

To the Accreditation Council of the
Eurasian Centre for Accreditation and
Quality Assurance in Education and Healthcare
July 20, 2023

**REPORT
OF THE EXTERNAL EXPERT COMMISSION ON THE RESULTS OF THE
EVALUATION OF THE TRAINING AND SIMULATION CENTER OF THE
MSE ON THE REM "CITY AMBULANCE STATION" OF THE AKIMAT OF
ASTANA FOR COMPLIANCE WITH THE STANDARDS OF INSTITUTIONAL
ACCREDITATION OF ORGANIZATIONS COMPLEMENTARY AND NON-
FORMAL EDUCATION (CONTINUOUS PROFESSIONAL DEVELOPMENT)**

external expert evaluation period: July 10-11, 2023

Almaty, 2023

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LIST OF SYMBOLS AND ABBREVIATIONS

CAC – MSE on the REM "City ambulance station ";

TSC of the CAC - Training and Simulation Centre of the State Enterprise on the REM “City ambulance station”;

TSC - Training and Simulation Centre;

BD – basic disciplines;

CBD – compulsory basic disciplines;

SD - Safe driving;

EEC - External Expert Commission;

CD - civil defence;

JD - job description;

AE - additional education;

DET - distance educational technologies;

Healthy lifestyle - healthy lifestyle;

CPHP - Committee for Public Health Protection;

CCSES MSHE RK-Committee for Control in the Sphere of Education and Science of the Republic of Kazakhstan;

CIS - Instrumentation assets;

MoH RK - Ministry of Health of the Republic of Kazakhstan;

MES RK – Ministry of Education and Science of the Republic of Kazakhstan;

MSHE RK - Ministry of Science and Higher Education of the Republic of Kazakhstan;

MO - medical organization;

MTE – material and technical equipment;

NCCEM – National Coordination Centre for Emergency Medicine

NLA – normative legal acts;

CPD – continuous professional development;

DEQA - department for ensuring external quality assessment;

EP – educational program (educational process based on context);

DEP – department of educational programs;

RTC – retraining cycle;

Teaching staff – teaching staff;

MD – major disciplines;

CMD – compulsory major disciplines;

MED – major elective disciplines;

PHC - Primary health care

AT – advanced training;

CPR – cardiopulmonary resuscitation;

WC – working curriculum;

RBP – republican budget program;

QMS – quality management system;

AMA - Ambulance Medical Aid;

SP – safety precautions;

TUP – typical curriculum;

EMC - educational and methodological council;

HD – health department;

Emergency – emergency situation;

BL S- “Basic resuscitation” – Basic Life Support;

ACLS - “Advanced Cardiopulmonary Resuscitation” - Advanced Cardiac Life Support;

NRP-“Neonatal resuscitation” - Neonatal Resuscitation Program;

PALS - “Advanced Cardiopulmonary Resuscitation in Pediatrics” – Pediatric Advanced Life Support;

PHTLS - “Providing medical care at the prehospital stage for injuries” - Prehospital Trauma Life Support.

1. Composition of the External Expert Commission

In accordance with ECAQA Order No. 17 dated June 16, 2023, an External Expert Commission (hereinafter referred to as the EEC) has been formed to conduct, during the period from July 10-11, 2023, an external institutional assessment of the Training and Simulation Centre of the MSE on the REM "City Ambulance Station" of the Akimat of Astana in the following composition:

