

KAZAKHSTAN REPUBLIC LEGISLATION LAW AS A WAY TO REDUCE NEGATIVE IMPACT ON ENVIRONMENT

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ABSTRACT

A distinctive feature of the industrial development in the 21st century is globalization of the world economy. Powerful international intermediaries in this process are the United Nations (UN), the World Trade Organization (WTO), the European Union (EU), the World and European Banks (WB and EB). One of structural subdivisions of this interaction is development of the international environmental management qualified to solve environmental problems: pollution of all items of natural environment (atmosphere, water sources, soil, etc.) exceeding the carrying capacity of natural ecosystem; depletion of nonrenewable natural resources (coal, oil, etc.) and some renewable natural resources (fresh water, woods, etc.); reduction and loss of biodiversity.

The top-priority dangerous manifestations of environmental problems are regional production-induced desertification, soil degradation, depletion and contamination of water sources, air pollution, reduction of woods area, accumulation of hazardous and toxic wastes. Ecological problems have already crossed state borders of separate countries, and depletion and contamination of ecological systems of some countries significantly impact environmental state of the world, affecting health and wellbeing of people in different countries. In this situation failure to take timely decisions can lead to significant economic losses, irreversible damage to the habitation environment of millions of people, freezing of the economic growth of some regions and whole countries. For solution of environmental problems development of international environmental policy and reliable organizational and legal measure for environmental protection on both international and national levels are required.

In accordance with the UN expert judgement the most environmentally degraded towns of the world are metallurgical centers of the CIS. Such situation forces the governments of the CIS countries to enforce more and more environmental legislations, which are binding to implement new and modernize existing companies with implementation of clean technologies.

Given article observes the issues of community and nature interaction regulation by Kazakhstan Republic environmental legislation. The analysis had been performed based on ArcelorMittal Temirtau JSC Environmental policy where as actual results have been achieved and observed. In the article ArcelorMittal Temirtau JSC investment projects were reviewed which had been implemented based on principle of reasonable balance as for economic, environmental and social interests of the company. Regional AII (atmosphere impurity index) is given.

Legal regulation of interaction in sphere of community and nature engagement is relevant due to negative human impact on environment, degradation of environment related living conditions of humans, as well as invention of mass annihilation weapons which resulted into creation of global problems by mankind.

The specific things about global problems besides their global scale are penetrating consequence and panhuman nature. They promote further determination of mankind history development. Only actions by world community will determine possibility of wise solution for those problems raised for them. Existing environmental measures do not provide desired effect while edge of environmental tension is getting closer day by day. And we become observers of the fact that mankind more and more demands not only effective ways to cure environmental effects of economic and other operations, but first of all development of effective preventive mechanisms.

The top-priority action plan for prevention the most important environmental and social issues is outlined in the document approved at the summit in Rio de Janeiro: “Agenda 21” [1]. In the foundation of the sustainable development of the world economy there are three key ideas: 1) rectification of the damage caused to environment shall be done simultane-

ously with economy restructuring; 2) this restructuring shall be supervised by environmental authorities; 3) response to the most dangerous ecological situations cannot be postponed till the moment when countries achieve economic growth, they require prompt action. Credits of the World and European Banks for Reconstruction and Development financing large companies of the East European countries provide credits only when there is an environmental program as a constituent part of a company modernization business plan. Funds obtained under these credits cannot be spent only for repair of obsolete equipment, which needs to be decommissioned.

In Kyoto (Japan) on 11 December 1997 the Kyoto protocol was adopted and on 16 February 2005 it entered into force [1]. 37 industrially developed countries and the European Community, acknowledging that the ecological state of the planet is a result of anthropogenic activity, undertook to reduce greenhouse gas (GHG) emissions to the level of 1990 (taken as a reference year). Its 1st period started in 2008 and ended in 2012. It included a commitment to reduce emissions in average by 5 percent versus the level of the reference year 1990. For the 2nd commitment period the parties undertook to reduce GHG emissions by 18–20 percent below the reference year level during eight years since 2013 to 2020.

