

Report on the work of the dissertation Council

Dissertation Council on metallurgy and materials science at the Kazakh national research technical University named after K. Satbayev on specialties (direction of training):

- 6D070700 – «Mining»;
- 6D071100 – «Geodesy».

1. Data on the number of meetings held – 3 meetings.

Surnames, first name, patronymic (if any) of the members of the dissertation Council who attended less than half of the meetings: the overwhelming majority of the members of the council attended more than half of the meetings.

2. List of doctoral students indicating the organization of training:

- Uteshov Yerzhan Tursynovich – KazNRTU named after K. Satbayev;
- Donenbayeva Nazgul Serikovna – KazNRTU named after K. Satbayev;
- Kenzhetaev Zhiger Smadievich – KazNRTU named after K. Satbayev;
- Kenesbayeva Aigul – KazNRTU named after K. Satbayev;
- Kuandykov Tilepbay Alimbaevich – KazNRTU named after K. Satbayev;
- Sarybayev Nurzhigit Omarovich – KazNRTU named after K. Satbayev;
- Omarbekov Yernur Urazgalievich - KazNRTU named after K. Satbayev;
- Mussakhan Anuar Bakhtyzhanuly - K.I. Satpayev KazNRTU;
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3. Brief analysis of dissertations considered by the Council during the reporting year

№	Full name of the doctoral student	Topics of work	Code and title of specialty
1	Uteshov Yerzhan Tursynovich	Scientific and methodological support for technical and technological analysis of the effectiveness of mining management	6D070700 – «Mining»
2	Donenbayeva Nazgul Serikovna	Improvement of geodetic methods of geomonitoring for the stability of the open pit walls	6D071100 – «Geodesy»
3	Kenzhetaev Zhiger Smadievich	Uranium well's production effectiveness increase on the basis of intensification of in-situ leaching processes	6D070700 – «Mining»
4	Kenesbayeva Aigul	Modeling of geodynamic processes in the oil and gas field North Buzachi	6D071100 – «Geodesy»

5	Kuandykov Tilepbay Alimbaevich	Development of technology to increase the productivity of technological wells by airlift drilling and hydraulic pulse action	6D070700 – «Mining»
6	Sarybayev Nurzhigit Omarovich	Creation and testing of resource-saving technologies for finalizing mining of deep iron ore open pit mines of Kazakhstan	6D070700 – «Mining»
7	Omarbekov Yernur Urazgalievich	“Development of uranium in-situ leaching in conditions of high-pressure pattern of groundwater”	6D070700 – "Mining"
8	Mussakhan Anuar Bakhtyzhanuly	«Computer-aided design of rational parameters of blasting operations in the course of driving of underground horizontal mining» ”	8D07203 – "Mining Engineering"

4.1 The analysis of the subject of work of – Uteshov Y. «Scientific and methodological support for technical and technological analysis of the effectiveness of mining management», submitted for the Ph.D in specialty 6D070700 – «Mining».

Dissertation work of a doctoral candidate of KazNTU named after K.I. Satpaeva Uteshova E.T. is devoted to the development of scientific and methodological support for a comprehensive technical and technological analysis of the effectiveness of the functioning of geotechnological complexes and management of mining in open pits. The main idea of the work is that at all stages of the life of geotechnological complexes - design, planning, operation and reconstruction, a single methodological base should be used to ensure adequate consideration of mining and geological, mining engineering, mining geometric, organizational and economic conditions for their functioning on based on the process approach and using an effective and promising method of simulation of the main technological processes.

On the basis of the work performed, the tasks related to the analysis of modern methods and approaches for evaluating the efficiency of mining production used in opencast mines and establishing directions for their improvement on a new information basis were successfully solved; conducting a set of studies to identify the potential and ways to improve the efficiency of the operation of geotechnological complexes in open-pit mining of solid mineral deposits; the formation of an information technology platform for managing geotechnological complexes in open pits that provides prompt, reliable and objective information for a comprehensive assessment of economic efficiency with adequate consideration of the external and internal conditions of their operation; development of scientific and methodological support for technical and technological analysis of the effectiveness of mining management.

