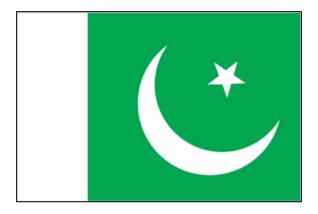
CLIMATE CHANGE LEGISLATION IN

PAKISTAN

AN EXCERPT FROM

The 2015 Global Climate Legislation Study A Review of Climate Change Legislation in 99 Countries



Michal Nachmany, Sam Fankhauser, Jana Davidová, Nick Kingsmill, Tucker Landesman, Hitomi Roppongi, Philip Schleifer, Joana Setzer, Amelia Sharman, C. Stolle Singleton, Jayaraj Sundaresan and Terry Townshend

www.lse.ac.uk/GranthamInstitute/legislation/







Pakistan

Legislative Process

The Democratic Islamic Federal Republic of Pakistan has a bicameral parliament. This is composed of the Senate or Upper House and the National Assembly or Lower House. The Senate has 104 seats and members are indirectly elected by provincial assemblies and the territories' representatives in the National Assembly to serve six-year terms. One half of the representatives are elected every three years. The last Senate election was held in March 2012 and the next one is expected to take place in 2015. The National Assembly has 342 seats of which 272 members are elected for five-year terms by popular vote. There are 60 seats reserved for women and 10 seats for non-Muslims. The last election for the National Assembly was held in May 2013 and the next one is expected to be held in 2018.

The President is elected by both Houses of Parliament and the Provincial Assemblies. The Prime Minister, who heads the Cabinet, belongs to the National Assembly. Members of the Cabinet are appointed by the President on the advice of the Prime Minister. Cabinet members are taken from the National Assembly (75%) and the Senate (25%).

A bill relating to the Federal Legislative List can be originated in either House. If the House passes a Bill through majority vote, it is transmitted to the other House. If the other House passes it without amendment, it is then presented to the President for assent.

However, if the bill is not passed within 90 days or is rejected by the non-originating House, it is considered in a joint sitting summoned by the President on the request of the House in which the bill was originated. If the bill is passed in the joint sitting by the majority of the members of the two Houses, it is presented to the President for assent. If the bill is presented to the President, a decision to assent should be made within 10 days. However if after 10 days no statement of assent has been made, it is deemed to have been given.

Under the Constitution, the Parliament may also legislate directly for the provinces where there is a request made by those provinces. If the Federal Government proclaims a State of Emergency in any province, the power to legislate over that province is also then vested in the Parliament. However, bills passed by the Parliament during a State of Emergency remain in force only for six months after the State of Emergency is lifted. Actions taken during a State of Emergency remain valid once the crisis has passed.

Approach to Climate Change

Pakistan has been a party to the UNFCCC since 1994 and of the Kyoto Protocol since 2005. The first draft of the National Climate Change Policy (NCCP) was published by the Ministry of Environment in April 2011, was adopted by the Parliament in 2012 and was officially launched in 2013. The Framework for Implementation of Climate Change Policy (2014-2030) was developed later in the same year to set out priority actions and implementation schedule for target sectors.

The NCCP was developed with extensive consultation with Pakistan's provinces, federal institutions and civil society. Its goal is "to ensure that climate change is mainstreamed in the economically and socially vulnerable sectors of the economy and to steer Pakistan towards climate-resilient development". It will be subject to reviews and updates every five years by the Climate Change Policy Implementation Committees. The NCCP would help Pakistan to continue on a development path to achieve the goals envisioned in the Planning Commission's Pakistan 2025 document.

