

21 CENTURY REALITY AND GLOBAL PROBLEMS FROM ECOLOGY

T. BLAZEVSKA^{a*}, J. DAMJANOVSKI^b, E. JASOVIK-SIVEVSKA^c

^a68/4 Prilepska Street, Bitola, FYR of Macedonia

^b5 Mariovska Street, Bitola, FYR of Macedonia

^cSolunska Street, Bitola, FYR of Macedonia

E-mail: msptatjana@yahoo.com

Abstract. The human, as the creator of the environment, must be responsible and take care of it. But now people are selfish and unruly that they destroy everything in order to accomplish their aims, not having in mind the consequences tomorrow. This modern situation influenced by many factors has new featyres: air pollution, the problem of providing people with resources, global warming, the 6 billion ha of wood which are turning into desert, the rising level of the pollution, approximately 2-20 t of oil, 50 t of DDT, and 5000 t of mercury are released in the World Sea. That is very difficult to control, and it makes a disproportion between the rapid growth of the human kind needs for resources of the water and the extent of their use for economical temrs. The human egoism goes that far that sometimes human actions are transformed from local to global level with great consequences on the flora and fauna. All of us should understand that human behaviour these days must be with harmony with nature. To be implemented this rule we need consciousness, knowledge and rational using of the natural resources for efficient protection of the environment.

Keywords: pollution, environment, natural resources, ecology, protection, prevention.

AIMS AND BACKGROUND

Every human individual has right to healthy happy life and spiritual treasure only in healthy and qualitative environment. In this environment the human should act rationally and to comply with laws of the nature. Unfortunately in our country these relations are not in consideration with the environment because still there is no certain level of knowledge, way of living and awareness that is needed.

Using this work really there is no need of persuading someone how dangerous and how critical is nowadays historical moment of the humankind and how difficult is to suggest several persuading and real projects for a way out of this complicated situation. The global price is the one that confirms the existence of objective unity: historical unity, unity with nature, unity of the world commercial relations and mutual political processes, science and culture. When this kind of unity will be achieved it will be necessary to do giant evolutionary leap in the historical development. It will be necessary to do deep changes in all areas: social

* For correspondence.

organisations, economy, science, culture, art and spiritual life in general. This leap as it is expected is responsible of forming basics for unity of the humankind in the future.

BASICS OF THE GLOBAL PROBLEMS

The human is the product but at the same time a creator of the environment that provides him with survival and gives opportunities for intellectual, artistic, social and spiritual progress. After a long and difficult evolution of the humankind in our planet the humans have achieved certain stadium, which results in fast progress in science and technology. Humankind has achieved the capability to transform the environment in many ways. Two aspects related to human: nature and the environment have decisive importance for welfare and achieving the basic human rights including the very own right to life.

At first let us consider the sphere of mutual agreement of nature and society. There we can see a lot of problems connected with production and exchange of the substance between society and nature. Considering this in every country separately and together in the countries' system there are different problems and economical contradictories, depending on the specificity of the countries' laws on socio-economic progress. According to many reasons some problems like: energy supply, raw, food for the population, environment protections of the resources of the world oceans, conquering of the cosmic space, leading with the demographic process have became global and, therefore, especially popular. For solving these problems international cooperation is inevitable.

What is the essence of these problems? Problems of providing natural resources that humans need for everyday activities, taking care for perspective human tasks in one form or another or different measures always have been present in human history. According to the progress measure of the production, possibility of satisfying the human needs was expanded but also that increased the problems¹. The contemporary situation is distinctive by the need for resources and the need for the ones that can not be regenerated (minerals) and those that are regenerated by the nature (some of them also are regenerated by the human) like food. All of these achieved great measures in the history and there is a tendency to increase these resources and very quickly. Only in the first quarter of the century the world production has been increased for sixteen times. At the end of this century the world industrial production may be increased two to three times more according to the needs of the human civilisation in the future. Naturally we ask the question: can the humankind provide all the resources needed for its progress in the future? Is not the humankind in danger of lack of resources within the frontiers of the Earth?

International researches reassuringly prove that in the future absolute shortage of minerals is not predicted. However, there is certain restriction of the resources

and there are many reasons: restriction of the geological researches by the technological and technical reasons, worse natural conditions for producing minerals, transport to many non-inhabited areas, unequal distribution, price growth, etc. Fact is that if there are no acceptable solutions the world may encounter some serious difficulties in supplying certain fuels and resources already to the end of this century. This is especially true for oil and precious metals. To this we can add the justified concern connected with providing the natural supplies to population and the production. The following data represent at what rate would the energy spending increase in the world if the world spending since 1800 year is considered with coefficient (1): 1800 – 1; 1980 – 63; 2000 – 106; 2200 – 10000.

