The Frame of Agricultural Policy and Recent Agricultural Policy in Korea

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I. Introduction

- Korea was a typical underdeveloped country by 1970s
- Successful export-oriented industrialization transformed it into a modern industrialized country with rapid growth of above 7% per annum over 40 years

❖ The Objectives of Presentation

- How has the Korean agricultural policy been changed in the process of rapid economic development and trade liberalization?
- What are the emerging issues and recent policy concerns in Korean agricultural sector?
II. Agricultural Situations in Korea

(1) Farmland Structure of Korea

- Total land: 10 million hectares (ha)
- About 64% of Total Land is mountainous and hilly area
- Cultivated land: 1.73 million ha, 17% of total land area
  - Paddy Field: 0.97 million ha, 56% of total cultivated land
  - Upland: 0.76 million ha, 44% of total cultivated land
(2) The Status of Agriculture in National Economy

• The share of agricultural in national GDP is decreasing sharply:
  27.4% (1970) → 7.9% (1990) → 2.3% (2012)

• The share of agriculture in total employment is also declined:
  50.4% (1970) → 17.9% (1990) → 6.2% (2012)

• The radical decreases of agricultural share in national economy have been occurred in Korean agricultural sector within one generation:
  It is a result of the rapid industrialization and urbanization.

• However Korean agriculture still plays important roles in the land use and employment, also in social and economic stability and livelihood in rural area
(3) Production Share by Major Commodity

- Agricultural Production has been increasing from KRW 6 trillion (1980) to 44 trillion (2012)
- The share of Livestock in agricultural production has been increasing continuously: 20% (1980) → 36% (2012)
- However the share of rice production in total agricultural production has been decreasing : 34% (1980) → 28% (2012)

< Table 1 > Production Values and Shares by Farming Type

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<tr>
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<tbody>
<tr>
<td>Total Agriculture Production</td>
<td>6.34(100)</td>
<td>17.73(100)</td>
<td>31.97(100)</td>
<td>44.30(100)</td>
</tr>
<tr>
<td>Rice</td>
<td>2.18(34.4)</td>
<td>6.54(36.8)</td>
<td>10.50(32.8)</td>
<td>8.12(18.3)</td>
</tr>
<tr>
<td>Livestock</td>
<td>1.27(20.0)</td>
<td>3.95(22.3)</td>
<td>8.08(25.3)</td>
<td>16.10(36.3)</td>
</tr>
<tr>
<td>Fruit</td>
<td>0.25 (3.9)</td>
<td>1.31(7.4)</td>
<td>2.58(8.1)</td>
<td>3.82(8.6)</td>
</tr>
<tr>
<td>Vegetable</td>
<td>1.44(20.6)</td>
<td>3.32(18.7)</td>
<td>6.74(21.1)</td>
<td>10.15(22.9)</td>
</tr>
<tr>
<td>Others</td>
<td>1.20 (18.9)</td>
<td>2.61(14.7)</td>
<td>4.07(12.7)</td>
<td>6.11(13.8)</td>
</tr>
</tbody>
</table>

Unit: KRW trillion won, %
(4) Farmland Size

• Total planted area is decreasing in the process of urbanization:
  2.3 million ha (1970) → 1.7 million ha (2012) (26% decrease)

• A Number of farm-households is decreasing much faster than planted area:
  2,483 thousands (1970) → 1,151 thousands (2012) (50% decrease)

• Therefore, average farmland size per farm is increasing:
  0.93 ha (1970) → 1.50 ha (2012)

• But farmland size in Korea are still very small compared to other countries:
  - Japan-1.7ha, Netherlands-22ha, U.S.A.-120ha
(5) A Rice Dominant Farming System

- Rice farming takes a dominant position in agricultural production and farm economy in Korea.
- In 2012, Rice accounts for:
  1) 18% of total agricultural production
  2) 56% of agricultural land
  3) 63% of total farm household
  4) 75% of total farming income
- The reasons are as follows:
  1) Government has supported its price and income of rice farmers
  2) Rice farming is relatively easy and time saving due to mechanization
  3) Rice has been exempted from market opening through WTO/FTA
(6) Agricultural Trade

