G.R. No. 209271 (International Service for the Acquisition of Agri-Biotech Applications, Inc. vs. Greenpeace Southeast Asia [Philippines], Magsasaka at Siyentipiko sa Pagpapaunlad ng Agrikultura [MASIPAG], Rep. Teodoro Casiño, et al.)

G.R. No. 209276 (Environmental Management Bureau of the Department of Environment and Natural Resources, Bureau of Plant Industry and Fertilizer and Pesticide Authority of the Department of Agriculture vs. Court of Appeals, Greenpeace Southeast Asia [Philippines], Magsasaka at Siyentipiko sa Pagpapaunlad ng Agrikultura [MASIPAG], Rep. Teodoro Casiño, et al., Crop Life Philippines, Inc.)

G.R. No. 209301 (University of the Philippines Los Baños Foundation, Inc. vs. Greenpeace Southeast Asia [Philippines], Magsasaka at Siyentipiko sa Pagpapaunlad ng Agrikultura [MASIPAG], Rep. Teodoro Casiño, et al., Crop Life Philippines, Inc.)

G.R. No. 209430 (University of the Philippines vs. Greenpeace Southeast Asia [Philippines], Magsasaka at Siyentipiko sa Pagpapaunlad ng Agrikultura [MASIPAG], Rep. Teodoro Casiño, et al., Crop Life Philippines, Inc.)

Promulgated:

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## **CONCURRING OPINION**

## VELASCO, JR., J.:

Technological and scientific advances no longer involve raw materials manipulation and transformation. It now embraces changing the very genetic make-up of live organisms, altering and even mixing characteristics of flora, fauna, microorganisms, among others, for various purposes, including attempts to increase agricultural yield and improve and develop sustainable pest control.

The Philippines is not insulated from this genetic modification of organisms as it is, in fact, a regulated activity in this jurisdiction. But, in view of the possible dangers that the activity poses to the biodiversity-rich environs of the country, environmental protection in the Philippines has evolved to adapt to these progresses and is still being further strengthened via executive, legislative, and judicial efforts.

At bar are consolidated petitions seeking the reversal of the Decision of the Court of Appeals (CA) dated May 17, 2013, as well as its Resolution dated September 20, 2013, in CA-G.R. SP No. 00013 which permanently enjoined the conduct of field trials for the genetically modified eggplant, commonly known as "*Bt Talong*," on concerns for biosafety.

Biosafety is a condition in which the probability of harm, injury and damage resulting from the intentional and unintentional introduction and/or use of a regulated article is within acceptable and manageable levels.<sup>1</sup> "Regulated article" refers to genetically modified organisms<sup>2</sup> (GMOs), which are "living modified organisms" under the Cartagena Protocol on Biosafety and refers to any living organism that possesses a novel combination of genetic material obtained through the use of modern biotechnology.<sup>3</sup> Regulated articles also include the products of GMOs.<sup>4</sup>

Prior, however, to the introduction of biotechnology and genetic modification of organisms in the Philippines, one of the main enactments governing environmental protection is Presidential Decree No. 1151 (PD 1151) or the *Philippine Environmental Policy* issued by then President Ferdinand E. Marcos on June 6, 1977.

# The Philippine Environmental Impact Statement System (PEISS)

PD 1151, which put in place the use of Environmental Impact Statements in this jurisdiction, declares as the State's continuing policy (a) to create, develop, maintain and improve conditions under which man and nature can thrive in productive and enjoyable harmony with each other; (b) to fulfill the social, economic and other requirements of present and future generations of Filipinos; and (c) to insure the attainment of an environmental quality that is conducive to a life of dignity and well-being.

In pursuit of its above-stated policy, Section 4 of PD 1151 requires thusly:

[A]ll agencies and instrumentalities of the national government, including government-owned or controlled corporations, as well as private corporations, firms and entities shall prepare, file and include in every action, project or undertaking which significantly affects the quality of the environment a detailed statement on —

(a) the environmental impact of the proposed action, project or undertaking;

(b) any adverse environmental effect which cannot be avoided should the proposal be implemented;

(c) alternative to the proposed action;

(d) a determination that the short-term uses of the resources of the environment are consistent with the maintenance and enhancement of the long-term productivity of the same; and

(e) whenever a proposal involves the use of depletable or nonrenewable resources, a finding must be made that such use and commitment are warranted.

Before an environmental impact statement (EIS) is issued by a lead agency, all agencies having jurisdiction over, or special expertise on, the

<sup>&</sup>lt;sup>1</sup> Item 3.3, Section 3, EO 514, s. 2006.

<sup>&</sup>lt;sup>2</sup> Sub-item 3.3.12, Item 3.3, Section 3, EO 514, s. 2006.

<sup>&</sup>lt;sup>3</sup> Sub-item 3.3.2, Item 3.3, Section 3, EO 514, s. 2006.

<sup>&</sup>lt;sup>4</sup> Sub-item 3.3.12, Item 3.3, Section 3, EO 514, s. 2006.

subject matter involved shall comment on the draft environmental impact statement made by the lead agency within thirty (30) days from receipt of the same.

Thereafter, to give more teeth to the EIS requirement, PD 1586<sup>5</sup> was issued on June 11, 1978, establishing the EIS System (PEISS), instituting a systems-oriented and integrated approach to the filing of the EIS in coordination with the whole environmental protection program of the State.<sup>6</sup> Section 2 thereof states:

There is hereby established an Environmental Impact Statement System founded and based on the environmental impact statement required under Section 4 of Presidential Decree No. 1151, of all agencies and instrumentalities of the national government, including governmentowned or controlled corporations, as well as private corporations, firms and entities, for every proposed project and undertaking which significantly affect the quality of the environment.

To reiterate, Section 4 of PD 1151, on the other hand, provides:

*Environmental Impact Statements*. Pursuant to the above enunciated policies and goals, all agencies and instrumentalities of the national government, including government-owned or controlled corporations, as well as private corporations, firms and entities shall prepare, file and include in every action, project or undertaking which significantly affects the quality of the environment a detailed statement on

(a) the environmental impact of the proposed action, project or undertaking

(b) any adverse environmental effect which cannot be avoided should the proposal be implemented

(c) alternative to the proposed action

(d) a determination that the short-term uses of the resources of the environment are consistent with the maintenance and enhancement of the long-term productivity of the same; and (e) whenever a proposal involves the use of depletable or nonrenewable resources, a finding must be made that such use and commitment are warranted.

Before an environmental impact statement is issued by a lead agency, all agencies having jurisdiction over, or special expertise on, the subject matter involved shall comment on the draft environmental impact statement made by the lead agency within thirty (30) days from receipt of the same.

As part of the PEISS, Section 4 of PD 1586 provides that "the President of the Philippines may, on his own initiative or upon recommendation of the National Environmental Protection Council, by proclamation declare certain projects, undertakings or areas in the country as environmentally critical." Pursuant thereto, Proclamation No. 2146 was

<sup>&</sup>lt;sup>5</sup> Establishing An Environmental Impact Statement System Including Other Environmental Management Related Measures And For Other Purposes.