The Prime Minister's Committee on Climate Change (PMCCC) is an overarching body that monitors climate change-related developments both globally and domestically and provide overall climate policy guidance. The Global change Impact Studies Centre (GCIS) is the secretariat to the PMCCC. In 2012, the Ministry of National Disaster Management was renamed the Ministry of Climate Change and is mandated to address climate change in the country and coordinate with other relevant agencies and institutions. The NCCP Committee was established to ensure effective implementation of the climate policy and to oversee the progress in this regard. The Committee meets biannually and reports to the PMCCC on a regular basis. One of its tasks is the regular monitoring and upgrading of the NCCP at an interval of five years. The Committee is chaired by the Minister of Climate Change and will be integrated by the Secretaries responsible for climate change of other Ministries. These are: Planning and Development, Foreign Affairs, Industries and Production, Finance, Water and Power, Food and Agriculture, Health and Defence.

Energy Supply

Pakistan has experienced an energy crisis because of stalled reforms, energy shortages and financial deficit. Electricity sales rose by 40% in the five years to June 30, 2007, a period of high economic growth, while generation remained stagnant. Pakistan is a net importer of crude oil and refined products. In 2013, electricity was produced from oil (36%), natural gas (29%), hydropower (29%) and nuclear power (5%).

The Ministry of Water and Power has developed the National Power Policy (2013) to set out an overall energy policy. The goals of the Policy include building power generation capacity to ensure sustainable energy supply (decrease supply-demand gap from 4,500-5,000MW to 0MW by 2017) and generation of affordable electricity by using indigenous resources such as coal and hydro (decrease cost from PKR12 (USD0.11) per unit (unit unspecified) to PKR10 (USD0.09) by 2017).

In October 2014 Pakistan inaugurated its first high precision solar measuring station. This will be the first of many with 100MW of capacity currently being constructed and due to begin generating electricity in early 2015.

The World Bank and Pakistan's Alternative Energy Development Board are working together to map renewable energy resources across the country. The project, supported by the World Bank's Energy Sector Management Assistance Programme, will measure Pakistan's potential for wind, solar and biomass energy. A major part of this mapping initiative is to collect ground-based measurement data for up to two years. The data will then be used to improve the models, leading to the production of solar and wind atlases. These in turn can be used to set tariffs and guide the strategic development of renewable energy, and by commercial developers to carry out feasibility studies, leading to development of solar and wind power plants.

Energy Demand

The National Energy Conservation Authority (ENERCON) was established under the Pakistan Energy Efficiency and Conservation Act (2011) to initiate, coordinate and implement energy conservation programmes. In response to an inefficient power transmission and distribution system the National Power Policy (2013) aims to "develop the most efficient and consumer-centric power generation, transmission and distribution system". The Policy aims to: create a culture of energy conservation and responsibility; promote world class efficiency in power generation; and minimise inefficiencies in the distribution system (decrease transmission and distribution loss from 23-25% to 16% by 2017).

REDD+ and LULUCF

Pakistan's forest cover is small (4.8%) and the rate of deforestation is 0.2-0.4% per annum. The National Forestry Policy (2010) sets out to restore existing forests in addition to restoring deforested and degraded areas. There is a strong focus on watershed reforestation, which should confer additional benefits in terms of reduced downstream siltation; more stable river discharge; and benefits to hillside communities in terms of improved supplies of timber and non-timber products. The Pakistan 2025 policy states that the largest single abatement strategy is expected from preventing deforestation (25%), which will be achieved by greater awareness (especially among women and children in rural areas) and civil society pressure for law enforcement. The document displays the target of 6% increase in forest cover by 2030 through better watershed management and planting campaigns.

Transportation

According to Pakistan 2025, inefficiency in the transport system is estimated to have cost the economy 4-6% of GDP. The Policy sets out plans to establish an efficient and well-integrated transportation system to develop a competitive economy. Some of the major initiatives are: construction of major new motorways, efficient port handing and customs, replacement and doubling of railways tracks, new railway carriages and locomotives, modernisation of truck

fleets, and mass transit system in metropolitan areas. The number of functional airports, including new ones, would be doubled to 50 by 2015.

Adaptation

The main focus of the Pakistan 2025 document is to promote mitigation and adaptation, in view of the high vulnerability to the impacts of climate change including degraded ecosystems and high levels of rural poverty, illiteracy and marginalisation of women. The policy document refers to mitigation measures for energy efficiency and conservation, transportation, forestry, industry, agriculture, livestock and town planning.

