# INTRODUCTION TO BIO-PIRACY AND EXISTING LEGAL MECHANISMS RELATED TO PROTECTION OF BIOLOGICAL RESOURCES IN SRI LANKA

#### Yasmada Lakshari Lokunarangoda\*

#### Introduction

Decades ago significant attention was paid on conservation and utilization biological resources but, with the recent developments and the technological transformations, the discussions relating to the ownership of biodiversity related practices, knowledge and the inventions derived from biological materials have become a significant area of interest in the contemporary world. With the up-to-date changes in the world, the necessity to prevent the environmental crimes and preserve the rich diversity of the world's resources have become natural important feature of sustainability and it is one of the most challenging problems facing by the governments. The moment when a protected plant is taken out of its natural habitat without obtaining necessary approval then it becomes bio-theft and if a protected plant has been smuggled outside of the country to obtain monopolies, to introduce any other product derived from a protected plant then, it becomes bio-piracy. In simple words bio-piracy means, an illegal acquisition indigenous of knowledge, genetically modified materials, living organisms in order to earn profits on them. Manifestly, high-tech pirates are focusing on smuggling valuable plants,

animals, indigenous knowledge today to earn quick bucks.

### Sri Lanka- A major victim of biopiracy

Sri Lanka is a small island with rich biodiversity and the result is that Sri Lanka has turned into a major target of the bio-pirates. Bio-piracy means obtaining the exclusive monopoly rights over the biological material of one country by individuals, institutions or companies of other countries that ultimately leads to the denial of the rights of the country of origin. This has become one of the most fast spreading mafias in the world today.

Developing countries like Sri Lanka which are rich in biological resources are in the hands of the developed countries and always subject to over exploitation of the biological resources due to the loopholes in the existing framework. It is well evident that, Sri Lanka has introduced number of legislations complying with the international standards to protect biological resources, prevent bio-piracy and other environmental harms such as pollution, deforestation.

However, it is quite clear that the newspapers, Medias of the country continuously report the incidents of bio-

Colombo, LL.M in Criminal Justice Administration, Masters in Human Rights and Democratization

<sup>\*</sup> Attorney-at-law, LL.B(Hons), Legal officer-Attorney General's Department, M.Phil candidate – Faculty of Law, University of

piracy, over exploitation of biological resources of the country. The incidents dealing with 'Kothalahimbutu' piracy, the piracy of microbes, the piracy of Wallapatta the alleged bio-piracy of our 'RathuKekulu' served as a launching pad to open the eyes of all the people in Sri Lanka. As discussed earlier, bio-piracy has become one of the most challenging and spreading mafias in the world and it threatens the human beings by violating most basic rights such as right to land, right to health and right food when the locals had to pay for their products and it threatens the economy of the country as well.

Moreover, it privatizes the biological resources within the country by allowing patents and it threatens the all endemic living beings and the ecosystem. Danger of being extinct of endemic plant could be named as another consequence of the biopiracy.

# The existing legal mechanism related to protection of biological resources in Sri Lanka

There is no comprehensive legal instrument relating to bio-piracy in Sri Lanka, thus this paper elaborates on the existing laws related to protection of biological resources, biodiversity of Sri Lanka.

The writer explores on the provisions of the Constitution 1978, Flora and Fauna Protection Ordinance No.2 of 1937, Intellectual Property Act No. 36 of 2003, Forest Ordinance No.16 of 1907, National Environmental Act No.47 of 1980, National Heritage and Wilderness Areas Act No.3 of 1988, Custom Ordinance No 17 of 1869 and its subsequent Amendments, Plant Protection Act No 35 of 1999 and Seed Act No 22 of 2003.

