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INTRODUCTION

The Need for a Policy Review

1. The National Education Policy 2008 (the “Policy”) comes in a series of education policies dating back to the very inception of the country in 1947.
2. Two main reasons prompted the Ministry of Education (MoE) to launch the review in 2005 well before the time horizon of the existing policy framework (1998 - 2010)¹ had approached. Firstly, the policy framework has not served as a satisfactory guide, as the policies pursued under that framework had not produced the desired educational results. Performance of the education sector has been deficient in several key aspects, most notably in access rates, and in quality and equity of educational opportunities.
3. Secondly, new international challenges like Millennium Development and Dakar Education for All (EFA) goals, have gained greater momentum in the intervening years and demanded fresh consideration. These challenges are triggered by globalisation and nation’s quest for becoming a “knowledge society”. Besides, some compelling domestic pressures such as devolution of powers, economic development and demographic transformations have necessitated a renewed commitment to proliferation of quality education for all.
4. It was keenly felt by all levels of government that deficiencies of the education sector posed long term risks to Pakistan’s quest for modernisation. Besides, the problems afflicting Pakistan’s education called for a fundamental re-orientation of the system, not its marginal tempering, which needed to be spelled out through a wide-ranging consultation process. Even though some fundamental reforms may be implemented gradually over time, their direction needed to be charted out early, forming the basis for more detailed plans of action and co-ordinated implementation mechanism.

Background and Process

5. The Policy is based on a lengthy process of consultation initiated in 2005, in line with the roadmap endorsed by the IPEM. The review exercise was conducted in close co-operation with all stakeholders, particularly the Provincial, Area and District governments. Several in-depth research studies were commissioned to feed into the process. To garner focused discussions, a series of 23 green papers were prepared on different topics by NEPR team and widely disseminated to stimulate discussion and get feedback. The process included field visits to 31 representative districts, one national and seven provincial/area education conferences, ten issues based focused group discussions and extensive consultations with educationists from all over Pakistan. With further consultations, the results were summarised in a pre-policy ‘White Paper’² and circulated for comments. The final policy document benefits from a further round of

¹ *National Education Policy: 1998-2010*, Ministry of Education, Government of Pakistan, Islamabad, 1998.

² *Education in Pakistan: A White Paper*, Document to Debate and Finalize the National Education Policy, National Education Policy Review Team, Ministry of Education, Government of Pakistan, Islamabad, 2006.

comments from all stakeholders including the Provincial and Area Governments. The findings and recommendations are the consensus emerging from the consultations and represent a national view.

6. The NEP review process has adopted a long term perspective for assessing the education sector's performance and for charting its future course. While it is expected that some of the results of the reforms and policy actions to be taken bear fruit only over a long term, it is emphasised that action is needed now if those expectations are to become a reality in the future.

7. The purpose of the Policy is to chart out a national strategy for guiding education development in Pakistan. Some of the policy actions outlined have already been initiated in reforms during the process, most notably in the domains of curriculum development, textbook/learning materials policy and provision of missing facilities. The Policy takes account of these ongoing reforms and integrates them in a comprehensive set of recommendations.

8. The success of the policy actions outlined will undoubtedly lie in its implementation. The Policy fully recognizes the centrality of Provinces/Areas in fruitful realization of a national educational vision. It is therefore envisioned that the Strategies and Implementation Plans will be developed and executed by the Provincial and Area Governments. The role of the Federal Ministry of Education will be that of a coordinator and facilitator so as to ensure sectoral and geographic uniformity in achievement of educational goals nationally.

9. Given the national scope of the Policy, a reinvigorated Inter-Provincial Education Ministers' Conference (IPEM) will be the steering and overseeing body for implementation. In this respect, the Policy considers the Federal-Provincial collaborative effort, already initiated, as the key to success.

10. The education strategy of a modern state must be comprehensive in both its horizontal and vertical dimensions. On the horizontal axis, education policies ought to be fully integrated with other socio-economic policies, both at national and sub-national levels and the Policy proposes actions to achieve this integration. In the vertical dimension, it is necessary to adopt a sector-wide approach that takes account of all the linkages between different components of the sector.

11. The objective of this policy document is to achieve following vision of the STATE on Education:

"Education is a categorical imperative for individual, social and national development that should enable all individuals to reach their maximum human potential. The system should produce responsible, enlightened citizens to integrate Pakistan in the global framework of human centered development."

12. Chapter 1 lays out the current state of Pakistan's education sector. Available indicators are assessed against data in comparable countries. Chapter 2 identifies two fundamental causes that lie behind the deficiencies in performance, and outlines the way forward that consists of system-wide and sub-sector level reforms. Chapters 3 and 4 chart out ways of improving performance at the sector-wide or system level, while Chapters 5 and 6 outline reforms and policy actions to be taken at the sub-sector level.

CHAPTER 1.

THE STATE OF PAKISTAN'S EDUCATION

13. Taking stock of the current situation is an indispensable part of any policy development exercise as a mean of identifying areas of policy intervention. This chapter provides a brief review of Pakistan's education system through indicators of access, equity, quality, resources, and structure of the education system. The latest available profile is complemented by information on how some of the indicators have evolved over the recent years. The chapter also provides a comparison with a selected group of countries that could be regarded as benchmark or reference countries.

1.1 ACCESS TO EDUCATIONAL OPPORTUNITIES

14. Gross Enrolment Ratio (GER) for early childhood education (ECE) rose quite remarkably from 36% of all children aged 3-4 years in 2001-02 to 91% in 2005-06³. This is significant progress, and the EFA mid-term targets for ECE have been met, although there remain questions about the quality of provision in so-called "Kachi" class.

15. There was considerable progress as well, at the primary level, where the Gross Enrolment Ratio rose from 71% for 2001-02 to 84% in 2005-06. Progress is evident in the Net Enrolment Rate (NER) as well, which measures enrolment as a percentage of all children in the required grade-specific age. Primary school NER rose from 57% in 2001-02 to 66% in 2005-06. There has been good progress in cutting down the drop-out rates in public sector, which fell from 43% in 2001-02 to 28% in 2005-06 for the Primary sector. Despite the progress, however, the 66% rate is below mid-term NER target (79% for 2005-06).

16. Participation at the secondary school level has also improved: the GER and the NER rose, respectively, from their levels in 2001-02 of 24% and 20%, respectively, to reach 31% and 24%. Enrolment ratio in tertiary education, which was 2.5% for 1999-2000, rose significantly to its 3.7% level in 2005-06.

17. During 2005-06, literacy rate for all adults 15 years old and over rose to 52% and for young adults (aged 15-24 years) to 67% in 2005-06. Both these rates show improvements from their 2001-02 levels, of 43% and 62% respectively⁴.

18. Despite the progress, the 2005-06 participation and attainment levels are disappointingly low. Some one-third of primary school age children remain out of school, a proportion that rises to some three-quarters for secondary school children. Clearly, Pakistan is some distance away from achieving universal schooling, even at the primary level.

³ *Education for All: Mid Decade assessment, Country Report: Pakistan, Statistical Analysis*, Ministry of Education, Government of Pakistan, Islamabad, 2007.

⁴ *ibid*

19. An equal concern is that except for ECE, Pakistan's performance on GER and NER lags behind its neighbours from the primary level and above. The performance on primary completion rate is particularly weak, and Pakistan's adult literacy rate (49.9%) is lower than the rate for countries like Sri Lanka (90.7%), Iran (82.4%), Indonesia (90.4%), Viet Nam (90.3%), Egypt (71.4%) and India (61%) for 2004-05⁵.

20. Low access rates can also be attributed to the lack of confidence in the public sector schools to deliver quality education which has convinced parents either to shift their kids to private schools or absorb additional financial burden by arranging private tuitions. Where neither is affordable the households prefer to have their children drop out from school and join income earning activities. The average student of the public sector education system cannot compete in the job market. This leads to social exclusion of the already poor. The decline has primarily resulted from political interference and corruption that has permeated the entire sector. Recruitments, transfers and postings became politically driven. Absentee teachers and ghosts schools have discovered under various exercises. Cheating in examinations is a widespread phenomenon. Primary sufferers are the most poor and underprivileged in the system. Those who make it to higher education in the public sector cannot get employment due to absence of merit or poor quality of their educational abilities.

1.2 EQUITY IN EDUCATION

21. The averages for Pakistan, noted above, mask large differences in access across gender, ethnic minorities, provinces, regions and rural-urban divides. This results in weaker performance on equitable distribution of educational opportunities. It is common knowledge, as well as a proven outcome of many studies that discrimination exists in the education system in various forms. The inequity has been the result of poor implementation and social customs. Over the years, little attention has been paid to rectify the situation. The issue of equity runs through the entire education system and has serious implications for sustainable and equitable development in the country. Unless the issue is seriously recognized and assessed in all its manifestations, a realistic policy to relieve the situation will not evolve.

22. Data reported below, which are limited to gender and rural urban and provincial disparities, show that females and pupils in rural areas face systematic disadvantage at all levels of education. The intersection of these dispersions compounds the disadvantage for some groups; the disadvantage faced by female students becomes multiplied if the female student happens to be in a low performing province or region.

1.2.1 The Gender Dimension

23. In 2005-06, the Gender Parity Index (GPI) for primary education was below the parity level 0.82 for both GER and NER. These figures showed significant improvements from their 2001-02 figures of 0.72⁶. The Index falls for the secondary

⁵ *Human Development Report 2007/2008*, UNDP, The World Bank, 2007

⁶ *Education for All: Mid-Decade assessment, Country Report: Pakistan*, Ministry of Education, Government of Pakistan, Islamabad, 2007.

level to 0.77 (GER and NER) but, again, registers improvement from their 2001-02 level of 0.73. Despite improvements, it is evident that those girls continue to face significant disadvantage in access as they reach adulthood. The situation improves significantly for higher education, where in some subject areas the index is in favour of females. Further positive features for gender parity come from the survival rates for young girls reaching Grade 5, where the GPI (1.02) reveals a marginally better result than for young boys. Young girls do better, as well, in transition rates between primary and secondary education (1.07).

24. Gender Parity Indices for adult literacy rate rose from 0.51 in 2001-02 to 0.58 in 2005-06 and for youth literacy rate, it remained at the same level of 0.72 in the same period. Proportion of female enrolment in vocational education is at 38%. Females are particularly under-represented in rural areas (36% versus 43% for urban areas), a feature that also holds for secondary education (35% for rural and 48% in urban areas)⁷. Female teachers make up only 47% of primary school teachers, rising to 55% in secondary schools, but with only 31% in TVE⁸.

1.2.2 The Rural-Urban Divide

25. The relative disadvantage of the rural areas compared to the urban becomes evident from the secondary level and above. At the early childhood education level, the GER for urban areas (88%) for 2005-06 was actually below the figure for rural areas (93%), and, at the primary level, the GER for urban areas (85%) was only slightly better than the 84% for rural areas. The rural disadvantage at the secondary level is rather large: (48% urban versus 22% rural). The percentage gap between the two areas has widened from 20 points in 2001-02 to 26 points in 2005-06⁹.

26. More surprisingly, rural provision also performs better on some efficiency measures. Grade 1 repetition rates for rural areas, was better than the urban rates (2.25 versus 3.1%), a comparison that holds through to other primary level Grades. The differential for Grade 5, was 2.0% versus 2.9% in favour of the rural areas. In terms of the survival rate to Grade 5, however, rural areas are at a significant disadvantage, where the survival rate is only 67% compared with 94% in the urban setting. On the other hand, in terms of teacher input, the pupil teacher ratio (PTR), is favourable for rural primary schools (39 pupils per teacher) compared with the urban (43 pupils per teacher). This is reversed for secondary schools, where the ratio of 12 pupils per teacher in urban areas is better than for rural secondary schools (18 pupils per teacher).

27. The rural schools suffer more from poor facilities: while 90% of urban schools benefit from water sources, only 63% of rural schools do so. A similar disadvantage pertains to sanitation facilities, which are available to 88% of urban schools but only to 56% of schools in the rural setting.

⁷ *ibid.*

⁸ National Education Census 2006

⁹ The source for data in the section (paras 21-24) is from *Education for All: Mid-Decade assessment, Country Report: Pakistan, Statistical Analysis*, Ministry of Education, Government of Pakistan, Islamabad, 2007.

1.2.3 Provincial and Area Disparities

28. There are large disparities in access and quality measures across Provinces and Areas. A common pattern is for Sindh or Punjab to be at the top of the league, while Balochistan is a weak performer among the Provinces. During 2005-06, at the primary school level, the NER for Punjab (68%), Sindh (67%) and NWFP (66%) with Balochistan showing up at 40%. Similarly for NER at secondary level, Punjab (26%) has more than twice as high an enrolment rate compared with Balochistan (11%) and FATA (11%). For GER at secondary level, Balochistan has a GER of 15%, FATA scores a low GER of 14%, while the rate is highest in ICT at 82%. On literacy measures as well, the pattern is similar. Literacy rates for young adults are highest in Sindh (71%) and lowest in Balochistan (48%). Considering all adults, literacy rates are highest for Sindh (55%) and lowest for Balochistan (37%)¹⁰.

1.3 QUALITY OF PROVISION

29. Through the recent introduction of the National Education Assessment System (NEAS) in 2005 it has become possible to assess quality of educational outcomes at school level on a scientific and quantitative basis¹¹. The NEAS 2005 assessed Grade 4 students in the subject domains of Urdu and Mathematics, which was expanded to include Science and Social Studies in NEAS 2006. Grade 8 students were assessed in Mathematics and Language in NEAS 2007.

30. The 2005 results show that the average score of Grade 4 students in Urdu (369) and Mathematics (421) was well below the scaled average of 500. The 2006 results confirm that the average score of Grade 4 students was less than 50% of the possible marks in each of the four subjects tested¹². The results from NEAS 2007 for Grade 8 students give slightly better results for Urdu but again show that the average score of students is below the 50% mark in Mathematics¹³.

31. An international comparison confirms the relatively poor quality of Pakistan's education. The NEAS 2005 score for Pakistani students are well below the international scaled mean of 495 in the TIMMS assessment. Pakistani students perform relatively poorly compared to their counterparts in all other countries in the study excepting Iran, Philippines, Morocco and Tunisia.

32. Two measures of input quality are also available: qualifications of the teaching staff and the Pupil-Teacher Ratio (PTR). In regard to teacher quality, about 47% of ECE teachers have the required qualifications, a rate that jumps to 100% at the primary

¹⁰ ibid

¹¹ *National Assessment Report 2005*, National Education Assessment System, Ministry of Education, Government of Pakistan,

¹² *National assessment Findings 2006*, National education Assessment System, Ministry of Education Government of Pakistan,

¹³ *National assessment Findings 2007: Mathematics and Language, Grade VIII*, National education Assessment System, Ministry of Education Government of Pakistan, mimeo 2006

and secondary levels¹⁴. These data must be interpreted with caution, as the standards for qualifications at this level are widely believed to be unsatisfactory.

33. The PTR works out to a high of 40 for primary schools and 15 for the secondary. Pakistan does well in terms of trained teachers and its pupil/teacher ratio is not as high as for India and Bangladesh, indicating better resource support¹⁵.