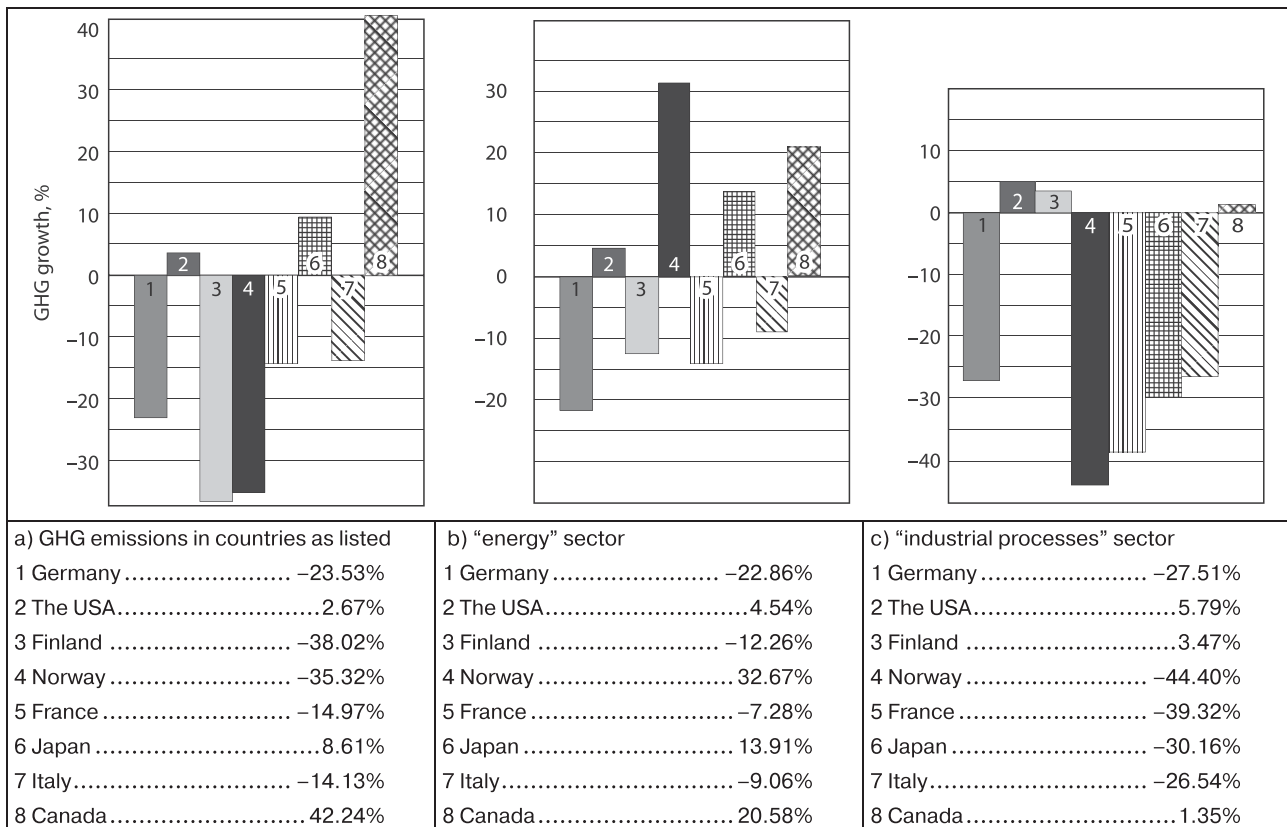


Fig. 1. Gross GHG growth and splitting by generation sources based on the data of the year 2012 for Germany, USA, Finland, Norway, France, Japan, Italy and Canada countries (reference year 1990)

Fig. 1 provides data about gross growth in GHG of eight industrially developed countries and in two separate sectors. Greenhouse gas of the specific source “energy” includes fuel combustion gas, emissions of power, processing and construction industries, transport and other sectors. The “industrial processes” source includes changes in the amount of GHG emissions during this period when using solvents and other volatile compounds-containing products, agricultural anthropogenic emissions, pollution caused by subsurface containment, waste waters, waste incineration and other wastes.