The connection of the topic of the dissertation with the directions of development of science, which are formed by the Higher Scientific and Technical Commission under the Government of the Republic of Kazakhstan in accordance with paragraph 3 of Article 18 of the Law "On Science" and (or) state programs. The dissertation was completed in accordance with the projects on the topic: “Development of the methodology for designing mining operations, taking into account the operational digitalization of processes”, implemented in the period 2018-2020. at the State Enterprise “Institute of Mining named after A. YES. Kunaev” RSE “NTs KPMS” MIIR RK on projects of program-targeted financing of the Ministry of Education and Science of the Republic of Kazakhstan BR05236712; 2018/BR05235618 in 2018-2020

Analysis of the level of implementation of the thesis results in practice.

During the period of the work, 10 scientific articles and reports were published, including: 4 articles - in peer-reviewed publications recommended by CQASES RK; 6 articles - in international scientific journals with Q2 and Q3 quartiles, included in the Scopus database; 2 copyrights for the developed software.

4.2 The analysis of the subject of work of – Donenbayeva N.S. « Improvement of geodetic methods of geomonitoring for the stability of the open pit walls», submitted for the Ph.D in specialty 6D071100 – « Geodesy ».

The dissertation is identification of factors affecting the stability of the pit walls and on the basis of which geodetic geomonitoring methods should be improved to ensure industrial safety and increase the efficiency of mining operations by ensuring the stability of fractured rock.

Based on the analysis of scientific and technical literature in the field of geodetic methods and modern instruments for geomechanical monitoring, ways to reduce the negative effects of geomechanical processes formed in the subsoil during mining, a flowchart for geomonitoring in an technogenic system was developed.

A logarithmic correlation between the physical and mechanical properties of rocks and their depth was obtained, which makes it possible to predict the geomechanical state of pit walls massifs and take preventive measures to ensure industrial safety during intensive development of the deposit.

The design of the ground-based reference point has been improved due to the forced centering of instruments, which ensures a high accuracy of centering, guidance and efficiency in determining the parameters of deformation processes for taking security measures (this novelty is confirmed by the patent of the Republic of Kazakhstan No. 35798 dated 19.08.2022).

The developed method of strengthening a open pit slope by drilling of inclined boreholes, installing reinforcement in them and filling them with a new fixing solution, allows to improve geomechanical conditions in the near-slope zone and ensures safe development of the deposit.

New cementing solutions have been developed based on the use of mining and processing waste and polymer powders.

The connection of the topic of the dissertation with the directions of development of science, which are formed by the Higher Scientific and Technical Commission under the Government of the Republic of Kazakhstan in accordance with paragraph 3 of Article 18 of the Law "On Science" and (or) state programs. The results of research, such as the study of the strength properties of rocks and their changes with the depth of their occurrence, as well as the improved design of the ground-based point of forced centering of high-precision instruments are introduced into the educational process in the discipline "Geomechanics" at the Department of Surveying and Geodesy of KazSRTU named after. K.I. Satpayev and confirmed by the act.

Analysis of the level of implementation of the thesis results in practice.

During the period of the work, 16 scientific papers were published on the topic of the dissertation, of which: 2 articles in journals included in the Scopus and Web of Science database, 4 articles in journals recommended by the Committee for Control in Education and Science of the MES RK, 4 articles in international materials scientific and practical conferences, forums and congresses, 1 patent for an invention and 5 articles in other scientific journals.

4.3 The analysis of the subject of work of – Kenzhetaev Z. Uranium well's production effectiveness increase on the basis of intensification of in-situ leaching processes », submitted for the Ph.D in specialty 6D070700 – «Mining».

The dissertation work devoted to is devoted to the development of technology for processing the productive horizon of geotechnological wells with low filtration characteristics of ores with a selected complex of chemical reagents for multifunctional purposes.

