have submitted to the new parliament a draft law establishing the procedures for granting full title to previously public agricultural land; legislative approval would motivate farmers to make the necessary investments to develop their land, and facilitate their access to bank loans.

¹⁸Page, John, Joe Saba, and Nemat Shafik (1997), "From Player to Referee: The Changing Role of Competition Policies and Regulation in the Middle East and North Africa," paper presented at a seminar on "The Role of the State in a Changing Arab Economic Environment" sponsored by the Arab Monetary Fund and the Arab Fund for Economic and Social Development, Kuwait, March 4–5, 1997.

III. TRADE AND INVESTMENT POLICIES AND EXPORT PERFORMANCE¹⁹

39. *This chapter briefly describes Algeria's external trade and investment policies, and assesses their degree of openness. Algeria has few nontariff barriers left and its service sector is relatively open to foreign participation. However, tariff protection remains high by international standards, and investment incentives are biased in favor of oil-related activities. These policies tend to distort incentives against the development of nonhydrocarbon exports and may help explain the limited progress on export diversification. To take advantage of opportunities offered by globalization and help attract foreign capital Algeria should lower import tariff protection, liberalize further the service sector and make investment incentives more uniform. This is particularly important to ensure that new investments, including in the context of privatization of public enterprises, takes place in internationally competitive activities.*

A. Export Performance: Nonhydrocarbon Exports Have Not Yet Taken off

40. **Despite a number of years of economic reform and adjustment, nonhydrocarbon exports have remained a small share of total exports (less than 5 percent).** Although Algeria's exports of nonhydrocarbons have nearly tripled since 1991, they remain a small share of total exports. Moreover, they are dominated by metals and minerals (Table 1) that seem to require little or no processing. In recent years exports of a number of other resource-based products have increased rapidly. For example, exports of certain food products (beverages, fish, fruits and nuts) and hides have increased over ten-fold since 1991 accounting for 20 percent and 4 percent respectively of total nonhydrocarbon exports in 1996. The most important export market for these exports was the EU, that absorbed mainly inorganic chemicals and fruits. The main nonhydrocarbon exports to Tunisia and Morocco were iron and steel, hides and beverages. But despite some signs of growth in exports of selected products the overall level of nonhydrocarbon exports from Algeria remains low in per capita terms Algeria exported US\$23 in 1996 compared to US\$500–US\$2,000 in many transition countries.

41. **Algeria's poor export performance outside the hydrocarbon sector is likely to be related, at least to some extent, to its overall policy framework.** Market access is not a major issue as all industrial and many agricultural products enjoy free access to Algeria's main export market, the EU. In terms of the policy framework Algeria has established a good record of macroeconomic stability, but progress with structural reforms has been slower. Of particular importance to export development are private sector incentives and external trade

¹⁹This chapter was prepared by Piritta Sorsa.

policies. Several empirical studies have confirmed the positive links between openness, export development and growth.²⁰ The openness of Algeria's trade policies is discussed below.

Table 1. Algeria: Main Nonhydrocarbon Exports, 1996

HS ^{1/}		Percent of total nonhydrocarbon exports
28	Inorganic Chemicals	12
08	<i>Edible fruits and nuts</i>	12
29	Organic Chemicals	10
25	Salt	8
79	Zinc	8
99	Miscellaneous	8
72	Iron and steel	7
22	<i>Beverages</i>	6
41	<i>Raw hides and skins</i>	4
74	Copper	4
84	Nuclear reactions	3
73	Articles of iron and steel	2
03	<i>Fish</i>	2
	Total	86

Source: Comtrade

^{1/} HS: Harmonized System.

B. Summary of Algeria's Trade Regime in Goods—High Average Tariffs and Low Nontariff Barriers

42. The pace of lowering tariff protection in Algeria has slowed down. Between 1994 and early 1997 the maximum tariff was lowered from 60 percent to 45 percent. The unweighted average tariff at present is 22.4 percent with 4 non-zero bands (3, 15, 25, 45) compared to 24.4 percent in 1996. In addition, there is a 2 percent customs fee and a 0.4 percent additional customs fee on all imports bringing the total average of customs duties to 24.8 percent. In 1998 the weighted average of customs duties was about 17 percent, and revenue collection from customs duties was about 14 percent of the value of imports in 1996. The latter

²⁰See Balassa, B (1971), "The Structure of Protection in Developing Countries" (Baltimore: Johns Hopkins Press) or Sachs, J. and Warner, A. (1995), "Economic Reform and the Process of Global Integration," Brookings Papers on Economic Activity: Vol. 1 (April), pp.1-118.

measures indicate high dispersion of rates leading to important differences in incentives between sectors.

43. **Algeria's tariffs are high by international standards and likely to work against the development nonhydrocarbon exports.** Chart 2 and Table 3 compare the export and growth performance and the level of protection in selected transition and developing countries with proximity to Europe. The table shows that Algeria's protection levels are in line with its North African neighbors, but well above those in many other countries (e.g., Eastern Europe) who are likely to compete with Algeria in access to the EU market. Chart 2 also shows that exports and GDP have grown much faster in the more open East European countries than in the more closed North African ones. Protection and the implied economic rents tend to create an anti-export bias by overvaluing the exchange rate and attracting resources to import-competing activities, making exporting less attractive.²¹ While many factors influence countries' export and growth performance, several studies (cited above) have underlined the importance of openness for export development. Lower tariff protection would help Algeria to reduce the anti-export bias and enable it to take better advantage of its close access to the European markets and of its potential in exporting sun- and labor-intensive products.

Table 2. Algeria: Summary Indicators of Tariff Protection and Duty Collection in Algeria

Sector	No. of tariff lines	Average tariff (percent) (1998)	Actual duty collection as percent of potential (1996)	Share in total imports (percent) (1996)
Food	702	33	77	29
Energy	93	2	64	1
Raw materials	449	10	97	6
Semi-finished products	2,028	15	68	20
Capital goods	1,247	15	48	33
Consumer goods	1,684	36	84	11
Total	6,203	22	66	100

Source: Algerian authorities.

²¹For a definition of an anti-export bias see Thomas, V. Nash, J. and others (1991), "Best Practices in Trade Policy Reform" (New York: Oxford University Press).

Chart 2. Growth in Exports vs Growth in GDP, Average, 1993-97
(In U.S. dollars)

Source: IMF World Economic Outlook (WEO)

■ Growth in Exports ■ Growth in GDP

44. **The structure of nominal tariff protection in Algeria is uneven between sectors.** Nominal protection was highest on consumer and food products, many of which are taxed at the maximum rate of 45 percent (Table 2). The cost of the protection is thus mainly borne by Algerian consumers in higher prices for their daily consumption baskets. Main beneficiaries are enterprises producing these goods, which until recently have been mostly state-owned. Average statutory protection on most inputs and capital goods is relatively high at 15 percent. The high protection of consumer goods help explain their relatively low share in total imports (11 percent).

Table 3. Algeria: Average Tariffs in Selected North African and East European Countries

Country	Simple Average Tariff (1998 or latest)	For reference: Index of trade restrictiveness 1/
North Africa		
Algeria	24	7
Egypt	26	8
Morocco	26	8
Tunisia	25	8
Eastern Europe		
Czech republic	7	1
Estonia	0	1
Hungary	14	5
Latvia	12	2
Lithuania	8	1
Poland	12	2

Source: Staff estimates.

1/ For the methodology see Sharer, R. And others (1997), "Trade Liberalization in IMF-Supported Programs," World Economic and Financial Surveys (Washington: International Monetary Fund).

45. **Effective protection rates (ERPs) also indicate a high dispersion in protection levels and the existence of an anti-export bias especially in labor-intensive goods.** In 1996 ERPs were estimated to range between 20-110 percent²² among main sectors of the

²²Based on a World Bank study reflecting 1996 tariffs, which had seven bands (0, 3, 7, 15, 25, 40, 60). Effective protection measures protection given to the value-added in an economic activity. It is the

(continued...)

economy, with the highest rates in food products (110 percent), and textiles and clothing (60 percent). Especially the latter sector tends to be labor-intensive, and in many developing countries has been the basis of export success. While some of the highest nominal rates have been reduced since the study was undertaken, the high dispersion of incentives between sectors remains. More importantly, the numbers indicate that effective protection is high in labor-intensive sectors, textiles and many food products, in which Algeria may potentially have a comparative advantage in exports. Development of labor-intensive exports can be an important source of employment creation to solve Algeria's chronic unemployment problem.

46. Dispersion of protection in Algeria is increased and its transparency reduced by duty exemptions. About a third of imports paid lower than statutory duties (Table 2), which amounted to a loss of customs revenue of about DA 253 billion per year or 5 percent of imports and 1 percent of GDP (in 1996). As Algeria has no major free trade agreements on imports that could explain lower collection rates of customs duties and the export duty draw back system has not been used, low collection rates mainly reflect duty exemptions or reductions.²³ Table 2 indicates that most exemptions concern capital goods, for which collection rates are about 50 percent, but also that many food and consumer goods imports enter at reduced duties. Duty reductions on inputs further increase the effective protection enjoyed by the final products resulting in increased levels of protection for final goods and dispersion of incentives between sectors. A streamlining of these exemptions would increase revenue collection and make effective protection more uniform between sectors.

47. While most nontariff barriers have been removed, some remain on a limited number of imports and exports.²⁴ Three export products (dates, tomato concentrate and hides) are subject to minimum export prices to discourage capital flight, control the marketing system, and preserve the products' international reputation in the case of dates. In practice, the minimum prices are likely to work against developing exports by raising their price, and will not prevent capital flight as the products covered represent less than one percent of total exports. The impact on capital flight of minimum prices on a handful of products is questionable; and are unlikely to lead to quality improvements. About 200 items are subject to

²²(...continued)

percentage of domestic value-added at tariff inclusive prices compared to value-added at international prices.

²³About 100 items at 6-digit level are exempt from customs duties (cereals as seed, oil products for certain projects, military equipment, air and sea transport equipment, medical equipment art). In addition the Investment Code provides customs duty rebates—all inputs to projects approved under the Investment Code enter at a 3 percent duty. Oil sector imports enter duty free.

²⁴Exports of 10 8-digit HS items (national treasures, palm-tree seedlings, live bovine and ovine breeding animals, raw and semi-finished coral) are banned for reasons of protection of animal and plant life and national treasures. Certain imports such as firearms, books, tobacco, medicinal products, certain animal and plant products require prior authorization (cultural and health reasons).

mandatory import reference prices accounting for about 10 percent of imports, to prevent under invoicing. By raising the basis for duty collection the reference prices increase protection, and penalize properly invoiced imports. Removal of the remaining nontariff measures and adoption of more appropriate means of customs valuation of imports would help increase transparency of border protection and modernize Algeria's trade policies.

C. Services Barriers: Further Liberalization Would Improve Competitiveness of Exports

48. **While access to many services is open to foreign service providers and benefits from national treatment, many key services in Algeria remain subject to restrictions.** As services are an increasing share of national income in many countries and an important input in exports or in producing goods in a globalizing world economy, efficient provision of services at competitive prices is becoming increasingly important.²⁵ In Algeria most service sectors, including financial services, are relatively open to establishment (ability of foreigners to start operations in Algeria) or to limited provision of services across borders (ability of Algerian residents to purchase services abroad). However, four important service sectors have restrictions or bans to entry (state monopolies in communications and transport, mandatory local partnerships²⁶ in hydrocarbon-related services), or have other restrictions such as nationality requirements (some insurance services, tourism), see Table 4 for details. The restrictions are likely to raise the price and reduce the potential quality and variety of the products offered.