<sup>&</sup>lt;sup>6</sup> Philippine Judicial Academy, A Sourcebook on Environmental Rights and Legal Remedies, p. 58.

issued on December 14, 1981, declaring certain areas<sup>7</sup> and types of projects<sup>8</sup> as environmentally critical and within the scope of the Environmental Impact Statement System established under PD 1586.<sup>9</sup>

In connection therewith, the same provision declares that "[n]o person, partnership or corporation shall undertake or operate any such declared environmentally critical project or area without first securing an Environmental Compliance Certificate (ECC) issued by the President or his duly authorized representative."<sup>10</sup>

4. Areas of unique historic, archaeological, or scientific interests;

5. Areas which are traditionally occupied by cultural communities or tribes;

6. Areas frequently visited and/or hard-hit by natural calamities (geologic hazards, floods, typhoons, volcanic activity, etc.);

- 7. Areas with critical slopes;
- 8. Areas classified as prime agricultural lands;
- 9. Recharged areas of aquifers;
- Water bodies characterized by one or any combination of the following conditions:
  a. tapped for domestic purposes
  - b. within the controlled and/or protected areas declared by appropriate authorities
  - c. which support wildlife and fishery activities

11. Mangrove areas characterized by one or any combination of the following conditions:

- a. with primary pristine and dense young growth;
- b. adjoining mouth of major river systems;
- c. near or adjacent to traditional productive fry or fishing grounds;
- d. which act as natural buffers against shore erosion, strong winds and storm floods;
- e. on which people are dependent for their livelihood.
- 12. Coral reefs, characterized by one or any combinations of the following conditions:
  - a. with 50% and above live coralline cover;
  - b. spawning and nursery grounds for fish;
- c. which act as natural breakwater of coastlines.
- <sup>8</sup> A. Environmentally Critical Projects
- I. Heavy Industries
  - a. Non-ferrous metal industries
  - b. Iron and steel mills
  - c. Petroleum and petro-chemical industries including oil and gas
  - d. Smelting plants
- II. Resource Extractive Industries
  - a. Major mining and quarrying projects
  - b. Forestry projects
    - 1. Logging
    - 2. Major wood processing projects
    - 3. Introduction of fauna (exotic-animals) in public/private forests
    - 4. Forest occupancy
    - 5. Extraction of mangrove products
    - 6. Grazing
  - c. Fishery Projects
    - 1. Dikes for/and fishpond development projects
- **III. Infrastructure Projects**
- a. Major dams
- b. Major power plants (fossil-fueled, nuclear fueled, hydroelectric or geothermal)
- c. Major reclamation projects
- d. Major roads and bridges
- <sup>9</sup> Republic v. City of Davao, G.R. No. 148622, September 12, 2002, 388 SCRA 691.

<sup>10</sup> Section 4, PD 1586.

<sup>&</sup>lt;sup>7</sup> B. Environmentally Critical Areas

<sup>1.</sup> All areas declared by law as national parks, watershed reserves, wildlife preserves and sanctuaries;

<sup>2.</sup> Areas set aside as aesthetic potential tourist spots;

<sup>3.</sup> Areas which constitute the habitat for any endangered or threatened species of indigenous Philippine Wildlife (flora and fauna);

For those projects that are identified to be *environmentally non-critical*, Section 5 of the same law provides that "[a]ll other projects, undertakings and areas not declared by the Presidents as environmentally critical shall be considered as non-critical and shall not be required to submit an environmental impact statement."

Thus and simply put, under the PEISS, if the project is itself identified to be environmentally critical or to be undertaken at an environmentally critical area, the proponent has to secure an ECC. If, however, the project is identified under the PEISS as environmentally non-critical and is not to be undertaken in an environmentally critical area, then the proponent will secure a Certificate of Non-Coverage (CNC) instead of an ECC.

It is, however, well to note that even though a project may be certified as not covered by the environmental impact assessment requirement, still, there is nothing that will bar the government agencies concerned from requiring from the proponent the adoption of additional environmental safeguards that they may deem necessary.<sup>11</sup>

Hence, before the entry of biotechnology in Philippine jurisdiction and the introduction of GMOs to its soil, and even after such, it is the PEISS that primarily governs projects that have or may have an impact on the country's ecological balance and makeup, whether the project involves biotechnology or not. And it was only in 1990, or almost a decade after the issuance of Presidential Proclamation No. 2146 identifying environmentally critical areas and projects, when the government began regulating Biotechnology research in the country.

# Philippine Regulations on Biotechnology and Biosafety

In 1987, scientists from the University of the Philippines Los Baños (UPLB) and the International Rice Research Institute (IRRI), the Quarantine Officer of the Bureau of Plant Industry (BPI), and the Director for Crops of the Philippine Council for Agriculture, Forestry and Natural Resources Research and Development (PCARRD), recognizing the potential harm of the introduction of exotic species and genetic engineering, formed a committee and formulated the biosafety protocols and guidelines for genetic engineering and related research activities for UPLB and IRRI researchers. The committee went on to draft a Philippine biosafety policy, which was submitted to the Office of the President.<sup>12</sup>

On the basis of said submission, on October 15, 1990, then President Corazon C. Aquino signed Executive Order No. 430 (EO 430) constituting the National Committee on Biosafety of the Philippines (NCBP) among

<sup>11</sup> Sec. 5, PD 1586.

<sup>&</sup>lt;sup>12</sup> Evolution of the Philippine Biosafety System, Department of Agriculture-Bureau of Plant Industry, http://biotech.da.gov.ph/. Last accessed, December 7, 2015.

other purposes.<sup>13</sup> Said directive was issued in recognition of the value of biotechnology and its high potential to improve the quality of human life, as well as the possible concomitant risks and hazards that biotechnology may pose to health safety, environment, and society.<sup>14</sup>

EO 430 created the National Committee on Biosafety of the Philippines (NCBP) and vested upon it the following functions, to wit:

(a) Identify and evaluate potentials hazards involved in initiating genetic engineering experiments or the introduction of new species and genetically engineered organisms and recommend measures to minimize risks:

(b) Formulate and review national policies and guidelines on biosafety, such as the safe conduct of work on genetic engineering, pests and their genetic materials for the protection of public health, environment and personnel and supervise the implementation thereof;

(c) Formulate and review national policies and guidelines in risk assessment of work biotechnology, and supervise the implementation thereof;

(d) Develop working arrangements with the government quarantine services and institutions in the evaluation, monitoring, and review of projects vis-a-vis adherence to national policies and guidelines on biosafety;

(e) Assist in the development of technical expertise, facilities and other resources for quarantine services and risk assessments;

(f) Recommend the development and promotion of research programs to establish risk assessment protocols and assessment of long-term environmental effects of biological research covered by these guidelines;

(g) Publish the results of internal deliberation and agency reviews of the committee:

(h) Hold public deliberations on proposed national policies, guidelines and other biosafety issues;

(i) Provide assistance in the formulation, amendment of pertinent laws, rules and regulations; and

(j) Call upon the assistance of any government agency, department, office, bureau including government-owned and/or controlled corporations.<sup>15</sup>

Pursuant to its mandate, the NCBP published the first version of the Philippine National Biosafety Guidelines in 1991 (1991 Guidelines). Said Guidelines governs regulating the importation, transfer and use of GMOs

<sup>&</sup>lt;sup>13</sup> http://www.ncbp.dost.gov.ph/19-guidelines/24-executive-order-no-430-s-1990. Last accessed November 23, 2015.