Besides the national measures that are laid out in Pakistan 2025 and the NCCP, Pakistan has been running projects on disaster risk management and climate change adaptation under the funding and guidance from the Global Facility for Disaster Reduction and Recovery (GFDRR) managed by the World Bank. It is one of the priority countries within the GFDRR and key programmes include the Development of a National Platform for Risk Assessment and Catastrophe Risk Financing (USD500,000 between 2012 and 2015) and Flood Emergency Preparedness (USD280,000 between 2010 and 2011). The priorities for GFDRR engagements are: analysis and advocacy for enhanced understanding of risk and their long-term impacts; disaster prevention; emergency preparedness; emergency response operations; and advancement of risk financing mechanisms. Key partners include the UN, South Asian Association for Regional Co-operation (SAARC), Australia, EU, Japan, United Kingdom and the United States.

Pakistan: Legislative Portfolio

| Name of law | The Pakistan Energy Efficiency and Conservation Act |
|-------------|---|
| Date | 2011 |
| Summary | The Act is a driver of institutional development to improve energy efficiency, specifically mandating the creation of: the National Energy Conservation Authority (ENERCON); the Fund of ENERCON; and the Pakistan Energy Conservation Council. ENERCON will take multiple roles, including (a) serving as the sole federal authority for initiating, catalysing, carrying out and co-ordinating the implementation of all energy conservation programmes in all sectors of the economy, and, (b) initiating research and development programmes in renewable energy. |
| | The Energy Conservation Council is custodian of national policy for energy conservation and ensures proper utilisation, planning and management of energy in all sectors of the economy. It is intended to co-ordinate, supervise and carry out enforcement of the provisions of this Act. It should create awareness and disseminate information related to efficient use of energy resources, and coordinate integration and inculcation of energy conservation concerns in national development plans and policies. In addition, the Council should approve energy efficiency standards and ensure their enforcement and compliance; direct the Authority in the conduct of research and development, and the preparation and execution of demonstration projects and national programmes on energy conservation and recommend to the Federal Government the adoption of measures directly or indirectly conducive to energy conservation. |
| | The Energy Conservation Council promotes investment by the public and private sectors in energy conservation through partnership or other innovative arrangements. The Council is also mandated to provide policy support to encourage and facilitate import and local manufacture of technologies for the promotion of energy conservation. In order to mark |

achievements in the sector, the Council should institute national energy conservation and management awards for energy consumers to promote and encourage energy conservation.

Finally, the ENERCON fund is to be used to meet expenses incurred in promoting the objectives of the Act including payments of salaries etc., rather than the actual implementation of activities per se.

| Name of law | Alternative Energy Development Board Act | | |
|-------------|--|--|--|
| Date | 2010 | | |
| Summary | The Act creates an Alternative and Renewable Energy Development Board. The text largely sets out the formal standing of the board, outlying its financial status and how to appoint members of the board etc. | | |
| | Specifically the functions of the board are to: | | |
| | Develop national strategy, policies and plans for utilisation of alternative and renewable energy resources to achieve the targets Act as a forum for evaluating, monitoring and certification of alternative or renewable energy projects and products. This includes a) acting as a coordination agency for commercial application of alternative or renewable technology; and b) facilitating energy generation through alternative or renewable energy resources, including: inter alia the promotion or development of renewable energy projects; and interacting with other agencies domestically and internationally for alternative energy production | | |
| | The Act also allows the board to establish an institute of renewable energy technologies. | | |

| Name of law | The Pakistan Council of Renewable Energy Technologies Act | |
|-------------|---|--|
| Date | 2010 | |
| Summary | This Act legislates for institutional development by mandating the establishment of the Pakistan Council of Renewable Energy Technologies. The council will be responsible for promoting the development, acquisition, propagation and dissemination of renewable energy technologies. Specifically named technologies are: solar/photovoltaic; thermal, hydrogen, biogas/biomass, mini and micro hydro power; and wind technologies. | |
| | The council will also be responsible for the liaison with national and international organisations to promote technical co-operation in addition to assisting the government in the industrial production of renewable energy technologies. | |