49. **To improve efficiency and competitiveness of exports Algeria would gain from opening more service sectors to foreign (and local) competition.** Transport and telecommunications are important inputs to exports and their availability at competitive price and quality is important in developing competitive export industries. Once the security situation stabilizes Algeria is likely to have a comparative advantage in tourism services as well, and removal of present nationality requirements would promote foreign presence in the sector and related transfer of know-how and capital in this sector.

D. Investment Incentives—Potential Bias in Favor of Oil-Related Activities

50. **Investors benefit from national treatment, and special fiscal incentives are given to projects under the Investment Code and in the hydrocarbon sector.** In principle, national treatment is granted for all investments—foreign and local investors are subject to equal treatment. The Investment Code offers both time-limited and permanent incentives for

²⁵See Jones, R. and Kierzkowski, H. (1990), "The Role of Services in Production and International Trade: A Theoretical Framework," in Jones, R. And Krueger, A. *The Political Economy of International Trade* (Cambridge: Basil Blackwell).

²⁶To engage in activities like exploration, and research foreigners are required to conclude a contract with the national monopoly in hydrocarbon related services, or with a national company in mining services.

Table 4. Algeria: Summary of Main Barriers in Trade in Services

Sector ¹	Conditions of market entry
1. Business services	<p>In most sub-sectors no restrictions.</p> <p><i>Hydrocarbon exploitation, prospecting and exploration.</i> Purchase of services from foreign service companies located abroad is subject to a contract with Sonatrach (state monopoly). Establishment in Algeria subject to a 49- percent equity limit, a contract with Sonatrach, and that its representative chairs the board.</p> <p><i>Research and extraction of minerals.</i> Establishment in Algeria subject to partnership with a national company within a joint venture or joint stock company.</p> <p><i>Energy distribution services.</i> Establishment in Algeria subject to authorization.</p>
2. Communication services	<p>Regular <i>postal services</i> subject to state monopoly - no foreign access allowed.</p> <p><i>International courier services</i> open to foreign establishment and cross border provision.</p> <p><i>Telecommunication services</i> (voice, mobile) is a state monopoly. No foreign access allowed. Value-added services open to foreign providers.</p>
3. Construction services	No major restrictions
4. Distribution services	No major restrictions
5. Educational services	No major restrictions
6. Environmental services	No major restrictions
7. Financial services	<p>In <i>banking and securities</i> no restrictions to open subsidiaries, branches and representative offices, but establishment of subsidiaries subject reciprocity requirements. Purchase of banking services from abroad by Algerian residents is allowed only in foreign financing, documentary transactions, guarantees, and cash management transactions of commercial banks.</p> <p>In <i>insurance</i> no restrictions to establishment, but certain insurance sub-sectors (intermediaries, loss adjusters) subject to nationality requirements.</p>
8. Health-related services	No major restrictions
9. Tourism	<p>In principle open.</p> <p><i>Travel agencies and tourist guides</i> subject to nationality requirements.</p>
10. Recreational services	No major restrictions
11. Transport services	<p>No restrictions in road transport.</p> <p>Maritime, air and rail transport are a state monopoly - concessions are given to state enterprises. In maritime transport bilateral agreements with certain countries limit competition.</p> <p>Port services (lighterage and cargo handling in ports, chartering of vessels, pushing and towing) are a state monopoly with no local or foreign access allowed.</p>

Source: WTO.

¹The classification follows that used in international statistics and in the WTO GATS negotiations.

new enterprises, that vary according to different economic zones in the country.²⁷ Some tax reductions or exemptions can be granted for up to 10 years, and special advantages can be negotiated for large projects of “national interest”. In addition, the enterprises benefit from permanent advantages such as exonerations from certain taxes conditional on exporting (profit taxes, contractual taxes, and taxes on industrial activity) or lower social security payments. Special fiscal incentives apply to hydrocarbon exploration (exemption from import duties, VAT and other fiscal advantages) and duty-free zones (no customs duties, rebates on other taxes if over 80 percent of production is exported). There are no estimates of potential fiscal losses from the benefits, but so far most projects have been quite small,²⁸ and foreign participation has been limited. Incentives for investments in hydrocarbon-related activities are under a separate regime. Although it is hard to calculate the exact importance of the fiscal benefits granted, the full exemption from customs duties and the VAT, in addition to other fiscal advantages, suggests that investment incentives for this sector are quite generous.

51. The incentives seem biased in favor of hydrocarbon-related activities. While most of the investment incentives in the Investment Code are time-bound and relatively neutral from an allocational point of view, the apparently more favorable treatment of hydrocarbon-related investments seem to introduce a bias in incentives against other sectors. This would go against the government’s goal of diversifying the economy and exports. More generally, experience with fiscal incentives in attracting investment in other countries has at most been mixed. They can have high costs in terms of fiscal revenue losses, administrative burden in management and follow-up, and in rent-seeking. Their success in attracting marginal investments can be limited. Many investors underline the importance of stable policy frameworks, generally low tax levels, quality of the labor force and good infrastructure in attracting investments. Furthermore, export development is better achieved by reducing the anti-export bias from high tariff protection than by granting fiscal incentives²⁹ for exports. To make investment incentives more neutral Algeria should at the minimum remove the bias in incentives in favor of the oil-sector by removing the exemptions to customs duties and other taxes.

²⁷The main benefits on establishment are reduction in customs duties to 3 percent on inputs, exemption of real estate transfer tax, reduced incorporation fee, exemption from VAT on inputs, and lower profit taxes during 3 years.

²⁸According to the authorities (Agence de Promotion des Investissements-APSI) over 2,000 projects were approved in 1996 with an average size of US\$1.4 million. The positive trend continued in 1997, when about 1,900 projects were approved during the first half of the year. Foreign investors participated in a small number of projects (49 in 1996), and the average investment per project was quite small (US\$5.7 million).

²⁹Under the Investment Code exporters benefit from lower profit taxes in relation to their exports. A special export promotion fund (financed by the proceeds of a tax of imports and local production) provides subsidies (50 percent of cost) for information gathering and to facilitate transport from Algerian ports. So far these export subsidies have been approved for participation in international fairs only.

E. Regional and Other Trade Arrangements—Potential for Trade Diversion

52. Given Algeria's high protection level most of the presently signed free trade agreements are likely to involve significant trade diversion. Algeria has signed a number of trade agreements with mostly neighboring countries³⁰ liberalizing mutual trade in selected products. However, most of these are not yet functional pending ratification by trading partners. The potentially most important one is the Arab Maghreb Union (AMU) agreement that follows earlier bilateral agreements and aims at the establishment in stages (free trade area, customs union, economic union) of an economic union between Algeria, Libya, Mauritania, Morocco and Tunisia. However, given the similarity of production, modest income levels and high levels of protection in these countries (Table 3) free trade agreements among them are likely to lead to significant trade diversion. In practice, despite preferential access trade flows between, for example, Algeria and Morocco (0.7 percent of Algeria's total exports in 1997) and Tunisia (0.7 percent of Algeria's total exports in 1997) have been low and declining. Potential for trade diversion would be reduced by lowering the external tariff in Algeria on most-favored-nation (MFN) basis.

53. Negotiations are ongoing on a Association Agreement with the EU. At present Algerian trade relations with the EU are governed by a Cooperation Agreement from 1976, which grants Algeria free access to the EU on industrial products, although certain products are subject to annual ceilings. In agricultural products, Algeria benefits from 20–100 percent reduction of customs duties on given products. The future association agreement aims for a mutual free trade agreement in most products between the two parties. While this would increase competition in Algeria, help lock in reforms and potentially attract foreign investment (FDI), benefits from it for Algeria would be enhanced if external protection levels would be lowered on a MFN basis. This would avoid trade diversion in highly protected products and the transfer of rents from lost customs revenue to EU exporters. At present 63 percent of imports and exports are with the EU.

F. The WTO Accession Process—No Hindrance to Unilateral Lowering of Protection

54. Algeria is at an early stage of its accession to the WTO and should pursue it vigorously. Algeria applied for accession to the GATT/WTO already in 1987, but the working party did not become active until 1996. It has met once in 1998 and the process is likely to take some years to complete. Subsequent meetings will continue to examine Algeria's trade regime and eventually negotiations will start on Algeria's commitments to bind its tariffs in goods and opening of services sectors. The average duration of existing WTO accession working parties is 4.5 years, with several of them having lasted for over 5 years (Table 5). Given that the working parties only meet once or twice a year and that accession generally has

³⁰Various trade agreements or conventions have been concluded with Morocco (1973), Mali (1996), Senegal (1981), Mauritania (1996), Niger (1976), Tunisia (1981), Libya (1987), Syria, Egypt, Iraq, and Jordan (1997).

required a minimum of 5-6 meetings, Algeria's accession is likely to take at least another 3-5 years to complete.

55. The ongoing WTO accession process should not prevent further unilateral liberalization by Algeria. First, WTO accession deals with binding of protection and not with liberalization of applied tariff rates. Many developing countries have WTO bindings that far exceed applied rates. Thus negotiations on WTO bindings pose no conflict with unilateral liberalization of applied rates. Second, given the average duration of accession working parties of nearly five years, Algeria would lose substantially economically by waiting to reduce protection until the WTO accession is completed. Lowering of protection now is important to give proper incentives for restructuring of existing enterprises and to new investments.

Table 5. Algeria: Average Duration of WTO Accession, June 1998

	Years in accession						Average
	1	2	3	4	5	>5	
Number of countries	1	4	4	7	8	5	4.5
Average number of meetings of the working party per country	0	2	1	1.6	3.9	several	

Source: WTO documents.

G. Summary—The Policy Agenda

56. To reduce the anti-export bias and increase transparency of protection Algeria should lower its tariffs substantially, reduce duty exemptions and remove the remaining few NTBs. First, lowering of protection at this stage of development in Algeria is especially important to give proper signals to the ongoing restructuring and privatization of public enterprises, and to new investments. Second, continued high protection will create vested interests in the maintenance of protection making it more difficult to lower tariffs later. Third, lower protection now is essential for export development by changing incentives from import substitution to export production. Waiting to do so in the context of WTO accession or negotiation of EA Association agreement, which are likely to take some years to complete, would result in a missed opportunity to generate sustainable growth. A pre-announced strategy of lowering expeditiously maximum tariffs in stages to 15 percent on an MFN basis coupled with the elimination of the reference-price system in imports and exports in 1999 would substantially shift the bias in incentives against exporting. Reducing the existing tariff exemptions would help mitigate losses in customs revenue from lowering of tariffs.

57. Algeria should unify investment incentives for all sectors to reduce potential bias against nontraditional exports. This would apart from equalizing incentives between sectors help meet the fiscal cost of lowering tariff protection.

58. Liberalization of many services transactions would also improve competitiveness of exports and develop service industries. As services are inputs to many export activities their availability at competitive prices is important for export development. Service exports as such also have their own growth potential.