<sup>&</sup>lt;sup>14</sup> WHEREAS, the impact of the new technologies on health, agriculture, chemical and pharmaceutical, and environment and natural resources has been a continuing worldwide concern of many countries;

WHEREAS, biotechnology has high potential to improve the quality of human life may have concomitant risks and hazards to health safety, the environment and society;

WHEREAS, the hazards associated with the processes and the products of researches in biotechnology may be minimized, if not totally eliminated, by the different containment levels and procedures observed in the laboratories and greenhouses;

WHEREAS, most of the risks are associated with the field testing and eventual deliberate release of genetically manipulated/engineered organisms into the environment;

WHEREAS, there is a need to constitute a body that shall undertake the study and evaluation of existing laws, policies and guidelines on biotechnology and its related matters, and recommend such measures for its effective utilization and prevention of possible pernicious effects in the environment. (EO 430, s. 1990) <sup>15</sup> Section 4, EO 430 s. 1990.

and potentially harmful exotic species in the Philippines, with focus on potentially hazardous work performed under contained conditions. Since the publication of the first edition, the NCBP has received and evaluated more than eighty (80) project proposals, all of which were to be performed under contained conditions. However, recognizing the rapid advances in other countries in respect of field trials of selected GMOs, the NCBP decided to look into the adequacy and relevance of the Guidelines, particularly as it relates to planned release.

In 1996, the NCBP started to review the Guidelines with the view of revising it to address the concerns of both the scientific and environmental communities. Hence, the second edition was issued on May 15, 1998. Series No. 3 of the second edition contains the guidelines on the deliberate release of GMOs and Potentially Harmful Exotic Species (PHES) into the Philippine Environment.<sup>16</sup> Furthermore, it specifically repealed the provisions of the 1991 Guidelines on field release of regulated materials which are inconsistent therewith.<sup>17</sup>

From 1990 to 2002, the NCBP's scope of mandate included research and development in the laboratory, screenhouse and in the field.<sup>18</sup> **Regulation of field testing was later removed from the NCBP's mandate** when the Department of Agriculture (DA) issued Administrative Order No. 8 (AO No. 8, s. 2002) or the "Rules and Regulations for the Importation and Release into the Environment of Plants and Plant Products Derived from the Use of Modern Biotechnology."

AO No. 8, s. 2002 was approved on April 3, 2002 and became operational in July 2003.<sup>19</sup> It covers the importation or release into the environment of:

- 1. Any plant which has been altered or produced through the use of modern biotechnology if the donor organism, host organism, or vector or vector agent belongs to any of the genera or taxa classified by BPI as meeting the definition of plant pest or is a medium for the introduction of noxious weeds; or
- 2. Any plant or plant product altered or produced through the use of modern biotechnology which may pose significant risks to human health and the environment based on available scientific and technical information.<sup>20</sup>

<sup>&</sup>lt;sup>16</sup> NCBP Monograph dated May 15, 1998.

<sup>&</sup>lt;sup>17</sup> SECTION 9. REPEALING CLAUSE All provisions of the Philippine Biosafety Guidelines (1991 edition), particularly Part III, paragraph 2.3 (Field release of Regulated Materials), which are inconsistent with this Monograph are hereby repealed.

<sup>&</sup>lt;sup>18</sup> p. 15, *Biosafety Regulations in the Philippines: A Review of the First fifteen Years, Preparing* for the Next Fifteen, A Report of the National Committee on Biosafety of the Philippines (NCBP), by the National Academy on Science and Technology (NAST), Department of Science and Technology (DOST), NCBP, and the Program for Biosafety Systems (2009).

<sup>&</sup>lt;sup>19</sup> Id.

<sup>&</sup>lt;sup>20</sup> Item A, Section 2, DA AO No. 8, s. 2002.

Furthermore, it specifically provides that it shall not apply to the contained use of a regulated article, which is within the regulatory supervision of the NCBP.<sup>21</sup> With these, the administrative order thus transferred regulation of field testing of biotech crops to the DA's Bureau of Plant Industry (BPI), among others.<sup>22</sup>

With DA AO No. 8, s. 2002, field tests and eventual commercial propagation of biotech crops would be handled by the DA-BPI, instead of the NCBP, starting July 2003. Thus, DA AO 8 redefined the NCBP's tasks to focus on contained facility R & D involving genetically modified organisms. However, NCBP continued to review and formulate policies on biotechnology as well as review and modify the science-based risk assessment of protocols to be used by the regulatory agencies implementing the commercial guidelines. All applications for field tests received before July 1, 2003 remained under the supervision of the NCBP until their completion.<sup>23</sup>

Meanwhile, or on September 11, 2003, the ratification by the Philippines of the Cartagena Protocol on Biosafety entered into force, prompting the issuance by then President Gloria Macapagal-Arroyo of Executive Order No. 514 (EO 514), series of 2006 on March 17, 2006. Said executive order established the National Biosafety Framework (NBF), prescribed guidelines for its implementation, strengthening the NCBP, among others.

EO 514 highlighted the need to enhance the existing biosafety framework to better respond to the challenges presented by further advances in modern biotechnology and to comply with the administrative requirements of the Cartagena Protocol on Biosafety.<sup>24</sup> Consistent with these, the NBF has the following objectives, viz:

2.2.1. Strengthen the existing science-based determination of biosafety to ensure the safe and responsible use of modern biotechnology so that the Philippines and its citizens can benefit from its application while avoiding or minimizing the risks associated with it;

2.2.2. Enhance the decision-making system on the application of products of modern biotechnology to make it more efficient, predictable, effective, balanced, culturally appropriate, ethical, transparent and participatory; and 2.2.3. Serve as guidelines for implementing international obligations on biosafety.

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<sup>&</sup>lt;sup>21</sup> Item B, Section 2, DA AO No. 8, s. 2002.

<sup>&</sup>lt;sup>22</sup> pp. 29-30, *Biosafety Regulations in the Philippines: A Review of the First fifteen Years, Preparing for the Next Fifteen*, A Report of the National Committee on Biosafety of the Philippines (NCBP), by the National Academy on Science and Technology (NAST), Department of Science and Technology (DOST), NCBP, and the Program for Biosafety Systems (2009).

<sup>&</sup>lt;sup>23</sup> p. 15, *Biosafety Regulations in the Philippines: A Review of the First fifteen Years, Preparing for the Next Fifteen*, A Report of the National Committee on Biosafety of the Philippines (NCBP), by the National Academy on Science and Technology (NAST), Department of Science and Technology (DOST), NCBP, and the Program for Biosafety Systems (2009).