The data shown in fig. 1(a) demonstrate that GHG growth in some countries exceeds the level set up by the decision of the Kyoto protocol. The gross growth of GHG in industrially developed countries the USA, Japan and Canada was 2.67, 8.61 and 42.24%, correspondingly. Thereat the relative growth of GHG emissions in the USA (2.67%) in its absolute value is proportionate to the total reduction of gross emissions of European countries — France and Italy. In regards of absolute values, Japan pollutes environment as much as France and Finland improve environmental situation within their countries. The sector “energy” has determining influence on these figures.

Participants of the 2nd period of the Kyoto protocol included some new countries, including Kazakhstan, but some countries did not sign commitments to reduce emissions.

Environmental policy is on the agenda of all countries of the world, but in such countries as Germany,

Denmark, USA, France, it has a primary importance. State environmental standards of these countries are comparable on the transboundary plane but they differ in some national specific aspects.

Thus, the environmental topic in France can be traced in distinct spatial aspects, as a constitutive part of urbanism, which reflects a set of French environmental standards and programs: Urbanism Code, Transport Code, Environment Code [2]. Their practical implementation is integrated in the state and municipal management domain called the “territory management”.

In the German laws some of principles were enshrined back in the 70s but nowadays these principles are recorded in the first chapter “General Provisions” of the Federal law “Environmental protection” adopted on 29 July 2009 [3]. In Germany spatial aspect of environmental standards is obvious. Unlike in France, spatial ecology is governed by the federative principle of state structure. Federal legislator in Germany establishes framework laws, and specific and detailed elaborations (regional administrative norms) of federal environmental norms are established by territorial authorities.

Similarity of many environmental problems of the European countries EU members, strive to unify measures related to pollution prevention, consistent and unified stands at international negotiations provide for close interrelation of common European principles of environmental policy.

In the legal framework of the USA, ecological law and environmental law are closely linked with the legislation

Table 1. The key methods and mechanisms of environmental protection applied in foreign countries [5]

Countries	Payments for pollution				Payments for collection and processing of pollutants	Environmental taxes in prices of products	Administrative measures (licenses)	Differentiation of income taxes	Subsidies (grants, «soft» taxes)	Market instruments	
	of air	of water	by wastes	by noise						Trading of rights	Intervention at raw materials markets
1	2	3	4	5	6	7	8	9	10	11	12
Canada					+				+		
Finland					+	+	+		+		+
France	+	+		+	+	+	+		+		
Germany		+		+	+	+	+	+	+		
Italy		+			+	+	+				
Japan	+			+	+		+		+		
Sweden					+	+	+	+	+		
Great Britain				+	+		+	+			
USA			+	+	+	+	+		+	+	

Table 2. Environmental taxation systems of foreign countries

Policy measures, country, year of implementation	Tax policy results
1. Tax on toxic wastes, Germany, 1991	15% reduction of toxic wastes generation over 3 years
2. Tax on water pollution, Netherlands, 1970	reduction by 72 – 99% of heavy metals industrial discharge into water, controlled by regions
3. Tax on sulphur oxides emissions, Sweden, 1991	15 – 20% emission reduction during 1989 – 1995
4. Tax on ozone depleters, USA, 1990	reduction and forced phasing out of this production
5. Tax on carbon dioxide emissions, Norway, 1991	emissions reduction by 3 – 4%

governing entrepreneurial activity. It is caused by the intrusion of industrial production in the environment.

In the middle 1970ies the Congress' laws targeted at the mitigation of the negative environmental impact of industrial activity were adopted. In the 1940–50ies special laws targeted at nuclear power safety enforcement were adopted. In 1982 a new, more expanded law concerning nuclear industry waste disposal was adopted. Thus, one more field of environmental law, related to hazardous wastes disposal and environment pollution prevention, had been developed.