Table 1. Algeria: Supply and Use of Resources
at Current Prices, 1993–97

	1993	1994	1995	1996	1997
(In billions of dinars)					
Gross domestic product	1,161.7	1,471.4	1,966.5	2,494.9	2,716.40
Resource gap	-15.8	-69.2	-72.9	160.6	239.3
Exports of goods and nonfactor services	254.0	349.4	539.8	770.7	847.2
Imports of goods and nonfactor services	269.8	418.6	612.7	610.1	607.9
Gross domestic spending	1,177.6	1,540.3	2,039.4	2,334.3	2477.1
Consumption	838.4	1,072.7	1,407.1	1,673.2	1778.1
Government	202.0	247.1	309.7	356.4	391.4
Nongovernment	636.4	825.6	1,097.4	1,316.8	1386.7
Gross investment	339.2	467.6	632.3	661.1	699.0
Gross fixed capital formation	314.9	426.2	580.0	688.1	733.0
Change in stocks	24.3	41.7	52.4	-27.0	-34.0
Gross domestic savings	323.4	398.7	559.5	821.6	938.3
Net factor income from abroad	-41.2	-60.3	-104.2	-129.1	-135.0
Net current transfers	26.8	49.1	53.3	48.1	72.7
National savings	309.0	387.5	508.6	740.7	876.0
Gross national product	1,120.5	1,411.1	1,862.3	2,365.7	2581.4
(In percent of GDP)					
Gross domestic product	100	100	100	100	100
Resource gap	-1.4	-4.7	-3.7	6.4	8.8
Exports of goods and nonfactor services	21.9	23.7	27.4	30.9	31.2
Imports of goods and nonfactor services	23.2	28.4	31.2	24.5	22.4
Gross domestic spending	101.4	104.7	103.7	93.6	91.2
Consumption	72.2	72.9	71.6	67.1	65.5
Government	17.4	16.8	15.7	14.3	14.4
Nongovernment	54.8	56.1	55.8	52.8	51.0
Gross investment	29.2	31.8	32.2	26.5	25.7
Gross fixed capital formation	27.1	29.0	29.5	27.6	27.0
Change in stocks	2.1	2.8	2.7	-1.1	-1.3
Gross domestic savings	27.8	27.1	28.5	32.9	34.5
Net factor income from abroad	-3.5	-4.1	-5.3	-5.2	-5.0
Net current transfers	2.3	3.3	2.7	1.9	2.7
National savings	26.6	26.3	25.9	29.7	32.2
Gross national product	96.5	95.9	94.7	94.8	95.0

Source: Algerian authorities.

Table 2. Algeria: Sectoral Distribution of GDP
at Current Prices, 1993–97

	1993	1994	1995	1996	1997
(In billions of dinars)					
Hydrocarbons	250.1	334.2	503.4	727.7	818.5
Other sectors	785.9	1,018.1	1,282.6	1,554.8	1,677.3
Agriculture	126.4	140.5	190.0	271.9	254.9
Industry	140.9	169.2	208.1	230.5	244.6
Construction and public works	133.2	166.9	200.7	240.6	269.6
Nongovernment services	266.9	354.5	453.4	550.9	621.5
Government services	158.0	187.0	230.3	260.9	286.7
Imports taxes and duties	86.3	122.4	180.6	212.3	228.1
Gross domestic product	1,161.8	1,474.7	1,966.5	2,494.8	2,716.4
(In percent of GDP)					
Hydrocarbons	21.5	22.7	25.6	29.2	30.1
Other sectors	67.6	69.0	65.2	62.3	61.7
<i>Of which:</i>					
Agriculture	10.9	9.5	9.7	10.9	9.4
Industry	12.1	11.5	10.6	9.2	9.0
Government services	13.6	12.7	11.7	10.5	10.6
(Annual percentage change)					
Hydrocarbons	7.2	33.6	50.6	44.6	12.5
Other sectors	34.2	29.5	26.0	21.2	7.9
<i>Of which:</i>					
Agriculture	47.0	11.2	35.2	43.1	-6.3
Industry	33.2	20.1	23.0	10.8	6.1
Government services	33.9	18.4	23.2	13.3	10.0
Gross domestic product	23.9	26.9	33.3	26.9	8.9

Source: Algerian authorities.

Table 3. Algeria: Sectoral Distribution of Real GDP Growth, 1993–97

	(In percent)				
	1993	1994	1995	1996	1997
Hydrocarbons	-0.8	-2.5	4.4	6.3	6.0
Other sectors					
Agriculture	-3.7	-11.1	15.0	21.3	-13.6
Mining	-11.7	-3.3	-1.6	-4.6	-8.4
Energy (nonhydroelectric) and water	6.4	2.9	-0.5	4.5	3.9
Public industry	-2.2	-7.5	-1.7	-13.4	-7.2
Food processing	3.6	-3.6	-7.7	-4.5	-2.2
Steel, mechanical and electrical construction	-0.5	-16.5	9.2	-21.6	-18.0
Chemical industry	3.3	17.7	-8.5	-13.0	5.2
Textiles	-13.6	-12.2	-11.4	-27.1	-7.9
Leather products	-15.4	2.0	-20.4	-31.2	-19.1
Building materials	-6.5	-10.6	4.2	4.6	-5.3
Wood and paper	11.2	-12.2	-10.4	-19.3	-2.5
Other	-37.1	34.5	-23.8	-45.2	-17.9
Private industry	-1.3	0.1	0.4	0.0	5.0
Construction and public works	-4.0	0.9	2.7	4.5	2.5
Nongovernment services	-3.7	1.7	3.3	3.0	3.5
Government services	3.0	3.5	3.5	3.0	3.0
Import taxes and duties	-6.2	3.0	1.0	-4.5	0.5
Gross domestic product	-2.1	-0.9	3.8	3.8	1.3
Gross domestic absorption	-3.5	1.0	2.7	-2.8	-1.2
Consumption	-1.9	0.3	2.8	2.0	-0.9
Government	2.3	4.0	4.1	2.0	2.0
Nongovernment	-2.0	0.2	2.6	2.0	-1.1
Gross investment	-8.4	2.0	2.6	3.5	0.0
Exports of goods and nonfactor services	-1.9	-3.4	6.3	7.1	6.8
Imports of goods and nonfactor services	-6.7	6.1	2.0	-13.3	0.4
Memorandum item:					
Real per capita GDP	-4.4	-3.1	1.8	2.0	-0.4

Source: Algerian authorities.

Table 4. Algeria: Production, Exports, and Consumption of
Petroleum Products, 1993-97

(In millions of tons)

	1993	1994	1995	1996	1997
Crude petroleum and substitutes					
Production	57.1	56.3	55.8	59.7	60.8
Crude petroleum and substitutes	34.7	35.7	35.4	37.5	37.7
Condensate 1/	17.4	15.7	16.5	16.9	16.7
Liquefied Petroleum Gas (LPG)	5.0	4.9	4.9	5.3	6.5
Imports	0.4	0.3	0.3	0.3	0.3
Refinery input	20.7	20.4	20.7	19.8	21.1
Direct exports	34.6	34.6	34.8	38.6	38.4
Crude	14.3	15.5	15.7	18.3	17.4
Condensate	16.8	15.7	15.7	16.3	16.0
Liquefied Petroleum Gas (LPG)	3.5	3.5	3.5	3.9	5.1
LPG consumption	1.6	1.4	1.4	1.4	1.4
Discrepancy 2/	0.1	-0.2	-0.7	-0.3	-0.5
Refined products					
Production	19.9	19.3	19.9	18.9	20.1
Exports	13.1	13.0	13.3	12.6	14.4
Domestic consumption	6.8	7.4	7.6	7.4	7.2
Discrepancy 2/	0.0	-1.1	-0.9	-1.2	-1.5
Memorandum item:					
Total exports	47.7	47.6	48.1	51.2	52.8

Source: Algerian authorities.

1/ By-product of gas production.

2/ Reflects change in inventories and errors of measurement.

Table 5. Algeria: Production, Exports, and Consumption
of Gas Products, 1993–97

	1993	1994	1995	1996	1997
(In billions of cubic meters)					
Gross production	133.2	131.7	137.7	145.1	149.4
Input into oil production	67.2	70.3	67.3	71.8	67.0
Net production 1/	66.0	61.4	70.4	73.4	82.4
Volume transported 2/	52.8	50.0	55.2	58.7	68.1
Domestic consumption	10.4	10.6	10.9	10.0	10.1
Sales to liquefaction plants	27.0	25.5	24.9	27.5	33.8
LNG production	19.5	18.0	17.7	19.8	24.3
<i>Of which:</i>					
LNG exports	19.5	18.0	17.7	19.8	24.2
Exports by pipeline	14.9	13.6	19.7	21.2	24.2
Discrepancy 3/	0.5	0.3	-0.3	0.0	0.0
(Annual percentage change)					
Gross production	3.8	-1.1	4.6	5.4	4.9
Input into oil production	7.0	4.6	-4.2	6.6	-5.6
Net production 1/	0.8	-7.0	14.6	4.2	15.5
Volume transported 2/	-1.1	-5.3	10.3	6.4	16.1
Domestic consumption	-4.6	1.9	2.8	0.6	1.1
Sales to liquefaction plants	1.5	-5.6	-2.5	10.6	22.9
LNG production	-0.5	-7.7	-1.7	10.3	22.9
<i>Of which:</i>					
LNG exports	-0.5	-7.7	-1.7	11.6	22.2
Exports by pipeline	-6.3	-8.7	44.9	7.5	14.3
(In billions of cubic meters)					
Memorandum item:					
Total exports	34.4	31.6	37.4	41.0	48.4

Source: Algerian authorities.

1/ Net of gas reinjected into producing oil wells.

2/ Equal to net production minus gas flared, gas used for lifting and for fuel gas, and other losses in the fields.

3/ Reflects errors in measurement.

Table 6. Algeria: Domestic Prices of Major Energy Products, 1993-97

(In dinars per liter; unless otherwise indicated)

	1993	1994	1995	1996	1997
Butane (13 kg/bottle)	30.0	60.0	70.0	120.0	157.0
Propane (13 kg/bottle)	60.0	160.0	170.0	240.0	278.0
LPG fuel (m3)	1.6	1.4	1.7	3.1	4.3
Super gasoline	6.5	11.0	14.5	17.0	20.5
Regular gasoline	6.0	8.2	12.5	15.0	18.4
Jet fuel	3.6	...	...	...	...
Gas oil	3.0	6.5	7.5	9.5	11.5
Fuel oil (light)	2.0	6.5	6.5	8.5	9.9
Fuel oil (heavy)	2.0	6.5	6.5	8.5	9.9

Source: Algerian authorities.

Table 7. Algeria: Land Use Patterns, 1993–97

(In thousands of hectare)

	1993	1994	1995	1996	1997
Cereals	2,159.0	1,286.0	2,479.0	3,663.0	1,153.3
Durum wheat	972.7	684.0	1,176.0	1,585.5	590.9
Bread wheat	282.8	209.0	505.0	693.0	234.3
Barley	852.6	361.0	824.0	1,282.5	264.9
Other	50.9	32.0	74.0	102.0	25.2
Pulses	1,009.0	111.2	106.0	90.2	80.0
Fodder crops	465.0	495.0	484.7	480.4	485.9
Industrial crops 1/	43.9	36.0	39.0	36.0	38.4
Vegetables 2/	296.1	279.1	293.0	291.0	267.0
Grapes	80.0	79.0	56.5	56.0	51.9
Fruit trees	450.0	450.2	416.2	427.1	451.7
Natural prairies	33.0	37.0	40.0	40.4	42.3
Others	4,553.0	5,269.5	4,054.0	2,997.0	5,669.2
Total cultivated land	8,098.0	8,043.0	8,069.2	8,081.0	8,201.7
Fallow	4,691.0	5,282.0	4,037.6	2,967.3	3,415.6

Source: Algerian authorities.

1/ Industrial tomatoes and tobacco.

2/ Potatoes, tomatoes, garlic and onions, and watermelons.