Pakistan: Executive Portfolio

| Name of Policy | Pakistan 2025: One Nation, One Vision | | |
|----------------|--|--|--|
| Date | 29 May 2014 | | |
| Summary | This document presents the country's strategy and road-map to reach national goals and aspirations. The ultimate goal envisioned is for Pakistan to be one of the 10 largest economies in the world by 2047. The following pillars of the vision meet elements of the millennium development goals (MDGs) and sustainable development goals (SDGs): • People first: developing social and human capital and empowering women • Growth: sustained, indigenous, and inclusive growth • Governance: democratic governance - institutional reform and modernisation of the public sector • Security: energy, water and food security • Entrepreneurship: private sector and entrepreneurship-led growth • Knowledge economy: developing a competitive knowledge economy through | | |

value addition

• Connectivity: modernising transport infrastructure and regional connectivity.

While the overall direction of the document is development of the country, climate change is considered as one of the challenges the country would face that requires mitigation and adaptation. Pakistan's vulnerabilities are seen as an important challenge of its transition towards a high level of sustained growth. Following vulnerabilities and challenges are mentioned in the document:

- Water security: current water availability is less than 1,100 cubic meters per person, down from 5,000 cubic meters in 1951; Pakistan's water storage capacity is limited to 30 days
- Food security: Pakistan ranks 76th of the 107 countries on the Global Food Security Index
- Glacial melt: Indus basin (water reservoir) affected by the glaciers in the Hindukush-Karakoram and Himalayas
- Biodiversity threat caused by climate change: habitat destruction and alteration, biotechnology (such as basmati rice, turmeric and neem) and threats of genetically modified seeds and germplasm to indigenous species
- Energy security: alternative energy
- Institutions that favour the status quo
- Infrastructure bottleneck.

The Vision 2025 stands upon the target fulfilment of the MDGs and SDGs by 2030. The document also sets out 25 goals in accordance to the 7 pillars. The goals that are related to the purpose of this study are as follows:

- Double power generation to over 45,000MW, to provide uninterrupted and affordable electricity
- Increase access to electricity from 67% to 90% of the population
- Improve generation mix (15%) and reduce distribution losses (10%) to reduce average cost per unit by over 25%
- Increase the share of indigenous sources of power generation to over 50%
- Address demand management by increasing usage of energy efficient appliances and products to 80%
- Increase water storage capacity to 90 days
- Improve water use efficiency in agriculture by 20%
- Ensure access to clean drinking water for all citizens

| Reduce food insection | are population | from 60% to | 30%. |
|---|----------------|-------------|------|
|---|----------------|-------------|------|

Name of Policy National Power Policy

Date

2013

Summary

This Policy is produced by the Ministry of Water and Power of the Government of Pakistan. It has been adopted to provide an overall direction of energy policy in Pakistan. It identifies current challenges as follows:

- Current supply-demand gap of 4,500-5,000 MW, which has been continuously growing in the past 5 years
- Expensive electricity price (PKR12 (USD0.11) per unit) due to dependence over thermal fuel sources
- Energy inefficiency due to power loss from transmission and distribution (23-25%)
- Subsidies and circular debt due to energy inefficiencies, energy theft and high cost of generation.

The Policy sets the following targets to achieve sustainable power generation, energy conservation, affordable energy supply, energy efficiency and good governance:

- Decrease supply-demand gap to zero by 2017
- Decrease cost of generation from PKR12 (USD0.11) per unit to PKR10 (USD0.09) per unit by 2017
- Decrease transmission and distribution losses from 23-25% to 16% by 2017
- Increase electricity payment rate from 85% to 95% by 2017

 Decrease decision making processing time at the Ministry of Water and Power and related departments

Basic principles laid out in the Policy are efficiency, competition and sustainability. Though detailed implementation strategies are not indicated, basic strategies to achieve overall goal are indicated. Strategies on energy supply, energy demand, affordable power, supply-chain, generation, transmission, distribution, financial efficiency and governance are listed.