In the industrial society of the USA this problem was becoming rather acute and of social importance. The federal congress in 1965 adopted the Solid Wastes Disposal Act, for the first time accepting the problem as a national one.

Starting in 1924 a number of laws concerning oil pollution banning petroleum residues discharge in nearshore waters was adopted. In 1990 the Oil Pollution Act established a procedure of assessment and collection of the compensation for the damage caused by oil spills. Since 1995 also a number of laws related to control over air pollution were adopted. Currently this law is named the “Clean Air Act”.

Already in the 60s it became apparent that solution of ecological challenges requires an integrated approach, and, consequently, consolidation and modernization of the whole environmental law. In 1969 the Congress of the USA adopted the National Environmental Policy Act, and in 1970 the Environmental Quality Improvement Act. These newest acts made the environmental policy of the USA more efficient, particularly because their texts were amended afterwards (concerning hazardous noise control, concerning clean air control, etc.) [4].

Global experience shows that there is enough of methods and techniques of environmental protection [5].

In most of governments environmental problems are solved by using environmental taxes, payments and fees (**table 1**), they are the main sources of financial support of environmental management systems creation. This indicated necessity of studying foreign experience in the post-Soviet territory.

Key measures and results of environmental tax policy in some foreign countries are shown in **table 2**.

Currently abroad environmental impact assessment is governed by key legislative acts. Generally recognized environmental principles and trends of international cooperation are stipulated by the Stockholm Declaration on the Environment (1972), the World Charter of Nature (1982), the Declaration on Environment and Development (Rio de Janeiro, 1992), the Agenda 21 (Rio de Janeiro, 1992), declarations of the Millennium summit (New York, 2000), the World Summit on Sustainable Development (Johannesburg, 2002) [1] and other international acts [6].

These acts have huge international authority and are implemented in international conventions, in national laws of many countries, including the Republic of Kazakhstan (RoK). Kazakhstan is a member and an active participant of the various international committees and processes aimed at development and implementation of international agreements concerning environmental protection and sustainable development at global and regional levels. They include the UN Commission on Sustainable Development; the Interstate Commission on Sustainable Development of Central Asia countries; the regional European network of the World Business Council for Sustainable Development; the Interstate Council for Hydrometeorology; the “Environment for

Europe” and the “Environment and sustainable development for Asia” processes. Cooperation with the UN Development Program, the World Wildlife Fund (WWF) and other international organizations is expanding [7].

Unlike in foreign countries in the CIS the environmental topic appeared within the frameworks of the law. Environmental law includes environment-oriented norms of other branches of law — civil, criminal and administrative [8].

Peculiarity of the industrial complex in Kazakhstan is its raw materials base. Power, oil & gas, mining & metallurgical and chemical industries include 140 industrial companies — 53, 44 and 43 correspondingly industry-wise [9]. Resources use and environment pollution figures in Kazakhstan exceed respective figures of countries of the Central & Eastern Europe many times over. Gross economic damage caused by irrational use and environmental pollution reaches 20–30% of gross national product [8].

Kazakhstan as a participant of a number of international environmental conventions has ratified more than 30 international agreement in the field of environmental protection that can be classified into three groups:

1. Environment protection international agreements governing environmental protection in general. This group includes the Convention on Environmental Impact Assessment in a Transboundary Context (Expo, Finland, 25 February 1991, the RoK joined the convention by the Law of the RoK No. 86-II dated 21 October 2000); the Stockholm Convention on Persistent Organic Pollutants (Stockholm, 22 May 2001; the Convention was ratified by the Law of the RoK No. 259-III dated 7 June 2007); the Energy Charter Treaty (Lisbon, 17 December 1994; the treaty was ratified by the Decree of the President of the RoK No 2537 dated 18 October 1995) (hereinafter referred to as ECT); the Basel Convention on the Control of Transboundary Movements of Hazardous Wastes and Their Disposal (Basel, 22 March 1989; Kazakhstan joined by the Lay of the RoK No. 389-II dated 10 February 2003); various cooperation agreements between the RoK and other countries and other international treaties.