Table 8. Algeria: Crop Yields, 1993-97

(In kilogram per hectare)

	1993	1994	1995	1996	1997
Cereals					
Hard wheat	818	822	995	1,283	771
Soft wheat	780	725	649	1,368	879
Barley	625	648	708	1,404	721
Potatoes	11,112	9,508	12,039	13,463	14,104
Pulses					
Fava beans	431	384	413	811	240
Chickpeas	598	335	415	736	524

Source: Algerian authorities.

Table 9. Algeria: Livestock, 1993-97
(In thousands of heads)

	1993	1994	1995	1996	1997
Bovine	1,314	1,269	1,267	1,228	1,255
Ovine	18,665	17,842	17,302	17,565	16,755
Caprine	2,683	2,544	2,780	2,895	3,121
Cameline	114	114	126	136	151

Source: Ministry of Agriculture.

Table 10. Algeria: Index of Industrial Production
in Public Enterprises, 1993–97

	1993	1994	1995	1996	1997
(1989=100)					
Water and energy	129.8	133.1	132.4	138.7	143.7
Hydrocarbons	109.1	106.1	107.6	112.4	118.3
Mining and quarrying	84.5	82.2	81.1	78.1	71.1
Mechanical and electrical	81.9	68.2	74.5	59.6	47.9
Construction materials	97.0	86.1	89.7	93.7	88.8
Chemicals	80.3	94.3	86.2	75.0	78.9
Food processing	100.5	96.4	89.0	85.5	83.1
Textiles	95.7	82.5	73.1	53.1	49.1
Leather and hides	52.4	53.5	42.7	29.3	23.7
Woods and paper	77.5	67.1	60.1	45.5	47.3
General index	94.7	88.5	87.6	81.3	78.5
General index (excluding hydrocarbons)	91.2	84.4	82.9	74.1	69.3
General index of manufactured commodities	88.2	80.2	78.9	68.7	63.4
(Annual percentage change)					
Water and energy	7.4	2.6	-0.5	4.5	3.9
Hydrocarbons	0.6	-3.2	1.4	5.2	4.5
Mining and quarrying	-10.9	-2.6	-1.6	-4.3	-8.4
Mechanical and electrical	-3.9	-16.8	9.2	-21.6	-18.0
Construction materials	-5.7	-11.3	4.2	4.6	-5.3
Chemicals	3.8	17.5	-8.5	-13.0	5.2
Food processing	5.7	-4.1	-7.7	-4.5	-2.2
Textiles	6.5	-13.8	-11.4	-27.1	-7.9
Leather and hides	-15.1	2.1	-20.4	-31.2	-19.1
Woods and paper	10.7	-13.4	-10.4	-19.3	-2.5
General index	-0.5	-6.5	-1.0	-7.4	-3.2
General index (excluding hydrocarbons)	-0.9	-7.5	-1.7	-11.2	-5.8
General index of manufactured commodities	-1.6	-9.1	-1.6	-13.4	-7.2

Source: Algerian authorities.

Table 11. Algeria: Production of Minerals, 1993-97 1/

	1993	1994	1995	1996	1997
(In thousands of tons, unless otherwise indicated)					
Iron ore	2,311	2,047	2,237	2,244	1,616
Phosphates	718	700	757	1,051	1,063
Zinc and lead	8.3	6.7	8.4	6.9	8.1
Mercury 2/	13.3	13.0	8.4	10.0	14.2
(Annual percentage change)					
Iron ore	-9.8	-11.4	-9.3	0.3	-28.1
Phosphates	-37.2	-2.5	8.1	38.8	1.1
Zinc and lead	-7.8	-19.3	25.4	-17.9	17.4
Mercury 2/	-3.6	-2.3	-35.4	19.0	28.4

Source: Algerian authorities.

1/ Excluding hydrocarbons.

2/ In thousands of containers, each weighing 34 kilograms.

Table 12. Algeria: Consumer Price Index, 1993-97 1/

	Weights (in percent)	1993	1994	1995	1996	1997
(1989=100)						
Foodstuffs, beverages, and tobacco	44.1	230.4	325.6	425.9	510.7	539.8
Clothing and shoes	11.6	219.2	253.8	306.3	347.7	369.6
Housing costs	5.6	205.3	266.6	360.0	454.0	541.7
Furniture	6.8	236.5	262.3	305.2	330.2	343.4
Health and medical care	3.4	274.8	320.3	410.3	479.6	527.6
Transportation and communications	11.5	200.7	240.1	351.2	432.0	452.3
Education and entertainment	6.5	309.2	363.8	452.5	520.4	500.1
Other services	10.5	269.9	340.2	441.9	522.3	551.0
General index	100.0	235.5	303.8	394.4	468.2	494.8
(Annual percentage change)						
Foodstuffs, beverages, and tobacco		24.7	41.3	30.8	19.9	5.7
Clothing and shoes		18.0	16.7	19.7	13.5	6.3
Housing costs		17.1	29.9	35.0	26.1	19.3
Furniture		20.0	10.9	16.4	8.2	4.0
Health and medical care		24.7	16.6	28.1	16.9	10.0
Transportation and communications		7.9	19.6	46.3	23.0	4.7
Education and entertainment		25.3	17.7	24.4	15.0	-3.9
Other services		17.4	26.1	29.9	18.2	5.5
General index		20.5	29.0	29.8	18.7	5.7

Source: Algerian authorities.

1/ Includes 256 items and covers households in the area of Algiers.

Table 13. Algeria: Income of Households, 1993–97

(In billions of dinars)

	1993	1994	1995	1996	1997
Wages and salaries 1/	366	329	571	665	719
Agriculture	12	13	22	27	27
Central government	150	181	255	303	334
Other sectors	204	235	293	335	359
Self-employed	272	342	486	619	650
Transfers	167	187	240	248	294
Gross income	805	858	1,296	1,532	1,663
Disposable income	712	849	1,168	1,377	1,491

Source: Algerian authorities.

1/ Includes social security contributions paid by employees.

Table 14. Algeria: Gross and Net Wages in Public Enterprises, January 1992- December 1996

	January 1992		January 1993		January 1994		January 1995		December 1996	
	Gross	Net	Gross	Net	Gross	Net	Gross	Net	Gross	Net
(In dinars)										
Salaries										
Managers	12,127	10,583	13,137	11,464	13,965	12,187	15,361	13,102	16,897	14,362
Supervisors/technicians	8,676	7,815	9,386	8,382	10,839	9,842	11,924	10,588	13,155	11,655
Workers	6,593	6,075	7,712	6,645	7,892	7,272	8,681	7,830	9,549	8,603
(Percentage change)										
Salaries										
Managers	39.0	36.5	8.3	8.3	6.3	6.3	10.0	7.5	10.0	9.6
Supervisors/technicians	32.0	0.2	8.2	7.3	15.5	17.4	10.0	7.6	10.3	10.0
Workers	29.9	36.8	17.0	9.4	2.3	9.4	10.0	7.7	10.0	9.8

Source: Algerian authorities.

Table 15. Algeria: Labor Force, Employment,
and Unemployment, 1993–97 1/

(In thousands; unless otherwise indicated)

	1993	1994	1995	1996	1997
Labor force	6,561	6,814	7,561	7,811	8,072
Agriculture	1,035	1,023	1,084	1,154	1,144
Other sectors	5,526	5,791	6,477	6,657	6,928
Employment	4,273	4,325	4,505	4,641	4,684
Agriculture	1,035	1,023	1,084	1,154	1,144
Other sectors	3,238	3,302	3,421	3,487	3,540
Industry	532	528	519	502	487
Construction and public works	659	667	678	705	723
Government 1/ 2/	1,171	1,211	1,292	1,326	1,343
Other	876	896	932	954	987
Work at home	769	829	931	984	1,131
Unemployed	1,519	1,660	2,125	2,186	2,257
(In percent of labor force)	23.2	24.4	28.1	28.0	28.0

Sources: Algerian authorities (ONS surveys); and Fund staff estimates.

1/ Data are not strictly comparable over time, as surveys are conducted in different months and have not been adjusted.

2/ Including military draft.

Table 16. Algeria: Summary of Central Government Operations, 1993-97

(In billions of dinars)

	1993	1994	1995	1996	1997
Budget revenue and grants	320.1	434.2	600.9	824.8	926.6
Hydrocarbon revenue	185.0	257.7	358.8	519.7	592.5
Nonhydrocarbon revenue	135.1	176.5	242.1	305.1	334.1
Tax revenue	126.1	163.2	233.2	290.5	313.9
Taxes on income and profits	35.0	42.8	53.6	67.5	81.8
Taxes on goods and services	54.2	65.9	99.9	129.5	148.0
Customs duties	30.0	47.9	73.3	84.4	73.5
Registration and stamps	6.9	6.6	6.4	9.1	10.6
Nontax revenues	9.0	13.3	8.9	14.6	20.2
Fees	9.0	8.1	8.7	11.5	15.8
Bank of Algeria dividends	0.0	5.2	0.2	3.1	4.4
Grants	0.0	0.0	0.0	0.0	0.0
Total expenditure	390.5	461.9	589.1	724.6	845.1
Current expenditure	288.9	344.7	444.4	550.6	643.5
Personnel expenditure	121.5	151.7	187.5	222.8	245.2
Mudjahidins' pensions	10.0	12.8	15.6	18.9	25.0
Material and supplies	16.7	18.2	29.4	34.7	43.5
Current transfers 1/	113.7	120.9	149.7	185.3	146.4
Of which:					
Compensation Fund 2/	57.4	42.4	25.5	18.9	0.0
Debt service	27.0	41.1	62.2	89.0	109.4
Capital expenditure	101.6	117.2	144.7	174.0	201.6
Budget balance	-70.4	-27.7	11.8	100.2	81.5
Special accounts balance	5.6	1.1	-0.7	1.5	1.1
Net lending by the treasury	11.5	7.0	2.4	2.4	1.5
Treasury balance excluding Rehabilitation Fund	-76.3	-33.7	8.7	104.1	84.1
Allocation to the Rehabilitation Fund	24.3	31.7	36.9	24.4	18.0
Primary balance 2/	-73.6	-24.3	34.0	163.9	193.5
Overall balance including Rehabilitation Fund	-100.6	-65.4	-28.2	74.9	66.1
Financing	100.6	65.4	28.2	-74.9	-66.1
Bank 3/	72.8	-99.8	-106.6	-140.1	-60.0
Nonbank	8.2	41.8	-14.7	-7.4	-23.1
Foreign 4/	19.6	123.4	149.5	72.6	17.0

Source: Algerian authorities.

1/ Covers expenditures for food subsidies, agricultural price support, and cash transfers for the poor.

2/ Including special accounts, net lending and operations of the Rehabilitation Fund.

3/ Including debt rescheduling proceeds blocked on account at the Bank of Algeria.

4/ Includes external debt rescheduling proceeds.

