

# **Pakistan: A Case of Premature Deindustrialization?**

**Naved Hamid & Maha Khan**

# Background

- Historically, the manufacturing sector was the engine of growth for the advanced countries
- The expanding manufacturing sector absorbed most of the surplus labor from the agricultural sector
- Thus for a long period, in the advanced countries, the share of manufacturing in the country's output and employment increased
- Because of faster productivity growth in manufacturing than rest of the economy and decline in relative price of manufactures, ultimately the share of manufacturing in advanced countries stopped growing.
- The process of declining share of manufacturing in developed countries was described as 'deindustrialization' and has been the subject of debate among economists for a long time.

# Premature Deindustrialization

- Recently, it has been seen that the share of manufacturing employment and output has started to decline in many developing countries.
- As this turning point in the share of manufacturing is occurring at a much lower level of per capita income than it did in the case of advanced countries, it has been called “premature deindustrialization”, a term first used by Dasgupta and Singh (2006)

# Premature Deindustrialization

- The differential productivity growth in manufacturing mechanism for deindustrialization should not apply to developing countries as their share in world markets for manufactures is small, i.e., they are price takers.
- Higher productivity growth in manufacturing in a developing country should not affect its domestic relative prices, instead it should result in industrialization.
- However, because of globalization and emergence of China as the workshop to the world, the decline in international relative price of manufactures have accelerated in the last 2 decades and developing countries may have imported “deindustrialization”