34. The survival rate to grade 5 is 72%¹⁶, that is, more than a quarter of students entering primary education do not reach the last grade. Considerable progress has been made since 2001-02 when the survival rate was 57%. Despite progress in absolute terms, Pakistan's performance is weakest in comparison with its neighbours excepting Bangladesh¹⁷.

35. The problem of drop out rates is severe, as it adds to the number of out of school children. More than 31% drop out during the primary level; some 16% after the middle level; another 16% after the secondary phase and yet another 16% during the higher secondary phase during 2004-05¹⁸.

36. Repeat rates are another measure of internal efficiency of the education system. The overall repeat rates for Grade 1 to 5 are between 2.1 to 2.6 and typically highest for the first Grade and Grade 5. Repeat rates are generally lower for young girls¹⁹. On this measure, Pakistan's experience is not too dissimilar from its reference countries²⁰.

37. National Education Census 2005 reveals that most schools are sparsely equipped. Library facilities, computer resources, sports and recreation facilities are poor. However, the paucity of facilities can be gauged from the fact that only 69% of schools have drinking water and only 63% sanitary facilities; and many schools do not have boundary walls²¹. However, progress has been recorded in each of these areas since 2000.

38. In regard to the quality of the labour force produced by the higher education sector, the number of researchers per million people one is often used as an indicator. The number for Pakistan (75) is considerably lower than some of its reference countries such as Iran (1,279) and India (119).²²

¹⁴ *Education for All: Mid-Decade assessment, Country Report Pakistan*, Ministry of Education, Government of Pakistan, Islamabad, 2007.

¹⁵ *World Development Indicators 2007*, The World Bank, 2007.

¹⁶ *Education for All: Mid-Decade assessment, Country Report Pakistan*, Ministry of Education, Government of Pakistan, Islamabad, Table 2.12, 2007.

¹⁷ *World Development Indicators 2007*, The World Bank, 2007.

¹⁸ *Reforms: Education Sector 2004-2007*, Ministry of Education, Government of Pakistan, 2007.

¹⁹ *National Education Census: Highlights*, Ministry of Education, Government of Pakistan, 2006.

²⁰ *Education for All by 2015: Will we make it? EFA Global Monitoring Report 2008*, UNESCO, 2007.

²¹ *National Education Census: Highlights*, Ministry of education, Government of Pakistan, 2006.

²² *Human Development Report 2007/2008*, UNDP.

1.4 THE RESOURCE COMMITMENT

39. Financial resources for education come largely from the public sector, which spends 2.5% of the GDP (2006-07) on education. A further 0.5% is estimated to be the contribution of the private sector, putting the combined resources at around 3% of GDP for 2006-2007²³. Although both public and private contributions have increased over the years (as a proportion of the GDP), there has been some increase in this proportion over the recent years, from the comparable figure of 2.2% in 2000-2001, revealing a slight upward trend.

40. The data on public expenditure on education reveal the low priority Pakistan gives to education: it spends relatively less on education (2.3%) than countries like Iran (4.7%), Malaysia (6.2), Thailand (4.2%), South Korea (4.6%), India (3.8%), and Bangladesh (2.5%)²⁴.

41. In terms of cost structure by type of provision, the annual expenditure per pupil in the public sector for 2005-06 amounts to Rs. 6,436 at the primary school level, rising to 6,815 for secondary education and 40,332 for the tertiary level²⁵. The data also show the large rise in tertiary costs over the period 2003 to 2006.

42. In terms of disbursements to various components of the education sector, the primary sector accounts for some 44%, the secondary sector 24 %, and some 13% goes to the tertiary sector, the rest being claimed by other sectors²⁶. Expenditures on the primary and secondary education, therefore, amount to some five times more than the expenditure on the tertiary sector. These ratios vary a great deal among countries, since they depend on a large number of country specific factors such as the demographic profile, cost per student in different sectors, the state of development of different sectors, and the needs of the economy. In comparison, the share of the tertiary sector in the developed economies is, on average, 2.7 times larger than for non-tertiary sectors, though the ratio varies widely among countries²⁷.

1.5 STRUCTURE OF EDUCATION: PUBLIC-PRIVATE PROVISION

43. The private sector contributes some 0.5% of the GDP to education, about one-sixth of total financial resources. The private sector institutions can be for profit or not for profit and religious/missionary. They offer mainstream education as well as religious education through Deeni Madaris. The medium of instruction employed by the educational institutions is predominantly Urdu (65%). This percentage is higher for public institutions (68%) compared with the private sector institutions (57%)²⁸.

44. The public sector accounts for around 64% of all enrolments and dominates the structures of Primary Schools, Secondary and Higher Secondary Schools, Inter and

²³ *Reforms: Education Sector 2004-2007*, Ministry of Education, Government of Pakistan, 2007.

²⁴ *World Development Indicators 2007*, The World Bank, 2007.

²⁵ P&P Wing, Ministry of Education

²⁶ *EFA Mid-Decade Assessment 2007, Country Report: Pakistan*, Ministry of Education, Government of Pakistan.

²⁷ *Education at a Glance 2007, OECD Indicators*, OECD, 2007.

²⁸ *National Education Census: Highlights*, Ministry of education, Government of Pakistan, 2006.

Degree Colleges, and general Universities. While the overall share of the private sector in total enrolment is around 36%, its enrolment share is 42% in pre-primary education, Primary stage 32%, middle stage 33%, high 30% and higher secondary 18%, Technical/Vocational (52%), Vocational/ Polytechnics (57%), Non-Formal Basic Education (61%) and Deeni Madaris (97%)²⁹.

45. The private sector's role has been expanding in recent years. While there are several causes for this relative growth, it is partly a reflection of the shortcomings of the public sector to provide quality education.

²⁹ *ibid.*

CHAPTER 2.

NATIONAL EDUCATION POLICY: OVERARCHING CHALLENGES AND RESPONSES

2.1 BACKGROUND

46. Education is a living system that gets impacted by the environment within which it exists. These environmental factors can be domestic as well as international. Changes in technology, business systems and general global environment, all require policy responses. Traditions, culture and faith all reflect upon the education system while at the same time get affected by it. The element of continuity and change remains perpetual and it is up to a society to determine its pace and direction.

47. The societal, political and governmental structures also impinge on the effectiveness of the education system. An education policy cannot be prepared in isolation of these realities. The current policy therefore identifies some of the overarching challenges and proposes policy options, within the context of the education system.

48. Cultural values of the majority of Pakistanis are derived from Islam. An education system reflects and strengthens social, cultural and moral values. Pakistan's educational interventions have to be based on the core values of faith.

49. The National Education Policy recognizes the importance of Islamic values and adheres to the agreed principles in this regard. All policy interventions shall fall within the parameters identified in the Principles of Policy as laid down in Articles 29, 30, 33, 36, 37 and 40 of Constitution of Pakistan 1973. These include the need for Muslim children to be provided instructions in Islamiat to enable them to develop themselves as good Muslims. Similarly, minorities should be provided with facilities to get education of their own religion.

2.2 THE DEMOGRAPHIC TRANSITION

50. Recent studies on demographic trends reveal that economists have begun to focus on the impact of changing age structure of the population. The interest in relation between population change and economic growth has again caught light due to the demographic transition taking place in the developing countries, which offers potential economic benefit by changes in the age structure of the population during the demographic transition, owing to an increase in working age population and associated decline in the dependent age population. In fact, different age groups in a population have different economic implications. The young need investment in health and education, adult supply labor, income and savings and at old age there is a need for retirement income and again investment in health. East Asia witnessed a dramatic and rapid demographic transition over the last four decades.

51. According to Population Census, the dependent population (below 15 years and above 65 years) was 51.2% in 1981, and 53.1% in 1998 which according to UN

population projections, fell to 42.7% in 2004 and will further fall to 38.3% in 2015. Similarly, the working age population which was 48.8% in 1981 and 46.9% in 1998 surged to 57.3% in 2004 and it's expected to reach 61.7% by 2015, demographic transition is taking place though currently at a slower pace. It poses enormous challenge for the government to manage the economy in such a way that the transition benefits Pakistan.

2.3 UNIFORMITY AND CONFIDENCE IN PUBLIC EDUCATION SYSTEM

52. The imperative of uniformity in Pakistan's educational system flows from the Constitution of Pakistan, which entrusts the State with the responsibility of organizing an equitable and effective education system, with an aim to enhance the overall well being of Pakistanis. The national educational systems in different countries have evolved with the state in such a way that they appear to flow from each other. That is the reason modern states have one educational system, customarily called the 'national educational system'. No other system in a State, except the national educational system, shares the ideals, objectives, and purpose of a State. The institution of Education in fact, acts as the repository of the trust that the citizens have in the State, mediating the achievements of the past with the aspirations of the future for all the citizens of any given State. It is this correlation between the State and the Educational System, which bestows the singularity to the national educational system, making it a unified and unifying entity. To promote and protect this uniformity, the national educational systems strive to establish the uniformity in structures and modes of education throughout the country. As the national educational systems also evolve as a response to the particular demands of distinct ethnic, social, economic, religious, political groups and communities, there is always room for diversity. This diversity can lend strength to the educational outcomes, especially in a federation like Pakistan, if this does not work at cross purposes with the uniformities, which any national system would need to retain its uniformity and to be able to offer a national response to challenges, which have the potential and possibility of affecting whole of the country such as the loss of competitiveness, extremism, security threats, and subversion of national values, etc.

53. Aware of the importance of the local cultural context, the new National Educational Policy supports the reflection of the local cultural contexts through curricula and through the usage of the vernacular as a medium of instruction at the early stages of education, as enshrined in Pakistan's Constitution.

54. The emergence and continued presence of parallel systems of education in Pakistan i.e., private schools and *madaris*, apparently violates the principle of the uniformity of the educational system adversely.. The Policy is aware of the historical context which favored the emergence of these parallel systems and endeavors to encourage these systems to blend in the national educational system in such a way that they strengthen the uniformity of the national educational system, especially in terms of Curricula, Educational Standards, Costs and Conditions and Learning environment. The provision of educational services is a public function. The Constitution of Pakistan expects the public sector to take lead in performing this public function. The relative failure of the governmental educational system has resulted in the emergence of the

alternative education provider i.e., the private sector. When, a private educational institution is providing educational services for a fee or as a public good, with an almost total administrative autonomy, it remains a public function. The assurance of uniformity therefore would remain the responsibility of the State. It can do it entirely on its own or can develop public-private partnerships to ensure that the exigency of uniformity in standards and purpose of education is not compromised.

55. The loss of uniformity in our educational system is best evidenced in the lack of beneficial and synergetic linkages between the Technical, Vocational, Professional and scientific education sub sectors. If Pakistan has to become a talent rich country, it needs to integrate and gel all the four with the national educational system.

56. Governance refers to the way in which any social unit – from society as a whole to the smallest community organization – organizes itself politically to undertake a range of public functions. Governance in the educational system is very weak. The Educational Policy, informed by the ideals of democratic governance, which implies a partnership between the principal societal actors in the making and implementation of public policy, would try to effect a better allocation and management of public resources, wherever necessary involving the private sector.

57. The unity of objectives of our educational efforts - is it in the public or private sector - is spelt through the over-arching principles of access, quality, affordability and relevance. The way the Pakistani educational system has developed over time, we do notice a certain dispersion of the objective of the unity, manifesting itself in the form of parallel educational systems and their equivalence, and the issues of medium of instruction, and representation of minorities, etc. The Policy is guided by the principle of creating a minimum level of uniformity in order to protect the uniformity of the Pakistan's educational system as a tool of social progress and of all round development in an increasingly globalized and competitive world.

58. English is an international language, and important for competition in a globalized world order. Urdu is our national language that connects people all across Pakistan and is a symbol of national cohesion and integration. In addition, there are mother tongues / local vernaculars in the country that are markers of ethnic and cultural richness and diversity. The challenge is that a child is able to carry forward the cultural assets and be at the same time able to compete nationally and internationally. Globalization and Competitiveness

59. Globalization is not a new phenomenon but its pace in recent years has been unprecedented. This has created opportunities and challenges for countries all over the world. An education system cannot remain in isolation of these challenges and opportunities. Unfortunately, a comprehensive national analysis and debate on the potential impact and possible benefits of globalization has been a major deficit. Work that has been undertaken has been confined to the business sector. Even here the feedback into the education system to develop a desired response has been missing. Other aspects of globalization like media and culture have been ignored.

60. The relevance of education to global competitiveness can be seen in the table from the Global Competitive Index (GCI), given below. Pakistan has been compared with its

major competitors in an international context. (Higher the number assigned to a pillar, the lesser the performance.)

GCI Pillars and Comparators

Pillars/ Parameters	Pakistan	Bangla Desh	China	India	Malaysia	Sri Lanka
1. Institutions	79	121	80	34	18	82
2. Infrastructure	67	117	60	62	23	76
3. Macro-economy	86	47	50	88	31	110
4. Health and Primary	108	90	55	93	42	36
5. Higher Education and	104	108	77	49	32	81
6. Market Efficiency	54	83	56	21	09	71
7. Technological Readiness	89	114	75	55	28	83
8. Business Sophistication	66	96	65	25	20	71
9. Innovation	60	109	46	26	21	53

Source: The State of Pakistan's Competitiveness 2007, Competitive Support Fund, USAID, Ministry of Finance, Government of Pakistan, 2007.

61. It can be seen that in education and health related indicators Pakistan falls behind all other countries. It has to be realized that even the sustainability and improvement of other indicators depends on education.

62. Important products and enablers of globalization have been technologies like the internet and satellite television. This impact has overtaken the perceptions of the policymakers most of whom grew up in an era when these technologies did not exist. These are important tools of education as well as potential detriments to the objectives of national education. There has been no analysis to comprehend its potential impact on children both in the positive as well as negative aspects.

2.4 SOCIAL EXCLUSION AND SOCIAL COHESION

63. Education is not only about the individual, it has a societal role --a societal role of selecting, classifying, distributing, transmitting and evaluating the educational knowledge, reflecting both the distribution of power and the principle of social contract. In a country with alarming inequities of income and opportunities, reducing the social exclusion needs to be one of the principle objectives of the Policy. The educational system in Pakistan is accused of strengthening the existing inequitable social structure as very few people from the public sector educational institutions could move up the ladder of social mobility. If immediate attention is not paid to reduce the social exclusion and moving towards inclusive development in Pakistan through emancipatory education, Pakistan can face unprecedented social upheavals.

64. Almost all the past educational policies talk about the role of education as a tool of social reform and social development. But all these policies have not been able to significantly contribute to increase social inclusiveness by ensuring social mobility through education and training. Educational system is supposed to ensure the right of an

individual to grow in income and stature on the basis of his/her excellence in education and training.

65. Uneven distribution of resources and opportunities and apprehensions of sliding down on the scale of poverty promote social exclusion. Increased levels of social exclusion express itself in different forms like ethnic strife, sectarianism and extremism, etc. Social exclusion or extremism is not exclusively a function of the curriculum but a host of factors like poverty, inequity and identity crisis contribute to it and it becomes such a huge challenge that calls for a comprehensive response on urgent basis.