Table 17. Algeria: Central Government Revenue, 1993-97

(In percent of GDP)

	1993	1994	1995	1996	1997
Total budget revenue	27.6	29.5	30.6	33.0	34.0
Hydrocarbon revenue	15.9	17.5	18.3	20.8	21.8
Export taxes	13.7	13.4	15.5	18.0	18.9
Domestic	2.2	2.6	1.6	1.8	1.8
Profit transfer	1.7	1.7	1.6	1.8	1.8
Except. levy on Naftal	0.0	0.5	0.0	0.0	0.0
Fuel taxes	0.5	0.4	0.0	0.0	0.0
Sonatrach dividends	0.0	1.6	1.2	0.9	1.0
Nonhydrocarbon revenue	11.6	12.0	12.3	12.2	12.3
Tax revenue	10.9	11.1	11.9	11.6	11.5
Taxes on income and profits	3.0	2.9	2.7	2.7	3.0
Wage income taxes	2.0	1.6	1.6	1.3	1.5
Other	1.0	1.3	1.1	1.4	1.5
Taxes on goods and services	4.7	4.5	5.1	5.2	5.4
VAT and excises on imports	1.7	1.8	1.9	1.7	1.6
VAT and excise on domestic transactions	2.8	2.5	2.3	2.4	2.7
TVA-TC-TSA domestic transactions	2.1	1.9	1.6	1.7	1.9
Tobacco excises (TIC)	0.7	0.6	0.7	0.7	0.8
VAT on petroleum products/levy	0.0	0.0	0.4	0.3	0.3
Excises on petroleum products	0.0	0.0	0.3	0.6	0.8
Other indirect taxes	0.2	0.2	0.2	0.2	0.1
Customs duties	2.6	3.3	3.7	3.4	2.7
Registration and stamps	0.6	0.4	0.3	0.4	0.4
Nontax revenue	0.8	0.9	0.5	0.6	0.7
Fees	0.8	0.5	0.4	0.5	0.6
Bank of Algeria dividends	0.0	0.4	0.0	0.1	0.2

Source: Algerian authorities.

Table 18. Algeria: Central Government Expenditure, 1993–97

(In percent of GDP)

	1993	1994	1995	1996	1997
Total expenditure 1/	33.6	31.4	30.0	29.0	31.0
Current expenditure	24.9	23.4	22.6	22.0	23.6
Personnel	10.5	10.3	9.5	8.9	9.0
Wages and salaries	9.9	9.9	9.1	8.5	8.6
Other	0.5	0.4	0.4	0.3	0.3
IPSU Etat	0.1	0.1	0.0	0.0	0.0
Mudjahidins' pensions	0.9	0.9	0.8	0.8	0.9
Material and supplies	1.4	1.2	1.5	1.4	1.6
Public services	3.4	2.9	2.8	2.8	2.7
Hospitals	1.3	1.2	1.1	1.1	1.1
Others (government entities)	2.1	1.7	1.7	1.7	1.6
Current transfers	6.4	5.3	4.8	4.6	5.4
Family allowances	0.8	1.0	1.2	1.5	1.6
Public works and social assistance	1.9	0.8	0.7	0.6	0.4
Food subsidies	2.5	2.1	0.9	0.5	0.0
<i>Of which</i>					
Compensation Fund	0.0	0.0	0.0	0.8	0.0
Agricultural price support	0.6	0.3	0.4	0.3	0.2
Housing 1/	0.2	0.3	0.4	0.7	1.1
Other transfers	0.4	0.9	1.2	1.0	0.0
Interests on debt	2.3	2.8	3.2	3.6	0.1
Capital expenditure	8.7	8.0	7.4	7.0	2.0
Budget balance	-6.1	-1.9	0.6	4.0	4.0
Special accounts balance	0.5	0.1	0.0	0.1	0.0
Net lending by the treasury	1.0	0.5	0.1	0.1	0.1
Allocation to the Rehabilitation & Recapitalization Fund 2/	2.1	2.2	1.9	1.0	0.7

Sources: Algerian authorities and Fund staff estimates.

1/ Including special accounts, net lending and operations of the Rehabilitation Fund.

2/ Excluding the compensation for commercial bank's foreign exchange losses on principal payments of external debt contracted on behalf of the treasury.

Table 19. Algeria: Sectoral Allocation of Budgetary Capital Expenditure, 1993–97

	1993	1994	1994	1995	1996	1997 1/
	(In millions of dinars)					
Agriculture and fishery	2,213	2,750	2,945	2,057	4,106	6,661
Irrigation and waterworks	12,018	12,700	12,885	14,078	17,570	22,615
Industry and energy	5,480	5,100	5,143	6,250	5,754	6,861
Tourism	1		4	0	8	0
Economic infrastructure	17,283	15,500	15,543	17,828	22,154	26,769
Housing	4,141	7,100	6,848	4,743	8,361	9,568
Education and professional training	14,741	15,550	17,329	19,366	24,173	28,518
Social infrastructure	4,270	6,350	6,826	7,607	8,682	7,931
Administrative infrastructure	5,904	8,700	9,315	10,276	12,600	14,501
Urban development	19,196	18,250	18,475	19,333	20,900	21,250
Not allocated	19,148	27,906	28,504	39,376	49,025	50,588
Total	104,396	119,906	123,821	140,914	173,341	195,262
	(Annual percentage change)					
Agriculture and fishery	0.2	19.6	33.1	-30.2	99.6	62.2
Irrigation and waterworks	53.4	62.0	7.2	9.3	24.8	28.7
Industry and energy	9.0	1.5	-6.1	21.5	-7.9	19.2
Tourism	0.0		0.0	0.0	0.0	0.0
Economic infrastructure	45.0	31.1	-10.1	14.7	24.3	20.8
Housing	2,900.7	5044.9	65.4	-30.7	76.3	14.4
Education and professional training	43.5	51.3	17.6	11.8	24.8	18.0
Social infrastructure	33.2	97.9	59.9	11.4	14.1	-8.7
Administrative infrastructure	54.4	127.6	57.8	10.3	22.6	15.1
Urban development	43.8	36.7	-3.8	4.6	8.1	1.7
Not allocated	45.0	125.7	48.9	38.1	24.5	3.2
Total	48.8	70.9	18.6	13.8	23.0	12.7
	(In percent of total)					
Agriculture and fishery	2.1	2.3	2.4	1.5	2.4	3.4
Irrigation and waterworks	11.5	10.6	10.4	10.0	10.1	11.6
Industry and energy	5.2	4.3	4.2	4.4	3.3	3.5
Tourism	0.0		0.0	0.0	0.0	0.0
Economic infrastructure	16.6	12.9	12.6	12.7	12.8	13.7
Housing	4.0	5.9	5.5	3.4	4.8	4.9
Education and professional training	14.1	13.0	14.0	13.7	13.9	14.6
Social infrastructure	4.1	5.3	5.5	5.4	5.0	4.1
Administrative infrastructure	5.7	7.3	7.5	7.3	7.3	7.4
Urban development	18.4	15.2	14.9	13.7	12.1	10.9
Not allocated	18.3	23.3	23.0	27.9	28.3	25.9
Total	100.0	100.0	100.0	100.0	100.0	100.0

Source: Algerian authorities.

1/ Commitments under the 1997 budget law.

Table 20. Algeria: Composition of Revenue, 1993-97

	1993	1994	1995	1996	1997
(In billions of dinars)					
Total budget revenue and grants	320.1	434.2	600.9	824.8	926.6
Hydrocarbon revenue	185.0	257.7	358.8	519.7	592.5
Export taxes	159.7	197.2	305.2	451.0	514.8
Domestic	25.3	37.7	30.9	45.0	50.0
Profit transfer	19.5	25.0	30.9	45.0	50.0
Except. levy on Naftal	...	7.1	...	...	...
Fuel taxes	5.8	5.6	...	...	...
Sonatrach dividends & entry rights	0.0	22.8	22.7	23.7	27.7
Of which					
Dividends	0.0	0.0	22.7	12.1	27.7
Of which					
Entry rights	0.0	0.0	0.0	11.6	...
Nonhydrocarbon revenue	135.1	176.5	242.1	305.1	334.1
Tax revenue	126.1	163.2	233.2	290.5	313.9
Taxes on income and profits	35.0	42.8	53.6	67.5	81.8
Wage income taxes	23.0	23.8	31.0	33.2	40.8
Other	12.0	19.1	22.5	34.3	41.0
Taxes on goods and services	54.2	65.9	99.9	129.5	148.0
VAT and excises on imports	20.0	26.5	37.7	43.4	43.7
VAT and excises on domestic activities	32.2	36.9	44.6	59.3	73.2
TVA-TC-TSA domestic transactions	24.2	27.8	31.3	42.8	51.7
Tobacco Excises (TIC)	8.0	9.1	13.3	16.6	21.5
VAT on petroleum products/levy	0.0	0.0	7.8	6.7	8.5
Excises on petroleum products	0.0	0.0	6.6	15.6	21.2
Other indirect taxes	2.0	2.5	3.2	4.5	1.4
Customs duties	30.0	47.9	73.3	84.4	73.5
Registration and stamps	6.9	6.6	6.4	9.1	10.6
Nontax revenue	9.0	13.3	8.9	14.6	20.2
Fees	9.0	8.1	8.7	11.5	15.8
Bank of Algeria dividends	0.0	5.2	0.2	3.1	4.4
Grants	0.0	0.0	0.0	0.0	0.0
(In percent of total)					
Total budget revenue and grants	100	100	100	100	100
Hydrocarbon revenue	57.8	59.3	59.7	63.0	63.9
Nonhydrocarbon revenue	42.2	40.7	40.3	37.0	36.1
Tax revenue	39.4	37.6	38.8	35.2	33.9
Taxes on income and profits	10.9	9.9	8.9	8.2	8.8
Taxes on goods and services	16.9	15.2	16.6	15.7	16.0
Customs duties	9.4	11.0	12.2	10.2	7.9
Registration and stamps	2.2	1.5	1.1	1.1	1.1
Nontax revenue	2.8	3.1	1.5	1.8	2.2

Source: Algerian authorities.

Table 21. Algeria: Composition of Expenditure, 1993-97

	1993	1994	1995	1996	1997
(In billions of dinars)					
Total budget expenditure	390.5	461.9	589.1	724.6	845.1
Current expenditure	288.9	344.7	444.4	550.6	643.5
Personnel expenditure	121.5	151.7	187.5	222.8	245.2
Wages and salaries	114.9	145.2	179.5	213.3	235.0
Other	5.8	5.7	7.2	8.6	9.5
Mudjahidins' pensions	10.0	12.8	15.6	18.9	0.7
Material and supplies	16.7	18.2	29.4	34.7	25.0
Public services	39.9	42.3	55.4	69.9	43.5
Hospitals	15.3	17.2	21.3	28.5	74.0
Other	24.6	25.1	34.2	41.4	29.9
Current transfers	73.8	78.5	94.2	115.4	44.1
Family allowances	8.9	14.1	24.5	36.4	146.4
Public works and social assistance	22.0	11.8	13.6	14.2	44.2
Food subsidies	28.8	30.9	18.3	11.9	12.0
<i>Of which</i>					
Compensation Fund	...	...	...	18.8	...
Agricultural price support	6.6	4.4	7.2	6.9	5.3
Housing	2.0	3.7	7.9	18.1	28.7
Youth Employment Support Fund	...	...	...	21.1	2.7
Other transfers	4.8	13.7	22.8	25.7	53.5
Interest on debt	27.0	41.1	62.2	89.0	109.4
Domestic	...	13.8	13.0	15.9	29.1
Foreign	...	27.3	49.2	73.1	80.3
<i>Of which</i>					
Rescheduling	...	0.0	...	41.9	59.6
Capital expenditure	101.6	117.2	144.7	174.0	201.6
Special accounts balance 1/	5.6	1.1	-0.7	1.5	1.1
Net lending by the treasury	11.5	7.0	2.4	2.4	1.5
Allocation to the Rehabilitation Fund 2/	24.3	31.7	36.9	24.4	18.0
Total expenditure	420.7	499.6	629.1	749.9	865.7

Table 21. Algeria: Composition of Expenditure, 1993-97

	1993	1994	1995	1996	1997
(In percent of total expenditure)					
Total budget expenditure	92.8	92.5	93.6	96.6	97.6
Current expenditure	68.7	69.0	70.6	73.4	74.3
Personnel expenditure	28.9	30.4	29.8	29.7	28.3
Wages and salaries	27.3	29.1	28.5	28.4	27.1
Material and supplies	4.0	3.6	4.7	4.6	5.0
Public services	9.5	8.5	8.8	9.3	8.5
Food subsidies	6.8	6.2	2.9	1.6	...
Interest payments	6.4	8.2	9.9	11.9	12.6
Capital expenditure	24.2	23.5	23.0	23.2	23.3
Net lending by the treasury	2.7	1.4	0.4	0.3	0.2
Allocation to the Rehabilitation Fund	5.8	6.4	5.9	3.3	2.1

Sources: Algerian authorities and Fund staff estimates.