## (1) The Constitution of Democratic, Socialist, Republic of Sri Lanka 1987

As stipulated in Article 27(14) of the Constitution, the State shall protect, preserve and improve the environment for the benefit of community and Article 28(f) states that, every person in Sri Lanka owes a duty to protect nature and conserve its riches. The supreme law of the country has laid down the provisions relating to the protection of environment and trying to open the eyes of the people regarding their duty towards the environment. These provisions under the Directive Principles provide some useful directions reminding the people's duty towards the environment. It is well clear that the people of this country have moral obligation towards protecting the environment. As there is no legally binding obligation under the directive principles under Constitution of Sri Lanka, effectiveness and success of protecting the environment is highly debatable. The writer believes inadequacy legally enforceable mechanism under the Supreme Law of the country will encourage the offenders to commit crimes against the environment more and more.

Moreover, Article 14 guarantees that every citizen is entitled to the freedom of speech, freedom of peaceful assembly, freedom of association, freedom or form or join trade union etc. and the writer believes that these provisions will make good platform for the farmers, peasants, breeders, local community groups to raise their voices to protect the natural wealth and the writer thinks that human rights movements, educating the world through social medias

are some of the best ways to face the challenges of bio piracy.

### (2) Flora and Fauna Protection Ordinance No.2 of 1937 and its subsequent Amendments

This Ordinance subsequent and its Amendments could be named as one of the core instruments relating to the protection of bio-diversity in Sri Lanka. The main objective of this written paper is protection of flora and fauna in reserves, sanctuaries and jungles in Sri Lanka. According to Section 42 of the Ordinance, it is illegal to remove, uproot or destroy, or cause any damage or injury to, any plant or sell or expose or offer for sale any plant under this Ordinance.

As stipulated in Section 3, it constraint the human beings from entering national reserve areas and barricade the access to the endemic and indigenous herbal plants or fauna.

Moreover, Section 4, strictly prohibits the access in to a strict Natural Reserve except official duties and for the purpose of scientific researches. In these circumstances a written permission should be obtained from the director. According to the Section 6, no person shall take, collect or remove any plant from National Reserves, obstructs persons by entering intermediate zone, state land within any sanctuary and prohibited collect, take or remove any plant from those sensitive areas.

Act No.22 of 2009 touches the offence bio piracy under Section 71(2)(f) in the following lines as all matters necessary for the regulation of access to the genetic

resources from fauna and flora indigenous to Sri Lanka and the revenue generated from such genetic resources. This provision limits the access to the genetic resources, endemic plants and thereby protects the biological wealth in our territory.

If there is an effective mechanism to regulate the access to genetic resources of Sri Lanka, no one could steal the natural wealth and no one could obtain monopolies over the natural resources illegally. The people, organisations, MNCs those who are willing to obtain access to genetic resources should have to reveal their identities and they should have to give their consent to certain conditions. These steps will arrange good flow of benefit sharing among the holders of genetic resources and the other groups of people who engages in the process of sharing the benefits.

### (3) Intellectual Property Act No. 36 of 2003

As a signatory party to TRIPS agreement, Sri Lanka has a legally binding obligation to implement its provisions domestically. As a result of that, Sri Lanka has enacted Intellectual Property Act to protect the intellectual rights of its people. As stipulated in Section 62(3) (b) plants, animals and other micro-organism (other than transgenic-micro-organism and an essentially biological processes for the production of plants and animals other than non-biological microbiological and processes) shall not be patentable. Moreover, sub section (f) also stipulates that any invention, the prevention within Sri Lanka of the commercial exploitation of which is necessary to protect the public order, morality including the protection of human, animal or plant life or health or the

avoidance of serious prejudice to the environment.

Violations of the provisions of the Act, any infringements of the rights of the holders may order damages, compensation and such other relief as the court may deem just and equitable under Section 170.

As stipulated in Section 181, any person who wilfully infringes the rights of any registered owner, assignee or licensee of a patent shall be guilty of an offence and shall be liable on conviction after trial before a Magistrate to fine not exceeding five hundred thousand rupees or to imprisonment for a term not exceeding six months or to both such fine and such imprisonment.

## (4) Forest Ordinance No.16 of 1907 and its subsequent Amendments

Fitting to the provisions of the Ordinance and its Amendments it is very well evident that conservation, protection and sustainable management of the forest resources and utilization of forest produce the core objectives behind these legal instruments.