2.5 SETTING STANDARDS FOR EDUCATION

66. A key deficit is absence of clearly articulated minimum standards for most educational interventions and their outcomes. Even where these are established, there is no measurement or structured follow up. As a result, impact of the interventions remains subject to anecdotes or speculation and the true picture never emerges. Since standardization has not been part of the governance culture, relevant indicators have not been developed. Only recently the National Education Management Information System (NEMIS) has begun the process of computing indicators. Though even these indicators are those that have been internationally identified and developed by UNESCO or some of the donors for cross-cutting international programs like Dakar Framework of Action for EFA and Fast Track Initiative (FTI) for EFA. Indigenous requirements on a scale have not been assessed.

2.6 DOVETAILING GOVERNMENT INITIATIVES

67. Recently many new initiatives have been taken by the government aiming at providing missing facilities. Traditional approach of improving infrastructure and providing brick & mortar is no doubt necessary, but not sufficient for quality education delivery and sustainable economic development in the existing burgeoning global competitive milieu. Although some initiatives also focus/ target on improving teaching quality and learning environment, building capacity of education managers and administrators, etc. Apart from the Ministry of Education, many other initiatives have been launched in the recent past by different Ministries, organizations and departments like National Commission for Human Development (NCHD), Higher Education Commission (HEC), National Vocational & Technical Education Commission (NAVTEC), MoSW & SE, Labour & Manpower Division, to develop the Human Resource of Pakistan in a bid to meet the emerging challenges. It has been observed that some of these good initiatives are working in isolation from each other, thus not adding much value to the national objectives. These programs need to dovetail in such a way that their impact is multiplied and we get best return on our investment and efforts.

2.7 LEVERAGING INTERNATIONAL DEVELOPMENT PARTNERSHIPS

68. International development partners are providing generous support to education sector in Pakistan. Different donors have different focus in terms of programmatic emphasis and geographical coverage. However, at times their projects overlap in an

unbefitting manner or their programmatic focus and emphasis bring limited value addition to the objectives of the government. Getting optimum value from these investments has become a challenge in the absence of institutionalized mechanisms for donor coordination. In order to help and optimize the partnership with international development agencies, it is important to review the guiding national policy framework, and fine tune it to meet the national goals.

DRAFT

CHAPTER 3.

MAJOR DEFICIENCIES: THEIR CAUSES AND THE WAY FORWARD

69. The foregoing analysis reveals that Pakistan has made progress on a number of education indicators in recent years. Notwithstanding the progress, education in Pakistan suffers from two key deficiencies: at all levels of education, access to educational opportunities remains low and the quality of education is weak, not only in relation to Pakistan's goals themselves but also in international comparisons with the reference countries.

70. On the Education Development Index, which combines all educational access measures Pakistan lies at the bottom with Bangladesh and is considerably below in comparison to Sri Lanka³⁰. A similar picture is painted by the gross enrolment ratios that combine all education sectors, and by the adult literacy rate measures. The overall Human Development Index (HDI) for Pakistan stands at 0.55, which is marginally better than for Bangladesh and Nepal but poorer than other countries in the region³¹. The report also shows that while Pakistan's HDI has improved over the years but the rate of progress in other countries has been higher. Bangladesh, starting at a lower base has caught up, while other countries have further improved upon their relative advantage. These developments do not augur well for Pakistan's competitive position in the international economy. As the Global Competitiveness Index (GCI) shows, Pakistan's performance is weak, on the health and education related elements of competitiveness, when compared with its major competitors like India, China, Bangladesh, Sri Lanka and Malaysia³².

3.1 UNDERSTANDING SYSTEM DEFICIENCIES

71. There are two fundamental causes for the weak performance of the education sector: (i) a lack of commitment to education – a commitment gap - and (ii) an implementation gap that has thwarted the application of policies. The two gaps are linked in practice: a lack of commitment leads to poor implementation, but the weak implementation presents a problem of its own.

3.1.4 The Commitment Gap

72. The low resources stand in sharp contrast to the commitment required by the policy statements, which set up ambitious goals for the sector. The national emphasis on education goes back to the enshrining of the right to education in the Constitution.

³⁰ *Human Development Report 2007/2008*, UNDP, 2007.

³¹ *ibid.*

³² *The State of Pakistan's Competitiveness 2007*, Competitive Support Fund, USAID, Ministry of Finance, Government of Pakistan, 2007.

73. The contrast between the vision and the commitment has been pointed out by the Planning Commission: “We cannot spend only 2.7 % of our GDP on education and expect to become a vibrant knowledge economy”³³.

74. The commitment gap could come from two reasons: (i) a lack of belief in education’s true worth for socio-economic and human-centred development; and/or (ii) a lack of belief in the goals themselves. In regard to the first, the analysis done during the policy review, including reviewing recent international research and policy experience, confirms the potent role education can play in achieving economic growth and social development. On this basis, the commitment gap could not arise for this reason.

75. The second reason, the lack of commitment to the policy goal itself may, therefore, be the real problem. At the time of its birth as a nation, Pakistan inherited an approach to education that had two features. First, the education system of the time was designed to supply the skills needed to run the colonial administration. The accent was on education for the few, basically to fill public service jobs. The prevailing objective was service to the administration rather than service to the students and learners. This assessment is echoed by the Economist Intelligence Unit assessment in its latest review of education, in which it observes that “Pakistan’s education system is among the most deficient and backward in Asia, reflecting the traditional determination of feudal ruling elite to preserve its hegemony”³⁴. Second, the economic structure of Pakistan at its inception was almost entirely agrarian, with little manufacturing and a small services sector. The skill needs of the economy did not influence the structure of educational provision. The tradition of British education, which Pakistan inherited, emphasized academic skills (to serve the administration) rather than skills and competence for use in the production sector.

3.1.5 The Implementation Gap

76. The implementation gap, though less well documented, is believed to be the more pervasive in that it affects many aspects of governance and the allocation and use of resources. One piece of evidence relates to the amount of developmental funds allocated to the sector that remains unspent. Estimates range from 10% to 30% of allocated funds remaining unutilised. The underlying causes may lie in the lack of a planning culture, planning capacity and weaknesses in the accountability mechanisms.

77. Another type of implementation problem surfaces in the corruption that is believed to pervade the system. Anecdotes abound of education allocations systematically diverted to personal use at most levels of the allocation chain. Political influence and favouritism are believed to interfere in the allocation of resources to the Districts and schools, in recruitment, training and posting of teachers and school administrators that are not based on merit, in awarding of textbook contracts, and in the conduct of examinations and assessments. The pervasive nature of corruption indicates

³³ *Pakistan in the 21st Century: Vision 2030*, Planning Commission, Government of Pakistan, 2007.

³⁴ *Country Report: Pakistan*, Economist Intelligence Unit, The Economist, November 2007.

a deeper problem where the service to the students and learners is not at the forefront of thinking and behaviour on the part of some involved in operating the system.

3.2 THE WAY FORWARD: A PARADIGMATIC SHIFT

78. Addressing the two underlying deficiencies requires a fundamental change in the thinking that informs education policy at all levels. The need for a paradigmatic shift is echoed in the 'Vision 2030' report of the Planning Commission, which calls for major adaptations and innovation in the education system.

79. The paradigmatic shift requires that the objectives of the education policy would be to serve the interests of students and learners rather than of those who develop policy or implement programmes. This is a very fundamental shift as it implies changes in all the important parameters of education policy: what educational provision to offer; who benefits from educational provision; what pedagogy and teaching and learning methods to employ; and how the resource cost should be shared among the stakeholders. Accordingly, the Policy recognises the need for reforms and makes recommendations for action in a wide range of areas, which are divided into the two categories. First, there are system level reforms, which deal with such issues as the vision of the system, sector priorities and governance, and resources for the sector. The second set of reforms address problems that are specific to individual sub-sectors of education, ranging from early childhood education to adult learning.

CHAPTER 4.

FILLING THE COMMITMENT GAP: SYSTEM VALUES, PRIORITIES AND RESOURCES

4.1 EDUCATIONAL VISION AND PERFORMANCE

80. The Constitution of Pakistan sets out a broad-based egalitarian view of education, based on values, and responding to the requirements of economic growth. Its Article 38 (d) speaks of instilling moral values and of providing education to all citizens irrespective of gender, caste, creed, or race. Article 37(b) explicitly states that the State of Pakistan shall endeavour “To remove illiteracy and provide free and compulsory secondary education within minimum possible period”. Article 34 requires that “Steps shall be taken to ensure full participation of women in all the spheres of national life”. It is in this perspective that Pakistan has made a commitment to achieve the six Education for All (EFA) goals within the specified target dates.

81. In contrast to this vision for education, there has been little de facto commitment to achieving the ambitions of a national educational policy. Governance and management of education has fallen short of the commitments. As a consequence, Pakistan’s education system, far from being a cohesive national system, is afflicted with fissures that have created parallel systems of education and has performed poorly on the criteria of access, equity and quality.

82. As the report ‘Vision 2030’ describes it, the reality on the ground is “the divide between the prevalent school structure and differences in levels of infrastructure and facilities, media of instruction, emolument of teachers, and even examination systems between public and private sectors. The rich send their children to private run English medium schools which offer foreign curricula and examination systems; the public schools enrol those who are too poor to do so.” There is another divide between the curriculum that is offered to the children enrolled in Deeni Madaris and the curriculum in the rest of the public and private establishments. There is also an unresolved and continuing debate on how and what religious and moral values to be taught through the educational system and how to accommodate non-Muslim minorities.

83. Pakistan’s commitment to universal primary education by 2015 under the EFA framework appears elusive on current performance, as participation is low and access drop-out rates continue to be high. There are persistent gender and rural-urban disparities. Girls continue to remain under-represented in the education system, both public and private. The rural urban divide is stark on most indicators of school provision and participation, which becomes particularly attenuated in some Provinces and Areas. International comparisons of education quality revealed by the NEAS are not encouraging.

84. An education system cannot remain in isolation of the challenges and opportunities provided by globalization. These are in the field of business and commerce, technology, cultural values and identity and many more. Unfortunately a comprehensive national analysis and debate on the potential impact and possible

benefits of globalization has been a major deficit. Work that has been undertaken has been of more confined to the business sector. Even here the feedback into the education system to develop a desired response has been missing.

4.2 A REAFFIRMATION OF EDUCATIONAL VISION

85. Recognising the commitment gap, a first priority is a reaffirmation of the fundamental vision of education. The goals and targets, and the financial and human resources required to achieve them, follow closely from the commitment to a clearly articulated vision.

86. There are solid reasons for the reaffirmation. New research provides convincing evidence of education's contribution to both economic and social development, which can be achieved simultaneously because the processes of economic growth and social development are interlinked. There are close links between equity in educational opportunities and equitable income distribution and income growth. If the education system is constructed on a divisive basis the divisions it creates can endanger long run economic growth as well as stability of society. An unjust society creates an unstable society and an unstable society cannot sustain stable long term growth.

87. The contribution of education to economic growth of societies is well established. A long history of research has confirmed that each year of schooling contributes 0.58% to the rate of economic growth³⁵. The evidence is not just for the developed economies of the world but, importantly to the point, for the developing nations as well.

88. This new research highlights the possibilities of both a vicious and a virtuous circle operating from equity of educational opportunities to equity of income distribution, and from social cohesion to economic growth. An affirmation of commitment to Pakistan's egalitarian education vision in the service of all citizens and as a driver of economic and social development can help to produce a virtuous circle of high levels of human and social capital leading to equitable economic growth and social advancement. The education sector policies have to be reoriented if they are not to fall in the vicious circle trap.

89. The reaffirmation of educational vision requires a change of mindset that would permit development of goals, policies and programmes in support of the vision. The Planning Commission's 'Vision 2030' also argues for such change of the mindset, which commits to a new set of societal goals. The Ministry of Education has adopted following vision:

“Education is a categorical imperative for individual, social and national development that should enable all individuals to reach their maximum human potential. The system should produce responsible, enlightened citizens to integrate Pakistan in the global framework of human centered economic development.”

³⁵ *Equity, Quality and Economic Growth*, The World Bank, 2007.

4.3 OVERARCHING PRIORITIES: WIDENING ACCESS AND RAISING QUALITY

90. The objective of education is the preparation of a self-reliant individual, capable of analytical and original thinking, a responsible member of his community and, in the present era, a global citizen. It is imperative to identify and, possibly define, the touchstone for development of the child as a member of society. Each culture has its own ethos that bears relevance for its individual constituents. The challenge today is to secure values without regressing into unnecessary anachronism and parochial insularity. The other relevance of education is its ability to provide the graduates with an opportunity to earn a living. Education should be able to increase the earning potential of the individual who is literate; irrespective of the eventual vocation opted for.

91. The foregoing articulations of the economic and social goals are taken by the Policy as an appropriate basis for defining the priorities for national education policy. They lead to two over-arching policy priorities. Given the important role of education as a key driver of economic growth and social advancement, the first policy priority is to widen access to education for all. Improving the quality of education, particularly in its dimension of being relevant to the needs of the economy, becomes the second strategic priority because of its role in nurturing the knowledge economy.

92. This Policy document identifies policy actions in pursuit of these two overriding objectives. They are divided into policy actions required at the system level, treated below in this chapter and in Chapter 4, and actions pertaining to specific sub-sectors of education, which are treated in Chapters 5 and 6.

Policy Actions:

1. Provinces and Area Governments shall affirm the goal of achieving universal and free primary education by 2015 and up to class 10 by 2025.
2. Provincial and Area Governments shall develop plans for achieving these targets, including intermediate enrolment targets and estimates of the required financial, technical, human and organisational resources.
3. The plans shall also promote equity in education with the aim of eliminating social exclusion and promoting national cohesion. Greater opportunities shall be provided to marginalised groups of society, particularly girls.
4. Governments shall improve quality of educational provision at all levels of education.
5. National Standards for educational institutions and learning outcomes shall be determined. A National Education Standards Authority shall be established. The standards shall not debar a provincial and area government from having its own standards above the prescribed minimum.
6. Steps shall be taken to make educational provision relevant for the labour market and for promoting innovation in the economy, by giving greater emphasis to vocational and technical education and by restructuring study programmes and curricula to offer more applied learning options.

7. Universities and research institutes shall place greater emphasis on mobilising research for promoting innovation in the economy.
8. Educational inputs need to be designed with a comprehension of the challenges and opportunities related to globalization. Strategies shall be developed to optimize opportunities and minimize the more negative impacts

4.4 MOBILISING RESOURCES FOR EDUCATION

93. Reforms and priorities will need to be planned in detail at various levels of government, including the cost requirements. In the absence of such detailed estimates in advance, it can be said with confidence that the required resources will exceed by considerable margin from the present 2.7% of GDP.

94. The need for a higher level of allocation comes from the fact that both the volume and the quality of provision have to be improved simultaneously. In addition, Pakistan starts from a smaller base level of resource commitment, as is evident from a comparison with other developing nations. As the report 'Vision 2030' puts it forthrightly, "We cannot spend 2.7 per cent of GDP on education and expect to become a vibrant knowledge economy".