№	Status as part of the EEC	Full name	Academic degree/title, position, place of work/place of study, course, specialty
1	Chairman	Kauysheva Almagul Amangeldinovna	Candidate of Medical Sciences, doctor, health care organizer of the highest category, Deputy Chairman of the Board of the RPO "Kazakhstan Alliance of Medical Organizations"
2	Foreign expert	Oleg Mikhailovich Uryasev	Doctor of Medical Sciences, Professor, Head of the Department of Faculty Therapy with courses in Endocrinology, General Physiotherapy, Clinical Pharmacology, Occupational Diseases and Military Field Therapy, Vice-Rector for Academic Affairs of the Ryazan State Medical University named after Academician I.P. Pavlova" of the Ministry of Health of Russia
3	Academic expert	Imasheva Bagdat Sakenovna	Doctor of Biological Sciences, Professor, Advisor to the Chairman of the Board of the National Centre for Public Health of the Ministry of Health of the Republic of Kazakhstan.
4	Expert – representative of listeners	Kolbaev Meyerbek Tolegenovich	Master of Medical Sciences, general practitioner, chief specialist of the simulation centre of the NJSC Kazakh National Medical University named after. S.D. Asfendiyarov"

Observer from ECAQA is Akatkyzy Aruzhan, Master of Economic Sciences, Methodologist of the Department of Accreditation and Monitoring of the National Institution "Eurasian Centre for Accreditation and Quality Assurance in Education and Healthcare".

The work of the EEC was carried out in accordance with the Regulations on the EEC.

The EEC report contains an assessment of the Training and Simulation Centre of the MSE on the REM "City ambulance Station" of the Akimat of Astana for compliance with the Standards of institutional accreditation of organizations of additional and non-formal education (continuous professional development) (hereinafter referred to as the Accreditation Standards), EEC recommendations for further improvement and recommendations for the ECAQA Accreditation Council.

2. General part of the final report

2.1 Introduction of the organization

Name of organization, legal form of ownership, BIN	MSE on the REM “City ambulance Station” of the Akimat of Astana. BIN 94124000071
Management body	State institution "Apparatus of the Akim of Astana"
Full name of the first manager	Orazbaev Murat Bekaidarovich
Created in	2019
Location and contact details	Kazakhstan Republics / Republic of Kazakhstan / Republic of Kazakhstan Index/zip - 010000 Astana city/ Astana city/ Astana village k.Ryskulova 8/1 / T.Ryskulova st. 8/1/ st.T.Ryskulova 8/1 Telephone: +7 (7172) 701-181 Fax/ Fax: +7 (7172) 701-181 emai: skoray_astana@med.mail.kz
Year of commencement of the implementation of additional and non-formal education programs , total number of programs and number of students trained	Start year: 2019 The total number of non-formal education programs is 13, the volume of hours is 4/8/16. Total number of students trained: from 2019 to May 2023 - 5641.
Number of listeners this year	The number of students in 2023 (January-May) is 809..
Full-time teachers/part-time teachers involved in the implementation of additional education programs, incl. % sedate	The total number of teachers is 12, full-time - 6, part-time - 6. Sedateness-8.3% Categorization - 42%
Availability of a unit responsible for the educational process in additional and non-formal education	Training and simulation center of the State Public Enterprise at the PVC “City Emergency Medical Care Station” of the Akimat of Astana. Year of creation:2019 Head: Shyntas Kasym Malikuly.
Number of scientific projects over 5 years	There are no scientific projects due to the specifics of the organization (ambulance station). There are innovative practical projects to improve the quality of the provision of the public service “Emergency Medical Call”. 1) “Green traffic light”; 2) “SMART HELP – Accessible yard”; 3) Chatbot of the Telegram social network; 4) Incident – 103
Number of international treaties over 5 years.	Number of international treaties - 2. The company is a recognized division of the American Heart Association (AHA) with ID number TS50884, the National Association of Emergency Medical Technicians (NAEMT) with ID number 8424 and is registered in the international database. As part of the agreement with the AHA, TSC instructors have access to international training programs and methodological

	recommendations.
Website Instagram Facebook with active pages	https://103-astana.kz/ https://web.facebook.com/zhedelzhardem.nursultan https://instagram.com/103_astana_kz https://instagram.com/usc_skoraya
Information about accreditation as a medical organization (date, number, period)	Accreditation certificate No. KZ 50VEG00012378 dated May 14, 2022, accreditation for a period of 3 years with the assignment of the first category. Accreditation body: NGO "Experts and consultants for external comprehensive assessment in the field of healthcare."