Section 6 of No.16 of 1907 stipulates that, any person who will fully strips off the bark or leaves from, or girdles, lops, taps, bums or otherwise damages, any tree shall be guilt of an offence and be liable for conviction. As stipulated in Section 21of No.16 of 1907, the breach of any of the provisions of, or rules made under, this chapter shall constitute an offence punishable by a fine not exceeding one hundred rupees, or by imprisonment which may extend to six months.

In addition, Section 2 of No.30 of 1945 Act any person who fells, cuts, saws, converts, collects, removes or transports any trees or timber or collects, removes or trans-ports any forest produce or has in his possession custody or control any tree, timber or forest produce; shall be guilt of an offence and liable for conviction to imprisonment for a term which may extend to six months or to fine which may extend to five hundred rupees, or to both in addition to such compensation for damage done to the forest as the convicting court may direct to be paid. Such compensation when awarded shall be treated in all respects as a fine, shall be recoverable as such, and shall not exceed one amount of fine which such court has power to impose.

Concentrating on the Ordinance and its subsequent Amendments it is well clear that, no one can collect or remove any macro, micro or derivatives from any tree or plant and these hard binding laws support to reduce bio piracy issues in the country. Apparently, many changes have been visible in the Amendments to the Forest Ordinance and these gradual changes support to protect biological wealth from the pirates. Likewise, it is very clear that the legislature has broaden the definitions and punishments, has made the laws rigid tackle the issues.

### (5) National Environmental Act No.47 of 1980

The main objective of the enactment is to establish a Central Environment Authority and to protect the environment.

As stipulated in Section 21 of the principal enactment, the Authority shall recommend to the Minister a system of management

policies for rational exploitation of forest resources, regulation of the marketing of threatened forest resources, conservation of threatened species of flora, and the encouragement of citizen participation therewith to keep the country's forest resources at maximum productivity at all times.

## (6) National Heritage and Wilderness Areas Act No.3 of 1988

This Act provides protection to the forests rich in biological diversities, unique ecosystems and genetic and natural resources.

According to Section 2, the core purposes of this instrument are preserving in their natural state, unique eco-systems, and genetic resources; or physical of National heritage and biological formations and precisely delineated areas wilderness which constitute the habitat of threatened species of animals and plants of outstanding universal value from the point of view of science or conservation etc. Apparently, the provisions of this Act support to protect fauna and flora habitat in Sri Lanka from the bio pirates.

Section 3 of the Act, restricts the entry into National Heritage Wilderness Areas. Moreover, as per Section 4, no person in a National Heritage Area cut, remove, sell, shoot any plant/ forest produce.

As stipulated in Section 12 any person who acts in contravention of any provisions of this Act, or any regulation made there under shall be guilty of an offence and shall on conviction by a Magistrate be liable to a fine not less than two hundred rupees and not exceeding twenty thousand rupees or to

imprisonment of either description for a term which may extend to six months or to both such fine and imprisonment.

### (7) Custom Ordinance No 17 of 1869 and its subsequent Amendments

Customs is one of the oldest administration departments in Sri Lanka and its Ordinance and other regulations govern the functions of the Customs. It is quite evident that this paper work also provides a fair support to avert bio piracy. According to the Section 12 of No. 83 of 1988, the prohibited and restricted items are laid down in Schedule B according to the Section 12 of No. 83 of 1988 and it has clearly stipulated that those items should not be imported or brought into exported or taken out of Sri Lanka. According to the Schedule dead or live animal or its parts, live fish (Prohibited species), protected plants listed under the Fauna and Flora Protection Ordinance etc. should not be imported or brought into exported or taken out of Sri Lanka.

As stipulated in Section 130, every person who shall be concerned in exporting or taking out of Sri Lanka or attempting to export or take out of Sri Lanka any prohibited goods or any goods the exportation of which is restricted, shall in those circumstances either treble the value of the goods or be liable to a penalty of one hundred thousand rupees at the election of the Director General.