2. Reserves conservation international treaties governing protection of particular natural units (resources), negative changes of which have an international importance.

Among the considered group international treaties for protection of particular types of natural resources can be emphasized.

Protection of atmospheric air, climate and ozone layer — the Convention on Long-range Transboundary Air Pollution (Geneva, 13 November 1979; Kazakhstan joined by the Law of the RoK No. 89-II dated 23 October 2000); the Vienna Convention for the Protection of the Ozone Layer (Vienna, 22 March 1985; Kazakhstan joined by the Law of the RoK No. 177-1 dated 30 October 1997); the Kyoto protocol to the United Nations Framework Convention on Climate Change (Kyoto, 11 December 1997; the Protocol was ratified by the Law of the RoK No. 144-IV dated 26 March 2009, came into force for the RoK on 17 September 2009).

Protection of living resources — the Convention of Biological Diversity (Rio de Janeiro, 5 June 1992; the Convention was approved in the RoK in accordance with the decree of the Cabinet of Ministers of the RoK No. 918 dated 19 August 1994); the Framework Convention for the Protection of the Marine Environment of the Caspian Sea (Teheran, 4 November 2003; the Convention was ratified by the Law of the RoK No. 97-III dated 13 December 2005) (hereinafter referred to as the Caspian Sea Tehran Convention).

Protection of land resources and subsoil — the Mining Charter of the Commonwealth of Independent States, Moscow, 27 March 1997.

Protection of water sources — the Convention on the Protection and Use of Transboundary Watercourses and International Lakes (Helsinki, 17 March 1992; the Convention was ratified by the Law of the RoK No. 94-II dated 23 October 2000); the Caspian Sea Tehran Convention.

3. Human rights conventions, governing rights of various entities in the field of environmental protection. This group includes the Convention on Access to Information, Public Participation in Decision-making and Access to Justice in Environmental Matters (Aarhus, 25 June 1998; the Convention was ratified by the Law of the RoK No. 92-II dated 23 October 2000) (hereinafter referred to as the Aarhus Convention) [7].

Laws of Kazakhstan in the field of the protection of the environment and its separate items are vast and rather detailed. Thus, 30 December 2015 the National allocation plan for the allocation of greenhouse gas emission allowances for 2016–2020 was approved in Kazakhstan, as well as the decree of the government of the RoK “Concerning approval of the Rules for the allocation of greenhouse gas emission allowances” was amended [9].

According to the document the National allocation plan quotes (limits) greenhouse gas emissions by subsoil users for the period 2016–2020. The decree comes into force on 1 January 2016 [9]. Environment-oriented tax policy encourages the development of ecologically balanced productions and activities, it limits development of hazardous technologies, accumulates funds for targeted solution of environmental problems.

Implementation of environmental legislation law as a way to reduce negative impact of the environment can be exemplified by the economic activity of the Karaganda industrial region of the Republic of Kazakhstan. Activity of the only and the largest in the region integrated steel-making company ArcelorMittal Temirtau JSC, just as any large industrial company commissioned in the 70–80s, impacts negatively society and environment.

In accordance with the National allocation plan a quote for ArcelorMittal Temirtau as for the subsoil user of the mining & metallurgical and chemical industry accords with decision of the 2nd period of the Kyoto protocol and engage to reduce greenhouse gas emissions during the period from 2016 to 2020 by 20%.

Acting in accordance with Kazakhstan Republic legislation requirements ArcelorMittal Temirtau JSC con-

siders oneself responsible for implementation of Environmental Policy, assumes responsibility to constantly improve effectiveness of Environmental Management System, aims to achieve basic target of their Policy which is to constantly reduce and prevent negative effect of operation processes on environment [10].

