



# Department of Agriculture **2012** ANNUAL REPORT



**SOLID RESULTS,  
NEW COMMITMENTS**





# TABLE OF CONTENTS



Message from the Secretary	
2012: Solid results, new commitments	1
Overall Agriculture Sector Performance	5
Agriculture and the Philippine Economy	11
Program Performance: Interventions and Innovations	17
The DA Action Teams and Service Units	47
The DA Budget in 2012	51
DA Directions and Priorities: 2013-2016	52

# MESSAGE FROM THE SECRETARY



In 2012, the policy shifts we initiated in the Department of Agriculture started to deliver results. We are grateful to the farmers, fishers and all agriculture stakeholders who trusted and cooperated with the DA to achieve them. We are happy that various authorities are affirming those outcomes.

President Benigno Simeon Aquino III, in an interview during the ASEAN Summit last April 2013, cited the DA as one of the top two performing agencies of the government.<sup>1</sup> Last December 2012, the DA received the National Economic Development Authority (NEDA) Good Practice Award for two of its foreign-assisted projects: the Mindanao Rural Development Program (MRDP) and the

Infrastructure for Rural Productivity Enhancement Sector (INFRES) Project. In January 2013, The World Bank website<sup>2</sup> featured, as a banner story, the MRDP's geotagging tool for tracking infrastructure projects.

The farmers delivered record production of rice and corn in 2012 – the highest in the country's history – bringing our commitment for food staples sufficiency within reach. Thanks to the President and the legislature for the budget support for front loading investments in agriculture infrastructure. Thanks to the agriculture stakeholders for their understanding and support for the policy shifts a) from input subsidies to investment in public goods and b) from dependence on rice imports to expanded local procurement from our farmers.

For our consumers, we are pleased to note that food prices have remained stable – with the change in the food price index down to 2.2% in 2012 from 5.7% in 2011 -- at the same time farmers realized improved farm gate prices during this period.<sup>3</sup>

The DA National Rice Program managed various interventions including buffer stocking,

<sup>1</sup> The Manila Times, page A3, 26 April 2013 and Philippine Star, page 6, 26 April 2013.

<sup>2</sup> <http://maps.worldbank.org/content/article/geo-tagging-innovative-tool-enhance-transparency-and-supervision-development-projects-0> January 10, 2013

<sup>3</sup> The average farm gate prices of palay increased to P16.20 per kilo, up by 6.3% and corn to P12.70 per kilo, up by 1%. Overall, other farm and fishery products have remained affordable, with the change in the food price index down to 2.2% in 2012 from 5.7% in 2011. Bureau of Agricultural Statistics (BAS), 2012 Report on Agriculture Performance.

community seed banking, starter seed packs, early replanting, farm mechanization, crop insurance and production credit to achieve its targets as laid out in the Food Staples Sufficiency Program (FSSP) 2011-2016. Throughout program implementation, the DA activated and successfully motivated irrigators' associations and local government units as key program partners who were all aptly honored during the annual Rice Achievers Awards.

Also in 2012, fisheries successfully implemented a closed season in Zamboanga and replicated this in the Visayan Sea to regenerate our marine resources. The resulting increase in fish catch in 2012 arrested consecutive years of declining yields in previous years. The effectiveness of the policy shift from unrestrained fishing to the policy of regenerating and conserving fishery resources is best validated by the report of a 5.5% growth of the sector in the first quarter of 2013 compared to the same period in 2012.

Coconut programs received additional budget support in 2012 to maximize the benefits to coconut farmers of the emerging non-traditional coconut-based products like coco water, virgin coconut oil, coco sugar, coco coir, coco milk and others. Within a rural agro-industrial development framework crafted in consultation with major coconut stakeholders the DA, primarily through the Philippine Coconut Authority, is leading in ensuring inclusive growth in the coconut industry.

We have much more to do in livestock and high value crops. We need to maximize our badges of honor – as a country free of foot and mouth disease and avian flu. In high value crops, we have multiplied partners among farmers and corporate investors. But we have work to do and assignments to fulfill on assisting champion commodities to compete in local and global markets. We need our private sector partners to structure enterprises that allow producers to participate in the gains from value adding.

The first half of our term looks good. Let us deliver, in the next three years, the fruits of our ongoing collaboration with various agencies such as the re-entry program for our overseas workers, the cash-for-work program for conditional cash transfer recipients, the fruit trees greening program and agri-tourism programs.

Inclusive growth – sama-samang pagsulong – 'yan ang pagbubuhusan natin ng galing at gawa sa araw-araw ng panunungkulan!

**Ipagpatuloy natin ang Agri-Pinoy!**

  
**PROCESO J. ALCALA**  
Secretary  
31 July 2013





2012: Solid results,  
new commitments

# Rice and fish for all!

Rice and fish make up the basic diet of most Filipinos. In 2012, the agriculture and fishery sector worked to provide Filipino families the rice and fish they require.

Ensuring sufficient and affordable food for our people is the agriculture sector's key mission result area. The Food Staples Sufficiency Program (FSSP) 2011-2016 lays out the policies and programs to carry out this mission.

The policy shifts related to food staples production, as directed in 2011, achieved tangible results in 2012. Most prominent among these results was the record production achieved by the rice and corn subsectors: 8% increase for rice and 6% for corn. The harvest of 18.03 million metric tons (MT) of palay and 7.41 million MT of corn are the highest reached in the Philippines' farming history.

The significant reduction in rice imports from 2.4 million MT in 2010 to 860,000 MT in 2011 and 500,000 MT in 2012 is a direct consequence of the policy decision to prioritize palay procurement from local producers. This reduction in rice imports translated to some US\$ 1.4 billion in foreign exchange savings, resulting in a decrease in National Food Authority borrowings.

Based on FSSP targets, rice imports shall be down to zero after 2013. However, following Minimum Access Volume (MAV) commitments as provided in the General Agreement on Tariff and Trade with the World Trade Organization (GATT-WTO), traders may procure up to 350,000 MT from other countries after 2013. Such imports, however may be compensated by exports of higher value, fancy rice varieties produced in the Philippines.





Regenerating the country's fishery resources was a huge challenge in 2010. With five preceding years (2005 to 2009) of declining yields, destructive and unsustainable fishing had to stop.

Also a first in the country's fishing history, the fishery sector successfully implemented a closed season in the Zamboanga Peninsula from December 2011 to February 2012. Although initially met with protests, information campaigns and advocacy eventually convinced stakeholders to collaborate. The results were so positive that the closed season was replicated in the Visayan Sea in December 2012 to February 2013. More galunggong and tamban in the regenerated areas did not only led to more and bigger fish for sardines processing, this also resulted in an increase in tuna catch in these areas as the two species also serve as feed for tuna.

Programs for mangrove reforestation and multi-specie hatcheries have also been rolled

out in partnership with 62 state colleges and universities in 30 coastal areas throughout the country. With this, more small fishers can engage in raising fish for the table and for the market in the rehabilitated fishing grounds.

Various agencies and key stakeholders participated to deliver these results. The key interventions and innovations that made these possible are cited in the full report so that the right lessons are derived from focused program implementation.

# Commitment to achieve inclusive growth

Inclusive growth continues to be a challenge, particularly for the agri-fishery sector that employs about one-third of the labor force.

The DA is committed to make this sector contribute its share to the overall growth of the economy. Eight commodity subsectors account for 80% of the agri-fishery's contribution to the national economy. Doing well and pursuing inclusive growth in these commodities require the same intensity and focus that have been mustered in the first half of this administration.