## (8).Plant Protection Act No 35 of 1999 and Seed Act No 22 of 2003

As stipulated in Section 12 of the Plant Protection Act, the minister in charge has powers to make regulations restricting transfer of plants, plant products or organisms from one locality in Sri Lanka to another. However, it is quite obvious that those regulations are not mandatory and making regulations to protect the plants, products of plants etc. from the green terrors are within the hands of the Minister.

Protection of new plant varieties could be named as one of the best practices in the world even though it is novel concept to Sri Lanka. Under Section 6 (h) of the Seeds Act has introduced a provision to protect the new plant varieties. As stipulated in the section, the National Seed Council should take appropriate measures to protect the new plant varieties.

#### **Concluding Remarks**

The researchers of the Western countries, the people attached to big companies hand some dollars on local people and then, local people sell biological resources to earn quick bucks. It is very clear that, the people engage in stealing the endemic plants, animals never interested on the natural resources, they engage in these types of misconducts just to earn money. Thus, the imposed the penalties on existing legislations are not making any impact on the culprits who are illegally using the biological resources as it is a big network and the penalties are not sufficient to stop them committing the same misconduct. The people who are part of those networks engage in same misconduct repeatedly to earn a quick buck. Though, Sri Lanka has sufficient paper work, its effectiveness is questionable.

Moreover, the writer believes that the traditional penalties are not adequate enough to bring the culprits before the

justice system. It is evident that, punishing one member of the networks would not prevent the others who are parts of the big networks from smuggling the biological resources and therefore, the writer suggests to deviate from the traditional sentencing policies and recommends to introduce new penal sanctions fitting to the modern necessities.

Conferring to the Immanuel Kant's theory of retributivism, punishment must always be inflicted upon the wrongdoer only because he/she has committed a crime and he has described punishment as being justified only when it is an immediate response to a wrong act. Focusing on the existing legal mechanism of Sri Lanka, it is quite obvious that most of the punishments are based on retributivism and the writer thinks that this theory has an effect of deterrence rather than restoring harm happened to the society. However, the writer believes that, this theory itself would not sufficient enough to tackle the issues relating to bio-piracy. The process of stealing the natural wealth may have linked with many networks and there may be a more than one individual connect to this business. Thus, inflicting punishment on one person never stops others from committing the same offence again and again.

Practically, all countries make use of transplanted laws such as laws relating to crimes against environment, crimes against humanity etc. As stated by the scholar AsankaPerera, the transplanted laws should be matched with the legal cultural background of the recipient State. In other words the transplanted laws should be adopted, adapted and adjusted fitting to the legal and cultural background of the

recipient country. "Drafting legislation suitable to a country is a specialised skill and it is of utmost importance to be concerned with how the social, economic or cultural conditions or attitudes addressed such in legislation. Unfortunately, in Sri Lanka, legislators have overlooked these important factors when formulating the draft". In accord with the perception of the scholar AsankaPerera, the writer recommends that, Sri Lankan legislature should have to consider the current changes in the world, agricultural system in the country, the rights of the local communities in the country.

The writer thinks that, understanding of the socio-cultural and ethical background of the legal system is essential when drafting legislations and the penalties should have to impose accordingly. Moreover, the writer considers the failures of the existing mechanism as major drawbacks to tackle the issues of bio-piracy in the country.

#### References

Bastuck, C, (2006), 'Biopiracy and patents-Developing Countries fears exaggerated',https://open.uct.ac.za>handle , accessed on 05 August 2018

JagathGunawardana, 'Bio-piracy: A case where Jaffna microbe becomes U.S. property', Daily Mirror, (sri Lanka, 4th April 2008)

Hoffman, R, 'A New Reading of Kant's Theory of Punishment', http://repository.upenn.edu/cgi/viewcontent.cgi?article=2873&context=edissertations, 2015,accessed on 10<sup>th</sup> May 2017

Perera, A, (2011), 'Plant Variety Protection in Sri Lanka and its impact on Sri Lanka's

agricultural economy: A critical analysis, The Journal of World Intellectual Property, Vol.14, p.326