• Agricultural import is increasing rapidly

• Agricultural export is increasing slowly

• Agricultural trade deficit has increased greatly

< Table 2> Situations of Agricultural Trade

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<tbody>
<tr>
<td>Import</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Nation wide</td>
<td>1.8</td>
<td>21.6</td>
<td>69.8</td>
<td>160.4</td>
<td>519.6</td>
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<tr>
<td>Agriculture</td>
<td>0.5</td>
<td>3.1</td>
<td>5.4</td>
<td>6.8</td>
<td>23.4</td>
</tr>
<tr>
<td>Export</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Nation wide</td>
<td>0.9</td>
<td>17.2</td>
<td>65.4</td>
<td>172.3</td>
<td>548.1</td>
</tr>
<tr>
<td>Agriculture</td>
<td>0.1</td>
<td>1.1</td>
<td>1.1</td>
<td>1.3</td>
<td>5.2</td>
</tr>
</tbody>
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Unit: US$ billion
(7) Food Self-Sufficiency Rate

• Self-Sufficiency rate for all grains (including feed grains) has continuously dropped since the 1980s:
  : 48.4% (1985) → 23.6% (2012)

• Self-sufficiency rates for wheat and corn are less than 1%:
  : However rice reaches almost self-sufficient level

<Table 3> Self-sufficiency Rates of Major Grains

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<tr>
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</thead>
<tbody>
<tr>
<td>Rice</td>
<td>103.3</td>
<td>108.3</td>
<td>91.4</td>
<td>102.9</td>
<td>102.0</td>
<td>104.6</td>
<td>86.1</td>
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<tr>
<td>Barley</td>
<td>63.7</td>
<td>97.4</td>
<td>67.0</td>
<td>46.9</td>
<td>60.0</td>
<td>24.3</td>
<td>17.3</td>
</tr>
<tr>
<td>Wheat</td>
<td>0.4</td>
<td>0.1</td>
<td>0.3</td>
<td>0.1</td>
<td>0.2</td>
<td>0.9</td>
<td>0.7</td>
</tr>
<tr>
<td>Corn</td>
<td>4.1</td>
<td>1.9</td>
<td>1.1</td>
<td>0.9</td>
<td>0.9</td>
<td>0.9</td>
<td>0.9</td>
</tr>
<tr>
<td>Soybeans</td>
<td>22.5</td>
<td>20.1</td>
<td>9.9</td>
<td>6.8</td>
<td>9.7</td>
<td>10.1</td>
<td>10.3</td>
</tr>
<tr>
<td>Total for all grains</td>
<td>48.4</td>
<td>43.1</td>
<td>29.1</td>
<td>29.6</td>
<td>29.4</td>
<td>27.6</td>
<td>23.6</td>
</tr>
</tbody>
</table>

Unit: %
III. Changes in Agricultural Policy: A Historical Perspective

• The Korean agricultural policy has undergone a number of significant changes since 1950s

• Policy Issues:
  Main goals of the agricultural policy were to resolve food shortage and to terminate the problems of tenant farmers and landowners.

• Policy Directions:
  (1) Creation of owner farming through “Land Reform”
    : Farmland reform was implemented from 1950 until 1957 to create an independent family farming system

  (2) Establishment of agricultural administration system
    : Rural Development Administration (1962) and ag. cooperative organization (1961) were founded and ‘The Basic Agricultural Law (1967)’ was enacted to implement Ag. policy in a systematic way
(2) Agricultural Policy : A Historical Perspective

• Policy Issues :
Main goals of the agricultural policy were to increase food production and to modernize the production system.

• Policy Directions:
(1) Increase of productivity through “Green Revolution”
: Expansion of agricultural R &D investment, development of high-yield variety, improvement of irrigation system, agricultural mechanization were pursued.

(2) Price support policy for rice and barley began in 1970.
: As a result, self-sufficiency of rice was achieved in 1977

(3) New town movement called ‘Saemaul Undong’ launched in 1970.
: Government provided financial and material supports to farmers and villages for improving the living conditions in rural areas
(2) Agricultural Policy: A Historical Perspective

• Policy Issues:
Main goals of the agricultural policy were to increase farm households income to reduce enlarged income gap between urban and farm households due to the fast growth in non-agricultural sector.