The framework for pursuing broad-based rural agro-industrial development in the coconut industry has been developed and presented to the cabinet's Economic Development Cluster. Through enterprises that will engage coconut farmers in value adding ventures, we aim to enable farmers to benefit from gains in other coconut-based products in addition to copra. We also expect to increase their incomes by continuing to promote intercropping.

Product standards and market linking for livestock and high value crops are key to transforming bright prospects to real gains. The agencies concerned have received their marching orders to put these measures in place and begin to realize increased export volumes and greater product flows throughout the country.

The necessary infrastructure support in terms of farm-to-market roads, tramlines, water impounding systems, packing houses, trading posts, mechanization are either in place or have been proposed. Commodity road maps will guide the efforts and investments in various commodities.

All told, focusing on results in coconut, fisheries, livestock and high value crops are commitments that require more vigorous effort in the next three years.



# Overall agriculture sector performance

## Top Contributors to Agriculture Performance

Eight commodities account for 80 percent of the gross value added (GVA) of agriculture. These are palay, fishing, livestock, poultry, corn,

banana, coconut (including copra), and sugarcane (Table 1). The performance of each subsector impacts significantly on the contribution of the agri-fishery sector to the whole economy and requires close tracking.

**Table 1. Eight commodities that make up 80% of total agricultural output, 2012.**

COMMODITY	GVA in million pesos (at constant prices)	% SHARE
1. Palay	140,737	20.14
2. Fishing	129,910	18.59
3. Livestock	93,268	13.34
4. Poultry	74,520	10.66
5. Corn	40,250	5.76
6. Banana	33,774	4.83
7. Coconut (including copra)	30,544	4.37
8. Sugarcane	16,630	2.38
<b>TOTAL</b>	<b>559,633</b>	<b>80.07</b>

Source: National Statistical Coordination Board, 2012.





### Highest in Growth Rate

The following commodities recorded the highest rates of increase last year: dairy, palay,

tobacco, pineapple, corn, rubber, duck eggs, chicken, chicken eggs, and coconut (Table 2).

**Table 2. Top ten commodities that recorded highest production growth, 2012.**

COMMODITY	VOLUME (IN THOUSAND METRIC TONS)		GROWTH RATE (%)
	2011	2012	
1. Dairy	16.45	18.45	12.16
2. Palay	16,684.06	18,032.43	8.08
3. Tobacco	44.95	48.08	6.96
4. Pineapple	2,246.81	2,397.63	6.71
5. Corn	6,971.23	7,406.84	6.25
6. Rubber	425.69	442.99	4.06
7. Duck eggs	37.67	39.75	5.52
8. Chicken	1,414.30	1,479.43	4.61
9. Chicken eggs	403.44	421.07	4.37
10. Coconut	15,244.61	15,828.03	3.83

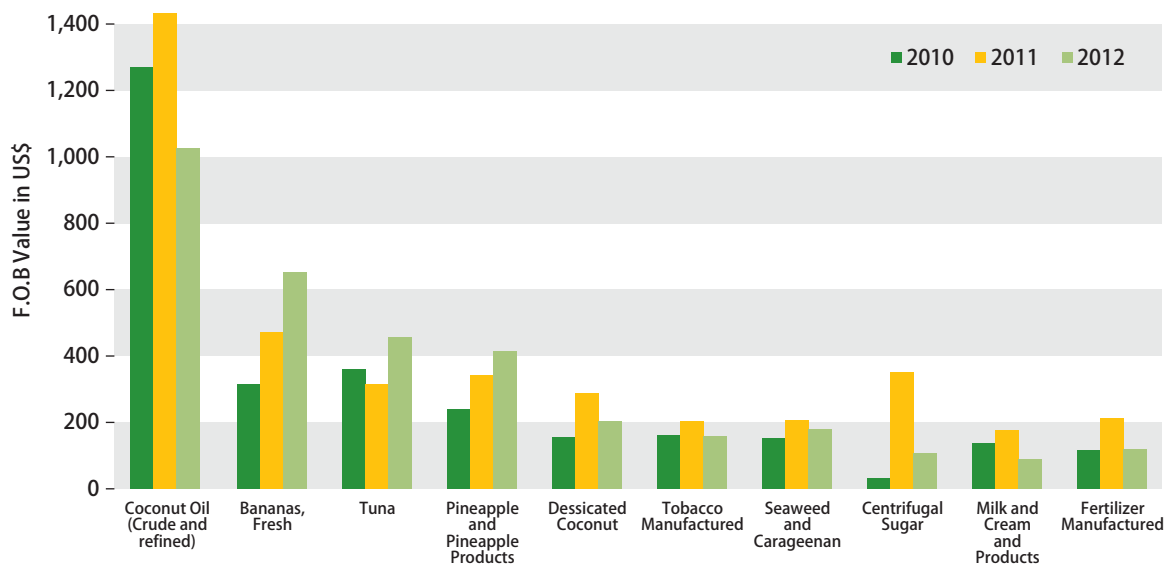
Source: Bureau of Agricultural Statistics, Performance of Philippine Agriculture, January – December, 2012.

## Top Exports

The top ten agricultural exports include coconut oil, banana, tuna, pineapple and pineapple products, dessicated coconut, manufactured tobacco, seaweed and carrageenan, centrifugal sugar, milk and cream and products, and manufactured fertilizer (Figure 1).



Figure 1 - Value of Philippine Agricultural Exports, 2010-2012 (in F. O. B. M US\$)



Source: Bureau of Agricultural Statistics (BAS) Updates on Agricultural Trade Performance, January to December 2012.

Tuna posted the highest growth in value at 44.67 percent, a rebound from the negative growth in the previous year. Its share in total agricultural exports expanded from 5.8 percent in 2011 to 9.1 percent in 2012. This was mainly due to the increase in its world price.

Small in absolute value but big in growth, emerging agriculture exports have the potential to compensate for when prices of traditional exports become volatile. These include: fresh and dried guavas, live eels, fresh watermelon, cocoa beans, fresh or chilled okra, coco vinegar and coconut water (Table 3).

Table 3. Examples of emerging agricultural exports, 2011-2012.

ITEM	2011 (FOB Value in M US\$)	2012	GROWTH RATE IN %
Guavas, Dried	0.027	7.100	25,457.34
Guavas, Fresh	0.005	0.550	9,364.37
Eels, Live	5.801	15.353	167.78
Watermelons, Fresh	0.091	0.176	93.78
Cocoa Bean, Whole/Broken, Raw/Roast	0.356	0.639	79.39
Okra, Fresh or Chilled	13.740	19.341	40.76
Coco Vinegar	0.291	0.386	32.47
Coconut water*	15.113	18.543	22.70