While developing the enterprise economic strategy ArcelorMittal Temirtau JSC follows the principle of substantiate enterprise economic, environmental and social interests as well as interests of town and region.

One of the largest investment projects of the company was the reconstruction of gas exhaust ducts of basic oxygen furnaces in the steelmaking shop. Investments for construction of the new gas cleaning facilities exceeded KZT 47 billion (USD 171 million). During this reconstruction morally obsolete and physically worn-out technological equipment was replaced by the new, more modern equipment commissioned in the end 2015. The new gas cleaning system increased operating efficiency of gas cleaning equipment, improved working conditions in the shop and ecological situation in the town. As a result of given investment project implementation the plant reduces air contaminant gross emission by 4,8 thousand tons per month, annual average CO₂ emission by 15 thousand tones.

ArcelorMittal Temirtau JSC finds and allocates required resources for environmental activity, development and implementation of the actions related to reduction of power resources specific consumption, reduction of emissions, reduction of discharges and increase of scope of waste recovery. As example at Coke and Chemical Plant was implemented and started coke oven gas cooling unit. As a result of using in the project spiral heal exhausters by French firm «Alfa Laval» where waste water cycle is closed on itself negative impact on environment is excluded completely including emissions in atmosphere of pollutants such as carbonic acids, ammonia, hydro cyanide, hydrogen sulfide, naphthalene from outtake cooling tower. At the same plant in 2015 construction of chemical wastes utilization unit construction had been finished — for utilization of sludges (stage 1) and further prevention of 1st and 2nd class of danger wastes storage is planned.

High-efficiency equipment for emissions cleaning and wastes recycling is being installed during reconstruction of almost all operational shops. For cleaning of emissions at cast house, Blast Furnace № 4 (Q 1 2011) and Blast Furnace № 2 (April 2012) were installed electric filters. Implementation of the project ensured utilization of fugitive emissions of cast house. As a result environmental effect achieved was dust emission reduction by 600 and 380 tons per year accordingly. At the moment in Blast Furnace Shop preparation works are performed for capital repair of Blast Furnace № 3. During the capital repair together with non-effective dust cleaning equipment of belt-conveyor trestle and cast house shall be replaced by modern sock filters.

ArcelorMittal Temirtau JSC provides support and constantly improves Environment Management System

(EMS) with respect to requirements of International standard ISO 14001:2004. As a result Register of legal and other normative documents has been developed [3]. The enterprise also performs internal audit of Environmental Management System of the plant and constant improvement of staff and management qualification in sphere of environment protection. Reconsideration and modifications of standards are developed based on Kazakhstan Republic legislation changes in sphere of environment and also as a result of internal and external audits.

Fig. 2 represents data about investment (in thousand KZT) of ArcelorMittal Temirtau JSC into environmental measures under investment projects, including for current and capital repairs of environmental equipment over the period 2009–2013 and for 8 months 2014.

In accordance with environmental legislation of almost all countries in order to ensure compliance with sanitary norms for living at the territory where sources of hazardous emissions are located, for each company state environmental authorities establish emissions thresholds. Emissions regulation is based on the value of maximum allowable concentration of hazardous substance in the surface layer of the atmosphere (MAC) depending on which, value of maximum permissible emission of hazardous substances (MPE) for each particular source is set. In accordance with the ISO 14000 series Environmental Management System, emissions regulation in steelmaking shall be also done based on specific emissions value.