95. Pakistan has experienced sustained economic growth of close to 7 per cent over the last ten years. Current projections expect this rate of growth to continue. On the basis of these estimates, the expanding GDP and per capita income should be able to accommodate greater allocation to the education sector, which should be able to pay for the reform initiatives and policy actions outlined in the Policy.

Policy Actions:

1. The Government shall commit to allocating 7% of GDP to education by 2015
2. Governments shall explore ways to increase the contribution of the private sector, which at present contributes only 16 per cent of the total educational resources.
3. For promoting Public-Private-Partnership in the education sector, particularly in the case of disadvantaged children, a percentage of the education budget as grant in aid (to be decided by each Province) shall be allocated to philanthropic, non-profit educational institutions.
4. A system of checks and balances for the private sector, shall be formed to oversee the issues of fees, school standards, pays of teachers, conduct and hygiene etc.
5. Total resources for education shall be further augmented by developing strategies for inviting and absorbing international contributions. The Federal and Provincial/Area Governments shall develop consensus on needs and priorities for foreign assistance in education.

6. A system for donor harmonization and improved coordination between development partners and government agencies as various inputs and investments shall be developed
7. The cost estimates for serving as the basis for educational allocation shall be based on a more comprehensive definition of the concept of “free” education. This shall include all education related costs such on stationery, transport and meals, which are, in general, not covered at present, and shall be applied as a basis of allocating funds on a needs basis for poor children.
8. Governments and educational institutions shall strengthen planning and implementation capacity to improve utilisation of resources

CHAPTER 5.

FILLING THE IMPLEMENTATION GAP: ENSURING GOOD GOVERNANCE

96. The Policy has identified implementation problems as one of the two main underlying causes of poor performance of the education sector. Implementation problems, themselves, can be traced to several types of governance problems, which need addressing:

1. Absence of a whole-of-sector view
2. Lack of policy coherence
3. Unclear roles in fragmented governance
4. Parallel systems of education (public-private divide)
5. Weak planning and management
6. Lack of stakeholder participation

5.1 DEVELOPING A WHOLE-OF-SECTOR VIEW

97. The education sector has divided responsibilities at the Federal level and between the Federal and other sub-national administrations. At the Federal level, the responsibilities for different elements of the education are carved up between the HEC, NAVTEC and the Ministry of Education (while other Ministries also run individual establishments and trusts). This splitting up within education also exists at the Provincial level. In Punjab, the Department for Literacy and Non-Formal Education is separate from the Provincial Education Department. In Balochistan, Literacy comes under the Social Welfare Department, and so on. There is no mechanism for developing a whole-of-sector view at the national level.

Policy Actions:

1. A comprehensive Human Resource Development policy shall be developed integrating all types and branches of HRD institutions from ECE to tertiary education..
2. This sector-wide planning shall be co-ordinated by a newly created Ministry of Human Resource Development that brings together responsibilities for different sub-sectors of education, training and learning.

5.2 ENSURING POLICY COHERENCE

98. Education policies have major intersections with other policies at the national level and sub-national levels. Policies for early childhood education (ECE), are closely linked to social welfare policies; education and skills for the labour market figure as a factor with employment, labour, economic and regional development policies. Policies in the higher education area, likewise, are closely linked with innovation, growth and industrial policies. They point to the need for coherence across many policy domains. A

whole-of-sector-view is an essential input for achieving policy coherence. There are parallels at the provincial level as well, though the need for a sector wide view may be less stringent.

Policy Action:

1. The new Ministry of Human Resource Development shall be responsible for bringing the sector-wide view to discussions of coherence with other socio-economic policies of the Government

5.3 OVERCOMING FRAGMENTED GOVERNANCE

99. Governance of education is the overarching framework that determines the ability of the state to meet its goals and targets; the responsibility to ensure that education of quality is available to all without discrimination. It cannot abdicate this responsibility to any other entity within (or outside) the country. The state dispenses its responsibility in education through direct service delivery as well as regulating the non-state interventions in the sector. The largest proportion of the service delivery in Pakistan remains with the public sector even as the private sector is growing. However, the current size of the private sector, including the propensity for continuous growth, call for a more inclusive approach to dealing with education. An approach that considers the role of the private sector, its linkages with the rest and the possibilities of synergizing for improved outcomes.

100. Looking at the education sector vertically, Pakistan, like many other federal countries, has divided jurisdictional arrangements over education matters. Within a Province or Area Administration, jurisdiction over education is further divided across District and institutional levels. Given these divided jurisdictions, it is essential that the demarcation of responsibilities is clear. A lack of clarity in roles and responsibilities leads to unclear regimes of accountability and the possibility that responsibilities could fall between the stools of different levels of government.

101. Inter-tier roles are, in principle, clearly defined in the Constitution and its related Ordinances. The Constitution of the country puts education on the concurrent list as a national responsibility, which does not mean a Federal responsibility. It implies a collective national response of all the Provincial and Areas governments along with the Federal government as equal partners. The Federal Ministry of Education is required to co-ordinate and facilitate the process.

102. Considerable ambiguities can, however, arise in how the principles are applied in practice, as the principles of responsibility-sharing can be open to different interpretations. In the past, there has been a perception that the Federal Government may have extended its mandate, while some voices from the Provinces see little role for the Federal level.

103. The ambiguities that can arise concern with not only the Federal and the Provincial Governments but also, under the Devolution arrangements, between the Provincial and District administrations. The relations between the provincial

governments and the local governments are in transition and there are a number of issues that need to be addressed. The main problem arises from an administrative instead of a functional division of powers between the provincial and the Local Governments. Greater clarification will also be needed if decentralisation is pushed further to the school level. It is essential that different levels of governments should come together to articulate a clear understanding of inter-tier roles and responsibilities.

104. This process can be aided by strengthening the role of the Inter-Provincial Education Ministers' (IPEM) Conference. Policy making shall remain a national function with participation from the Federal Government and the Provinces in a national forum. The role of the Federal government should be that of a facilitator and co-ordinator, while the IPEM would have oversight over implementation.

105. Inter-tier relations between the Provincial and District governments are still in a flux after Devolution. Within the local government itself, the process is even more complex as there has been centralization at the district level at the cost of the sub-division and union level and the demarcation lines are fluid. As a principle, Devolution is regarded as a step in the right direction, and decentralisation right down to the school level is imperative in the long run for improved service delivery in education, even though there may be teething problems as the policy is introduced.

Policy Actions:

1. To remove ambiguities between the different roles of Federal and Provincial Governments in the field of education, their respective role and responsibilities shall be mapped and clarified.
2. The Federal role shall be of a facilitator and co-ordinator.
3. National Education Policy-making shall be the responsibility of the Federal Government in consultation with the federating units
4. The oversight of National Education Policy shall lie with the IPEM Conference, which shall review progress and implementation periodically.
5. An overarching framework shall be developed to aggregate the initiatives taken by education Ministry, departments and organizations. All these initiatives shall be coordinated to leverage their outputs in such a way that they respond to the emerging challenges of globalization era, in a concreted way.
6. Provinces shall clarify the principle of subsidiarity and the approach to devolution on the basis of achieving greater functional effectiveness.
7. Provinces shall establish District Education Boards for managing school education at the local level.
8. Decentralisation shall move to the school level, which shall become the basic unit for planning, including school-based budgeting. Towards this end, management and planning capacity shall be developed at the school level.

5.4 BRIDGING THE PUBLIC-PRIVATE DIVIDE

106. One of weaknesses of education system is the existence of insulated parallel systems of public and private education in Pakistan , which has created a culture of ‘competition’ rather than ‘collaboration’. Like public sector schools, there is also a variation in the quality of education in the private education. However, there seems a common tendency among the parents to send their children to private schools due to some consideration of quality. Only those who do not have enough financial resources to afford cost of private education they send their children to public sector schools which seems to be a last option for them. There are few elite schools based on international standards cater to the needs of those who can afford to pay. There is another category of private schools, which charges reasonably low fee as compared to the first category and still provide quality education. The third category of schools charges reasonable tuition and other fees, which caters to the needs of middle and lower segment of society. Whereas the government claims that, the public sector schools offer free of cost education but parents still pay in one or other way. This seems a complex situation and has created discrimination among the masses. Currently there is some legislation to regulate private education, which need to be further tightened up.

107. Deeni Madrassahs also form a component of the private sector education but they don’t fit in the formal schooling which yet to be further streamlined. Curriculum of private sector school including Denni Madrassahs and delivery has become a key issue, which also need to be tackled. The private sector seems to be more ‘in-ward looking’ rather than ‘out-ward looking’ in its approach since most of them are operating on business basis.

108. Over the last few years, the government has introduced several schemes to bridge the gaps between public and private education system and create more synergy to uplift quality of education in the country. However, there is need for creating enabling environment to engage the private sector to contribute towards the development of education. Some options are proposed as follows:

- School construction: Government may provide some grant to the private sector for the establishment of new schools in slum-urban and rural areas.
- Textbooks development: private sector should encourage to produce textbooks in line with the national curriculum. Those children in private schools can’t afford to buy books government should provide textbooks free of cost which need to be monitored carefully.
- Libraries development including provision of supplementary reading material: Private schools those who have material resources should share the material with the public sector schools
- Teacher education: The public sector should be encouraged to share its experiences with private sector and assist in improving teacher education in the country.
- Use of ICT in Education: The corporate sector should be encouraged to assist public sector schools in building capacity to use ICT in education to improve students learning.

- Transportation: The corporate sector should be encouraged to provide transport to schools for children from the catchments.
- Food supplement to poor children: Government should provide food supplement to malnourished children studying in private schools.
- Literacy programmes: Government should engage the private sector in increasing literacy.
- (The list is not exhaustive, nor does it identify areas that are new to the concept.)
- There may be other forms also including overall provision of education through:
 - SEF's model of adopted schools be replicated
 - PEF model of grant to private schools be adopted.
 - Engaging private sector in school governance, management and monitoring
 - Government may afford recurring cost and private sector or community may be asked to pay development cost of schools.
 - Korangi and other models of schooling can also be replicated
 - Voucher systems in existing schools or adoption of ill performing public schools (already first practiced in Sindh by Sindh Education Foundation and now at a larger scale, by the Punjab Education Foundation in poorer districts of Punjab);
 - Using premises and/or facilities of the public schools for higher than the existing level of schooling (first piloted by Punjab Education Department in 2003 and replicated by some other provinces at a small scale);
 - Additional services like literacy centers after school timings of the morning shift in the public sector schools (also initiated by FDE in some ICT institutions in collaboration with Children Resource International Islamabad). All of these options, as already stated, are in use in some form or the other.

Policy Actions:

1. Available educational resources in the private sector shall be mapped and information made available to all. The resources in this case would include more than simply private schools which already are part of the overall education census.
2. Transparent and clear procedures shall be initiated in the education sector to allow utilization of private sector inputs. Systems shall be developed through involvement of all stakeholders, the public sector, the private sector and the community.
3. Provincial Governments shall encourage private education at the school level as an additional option available to those who can afford such education in both domestic (SSC & HSSC levels) and foreign system (O

& A levels). At the same time, Governments shall take steps to encourage public sector institutions to draw benefit from the resources available in the private sector.

4. A common curricular framework shall be applied to educational institutions in both the public and the private sector. Governments shall take steps to bring the public and private sectors in harmony through common standards, quality and regulatory regimes.
5. Where already a private school exists with additional admission space, the children shall be accommodated in it, through a voucher mechanism, and the public sector new school shall either be developed in separate vicinity or for different levels. Similarly, private sector schools shall be provided permission on a need cum quality basis.
6. The students of Madrassahs shall be brought at par with the students of formal public secondary schools through the introduction of formal subjects.
 7. Provincial and Area Governments shall develop regulations for establishing and running private sector institutions that include transparent accountability procedures. Where such regulatory bodies have already been developed, those shall be reinvigorated.
 8. Provincial and Area governments shall take steps to build capacity of the regulators to enable them to effectively monitor compliance by private sector institutions while offering them technical support where needed.

5.5 OVERCOMING STRUCTURAL DIVIDES

106. There exists the challenge of ensuring a uniform system of education that provides level playing field for the children irrespective of their caste, creed, family's economic capacity and religion, and in line with the fundamental rights and principles of policy as enshrined in the Constitution of Pakistan. The challenge is not merely of providing level playing field but also setting standards that ensure unity and uniformity in the education system. National educational systems always provide space for diverse demands of distinct ethnic, social, economic, religious, political groups and communities. But this diversity has to be permitted within a broad based national vision and standardization that must direct all educational institutions irrespective of ownership or ideology.

107. Pakistan's education system manifests parallel systems of public and private provision and within the private sector there is an English medium provision. These systems are largely divided on the basis of income status of parents and language of instruction. Performance in two sectors differs significantly in quality. Within the private sector are the English medium schools, generally of better quality but expensive and not well regulated. These divisions are in large measure a failure of governance of the system. Altogether, they are sowing the seeds of long run fissures that bode ill for both economic growth and social cohesion in the future.

108. Recognition of the importance of English in the modern world has been manifested in the policies of most countries. Many countries are reviewing their education policies for improving the proficiency of their students in the language. Pakistan's policy is also based on the perception of increased importance of English language. It has been felt that the education sector, with the exception of a few elite schools, fails to produce the requisite proficiency. This has led to social exclusion of those who cannot afford to access these schools. There is also an opinion that the deficiency has impacted Pakistan's potential to attract investment and benefit optimally from globalization. In Pakistan the best jobs, whether in the public or the private sector, are beyond the reach of those who lack proficiency in the English language

Policy Actions:

1. The state shall provide greater opportunities to the citizens and areas that had been largely excluded from the mainstream development and participation in the national processes by ensuring even and equitable human development across Pakistan.
2. Ministry of Education in consultation with Provincial and Area education departments, relevant professional bodies and the wider public, shall develop a comprehensive plan of action for implementing the English language policy in the shortest possible time, paying particular attention to disadvantaged groups and regions.
3. The curriculum from Class I onward shall include English (as a subject), Urdu, one regional language, mathematics along with an integrated subject.
4. The Provincial and Area Education Departments shall have the choice to select the medium of instruction up to Class V.
5. English shall be employed as the medium of instruction for sciences and mathematics from class IV onwards.
6. For 5 years Provinces shall have the option to teach mathematics and science in English or Urdu/ official regional language, but after five years the teaching of these subjects shall be in English only.
7. Opportunities shall be provided to children from low socio-economic strata to learn English language.

5.6 BUILDING MANAGEMENT AND PLANNING CAPACITY

109. Educational management demands professional standards and expertise for which the traditional policy makers at the ministries or the head teachers are unprepared and untrained. At the institutional level, planning also takes time away from teaching responsibilities. Recognising this, many countries around the globe are paying special attention to training school leaders, and academies for school leadership are flourishing. In contrast, most persons at management positions in Pakistan's education sector have no training in the function. Head teachers, DEOs, EDOs and DPIs are mostly appointed

from amongst the teacher cadre (college or school), without much management experience.

110. The strategies in regard to Devolution require considerable strengthening of planning capacity at all levels of programme development and delivery. An important requirement for planning is the availability of standards for both input requirements and educational outcomes, which is lacking at present. It would be a responsibility of the Federal government, under the framework of IPED, to develop a National Standards for Education.