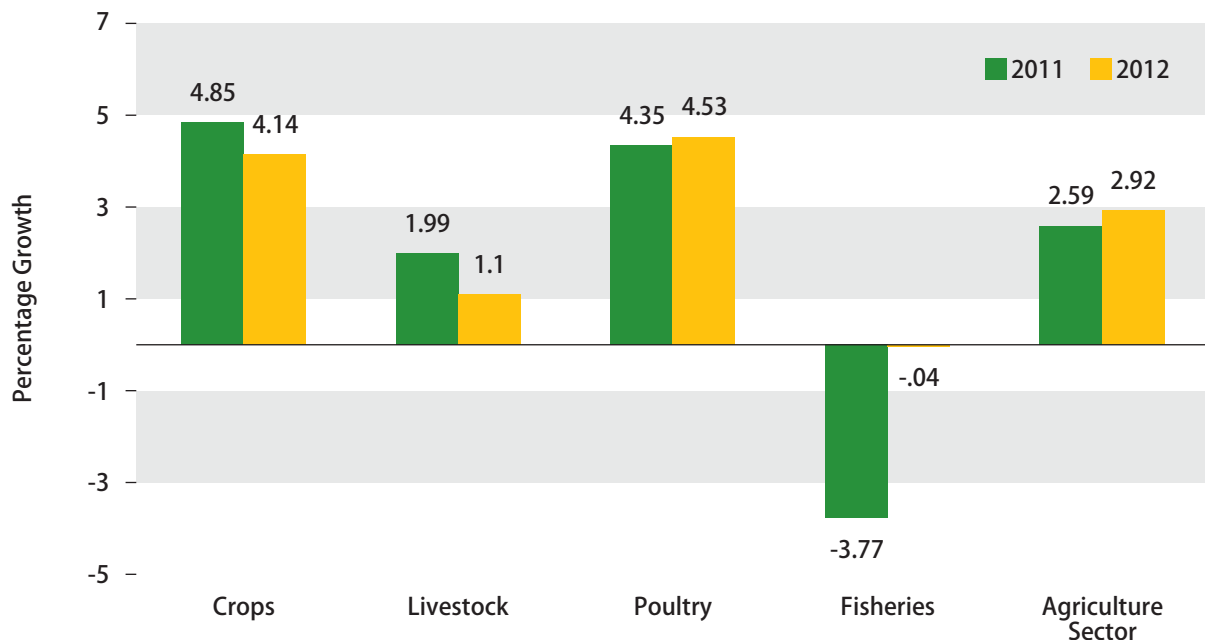
Source: Bureau of Agricultural Statistics, National Statistics Office, \*Philippine Coconut Authority

# Accelerated Growth of Agricultural Output

Growth in agricultural output rose from 2.59 percent in 2011 to 2.92 in 2012 (Figure 2). This was led by the crops and poultry sectors which grew by 4.14 and 4.53 percent, respectively. The livestock sector inched up by 1.10 percent. Especially remarkable, however, was the

performance of the fishery sector significantly arrested the decline of the sector at negative 0.04 percent from negative 3.77 percent in 2011. At current prices, the value of agriculture production amounted to Php1.42 trillion.

Figure 2 Performance of Philippine Agriculture by Sub-Sector, 2011-2012.



Source: Bureau of Agricultural Statistics (BAS) 2012 Performance of Philippine Agriculture, January to December 2012.

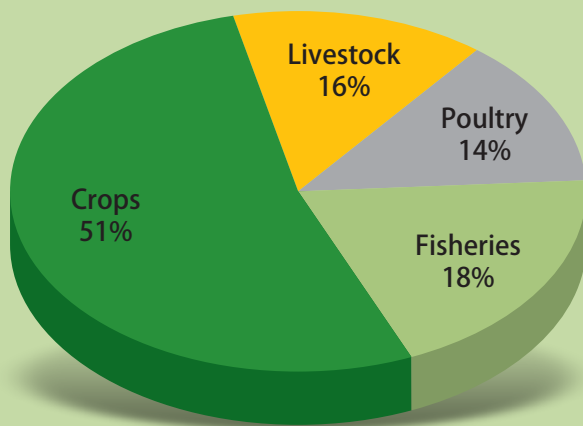


Figure 3 shows the breakdown of agricultural output. Crops remain with the biggest share at 51 percent followed by fisheries with 18 percent. Livestock and poultry shares are 16 and 14 percent, respectively.

Growth in crop production was driven by the increase in palay production that contributed

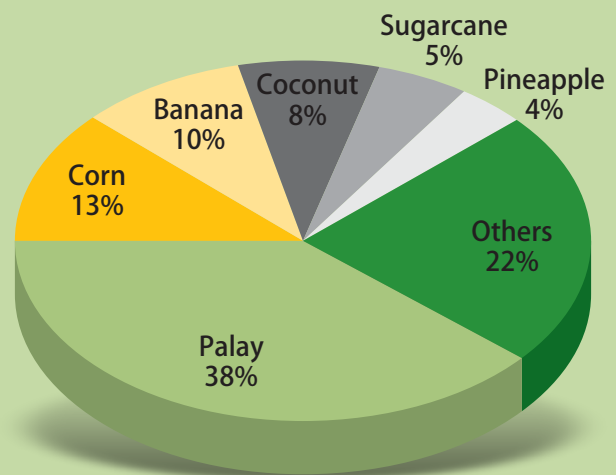
38 percent of the crop subsector which includes corn, banana, coconut, sugarcane, and pineapple. Together, these crops make up 78 percent of total crop production (Figure 4). The performance of these major commodities are covered in the next section on commodity programs.

**Figure 3 Percentage Distribution of Output in Agriculture by Sub-sector, Jan—Dec, 2012.**



Source: Bureau of Agriculture Statistics, 2012.

**Figure 4 Percentage Distribution of Output in Crops, 2012. (in percent)**



Source: Bureau of Agricultural Statistics (BAS) 2012 Performance, January to December 2012.



## Farm gate and Market Prices

The average farmgate prices of the crops subsector declined by 4.74 percent. However, farmers of major staples enjoyed higher prices for their produce as farm gate prices of rice and corn increased by 6.30 and 0.95 percent, respectively. Banana and pineapple prices also increased by 4.74 and 15.99 percent. High demand for processing pushed camote (sweet potato) and cassava prices up by 4.39 and 9.84 percent, respectively. Tobacco prices also went up by 6.53 percent due to the good quality of the native variety.

Lower world prices pulled coconut and rubber prices down by 29.38 and 32.25 percent, respectively. Sugarcane recorded another price cut of 19.19 percent.

In 2012, farm gate prices were lower than in 2011 by an average of 1.70 percent. Price cuts were particularly pronounced in the crops subsector and slightly in the livestock subsector. On the other hand, prices in the

fisheries subsector went up by a significant 5.59 percent and slightly in the poultry subsector by 0.68 percent.

On the consumption side, the food price index decelerated from 5.5 percent in 2011 to 2.2 in 2012<sup>4</sup> translating to generally stable food prices.

---

<sup>4</sup> NSO, January 2013, Summary Inflation Report Consumer Price Index (2006=100): December 2012  
<http://www.census.gov.ph/statistics/survey/price/summary-inflation-report-consumer-price-index-2006100-december-2012>



# Agriculture and the Philippine Economy

## Share in Gross Domestic Product/Gross National Income

The country's Gross Domestic Product (GDP) rose to Php6,314.9 billion or by a hefty 6.6 percent in real terms in 2012 compared to the previous year. With this per capita GDP growth accelerated to 4.8 percent from 2.2 percent while Gross National Income (GNI) increased 4.0 percent, up from 1.5 percent in 2011<sup>5</sup>.