Since the filtration characteristics of the ores of the productive horizon are predetermined by the mineralogical and granulometric parameters of the host rocks, its increase is an important scientific and scientific and technical problem.

The number of production wells and process blocks at uranium underground leaching

plants increases annually. This is caused by a gradual decrease in the productivity of the uncovered blocks and a decrease in the well utilisation rate from 0.9 to 0.7-0.6. As well as the predominance of fine-grained aggregates of kaolinite, potassium feldspar and gypsum in ores form multi-component, complex soluble sediments including particles of silica, gypsum and clay minerals. They contribute to a more intensive decline in the productivity of geotechnical wells, which has raised the problem of intensification. At the same time, there are no effective tools to improve well productivity and prevent sedimentation over the long term under difficult mining-geological conditions. Development of production blocks under these conditions is often accompanied by serious complications and irreversible reduction in the permeability of the near-wellbore formation zone (NFZ), which dramatically increases development time and additional costs. The proportion of idle wells in the fields is increasing, requiring complex workovers that are comparable in cost with the construction of new wells.

In dissertation work regularity of changes in physical and chemical characteristics of sediment-forming components from mineralogical composition of ores of productive horizon and concentration of sulphuric acid during borehole development was established. Effective parameters and concentrations of chemical reagents for increasing uranium recovery during leaching in low-permeability ores were determined. The regularity of chemical reagents consumption change on particle size distribution and mineralogical characteristics of ore productive horizon at intensification of borehole uranium mining was established.

The connection of the topic of the dissertation with the directions of development of science, which are formed by the Higher Scientific and Technical Commission under the Government of the Republic of Kazakhstan in accordance with paragraph 3 of Article 18 of the Law "On Science" and (or) state programs. The thesis was developed in accordance with the following projects: AP05131477 "Development of new technology for underground uranium leaching using a complex of synergistic chemical reagents for borehole uranium ore mining" (2018-2020); AP08856422 "Development of innovative technology for intensification of borehole uranium mining using a hydrodynamic decolmatation device combined with a complex of multipurpose chemical reagents" (2020-2022), within grant funding for scientific and (or) science and technology.

Analysis of the level of implementation of the thesis results in practice.

During the period of the work, 17 scientific articles and reports were published, including: 4 articles - in peer-reviewed publications recommended by CQASES RK; 4 articles - in international scientific journals with Q2 and Q3 quartiles, included in the Scopus database; 4 reports - at international conferences, 5 patents of the Republic of Kazakhstan for invention and utility models.

4.4 The analysis of the subject of work of – Kenesbayeva A. «Modeling of geodynamic processes in the oil and gas field North Buzachi», submitted for the Ph.D in specialty 6D071100 – «Geodesy».

The dissertation work of the doctoral student of KazNRTU named after K.I. Satpayev Kenesbayeva A. is devoted to the development of an algorithm for modeling the subsidence of the earth's surface as a result of the development of an oil and gas field, in order to perform a predictive assessment of probable geodynamic risks and contribute to the safe development of a hydrocarbon field.

The main idea of the study is to use the Knote influence function to determine the day surface subsidence trend and build a predictive geodynamic model, taking into account the depth of the oil reservoir, changes in reservoir pressure, as well as the physical and mechanical properties of the reservoir and the density of the overlying mass.

To achieve this goal, a comparative analysis of two methods of geodynamic modeling was carried out and an improved algorithm for constructing a model of subsidence of the earth's surface was proposed. A geological model of the Northern Buzachi field was also built in the Datamine program, and a geodynamic model in the Matlab software product. The accuracy of the geodynamic model was assessed and a forecast for the next 8-9 years of the geodynamic situation

of this field was given.

The connection of the topic of the dissertation with the directions of development of science, which are formed by the Higher Scientific and Technical Commission under the Government of the Republic of Kazakhstan in accordance with paragraph 3 of Article 18 of the Law "On Science" and (or) state programs. The dissertation of Kenesbayeva A. contains new scientifically substantiated and practically realizable results. They were successfully tested in production (Geoservice-S LLP), included in lecture materials and practical exercises for undergraduates (International Educational Corporation), which is confirmed by the relevant Implementation Acts.