111. Good planning also requires data and indicators of performance. These have been severely lacking at all levels of educational activity and performance. Recently the National Education Management Information System (NEMIS) has begun the process of computing indicators. However, these indicators are those that have been internationally identified and developed by UNESCO or by some of the donors for cross-cutting international programmes like Dakar Framework of Action for EFA and Fast Track Initiative (FTI) for EFA. It is essential to develop a data base that covers all planning needs specific to Pakistan's context. The deficiencies in data developed by these systems led the government to undertake a comprehensive census, the National Education Census 2006, which for the first time also covered all non-state-owned institutions, colleges and universities. Although a major step forward, the census can only be taken once every few years and it does not meet many of the data needs of education policy planners.

112. While data limitations have been a real constraint in educational planning, insufficient use of data has been made in decision making and planning even when they have been available. This is partly due to the culture of not using quantitative analysis and partly because the managers lack the required training.

Policy Actions:

1. A management cadre for education, with specified training and qualification requirements, shall be introduced.
2. Education planners and decision makers shall be trained in the use and analysis of educational statistics to develop the practice of information-based decision making and planning.
3. The national standards approach shall be the criterion for a realistic assessment of resource requirements as well as a fair and equitable basis for allocation across institutions.
4. A Financial Management Information System shall be developed to support the planning, implementation and evaluation function. It shall be linked to the existing Educational Management and Information System (EMIS).
5. A National Standards and Certification Agency for EMIS shall be established to set and evaluate the quality of education data collection, analysis and use across all levels and tiers of the education management.

6. The Provincial and Area EMIS shall cater to the data needs of all tiers of the local governments. It shall also provide data to NEMIS for national aggregation on a routine and timely basis.
7. A separate data base for literacy and non-formal education shall be developed.

5.7 GETTING STAKEHOLDERS INVOLVED

113. Effective implementation of policies is aided if the stakeholders have ownership of the policies. One weakness of the governance regime in Pakistan has been its weak performance in getting all stakeholders to have a say in policy development. Overall, most stakeholders are of the view that various experiments with School Management Committees (SMCs) or Parent Teachers Associations (PTAs) have had limited success. Most cases of success are either owed to a dynamic head teacher or a local non-government organisation that provides an interface between community and the school.

114. In most rural areas these organizations are controlled by politically influential persons who have little interest in school improvement. The SMCs function well as long as the finances allocated are unused. In other cases, finances remain unutilised because of fear of audit. Also, most head teachers have no training in working with communities and are unprepared for capitalising on the potential of SMCs. The main obstacle to greater success remains the lack of acceptance and comprehension of the concept at both the community as well as school level.

115. For the New Education Policy to succeed it has to be a collaborative exercise with the stakeholders, at all levels of education, policy development and programme delivery.

Policy Actions:

1. School Management Committees (SMC) shall be strengthened through involvement of students, teachers, educationists, parents and society (STEPS).
2. The tenure of the SMCs shall be lengthened so that the members are able to make use of their experience.
3. To promote greater utilisation of allocated funds, Governments shall move from financial audit to performance or output based audit system for SMCs.
4. Head teachers shall be trained in social mobilisation to involve community effectively.
5. Awareness campaigns shall be launched, at the District, Tehsil and Union levels, to sensitise communities about their role in school education.

CHAPTER 6.

BROADENING THE BASE AND ACHIEVING ACCESS

116. There is a general agreement that the quality of education has been a major casualty of the system's inefficiency. The biggest victim has been the public education system but quality cannot be assumed as given in the private schools. Efforts to increase enrollments are not sustainable in the absence of quality education in the country. Re-prioritization of quality can only be initiated with a common understanding of the term and then focusing on the major imports that impact it; these being curriculum, textbooks and learning materials, assessments, teachers and the learning environment available in an educational institution.

117. Broadening the base with quality is the most central strategic education policy priority. The superstructure of the knowledge society cannot be erected without a wide and high quality base that can feed quality human resources into all walks of societal endeavour, from the economic to the social. This chapter sets reforms for widening the base of education at the foundation level, in the areas of early childhood, primary and secondary education. Since much of non-formal and adult learning is also concerned with the foundation level learning, the chapter also presents reforms and policy actions for this sector.

6.1 EARLY CHILDHOOD EDUCATION (ECE)

118. Early Childhood Education confers benefits to the child's cognitive development and better social and emotional adaptation. Neurological studies have found that children's brain development has particularly high potential around age three, when appropriate stimulating learning environment, which can just as well be playing activity, can increase the physical size of the brain itself. In economic terms, there are long-term positive effects of ECE on employment, labour force participation and earnings. The broader social impacts include better health, lower incidence of anti-social behaviour and greater civic participation. Studies estimate that ECE is a sound investment: for each dollar invested in quality early childhood education governments provides a return ranging anywhere from 2 to 13 dollars.

119. Historically, however, early childhood education has not been formally recognized by the public sector in Pakistan. The traditional '*katchi*' class in some public sector schools has predominantly remained a familiarisation stage towards formal schooling for un-admitted, younger siblings of students. A limited part of the class 1 National Curriculum is taught to this group.

120. Against this background, for the first time in Pakistan's history, ECE was included as a component in the Education Sector Reforms programme, and funding was provided to the provincial and district governments, which has also been included in the National Plan of Action of Education for All. Pakistan is committed to the Dakar Framework of Action, the first goal of which is to expand and improve comprehensive ECE for all children, especially for the most vulnerable and disadvantaged.

121. Progress has been achieved over the last few years, as noted in Chapter 1, but further action is required in three areas to improve provision of ECE across the country: (i) wider participation; (ii) better quality; and (iii) improved governance.

Policy Actions:

1. Improvements in quality of ECE shall be based on a concept of holistic development of the child that provides a stimulating, interactive environment, including play, rather than a focus on regimes that require rote learning rigid achievement standards.
2. The early childhood education (ECE) age group shall be recognised as comprising 3 to 5 years. At least one year pre-primary education shall be provided by the state and universal access to ECE shall be ensured within the next ten years.
3. Provision of ECE shall be attached to primary schools, and these schools shall be provided with additional budget, teachers and assistants for this purpose.
4. For ECE teachers, a two-year specialised training in dealing with young children shall be a necessary requirement.
5. This training shall be on the basis of ECE revised national curriculum. The curriculum and support material for ECE shall take account of the cultural diversity of particular areas

6.2 ELEMENTARY EDUCATION

122. Primary education is not a strong link in education in Pakistan. The Policy focuses attention on two large and critical problems facing the sector: (i) low participation and narrow base of the sector, and (ii) weak quality of provision.

123. Despite some progress in recent years, access rates remain low, as noted in Chapter 1. Net enrolment rates at 66% for primary are the lowest compared to the selected reference countries. Even though these 2005 rates have improved in 2006-07, Pakistan still faces the risk of defaulting on EFA 2015 targets. The narrow base is further attenuated through high drop out rates. The survival rate to Grade 5 is 72%. Of those who succeed in completing Grade 5, there is a further loss to the system through those not making the transition to the secondary level. Pakistan cannot afford to live with the narrow base in the perspective of long term economic and social development of the nation.

Policy Actions:

1. Government shall provide the necessary financial resources to achieve the EFA goals.
2. All primary schools shall be upgraded to middle level.
3. International Development Partners shall be invited through a well-developed plan for expanding school facilities.

4. High priority shall be paid to reducing the drop-out rates. An important element of this effort should be to provide financial support to children who drop out because of poverty.
5. Schools shall be made more attractive for retaining the children by providing attractive learning environment and other measures.

6.3 SECONDARY AND HIGHER SECONDARY EDUCATION

124. The secondary and higher secondary school system prepares young people for life. It has two important roles in this respect – providing skills to the labour market, as many students leave formal schooling at this time; and providing input to the tertiary system, for those who go on to this level of learning. The policy questions are, whether the system provides an adequate base for both these functions. Quite apart from the quality of instruction at this level, a central question that Pakistan education policy makers must confront is whether the level of skill development and preparation that can be achieved by twelve years of school education is sufficient as a terminal qualification.

125. The system as it exists has shortcomings in two main respects: it has *a narrow base* that leaves a large number of young people outside the system and the quality of skills it produces is *not well matched* with the needs of the labour market. The policy actions needed to address these concerns include several that have been outlined in the section 5.2 above dealing with elementary education. The additional reform initiatives described below are specifically meant for secondary and upper secondary education.

126. Access and participation rates at this level of schooling in Pakistan are low in comparison to reference countries. Pakistan's national average ratio of secondary to primary school is 1:6 but, in certain parts of the country, it reaches the high figure of 1:13. There is a clear need for expanding the provision. At the same time, efforts have to be made to cut the high drop out rates and induce more out of school youths back to the school system, particularly the girls whose participation is still very low.

Policy Actions:

1. Provision shall be expanded, particularly in the rural areas and of schools dedicated for girls. Priority shall be given to those locations where the ratio of secondary schools is low.
2. Student support shall be increased to prevent students from dropping out of school for financial reasons.
3. Schools shall introduce more student-centred pedagogies.
4. Counselling facilities shall be made available to students from the elementary level onwards in order to constructively utilize their energy, to deal with any displays of aggression amongst young students and to address any other psychological distress that a student may be in, by suggesting a suitable remedy

5. Counselling at higher secondary level must also address the career concerns of young students and encourage them to take up studies as per their aptitude other than the “accepted” fields of study, be it technical, vocational or any other area of study
6. The integration / restructuring process between secondary and upper secondary levels shall be facilitated by moving Grades 11 and 12 from college level and merging with higher secondary level schooling.
7. A system for ranking of primary and secondary educational institutions across the country shall be introduced with rankings based on result outcomes, extra-curricular activities and facilities provided to the students, in order to encourage healthy competition between schools.
8. To create an order for excellence in the country, a “National Merit Programme” shall be introduced to award bright students

6.4 LITERACY AND NON-FORMAL LEARNING

127. Literacy training and non-formal learning can be two different types of activities although with a large overlap. Non-formal learning can take the form of literacy training but it also includes a variety of other types of learning activities such as skill training on the job and traditional apprenticeships. In Pakistan’s context, the literacy programs generally consider adults and young people who are out of school. The non-formal learning includes these categories but also other on the job learning that youths and adults might participate in, which may not have raising literacy as its objective.

128. There are multiple causes of low literacy: social taboos, poverty, child labour, and illiteracy of the parents/families and institutional weaknesses. Efforts to combat illiteracy have been half hearted, disjointed and not suited to local conditions and requirements. At the provincial level, there is a lack of uniformity in existing structures, and the set up varies from province to province.

129. There is also a question of what priority literacy promotion should be given in the public budget when resources are not available for basic facilities in the primary schools, although the private sector can contribute resources in this field of learning. The case for improving literacy is based on both its economic and social benefits, quite apart from the large benefit that accrues to the individual in the form of personal development.

130. In the economic field, literacy scores contribute to higher productivity, a contribution that is in addition to the contribution made by years of schooling³⁶. A more literate person has higher participation rates in the labour force, is more likely to be an entrepreneur, and is more open to adopting new techniques of production. A literate parent contributes to better leaning achievement for his or her children.

³⁶ *Equity, Quality and Economic Growth*, The World Bank, 2007.

131. There are, as well, wider social benefits of literacy that have been estimated empirically. There is a noticeable impact on health. A literate person is more likely to have better health and incur less expenditures costs on health maintenance. Participation in civic activities and democratic processes are more likely with literacy than without. The most important social objective served by literacy is achieving greater social inclusiveness.

132. There are four main difficulties with current literacy and non-formal learning programme, which needs to be addressed. First, the quality of such programmes is variable as they are not regulated by some minimum quality standards. One reason for the often poor quality of the programmes is low quality of teachers, which is also not regulated. Second, a certification and accreditation regime is missing. There are no benchmarks or standards that can be used for assessing literacy programmes. As a consequence, it is difficult to link the certificate offered by these programmes to formal learning opportunities. Hence, graduates of these programmes find it difficult to enter into the formal sector. Third, current literacy programmes are also not well-linked to employment opportunities. Fourth, literacy programmes are often found to be effective if there is a follow-up programme of reinforcement, which are lacking at present.

Policy Actions:

1. Government shall develop a national literacy curriculum and identify the instructional material and professional development programmes to support the curriculum. The curriculum shall be objective driven, so as to facilitate assimilation of trainees into mainstream economic activity.
2. Government shall develop and enforce minimum quality standards for organisations involved in literacy in the form of literacy certification and accreditation regime. The literacy providers shall be required to offer the literacy programmes according to the specified standards.
3. A system shall be developed to mainstream the students in non-formal programmes between the ages of 11 and 16 into public education system, and a system of equivalence shall be developed to permit such mainstreaming. New literates shall receive formal certification so as to facilitate their entry into government schools.
4. Linkages of non-formal education with industry and internship programmes shall be developed to enhance economic benefits of participation.
5. Horizontal linkages between schools and vocational/skills training centres shall be established.
6. Government schools shall initiate non-formal education stream for child labourers. Children involved in various jobs or work shall be brought within the ambit of non-formal education system with need-based schedules and timings.
7. Special literacy skills programmes shall target older child labourers, boys and girls (14 to 17 years). Special educational stipends shall be introduced to rehabilitate child labourers.

8. Arrangements shall be made to use school buildings for adult literacy after school hours.
9. Government shall develop guidelines for post-programme initiatives. Regular follow-up shall be made a part of the literacy programs.
10. Steps shall be taken to ensure that teachers for adult learners and non-formal education are properly trained.
11. Community and private sector involvement in awareness programmes, content, design and availability of facilities, shall be mobilised.

6.5 EDUCATION IN EMERGENCIES

133. Pakistan has endured large scale emergencies in recent years and along with other aspects of life, education has suffered greatly through inadequate planning. Pakistan's education system has not recognised the need for preparation of individuals and groups to grapple with the demands of emergencies through organised and effective responses. Credible rehabilitation and disaster management plans need to be put in place to ensure early restoration of education service. School education must prepare pupils for organised, ameliorative responses.

Policy Actions:

1. Awareness shall be raised amongst the students regarding emergency situations, natural disasters and school safety so as to inform their behaviour in the times of such crisis
2. Curriculum for each level of education, shall integrate information on emergencies, natural disasters and trauma management
3. Curriculum for Civics of secondary and higher secondary level (Grades 9 to 12) shall formally address response in an emergency or disaster, on the basis of latest international best practices.
4. Teacher education/training programmes shall include provisions to enable the teacher to address education in emergencies ,
5. A repository of all emergency related materials, manuals, guidelines, minimum standards and research pertaining to education shall be maintained at the respective departments of education, teachers training institutions and universities.
6. Disaster Management Plans shall include education delivery mechanism for rehabilitation.

CHAPTER 7.