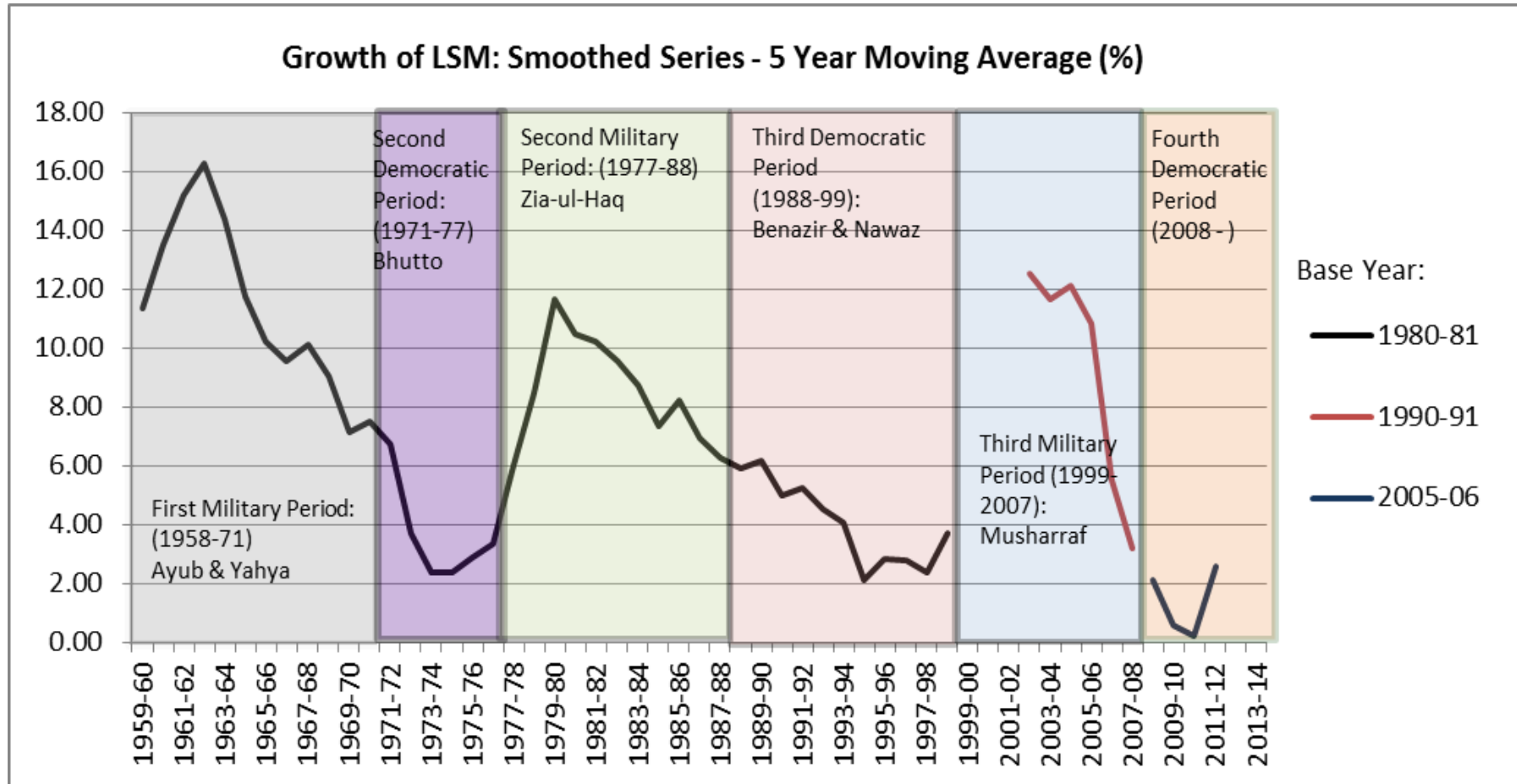
# Premature Deindustrialization

- Rodrik uses 3 measures, i.e., manufacturing's share in employment, in GDP at current and in GDP at constant prices, to determine which developing countries if any were experiencing premature deindustrialization
- He finds that most developing countries, except for manufacturing exporters in Asia, are experiencing premature deindustrialization
- He concludes that the impact of opening up of trade and declining trend in relative price of manufactures has been most severe for countries whose manufacturing sectors developed, and continue to operate, with a high degree of protection
- These countries did not experience rapid productivity growth that has taken place in manufacturing exporting countries
- Unless, in a country manufacturing productivity increases faster than world-wide decline in relative price of manufactures, the share of manufacturing in the economy will decline