Strengths of the educational organization and achievements over 5 years:

The Training and Simulation Center (hereinafter referred to as the organization/TSC) was created in 2019 on the own base of the State Medical Academy. Area is 270 sq.m., equipped with simulation equipment, including more than 15 training mannequins, over 100 types of instruments, personal computers (8), multimedia tablets (5) and so on.

The TSC staff is represented by 8 specialists who have been trained by leading foreign trainers of the American Heart Association (AHA) and the National Association of Emergency Medical Technicians (NAEMT) according to current current international programs. These specialists are full-time, full-fledged international instructors who have the rights to teach and award internationally recognized certificates.

The TSC has gained authority both in the capital and in the regions, and is the basis for training and improving the medical knowledge of State Emergency Medical Service employees and hospital medical workers, paramedical services and non-medical personnel.

TSC trained 878 people in 2021, 2226 in 2022, and 598 people in the 1st-2nd quarter of 2023 according to BLS, PALS, ACLS, NRP, PHTLS standards; training on safe ambulance driving techniques - Safe Ambulance Driving Techniques Trainings - was completed in 2021 - 277 people, in 2022 - 338 and in the 1st-2nd quarter of 2023 - 102.

The TSC develops intersectoral cooperation and has agreements for training healthcare professionals with various medical organizations: Multidisciplinary City Children's Hospital No. 3 of the Akimat of Astana, Multifunctional Medical Complex Green Clinic of Astana, State Enterprise at the REM "City Centre for Phthisiopulmonology" of the Akimat of Astana; PHC organizations - MSE on the REM "City Clinic No. 5" of the Akimat of Astana, MSE on the REM "City Clinic No. 13" of the Akimat of the Astana City, MSE on the REM "City Clinic No. 6" of the Akimat of Astana, MSE on the REM "City Polyclinic No. 2" of the Akimat of the city of Astana, Primary Health Care Center "Dostyk" of Astana, MSE on the REM "City Polyclinic No. 8" of the Akimat of the Astana City, MSE on the REM "City Polyclinic No. 15" of the Akimat of the Astana City, etc.

Employees of the State Emergency Medical Service and the TSC have developed their own original Projects to improve the quality of the provision of the public service "Call an Ambulance", which have no analogues in the country and have high practical significance in improving the quality of medical care:

1) "Green traffic light". **Goal:** Providing a "green corridor" for ambulance transport in dense vehicle traffic. **Relevance:** High risk of downtime of ambulance transport on the way to the place of call in traffic jams

2) «"SMART HELP—Accessible yard." **Goal:** Ensuring unhindered passage of the EMS team into the yard. **Relevance:** Widespread installation of barriers (135 problem yards), limiting the passage of sanitary vehicles into the yards

3) Chatbot of the Telegram social network. **Goal:** Reduce the load on the main line "103", with high traffic during the COVID-19 pandemic, by creating an additional communication channel **Relevance:** High load on line "103" during a pandemic

4) Incident – 103. **Goal:** Increasing the level of population satisfaction with the quality of the public service “Calling an ambulance”. **Relevance:** Lack of direct online feedback from the service recipient.

2.3 Information about previous accreditation

Accreditation period: 08/27/2020 - 08/26/2023 Registration number No. IA00028.

Accreditation body: Eurasian Center for Accreditation and Quality Assurance in Education and Healthcare (ECAQA). <https://enic-kazakhstan.edu.kz/ru/accreditation/organizacii-dopolnitelnogo-obrazovaniya>

2.3 Conclusion based on the results of reviewing the report on the institutional self-assessment of the Training and Simulation Center (TSC) for compliance with the Standards of Institutional Accreditation of additional and non-formal education (continuous professional development) and conclusions

The self-assessment report is presented on 140 pages and contains 25 annexes on relevant standards, copies or electronic versions of documents located at https://drive.google.com/drive/folders/1_ospkmQto9s9eW08PAIOvIcZZ9O9j4s0.