RAISING THE QUALITY OF EDUCATION

134. Defining quality is elusive but some parameters will need to be drawn. There is an impending need to debate and agree on what constitutes quality at each stage of education and the system overall. Based on this, some standards will need to be defined and pursued through development of policies, strategies and plans which target them. The recently completed NEAS 2007 points to significant quality deficits and confirms the widespread perception of the low quality of Pakistan's education. Improving quality requires action in the areas of teacher quality, curriculum and pedagogy, textbooks, assessment approaches, and in learning environment and facilities. In developed countries, close to two thirds of children's performance in early schooling depends on factors outside the school, namely on the home environment, the socio-economic status of parents, parent education particularly the mother's, and the learning resources available at home³⁷. Of the remaining one-third, teacher quality and leadership at school are believed to be the more important factors³⁸. Most of the inputs in the system have an impact on quality. However, there are five- six basic pillars that have the major contribution. These are curriculum, textbooks, assessments, teachers, the learning environment in an institution and relevance of education to practical life/labour market. While elementary schooling is facing many deficiencies in each of the input areas that would need to be improved; the most significant action is required in improving the teaching resources and the pedagogical approaches teachers employ. The reform of teaching quality is of the highest priority.

7.1 IMPROVING TEACHER QUALITY

135. There is a consensus amongst all stakeholders that the quality of teachers in the public sector is unsatisfactory. Poor quality of teacher in the system in large numbers is owed to the mutations in governance, an obsolete pre-service training structure and a less than adequate in service training regime. Presence of incompetence in such a huge quantity and permeation of malpractices in the profession have eroded the once exalted position enjoyed by teachers under the eastern cultural milieu. Teaching has become the employment of last resort of most educated young persons; especially males.

136. Reform is required in all areas: pre-service training and standardization of qualifications; professional development; teacher remuneration, career progression and status; and governance and management of the teaching workforce. The growth of private sector is adding new complexities to the teaching profession and needs to be taken into account in any reform of the system.

³⁷ *Knowledge and Skills for Life: First Results from PISA 2000*, OECD, 2001.

³⁸ *Teachers Matter: Attracting, Developing and Retaining Effective Teachers*, OECD 2005.

Policy Actions:

1. A Bachelors degree, preferably with a B.Ed., shall be the requirement for teaching at the elementary level. A Masters level for the secondary and higher secondary, with a B.Ed., shall be ensured by 2018. PTC and CT shall be phased out through encouraging the present set of teachers to improve their qualifications, while new hiring shall be based on the advanced criteria.
2. Teacher training arrangements, accreditation and certification procedures shall be standardised and institutionalised.
3. Teacher education curriculum shall be adjusted to the needs of the school curriculum and scheme of studies. The curriculum shall include training for student-centred teaching, cross-curricular competencies, and an on-site component.
4. A separate cadre of specialised teacher trainers shall be developed.
5. Governments shall take steps to ensure that teacher recruitment, professional development, promotions and postings are based on merit alone.
6. All teachers shall have opportunities for professional development through a programme organised on a three-year cyclic basis. Progress in career shall be linked to such professional development.
7. Recruitment of Teachers and running of Teachers Training Programmes shall be done at the District level, so as to reduce the problem of absentee teachers and the negligence of schools in remote areas
8. Teacher allocation plans, likewise, shall be based on schools needs and qualifications of teachers. Over the course of next two years, Governments shall develop a rationalised and need-based school allocation of teachers, which should be reviewed and modified annually.
9. To control absenteeism and multiple job-holding, Provincial and Area Administrations shall develop EMIS data on teacher deployment.
10. Institutionalised and standardised in-service teacher training regime shall be established in those provinces where it has not already been done.
11. In-service training shall cover a wide range of areas: pedagogy and pedagogical content knowledge; subject content knowledge; testing and assessment practices; multi-grade teaching, monitoring and evaluation; and programmes to cater to emerging needs like trainings in languages and ICT.
12. Training needs shall be assessed on the basis of research and training programmes.
13. Governments shall take steps to improve social status and morale of teachers. These include: Upgrading of teacher salaries as part of establishing a separate teaching cadre and teaching career; teachers' professional development, and a reward system based on performance measures.
14. The teaching workforce shall be managed on a truly professional basis, organised as a specialised function.

15. The voice of teachers associations shall be given due consideration in decisions on collective issues affecting teachers.
16. Governments shall aim to draw upon resources from the private sector through public-private partnerships, especially in the areas of teacher education and professional development programmes.
17. International Development Partners' resources shall be harnessed within a broad national programme of teacher improvement for the country as a whole through inter-tier collaboration.

7.2 CURRICULUM REFORM

137. Curriculum is the guide that delineates the learning path of a student. It also determines the process of this learning. Normally a curriculum should have the teacher as the centre but textbooks development appears to be the only activity flowing from the curriculum. In the classroom teachers do not use it being solely focussed on the single textbook assigned to them. Even assessments are based on this textbook and not the curriculum.

138. The curriculum also does not cater to the diverse conditions in the education sector itself (e.g. multi-grade classes), as well as, the variations within the geographical breadth of the country. Pakistan is blessed with a multitude of cultures and topographies, these fail to be adequately recognized and assimilated by the education system. In basic primary education the most important missing element is the diffused focus on the local context. However efforts have been made to overcome the deficiencies in curriculum development and its translation into meaningful knowledge

139. A comprehensive review of school curricula was initiated in 2005. The Curriculum Wing of the Ministry of Education, strengthened by professionals from the field, reviewed the scheme of studies in the first phase. In the second phase, the revised curricula for 23 core subjects (classes I to XII) were notified in 2007. The review of remaining subjects as listed in the scheme of studies is in progress and will continue during 2008. Comparison of current curriculum with curricula of different countries; consultations with teachers, administrators, educationists, curriculum experts and students; field visits to collect feedback from teachers and stakeholders; identification and training of working teams through workshops and seminars; reviews of drafts by subject experts and working teachers leading to further revision and refinement of contents; and preparation of a uniform curriculum format consisting of standards, benchmarks and learning outcomes were vital parts of the curriculum development process.

Policy Actions:

1. Curriculum development shall be objective driven and outcome based. It shall focus on learning outcomes rather than content. It shall closely reflect important social issues; provide more room for developing the capacity for self-directed

learning, the spirit of inquiry, critical thinking, problem-solving and team-work; and local contextual material.

2. The curriculum development and review process shall be standardised and institutionalised within the framework of the Federal Supervision of Curricula, Textbooks and Maintenance of Standards of Education Act, 1976.
3. Curriculum shall emphasize the fundamental rights guaranteed to the citizens of Pakistan, so that each individual shall develop within himself/herself and the society at large, a civic culture strong enough to withstand any extra constitutional interference which threatens those rights
4. Environmental education shall be made an integral part of early education
5. Curriculum shall include health education. This education will among other things help in (i) Awareness of fatal diseases such as HIV/AIDS and prevention of harmful practises (ii) Detection and prevention of child abuse in many cases.

7.3 QUALITY IN TEXTBOOKS AND LEARNING MATERIALS

140. Ministry of Education in consultation with Provincial/Area Education Departments, constituted a committee to design and recommend a Textbook Policy for improvement in Textbooks and Learning Materials. A comprehensive dialogue, involving all stakeholders, led to the notification of a 'National Textbook and Learning Materials Policy and Plan of Action' in June 2007.

141. The objective of the exercise was defined as: "Improvement in the quality of education at all levels through better quality textbooks at affordable prices and other learning materials for promoting Pakistan as a knowledge-based society.....Choice and competition are major forces in achieving this objective. Choice on the part of the buyer promotes acquisition of knowledge, empowerment and participation. Competition on the part of the producer leads to a wider variety of products, improved quality, availability and better prices".³⁹

Policy Actions:

1. A well regulated system of competitive publishing of textbooks and learning materials shall be introduced.
2. Textbook Boards shall be transformed into competent facilitating, regulating and monitoring authorities. The Boards shall review and help support the process of approval of textbooks for use in schools in their respective areas of jurisdiction.
3. A Provincial /Area Committee comprising representatives of the education authorities, Textbook Boards, the private sector, teachers and other stakeholders shall be formed to select and prescribe textbooks for use in public schools in the respective province or areas of jurisdiction. Private

³⁹ National Textbook & Learning Materials Policy & Plan of Action, MoE 2007

sector schools shall be free to use from amongst the books authorised by the respective Textbook Board.

4. Federal and Provincial Governments shall arrange for the Textbook Boards to provide assistance in capacity development for the national and/or provincial publishing industry to become competitive players in an expanded education publishing market.
5. As part of the review and approval process, Textbook Boards shall seek a no objection certificate from Federal Ministry of Education, Curriculum Wing.
6. Federal and Provincial / Area Governments shall increase investments in school libraries and supplementary reading, teacher guides, teachers' training and learning materials.
7. An "Inter-Provincial Standing Committee on Textbook Policy" shall be established to regulate operational and procedural issues, and monitor and coordinate further implementation process. Curriculum Wing of Federal Ministry of Education shall be the secretariat for the Committee and shall be strengthened for the expanded tasks.
8. Implementation of the new system of regulated competitive publishing of textbooks and learning materials shall start with the introduction of revised National Curricula.
9. Special textbooks shall be prepared to cater to multi-grade environments. Alternately supplementary reading material that helps self learning must be developed for such environments

7.4 IMPROVING STUDENT ASSESSMENT

142. Assessment systems are quality measures that cater to a number of requirements of the education system. These can be used to measure overall system efficiency as well as individual students' performance for movement in the education system. A comprehensive assessment design would provide feedback for improvements at all tiers starting from changes in the classroom to improvements in the national systems.

143. Assessment system currently suffers from several deficiencies in promoting quality education. The one with more sinister outcomes is the practise of rote learning which stops the mental growth of the child and blocks innovative learning. Efforts have to be made to address this issue and need for inculcating critical and analytical thinking skills for producing life-long independent learners have to be emphasized. Assessment mechanism should be such that analytical thinking and critical reflections are tapped and encouraged.

144. The recent work of the National Education Assessment System and the Punjab Examination Commission shall be continued and further in reforming the system across the country.

Policy Actions:

1. Education system needs to be internationally competitive and Pakistan shall make efforts to offer itself for international level academic assessments by 2012.
2. Student performance shall be based on assessing competence in a specialised area that requires a given skill set. There shall be periodic reviews of the assessment system.
3. Multiple assessment tools in addition to traditional examinations shall be explored, to ensure the right balance between the uses of formative assessment approaches combined with the summative approach of high-stakes examinations.
4. National standards shall be developed to reduce the differences in quality across regions. Assessment processes shall be standardised and become uniform across the Boards over time so that students appearing in examinations under different Boards can expect to receive the same grades.
5. A centralised assessment system through gradual reduction of the number of boards shall be achieved within the next five years.
6. The Education Boards shall be responsible for capacity building of paper setters and examiners.
7. A comprehensive plan shall be prepared to eliminate cheating from examinations and shall address social attitudes towards the issue.
8. A quality cycle management shall link the various systems of assessment and institutions involved in assessment (examinations, NEAS/PEAC, continuous assessment) to provide feedback to curriculum development, textbooks development and teacher education and professional development

7.5 ATTAINING STANDARDS IN THE LEARNING ENVIRONMENT

145. In an average rural area of Pakistan, a five or six year old child walks to the school dreading what he or she would face. Children are scared of the teacher for de facto corporal punishment exists in all provinces, although Punjab has managed some interesting counters. They know that they may have to sit on cold floor in winters and a hot one in summers provided they are lucky enough to have a school building other wise the tree is the only shade available to the children. Toilets are a luxury and where in some schools they exist, the ratio is extremely unwise. These issues are linked to poverty irrespective of the locale. Library facilities are very rudimentary and teaching aid material is generally in short supply. Games, sports and other co-curricular activities such as debating contests, drawing competitions, skills/ arts and crafts training, and cultural activities that positively contribute to the overall development of school children are missing from most schools. School infrastructure facilities are highly inadequate, especially in rural areas. In public sector, around 38% of schools are

without boundary walls, 32% without drinking water facilities, 56% without electricity, 40% without sanitary facilities and 6% without any buildings⁴⁰.

146. One element of the learning environment consists of teacher-student relationship. Although firm data are not available, anecdotal evidence suggests that corporal punishment exists in all provinces.

Policy Actions:

1. A framework setting out the basic standards for school facilities and teaching aid materials shall be established by 2012 and shall form the basis for allocation of funds.
2. All schools shall establish a school mission that assists students in achieving their learning potential and personality development as the key goals. Pursuant to this, co-curricular and extra-curricular activities shall be made a mandatory part of the entire learning process.
3. A concept of service to the society shall be introduced
4. Student-teacher ratios shall be standardized and enforced at school level
5. An awareness campaign against corporal punishment shall be initiated and teachers shall be held accountable for violations.
6. A study for analyzing the impact of modern media on children with a view to realize its potential to help in attaining the objectives of the education system shall be undertaken. This must encapsulate the negative impacts and the possible ways to mitigate them.
7. A code of conduct shall be established which shall enable student unions to participate in healthy activities without affecting the environment of the educational institutions.

7.6 MATCHING WITH THE LABOUR MARKET

Policy Actions:

1. Courses at the secondary and higher secondary level shall be reviewed with a view to making them more relevant to the needs of the labour market in order to better prepare those students not going on to further studies.
2. A study shall be conducted to evaluate the impact of technical matriculation and explore ways of introducing an improved system of technical and vocational education at high school level. The stream shall offer two-way link with the academic stream and also provide links to a revamped vocational and technical sector at higher levels.

⁴⁰ *National Education Census: Highlights*, Ministry of education, Government of Pakistan, 2006.

3. Approaches shall be found to provide students with a window to the world of work. This could involve short assignments with the local enterprises and institutions or “job shadowing” approaches to familiarise students with the work environment.
4. A career guidance and service shall be introduced at secondary and upper secondary levels, if not in each school, at least for school clusters. This shall involve local employers in providing information about job openings and the nature of work requirements.

DRAFT

CHAPTER 8.

STRENGTHENING SKILL DEVELOPMENT AND INNOVATION

147. Pakistan's Technical and Vocational Education (TVE) is not a major supplier of skills to the country's labour market. The supply from the higher education sector primarily academic and theory oriented. Both these sectors operate in some isolation from the needs of the labour market. Furthermore, the research effort of the universities has very weak links with the innovation processes and requirements of the national economy. Combating these two deficiencies is the main focus of the educational reforms of post-secondary education. The long term goal of these reforms is to generate a quality base of a breadth that can meet the needs of growth and innovation of a high value-added and knowledge economy. The reforms also aim at making Pakistan a significant 'Talent Source' at the international level so that the country can attract high FDI flows and quality foreign enterprises, particularly in the service sector.

8.1 TECHNICAL, VOCATIONAL AND PROFESSIONAL EDUCATION

148. The share and importance of the TVE sector in total enrolment vary greatly among countries. But in most countries, the relative share of the applied proportion of the tertiary sector is higher than the 18.5% in Pakistan. Hence the base of technical and vocational skills provided to the economy in Pakistan is both narrow and of low quality. The inadequate quality stems from both a smaller number of total years of preparation and limitations of the curriculum, compared to the more advanced systems.