• Policy Directions:
(1) Promotion of cash-crop production such as livestock, fruit, and vegetables:
Price stabilization policies for livestock, fruit, and vegetables began

(2) Promoting off-farm income sources through developing the rural industrial complexes:
Rural Income Source Development Law (1983) was enacted with providing financial incentives such as favorable loan and tax exemption for the companies in rural areas

As a result, production of livestock, fruit, and vegetables began to increase and industrial complexes began to appear in rural area.
(2) Agricultural Policy : Historical Perspective

• Policy Issues:
Main goals of the agricultural policy were to promote the structural reform and to enhance competitiveness in the era of trade liberalization according to the implementation of WTO AoA and FTAs.

• Policy Directions:
(1) Reforming agricultural structure to enhance competitiveness:
  - First investment plan amounting to 42 trillion won (1991)
  - Second investment plan amounting to 15 trillion won (1994)
  - Third investment plan amounting to 45 trillion won (1998) to reform the agricultural structure and improve the living conditions in rural areas from 1992 to 2004
  - Fourth investment plan amounting to 119 trillion won was made in 2003, which is a 10-year plan from 2004 to 2013.
(2) Agricultural Policy: Historical Perspective

• Policy Directions:

(2) Creation of large scale commercial farming
- An upper limit of farmland ownership was increased from 3 ha to 10 ha (1993) and was abolished (2002) to create a large scale farming
- A new farmland banking system was introduced in 2005 to minimize the fragmentation of farmland and encourage full-time young farmers to increase the scale of their farms more easily

(3) Stabilization and support of farm income
- Several DP programs have been introduced for supporting farm income
- Direct payment for early retirement of aged farmers (1997)
- Direct payment for environmentally friendly farming (1999)
- Direct payment for less favorable areas (2004)
Since 1990s

(2) Agricultural Policy : A Historical Perspective

• Policy Directions:

(4) Promotion of environmentally friendly farming to maintain sustainable agricultural production and to preserve environment: ‘Environment-friendly Agricultural Promotion Act’ was legislated in 1997

(5) Strengthening of rural development policies to enhance the quality of life in rural areas
- ‘The Special Law for the Improvement of Quality of Life in Rural Areas’ enacted in 2005
- Investment plan for rural development amounting to 20 trillion won was implemented during 2005-2010
(2) Agricultural Policy : A Historical Perspective

• Policy Issue :
  Main goals of the agricultural policies to find the new engines of growth for the continuous development in agricultural sector

• Policy Directions:
  A new government established in 2012 is pursuing a more offensive approach in agricultural policy

  (1) Promotion of value-added agro-food processing industry
      : Focus of Ag. policy shifted from the production of raw products to agro-food processing industry

  (2) Building up a consumer-oriented agricultural system with strengthening a food safety management system
      : Customers of Ag. policy changed from mainly farmer to not only farmer, but also consumer and food processing enterprises.

  (3) Creating new markets for Korean agro-foods
      : Expansion of agro-food exports,
## IV. Basic Structure of Agricultural Policy

### “Four Areas for Agricultural Policy”

1. **Policy for Farmer**, making economically self-survival farmers

2. **Policy for Agriculture**, making productive and sustainable agriculture with enhancing the competitiveness of agricultural sector

3. **Policy for Rural Community**, creating vitality of rural society and improving the living conditions in rural areas

4. **Policy for Agricultural Related Industry**, effectively setting up a vertical integration system from input industry (Seed, Fertilizer, Pesticide, Machinery and Equipment) to value-added food-processing industry
IV. Basic Structure of Agricultural Policy

“Five Objectives of Agricultural policy”

1) Goal for Farmers, which is to provide opportunities for high income

2) Goal for agricultural industry, which is to create higher value chains

3) Goal for Consumers, which is to provide fresh, high quality and safe foods

4) Goal for Rural Residents, which is to enhance the quality of life

5) Goal for Future Generations, which is to maintain clean environment and beautiful landscape in rural areas
V. Emerging Issues and Recent Policy Concerns

1. Reducing Income disparity between farm and urban households

- Income gap between farm and urban households is being widened due to import surge and reduction of price support in the process of trade liberalization after UR: Average income of farm households is only 58% of urban household income in 2012

- Policy concerns should be placed in how to increase farm income and how to expand the income sources of farm households