Name of Policy National Climate Change Policy (NCCP)

Date September 2012

Summary

The Policy identifies vulnerabilities to climate change in the sectors of water resources, agriculture, forestry, coastal areas, biodiversity and vulnerable ecosystems and spells out the appropriate adaptation measures to be adopted. It also puts forward appropriate measures concerning disaster preparedness, capacity building, institutional strengthening, technology transfer and international cooperation.

The Policy provides a comprehensive framework for the National Action Plan for adaptation and mitigation. The objectives of the new policy are to pursue sustainable economic growth with a series of measures that appropriately address the challenges of climate change. These measures should integrate climate change policy with interrelated national policies. It is intended that policies should focus on pro-poor and gender-sensitive adaptation while also promoting mitigation. There is an explicit acknowledgement of the risks posed to water, food and energy security posed by climate change; and the need to minimise the risks from the increased frequency and intensity of events like floods and droughts. The policy seeks international finance to support the development required to meet these numerous challenges. However, in addition to directly seeking finance, the policy seeks to create economic incentives to encourage public and private sector investment in adaptation measures and the promotion of conservation of natural resources and long-term sustainability.

All relevant ministries, departments and agencies will have to devise their own plans and programmes to implement policy provisions relating to their sectors. Similarly, the lower levels of government, provincial governments; the regions of Azad Jammu and Kashmir and Gilgit Baltistan; federally administrated territories and local governments are expected to establish their own strategies, plans and programmes for NCCP implementation.

Name of Policy National Sustainable Development Strategy (NSDS): Pakistan's pathway to a sustainable and resilient future

Date

May 2010

Summary

The goal of the NSDS is "vibrant and equitable economic growth" that delivers benefits to all, particularly the poor and the vulnerable, in a way which does not lead to undue exploitation or degradation of natural resources.

The need for the NSDS is stark since the country faces a series of significant challenges: Growth rates are currently largely coupled to resource and natural material use, leading to continued environmental degradation. This has contributed to increasing water scarcity, a significant problem given that storage capacity and water efficiency delivery is low. In the energy sector, thermal efficiency is low, distribution losses are high, and power cuts are reported to be a common frustration for domestic and business users. In addition, strategic energy reserves are low. These problems are set against a backdrop of high poverty and illiteracy rates in addition to increased impacts of natural hazards, notably the impact of disastrous flooding.

The three core programme areas addressed are:

- Economic: Sustainable trade, Cleaner Production, and Sustainable Consumption
- Environment: Natural capital and Biodiversity
- Social: Social protection, poverty alleviation and equal opportunity/human development.

The strategic goals of the programme are to:

- Promote green investment and green jobs
- Improve eco-efficiency by changing production and consumption systems
- Internalisation of environmental costs into pricing
- Develop sustainable infrastructure focusing on transportation and communication
- Develop demand for sustainable consumption among consumers through awareness raising
- Account for depletion of natural resources in national accounts
- Promote efficient use of energy and water, including through improved watershed management and reforestation
- Improve biodiversity management and increase forest cover; prepare lists of endangered species
- Deliver basic services of acceptably high quality to all citizens. These would cover 10 years of schooling, healthcare, food, water, shelter and energy
- Ensure preparedness for natural and human-made calamity and emergencies through mitigation and integration of disaster contingencies in broader development strategies.

Name of PolicyNational Forest PolicyDate2010SummaryThis policy (supporte

This policy (supported by caveats in the National Environment Policy) addresses the sustainable use of renewable natural resources. It acknowledges the multiple functions of Pakistan's forests, such as carbon storage for climate change mitigation. However, there is a particularly strong focus on forests' role in mountain areas where they provide protection from soil erosion and reduction of downstream siltation; and crucially, watershed protection. It also notes the potential of forests to support local livelihoods in terms of provision of non-timber forest products (mushrooms, medicinal plants etc.).