1/ A positive number indicates a surplus.

2/ Excluding the compensation for commercial banks' foreign exchange losses on principal payments of external debt contracted on behalf of the treasury.

Table 22. Algeria: Central Government Domestic Debt, 1993-97

(In billions of dinars; end of period)

	1993	1994	1995	1996	1997
Total domestic debt 1/	524.3	452.0	438.7	556.2	574.6
Treasury, equipment and C/C bills	72.6	59.6	37.9	40.7	61.4
Central bank overdrafts	261.4	249.1	235.3	231.9	164.4
Refinancing bonds	190.3	143.3	165.5	283.6	348.8
Public enterprises	190.3	143.3	83.2	48.2	70.5
OPGI (real estate companies)	0.0	0.0	82.3	47.3	82.2
EPIC & agroindustries	0.0	0.0	0.0	161.7	162.2
Banks	0.0	0.0	0.0	24.9	30.9
Solidarity bonds	0.0	0.0	0.0	1.5	3.0
Memorandum item:					
Domestic debt as percent of GDP	45.1	30.7	22.3	22.3	21.2
GDP	1,162	1,471	1,966	2,495	2,716

Source: Algerian authorities.

1/ Excluding the blocked account at the Bank of Algeria and other deposits.

Table 23. Algeria: Rehabilitation Fund Operations, 1992-97

(In billions of dinars)

	1992	1993	1994	1995	1996	1997
Commercial banks	43.0	31.3	57.0	68.5	45.5	18.0
Foreign exchange losses	40.3	20.8	57.0	54.5	45.5	0.0
Recapitalization	0.0	9.0	0.0	14.0	0.0	18.0
Interest 1/	2.7	1.5	0.0	0.0	0.0	0.0
Public enterprises	16.5	10.1	31.7	22.9	24.4	0.0
Foreign exchange losses 2/	12.2	5.5	22.4	0.0	0.0	0.0
Trading enterprises	9.6	4.8	5.0	0.0	0.0	0.0
Other enterprises	2.6	0.7	17.4	0.0	0.0	0.0
Other subsidies	4.3	4.6	9.3	22.9	24.4	0.0
Total	59.5	41.4	88.7	91.4	69.9	18.0

Source: Algerian authorities.

1/ Interest payments on public enterprise debt purchased from the banks by the treasury.

2/ Refers to the so-called *Entreprises de revente en l'Etat*, which have imported mostly essential consumer goods at the behest of the Government.

Table 24. Algeria: Compensation Fund Operations, 1992-97 1/

(In billions of dinars)

	1992	1993	1994	1995	1996	1997
Resources	66.2	58.2	43.1	38.0	33.3	0.0
Budget allocation	56.7	50.0	43.1	38.0	33.3	0.0
Compensatory tax	9.5	8.2	0.0	0.0	0.0	0.0
<i>Of which</i>						
On imports	5.1	3.0	0.0	0.0	0.0	0.0
Subsidy expenditures	52.2	57.4	43.1	38.0	33.1	0.0
Carried over from previous year	13.6	8.5	4.1	-0.7	0.3	0.0
Foodstuffs 2/	17.5	24.4	22.5	18.3	11.9	0.0
Agricultural inputs and other	9.6	6.6	4.4	7.2	6.9	0.0
Cash transfers	20.0	22.0	11.4	13.6	14.2	0.0
Amount carried over to following year	-8.5	-4.1	0.7	-0.3	-0.2	0.0
Balance	14.0	0.8	0.0	0.0	0.2	0.0

Source: Algerian authorities.

1/ On a cash basis.

2/ On an accrual basis; the reconciliation between accrual and cash basis is ensured by the amount carried over from one year to the next.

Table 25. Algeria: Housing Supply, 1993-97

	1993	1994	1995	1996 Prel.	1997 Proj.
(In thousands of dwellings delivered)					
Formal	41.0	78.7	125.6	112.2	136.7
Social	24.2	61.3	99.3	96.5	115.1
Rental	15.7	17.3	42.2	39.8	64.0
Owner occupied	8.5	44.0	57.1	56.7	51.1
Other Formal	16.8	17.4	26.3	15.7	21.6
Public	16.1	16.2	22.7	13.8	20.8
Private	0.8	1.2	3.6	1.9	0.8
Autoconstruction	39.0	40.0	35.4	20.0	25.0
Total	80.0	118.7	161.0	132.2	161.7
(In percent of total)					
Formal	51.3	66.3	78.0	84.9	84.5
Social	30.2	51.6	61.7	73.0	71.2
Rental	19.6	14.6	26.2	30.1	39.6
Owner occupied	10.6	37.1	35.5	42.9	31.6
Other Formal	21.0	14.7	16.3	11.9	13.4
Public	20.1	13.6	14.1	10.4	12.9
Private	0.9	1.0	2.2	1.4	0.5
Autoconstruction	48.7	33.7	22.0	15.1	15.5
Total	100.0	100.0	100.0	100.0	100.0

Source: Algerian Ministry of Housing.

Table 26. Algeria: Monetary Survey, 1993-97

	1993	1994	1995	1996	1997
(In billions of dinars)					
Foreign assets (net)	23.9	60.4	26.3	133.9	351.5
Central bank	16.1	50.7	15.6	122.4	343.0
Commercial banks	7.8	9.7	10.7	11.6	8.5
Net domestic assets	601.3	663.1	773.2	781.1	734.0
Domestic credit	753.6	774.4	967.2	1057.4	1114.8
Credit to government (net)	522.2	468.6	401.6	280.5	422.0
Central bank 1/	266.8	246.3	231.9	172.4	155.7
Commercial banks 2/	209.9	165.8	111.1	43.9	187.1
CCP and treasury deposits	45.5	56.6	58.6	64.2	79.1
Credit to the nongovernment 2/	231.4	305.8	565.6	776.8	722.8
Of which					
Credit to 12 offices	48.0	...	...	231.2	...
Government lending funds	-134.4	-13.6	-13.8	-12.3	-12.5
Medium- and long-term foreign liabilities	-113.7	-145.0	-120.9	-96.5	-78.0
Other items (net)	-24.2	47.3	-59.3	-167.5	-320.0
Money plus quasi-money	625.2	723.5	799.5	915.1	1085.8
Money	443.2	475.8	519.1	589.1	675.5
Currency outside banks	211.3	223.0	249.7	290.9	337.0
Demand deposits	186.4	196.4	210.8	234.0	259.4
Deposits with the treasury and the postal checking system	45.5	56.4	58.6	64.2	79.1
Quasi-money	182.0	247.7	280.4	325.9	410.3
(Annual percentage change)					
Money and quasi-money	21.2	15.7	10.5	14.4	18.6
Money	19.9	7.4	9.1	13.5	14.7
Quasi-money	24.5	36.1	13.2	16.3	25.9
Net domestic assets	21.1	10.3	16.6	1.0	-6.0
Domestic credit	17.9	2.8	24.9	9.3	8.3
Credit to government	199.9	-10.3	-14.3	-30.1	50.4
Credit to nongovernment 2/	9.0	32.2	84.9	37.3	-7.0
(In percent)					
Memorandum items:					
Total liquidity/GDP	52.2	45.6	40.6	36.7	39.9
Money/GDP	37.2	31.1	26.3	23.6	24.8
Currency outside banks/GDP	18.1	14.7	12.7	11.7	12.4
Domestic credit/GDP	63.7	52.5	49.2	42.4	42.0
Money/M2	70.9	65.8	64.9	64.4	62.2
Currency outside banks/M2	33.8	30.8	31.2	31.8	31.0
Money multiplier	2.5	3.1	3.1	...	...

Source: Bank of Algeria.

1/ Includes, as a net item, deposits of the BAD and ministries with the central bank.

2/ For comparison purposes, the data on credit to the Government for December 1993 need to be adjusted downward by DA 275.5 billion, representing the conversion into government bonds of public enterprises' commercial debt. The data on credit to the nongovernment need to be adjusted upward by the same amount.

Table 27. Algeria: Balance Sheet of the Bank of Algeria, 1993-97

	1993	1994	1995	1996	1997
(In billions of dinars)					
Net foreign assets	17.6	50.7	15.6	122.4	343.1
Net domestic assets	234.4	186.5	239.6	183.5	13.4
Credit to government	270.9	246.3	231.9	172.4	155.7
Credit to banks	29.4	50.4	190.3	259.1	218.9
Other items net	-65.9	-110.2	-182.6	-248.1	-361.0
Reserve money	252.0	237.2	255.2	305.9	356.5
Currency in circulation	212.0	224.4	252.3	293.5	341.7
Bankers deposits	40.0	12.8	2.9	12.4	14.8
(Annual change; in billions of dinars)					
Net foreign assets	1.8	33.1	-35.1	106.8	220.7
Net domestic assets	54	-47.9	53.1	-56.1	-170.1
Credit to government	110.5	-24.6	-14.4	-59.5	-16.7
Credit to banks	-48.9	21.0	139.9	68.8	-40.2
Other items net	-7.6	-44.3	-72.4	-65.5	-113.1
Reserve money	55.8	-14.8	18.0	50.7	50.6
Currency in circulation	26.6	12.4	27.9	41.2	48.2
Bankers deposits	29.2	-27.2	-9.9	9.5	2.4
(Annual percentage change)					
Net foreign assets	11.4	188.1	-69.2	684.8	180.2
Net domestic assets	29.9	-20.4	28.5	-23.4	-92.7
Credit to government	68.9	-9.1	-5.8	-25.6	-9.7
Credit to banks	-62.5	71.4	277.6	36.2	-15.5
Reserve money	28.4	-5.9	7.6	19.9	16.5
Currency in circulation	14.3	5.8	12.4	16.3	16.4
Bankers deposits	270.4	-68.0	-77.3	327.6	19.4

Source: Bank of Algeria.

Table 28. Algeria: Distribution of Credit to the Economy
by Maturity, 1993-97

	1993	1994	1995	1996	1997
(In billions of dinars; end of period)					
Short term	156.6	227.4	465.4	600.3	437.5
Medium term	59.3	74.3	95.0	169.7	257.2
Long term	3.2	3.0	4.0	5.5	5.6
Total	219.1	304.7	564.4	776.8	700.3
(Annual percentage change)					
Short term	-56.0	45.2	104.7	29.3	-27.1
Medium term	9.7	25.3	27.9	78.6	51.6
Long term	21.7	-6.3	33.3	37.5	1.8
Total	-46.9	39.1	85.2	37.4	-9.7
(In percent of total credits)					
Short term	71.5	74.6	82.5	77.4	62.5
Medium term	27.1	24.4	16.8	21.9	36.7
Long term	1.5	1.0	0.7	0.7	0.8
Total	100.0	100.0	100.0	100.0	100.0

Source: Bank of Algeria.