<sup>&</sup>lt;sup>24</sup> WHEREAS, there is a need to enhance the existing biosafety framework to better respond to the challenges presented by further advances in modern biotechnology and to comply with the administrative requirements of the Cartagena Protocol on Biosafety.

In order to put these objectives into action, EO 514 strengthened the NCBP through the expansion of its composition<sup>25</sup> and functions.

Anent its composition, EO 514 provides thusly:

The NCBP shall be composed of the following: The Secretaries of the Departments of Science and Technology, Agriculture, Health, Environment and Natural Resources, Foreign Affairs, Trade and Industry, and Interior and Local Governments or their designated representatives.

The DOST Secretary shall be the permanent Chair; A consumer representative appointed by the President from a list submitted by nationally recognized consumer organizations, serving for a term of three (3) years, renewable for another term;

A community representative from the farmers, fisherfolk and indigenous sector appointed by the President from a list submitted by nationally recognized sectoral organizations, serving for a term of three (3) years, renewable for another term;

4.2.4 A representative from industry appointed by the President from a list submitted by the Secretary of Trade and Industry, serving for a term of three (3) years, renewable for another term; and,

A biological scientist, physical scientist, environmental scientist, health scientist, and social scientist to be endorsed by the DOST Secretary upon the recommendation of recognized professional and collegial bodies such as the National Academy of Science and Technology (NAST) and the Philippine Social Science Council (PSSC), and appointed by the President, each serving for a term of three (3) years, renewable for another term.

This new NCBP was then directed to, among others:

- 1. set the national scientific and technical biosafety standards on methods and procedures for ensuring biosafety in the country, consistent with existing laws; and
- 2. to develop basic policies on addressing public interests on biosafety, provided that the same are consistent with law and if such policies are found insufficiently addressed in existing mandates and regulations of pertinent agencies.<sup>26</sup>

<sup>&</sup>lt;sup>25</sup> Sub-section 4.2 (Composition of the NCBP), Section 4 (Administrative Framework) (EO 514).

<sup>&</sup>lt;sup>26</sup> SECTION 4. ADMINISTRATIVE FRAMEWORK. The administrative mechanism for biosafety decisions shall be as follows:

<sup>(</sup>a) National scientific and technical biosafety standards and standards on methods and procedures for ensuring biosafety in the country shall be set by the NCBP consistent with existing laws: Basic policies on addressing public interests on biosafety shall be developed by the NCBP, provided the same are consistent with law and if such policies are found insufficiently addressed in existing mandates and regulations of pertinent agencies;

<sup>(</sup>b) Member-agencies of the NCBP shall continue to perform their regulatory functions in accordance with their legal mandates, provided that their policies and programs relating to biosafety shall be discussed in the NCBP for purposes of harmonization with other agencies' functions;

<sup>(</sup>c) Other concerned agencies shall coordinate with NCBP on matters that may affect biosafety decisions as provided in Sections 4.7 to 4.14;

<sup>(</sup>d) Administrative functions required under the Cartagena Protocol on Biosafety shall be performed by agencies as provided in Section 4.14 and 4.15; and,

<sup>(</sup>e) The role of stakeholders and the general public shall be recognized and taken into account as provided in Sections 6 and 7. (EO 514)

The DA was designated as the agency that shall address biosafety issues related to the country's agricultural productivity and food security.<sup>27</sup> Additionally, the DA was directed to exercise such jurisdiction and other powers that it has been conferred with under existing laws, in coordination with other concerned departments and agencies, and consistent with the requirements of transparency and public participation as provided in Sections 6 and 7 of the NBF. Moreover, it was mandated to take the lead in evaluating and monitoring plant and plant products derived from the use of modern biotechnology, as provided in Department of Agriculture Administrative Order No. 008, s. 2002.

The Department of Science and Technology (DOST), on the other hand, is to take the lead in ensuring that the best available science is utilized and applied in adopting biosafety policies, measures and guidelines, and in making biosafety decisions. It also was tasked to ensure that such policies, measures, guidelines and decisions are made on the basis of scientific information that is of the highest quality, multi-disciplinary, peer-reviewed, and consistent with international standards as they evolve.<sup>28</sup>

The Department of Environment and Natural Resources (DENR) was mandated to ensure that environmental assessments are done and impacts identified in biosafety decisions. It shall also take the lead in evaluating and monitoring regulated articles intended for bioremediation, the improvement of forest genetic resources, and wildlife genetic resources.<sup>29</sup>

With respect to its functions, Item 4.6, Section 4 of EO 514 provides thusly:

**4.6 Powers and Functions of the NCBP.** As the lead body in implementing the NBF, the NCBP shall have the following powers and functions:

## **4.6.1 Biosafety Policy Functions**

Assist concerned departments and agencies in formulating, reviewing, or amending their respective policies, measures and guidelines on biosafety;

Hold public deliberations on proposed national policies, guidelines, and other biosafety issues;

4.6.1.3 Provide assistance in the formulation, amendment of pertinent laws, rules and regulations;

4.6.1.4 In coordination with concerned departments and agencies and consistent with the requirements of transparency and public participation as provided in Sections 6 and 7 of the NBF, shall take the lead in periodically reviewing the NBF;

<sup>&</sup>lt;sup>27</sup> Item 4.8, Section 4 [Administrative Framework], EO 514.

<sup>&</sup>lt;sup>28</sup> Item 4.7, Section 4 [Administrative Framework], EO 514.

<sup>&</sup>lt;sup>29</sup> Item 4.9, Section 4 [Administrative Framework], EO 514.

Issue detailed guidelines on the conduct of socio-economic impact evaluation of biosafety decisions; and,

Propose to Congress necessary and appropriate legislation.

#### 4.6.2 Accountability Functions

4.6.2.1 Monitor the implementation of the NBF by concerned departments and agencies;

4.6.2.2 Ensure coordination among competent national authorities that have shared mandates;

## 4.6.2.3 Ensure that NCBP guidelines, and the principles and processes established in this Framework are complied with by concerned departments and agencies; and,

Review procedures for accountability in biosafety decision-making by competent national authorities, with particular emphasis on ensuring independence and impartiality in such decisions.