The content of the Report includes answers to all 9 main accreditation standards and criteria, is structured taking into account the recommendations of the Guidelines for self-assessment of medical educational institutions of ECAQA, provided to the Training and Simulation Centre by the accreditation centre - ECAQA, as well as internal unity of information. Attached to the report is a covering letter signed by Director Murat Bekaidarovich Orazbaev, which confirms the accuracy of the quantitative information and information included in the self-assessment report.

The report contains a list of members of the working group for self-assessment and preparation for institutional accreditation of further education, indicating the responsibilities of each member of the internal commission; information about the person responsible for conducting self-assessment for compliance with the ECAQA Institutional Accreditation Standards - Shyntas Kasym Malikuly, acting. head of the TSC.

The institutional self-assessment of the TSC was carried out on the basis of the director's order No. 190.1-Θ dated April 12, 2023 - “On approval of the composition of the internal commission for self-assessment of the institutional accreditation MSE on the REM “City ambulance Station” of the Akimat of Astana.

The report was studied by accreditation experts (see list in section 1), the analytical conclusions noted strengths and areas for improvement, as well as recommendations for additions and changes, which were taken into account during the feedback process with the TSC representative and included in the self-assessment report relevant changes and additions.

All standards contain the actual practice of organizing education for training students in additional and non-formal education programs. The description in the self-assessment report is quite complete and updated in terms of the number of students, teachers, administration, information about selection and admission, learning outcomes, results of assessment of knowledge and skills. Included is information about our own material and technical base with a total area of 270 sq.m., equipped with simulation equipment, including more than 15 training mannequins, over 100 types of instruments, personal computers (8), multimedia tablets (5) and so on. 8 specialists were trained by American Heart Association (AHA) and National Association of Emergency Medical Technicians (NAEMT) trainers. A number of contractual obligations with partners (medical organizations, information presented above), financial information, strategic plans for development and improvement, etc.

The report is presented to the ECAQA in a completed form, with data adjusted according to the above recommendations, written in competent language, the wording for each standard is clear and understandable and described in accordance with the criteria of the standards, tables and diagrams contain references in the text and are continuously numbered.

The quality of the institutional self-assessment report served as the basis for moving to the next stage of the accreditation procedure - external assessment. The experts plan to validate the report data, compare the information from the report with the information that will be received during the visit to the organization, i.e. carrying out verification of quantitative and qualitative indicators.

3. Description of external peer review

External expert work within the framework of the institutional assessment of the Training and Simulation Centre (hereinafter referred to as the TSC) was organized in accordance with the Guidelines for conducting external assessment of educational organizations and educational programs of the ECAQA in accordance with the program approved on June 19, 2023 by the General Director of the ECAQA Sarsenbaeva S.S. and agreed with the director Orazbaev M.K. Dates of visit to the organization: July 10-11, 2023

The external assessment is aimed at validating the data of the institutional self-assessment report and verifying indicators indicating the degree of compliance with the criteria of accreditation standards.

The sequence of the visit within 2 days is presented in detail in the Visit Program (hereinafter referred to as the program), which is located in the documentation of the accreditation centre. The program is evidence of the implementation of all planned activities within the framework of external peer review.

To obtain objective information, members of the EEC used the following methods and their results:

- interviews with management and administrative employees – 12 people;
- meeting with listeners - 37 people;
- studying the website <https://103-astana.kz/>
- interviewing 12 employees, 10 teachers;
- survey of teachers and students – 10 and 21, respectively;
- observation of student training - attendance at 5 practical classes
 - 1) Basic Life Support (BLS)»;
 - 2) Advanced Cardiac Life Support (ACLS);
 - 3) Pediatric Advanced Life Support (PALS);
 - 4) Prehospital Trauma Life Support (PHTLS);
 - 5) Neonatal Resuscitation Program (NRP);
 - 6) Safe Ambulans Driving Techniques Trainings;

Experts, accompanied by the administration of the State Medical Service and the TSC staff, reviewed resources in the context of meeting accreditation standards: visited the TSC during practical classes, where training is provided in 13 non-formal education programs with a volume of hours - 4/8/16.