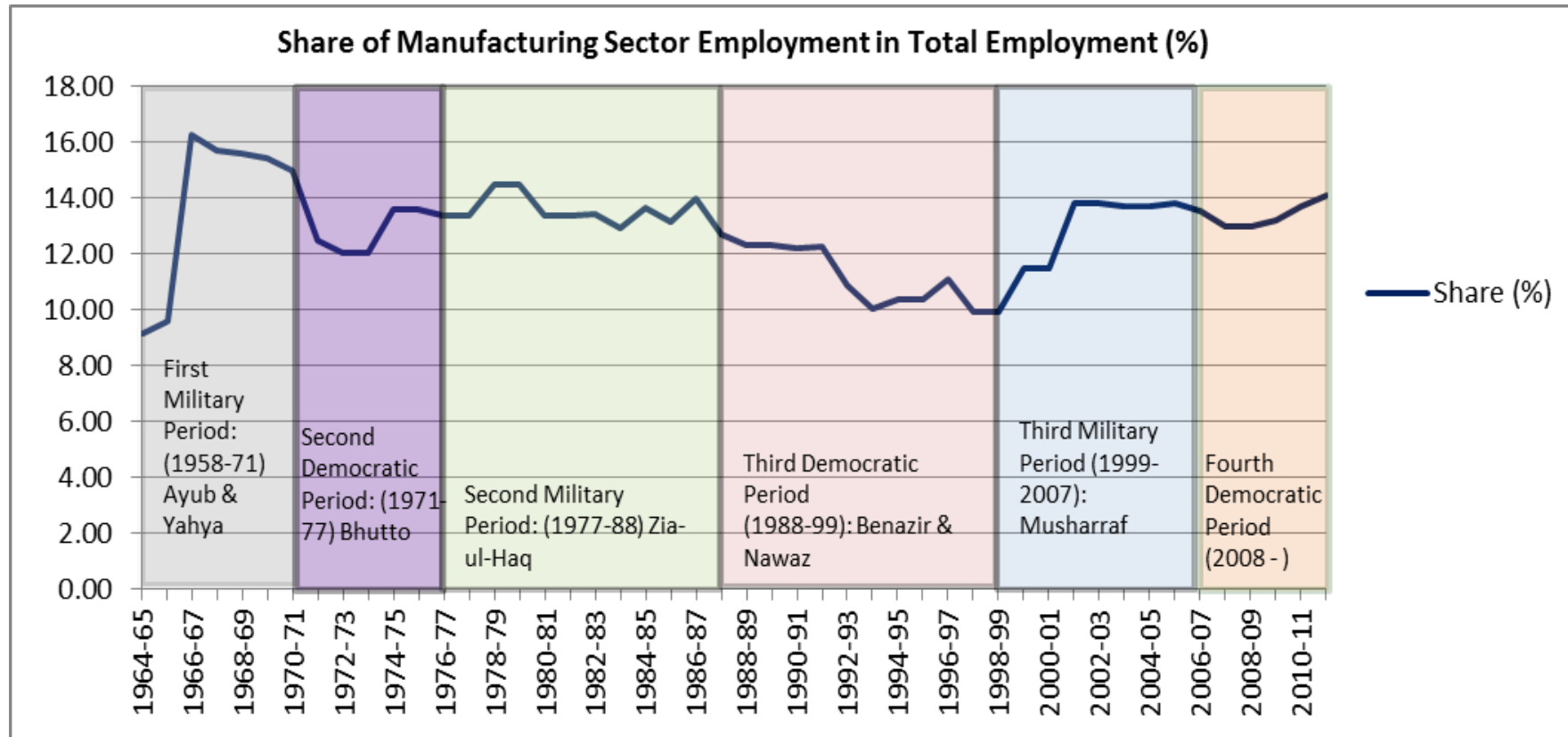
# Pakistan's Experience

- In this context we first look at trends in growth and in share of the manufacturing sector in Pakistan over the last 5 decades.

# Growth Trend in Manufacturing



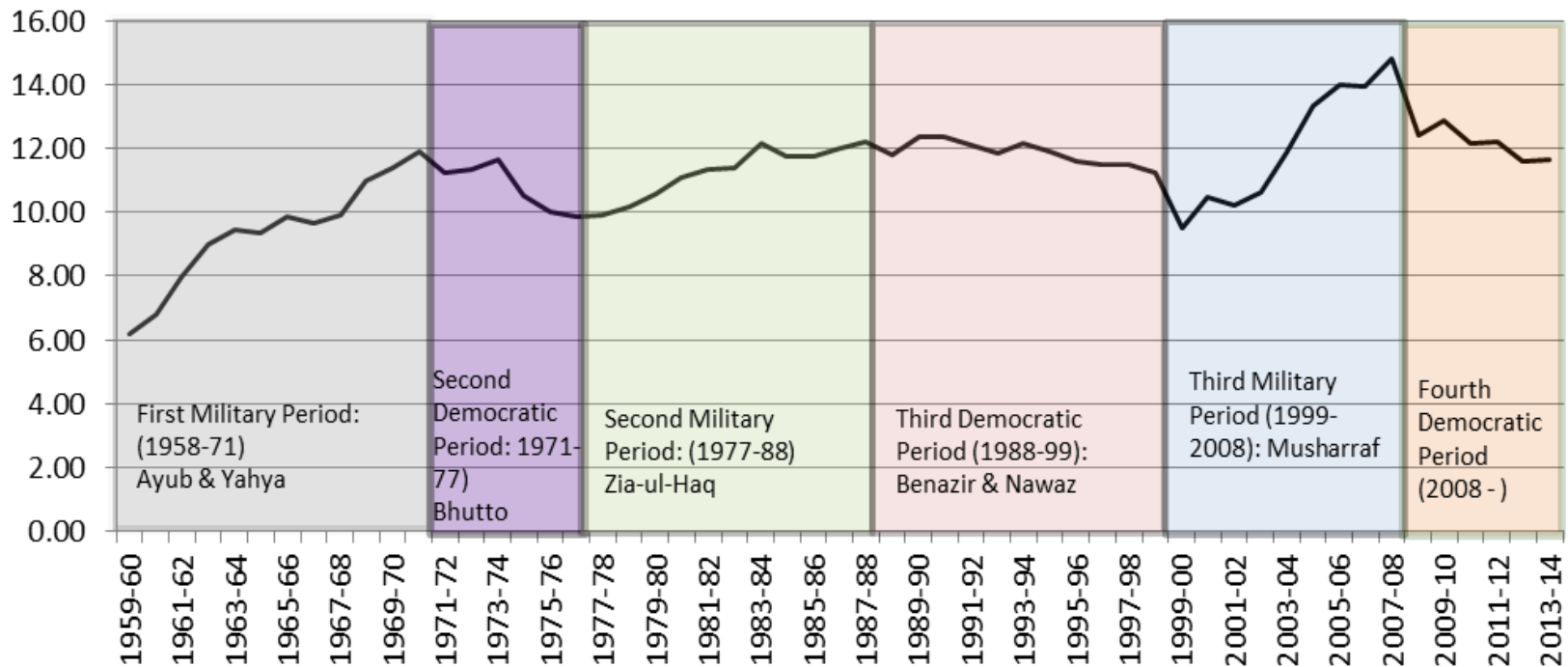
# Trend in Manufacturing Share in Employment