149. The reasons for these problems lie partly in the history of the education sector. At the time of country's independence, there were only few industries in the country, and the skills required by the colonial government were largely of general academic type for serving the administrative needs of the government. Even a general matriculation certificate with no technical or vocational content was deemed satisfactory to fill most of the junior level administrative and service jobs. The academic degrees of Bachelors of Arts and Masters of Arts were sufficient to fill the requirements for higher level jobs. This tradition has largely been maintained since the Independence, even though the economic structure of the country has changed significantly. The demand-pull effects have had limited effect on educational provision.

150. There is another factor in that many parents link technical education with menial work and prefer academic and college-university type of education for their children. The status of academic training is higher than of vocational training, and it is the weaker student who goes to technical colleges, those who cannot make it to higher secondary programmes like F.Sc or F.A. The low quality intake with underperforming Polytechnics has diminished the importance and value of TVE.

151. The neglect of the TVE sector is another serious limitation of the sector. The certificate and diploma programmes do not seem to have a progression ladder into higher level skills. They do not provide entry claims into the tertiary sector with credit

recognition in both the academic and applied streams. In addition to this blocked forward linkage, the backward linkage with apprentice training in the traditional sector is missing. There is no provision whereby the traditional apprenticeship experience in the non-formal sector could be assessed and certified for entry into the formal sector of vocational education. The current TVE certificate stream is too narrow in its scope and does not cover the large variety of skills training that takes place in the traditional sector. Two way cross-over between the academic and the applied / professional streams is lacking in our system. The absence of a well-articulated qualifications system is a major structural shortcoming of Pakistan's education sector.

152. Another problem specific to the vocational/technical and professional sector is the fragmented structure of governance. Many institutions and jurisdictions are involved in governance of this field without a clear demarcation of their respective responsibilities. There is no focal point for coherent planning for the sector.

153. At the same time, the voices of the important stakeholders such as the business sector are not adequately taken into account in shaping the content, structures and certification of study programmes. The TVE sector does not benefit from good collaboration and input from the business sector, such as for updating its equipments and teaching materials. Resultantly, there are perennial complaints from employers about the substandard quality of the skills available in the market.

154. The Policy recognises the high importance of developing a broad-based and high quality sector for providing technical skills. As the manufacturing and services sectors have expanded, skill requirements of the country have changed as well, and there are needs for technical and vocational skills even in the traditional sector as it adopts more productive techniques of production. The technical intensity of production processes will increase as new technologies become more pervasive, thereby raising the demand for TVE skills of a higher quality.

155. Combined with this demand pull force within the country, Pakistan could benefit from a forward looking supply strategy of producing a sophisticated skill base to meet the anticipated growth in global demand for such skills and to attract multinationals and FDI looking to locate where quality skills supply is available at reasonable cost. Pakistan has not performed so well in this regard in comparison to India, which has developed a wider and more qualified skill base to the point that it can export high value added services. The current global talent deficit is expected to expand rapidly and Pakistan needs to be well poised to benefit from this expanding demand.

156. In view of the foregoing analysis, the Policy addresses three principal problems faced by the sector: (i) its weak linkages with other education sectors and the labour market, (ii) deficiencies in the governance of the sector; and (iii) the need to expand supply of technical skills.

Policy Actions:

1. A National Qualifications Framework (NQF) shall be established along with a changed program structure that encompasses all qualifications in the country, both academic and vocational/technical. The NQF shall be competency based and provide entry points and progression routes throughout the structure of

qualifications. In particular, it shall provide the possibilities of two-way cross-over between the academic and the applied streams, with clearly mapped out recognition of credit points for each competency level.

2. The business sector, in particular, shall be included in advising on the course and programme content, and in providing training positions and job shadowing opportunities for students in the applied streams. The business sector could also help teachers by giving specialised lectures and short training programmes.
3. All administrative jurisdictions and stakeholders shall be involved in a consultative process to develop the NQF programme. Expertise shall be sought from countries that have applied the NQF approach in recent years.
4. To address the problem of fragmented governance structure, a coordination mechanism between higher education, school education and technical, vocational education shall be developed.
5. Government shall develop a suitable framework for technical and scientific education and training with close involvement of Chambers of Commerce and Industry.
6. There shall be a:-
 - i. vocational training centre for every Tehsil;
 - ii. polytechnic institute for every District (Agency in FATA)
 - iii. colleges of technology in each Province/Area on a needs basis.

CHAPTER 9.

HIGHER EDUCATION

157. Good quality, merit-oriented, equitable and efficient higher education is the most crucial instrument for translating the dream of a knowledge-based economy into reality. The tertiary sector contributes as well in the attainment of social goals of developing civic responsibility, social cohesion and a more tolerant society. For this reason, to its traditional functions of producing skilled labour force and crafting new knowledge through research, a third is being added world over, that of service to society. It includes contribution to the innovation process, economic growth, sustainable development and social cohesion.

9.1 DEFICIENCIES OF THE HIGHER EDUCATION SYSTEM

158. Judged against this background, the higher education system in Pakistan does not perform well. Its relatively tiny size – only 3.7% of the 18 to 23 age cohort participates in higher education. Even though enrolment in both public and private institutions is increasing rapidly at approximately 30% per year, the gross enrolment ratio does not compare well with its competitors such as India (7%) and Malaysia (12%)⁴¹.

159. There are deficiencies in the quality of both skills and research output of the sector. Few of Pakistan's public sector universities are ranked among the world's top 500 universities. The number of faculty members having PhD degrees is low at 25%. The pass rates of undergraduates are also low and international recognition of qualifications limited for most universities. Although the per capita expenditure per student is many times higher than in the secondary sector, the sector used to be poorly funded for appropriate infrastructure including libraries, laboratories, scientific equipment, teaching aids, and high speed internet connection.

160. Another reason of inadequate quality comes from the lack of specialisation among universities as public universities compete in offering the widest variety of disciplines and spread their scarce resources too thinly. They are not selective in specialising in a few areas to develop the requisite critical mass of resources required for achieving higher quality. Universities in the private sector, on the other hand, have tended to specialise in market-oriented disciplines like IT, Management Sciences and Business, and there are complaints, in this sector as well, about their quality.

161. The scale, quality and institutional arrangements of the sector are insufficient to support innovation in the economy or attract high flows of foreign capital to its skill base. The R&D capacity is very limited and there is little culture and few institutional arrangements to achieve knowledge transmission to the productive sector through university-industry partnerships. Precisely speaking, the Higher Education Sector in Pakistan faces numerous challenges in implementing its reform agenda, but the following have been identified as key issues to be addressed:

⁴¹ Higher Education Commission's presentation made to NEP Review Team on August 22, 2006.

1. Poor standard of faculty and lack of training / capacity building
2. Low enrollment in higher education
3. Minimal relevance of higher education to national needs and lack of compatibility to International Standards
4. Low quality of research and lack of relevance to national requirements
5. Poor Governance of Universities

9.2 STEPS SUGGESTED IN HEC-MTDF 2005-2010

162. The Higher Education Commission's Medium Term Development Framework (MTDF) 2005-2010⁴², addresses these challenges in a comprehensive way. This development framework combines HEC's vision for higher education in responding to domestic and global challenges, with the practical steps needed to deliver the HEC's contribution to the reform agenda set out in the HEC Mission document.

1. *Faculty* are the heart and soul of the university, and without an active and well qualified faculty it will not be possible to have meaningful development in this sector.
2. *Faculty development* can not be viewed in isolation and must be considered together with the development of an environment conducive to academics, as well as research and development in the universities. Faculty development programmes must also address factors pertaining to retention of qualified faculty in the public sector higher education institutions.
3. *Institutions of higher learning* are *knowledge repositories* whose faculty and students accrue knowledge and apply it to understand and address "local" issues.
4. An integral role of higher education institutions is in assisting with *policy making* and serving as "*think tanks*" to the public and private sector.
5. In line with the worldwide paradigm shift from "*Teaching*" to "*Learning*", programs of study will focus on ensuring *maximal absorption* of subject matter by the students.
6. Faculty training in pedagogical, communication and ICT skills is required at all levels to enhance the efficiency of teaching in higher education.
7. The higher education system and institutions must accord high priority to ensuring the *quality of services* and *quality of outcomes*. Internal *quality assurance* processes of higher education institutions must be strengthened to conform to *international standards* of quality assurance.
8. While building the higher education sector priority should be given to *recognizing excellence* and *supporting* it.

⁴² Pakistan: Assessment of the Medium-Term Development Framework, Higher Education Policy Note, The World Bank 2006.

9. To ensure that reform initiatives are aligned with development objectives, the *engagement* of key *stakeholders* of the higher education sector in the decision making processes is of utmost importance, particularly in ensuring the *relevance* of educational and research programmes to economic imperatives.
10. Changing innovation processes and the evolution of the relative contribution made by the private and public sectors have emphasized the need for strong *industry-university linkages*, allowing both sectors to interact and collaborate on joint projects.
11. Engineers build nations and engineering education must receive priority, especially in engineering disciplines of *immediate economic relevance* to major industry sectors such as:
 - a. Information and Computerization Technology
 - b. Petroleum Sector
 - c. Mining
 - d. Construction
 - e. Textile and Manufacturing
 - f. Engineering Design, etc
 - g. Biotechnology and Nanotechnology.
12. In the modern global knowledge-economy, employers increasingly look to universities and colleges to deliver the *well-educated workforce* they require in the form of *rounded, flexible, and readily employable graduates* to remain competitive.
13. A *broad-based* education system is required to ensure that graduates have not only mastered their respective areas of specialization but are also able to effectively interact with people having a wide variety of backgrounds.
14. Graduates of the higher education system must have the ability to *communicate effectively* both in reading and in writing.
15. In the rapidly changing global economy, the labour market constantly requires new and different skills, requiring mechanisms to be enhanced to allow professionals to upgrade their skills at regular intervals and develop new competencies through *lifelong learning*. Higher education institutions are required therefore to offer learning opportunities in response to diverse demands and work cooperatively with stakeholders to ensure that the appropriate courses are readily available.
16. *Brain Drain* is a daunting problem for Pakistan. Whilst it is essential to maintain mobility, and a source of intellectual enrichment, measures are to be introduced to encourage Pakistanis to return to their country of origin and to take part in its economic, social and cultural development.

17. The Higher Education sector is a major force for *innovation*. Universities and colleges through local, regional, national and international partnerships must share their expertise and facilities to support socioeconomic regeneration and growth.
18. Knowledge creation and diffusion are increasingly important drivers of innovation, sustainable economic growth and social well-being. *Research* is to be reconfirmed as a fundamental activity of institutions and the establishment and long term sustainability of a dynamic research sector in universities, that engages stakeholders in its activities, is key to achieve economic competitiveness.
19. It is widely recognized that *transferring knowledge* effectively is often as important as original scholarship. Incentives are to be provided to ensure that scientists who produce *innovative research* and work to *disseminate* its findings receive recognition and support. In addition, stakeholders who depend on the work of researchers are to be reassured that the investment of public funding is *sustainable* and directed toward areas of *national interest*.
20. Competitive *research grants* on funding must be available to ensure that the best ideas in area of importance are recognized, and allowed to develop.
21. Opportunities for *collaboration* with the world scholarly community should be provided for both post-graduate students and faculty alike.
22. It is imperative that award of Ph.D. degrees should signify *original contribution* to the world body of knowledge as certified by International experts.
23. Institutions of higher learning should be encouraged and supported to ensure “*productive*” *research output* and *generate intellectual property* through set up of *technology Industries Centres*.
24. *Universities of technology* should be established to *produce technologists* required by *industry*.
25. *National Centres* in areas of economic importance should be identified and strengthened to top world standards.
26. HEC envisions the universities and institutions of higher learning and research to play a *catalytic* role in the *economic development* of the region in which they are located. Development projects should therefore be initiated with a vision of sustainable economic development in the region in which the Institution is located. .
27. Determined efforts are essential to increase *access* to higher education for under-represented groups. The strategy here will be two-faceted: firstly to promote cultural change in instilling the value of higher education amongst citizens; and secondly to tackle the primary barrier of prohibitive costs of higher education. Distance education and open learning can play a major role in widening access.

28. Extensive access to higher education will first require *optimal* usage of existing *physical infrastructure*. It will be necessary however to invest in equipment, laboratory facilities and space to cater to the demand of *enhanced enrolment*.
29. Modern *information and communications technologies (ICT)* are key to enhancing efficiency, efficacy and impact of programmes of development in the higher education sector.
30. *ICT* must be *effectively leveraged* to deliver *high quality teaching and research support* in higher education both *on-campus* and using *distance education*, providing access to *technical and scholarly information resources*, and *facilitating scholarly communication* between researchers and teachers.
31. Additional *television channels* should be dedicated to the delivery of high-quality distance education programmes.
32. It is necessary to focus on implementation excellence, which will require adoption of *modern project management and reporting techniques* as well as *computerized financial management systems*
33. Allied with the increased demands on higher education by its customers and stakeholders, the sector faces *growing expectations* from government and society as a whole. With increased appropriation of public funds towards Higher Education come growing demands for *transparency* and that those financial allocations are *well-targeted*.
34. Movements in the global knowledge-society will require universities to develop into diverse, flexible, self-analytical and adaptable enterprises. Only a sector that is actively engaged in meeting the needs of its stakeholders will be adequately prepared to respond to the accelerated pace of change the global markets will inevitably undergo in the 21st century.⁴³

163. The Framework envisages increased investment for higher education, rising to 18% of the education budget on the assumption that the total education budget grows to 5% of GDP in 2010 and 7% of GDP by 2015. This will involve raising enrolment in higher education sector to 10% of target population by 2015 and to 15% by 2020. The Policy endorses the main lines of the Framework, while suggesting additional action that are consistent with the Framework.

Policy Actions:

1. Steps shall be taken to raise enrolment in higher education sector from existing 3.7% to 10% by 2015 & 15% by 2020 through different modes of education i.e. main stream education, distance education and virtual education
2. Investment shall be increased to 18% of the education budget on the assumption that the total education budget grows to 5% of GDP by 2010 and 7% by 2015.

⁴³ *Medium-Term Development Framework 2005-10, Higher Education Commission Islamabad.*

3. For promoting greater specialisation in research, a two-fold strategy for its R&D function shall be pursued: basic research in the universities and research institutions shall focus on building the capacity to conduct and absorb cutting edge research. The purpose would be to position the research endeavour to participate in the cutting research when research resources permit. The second strand shall be a focus on knowledge mobilisation – that is, transmission of research knowledge through various forms of university-industry partnerships and incubator programmes and science parks to the business sector. This commercialisation strategy aims at assist the innovation process of the economy.
4. Research grants and scholarships shall be awarded to deserving and poor students for continuing their studies in universities/institutes of higher education.
5. For promoting quality in its teaching function, universities shall collaborate to be selective in specialising in particular areas rather than each university attempting to cover the whole range of programmes.
6. Universities shall consider introducing four-year Bachelor degree programme. The PhD degrees shall have a minimum of four years. Universities shall develop quality assurance programmes, which include peer evaluation including foreign expertise.
7. Ranking system of the universities shall be made more broad-based including parameters that directly point to the quality of learning.
8. Recognising the importance of social sciences in developing better social understanding, transmission of civic and cultural values and the potential to reduce conflict, universities shall pay greater attention to this area in their research function.

CHAPTER 10.