- Total number of teachers -12,
- full-time - 6, part-time - 6.
- Sedateness-8,3%
- Categorization-42 %

The study of educational and methodological documents in the amount of 42 units was carried out both before the visit to the organization and during the visit to the departments (the list of documents studied is in **Appendix 2**).

The team of the accredited organization ensured the presence of all persons indicated in the visit program and according to the lists of interview sites (Table 1)

Table 1 - Information on the number and category of participants in meetings, interviews with members of the EEC

№	Position	Quantity
1	Director of the MSE on the REM “City Center for Phthisiopulmonology of	

	the Akimat of Astana”	
2	Director of the MSE on the REM “Higher Medical College of the Akimat of Astana”	
3	Deputy Director for Medical Affairs of the Shipager Medical College	
4	Director of the MSE on the REM " Family Health Center Dostyk"	
5	Director of the Higher Medical College "Danalyk" named after. Z.G. Myrzagulova	
6	Deputy Director for Medical Affairs of “Tomiris” Medical College	6
7	07/10/2023 Training in the EP “Basic Life Support (BLS)”. Paramedics were present	6
8	07/10/2023 Training in the EP “Safe driving techniques in an ambulance. Driving in difficult road conditions with the course “Safe driving of specialized equipment.” Drivers were present	5
9	07/10-11/2023 Training in the EP “Advanced Cardiac Life Support (ACLS)”. Paramedics were present	6
10	07/10-11/2023 Training in the EP “Providing medical care at the prehospital stage for injuries - Prehospital Trauma Life Support (PHTLS)”. Paramedics were present.	9
11	07/11/2023 Training in the EP “Basic Life Support (BLS)”. Paramedics were present	6
12	07/11/2023 Training in the EP “Safe driving techniques in an ambulance. Driving in difficult road conditions with the course “Safe driving of specialized equipment.” Drivers were present	5
	Total listeners	37

On the last day of the visit to the TSC, a meeting of EEC members was held based on the results of the external assessment. Members of the EEC began drafting the final report of the EEC. Generalizations of the results of the external assessment are made. The experts individually completed the “Institutional Quality Profile and Criteria for External Assessment of the TSC for Compliance with the ECAQA Accreditation Standards.” No comments were made to the organization by members of the EEC. Recommendations for improvement for the organization of education were discussed by the chairman Kauysheva A.A. a final open vote was held on recommendations for the ECAQA Accreditation Council for the accreditation period.

Comfortable conditions were created for the work of the EEC, and access to all necessary information and material resources was organized. The commission notes the high level of corporate culture of the team, the high level of organization of comfortable conditions for the work of the commission, full technical support, friendliness and prompt provision of information to members of the EEC.

When conducting a survey of students, 95.24% rated the work of the External Expert Commission on Accreditation as positive; 4.76% - as satisfactory. The majority of respondents (100%) believe that it is necessary to accredit educational organizations or educational programs.

According to 80% of teachers, the survey conducted by ECAQA is useful for developing recommendations for improving key areas of activity of an accredited educational organization.

At the end of the visit, the chairman of the EEC announced recommendations based on the results of the external assessment as part of institutional accreditation to the management and employees of the educational organization.

4. Analysis of compliance with accreditation standards based on the results of an external assessment of the “Training and Simulation Center” of the MSE on the REM “City Ambulance Station” of the Akimat of Astana”

Standard 1: MISSION AND RESULTS

Proof of compliance:

1.1 Mission

When implementing the activities of the visit program, namely, based on the results of an interview with the first head of the organization, members of the advisory body of the Educational and Methodological Council (hereinafter referred to as EMC), in interviews with students and teachers, compliance with the criteria of **standard 1** was established. All participants in the educational process know the mission educational organizations took part in the formation of proposals for formulating the mission, while the mission was brought to the attention of listeners through the website, social networks, and information letters to medical organizations. The mission and goals are documented in the 2022-2026 Strategic Operating Plan, which outlines long-term goals, objectives and strategic directions. From interviews with students and graduates of additional education programs, it was established that before the start of classes, teachers inform about the mission, work plans of the educational organization, tell where to get the necessary information about the educational program, teachers, and training bases.