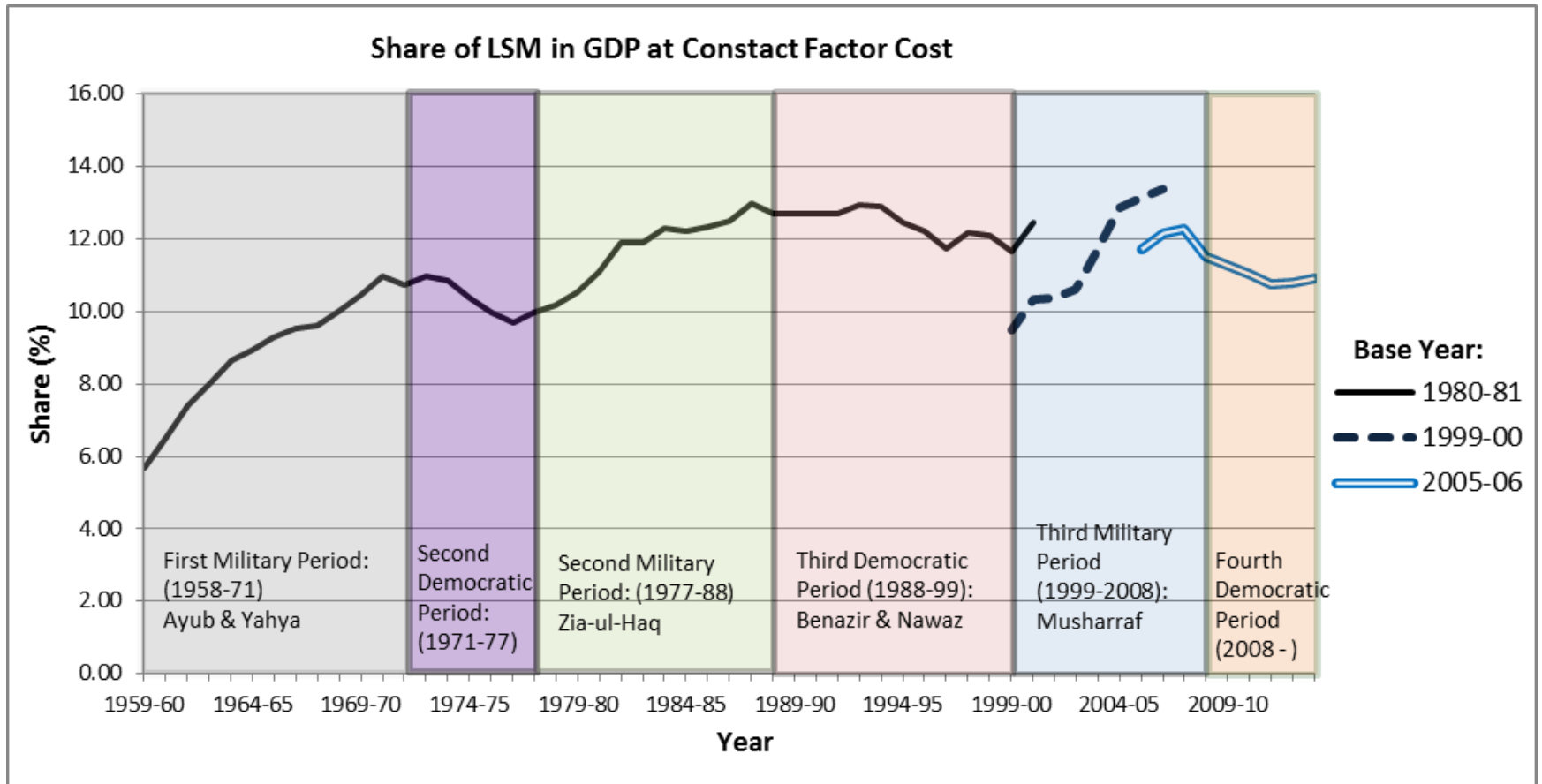


# Trend in Manufacturing Share of Output at Current Prices

Share of LSM in GDP at Current Factor Cost (%)



# Trend in Manufacturing Share of Output at Constant Prices



# Pakistan's Experience

- While the picture is mixed, it is clear that unless the trend of the last 7 years is quickly reversed, 2007 is likely to be seen as a year when the process of “premature deindustrialization” started in Pakistan

# Trends in Structure of Large Scale Manufacturing

- Trade liberalization policies advocated under by the Washington Consensus began to be adopted by most developing countries in the 1980s
- Pakistan also started the process of trade liberalization in the 1980s, albeit in half-heartedly, with a burst of reforms in early 1990s, under the first Nawaz Government , and in the first half of 2000s, under the Musharraf regime
- To see impact of these policies on industry we look at the changes in structure of the manufacturing sector in Pakistan since 1980.