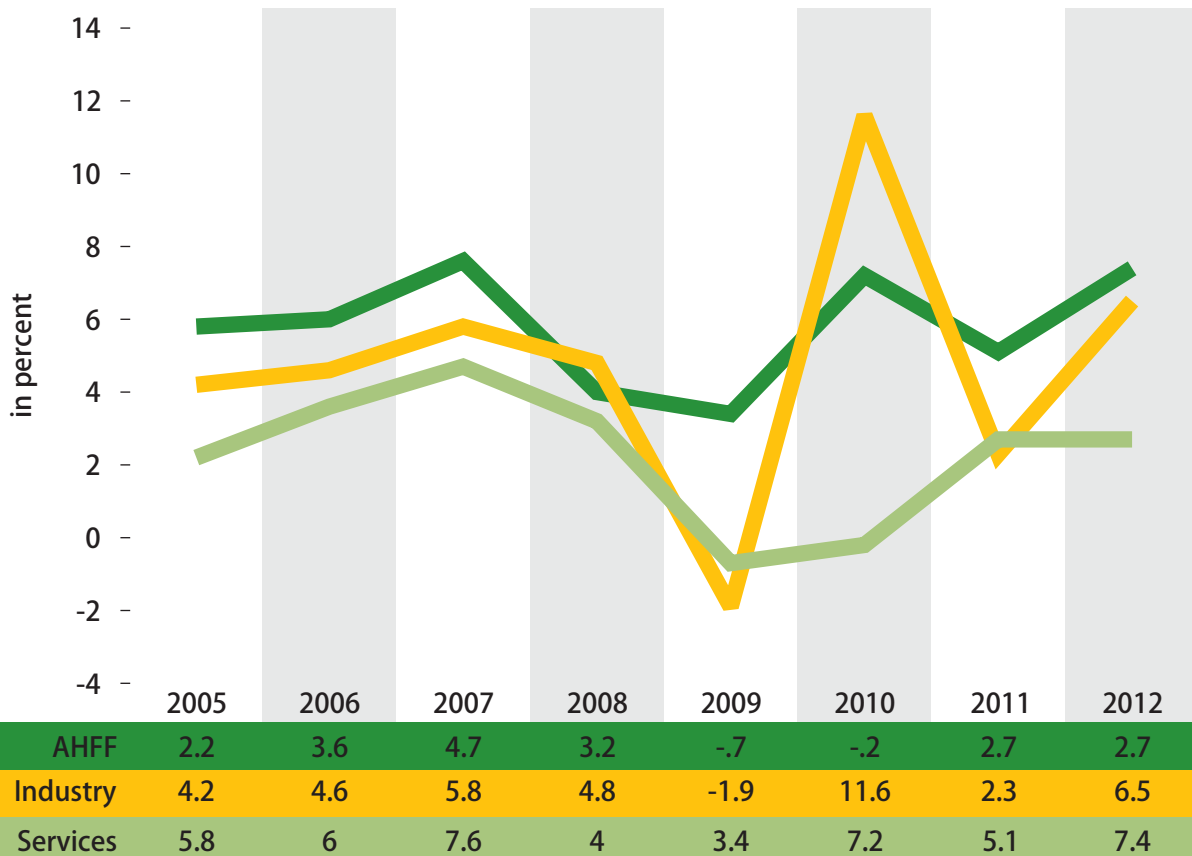
Figure 5 shows the trend in the performance of the different sectors making up the GDP. Both the Industry and Service sectors exhibited acceleration in their growth rates. Agriculture, Hunting, Fishery and Forestry, on the other hand, remained flat.

The Services sector remained the biggest contributor to GDP at 57.0 percent (Figure 6). In 2012, it grew strongly by 7.4 percent compared to the previous year. The growth was led by trade followed by real estate, renting and business activities.

The Industry sector contributed 32.0 percent of the GDP. It also registered a robust growth of 6.5 percent. Construction led with a double-digit growth of 14.4 percent, followed by manufacturing (5.4 percent) and electricity, gas and water supply (5.1 percent).

<sup>5</sup> NSCB, Performance of Philippine Economy, Fourth Quarter/ Annual 2012  
[http://nscb.gov.ph/sna/2012/4th2012/tables/JRGA\\_powerpoint\\_4Q%202012.pdf](http://nscb.gov.ph/sna/2012/4th2012/tables/JRGA_powerpoint_4Q%202012.pdf)

Figure 5 Industry Group Growth Rate (%), 2005-2012, Philippines

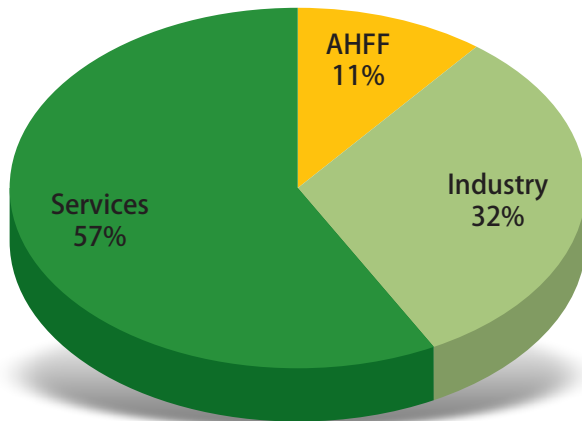


Source: National Statistical Coordination Board, 2012

Agriculture, Hunting, Forestry and Fishery (AHFF) made up the balance of 11.0 percent of the GDP. With a gross value added (GVA) amounting to Php 698.7 billion in 2012, it grew by 2.7 percent compared to the previous year.

Corn, poultry and coconut (including copra) also posted respectable growth rates of 6.30, 4.60, and 3.90 percent, respectively. These, however, were offset by declines in sugarcane (8.90 percent) and mango (2.60 percent). The decline recorded in sugarcane production was primarily because the harvest was moved from the first quarter of 2012 to the last quarter 2011.

**Figure 6 Breakdown of GDP by industry, 2012.**  
(in percent)



Source: National Statistical Coordination Board, 2012.

After consecutive years of decline, fishery showed strong signs of recovery, growing 3.3 percent in the last quarter of 2012. The rebound was attributed to increased production in commercial fisheries after the lifting of the tuna fishing ban. Increased tilapia and milkfish production contributed to the growth in aquaculture as a result of increased demand.

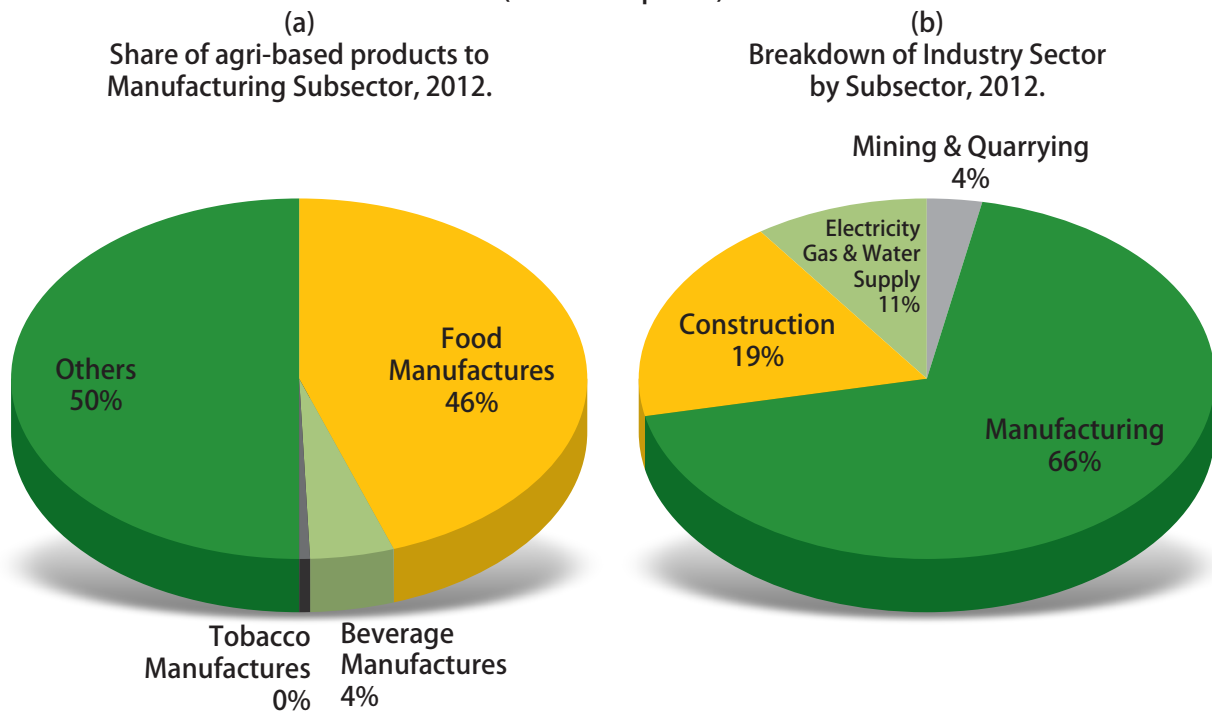
The sector's growth was driven primarily by the remarkable 8.0 percent increase in palay production, which accounts for a fifth of the agricultural output.<sup>6</sup>

<sup>6</sup> NSCB, May 2013, Gross Value Added in Agriculture, Hunting, Forestry and Fishing <http://www.nscb.gov.ph/sna/2013/1st2013/2013aff1.asp>



# Agriculture in Perspective

Figure 7 Contribution of agri-based subsectors to the Industry Sector output, 2012. (at current prices)



Source: National Statistical Coordination Board, May 2013.