Especially is difficult to solve the problem of food production. It is closely related with demographic progress in the world. In the first three quarters of the 20 century population of the planet is increased 2.6 times and agriculture production not more than 2.8 times. In the period from 1990 to 2006 the world population has increased for 1.6 billion people and 90% of that population increase belongs to the developing countries. It is predicted that in the next two decades world population will be increased for 1.7 billion people and by the year 2010 will rise to 7 billion people. This inevitably causes further rapid increase of the needs for food products. According to the FAO evaluations for 2006, agriculture deficit of food products can rise for 4 billion \$ to 25 billion \$ till the end of this century. That means that 800 billion people will suffer from hunger. That is why is necessary to find ways how to supply enough food products for the future generations and diminish the food shortage in the entire world.

Nowadays the most popular problem is the problem of mutual relation between human society and environment. This problem is not something new: different kinds of ecological crisis have appeared also in the past. This modern situation influenced by many factors has new features.

In the basics the character of the ecological crisis has changed. If previously the ecological crises were a result of the natural catastrophes today their roots are in the people's economy and measures that are rising constantly.

Pollution of the environment has achieved to the extent where the natural systems like rivers, seas, oceans, and the air can not cope with. In the past the pollution was at the local level. Today exposing to the poisonous substances is not only danger for the people's health, flora and fauna in that country where they are produced, but also for the long distanced countries. Pollution of the environment has no limits².

FYR of Macedonia as a part of the global space has high rate of pollution or endangered environment. As a consequence of all this pollution today in the world and in our country there are different kinds of diseases that are generated by this pollution. There are also massive poisonings of the fauna in the rivers especially the fish poisoning. In the past man had influence only on his local environment

and today no matter where in the planet he can cause changes at global planet level ,for example destruction of the ozone layer.

The features of the consequences itself are changed influenced by man's actions at the ecosphere and the process of the natural system that make the life at Earth complicated. If the necessary measures are not taken these consequences can be catastrophic for climate, atmosphere quality and water supplies³.

Experts claim that Earth is tired and 6 billion ha of wood are turning into desert and 20 thousand ha are unsuitable for cultivating. As a result of all this we have drafts as never before which have disturbed the agriculture of many countries. It is evident that the green layer of the Earth is decreasing. Large territories of soil are eroded. In many countries, especially in the south hemisphere, soil is turned into desert taking away fertile land. Therefore, there is a need to stop the consequences which threaten the nature and conditions of human survival.

Another problem connected to the needs of providing the population with the necessary resources and familiarising with environment is the problem of using richness of the World ocean – which at this planet is the biggest store of treasure but it is still not used enough⁴.

The role and importance of the World Ocean is significantly increased in the conditions of unusual growth of human needs for natural resources. The ocean environment is not only place for transport of people and goods at long distance but also a reservoir of biological or nutritious substances.

Annually 2 to 20 million t of oil, 50 000 t of DDT and 5 000 t of mercury are released in the World Sea. The level of pollution is rising. Fauna is becoming poorer and 70% of the places for spawning in the World Sea are unsuitable for life of the spawns. Oil and toxic substances pollution of the World Sea leads to destruction of the phytoplankton, which is not only the basic food for fauna but also basic source of oxygen. Intensity of the sea life in the World Sea is decreased by 30% (according to some experts by 40-50%) in the last 20 years⁵.

The disproportion appeared between the rapid growth of the human kind needs for resources from the water (oceans, seas, and lakes) and the extent of their use in economical terms. There is another not less important aspect of the problems – the need for protection of the water from pollution preserving and increasing the biological resources by the human to conquer the ocean, sea, lake, and river richness, to be in the service of the humankind and not to damage the environment. The water which is the main regulator of the weather and climate and important part of the mechanism of many processes at the planet is really the global task and can be done only by joining the power of all the countries.

Until now we have dealt with global problems in the area of mutual agreement of society and nature as the last problem concerning the environment. But the people itself are part of the nature⁶. The human as a creator of its faith acts in the nature and loses its perspectives. The interaction between the human and

nature influences the laws of the environment. Aggressive actions taken in the race for providing wealth and richness interrupts the quality of the environment. The human egoism goes that far that sometimes human actions are transferred from local level to global level with great consequences on the flora and fauna.