# Trends in Structure of Manufacturing - Pakistan

Industry Code (2005-06)	Industry	1981-82	1990-91	2000-01	2005-06
	ALL INDUSTRIES	100.0	100.0	100.0	100.0
<b>17</b>	<b>Manufacture of Textiles</b>	<b>15.9</b>	<b>26.4</b>	<b>25.4</b>	<b>26.3</b>
1711	Spinning of textiles	7.0	15.1	13.7	9.8
1712	Textile fabrics	3.9	3.1	3.4	7.3
	Silk & art silk textiles	0.8	4.1	3.0	4.1
1713	Finishing of textiles	0.7	0.9	1.9	2.2
<b>15</b>	<b>Food Products &amp; Beverages</b>	<b>22.7</b>	<b>15.5</b>	<b>15.9</b>	<b>15.3</b>
1542	Sugar	11.8	7.9	4.9	3.9
1514	Vegetable & animal oils & fats	5.5	1.7	3.7	3.3
1520	Dairy products	0.03	0.3	0.9	2.5
<b>24</b>	<b>Chemicals &amp; Chemical Products</b>	<b>12.0</b>	<b>15.0</b>	<b>16.6</b>	<b>15.9</b>
2412	Fertilizers & Nitrogen compounds	2.9	4.6	3.7	4.8
2423	Pharmaceuticals	4.1	4.6	5.9	4.7
<b>26</b>	<b>Other Non-Metallic Mineral Products</b>	<b>6.1</b>	<b>6.6</b>	<b>4.7</b>	<b>6.5</b>
2694	Cement, lime & plaster	5.9	6.4	4.5	5.1
<b>18</b>	<b>Wearing Apparel</b>	<b>0.8</b>	<b>1.4</b>	<b>2.9</b>	<b>4.7</b>
<b>23</b>	<b>Petroleum</b>	<b>6.8</b>	<b>3.0</b>	<b>4.8</b>	<b>4.7</b>
<b>34</b>	<b>Motor Vehicles &amp; Trailers<sup>2</sup></b>	<b>1.4</b>	<b>2.0</b>	<b>3.0</b>	<b>4.5</b>
<b>27</b>	<b>Basic Metals</b>	<b>7.9</b>	<b>5.6</b>	<b>4.8</b>	<b>4.0</b>
<b>15142</b>	<b>Cotton Ginning<sup>1</sup></b>	<b>1.4</b>	<b>1.2</b>	<b>2.9</b>	<b>2.7</b>
<b>21</b>	<b>Paper &amp; Paper Products</b>	<b>1.2</b>	<b>1.6</b>	<b>1.5</b>	<b>2.5</b>
<b>16</b>	<b>Tobacco Products</b>	<b>11.3</b>	<b>6.4</b>	<b>4.9</b>	<b>2.2</b>
<b>29</b>	<b>Machinery &amp; Equipment N.E.C.</b>	<b>1.8</b>	<b>2.5</b>	<b>1.3</b>	<b>2.0</b>
<b>31</b>	<b>Electrical Machinery &amp; Apparatus N.E.C</b>	<b>3.2</b>	<b>4.1</b>	<b>3.6</b>	<b>1.9</b>
<b>35</b>	<b>Other Transport Equipment<sup>2</sup></b>	<b>0.8</b>	<b>0.6</b>	<b>0.2</b>	<b>1.5</b>
3591	Motorcycles	n.a.	0.2	0.1	1.0
<b>25</b>	<b>Rubber &amp; Plastic Products</b>	<b>1.9</b>	<b>1.5</b>	<b>1.2</b>	<b>1.0</b>
<b>19</b>	<b>Leather Products</b>	<b>1.2</b>	<b>1.1</b>	<b>1.5</b>	<b>1.0</b>
	<b>Others</b>	<b>3.6</b>	<b>5.7</b>	<b>4.8</b>	<b>3.3</b>