In the CIS countries maximum allowable concentration (MAC) means related to particular time maximum concentration of the substance in atmospheric air, which during periodic or continuous influence on human being and environment causes no adverse impact throughout a person's life. There are two types of MAC: maximum single, where average concentration for the period of 20 min is taken, and daily average where time period for averaging is 24 hours. Values of these standards are governed by the list of maximum allowable concentration MAC or the suggested no adverse response level (SNARL) of hazardous substances in atmospheric air of populated areas developed by the Ministry of Healthcare of the USSR and currently acknowledged by most of the CIS countries. Development

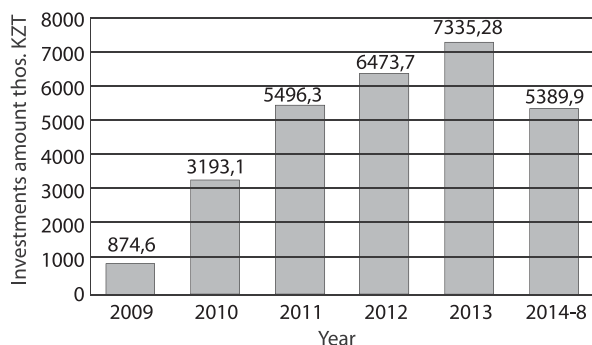


Fig. 2. Expenditures for investment projects including maintenance and capital repair of environment protection equipment as for Temirtau

of these standards was based on data of clinical trials, taking as maximum allowable value such concentrations which fully prevent a risk to human health.

In the EU countries and the USA when establishing MAC only risk reduction and provision of some level of human and environmental protection were assumed. When developing these standards not only clinical studies and medical contra-indication were used as a guidance, but also possibility of compliance with norms at the current moment under existing technological and economic possibilities. The standards established by this way are considered as initial ones, so called “bright line” standards, and as long-term objective secondary standards, fully excluding risk to human health. Except for this difference, in air quality regulation in the countries of the Eastern Europe there is no 20-minute period of concentration averaging but there is a standard of annual average maximum allowable concentration.

MAC values for key pollutants are presented in **Table 3**. In Russia dust MAC is determined based on chemical composition of its particles. The indicated MAC is for so-called “no injurious dust” containing less than 20% of silicon. No injurious dust usually refers to a main part of steelmaking dust because these documents do not include specific MAC values for particular types of dust of steelmaking production. The only exception is SNARL for sinter plant dust equal to 0,15 mg/m³. In the USA and in the EU countries daily average MAC of dust is measured based on its content of particles smaller than 10 µm (PM¹⁰).

The above given data shows that MAC values of hazardous substances in atmospheric are under the CIS standards are as good as requirements of the standards of the EU countries and the USA.

In 2015–2016 with respect to air protection ArcelorMittal Temirtau JSC planned to implement 10 environmental projects with total expenditure in amount of KZT 4112,0 million. As for water reservoirs protection 3 projects have been planned for implementation with total

expenditures in amount of KZT 191,0 million including: relaying of pressure water conduits from pump station of storm discharges till stilling basin (stage 2); modernization of SPS № 3, 22; modernization of fish protection screen at the bank pump station № 3. As for treatment of operational wastes and their recycling 3 environmental projects have been planned with total expenditure in amount of KZT 147,4 million including: mill tailing utilize Coke and Chemical Plant (CCP) wastes recycling with further recultivation of two chemical dumps; replacement of sulphol transformers, consuming PCB wastes (polychlorinated biphenyl) [12].

The existing legal code which determines Environmental Policy for existing plants does not include all the issues and problems existing in given sphere. It actually requires constant development. On October, 12 2015 in Astana workshop was arranged within the topic «Kazakhstan Republic national obligations regarding reduction of greenhouse gases emission in 2021–2030». The workshop had been arranged by RoK Ministry of Energy jointly with Research and Educational Center «Green Academy» supported by European Union representatives in Kazakhstan and OSCE programs office in Astana.

Among workshop participants were Kazakhstan Parliament deputies — participants of Environment and natural resource use committee, Kazakhstan Parliament Mazhilis staff, heads and representatives of Ministry Energy, Committee of forest sector and wild animals, Ministry Agriculture, Ministry Investment and Development, representatives of France, Belgium, Holland and other countries diplomatic missions, accredited in Kazakhstan, The World Bank, UNDP, GIZ, USAID, High School of Economics (RF), Kazakhstan Association of «KAZENERGY» oil, gas and energy organizations association, Kazakhstan Electricity and Energy association, Eurasian industrial organization, KASDP (“KAPUR”) and other associations, experts and NGOs. Workshop has been arranged for presentation of state responsibilities of Kazakhstan Republic regarding reduction of greenhouse gas emissions for new climate agreement and development of suggestions on legal basis improvement in sphere of emissions management.