## 4.6.3 Scientific Functions

4.6.3.1 Facilitate the study and evaluation of biosafety research and control and minimize the concomitant risks and hazards associated with the deliberate release of regulated articles in the environment;

4.6.3.2 Identify and evaluate potential hazards involved in modern biotechnological experiments or the introduction of regulated articles and recommend measures to minimize risks;

4.6.3.3 Recommend the development and promotion of research programs to establish risk assessment protocols and assessment of long-term environmental effects of regulated articles;

4.6.3.4 Develop working arrangements with the government quarantine services and institutions in the evaluation, monitoring, and review of projects vis-a-vis adherence to national policies and guidelines on biosafety;

4.6.3.5 Review and develop guidelines in the risk assessment of regulated articles for contained use;

4.6.3.6 Assist other agencies in developing risk assessment guidelines and procedures of regulated articles for field trials and commercial release;

4.6.3.7 Review the appointment of the members of the Institutional Biosafety Committees created by institutions engaged in activities involving regulated articles, upon recommendation by their respective heads of institutions;

4.6.3.8 Publish the results of internal deliberations and agency reviews of the NCBP;

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4.6.3.9 Hold, discussions on the comparative ecological, economic and social impacts of alternative approaches to attain the purposes/objectives of the proposed genetic modification products and/or services; and,

4.6.3.10 Perform such functions as may be requested by concerned departments and agencies.

#### 4.6.4 Capacity Building Functions

4.6.4.1 Assist in the development of technical expertise, facilities, and other resources for quarantine services and risk assessments; and,

4.6.4.2 Take the lead in developing and implementing a national capacitybuilding program for biosafety.

As to its effect on existing policies, rules, and issuances, specifically DA AO No. 8, s. 2002, it is well to note that Section  $8^{30}$  of EO 514 specifically provided that DA AO No. 8, s. 2002 remains to be in force and effect.

Despite the issuance, however, of EO 514, new biosafety policies or guidelines on GMO field testing have yet to be issued. Furthermore, DA AO No. 8, s. 2002 has not been amended. As such, it remains to be the rules that primarily govern the conduct of field trials for genetically engineered plants and crops in our jurisdiction, as noted by the *ponencia*.

As it stands, application for field testing of regulated articles is governed by Part III (Approval Process for Field Testing of Regulated Articles) of DA AO No. 8, s. 2002, Section 7 of which states that:

No regulated article shall be released into the environment for field testing, unless: (i) a *Permit to Field Test* has been secured from the BPI; and (ii) the regulated article has been tested under contained conditions in the Philippines.  $x \times x$ 

It is important, however, to emphasize that despite the issuance of DA AO No. 8, s. 2002, the NBF, and the NCBP Guidelines, other statutory requirements or those required by agencies remain in full force and effect.<sup>31</sup> This is bolstered by the fact that EO 514, as mentioned by the

<sup>&</sup>lt;sup>30</sup> Section 8. Repealing and Amending Clause. All orders, rules and regulations or parts thereto which are inconsistent with any of the provisions of this Order are hereby repealed or amended accordingly. For the avoidance of doubt, the following issuances, unless amended by the respective issuing departments or agencies, shall continue to be in force and effect: Department of Agriculture Administrative Order No. 008, s. 2002; the NCBP Guidelines on the Contained Use of Genetically Modified Organisms, except for provisions on potentially harmful exotic species which are hereby repealed; and all Bureau of Food and Drugs issuances on products of modern biotechnology.

<sup>&</sup>lt;sup>31</sup> The NCBP reviews proposals on modern biotechnology applications for the benefit of the final approving bodies (agencies which have regulatory functions on specific areas such as the Department of Agriculture's Bureau of Plant Industry or the Department of Health or the Department of Environment and Natural Resources which are official members of the NCBP). The NCBP's actions of "approval" or "disapproval" of biotechnology applications is restricted to "research and development, technical aspects (whether or not, on the basis of existing science, safety risk are considered acceptable); scientific advice (i.e., it is directed to pertinent line agencies to provide them a basis for acting on proposed applications; its action ("approved" or "disapproved") is not a final permission to do the application; its action does not preclude any other requirements of laws or by line agencies; final permission is to be granted by

*ponencia*, requires the determination by the concerned departments or agencies of whether the Philippine Environmental Impact Assessment (EIA) System should be applied to biosafety decisions.<sup>32</sup> EO 514 also requires the DENR, as a member of the NCBP, to ensure that environmental assessments are done and impacts identified in biosafety decisions.<sup>33</sup>

## The Present Controversy

The *Bt Talong* is a type of eggplant bio-engineered to develop resistance to *lepidopteran larvae*, through the incorporation of crystal toxin genes from the soil bacterium *Bacillus thuringiensis* (*Bt*) which triggers the production of the protein Cry1Ac which is toxic to the said target insect pests.

Under the regulatory supervision of the NCBP, a contained experiment was started in 2007 and officially completed on March 3, 2009. The NCBP, thus, issued a Certificate of Completion of Contained Experiment stating that "During the conduct of the experiment, all the biosafety measures have been complied with and no untoward incident has occurred."

After securing the necessary permits, the UPLB commenced the field testing of *Bt Talong* on various dates, in the following approved sites: Kabacan, Borth Cotabato; Sta. Maria, Pangasinan; Pili, Camarines Sur; Bago Oshiro, Davao City; and Bay, Laguna.

Reacting to the conduct of the field testing, the *Sangguniang Barangay* of Pangasugan, Baybay, Leyte complained about the lack of information on the nature and uncertainties of the field testing in their barangay. Too, the Davao City Government, in opposition thereto due to lack of transparency and public consultation, ordered the uprooting and disposal of the *Bt* eggplants. Similarly, the *Sangguniang Bayan* of Sta. Barbara, Iloilo passed a resolution suspending the field testing due to the following: lack of public consultation, absence of adequate study to determine the effect of *Bt talong* field testing on friendly insects, absence of risk assessment on the potential impacts of GM crops on human health and the environment, and the possibility of cross-pollination of *Bt* eggplants with native species or variety of eggplants, and serious threat to human health if these were introduced in the market.

appropriate line agencies." [Biosafety Regulations in the Philippines: A Review of the First fifteen Years, Preparing for the Next Fifteen, A Report of the National Committee on Biosafety of the Philippines (NCBP), by the National Academy on Science and Technology (NAST), Department of Science and Technology (DOST), NCBP, and the Program for Biosafety Systems (2009), p. 15]

<sup>&</sup>lt;sup>32</sup> Role of Environment Impact Assessment. The application of the EIA System to biosafety decisions shall be determined by concerned departments and agencies subject to the requirements of law and the standards set by the NCBP. Where applicable and under the coordination of the NCBP, concerned departments and agencies shall issue joint guidelines on the matter. [Item 5.3, Section 5, EO 514].

<sup>&</sup>lt;sup>33</sup> Item 4.9, Section 4 [Administrative Framework], EO 514.