The State Emergency Medical Service is a broad platform for the transfer of new knowledge, technologies and information into the practice of the production and clinical level of the emergency medical service. When analyzing the state of affairs regarding personnel in the State Emergency Service, problems were identified in the training and retraining of ambulance specialists. In order to develop and improve the professional level of specialists not only in the capital's State Emergency Medical Service, but also in the regions, the need arose to organize a unit for the implementation of additional education programs in the form of the TSC and **the goals of the educational direction of the State Emergency Service** were determined. These goals meet the continuing professional development needs of health care workers through the implementation of educational programs for additional education in first aid at different stages and levels, including medical workers, paramedical services and the civilian population.

The goals of the educational direction are: (1) improving the quality and accessibility of additional professional education; (2) development of the potential of the State Emergency Medical Service personnel and updating the content of postgraduate and additional professional education programs; (3) training using innovative technologies; (4) popularization of medical assistance training programs not only for medical workers, but for everyone according to the levels of first aid, taking into account modern international recommendations and experience.

The results of studying the documentation demonstrate that the mission of the organization of the Training and Simulation Center of the MSE on the REM "City Ambulance Station" of the Akimat of Astana and the educational process is built in accordance with the current regulatory legal acts (RLA) in additional education and healthcare. With regard to additional and non-formal education, the following has been determined: training is carried out mainly from the state budget for employees of the ambulance service; paid educational courses are provided to third parties to a lesser extent.

1.2 Professionalism and professional autonomy

All programs and educational activities are aimed at improving the professional and personal development of medical and paramedical services specialists, including the civilian population of the Republic of Kazakhstan. The content of the programs is formed taking into account the strategic directions of development in the fields of emergency medicine and contribute to the development of competencies, expansion and deepening of existing knowledge in the specialty. When developing educational programs, the wishes and requests of the students themselves and healthcare organizations are taken into account, and the goals and objectives of training are determined; final results.

Taking into account requests from medical organizations for assistance with basic resuscitation measures in adults and children, the following programs have been introduced into the work of the TSC: Basic Life Support (hereinafter referred to as BLS), Advanced Cardiovascular Life Support (hereinafter referred to as ACLS), Prehospital Trauma Life Support, hereinafter - PHTLS), Advanced cardiopulmonary life support in children (Pediatric Advance Life Support, hereinafter - PALS). The

listed programs are based on the educational models of leading translators of these training programs, such as the European Resuscitation Council (ERC), American Heart Association (American Heart Association / AHA), School of Emergency Medical Technicians (EMT).

During the period of implementation of additional education programs, more than 5,000 emergency medical personnel from all regions of the republic were trained at the TSC according to the BLS, ACLS, PALS, PHTLS protocols in the Republic of Kazakhstan with the involvement of international experts ERC and AHA.

To verify **standard 1**, a meeting was held with the head of the organization Orazbaev M.B. During the conversation, the experts asked the following questions: What has been done to ensure the autonomy of TSC educational courses? What are your plans for promoting paid courses and what is unique about your organization? During the answers, the director of the organization confirmed that in order to maintain autonomy, the trainers were trained to provide emergency care according to international standards. In the future, they plan to open international instructor training courses.

When conducting a survey of students (on the resource <https://webanketa.com/>), *out of 22 questions, a number were devoted to the quality of the educational process and the variety of training programs. It has been established that almost 95% of students will recommend studying at the TSC to their acquaintances, friends, and relatives. Almost 95% of respondents believe that managers and teachers are aware of the problems of students related to learning. To the question “Do you think the TSC allows you to improve the necessary knowledge and skills in your specialty?”, 100% of students answered positively.*

During the face-to-face conversation with students, the following information was received: students like the training, *but would like to improve the equipment of the training centre.* When planning the training schedule, the wishes of the students are taken into account.