Thus a new task of industrial plants is Environmental Policy with the main purpose to reduce constantly and prevent negative impact of production process on environment.

Investment projects reduce negative role of the plant in air pollution. Fig. 3 demonstrates integrated atmosphere impurity index (AII) in Temirtau in 2007–2013.

AII changes nature taking into account atmospheric pollutants and representing sum of selected pollution agents' concentration in shares MAC. That demonstrates emerging trend to reduce air pollution in Temirtau [4]. Level of pollution is considered to be very high if AII is over 14, high if it is (7–14) and low if it is less than or equal to 5.

Table 3.
Values of MAC for hazardous substances in atmospheric air in accordance with various national standards

Substance	MAC types	MAC, mg/m ³	
		CIS*	EU
Dust	Maximum single	0,5	–
	Daily average	0,15	0,15
	Annual average	–	0,05
CO	Maximum single	5	–
	Daily average	3	–
	Annual average	–	–
SO ₂	Maximum single	0,5	–
	Daily average	0,05	0,125
	Annual average	–	0,06
NO _x	Maximum single	0,085*	–
	Daily average	0,04	–
	Annual average	–	0,05

* in Russia since 2006 MAC_{MP} (NO_x) = 0,2.

* in the Republic of Kazakhstan MAC_{MP} (NO_x) = 0,2.

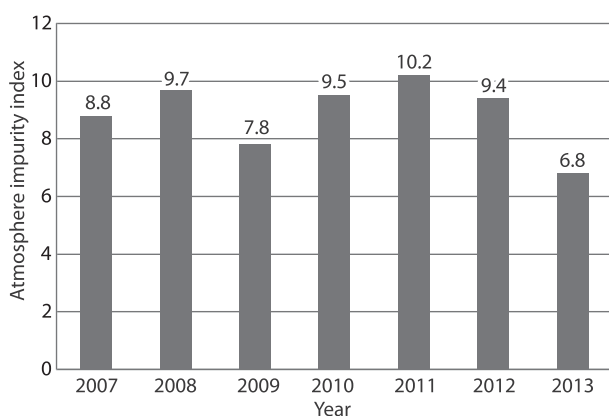


Fig. 3. Temirtau atmosphere impurity index (AII)

Conclusions

In modern world metallurgy industries tend to develop with environmentally friendly technologies. Nowadays despite significant technological progress not every enterprise in metallurgy and mining sector can proceed modernization of existing technologies with respect to both economic and environmental basis. World community needs to promote environmental policy of international environment protection legislation. Given issue should be controlled by all the countries of the World.

International responsibilities should be controlled by all countries without any exclusion and taking into account as follows: priority of environmental human rights; state sovereignty as for nature resources of its territory; impermissibility of environmental wellbeing of one state by means of harm to environment of other state; environmental control.

Thus ArcelorMittal Temirtau JSC observed by us always accepts responsibility for performance of Environmental Management System, constantly works for its main target – to reduce and prevent negative effect on environment. As a result of the investment projects implementation the enterprise shall be able to reduce gross air contaminant emissions. At the same time annual average CO emission shall be reduced.

ArcelorMittal Temirtau JSC supports and continuously modernizes Environment Management System (EMS) in accordance with the requirements of ISO 14001:2004, arranges internal audit of the enterprise environment management system and constantly works on improvement of qualification as for employees and managers of departments working on environmental issues. Totally in 2015 – 2016 it is planned to implement 18 environmental projects with total expenditure over KZT 4 billion 450 million.

Despite existing situation during last months the enterprise management pays special attention to environmental issues. And we hope for not complete but at least partial return to improved environmental situation.

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