Analysis of the level of implementation of the thesis results in practice.

Ten works have been published on the topic of the dissertation. 17 scientific papers were published on the topic of the dissertation, of which: 2 articles in journals included in the Scopus database (percentile - 40) and Web of Science (pre-base), 5 articles in journals of the Ministry of Education and Science of the Republic of Kazakhstan recommended by the Committee for Control in the field of education and science of the Ministry of Education and Science of the Republic of Kazakhstan, 6 articles in the materials of international scientific and practical conferences, forums and congresses, 1 co-authored monograph. The author of the dissertation formulated goals and objectives, research methods, description of the research, discussion of their results, as well as formulated conclusions and carried out a search for literary sources when preparing articles.

4.5 The analysis of the subject of work of – Kuandykov T. « Development of technology to increase the productivity of technological wells by airlift drilling and hydraulic pulse action », submitted for the Ph.D in specialty 6D070700 – «Mining».

The dissertation work of the doctoral student of KazNRTU named after K.I. Satpayev Kuandykov T.A. is devoted to the regularities of the fall of the flow rate of geotechnological wells and the development of a method for drilling technological wells, which is aimed at preserving the natural conditions of porosity and permeability of the formation, increasing the rate of penetration of the ore-bearing horizon, increasing the productivity of production wells and reducing the number of repair and restoration work during drilling.

The main idea of the study is to use the established regularities of the airlift effect during the sinking of the ore zone, from the depression parameters to the bottom-hole zone, to improve the filtration characteristics of ores and prevent colmatation of the walls of the well.

To achieve this goal, the doctoral student developed a technology for preserving the filtration properties of the ore-bearing horizon for low-permeable ores through the use of an airlift method of drilling technological wells. Rational parameters of the application of airlift drilling modes are substantiated depending on the increase in the pressure of the supplied air, the flow rate of the washing solution and the granulometric characteristics of the ores of the productive horizon. The dependences of the parameters of the use of a hydraulic-pulse downhole machine on the density of sedimentary materials are substantiated. These works are performed at the level of inventions..

The connection of the topic of the dissertation with the directions of development of science, which are formed by the Higher Scientific and Technical Commission under the Government of the Republic of Kazakhstan in accordance with paragraph 3 of Article 18 of the Law "On Science" and (or) state programs. Kuandykova T.A.'s dissertation contains new scientifically grounded and practically realizable results. They were successfully tested within the framework of the Commercialization Project №0379 of the Civil CP dated 03.11.2017.

Analysis of the level of implementation of the thesis results in practice.

Ten works have been published on the topic of the dissertation. Two in journals included in the 43rd percentile according to the Scopus database, three are recommended by the Committee for Quality Assurance in the Field of Science and Higher Education of the Ministry of Science and Higher Education of the Republic of Kazakhstan (CQAFSHE MSHE RK) and three in conferences. A worthy contribution was made to each published article by the doctoral student, they reflect the provision submitted for defense, the results obtained by the doctoral student in the course of the

research. The author of the dissertation formulated goals and objectives, research methods, description of the research, discussion of their results, as well as formulated conclusions and carried out a search for literary sources when preparing articles.

Two patents of the Republic of Kazakhstan on the technology of intensification of well uranium mining on the following topics were obtained:

– «Device for vibration processing of the filter of technological wells during uranium mining» Patent for Useful Model №3864, №15, 12.04.2019;

– «Drilling rig for direct airlift washing» Invention № 34990, №14, 09.04.2021;

4.6 The analysis of the subject of work of – Sarybayev N.O. «Creation and testing of resource-saving technologies for finalizing mining of deep iron ore open pit mines of Kazakhstan», submitted for the PhD in specialty 6D070700 – «Mining».