Table 29. Algeria: Distribution of Credit to the Economy
by Sector, 1993-97

	1993	1994	1995	1996	1997
(In billions of dinars; end of period)					
Public sector	142.0	208.0	462.0	637.8	610.7
Private sector	77.1	96.7	102.5	137.8	110.0
Local administration	1.1	1.1	1.1	1.2	1.1
Total	220.2	305.8	565.6	776.8	722.8
(Annual percentage change)					
Public sector	-57.2	46.5	122.1	38.1	-4.2
Private sector	1.4	25.4	6.0	34.4	-19.4
Local administration	-73.8	0.0	0.0	9.1	-8.3
	-46.6	38.9	85.0	37.3	-7.0
Total	-46.6	38.9	85.0	37.4	-7.0
(In percent of total credits)					
Public sector	64.5	68.0	81.7	82.1	84.5
Private sector	35.0	31.6	18.1	17.7	15.4
Local administration	0.5	0.4	0.2	0.2	0.2
Total	100.0	100.0	100.0	100.0	100.0

Source: Bank of Algeria.

Table 30. Algeria: Structure of Interest Rates, 1991-97
(In percent per annum)

	Oct. 1991- Apr. 1994	Effective Apr. 12, 1994	As of Dec. 1994	As of Dec. 1995	As of Dec. 1996	As of Dec. 1997
Central bank rediscount	11.50	15.00	15.00	14.00	13.00	11.00
Central bank overdraft	20.00	24.00	24.00	24.00	24.00	24.00
Money market						
Repurchase agreements 1/ 2/	17.00	20.00	21.00-22.00	23.00	19.00-21.00	13.33
Auctions	...	...	...	19.50	17.20	14.50
Commercial banks' deposit rate 3/ 4/	12.00-16.00	16.50-18.00	16.50-18.00	16.50-18.00	16.50-18.00	8.50-12.00
Commercial banks' lending rate 5/	15.00-20.00	18.00-25.00	18.00-25.00	19.00-24.00	17.00-21.50	9.00-13.00
Foreign currency deposits						
denominated in U.S. dollars 6/	4.00	6.00	6.73	5.75	5.70	5.74
CNEP (savings and housing)						
Deposit rate						
Savings	8.00	14.00	14.00	16.00	16.00	16.00
Housing	5.00	10.00	10.00	12.00	12.00	12.00
Lending rate (housing)						
Individuals 7/	7.00-14.00	11.60-15.00	12.00-22.00	12.00-22.00	12.00-22.00	10.30-17.50
Developers	14.00	15.00-19.00	16.00-20.00	16.00-20.00	16.00-20.00	10.00-17.50
Treasury bonds						
Negotiable						
13 weeks	...	...	...	...	...	12.93
26 weeks	...	...	...	...	...	13.93
Non negotiable						
12 months	10.00	10.00	10.00	10.00	10.00	10.00
24 months	11.25	11.25	11.25	11.25	11.25	11.25
36 months	13.00	13.00	13.00	13.00	13.00	13.00
Equipment bonds						
1 year	9.50	16.50	16.50	...	...	...
2 years	10.25	...	...	...	...	...
3-20 years	11.00-15.00	11.00-15.00	11.00-15.00	11.00-15.00	11.00-15.00	11.00-15.00
Memorandum item:						
Consumer price index (12-months increase)	...	21.90	38.60	21.90	15.10	...

Sources: Algerian authorities: Bank of Algeria and Ministry of Finance.

1/ Central bank overnight rate.

2/ The ceiling on money market rates (18 percent) was abolished in April 1994.

3/ In May 1990, deposit rates were liberalized, but remained in practice constrained by ceilings on lending rates.

4/ No interest is paid on sight deposits; interest on term deposits is subject to a 15 percent securities revenue tax, whereas government bond yields are tax exempt.

5/ Prior to May 1990, lending rates were not allowed to exceed three percentage points above banks' average cost of resources; starting from that date, they were subject to a ceiling of 20 percent per annum. This ceiling was removed in April 1994, but a maximum margin of five points was imposed on banks until December 1995.

6/ Free for banks to determine on the basis of Libor plus 150 basis points.

7/ Based on the average cost of resources plus five percentage points.

Table 31. Algeria: Balance of Payments, 1993-97

(In billions of U.S. dollars; unless indicated otherwise)

	1993	1994	1995	1996	1997
Current account balance	0.8	-1.8	-2.2	1.2	3.5
Trade balance	2.4	-0.3	0.2	4.1	5.7
Exports, f.o.b.	10.4	8.9	10.3	13.2	13.8
Hydrocarbons	9.9	8.6	9.7	12.6	13.2
Other	0.5	0.3	0.5	0.6	0.6
Total imports	-8.0	-9.2	-10.1	-9.1	-8.1
Nonfactor services, net	-1.0	-1.2	-1.3	-1.4	-1.1
Credits	0.6	0.7	0.7	0.8	1.1
Debits	-1.6	-1.9	-2.0	-2.2	-2.2
Factor income, net	-1.8	-1.7	-2.2	-2.4	-2.2
Credits	0.2	0.1	0.1	0.2	0.3
Debits 1/	-1.9	-1.8	-2.3	-2.6	-2.5
Transfers, net	1.1	1.4	1.1	0.9	1.1
Capital account balance	-0.8	-2.5	-4.1	-3.3	-2.3
Direct investment, net	0.0	0.0	0.0	0.3	0.3
Official capital, net	-0.3	-2.5	-3.9	-3.4	-2.5
Drawings	6.5	4.6	3.2	1.8	1.7
Amortization	-6.9	-7.1	-7.1	-5.2	-4.2
Short-term credit (net)	-0.5	-0.1	0.1	-0.2	0.0
Errors and omissions	0.0	0.0	-0.2	0.0	0.0
Overall balance	0.0	-4.4	-6.3	-2.1	1.2
Financing	0.0	4.4	6.3	2.1	-1.2
Increase in gross reserves (-)	0.0	-1.1	0.5	-2.1	-3.8
Fund repurchases (net)	-0.3	0.7	0.3	0.6	0.1
Increase in other liabilities					
Bank of Algeria (+) 2/	0.3	0.0	-0.1	-0.1	...
Debt rescheduling	0.0	4.4	4.9	3.5	2.2
Multilateral balance of payment support	0.0	0.4	0.6	0.2	0.3
Memorandum items:					
Gross reserves (excluding gold)	1.5	2.6	2.1	4.2	8.0
In months of imports (gnfs)	1.9	2.9	2.1	4.5	9.4
Crude oil export unit value (US\$/bbl)	17.8	16.3	17.6	21.7	19.5
Debt service after rescheduling/Exports (in percent)	82.2	48.6	42.5	29.2	29.8
Total debt stock 3/	31.1	29.5	32.5	33.5	30.0
In percent of exports 3/	282.5	307.8	297.1	240.0	217.1
In percent of GDP	62.9	70.6	78.4	73.3	63.8

Sources: Algerian authorities and Fund staff estimates.

1/ Includes profit remittances to Sonatrach investment partners in 1996.

2/ Includes US\$460 million of arrears that were incurred and cleared within calendar year 1994.

3/ Includes short-term debt and use of Fund resources. Does not include debt from former USSR estimated at Rubles 2.4 million. Service on a small portion of this debt is included in the balance of payments. Exports include goods and non-factor services.

Table 32. Algeria: Volume of Hydrocarbon Exports, 1993–97

	1993	1994	1995	1996	1997
(In billion of BTUs)					
Petroleum and petroleum products					
Crude petroleum	615.0	661.6	669.1	784.3	745.0
Condensate	809.6	756.7	755.2	786.1	771.8
Refined petroleum products	556.5	553.8	569.5	540.6	615.6
LPG	237.0	234.0	234.7	263.7	342.7
Total	2,218.1	2,206.1	2,228.5	2,374.7	2,475.1
Natural gas and LNG					
LNG	786.3	711.2	686.7	771.5	934.5
Natural gas	562.6	507.4	730.6	787.5	903.1
Total	1,348.8	1,218.6	1,417.4	1,559.0	1,837.6
Total hydrocarbon trade	3,566.9	3,424.7	3,645.9	3,933.7	4,312.7
(In percent of total hydrocarbon volumes)					
Petroleum and petroleum products					
Crude petroleum	17.2	19.3	18.4	19.9	17.3
Condensate	22.7	22.1	20.7	20.0	17.9
Refined petroleum products	15.6	16.2	15.6	13.7	14.3
LPG	6.6	6.8	6.4	6.7	8.0
Total	62.2	64.4	61.1	60.4	57.4
Natural gas and LNG					
LNG	21.4	22.0	18.8	19.6	21.7
Natural gas	15.8	14.8	20.0	20.0	20.9
Total	37.8	35.6	38.9	39.6	42.6

Source: Algerian authorities.

Table 33. Algeria: Exports of Hydrocarbons, 1993-97

	1993	1994	1995	1996	1997
Crude petroleum					
Value (millions of US\$)	2001.1	1978.2	2156.2	3118.7	2,661.7
Of which profit repatriation	0.0	0.0	0.0	264.1	312.8
Volume (millions of barrels)	112.7	121.3	2.7	143.8	136.6
(millions of metric tons)	14.3	15.5	15.6	18.3	17.4
Unit price (US\$ per barrel)	17.8	16.3	17.6	21.7	19.5
Condensate					
Value (millions of US\$)	2,607.4	2,188.4	2,374.7	3,025.1	2,805.7
Of which profit repatriation	0.0	0.0	0.0	51.8	35.0
Volume (millions of barrels)	146.9	137.3	137.0	142.6	140.0
(millions of metric tons)	16.8	15.7	15.7	16.3	16.0
Unit price (US\$ per barrel)	17.8	15.9	17.3	21.2	20.0
Refined petroleum products					
Value (millions of US\$)	1,832.4	1,691.9	1,861.4	2206.2	2,271.7
Volume (millions of barrels)	100.7	100.2	103.1	97.8	111.4
(millions of metric tons)	13.1	13.0	13.3	12.6	14.4
Unit price (US\$ per barrel)	18.2	16.9	18.1	22.6	20.4
Liquefied petroleum gas (LPG)					
Value (millions of US\$)	535.3	475.0	582.9	818.7	987.0
Of which profit repatriation	0.0	0.0	0.0	6.3	19.6
Volume (millions of barrels)	41.2	40.7	40.8	45.9	59.6
(millions of metric tons)	3.5	3.5	3.5	3.9	5.0
Unit price (US\$ per barrel)	13.0	11.7	14.3	17.9	16.6
Liquefied natural gas (LNG)					
Value (millions of US\$)	1,642.7	1,379.7	1,401.0	1818.3	2,440.1
Volume (millions of m3 of LNG)	33.3	30.0	29.1	32.7	39.9
Volume (billion of m3 of NG equivalent)	20.0	18.0	17.4	19.6	23.9
Volume (billions of BTUs)	786.3	711.2	686.7	771.5	934.5
Unit price (US\$ per m3 of LNG)	49.3	46.0	48.1	55.6	61.1
Unit price (US\$ per million BTUs)	2.1	1.9	2.0	2.4	2.6
Natural gas (NG)					
Value (millions of US\$)	971.2	893.3	1,352.0	1647.0	1,990.9
Volume (billions of m3)	14.3	13.6	19.6	21.2	24.1
Volume (billions of BTUs)	562.6	507.5	730.8	787.7	903.1
Unit price (US\$ per m3)	65.1	66.4	69.8	78.9	82.5
Unit price (US\$ per million BTUs)	1.7	1.8	1.9	2.1	2.2
Total hydrocarbon receipts (millions of US\$)	9,590.1	8,606.4	9,728.2	12633.9	13,157.1
Crude petroleum					
	20.9	23.0	22.2	24.7	20.2
Other					
	79.1	77.0	77.8	75.3	79.8
Condensate					
	27.2	25.4	24.4	23.9	21.3
Refined petroleum products					
	19.1	19.7	19.1	17.5	17.3
Liquefied petroleum gas (LPG)					
	5.6	5.5	6.0	6.5	7.5
Liquefied natural gas (LNG)					
	17.1	16.0	14.4	14.4	18.6
Natural gas (NG)					
	10.1	10.4	13.9	13.0	15.1

Source: Algerian authorities.