# Trends in Structure of Manufacturing - Sindh

Industry Code (2005-06)	Industry	1981-82	1990-91	2000-01	2005-06
	ALL INDUSTRIES	100.0	100.0	100.0	100.0
<b>17</b>	<b>Manufacture of Textiles</b>	<b>16.4</b>	<b>20.7</b>	<b>17.4</b>	<b>21.0</b>
1711	Spinning of textiles	7.0	9.9	6.8	9.8
1712	Textile fabrics	3.3	4.0	4.3	5.3
	Silk & art silk textiles	1.1	2.5	1.6	0.8
1713	Finishing of textiles	0.9	0.9	1.6	2.1
<b>15</b>	<b>Food Products &amp; Beverages</b>	<b>18.6</b>	<b>16.3</b>	<b>11.5</b>	<b>10.9</b>
1542	Sugar	9.7	9.0	4.6	4.3
1514	Vegetable & animal oils & fats	3.9	2.0	1.8	1.6
1520	Dairy products	n.a.	0.01	n.a.	0.01
<b>24</b>	<b>Chemicals &amp; Chemical Products</b>	<b>16.7</b>	<b>17.0</b>	<b>19.3</b>	<b>20.3</b>
2412	Fertilizers & Nitrogen compounds	n.a.	2.3	2.2	3.5
2423	Pharmaceuticals	6.6	7.1	9.4	8.3
<b>26</b>	<b>Other Non-Metallic Mineral Products</b>	<b>3.6</b>	<b>5.2</b>	<b>1.9</b>	<b>4.9</b>
2694	Cement, lime & plaster	3.6	4.9	1.7	3.9
<b>18</b>	<b>Wearing Apparel</b>	<b>1.6</b>	<b>2.4</b>	<b>3.9</b>	<b>3.2</b>
<b>23</b>	<b>Petroleum</b>	<b>0.6</b>	<b>4.6</b>	<b>9.9</b>	<b>9.3</b>
<b>34</b>	<b>Motor Vehicles &amp; Trailers<sup>2</sup></b>	<b>2.7</b>	<b>3.8</b>	<b>5.8</b>	<b>7.9</b>
<b>27</b>	<b>Basic Metals</b>	<b>12.7</b>	<b>10.0</b>	<b>9.1</b>	<b>6.3</b>
15142	Cotton Ginning <sup>1</sup>	1.7	0.6	5.0	3.3
<b>21</b>	<b>Paper &amp; Paper Products</b>	<b>0.2</b>	<b>0.3</b>	<b>0.4</b>	<b>0.3</b>
<b>16</b>	<b>Tobacco Products</b>	<b>7.8</b>	<b>2.4</b>	<b>3.7</b>	<b>1.2</b>
<b>29</b>	<b>Machinery &amp; Equipment N.E.C.</b>	<b>1.2</b>	<b>1.2</b>	<b>0.6</b>	<b>1.7</b>
<b>31</b>	<b>Electrical Machinery &amp; Apparatus N.E.C</b>	<b>4.0</b>	<b>4.9</b>	<b>4.6</b>	<b>2.4</b>
<b>35</b>	<b>Other Transport Equipment<sup>2</sup></b>	<b>1.1</b>	<b>0.6</b>	<b>0.2</b>	<b>3.3</b>
3591	Motorcycles	n.a.	n.a.	n.a.	2.1
<b>25</b>	<b>Rubber &amp; Plastic Products</b>	<b>1.9</b>	<b>2.0</b>	<b>1.4</b>	<b>1.3</b>
<b>19</b>	<b>Leather Products</b>	<b>1.6</b>	<b>1.5</b>	<b>2.0</b>	<b>0.5</b>
	<b>Others</b>	<b>7.7</b>	<b>6.6</b>	<b>3.3</b>	<b>2.4</b>