On April 26, 2012, respondents filed a petition for writ of *kalikasan* and writ of continuing mandamus with prayer for the issuance of a Temporary Environmental Protection Order (TEPO). They allege that the *Bt Talong* field trials violate their constitutional right to a healthful and balanced ecology considering that:

- 1. The required environmental compliance certificate under Presidential Decree No. 1151 was not secured prior to the project implementation;
- 2. As a regulated article under DAO 8-2002, *Bt Talong* is presumed harmful to human health and the environment, and there is no independent, peer-reviewed study on its safety for human consumption and on the environment;
- 3. A study conducted by Professor Gilles-Eric Seralini showed adverse effects on rats who were fed *Bt* corn, while local scientists also attested to the harmful effects of GMOs to human and animal health;
- 4. *Bt* crops can be directly toxic to non-target species as highlighted by a research conducted in the US which demonstrated that pollen from *Bt* Maize was toxic to the Monarch butterfly;
- 5. Data from the use of *Bt Cry1Ab* maize indicate that beneficial insects have increased mortality when fed on larvae of a maize pest, the corn borer, which had been fed on *Bt*, and hence non-target beneficial species that may feed on eggplant could be similarly affected;
- 6. Data from China show that the use of Bt crops (Bt cotton) can exacerbate populations of other secondary pests;
- 7. The built-in pesticides of *Bt* crops will lead to *Bt*-resistant pests, thus increasing the use of pesticides, contrary to the claims by GMO manufacturers;
- 8. The 200-meter perimeter pollen trap area in the field testing set by BPI is not sufficient to stop contamination of nearby non-*Bt* eggplants because pollinators such as honeybees can fly as far as four (4) kilometers and an eggplant is 48% insect-pollinated; and
- 9. The field test project did not comply with the required public consultation under Sections 26 & 27 of the Local Government Code.

The full acceptance by the project proponents of the findings in the MAHYCO Dossier was strongly assailed on the ground that these do not precisely and adequately assess the numerous hazards posed by *Bt Talong* and its field trial.

On these premises, the following reliefs were prayed for:

- 1. Upon the filing of the petition, a Temporary Environmental Protection Order should be issued:
  - a. Enjoining Bureau of Plant Industry (BPI) and Fertilizer and Pesticide Authority (FPA) of the DA from processing for field testing, and registering as herbicidal product *Bt talong* in the Philippines;
  - b. Stopping all pending field testing of *Bt talong* anywhere in the Philippines; and

- c. Ordering the uprooting of planted *Bt talong* for field trials as their very presence poses significant and irreparable risks to human health and the environment;
- 2. Upon the filing of the petition, issue a writ of continuing mandamus commanding:
  - a. Respondents to submit to and undergo the process of environmental impact statement system under the Environmental Management Bureau (EMB);
  - b. Respondents to submit independent, comprehensive, and rigid risk assessment, field test report, regulatory compliance reports and supporting documents, and other material particulars of the *Bt talong* field trial;
  - c. Respondents to submit all its issued certifications on public information, public consultation, public participation, and consent of the local government units in the barangays, municipalities, and provinces affected by the field testing of *Bt talong*;
  - d. Respondent regulator, in coordination with relevant government agencies and in consultation with stakeholders, to submit an acceptable draft of an amendment of the National Biosafety Framework of the Philippines, and DA Administrative Order No. 08, defining or incorporating an independent, transparent, and comprehensive scientific and socio-economic risk assessment, public information, consultation, and participation, and providing for their effective implementation, in accord with international safety standards; and
  - e. Respondent BPI of the DA, in coordination with relevant government agencies, to conduct balanced nationwide public information of the nature of *Bt talong* and *Bt talong* field trial, and a survey of social acceptability of the same.
- 3. Upon filing of the petition, issue a writ of *kalikasan* commanding respondents to file their respective returns and explain why they should not be judicially sanctioned for violating or threatening to violate or allowing the violation of the above-enumerated laws, principles, and international principles and standards, or committing acts, which would result into an environmental damage of such magnitude as to prejudice the life, health, or property of petitioners in particular and of the Filipino people in general;
- 4. After hearing and judicial determination, to cancel all *Bt talong* field experiments that are found to be violating the abovementioned laws, principles, and international standards; and recommend to Congress curative legislations to effectuate such order.

On May 2, 2012, the Court issued a writ of *kalikasan* against International Service for the Acquisition of Agri-Biotech Applications, Inc. (ISAAA), EMB/BPI/FPA and UPLB, ordering them to make a verified return within a non-extendible period of ten (10) days, as provided in Sec. 8, Rule 7, of the Rules of Procedure for Environmental Cases.

ISAAA, EMB/BPI/FPA, UPLB Foundation, Inc., and UP Mindanao Foundation, Inc. (UPMFI) filed their respective verified returns. They all argued that the issuance of writ of *kalikasan* is not proper because in the implementation of the *Bt talong* project, all environmental laws were complied with, including public consultations in the affected communities, to ensure that the people's right to a balanced and healthful ecology was protected and respected. They also asserted that the *Bt talong* project is not covered by the Philippine Environmental Impact Statement (PEIS) Law and that *Bt talong* field trials will neither significantly affect the quality of the environment nor pose a hazard to human health. ISAAA contended that the NBF amply safeguards the environment policies and goals promoted by the PEIS Law. For its part, UPLBFI asserted that there is a "plethora of scientific works and literature, peer-reviewed, on the safety of *Bt talong* for human consumption."

ISAAA argued that the allegations regarding the safety of *Bt talong* as food are irrelevant in the field trial stage as none of the eggplant will be consumed by humans or animals, and all materials that will not be used for analyses will be chopped, boiled, and buried following the Biosafety Permit requirements. Too, it cited a 50-year history of safe use and consumption of agricultural products sprayed with commercial *Bt* microbial pesticides and a 14-year history of safe consumption of food and feed derived from *Bt* crops.

UPMFI contends that the *Bt talong* planted in Davao City have already been uprooted by the City officials. And there having been no further field trials conducted thereat, there is no violation of the constitutional rights of persons or damage to the environment with respect to Davao City that will justify the issuance of a writ of *kalikasan*.

Finally, it is argued that the precautionary principle is not applicable considering that the field testing is only a part of a continuing study being done to ensure that the field trials have no significant impact on the environment. There is, thus, no resulting environmental damage of such magnitude as to prejudice the life, health, or property of inhabitants in two or more cities or provinces.

On July 10, 2012, the Court referred the case to the CA for acceptance of the return of the writ and for hearing, reception of evidence, and rendition of judgment. The following issues were submitted for the CA's resolution:

- 1. Whether or not Greenpeace, et al. have the legal standing to file the petition for writ of *kalikasan*;
- 2. Whether or not the case presented a justiciable controversy; and
- 3. Whether or not said petition had been rendered moot and academic by the alleged termination of the *Bt talong* field testing.

Under its Resolution dated October 12, 2012, the CA resolved that: (1) Greenpeace, et al. possess the requisite legal standing to file the petition; (2) assuming *arguendo* that the field trials have already been terminated, the case is not yet moot since it is capable of repetition yet evading review; and (3) the alleged non-compliance with environmental and local government laws present justiciable controversies for resolution by the court.

After trial on the merits, the CA, on May 17, 2013, rendered a Decision in favor of Greenpeace, et al., thus:

WHEREFORE, in view of the foregoing premises, Judgment is hereby rendered by us **GRANTING** the petition filed in this case. The respondents are **DIRECTED** to:

- (a) Permanently cease and desist from further conducting *bt talong* field trials; and
- (b) Protect, preserve, rehabilitate and restore the environment in accordance with the foregoing judgment of this Court.

No costs.