To put the contribution of agriculture in perspective, the Philippine Development Plan 2011-2016 notes that if the whole agriculture value chain (i. e. from input suppliers to consumers' table) is taken into account, its contribution would be around 35 percent of gross value added and 50 percent of employment.<sup>7</sup> Therefore, contribution of Agriculture to the economy measured by its GVA alone leads to an underestimation of the sector's importance.

For example, manufacture of agri-based products is a sizeable portion of the manufacturing subsector of the Industry sector. Dr. Rolando Dy of the University of Asia and the Pacific estimated the magnitude of agri-based

manufacturing in 2011.<sup>8</sup> Based on this, the values for 2012 would be as presented below.

Based on May 2013 NSCB estimates, GVA of food manufacturing amounted to Php990.3 billion while beverages and tobacco products were valued at Php83.3 billion and Php6.2 billion, respectively. These three account for 50.0 percent of the total manufacturing subsector (Figure 7.a).<sup>9</sup> Since the

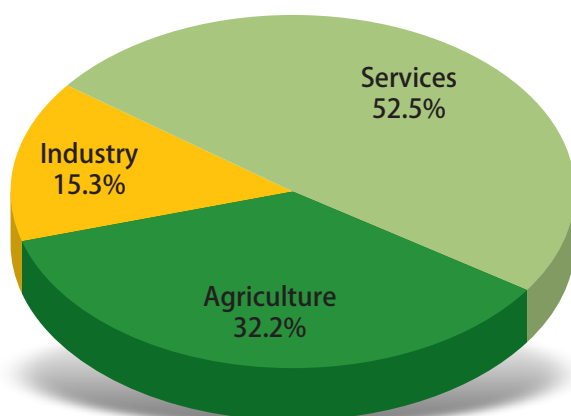
<sup>7</sup> NEDA. (2011). Philippine Development Plan 2011-2016. Retrieved from <http://www.neda.gov.ph/PDP/2011-2016/CHAPTER%204.pdf>

<sup>8</sup> "In 2011, the gross value added of food manufacturing amounted to P885.7 billion, beverages P80.6 billion, and tobacco products P6.4 billion. The total, P972.1 billion, accounted for 47.5 percent of total manufacturing output measured in gross value-added. This excludes other agro-processing such as primary rubber, cultured wood products, etc."

<sup>9</sup> Rolando T. Dy, The Achilles' heel in Philippine agri-manufacturing, Philippine Daily Inquirer 3:25 am | Monday, June 3rd, 2013. The numbers are updated for 2012 using the analysis in this article.

manufacturing subsector contributed 66.0 percent to the total output of the Industry sector (Figure 7.b), this means that about 33 percent of the total Industry sector utilized Agriculture output as inputs, although not all of these are locally sourced.

**Figure 8 Distribution of Employment by Industry Sector, 2012. (in percent)**



Source: BAS CountryStat, 2013.

### Agriculture Sector's Contribution to Total Employment

The total labor force (annual average) in 2012 was 37.62 million persons. Figure 8 shows the distribution of employment by sector while Table 4 shows the annual average number of employed persons by sector from 2010-2012. The labor force grew by 1.16 percent or from 37.2 million in 2011 to 37.6 million persons in 2012.

The Service sector remains the major employer of the labor force with 52.5 percent share equivalent to 19.75 million persons. The Agriculture sector employed some 12.1 million persons or 32.2 percent of the total labor force. The share of the Industry sector was lowest at 15.3 percent or about 5.77 million persons.

**Table 4 Annual average number of employed person by industry group, Philippines, 2010-2012.**

INDUSTRY/SECTOR	Employed Persons ( '000)			Growth Rate (%)	
	2010	2011	2012	2010-11	2011-12
ALL INDUSTRIES	36,035	37,191	37,622	3.21	1.16
AHFF	11,956	12,266	12,104	2.59	-1.32
Industry	5,399	5,530	5,768	2.42	4.30
Services	18,682	19,395	19,750	3.82	1.83

Source of raw data: BAS CountryStat, 2013.



**Table 5 Agricultural Exports and Imports, Philippines, January-December, 2010-2012**  
**FOB and CIF Value in M US\$**

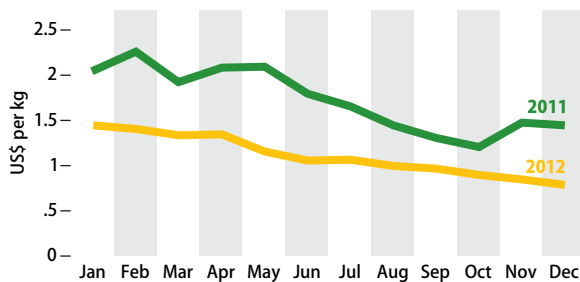
ITEM	Jan-Dec 2012 P	Jan-Dec 2011	Jan-Dec 2010	Growth Rate	
				2012/ 2011	2011/ 2010
<b>A. Exports (FOB Value)</b>					
Total Exports	51,995.24	48,304.93	51,497.51	7.64	-6.20
Total Value of Agricultural Exports	5,003.50	5,431.76	4,101.09	-7.88	32.45
Top 10 Agricultural Exports	3,384.74	3,993.51	3,019.28	-15.24	32.27
Other Agricultural Exports	1,618.76	1,438.25	1,081.81	12.55	32.95
% of Agri. Exports to Total Exports	9.62	11.24	7.96	-14.42	41.20
<b>B. Imports (CIF Value)</b>					
Total Imports	65,386.40	64,096.59	58,467.80	2.01	9.63
Total Value of Agricultural Imports	8,122.38	7,839.93	7,399.79	3.60	5.95
Top 10 Agricultural Imports	4,071.19	4,166.23	4,166.23	7.39	-9.01
Other Agricultural Imports	4,051.19	3,233.57	3,233.57	0.05	25.22
Percent of Agri. Imports to Total Imports	12.42	12.66	12.66	1.56	-3.36
<b>C. Balance of Trade</b>					
	(3,118.88)	(2,408.17)	(3,298.71)	29.51	-27.00
P-Preliminary					

Source: National Statistics Office (NSO)

### Performance of Agricultural Trade

Agricultural exports did not fare well in 2012. Earnings were down by 7.88 percent owing to the decrease in value of the top ten agricultural exports which accounted for 67.6 percent of total exports (Table 5). Low world prices played a significant role in this reduction. Nevertheless, agricultural exports amounted to US\$ 5.0 billion which represents 9.62 percent of the country's total exports.