Table 34. Algeria: Trade Indices, 1992–97

	1992	1993	1994	1995	1996	1997
(1980 = 100)						
Total export volume index	165.5	166.6	153.7	164.6	177.7	195.2
Nonhydrocarbon export volume index	167.1	146.5	82.3	140.2	155.6	188.5
Total import volume index	86.0	83.4	96.1	97.0	87.1	84.7
Food import volume index	133.0	133.8	173.4	151.1	131.6	133.2
Terms of trade index	50.5	47.6	43.5	42.3	50.2	51.9
(Annual percentage change)						
Total export volume index	3.2	0.7	-7.7	7.1	8.0	9.8
Nonhydrocarbon export volume index	11.3	-12.3	-43.8	70.4	11.0	21.1
Total import volume index	3.7	-3.1	15.3	1.0	-10.2	-2.7
Food import volume index	11.8	-0.1	29.6	-12.9	-12.9	1.2
Terms of trade index	-13.8	-5.7	-8.6	-2.8	18.7	3.2

Source: Algerian authorities.

Table 35. Algeria: Medium- and Long-Term External Debt, 1991-96 1/

	1991	1992	1993	1994	1995	1996
(In millions of U.S. dollars; end of period)						
Debt outstanding and disbursed	25,980	25,495	24,882	28,376	30,444	30,808
Official creditors	6,467	6,495	6,527	11,005	15,456	17,824
Multilateral	2,668	2,763	2,884	3,344	3,787	4,068
<i>Of which</i>						
IBRD 2/	1,413	1,474	1,512	1,709	2,049	1,939
Bilateral	3,799	3,732	3,643	7,661	11,669	13,756
Private creditors	19,513	19,000	18,355	17,371	14,988	12,954
Suppliers 3/	12,958	12,278	12,240	12,198	10,274	8,354
Financial markets	6,555	6,722	6,115	5,173	4,714	4,629
Disbursements	6,615	7,555	6,610	4,983	3,302	2,653
Official creditors	1,919	1,519	1,306	1,781	1,480	1,415
Multilateral	955	553	469	700	797	781
<i>Of which</i>						
IBRD 2/	347	268	176	300	554	286
Bilateral	964	966	837	1,081	683	634
Private creditors	4,696	6,036	5,304	3,202	1,822	1,236
Suppliers 3/	4,500	4,721	4,359	3,085	1,580	1,100
Financial markets	196	1,315	945	117	242	136
Principal repayments	7,223	7,074	7,060	3,389	2,379	1,932
Official creditors	1,292	1,243	1,283	697	676	614
Multilateral	392	342	358	439	455	395
<i>Of which</i>						
IBRD 2/	176	166	170	208	260	252
Bilateral	900	901	925	258	221	219
Private creditors	5,931	5,831	5,777	2,692	1,703	1,319
Suppliers 3/	4,577	4,737	3,997	1,864	1,207	1,142
Financial markets	1,354	1,094	1,780	828	496	177
Interest payments	1,788	1,815	1,701	1,531	1,734	2,058
Official creditors	356	391	386	394	812	1,277
Multilateral	154	197	206	206	256	282
<i>Of which</i>						
IBRD 2/	107	112	113	119	137	139
Bilateral	203	194	180	188	556	996
Private creditors	1,432	1,424	1,315	1,137	922	781
Suppliers 3/	887	973	883	745	657	581
Financial markets	545	451	432	392	265	200

Table 35. Algeria: Medium- and Long-Term External Debt, 1991–96 1/

	1991	1992	1993	1994	1995	1996
(In units indicated)						
Average terms of new commitments						
All creditors						
Interest (percent)	7.1	5.7	5.6	6.0	6.3	5.2
Maturity (years)	10.1	10.3	9.8	8.6	7.7	11.2
Grace period (years)	3.5	4.7	4.3	2.6	2.4	3.5
Grant element (percent)	11.7	19.8	17.2	12.0	10.6	20.8
Official creditors						
Interest (percent)	7.8	5.9	5.5	7.3	5.5	5.8
Maturity (years)	14.7	14.4	13.3	15.1	8.9	13.1
Grace period (years)	6.6	6.6	6.4	5.2	2.6	4.6
Grant element (percent)	13.5	24.1	23.2	13.1	13.0	21.0
Memorandum item:						
Concessional/total debt (percent)	3.2	3.8	4.5	6.8	9.5	9.8

Source: IBRD, Debtor Reporting System (DRS).

1/ Public and publicly guaranteed; no information is available on privately contracted debts, but to be small. Excludes use of Fund credit and debt owed to Russia estimated at Rub 2.4 billion.

2/ There has been no IDA lending to Algeria.

3/ Suppliers' credits comprise export credit guaranteed by an export credit agency as well as oth arranged directly with suppliers.

Table 36. Algeria: Medium and Long-Term External Debt
by Creditor, End-1997

	Millions of U.S. dollars	Percentage of Total	Percentage Excluding Multilateral Debt
France	4,516.61	14.54	17.90
Germany	1,456.57	4.69	5.77
Italy	4,188.46	13.48	16.60
Japan	1,912.56	6.16	7.58
Spain	1,814.76	5.84	7.19
United States	2,828.76	9.11	11.21
Other OECD	3,143.25	10.12	12.46
Others 1/	1,520.28	4.89	6.03
Multilateral	5,829.24	18.77	23.10
Private	3,849.72	12.39	15.26
Total	31,060.21	100.00	
Total excluding multilateral	25,230.97		100.00

Source: Algerian authorities.

1/ Excludes debt to Russia.

Table 37. Algeria: Nominal and Real Effective Exchange Rate, 1990–98

	QI	QII	QIII	QIV
	(QI-1990 = 100)			
Nominal effective exchange rate				
1990	114.9	110.3	95.3	79.5
1991	54.4	52.4	52.3	40.2
1992	40.3	40.5	39.6	40.9
1993	41.8	41.6	41.9	42.3
1994	42.4	28.0	24.9	22.9
1995	21.9	14.2	13.0	12.9
1996	17.5	17.5	17.1	17.2
1997	18.0	18.4	18.7	18.7
1998	18.9	...	...	...
Real effective exchange rate				
1990	107.7	110.0	96.7	85.5
1991	61.4	61.4	63.4	52.5
1992	55.1	60.2	63.3	66.7
1993	70.4	72.6	74.6	77.6
1994	83.1	59.0	56.4	55.3
1995	56.6	53.2	51.1	51.7
1996	53.0	55.1	54.5	55.4
1997	57.9	58.8	60.6	61.6
1998	62.7	...	...	...

Source: IMF (Information Notice System).

Table 38. Algeria: Estimate of Algeria's Hydrocarbon Net Wealth.

	Real oil prices (U.S. dollars per barrel)		
	13	15	17
(In percent of GDP)			
Present value of net oil wealth 1/	355.8	444.7	533.7
"Usable" oil revenue to maintain per capita oil wealth constant	12.1	15.1	18.1

Source: Fund staff estimates.

1/ Assumes a reserve amount of 33 billion barrel, extraction rate of 5 percent, a real interest rate of 3.5 percent, a production cost of US\$5 per barrel, and an extraction amount in the initial period of 0.7 billion barrel.

REFERENCES

- Aghevli, Bijan B., Khan Mohsin S., and Montiel Peter J., 1991, "Exchange Rate Policy in Developing Countries: Some Analytical Issues," *Occasional Paper* (Washington: International Monetary Fund).
- Boughton, James M. 1991. "Commodity and Manufactures Prices in the Long Run." *IMF Working Paper* WP/91/47 (Washington: International Monetary Fund).
- Chalk, Nigel. 1998. "Fiscal Sustainability with Non-Renewable Resources." *IMF Working Paper* WP/98/26 (Washington: International Monetary Fund).
- Collier Paul, and Gunning Jan Willem, 1996, "Policy Towards Commodity Shocks in Developing Countries," *IMF Working Paper* WP/96/84 (Washington: International Monetary Fund).
- Edwards Sebastian, 1987, "Tariffs, Terms of Trade, and the Real Exchange Rate in an Intertemporal Optimizing Model of the Current Account," NBER Working Paper Series, Working Paper No. 2175.
- Collier Paul, 1996, "Policy Towards Commodity Shocks in Developing Countries," IMF Research Department Seminar (Washington: International Monetary Fund).
- Ghosh Atish R., and Ostry Jonathan D. 1994. "Export Instability and the External Balance in Developing Countries." *IMF Working Paper* WP/94/8 (Washington: International Monetary Fund).
- Ghosh Atish R., and Jonathan D. Ostry. 1995. "The Current Account in Developing Countries: A perspective from the Consumption-Smoothing Approach." *World Bank Economic Review*, Vol. 9, No. 2: 205-333. (Washington: The World Bank)
- Horne, Jocelyn, 1991, "Indicators of Fiscal Sustainability," *IMF Working Paper* WP/91/5 (Washington: International Monetary Fund).
- Khan, Mohsin S., and Ostry Jonathan D., 1992, "Response of the Equilibrium Real Exchange Rate to Real Disturbances in Developing Countries," *World Development*, vol. 20, pp. 1325-1334.
- Khan, Mohsin S., and Ostry Jonathan D., 1991, "Response of the Equilibrium Real Exchange Rate to Real Disturbances in Developing Countries," *IMF Working Paper* WP/91/3 (Washington: International Monetary Fund).

- Kouwenaar Arend, 1991, "Price and Volume effects of a Devaluation in Developing Countries," *IMF Working Paper* WP/91/130 (Washington: International Monetary Fund).
- Liuksila, Clair, Alejandro García, and Sheila Bassett. 1994. "Fiscal Policy Sustainability in Oil-Producing Countries." *IMF Working Paper* WP/94/137 (Washington: International Monetary Fund).
- Ostry, Jonathan D., 1998, "The Balance of Trade, Terms of Trade, and Real Exchange Rate," *Staff Papers*, Vol. 35.
- Ostry, Jonathan D., and Carmen M. Reinhart. 1992. "Private Saving and Terms of Trade Shocks." *IMF Staff Papers*, Vol 39, No. 3. September (Washington: International Monetary Fund).
- Reinhart Carmen M., Wickham Peter. 1994. "Commodity Prices: Cyclical Weakness or Secular Decline?" *IMF Working Paper* WP/94/7 (Washington: International Monetary Fund).
- Rosenberg, Christoph B., and Saavalainen Tapio O., 1998, "How to Deal with Azerbaijan's Oil Boom? Policy Strategies in a Resource-Rich Transition Economy," *IMF Working Paper* WP/98/6 (Washington: International Monetary Fund).
- Takarick, Stephen. 1994. "External Shocks, the Real Exchange Rate, and Tax Policy." *IMF Working Paper* WP/94/88 (Washington: International Monetary Fund).
- Tersman, Gunnar. 1991. "Oil, National Wealth, and Current and Future Consumption Possibilities." *IMF Working Paper* WP/91/60 (Washington: International Monetary Fund).