Much of Pakistan's forests have now been cleared, increasing the importance of managing what remains under a framework of sustainable use. In particular the sustainable use should benefit marginalised groups such as women and children. Use of existing resources should be complemented with forest restoration activities to attempt to regenerate forests in order to safeguard economic growth.

Approaches to achieve the desired sustainable use of forests include the substitution of firewood and timber (specifically discouraging the use of rare species in government buildings); and the prevention of encroachment on remaining forest lands through regulation of grazing.

In order to finance the protection of watersheds and safeguard Pakistan's water supply, the forest policy stipulates the creation of a forest fund. The fund may also be used to finance the promotion of forestry research and education in Pakistan.

Sources

- Asia LED Partnership, Country Profiles: Pakistan, 2014. [URL: http://asialeds.org/country-profiles/pakistan]. Accessed 24 October 2014.
- Central Intelligence Agency (CIA), The World Factbook: Pakistan, 2014. [URL: https://www.cia.gov/library/publications/the-world-factbook/geos/pk.html]. Accessed 3 December 2014.
- Climate Change Division, Framework for Implementation of Climate Change Policy, 2013, Islamabad
- Global Facility for Disaster Reduction and Recovery (GFDRR), Priority Countries, 2014. [URL: https://gfdrr.org/priority-countries]. Accessed 24 October 2014.
- Malik Amin Aslam Khan, Amir Pervaiz, Shakeel Ahmad Ramay, Zuhair Munawar and Ahmad Vaqar, National Economic and Environmental Development Study (NEEDS): Pakistan, 2011. [URL: https://unfccc.int/files/adaptation/application/pdf/pakistanneeds.pdf]. Accessed 24 October 2014.
- Malik Amin Aslam Khan and Amir Pervaiz, National Sustainable Development Strategy Pakistan's Pathway to a Sustainable and Resilient Future, 2012. United Nations Development Programme/Government of Pakistan.
- Ministry of Climate Change, Government of Pakistan, Climate Change Division: Home, 2012. [URL: http://www.mocc.gov.pk/]. Accessed 3 December 2014.
- Ministry of Environment, Clean Development Mechanism (CDM) National Operational Strategy, 2006. Government Of Pakistan.
- Ministry of Environment. National Environmental Policy, 2001. Ministry of Environment, Local Government and Rural Development. Government of Pakistan.
- Ministry of Environment. National Forest Policy, 2010. [URL: http://sindhforests.gov.pk/admin/MediaLibrary/National%20Forest%20Policy%202010.pdf]. Accessed 3 December 2014.
- Ministry of Environment, National Forest Policy 2001, 2001. Ministry of Environment, Local Government and Rural Development. Government of Pakistan.
- National Assembly of Pakistan, Home, 2014. [URL: http://www.na.gov.pk/en/index.php]. Accessed 3 December 2014.
- Planning Commission of Government of Pakistan, Pakistan 2025: One Nation, One Vision, 2014, Islamabad.
- Senate of Pakistan, Home, 2014. [URL: http://www.senate.gov.pk/en/index.php]. Accessed 3 December 2014.
- United Nations Environmental Programme, National Sustainable Development Strategy of Pakistan, 2009. Presentation to the UNEP Regional Workshop 10-12 September 2009, Bangkok.
- U.S. Energy Information Administration (EIA), Pakistan, 2014. [URL: http://www.eia.gov/countries/country-data.cfm?fips=pk]. Accessed 23 October 2014.
- World Bank, Global Renewable Energy Mapping Program Gets Underway in Pakistan with First Solar Measurement Station, 2014. [URL: http://www.worldbank.org/en/news/feature/2014/11/12/global-wbg-renewable-energy-mapping-program-gets-underway-in-pakistan-with-first-solar-measurement-station]. Accessed 2 December 2014.