**Figure 9 World Prices of Coconut Oil, January-December, 2011-2012**



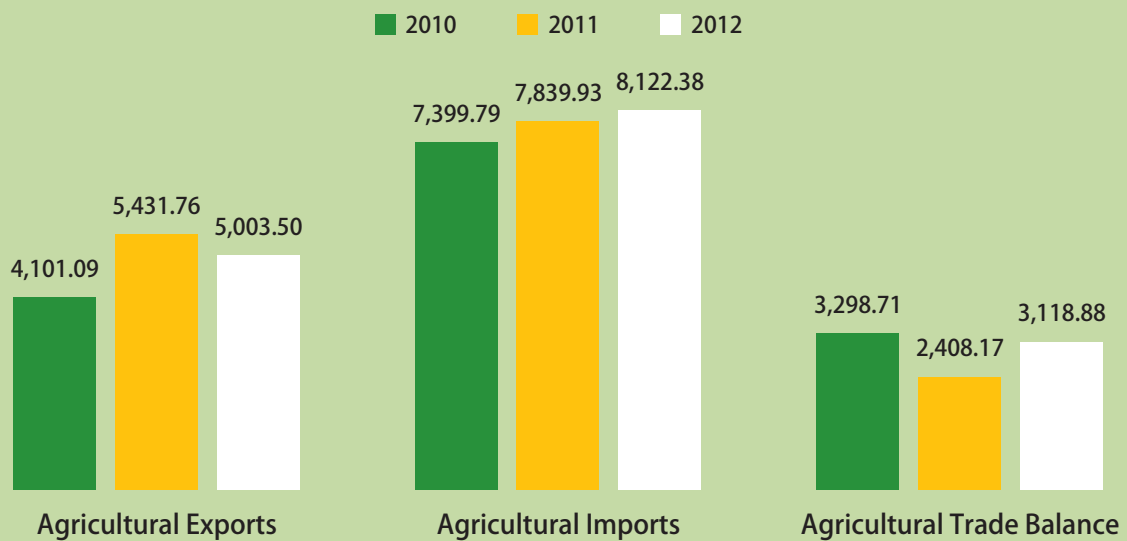
The total earnings generated by the top ten agricultural exports for 2012, declined by 15.24 percent from US\$ 3,993.51 million in 2011 to US\$ 3,384.74 million this year. The top ten agricultural exports include coconut oil, banana, tuna, pineapple and pineapple products, dessicated coconut, manufactured

tobacco, seaweed and carrageenan, centrifugal sugar, milk and cream and products, and manufactured fertilizer. Nevertheless, other agricultural export products showed notable growth of 12.6 percent equivalent to US\$ 180.5 million.

Earnings from coconut oil exports (crude and refined) amounted to US\$ 1.0 billion in 2012, a significant decline of 28.7 percent from the previous year's level. Lower world prices contributed largely to the decrease in the value of exports of this commodity (Figure 9). This downtrend was attributed to weak demand for the product from its major markets particularly the United States and European Union. The increase in the volume of export was not able to offset the significant decline of prices. This reduction amounting to US\$ 409.4 million was enough to pull down the total agricultural export earnings.

Of the top ten exports, three commodities – tuna, fresh bananas, and pineapple and pineapple products – exhibited strong growth performance. Tuna recovered from its decline in the previous year posting the highest growth in value at 44.67 percent. Tuna's share in total agricultural exports expanded from 5.8 percent in 2011 to 9.1 percent in 2012 overtaking sugar and pineapple and placing third.

Figure 10 Agricultural Exports, Imports, and Trade Balance, 2010-2012 (Value in M US\$)



Source: Bureau of Agricultural Statistics (BAS) Updates on Agricultural Trade Performance, January to December 2012.

Fresh bananas proved to be a resilient export commodity. Earnings from export of fresh bananas grew by 36.9 percent to US\$ 647 million as volume reached 2.65 million MT (28.8 percent higher than the previous year) despite the problem with exporting to China. It retained its place as second in the list of top agricultural exports for 2012 accounting for 12.9 percent of total agricultural export.

Earnings from the export of pineapple and pineapple products reached US\$ 414.9 million, up by 20.0 percent from the previous year's level as volume expanded from 582.7 thousand MT to 742.6 thousand MT. It contributed 8.3 percent of total agricultural export.

Meanwhile, the country's top 10 agricultural imports reached US\$ 4,071.19 million, 7.39 percent higher than the previous year's level of US\$3,790.96 million. The top ten agricultural imports are wheat, milk and cream and products, soybean oil/cake meal, manufactured fertilizer, coffee, meat of bovine animals, urea, unmanufactured tobacco, maize/corn, and rice.

The trade deficit in Agriculture rose to US\$ 3.12 billion in 2012, up by 29.5 percent from US\$ 2.41 billion in 2011 (Figure 10).



# Program Performance: Interventions and Innovations

With the delivery of results as main driver, the DA operating units led by the regional field units and supported by the service units, bureaus and attached agencies and corporations worked hard to deliver commitments in 2012.

This section gives an account of the achievements of various banner programs that were realized with the cooperation of the entire DA system and agri-fishery stakeholders.

## Food Staples Sufficiency Program

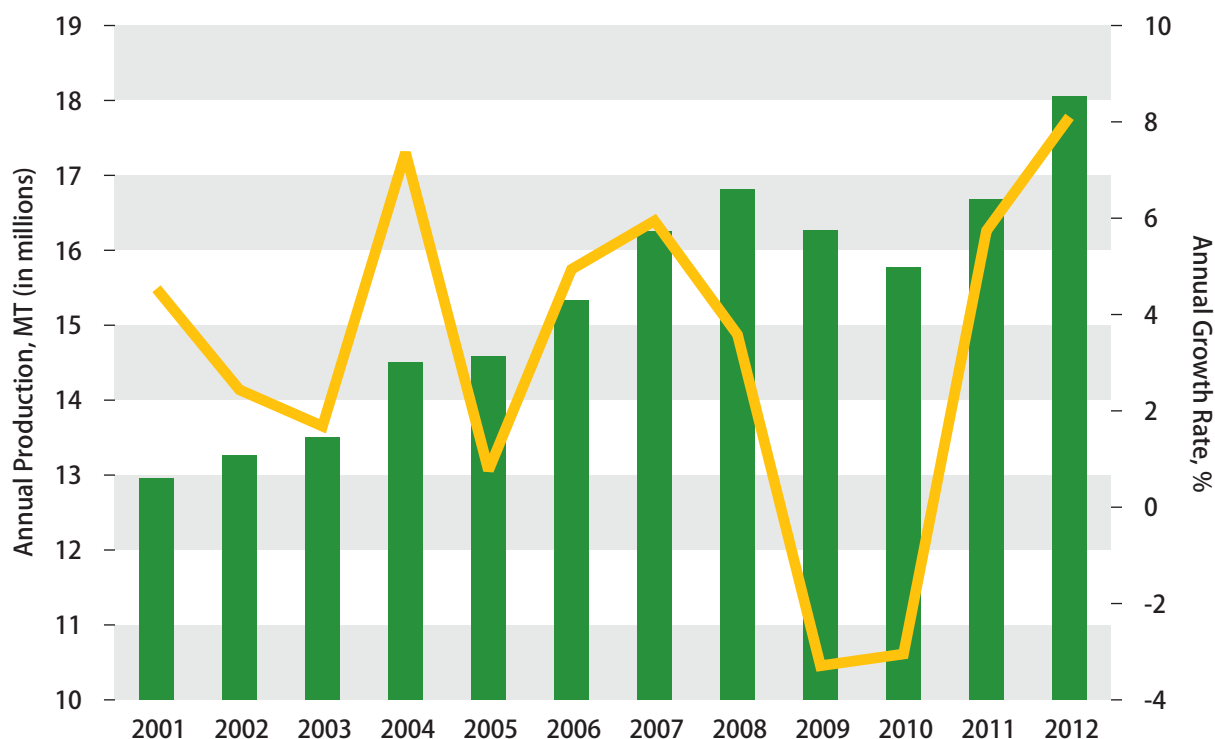
The National Rice Program is the lead implementing team of the Food Staples Sufficiency Program (FSSP), the centerpiece agriculture program of the present administration. The National Corn and Cassava

Program, supports the FSSP in the production of alternative staples. (Table 6 shows summary of FSSP targets and accomplishments).