#### SO ORDERED.

The CA found that existing regulations issued by the DA and the DOST are insufficient to guarantee the safety of the environment and the health of the people. It likewise applied the precautionary principle set forth in Section 1, Rule 20 of the Rules of Procedure for Environmental Cases, stressing the fact that the "over-all safety guarantee of the *bt talong*" and whether it poses a threat to human health remain unknown. In view of said uncertainty, the CA upheld the primacy of the people's constitutional right to a healthful and balanced ecology.

Then, in its September 20, 2013 Resolution, the CA rejected UPLB's argument that its ruling violated the latter's constitutional right to academic freedom. The CA held that the writ issued by the Court did not stop the research on *Bt talong* but only the particular procedure adopted in the conduct of the field trials and only at this time when there is yet no law in the form of a congressional enactment for ensuring its safety and levels of acceptable risks when introduced into the environment.

The CA, in justifying its ruling, relied on the theory that the introduction of a genetically modified plant into our ecosystem is an "ecologically imbalancing act." The CA noted that the *Bt talong* is a technology involving a deliberate alteration of an otherwise natural state of affairs, designed to alter the natural feed-feeder relationships of the eggplant.

From the foregoing, the following issues were presented for this Court's resolution:

1. Legal standing of respondents;

- 2. Mootness;
- 3. Violation of the doctrines of primary jurisdiction and exhaustion of administrative remedies;
- 4. Application of the law on environmental impact statement/assessment on projects involving the introduction and propagation of GMOs in the country;
- 5. Evidence of damage or threat of damage to human health and the environment in two or more provinces, as a result of the *Bt talong* field trials;
- 6. Neglect or unlawful omission committed by the public respondents in connection with the processing and evaluation of the applications for *Bt talong* field testing; and
- 7. Application of the precautionary principle.

Anent the technical aspect of the case, it is clear from the *ponencia*'s lengthy discussion that the safety or danger of introduction of GMOs, in general, to the natural environment through field testing has yet to be settled with scientific certainty, if it could indeed be settled. Furthermore, the subject matter of the instant petition—that is, field testing of a GMO—is truly of a highly complex nature and this complexity is strongly demonstrated by the fact that the matter remains to be hotly debated in the scientific community. However, it is respectfully submitted that the instant petition can be resolved, and the right to a balanced and healthful ecology sufficiently protected, on a purely legal ground.

Anent the invocation of the Precautionary Principle under A.M. No. 09-6-8-SC or the Court's Rules of Procedure for Environmental Cases, it is submitted that such is not necessary in the instant petition since, as mentioned, it could be sufficiently settled on purely legal grounds and without a heavy, if not complete, reliance on the scientific aspect of the case. As correctly mentioned by the *ponencia*, it is an evidentiary rule that must be applied only as a last resort. Thus, if an environmental case can be settled and the people's environmental rights sufficiently protected without applying this principle, then the courts should refrain from doing so.

Among the numerous issues presented for this Court's consideration are alleged neglect or unlawful omission committed by the public respondents in connection with the processing and evaluation of the applications for *Bt talong* field testing and the applicability of the Philippine Environmental Impact Statement System (PEISS) to GMO field trials. It is in these matters that, in my opinion, the petitioner-agencies failed.

Petitioner-agencies maintain that the subject field trials are not covered by the PEISS. It is submitted, however, that the PEISS also covers GMO field trials on the following grounds:

*First*, as previously mentioned, EO 514 clearly requires the DENR to ensure that environmental assessments are done and impacts identified

in biosafety decisions.<sup>34</sup> This, in itself, is a clear indication that GMO field trials fall within the purview of our PEISS.

Under EO 514, "biosafety decisions" apply to the development, adoption and implementation of all biosafety policies, measures and guidelines and in making decisions concerning the research, development, handling and use, transboundary movement, release into the environment and management of regulated articles.<sup>35</sup>

Thus, EO 514 calls for the conduct of environmental assessments and impact identification—which precisely is the purpose of the PEISS whenever biosafety decisions are to be made with respect to the research, development, handling and use, transboundary movement, and release into the environment of regulated articles, which are, to reiterate, GMOs. To my mind, "making [biosafety] decisions concerning the research, development, handling and use, transboundary movement, release into the environment and management of regulated articles" include determining the coverage or non-coverage of a GMO field trial under the PEISS, as well as the propriety of issuing an ECC or a CNC for a particular project.

Second, the assessment of the direct and indirect impacts of a project on the biophysical and human environment and ensuring that these impacts are addressed by appropriate environmental protection and enhancement measures is the primary concern of the PEISS as declared in Article 1, Section 1 (Basic Policy and Operating Principles) of the DENR AO No. 30 s. 2003 (DAO 30, s. 2003) or the Implementing Rules and Regulations (IRR) for the Philippine Environmental Impact Statement (EIS) System.

*Third*, Section 4, paragraph 4.1, Article II of DAO 30, s. 2003, provides that projects that pose **potential significant impact to the environment** shall be required to secure an ECC.

Anent this possibility of negatively affecting the environs, it is argued that the introduction of the *Bt talong* to the natural environment in connection with the field trials will not adversely affect the condition of the field trial sites, banking on the absence of documented significant and negative impact of the planting of *Bt corn* in the Philippines, among others. However, it is curious that in blocking the application of the precautionary principle, petitioners contradict this prior assertion when they maintained that **field trials have no significant and negative impact on the environment**. This, to my mind, only goes to show that it is erroneous for them to maintain that the field trials in question will not adversely affect the environment when they themselves admit that such is not yet a scientific certainty, hence the conduct of further research on the matter. And without

<sup>&</sup>lt;sup>34</sup> Id.

<sup>&</sup>lt;sup>35</sup> Item 3.3 [Definitions], Section 3 [Scope, Objectives and Definitions], EO 514.

this certainty that the project will leave no footprint on the natural environment, as well as a certification to that effect, it should be presumed that the field trial poses a potential significant impact to the environment for which an ECC is required.

*Fourth*, the Revised Procedural Manual for DENR AO No. 30, s. 2003 (Revised Manual) enumerates the projects that are covered by the PEISS. Said enumeration, as the *ponencia* pointed out, includes Group V (Unclassified Projects) which pertains to those projects using new processes/technologies with uncertain impacts.<sup>36</sup>

*Fifth*, Item 8 of said Revised Manual, governing the EIA Report Types and Generic Contents, requires a Project Description Report (PDR) for Group V projects, to ensure new processes/technologies or any new unlisted project does not pose harm to the environment. The Group V PDR is a basis for either issuance of a CNC or classification of the project into its proper project group.

Lastly, there is no evidence that a Certificate of Non-Coverage for the *Bt* talong field trials was issued by the DENR, through its Environmental Management Bureau.

To my mind, the above grounds should have prompted the DENR to require from the project proponents an EIA or at the very least evaluated the project's coverage or non-coverage as pre-condition to the allowance of the field testing. In this regard, the DENR—as a member of the NCBP with the clear mandate of making certain that environmental assessments are done in the conduct of GMO research, and as the agency tasked to enforce the PEISS—may have been remiss in its duty.