Dissertation work of a doctoral candidate of KazNRTU named after K.I. Satpayev Sarybayev N.O. is devoted to the creation and testing of resource-saving technologies for finalizing mining of deep iron ore open pit mines. The main idea of the work is to establish the possibility of reducing the flattening of the open pit sides in the deep part in the zone of completion of mining operations due to a natural reduction in ore production and an increase in the completeness of extraction of ore reserves, taking into account the maximum involvement of near-contour ore reserves.

On the basis of the work performed, the tasks related to developing a methodology for selecting appropriate means of transport for the deep zone of open pit mine, depending on the parameters of completion of mining operations; developing a method to substantiate the spatial position of the phased contours of steep-slope layers on round-shaped open pit fields based on the differentiation of the concepts of the contour and deep zones of deep open pit mines and the introduction of two new parameters of the relationship between the contours of the ore deposit and the dynamics of the formation of the open pit mine; compiling an economic and mathematical model, including the target function of the total costs of drilling and blasting, loading and transport operations and mechanical crushing, as well as a system of restrictions that exclude incorrect solutions were solved.

The connection of the topic of the dissertation with the directions of development of science, which are formed by the Higher Scientific and Technical Commission under the Government of the Republic of Kazakhstan in accordance with paragraph 3 of Article 18 of the Law "On Science" and (or) state programs. The dissertation was completed in accordance with the projects on the topic: “Modernization of technologies and productions in Mining and Processing of Mining products of the Republic of Kazakhstan” BR05235618, implemented in the period 2018-2020.

Analysis of the level of implementation of the thesis results in practice.

During the period of the work, 12 scientific articles and reports were published, including: 5 articles - in international scientific and practical conferences; 4 articles - in international scientific journals with Q2 and Q3 quartiles, included in the Scopus database; 3 articles - in domestic scientific journals.

4.7 The analysis of the subject of work of Omarbekov Yernur " Development of uranium in-situ leaching in conditions of high-pressure pattern of groundwater", submitted for the degree of Doctor of PhD on the speciality 6D070700 - "Mining".

Dissertation work of doctoral student of KazNRTU named after K.I. Satpaev Omarbekov Yernur is devoted to the development of technology of in-situ borehole leaching of uranium in conditions of high-pressure groundwater. The main idea of the work is in the recent time, due to intensive mining of deposits with favourable mining and geological conditions, areas with difficult conditions are involved in exploitation. One of such factors is the high-pressure nature of groundwater. This work is important for ensuring energy security and sustainability of the economy of Kazakhstan and other countries.

On the background of the performed work the following tasks were successfully solved: analysis of modern methods of deposit development by the method of in-situ well leaching used

at uranium mines in the world; carrying out of a complex of researches at the mine "Karatau"; establishing the dependence of the change in uranium content in the productive solution and the recovery ratio on the L:S ratio when using additional pumping wells; carrying out experimental and industrial work on the experimental block, providing prompt, reliable and objective information for a comprehensive assessment of economic efficiency with adequate consideration of external and internal conditions of their operation; development of technology to reduce the cost of uranium production and labour costs.

The connection of the topic of the dissertation with the directions of development of science, which are formed by the Higher Scientific and Technical Commission under the Government of the Republic of Kazakhstan in accordance with paragraph 3 of Article 18 of the Law "On Science" and (or) state programs. The thesis was carried out within the framework of the economic contract No. 281/Akb-16 dated 23 December 2017 "Development of technologies to reduce the frequency of colmatization during uranium ISR", according to the Government of the Republic of Kazakhstan "On the Concept for the Development of the Uranium Industry and Nuclear Energy of the Republic of Kazakhstan 2002 -2030".

Analysis of the level of implementation of the thesis results in practice.

During the period of work performance 7 scientific articles and reports were published, including: 3 articles - in peer-reviewed publications recommended by the CCES RK; 1 article - in international scientific journals with quartile Q2 and Q3, included in the Scopus database.

4.8 Analysis of the topic of the work Musakhan A.B. "Computer-aided design of rational parameters of blasting operations in the course of driving of underground horizontal mining", submitted for the degree of Doctor of PhD in the specialty 8D07203 - "Mining engineering".