# Trends in Structure of Manufacturing - Punjab

Industry Code (2005-06)	Industry	1981-82	1990-91	2000-01	2005-06
	ALL INDUSTRIES	100.0	100.0	100.0	100.0
<b>17</b>	<b>Manufacture of Textiles</b>	<b>17.4</b>	<b>33.8</b>	<b>36.3</b>	<b>32.5</b>
1711	Spinning of textiles	7.7	21.7	22.1	10.5
1712	Textile fabrics	5.3	2.8	3.2	8.5
	Silk & art silk textiles	0.7	5.0	4.2	7.3
1713	Finishing of textiles	0.6	1.0	2.7	2.8
<b>15</b>	<b>Food Products &amp; Beverages</b>	<b>27.6</b>	<b>13.1</b>	<b>16.9</b>	<b>19.4</b>
1542	Sugar	14.2	7.6	6.2	4.2
1514	Vegetable & animal oils & fats	0.7	1.6	1.1	4.7
1520	Dairy products	0.1	0.9	2.7	5.3
<b>24</b>	<b>Chemicals &amp; Chemical Products</b>	<b>8.3</b>	<b>13.8</b>	<b>14.5</b>	<b>13.6</b>
2412	Fertilizers & Nitrogen compounds	2.1	5.9	6.3	7.2
2423	Pharmaceuticals	1.6	2.2	1.7	1.6
<b>26</b>	<b>Other Non-Metallic Mineral Products</b>	<b>7.0</b>	<b>4.7</b>	<b>4.4</b>	<b>4.5</b>
2694	Cement, lime & plaster	7.0	4.6	4.3	3.9
<b>18</b>	<b>Wearing Apparel</b>	<b>0.1</b>	<b>0.4</b>	<b>2.5</b>	<b>7.4</b>
<b>23</b>	<b>Petroleum</b>	<b>0.2</b>	<b>1.4</b>	<b>0.02</b>	<b>1.3</b>
<b>34</b>	<b>Motor Vehicles &amp; Trailers<sup>2</sup></b>	<b>0.1</b>	<b>0.1</b>	<b>0.4</b>	<b>1.9</b>
<b>27</b>	<b>Basic Metals</b>	<b>3.9</b>	<b>1.6</b>	<b>0.8</b>	<b>2.2</b>
15142	Cotton Ginning <sup>1</sup>	1.5	2.0	1.1	3.0
21	Paper & Paper Products	1.5	2.4	2.5	5.0
16	Tobacco Products	8.8	13.0	7.2	0.8
29	Machinery & Equipment N.E.C.	3.0	4.2	1.9	2.7
31	Electrical Machinery & Apparatus N.E.C	2.1	2.7	2.5	0.9
<b>35</b>	<b>Other Transport Equipment<sup>2</sup></b>	<b>0.6</b>	<b>0.4</b>	<b>0.3</b>	<b>0.3</b>
3591	Motorcycles	n.a.	n.a.	0.1	0.2
<b>25</b>	<b>Rubber &amp; Plastic Products</b>	<b>2.4</b>	<b>0.9</b>	<b>0.4</b>	<b>0.3</b>
<b>19</b>	<b>Leather Products</b>	<b>1.2</b>	<b>0.9</b>	<b>1.2</b>	<b>1.6</b>
	<b>Others</b>	<b>14.4</b>	<b>4.5</b>	<b>6.9</b>	<b>2.5</b>