**Table 6. Summary of FSSP targets and accomplishments**

FSSP Outcomes	Target for 2012	Accomplishment	Accomplishment Rate
Volume of Production (MT)			
Palay	18.46 M	18.03 M	97.51
White Corn	2.466 M	2.166 M	87.8
Cassava	385,000	278,000	72.2
Incremental Harvested Irrigated Palay Area (ha) <sup>10</sup>	107,050	127,308	118.9
Cropping Intensity	1.47	1.59	108.2

**Figure 11 Estimates of Palay Production and Annual Growth Rate, Philippines, 2001-2012 (in MT, %)**



Source: Bureau of Agricultural Statistics, 2012

Towards achieving food staples sufficiency, the rice and corn subsectors delivered a record 18 million metric tons of palay and seven million MT of corn (white and yellow) through the concerted efforts of farmers and irrigators' associations, local government units and the DA regional field units and operating units.

Figure 11 shows the record performance of the palay sub-sector in terms of both annual production level and annual growth rate. The improvement in food staples production resulted in a significant decrease in rice importation, from 2.4 million MT in 2010 to

860,000 MT in 2011 and 500,000 MT in 2012. All told, this represents foreign exchange savings of US\$ 1.4 billion from 2010 to 2012. In addition, the National Food Authority (NFA) collected a total of Php 4.59 billion in service fees in 2012 in connection with the Private Sector Financed (PSF) Importation Program through which private traders and farmers cooperatives were allowed to import rice. Meanwhile, NFA bought 381,229 MT of palay from local farmers in 2012 thereby infusing Php 6.551 billion in new money into local economies throughout the country.

### Doing well with enabling interventions

FSSP implementation included various interventions targeted at improving productivity and providing an enabling environment for enhanced competitiveness.



<sup>10</sup> This refers to the additional area that was harvested using the newly generated and restored irrigation facilities. Generally, it can be computed by adding generated and restored areas multiplied by cropping intensity.

Table 7. Small Scale Irrigation Projects of the BSWM, 2012

Area Generated/Restored	Physical Target	Physical Accomplishment			Total
		Completed	On-going	Pre-implementation Phase	
1. SWIP/ DD	2,418	1,317	2,304	90	3,711
2. Small Farm Reservoir (SFR)	3,750	230	671	163	1,064
3. Pump and Engine Sets	3,000	3,711			3,711

In the FSSP's **Irrigation Component**, the National Irrigation Administration (NIA) provided irrigation to an additional 127, 308 hectares of palay in 2012, surpassing its commitment of 107, 050 hectares that resulted in an increase of 416, 297 in the volume of harvest.

The Bureau of Soils and Water Management (BSWM), for its part, provided Small-scale Irrigation Projects (SSIP) which aim to increase palay production in areas not served by the Large Scale Irrigation Systems (LSIS). The involvement of local government units (LGUs), both provincial and municipal, in the implementation of SSIPs nationwide has been recognized as an effective scheme to ensure the sustainability of the projects beyond the construction period.

The BSWM, under the rice program accomplished the following small scale irrigation projects (SSIPs) in CY 2012 (Table 7).

The **FSSP Credit Component** includes two lending programs: a) the Rice Production Program (RPP) directed at irrigators' associations nationwide and fully funded by the Land Bank of the Philippines and b) the Sikat-Saka Program initiated in the four major rice producing provinces of Isabela, Nueva Ecija, Iloilo and North Cotabato.

As a focused lending program for the FSSP, the Sikat-Saka was launched in January 2012 to provide loans at a lower interest rate (maximum 15% per annum) to small palay farmers who are endorsed by Irrigator's Associations. Sikat-Saka operates through a Provincial Action team (PAT) headed by the DA Regional Executive Director. The NIA is responsible for identifying qualified irrigators' associations, while the NFA and the National Agribusiness Corporation (NABCOR) undertake to buy the produce of the Sikat-Saka borrowers. The Agricultural Training Institute (ATI), for its part, assists in explaining the program and conducting orientation and credit discipline sessions for participating





farmers. The LBP provides the matching loan fund and, as the lending agency, conducts the screening and approval of borrowers.

As of December 31, 2012, Php48.2 million in loans has been released to 764 rice farmers who conveniently access their production loans as needed through their personal automated teller machine (ATM) cards. To qualify, these farmers complied with loan requirements including a “table collateral” in the form of their irrigated farm land of one to five hectares or other acceptable collateral.

Through Sikat-Saka, farmers will be able to establish their individual credit records with the LBP toward gaining continuing credit access with improving credit terms. In early 2013, Sikat-Saka coverage was expanded to include the top twenty rice producing provinces of the country.

Complementing the Credit Component is an insurance program provided by the Philippine Crop Insurance Corporation (PCIC). This includes the compulsory insurance coverage of LBP-DA Sikat-Saka loans and the DA-NIA third cropping rice programs. With this, additional cropping areas are made available and rice production is increased, thereby making the commitment of Rice Self Sufficiency by the end of 2013 more attainable (Table 8).

For its **Research and Extension Component**, FSSP was supported by various agencies notably the Philippine Rice Research Institute (PhilRice), the Bureau of Agricultural Research (BAR) and the Agricultural Training Institute (ATI). A regional rice R&D review and conference sought to strengthen the national rice self-sufficiency agenda. A concrete result of research efforts was the release for propagation in 2012 by PhilRice and the Bureau of Plant Industry's National Seed Industry Council of three inbred rice, one special rice, and one lowland hybrid variety seeds. The ATI conducted Farmers' Field Schools for the transfer of technology to farmers.

The DA and the International Rice Research Institute (IRRI) formed a partnership in 2012 to pursue joint initiatives in order to reduce poverty and hunger, improve the health of farmers and consumers, and ensure food and environmental sustainability. Under the partnership, seven proposals in the pipeline will be implemented from 2013 to 2016:

- Philippine Rice Information System (PRISM) - An operational system for rice monitoring to support decision-making towards increased rice production in the Philippines
- Improving Technology Promotion and Delivery through Capability Enhancement of the Next Generation of Rice Extension Professionals and Farmer Intermediaries
- Accelerating the Development and Adoption of Next-Generation (Next-Gen) Rice Varieties for the Major Ecosystems in the Philippines
- Rice Crop Manager: A Comprehensive Decision Support Tool for Increasing Yields and Income for Farmers in the Philippines

**Table 8. PCIC's Insurance Coverage, 2012**

Particulars	No. of Insured Farmers	Accomplishment	
		No. of Area (Has.)	Amount of Cover (PhP M)
1. DA-LBP Sikat Saka	271	511.40	19.565
2. DA-NIA Third Cropping	31,101	28,384.97	283.865
<b>Total</b>	<b>31,372</b>	<b>28,896.37</b>	<b>303.430</b>



- Raising Productivity and Enriching the Legacy of Heirloom/ Traditional Rice through Empowering Communities in Unfavorable Rice-Based Ecosystem (Heirloom Rice)
- Benchmarking The Philippine Rice Economy Relative To Major Rice-Producing Countries In Asia
- Accelerating the Development and Dissemination of Associated Technologies for Direct-Seeded Rice in Irrigated and Rainfed Ecosystems

Under the Upland Rice Development Program (URDP), PhilRice in coordination with DA-RFUs established a total of 52 Palayamanan sites in 48 provinces and/or cities nationwide.<sup>11</sup> The program aimed to harness the potential of the upland rice ecosystem as one of the major sources of the country's rice supply and to develop the upland communities as self-sufficient communities.