FINANCING OF EDUCATION IN LINE WITH VISION 2030

10.1 POLICY VISION AND ITS FINANCING

164. “Without vision, the people perish.” The education sector has been without a comprehensive vision for far too long. Indeed, there have been policies, plans, reforms, goals, objectives, initiatives, and countless vision statement (i.e., Education for All), but there has been no vision: no widely owned understanding of where all of our efforts are taking us; no well informed conception of what a high-quality, high efficiency education system looks like and how it must function in order to be that way.

165. When reform tends to be without a clear vision, it tends not to add up to much of anything, as indicated in the diagram below. The net effect is close to zero, which means there is very little forward movement. Conversely, if there were a vision and all reforms and policies were aligned such that they worked toward the realization of that vision, the net effect would be substantial.

166. It is one thing to say that by 2015, “children everywhere, boys and girls alike, will be able to complete a full course of primary schooling,⁴⁴” it is quite another to know what the full course of primary schooling looks like *and what it will cost over time*. To say that “90% of the children in the age-group (5-9) would be enrolled in school by a specific year and not know what it will cost to achieve that goal is to say nothing at all. We not only need a vision of a system that works on behalf of more and more learners learning more and more; we need a vision the costs of which we know over time; a vision we know we can afford over time, given certain realistic assumptions about economic growth and the percentage of that growth going into education.

10.2 THE RESULTS: VISION 2030

167. The year is 2030 for which the Government of Pakistan is envisioning to get a very good return on its investment into education. In particular, the education system would be producing an abundance of:

1. citizens who are effective problem solvers—people who can think laterally and so apply their knowledge to new situations to come up with creative solutions;
2. citizens who are lifelong learners and capable of moving about from job to job within a complex and ever-changing economic environment;
3. citizens who contribute significantly to the information/knowledge-based global economy;
4. citizens who act responsibly in vibrant civic society and stable democracy;
5. and citizens who are morally upstanding.

⁴⁴ Millennium Development Goals

10.3 THE ESSENTIAL ELEMENTS

168. These results can be attributed to a number of essential elements within the education system:

1. Defined learning outcomes
2. A curriculum that is tightly aligned to those learning outcomes
3. An assessment system that is tightly aligned to the curriculum: one that determines how well each student has done vis-à-vis the learning outcomes
4. Performance standards for every education professional in the system
5. Performance appraisal systems that determine how well every education professional has performed vis-à-vis their performance standards
6. Accountability systems/mechanisms aligned to the performance appraisal systems
7. Institutionalized deliberative forums that drive on-going, well informed, and widely owned, system-wide improvement
8. Career ladders linked to professional development and performance
9. Sufficient funding

169. In 2030, learning outcomes exist for every grade/course. They prescribe what every learner needs to know and be able to do upon completion of the grade/course in which he/she is enrolled. The curriculum is aligned to these learning outcomes such that when it is fully implemented by a highly qualified teacher those learning outcomes can be realized. In order to determine how well the curriculum is being implemented—to see if the learning outcomes are being realized—an assessment system is in place; one that is implemented at the end of the year for every student in the system. Each student must now take an end-of-year (EOY) exam. That teachers and students can come to know how well they are progressing toward these learning outcomes, continuous assessment is practiced in every classroom.

170. Performance standards exist for every education professional in the system. These standards are tightly aligned to the particular roles and responsibilities outlined in each position's job description. A teacher's performance is based largely on how well his/her students do on the EOY exams. So too for Head Teachers, District Education Officers, and Provincial Education Officers: their performance is based in part on how well their respective students⁴⁵ do on the EOY exams. By making student achievement a measure of how well key personnel throughout the system perform ensures that classroom learning is the central focus of the entire education system.

171. The performance of education administrators (Head Teachers, District Education Officials, and Provincial Education Officials) is also determined by how well they utilize scarce resources on behalf of *more and more* students learning more and more. In particular, position-specific performance standards⁴⁶ are in place to ensure that a

⁴⁵ Inasmuch as a teacher considers the students within their classroom theirs, Head Teachers now consider the students within their school theirs, District Officers now consider the students within their district theirs, and Provincial Officers now consider the students within their province theirs.

⁴⁶ By way of example, planners will have performance standards in place that will, in a sense, force them to develop plans that have classrooms being built where they are most needed, not where some politician might want

certain number of un-enrolled children become enrolled annually. Inasmuch as it is important for those students who are in school to learn more and more (the quality issue), it is equally if not more important for those students who are not in school—the previously un-enrolled and drop-outs—to get into school and start the learning process (the access issue). To this end there exists a minimum standard of provision⁴⁷ (MSP) for each and every school⁴⁸ and therefore, for each student *and potential student*. As a result, resources are mobilized where they are most needed vis-à-vis some optimal blend of improved quality and improved access.

172. A performance appraisal system is in place in 2030 to determine how well, on an annual basis, each education professional has performed with regard to their particular performance standards. A critical feature of this system is the periodic ratcheting up of everyone's performance standards: no one is allowed to stand still within the system.

173. When educational professionals achieve their annual performance standards, they are rewarded; when they fail to meet those standards, organizational learning mechanisms are activated to remediate the situation—to facilitate the professional's learning such that their performance can improve. If after a number of remediation interventions sub-standard performance persists, sanctions are imposed. In short: all educational personnel are held to account for their performance, and a good portion of their performance is determined by how well, and how many of, their respective students perform.

174. School, district, and provincial-level performance is made transparent regularly in level-specific deliberative forums: institutionalized venues within which school, district, and provincial officials account for how well their respective educational jurisdictions are performing before a wide range of stakeholders. That these forums are the venues within which stakeholders reflect, deliberate, and ultimately counsel upon the ways and means of level-specific improvement, they are verily, the system's engines of on-going education development. As institutionalized entities these forums are formally mandated with bylaws to ensure that each and every stakeholder, including parents⁴⁹, has an equal say in the various activities of the forum.

175. Highly qualified education professionals permeate the system in part because they are being held accountable for doing their jobs, in part because of a needs-based demand-driven professional development infrastructure. There are career ladders for both teachers and administrators. In order to assume a position on any rung of the ladder, a person must, among other things (such as performance), take and pass a number of prescribed professional development courses designed to equip that person with the skills and knowledge necessary for them to carry out the roles and

them built.

⁴⁷ The minimum standard of provision is an index of sorts that indicates what, in the way of inputs (i.e., textbooks, pedagogical materials, contact hours, classroom space, etc.), is needed in order to provide a standard of education—in order for the learning objectives of each and every student (and potential student) to be realized over time.

⁴⁸ The MSP differs across school types: primary, middle, urban, rural, vocational/technical, etc.

⁴⁹ Parents are represented in higher-level forums by elected representatives in parent associations. Accordingly, District Parent Associations represent parents' views and concerns in District Forums while Provincial Parent Associations represent parents' views and concerns at Provincial Forums, etc.

responsibilities of that position. If they do not pass these courses, they cannot assume the position. Because the private returns of the next highest rung of the career ladder are so relatively high (i.e. increased pay, stature, and/or responsibility), educational professionals pay for their own professional development.

176. No one can be held accountable for achieving their performance standards without the resources necessary to do so: there must be accountability reciprocity. Accordingly, there is sufficient funding for all of this to work. That there is sufficient funding can be attributed to a number of factors:

1. Increased political and social will for quality education for all: politicians and citizens alike see the value of education and they are willing to invest in it.
2. Improved internal efficiency: with negligible repetition and drop out rates, more and more children are passing through the system, learning more, within the allotted timeframe⁵⁰.
3. Improved economic efficiency: by and large, the public returns to basic education far outweigh the private returns, while the private returns to post secondary education far outweigh the public returns. By obtaining more private contributions from those sub-sectors of the system where the private returns are greater, more public resources can be channeled into those sub-sectors of the system where the public returns are greater.
4. Improved administrative efficiency: with educational professionals being held accountable for performance, there is little to no waste in the running of the system.
5. Improved financial efficiency: high unit costs have been reduced⁵¹ and resources are being channeled into those things that yield the most learning.
6. Streamlined financial flows: all education finances are now earmarked.

10.4 THE HIGH PERFORMING SYSTEM

177. With these essential elements of the system in place by 2030, we now would be having classrooms in which high quality teaching and learning is regularly taking place, implementing a curriculum designed to facilitate critical thinking, problem solving, team work, and knowledge application. Each classroom is, at the very least, sufficiently equipped as per the minimum standard of provision for that school. Repetition and drop out rates are negligible largely because of the high-quality teaching and learning that is going on.

⁵⁰ When a child drops out after 2-3 years of education, (s)he has not learned enough for the state to reap the benefits of the investment that has been made in that child; and when a child repeats—when it takes, say, 15 years to receive the allotted 9 years of education—the state ends up paying an additional 67% than would be the case if that person never repeated. In both instances, one has rather large efficiency losses.

⁵¹ By way of example, in 2006 the average number of classrooms per primary school was just over 2. That average is now much closer to 10. With larger schools, we have much lower unit costs.

178. Each classroom has a well-trained⁵², highly motivated, and well paid teacher⁵³: an academic well versed in the subject(s) s/he teaches; someone who is also a professional educationist skilled in a number of modern pedagogical techniques that foster inquiry, interaction, and lateral thinking among all students regardless of their learning styles. Teachers assess their pupils continuously helping them to reflect on what they did right, what they did wrong, and how they could best learn from their mistakes. The vast majority of these students pass their EOY exams.

179. These high quality classrooms are supported by schools that are characterized by widespread learning, not just by the students, but also by the teachers, administrators, SMCs, and parents. All such role-specific learning is directed toward improving student achievement. Every school is adequately equipped—as per the minimum standard of provision—to foster such widespread and continuous learning.

180. Teachers interact with other teachers from within the school and from neighboring schools in order to learn from each other's experiences and knowledge. Head Teachers are well-trained professionals chosen from a pool of qualified administrators. To become a Head Teacher (or any other higher-level education administrator), aspirants are required to receive a passing grade on a set number of accredited professional development courses that prepare them for the position being pursued. All staff are hired, promoted, and retained on the basis of qualifications and performance.

181. The overall well being of the school is ultimately in the hands of the SMC, members of which are well trained to carry out their particular roles and responsibilities. Elections are staggered over time such that there is no longer the possibility of complete turnover of membership. Members now serve for 6 years with elections taking place every 2 years for 1/3 of the membership. This allows 2/3rd of the membership to help train the newly elected members. As a result, SMCs are now largely self-training entities.

182. Ongoing school improvement is driven by the development and implementation of School Improvement Plans (SIP). These plans are developed regularly within the school/community-level deliberative forums mentioned earlier. This ensures that the plans and the decisions leading up to them (e.g., setting priorities, weighing the relative importance of various needs, and assessing and making tradeoffs) are widely owned and reflect the best information and knowledge available.

183. There are sufficient funds for all performance standards to be met; put another way, there are enough resources to run the school effectively and to drive a meaningful school improvement program. The SIPs are an essential part of a rational budgeting process that triggers the resources needed to implement them.

184. A nested set of inter-related and highly coordinated education systems—district, province, and federal—support these schools (see Figure 8). There are clearly defined divisions of labor, lines of authority, roles and responsibilities, and channels of

⁵² The minimum academic qualification for teachers is (B.A./B.Sc.) while the minimum professional qualification is (B.Ed.).

⁵³ By way of example, primary-level teachers are being paid 70% more *in real 2005 terms* than their 2005 counterparts.

communication: the three systems work as one. Political interference has all but been eliminated, in part because of the accountability systems that have been put in place throughout the system; in part because all education personnel are now hired and removed at the level at which they work: teachers are hired and removed at the school/community level, district officers are hired and removed at the district level, etc.

185. System-wide improvement—district, provincial, and federal—is driven by the development and implementation of level-specific improvement plans. These improvement plans are, to some extent, cumulative. District improvement plans reflect their respective schools' improvement plans and whatever needs to be done within the districts. Provincial improvement plans reflect their districts' plans and whatever needs to be done within the provinces, etc. These plans are drawn up within the level-specific deliberative forums mentioned earlier.

10.5 THE FUEL

186. The nine essential elements bring about the high performing system focused on classroom learning. Both are fuelled by data/information that is timely, valid, and accurate. The National Education Management Information System (NEMIS) regularly provides relevant high-quality data/information to each and every stakeholder throughout the system⁵⁴. As a result people know what is going on, how well their students are doing, how well their school is doing, how well their district is doing compared to other students, schools, and districts respectively. They also know how the money is being spent. All education administrators have ready access to the information they need in order to make informed decisions regarding the allocation and utilization of scarce resources vis-à-vis more and more students learning more and more.

10.6 THE COST

187. The aforesaid vision is affordable, given certain assumptions about the economy—annual percent in real growth in the GDP (4.8%⁵⁵)—the percent of GDP spent on public education annually (4.5%), and a wide range of policy options regarding enrolment rates; the number of teachers; the number of non-teachers; construction needs; facilities, equipment, and materials; post-secondary education, operating costs, and a wide range of unit costs including salaries. The numerical value of each policy option has been set to achieve the following goals:

1. getting as many children into, and staying in school as possible;
2. providing them with the best possible education; and
3. ridding the system of as much waste as possible.

188. Increasing enrolment costs money; so too does increasing quality. Reducing waste saves money. When the first two factors “out-cost” the third, there *has* to be increased spending as well, but within reason. The education sector cannot expect the economy to

⁵⁴ NEMIS is largely a composite of provincial and areas EMISs that all work together as a unified and highly coordinated whole. The district EMISs extend all the way out to each and every school.

⁵⁵ The average of the last 15 years.

grow at 10% per annum (in real terms) over the course of the next 20 years; nor can it expect to receive 10% of GDP over that same period of time.

189. The “solution” presented in this document is not the only possible one—countless other affordable solutions can be generated. That said, here are some cost estimates for essential features of *A High Access, High Quality, and Affordable Scenario*:

- Total Cost (2005-2030): *Rs. 12,922,685,093,115 (Rs. 12,922 billion)*
- Average Annual Cost: *Rs. 497,026,349,735 (Rs. 497 billion)*
- 2005-2030 Surplus: *Rs. 1,966,192,768,025 (Rs. 1,966 billion)*
- 2005 Cost/Pupil: *Rs. 6,545 per annum*
- 2030 Cost/Pupil: *Rs. 8,944 per annum*
- *100% Primary Enrolment by 2015*
- *100% Middle Enrolment by 2015*
- *100% Secondary Enrolment by 2020*
- *40% Higher Secondary Enrolment by 2025*
- 2005 Average Teacher Salary: *Rs. 93,993*
- 2030 Average Teacher Salary: *Rs. 202,750*
- Lowest qualified teachers: *B.A./B.Sc & B.Ed.*
- Primary and Middle Stage Teachers: *70% raise (in real 2005 terms)*

190. The 2005-2030 “surplus” is critical, and most reassuring, in that it offers all of us a rather large cushion regarding some of the policy options presented in the scenario. Note, it is nearly twice the annual average cost of education. Should some of our assumptions be overly optimistic and/or if some of our base year data is off by a few percentage points, having a cushion as large as we have here, means that Vision 2030 will still be affordable over time.

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