We have already presented the data which testify for the great growth of the population in the world. Lately life brings very important corrections in the demographic dynamics. Rate of the world population growth is significantly decreased. After all we have the big demographic problem. Concerning the next decades, the basics of this problem will lay in the population growth in developing countries. This can worsen even more the complex problem of stopping economic and cultural disadvantages of these countries.

These existing disproportion is enforced under the mutual influence of social, economic, ecological and political factors.

One of the most evident results of the progress of the world is the great growth of industrial production. Industrial production in the developing countries was around 12.5% in the year 2002 and suddenly it has risen several times around 14%. Developing countries are facing with different problems mainly connected with industrial production⁷.

There is enormous ratio of problems concerning the poor progress. Facts are slowing the progress and their nature will make the gap between the developing countries and developed countries even bigger in the future. This will lead to undermining the natural and material conditions for human survival. According to the scientists, there is a real danger for the next generations.

Let us take into consideration another sphere, the sphere of mutual relations of the society. The range of problems deriving from this is rather large. The nature of these problems is rather complex, contradictory and can cause different consequences.

There are also sometimes contradictories among different classes and social groups, between countries and group of countries⁸. It is very well known for example how huge spectrum of problems there is in the area of relations between developed and developing countries, local and regional problems, international conflicts and crisis, etc. The most important problem of all is the global problem how to stop the war.

The World Wars happened in the past. The First World War and especially the second had tragic consequences. In the first World War the main battles were fought at eight territories. The total number of human victims was 9 billion people. In the Second World War the main battles were fought in forty countries. The total number of human victims was 50 billion people.

The Third World War compared to other two is predicted to be nuclear war. Use of the arms for massive destruction is considered to have destructive power

bigger than any other arms. The next war threatens not only to become mass destruction for the people, but to destroy completely flora and fauna.

The proverb not accidentally says: *What can man do to himself no one can.* In that way the problem of peace and war has become the main topic concerning the world politics.

To stop the nuclear catastrophe is a topic that is important not only for certain countries or group of countries which have nuclear weapon, but literary for every country in the world.

We have discussed about problems concerning mutual relation of big social communities, mass of people and human kind in general. But behind all this as we all know there is a human personality. The individual has needs and necessity of inner peace and good relations with people.

Discussing the global problems, difficulties and categories that endanger the human kind in general we should accept the human general interests. To avoid planet destruction and to preserve the planet as a home suitable for life of the humankind is in the best interest of the humankind. Any kind of organisation, governmental or criminal, acts in its best interest. These interests may lead to the disturbance of the general human interests. Therefore they must be organised in a way which is equal with basic values in the culture. That is why the question should be considered not only concerning the general human interests but also the general human values.

These values should not only be preserved but also the existence of every human individual should be kept. The best fundamental general human values are above the interests not only of certain people but also the interests of social groups. Otherwise they could not be a measure used for human actions or intentions. General human values can not be created artificially in the historical process of human progress. They are revealed through this process and are integrated in the culture.

As an individual the human is influential but also strong to some extent. We posses limited talents and views and with numerous responsibilities we are forced to act in limitations of heavy restrictions created by the modern society.

In conclusion, we would like to distinguish that the individual and the society are faced with global problems of different aspects; many different events closely related to socio-economic conditions where people live, create, communicate, fight and where the future generations should live and create.

CONCLUSIONS

We would like to distinguish that: the thesis does not consist of finding ways how to soften the ecological crisis or how to stop the avalanche of technical and cultural consequences created by the modern civilisation. On the contrary, it is still not

to late to think about the consequences of the actions. If we do not recognise the reasons completely then all the measures for saving the situation can destroy it. The essential solution for global ecological problems consists in: organisation of rational use of the natural resources, real and efficient protection of the environment, and providing the right dependence between the nature and human society based on the scientific thought.

To preserve our planet that is the only place for living.

REFERENCES

1. G. S. HOZIN: Protection of the Planet, 1974.
2. G. S. HOZIN: Global Contemporary Problems, 1982.
3. Ecology. A Publication of the Ecological Society of America.
4. I. DIMOVSKI: Dynamic Balance in the Nature (Ecological Observations), 1996.
5. European Commission of Economy. Managing Principals of the Complex Ruling with the Environment. New York, 1994.
6. I. P. FROLOV: Essence and Meaning of the Global Problems, 1981.
7. OECD: The State of the Environment. OESD, Paris, 1991.
8. D. STOILOV: International Union for Using the Nature and Natural Resources. J. Protection of the Nature, (1), (1971).

Received 6 December 2007

Revised 15 January 2008