Five applied research and production/post production related technology

commercialization activities were funded by the Rice Program in 2012. Most notable of these are the commercialization and product development of black rice and other traditional varieties, genetic identification of traditional rice varieties in support to rice exportation, and the Rodent Control program in Negros Occidental and Iloilo.

As an important intervention, the Consumption Management Component of FSSP, was planned as a nationwide campaign. Launching this, President Aquino proclaimed the year 2013 as the National Year of Rice (NYR) under Proclamation no. 494 on October 18, 2012. It is an advocacy campaign that “aims to promote responsible rice consumption for better health and less rice wastage and productive farming through promotion of efficient rice technologies and inspiring farmers to do better.”<sup>12</sup>

<sup>11</sup> PhilRice, 2012 Highlights of Accomplishments

<sup>12</sup> National Year of Rice, 2013, <http://www.nyr2013.com/>

## Doing better through innovations

The success of the effort to attain rice sufficiency is due to the various factors cited, foremost among which is the budget support for the required infrastructure and the partnership with Irrigators' Associations and LGUs--especially the provincial and municipal agriculturists and technicians --and the energized DA operating units. The story would not be complete, however, without citing the new ways of doing things that were introduced through the program, which are presented below:

**Distribution of two-kilogram starter packs of registered seeds to farmers.** This innovation placed high-quality seeds within the reach of ordinary farmers. In previous programs, the government distributed hybrid seeds worth Php1,200 per 40-kilogram bag. The government paid Php 600 while the farmer paid Php 600 for the seeds. Scandal-ridden as it was, some seed deliveries did not produce the promised yields. Under the new way of making high quality seeds available, the farmer or a

group of them produced the seeds at their own farms using the starter packs. Each starter pack cost the government Php40.

Part of this program was the establishment of community seed banks that provided storage facilities for seeds produced by the community thereby ensuring availability of quality seeds for the next cropping cycle or whenever needed. A total of seven (7) new seed banks were established in the lowlands, while 16 were rehabilitated. For the upland areas, a total of 17 seed banks were set up.

**Laminated tarpaulins as post-harvest intervention.** A 10-meter x 10-meter tarpaulin sheet costing Php 450 was a quick post-harvest intervention to help farmers protect their grains from sudden rainfall. It is difficult to measure the exact impact of this intervention but a regional director who saw farmers using the protective sheets began to bring several pieces of the sheet during field visits to provide it to farmers who wanted to use them. Farmer recipients signed an acknowledgement receipt as they received the material. A total of 398,515 tarpaulin sheets were distributed in 2012.





**Buffer stocking for quick turn around after calamities.** During calamities, farmers used to wait months before they could replant the fields damaged by typhoons and flooding. With buffer stocking, 10 percent of the seed requirement of every region is stored for quick positioning in times of calamities. During typhoon Pablo, North Cotabato provided seeds to Region 13. In Central Luzon, the buffer stock allowed farmers to immediately replant after typhoon Gener. A total of 548,217 bags of certified seeds were positioned for quick replanting in various regions. The seeds were also used for the 5-in-2 (five cropping cycles in two years) program.

**MakinaSaka** started in 2011 as a modest program conducted in Munoz, Nueva Ecija for Luzon and in Iloilo for Visayas and in General Santos City for Mindanao, the National Rice Program invited agriculture machinery suppliers and fabricators to an event attended by farmers. This represented a radical departure from the past practice of the DA procuring farm equipment in bulk and farmers simply receiving what were given them.

At MakinaSaka, farmers could view and test the equipment and interact with suppliers who informed them of actual prices. With this innovation, farmers helped to choose the equipment that they would use. Fabricators were delighted to learn specific requirements from the farmers themselves. Modern equipment were also put on display to give farmers a view of future possibilities.

MakinaSaka led to the introduction of equipment such as the combine harvester that allowed farmers to harvest and thresh within a day or two and beat the coming of a typhoon.

In 2012, MakinaSaka was made a national event and it was attended by President Noyoy Aquino himself. It has become the biggest agricultural machinery exposition in the country, MakinaSaka 2012 featured various modern production and post-harvest machineries and equipment that are available to farmers, farmers' organizations and local government units.

MakinaSaka also served as a venue for the convergence of over 1,800 participants in the parallel Irrigators Association (IA) and Agriculture and Fishery Council (AFC) conferences. These conferences aimed to identify strategies, needs, and solutions to concerns besetting the agricultural sector, and provide guidance and aid in policy formulation and formulation of commodity roadmaps.

**Listening to and honoring farmers.** A first ever National Conference of Food Staple Producers was held last December 12 to 14, 2012. Its goal was to recognize and motivate the farmers, agricultural workers, Local Government Units, Regional Field Units and other rice industry stakeholders toward increasing rice production to meet targets under the Food Staples Sufficiency Program.

The conference highlighted the important role of irrigators' associations who manage and maintain national and communal irrigation systems and small water impounding systems, farmer-scientists, rural women and youth, and

indigenous peoples in achieving food sufficiency in rice and major staples.

During the conference, Rice Achiever's Awards were given to 10 provinces, 50 cities and municipalities, eight Irrigators' Associations, and 157 agricultural extension workers.

The 10 winning provinces are: Ilocos Norte, Mindoro Oriental, Mindoro Occidental, Iloilo, Negros Occidental, Southern Leyte, Davao del Norte, Davao del Sur, Agusan del Sur, and Surigao del Sur.

Some farmers who attended these events were in Manila for the first time and stayed at a hotel also for the first time. The boost in the morale of these producers can only be measured by the record harvest that they delivered in 2012.



# Panatang Makapalay

[Tagubilin: Ilagay ang kanang kamao sa tapat ng puso.]

Bilang isang mamamayang Pilipino  
nakikiisa ako sa panatang  
'wag magsayang ng kanin at bigas.  
Magsasaing ako ng sapat lamang  
at sisiguraduhing tama  
ang pagkagaluto nito.  
Kukuha lamang ako ng kaya kong ubusin  
upang sa aking pinggan  
ay walang matirang kanin.  
Ganoon din ang aking gagawin kung may  
handaan o kung sa labas ako kakain.  
Ang brown rice o pinawa  
ay susubukan kong kainin,  
pati na ang ibang pagkain bukod sa kanin  
tulad ng saba, kamote, at mais.  
Ituturo ko sa iba ang responsableng  
pagkonsumo nang mabigyang halaga ang  
pagod ng mga magsasaka  
at nang makatulong na maging sapat  
ang bigas sa Pilipinas.  
Aking isasapuso ang panatang ito  
dahil sa bawat butil ng bigas  
o kanin na aking matitipid  
ay may buhay na masasagip.

**National Rice Program Secretariat**  
**Department of Agriculture**  
Elliptical Road, Diliman  
Quezon City, Philippines







**DEPARTMENT OF AGRICULTURE  
REPUBLIC OF THE PHILIPPINES**

Elliptical Road, Diliman, Quezon City 1100, Philippines  
+63(2) 928-8741 to 65  
[www.da.gov.ph](http://www.da.gov.ph)

Department of Agriculture

**2012 ANNUAL REPORT**



Solid Results, New Commitments