# Reasons why Pakistan might be headed for Premature Deindustrialization

- Pakistan hasn't had a meaningful industrial policy probably since the 1960s. As a result, economic policies are determined by short term goals and lobbies, which are dominated by traders and cartels
- There is a disproportionate tax burden on industry compared to other sectors of the economy
  - Since investment decisions are based on after-tax returns, it is difficult for manufacturing to compete with activities such as retail, real estate, transport, etc.



# Reasons Why Pakistan might be Headed for Premature Deindustrialization

- There is a strong anti-export/anti-manufacturing bias in government policies
  - Given the large amount of workers remittances there is natural tendency for exchange rate to be overvalued (Dutch Disease phenomenon), but in Pakistan a strong rupee is seen as indicator of good economic management
  - Trade regime is one of the most non-transparent and inward oriented in the region
  - Consumption is given priority over manufacturing in infrastructure investment and allocation
    - In rationing of power and gas, priority is given to households
    - Investment in urban infrastructure neglects the needs of industry

# Implications of Premature Industrialization - Economic

- Growth in per capita income in a country depends on productivity growth
- As manufacturing has the strongest productivity growth in the medium and long term, premature deindustrialization blocks the main avenue of rapid productivity growth in a country
- According to Rodrik, consequences of premature deindustrialization are already visible in many countries:
  - In Latin America as manufacturing has shrunk, informality has grown and economy wide productivity has suffered
  - In Africa, urban migrants are crowding into petty services instead of manufacturing
- These economies will need to discover a new engine of growth
- Services such as finance and IT have both high productivity and the possibility of rapid within sector productivity growth, but they are highly skill intensive and do not have the capacity to absorb – as manufacturing did – the type of labor that developing countries have in abundance

# Implications of Premature Industrialization – Political

- Historically, in advanced countries, industrialization gave rise to:
  - Working class movements, trade unions and mass political parties
  - Capitalist elites would replace the established feudal elites
- Through political representation, labor movement was able to negotiate with the new capitalist elites and reach political bargains, resulting in social democracy and development of a middle class

# Implications of Premature Industrialization – Political

- In developing countries, where urban population is organized largely around informality and petty services
  - Common interests between non-elites are harder to define
  - Elites also have divided interests
  - Consequently grand political bargains become less likely and politics is dominated by personalities and ethnic links
  - Elites may prefer, and have the ability to divide and rule, by pursuing populist and patronage politics
- In brief, premature deindustrialization may hamper the consolidation of democracy – this appears to be contradicted by the spread of democracy worldwide, but actually democracy in developing countries largely remains a within elite affair

# Conclusion

- Pakistan seems to be in danger of slipping into “premature deindustrialization”
- There is a need for a proactive industrial policy which at least provides a level playing field for manufacturing
- Premature deindustrialization, which is likely in case of business as usual, could have serious negative consequences for Pakistan's economic and political development