It may be that there is a confusion as to the requirements before field testing a GMO may be allowed considering that the regulation that governs applications therefor, that is, DA AO No. 8, s. 2002, makes no mention of the necessity of an EIA or the applicability of the PEISS. Additionally, per the NCBP's Report,<sup>37</sup> it was pointed out that the applicability of the PEISS to field trials was a hotly discussed issue. While securing an ECC or a CNC was the perceived requirement for EIA in biosafety valuations, there were those who argued that the EIA can take many years to conduct and cost millions of pesos and could, therefore, delay field tests and discourage proponents. It was likewise maintained that under the present practice of the NCBP, the confinement afforded by the screenhouse and/or contained fields already provides a means to prevent or minimize any adverse environmental impact and, thus, an EIA may not be required.

<sup>&</sup>lt;sup>36</sup> See List of Covered Projects of the Philippine EIS System, item (g), *Revised Procedural Manual for DENR AO No. 30 s. 2003* [DAO 03-30].

<sup>&</sup>lt;sup>37</sup> Biosafety Regulations in the Philippines: A Review of the First fifteen Years, Preparing for the Next Fifteen, A Report of the National Committee on Biosafety of the Philippines (NCBP), by the National Academy on Science and Technology (NAST), Department of Science and Technology (DOST), NCBP, and the Program for Biosafety Systems (2009).

Per said Report, however, it was also stated that an environmental assessment may be required when a confined field test involves new species, organisms or novel modifications that raise new issues. Considering that data on the *Bt talong*, as admitted by the proponents, is still being collected through research and field trials, and that its effects not only on the environment but also on human health are yet to be determined with scientific certainty, caution calls that the DENR-EMB should have applied the required standard of precaution under EO 514, which requires that the precautionary approach shall guide biosafety decisions in accordance with Principle 15 of the Rio Declaration of 1992<sup>38</sup> and the relevant provisions of the Cartagena Protocol on Biosafety, in particular Articles 1, 39, 10 (par.6)<sup>40</sup> and 11 (par. 8)<sup>41</sup> thereof.<sup>42</sup> In this respect, EO 514 requires thusly:

SECTION 5. DECISION-MAKING PROCESSES

Biosafety decisions shall be made in accordance with existing laws and the following guidelines:

Standard of Precaution. In accordance with Article 10 (par. 6) and Article 11 (par. 8) of the Cartagena Protocol on Biosafety, lack of scientific certainty or consensus due to insufficient relevant scientific information and knowledge regarding the extent of the potential adverse effects of a genetically modified organism on the environment, particularly on the conservation and sustainable use of biological diversity, and on human health, shall not prevent concerned government departments and agencies from taking the appropriate decision to avoid or minimize such potential adverse effects. In such cases, concerned government department and agencies shall take the necessary action to protect public interest and welfare.

Thus, in case there was, indeed, doubt as to the applicability or nonapplicability of the PEISS to biotechnology research, the DENR-EMB, in accordance with its mandate, should have observed such standard of

<sup>&</sup>lt;sup>38</sup> Principle 15 - In order to protect the environment, the precautionary approach shall be widely applied by States according to their capabilities. Where there are threats of serious or irreversible damage, lack of full scientific certainty shall not be used as a reason for postponing cost-effective measures to prevent environmental degradation.

<sup>&</sup>lt;sup>39</sup> Article 1 [Objective] - In accordance with the precautionary approach contained in Principle 15 of the Rio Declaration on Environment and Development, the objective of this Protocol is to contribute to ensuring an adequate level of protection in the field of the safe transfer, handling and use of living modified organisms resulting from modern biotechnology that may have adverse effects on the conservation and sustainable use of biological diversity, taking also into account risks to human health, and specifically focusing on transboundary movements.

<sup>&</sup>lt;sup>40</sup> 6. Lack of scientific certainty due to insufficient relevant scientific information and knowledge regarding the extent of the potential adverse effects of a living modified organism on the conservation and sustainable use of biological diversity in the Party of import, taking also into account risks to human health, shall not prevent that Party from taking a decision, as appropriate, with regard to the import of the living modified organism in question as referred to in paragraph 3 above, in order to avoid or minimize such potential adverse effects.

<sup>&</sup>lt;sup>41</sup> 8. Lack of scientific certainty due to insufficient relevant scientific information and knowledge regarding the extent of the potential adverse effects of a living modified organism on the conservation and sustainable use of biological diversity in the Party of import, taking also into account risks to human health, shall not prevent that Party from taking a decision, as appropriate, with regard to the import of that living modified organism intended for direct use as food or feed, or for processing, in order to avoid or minimize such potential adverse effects.

<sup>&</sup>lt;sup>42</sup> Item 2.6, EO 514.

precaution and applied the PEISS to field trials of GMOs by requiring from project proponents the prior securing of an ECC or a CNC.

Additionally, it is but timely to clarify that DA AO No. 8, s. 2002 did not expressly state that projects falling under its coverage are withdrawn from the operation of the PEISS. As a matter of fact, the DENR-EMB itself recognizes that "the PEISS is supplementary and complementary to other existing environmental laws."<sup>43</sup> This is further bolstered by the PEISS' role in relation to the functions of other government agencies. In this regard, it was highlighted that it is inherent upon the EIA Process to undertake a comprehensive and integrated approach in the review and evaluation of environment-related concerns of government agencies (GAs), local government units (LGUs) and the general public. The subsequent EIA findings shall provide guidance and recommendations to these entities as a basis for their decision making process.<sup>44</sup>

As such, it must be that whenever a project falls within the purview of the PEISS and DA AO No. 8, s. 2002, as well as other relevant laws, as Philippine biosafety regulations now stand and as required by the NBF, the project proponent is required to comply with all applicable statutory or regulatory requirements, not just DA AO No. 8, s. 2002.

With these, it is respectfully submitted that the omission by the project proponents of securing an ECC or CNC, whichever is proper for its project, prior to the conduct of the field testing, and the DENR-EMB's failure to evaluate GMO field trials within the purview of the PEISS and simply allowing the trials to be conducted without a prior determination of whether the conduct of an EIA or the prior securing of an ECC is a condition sine qua non for its conduct, warrant the issuance of a permanent environmental protection order directing:

- a. herein project proponents to cease and desist from continuing any pending *Bt talong* field trials without first complying with other applicable environmental laws, including the PEISS; and
- b. the DENR-EMB to apply the PEISS to GMO field trials.

On these premises, I vote to **DENY** the petition on the grounds that the project proponents failed to comply with the requirements under the PEISS and that the DENR-EMB failed to require from the project proponents the securing of an ECC or a CNC prior to the field testing of the *Bt talong*.

PRESBITERÓ J. VELASCO, JR. Associate Justice

 <sup>&</sup>lt;sup>43</sup> Overview of the Philippine EIS System (PEISS), Revised Procedural Manual for DENR AO No. 30 s. 2003, p. 3 [DAO 03-30].
 <sup>44</sup> Id.