The dissertation work of the doctoral student of KazNTU named after K.I. Satpayev Mussakhan A.B. is devoted to the automated design of rational parameters of blasting operations during the sinking of underground horizontal workings. The main idea of the work is to increase the efficiency of drilling and blasting operations based on innovative methods of computer-aided design of rational parameters of the location of charges and the granulometric composition of blasted rocks in the faces of horizontal preparatory and treatment workings. The purpose of the study is to develop a scientifically based methodology for determining the rational parameters of blasting operations during the penetration of underground horizontal workings using the key results of the explosion of a cylindrical explosive charge in an array of rocks and the creation of their automated design

On the basis of the work performed, the tasks related to the substantiation of an analytical method for determining the granulometric composition of natural separations in an array of rocks by the average size of the individual were successfully solved; the development of an analytical method for determining the rational location of explosive charges in the faces of underground horizontal preparatory and treatment workings; the creation of an analytical method for determining the granulometric composition of the exploded rock mass in the faces of preparatory and treatment underground horizontal workings; testing by the automated design system of the parameters of drilling and blasting operations and the granulometric composition of the blasted rocks in real faces of preparatory and treatment workings.

Relation of the dissertation subject to the directions of science development, which are formed by the Higher Scientific and Technical Commission under the Government of the Republic of Kazakhstan in accordance with paragraph 3 of Article 18 of the Law "On Science" and (or) state programmes. The dissertation was carried out within the framework of the target financing program BR05235618 "Modernization of technologies and productions in the mining and mining processing industries of the Republic of Kazakhstan" (project "Creation of a computer-aided design system for rational parameters of drilling and blasting operations and forecasting their results in the quarries of Kazakhstan (CAD BVR)") 2018-2020, household contract topic A.017.21 "Development and implementation of an innovative method, computer-aided design of parameters and results of BVR at the Yuzhno-Zhezkazgan mine, The Vostochno-Zhezkazgan mine and the Zapadny mine of Kazakhmys Corporation LLP at the Zhezkazgan

deposit 2020-2021.

Analysis of the level of implementation of the dissertation results in practical activity.

During the period of work performance 9 scientific articles and reports were published, including: 4 articles - in peer-reviewed publications recommended by the CCES RK; 2 article - in international scientific journals with quartile Q2, included in the Scopus database.

5. Analysis of the work of official reviewers (with examples of the most low-quality reviews)

№	Full name of the doctoral student	Reviewers	
		Full name of the first reviewer (position, academic degree, title, number of publications in the specialty for the last 3 years)	Full name of the second reviewer (position, academic degree, title, number of publications in the specialty for the last 3 years)
1	Uteshov Yerzhan Tursynovich	Yusupova Saltanat Abenovna. Candidate of Technical Sciences, assistant professor, NAO Almaty University of Energy and Communications Has more than 10 publications.	Yelzhanov Erbol Abdrakhmanovich. Candidate of Technical Sciences, Associate Professor, Deputy Dean of the Faculty of General Construction of the IOC Has more than 10 publications.
2	Donenbayeva Nazgul Serikovna	Kayranbayeva Ainur Berikkalievna – doctor PhD, scientific secretary of the Joint Stock Company "National Center for Space Research and Technology" Subsidiary Limited Liability Partnership "Institute of the Ionosphere". Almaty, Kazakhstan. Has more than 10 publications.	Sarybaiev Edil Sautovich – Ph.D, Acting Associate Professor of the Kazakh National University named after Al-Farabi. Almaty, Kazakhstan. Has more than 10 publications.
3	Kenzhetaev Zhiger Smadievich	Yelzhanov Erbol Abdrahmanovich Candidate of Technical Sciences, Associate Professor, Deputy Dean of the Faculty of General Construction of the IOC (International Educational Corporation), Almaty, Kazakhstan. Has more than 10 publications.	Bagasharova Zhenisgul Telmanovna Candidate of Technical Sciences, Senior Researcher of the Department for Training Scientific Personnel of the Republican State Enterprise "National Center for Complex Processing of Mineral Raw Materials of the Republic of Kazakhstan", Almaty, Kazakhstan. Has more than 10 publications.