<Figure 1> Income Gap between farm and urban households
2. Aging Rural Society

◆ Korea experienced very fast industrialization and urbanization
  - Time required which Ag. Share in GDP has declined from 40% to 7%
  - Korea: 26 years (1968~1991), Japan: 73 years (1896~1969)
    U.S.A.: 96 years (1854~1950), UK: 113 years (1788~1901)

◆ As a result, many people left agricultural sectors
  - The share of agricultural population is sharply decreasing
    : 44.7% (14.4 million in 1970) → 5.8% (2.9 million in 2012)

◆ Migration of young people to urban area led to severe shortage of young generation in rural areas
  - Instead, elder farmers has increased in agricultural age profile
2. Aging Rural Society (continued)

◆ The share of farm population over 60 years old is increasing rapidly:
  7.9% (1970) → 46.1% (2012)

◆ Policy concerns should be placed in how to create and recruit new and young farmers.

< Figure 2> Proportion of Farm Population over 60 Years Old
3. Reform of Direct Payment Program

◆ Characteristics of DP programs in Korea

(1) Mainly focused on rice farming
- Rice farming takes 68% of total direct payments
- More than 90% of paddy land are under the direct payment program, but 7% of non-paddy land and only 2% of total livestock households are under the direct payment program.

❖ However, it cannot be maintained for a long time because farmers in non-paddy land and livestock farming are asking the expansion of direct payment programs similar to one for paddy land
- Their demands are expected to increase as agricultural trade liberalization is expanded, particularly in the process of FTAs with China and TPP (12)
3. Reform of Direct Payment Program (continued)

◆ Characteristics of DP programs in Korea

(2) Low contribution of direct payment to farm income

: The contribution rate of direct payment to farm income is very low in Korea
- only 5% of total farm household income is covered by direct payment

◆ Policy concerns should be addressed in the reform and expansion of current direct payment programs in Korea

: It is necessary to make more balanced DP between rice farming and other farming and to increase an income safety-net for farm households in the process of agricultural trade liberalization
4. Enlargement of Crop Insurance Program

Crop insurance is regarded as a key program to stabilize the farm management against the production risks due to natural disasters

- As a result of climate changes, natural disaster such as typhoon, hail, drought and floods become more frequent in Korea

- In 2001, crop insurance for apples and pears was introduced
  - The number of insured crops has increased from 2 crops (2001) to 40 crops (2013) with 50% of insurance premium subsidized by government

There are two general categories of crop insurance:

- crop-yield insurance vs. crop-revenue insurance.

- However, crop insurance program in Korea is only crop-yield insurance
4. Enlargement of Crop Insurance Program (continued)

◆ Crop-yield insurance covering only production risk has a limitation to stabilize the farm income and farm management
  - It can not cover the market risk resulting from price fluctuation

◆ Policy concerns should be placed in the enlargement of current crop insurance program coping with the increased market risk due to the expansion of agricultural market liberalization

• Therefore, the Korean government is now considering the introduction of crop-revenue insurance based on farmer's average revenues
5. Promoting Environmental Friendly Farming

◆ The use of chemical fertilizer is decreasing, but still high

‘(80) 285kg/ha → (’90) 458 kg/ha → (’12) 267kg/ha

- Korea had implemented high input–high yield policy by subsidizing the use of chemical fertilizer until the 1990s.
- Korea stopped the subsidy for chemical fertilizer in 2005

◆ Also, as livestock farming became larger, livestock manure has been criticized as one of the main pollutants to rural environments

- Direct payment for environment friendly livestock farming is launched in 2004

◆ Policy concerns should be addressed in the extension of environment friendly farming practices

- Certified environment-friendly agricultural products is 7% (2012) of total agricultural marketing, is scheduled to increased up to 12% by 2017
6. Soft landing on FTA

◆ The Korean government has been pursued bilateral Free Trade Agreement (FTA) with major countries such as USA, EU, ASEAN-10, China, Canada, Australia, NZ, and TPP (12)

◆ However most FTAs could generate negative impacts on the Korean agricultural sector
  - FTA direct payment for compensating farm damage due to FTA is in operation since 2005, in case of severe price drop with import surge from FTA partners.

◆ Policy concerns should be placed in minimizing negative impacts on agricultural sector, considering the speed of market opening and the degree of structural adjustments in agricultural sector
Thank you for listening!

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