4	Kenesbayeva Aigul	Kairanbayeva Ainur Berikkalieвна - PhD, Scientific Secretary of the Joint Stock Company "National Center for Space Research and Technology", subsidiary Limited Liability Partnership "Institute of the Ionosphere". Almaty, Kazakhstan. Has more than 10 publications.	Sarybaev Edil Sauytovich – doctor PhD, acting Associate Professor of the Department "Cartography and Geoinformatics" of the Kazakh National University named after al-Farabi. Almaty, Kazakhstan. Has more than 10 publications.
5	Kuandykov Tilepbay Alimbaevich	Bagasharova Zhenisgul Telmanovna - Candidate of Technical Sciences, Senior Researcher of the Department for Training Scientific Personnel of the Republican State Enterprise "National Center for Complex Processing of Mineral Raw Materials of the Republic of Kazakhstan", Almaty, Kazakhstan; Has more than 10 publications.	Yusupova Saltanat Abenovna - Candidate of Technical Sciences, Associate Professor of the Department of Electronics and Robotics of NAO Almaty University of Energy and Communications, Almaty, Kazakhstan. Has more than 10 publications.
6	Omarbekov Yernur Urazgalievich	Muzgina Vera Sergeevna , Doctor of Technical Sciences, Academician of IIA, Senior Researcher of the company «Zypra Asia» Has more than 10 publications.	Bagasharova Zhenisgul Telmanovna , Candidate of Technical Sciences, Leading Researcher of Scientific and Technical Competences Development of RSE "National Center on complex processing of mineral raw materials of the Republic of Kazakhstan" Has more than 10 publications.
7	Sarybayev Nurzhit Omarovich	Yussupova Saltanat Abenovna . Candidate of Technical Sciences, assistant professor, NAO Almaty University of Energy and Communications. Has more than 10 publications.	Uteshov Yerzhan Tursynovich . PhD, Deputy Director of the MI named after D.A. Kunayev. Has more than 10 publications.
8	Mussakhan Anuar Bakhtyzhanuly	Sapakov Yermek Akbarovich , Doctor of Technical Sciences, Professor.	Yelzhanov Erbol Abdrahmanovich Candidate of Technical Sciences, Associate Professor, Deputy Dean of the Faculty of General Construction of the IOC (International Educational Corporation), Almaty, Kazakhstan. Has more than 10 publications.

All reviewers have research experience, published works in the areas of dissertations and meet the requirements.

6 **Proposals for further improvement of the system of training scientific personnel.** Increase the requirements for the work of scientific consultants (especially from Kazakhstan) doctoral students in terms of the proposed topics of dissertation research and their leadership in the training of scientific personnel.

7 Data on the considered dissertations for the degree of doctor of philosophy PhD, doctor of profile

Dissertation Council	Code and title of specialty	Code and title of specialty
	6D070700 - Mining	6D071100 - Geodesy
Dissertations accepted for defense	-	-
Including doctoral students from other universities	-	-
Dissertations withdrawn from consideration	-	-
Including doctoral students from other universities	-	-
Dissertations that received negative reviews from reviewers	-	-
Including doctoral students from other universities	-	-
Dissertations with a negative decision on the results of the defense	-	-
Including doctoral students from other universities	-	-
Dissertations aimed at completion	-	-
Including doctoral students from other universities	-	-
Dissertations aimed at repeated defense	-	-
Including doctoral students from other universities	-	-

**Deputy Chairman
of the Dissertation Council
on Mining and Geodesy,
Doctor of Technical Sciences**

H.Yussupov

**Scientific Secretary
of the dissertation Council
on Mining and Geodesy,
candidate of Technical Sciences**

G.Kyrgizbayeva