The surveyed teachers (21 survey questions in total) answered as follows: *100% satisfied with the organization of work and workplace in the USC. Experts determined that the TSC has a healthy microclimate, since the leader is quite accessible to both students and employees, responds promptly to requests and is ready to accept feedback via a QR code from gadgets (anonymous). In the questionnaire, 60% of teachers are satisfied with the microclimate of the organization. According to 70%, in the TSC, a teacher has the opportunity to realize himself as a professional in his specialty.*

1.3 Final learning outcomes

TSC provides continuous professional development to support the necessary competencies of specialists and training is carried out in emergency medical care programs. Cycle-based training provides an opportunity to gain new knowledge and practical skills as the final result of training. Training to master specific required skills and knowledge, followed by clinical implementation in the practical work of medical personnel in the workplace.

The surveyed teachers responded that 70% were completely satisfied with the level of previous training of students, and 30% were partially satisfied.

Experts have established a clear continuity between the final results of previous training and the continuous professional development programs offered in the accredited educational organization.

The programs are designed taking into account the necessary end results of training in emergency medical care. The final learning outcomes are defined in WC and syllabuses, and students are informed about them in advance through the TSC website and social networks. The final results of training determine the professional level of a specialist and stimulate students to improve their skills and knowledge, and provide an opportunity to apply the acquired knowledge and skills in practice.

1.4 Participation in the formulation of mission and final results

The mission is formulated and the final learning outcomes for each educational program are determined, taking into account the proposals of all interested parties - participants in the educational process. For example, the program of additional education on the topic “BLS” and non-formal education on the topic “Safe driving” are compiled on the basis of suggestions from students, since there is a need in the country to apply these skills to victims.

At the same time, when talking with students and employers, experts, a clear answer was not received to the question “Do you participate in formulating the mission and goals of the organization, educational program?”, “What is the personal contribution, for example, of students to improving the content and methods of teaching?” To these questions, trainees responded that they knew and adhered to the principles to support the mission, and employers responded that the mission and vision of the TSC were strictly observed and drawn up with the participation of all stakeholders.

Conclusions of the EEC on the criteria. Comply with 9 standards: completely -9, partially -0, do not correspond - 0.

Standard 1: completed

Recommendations for improvement identified during the external visit:

- 1) Make the mission and vision of the TSC accessible to all interested parties by posting it in the form of visual information in accessible places (training rooms, hall, etc.) (clause 1.1.2).

Standard 2: EDUCATIONAL PROGRAMS

Proof of compliance:

2.1 Model of educational programs of additional and non-formal education

The implementation of educational programs is carried out on the basis of the approved Regulations on non-formal education of the Training and Simulation Centre (hereinafter, the Regulations - TSC), order No. 416-1-Ө dated November 29, 2021. The Regulations of the TSC clearly define the goal of creating conditions for the implementation of educational services and the acquisition of new knowledge and technologies by students, providing opportunities for mastering personal and professional competencies. Educational programs (hereinafter, EP) are compiled in accordance with Order of the Ministry of Health of the Republic of Kazakhstan No. 105 dated February 25, 2021 “On approval of the Rules for teaching emergency medical care skills in accordance with international standards.”

During the interview, it was noted by the listeners that the EPs are adapted to their wishes in terms of time, schedule and the ability to choose topics. The content of the EP takes into account the integration of theoretical and practical components: (skills, abilities, communications, response, relation of components, and 80% is devoted to the practical part of training on simulation equipment, independent work of the student is provided for in libraries, the Internet, for this there are computers connected to the network and access to the library resources of Astana Medical University JSC, also thematic lectures are posted on the website (<https://103-astana.kz/uchebnyy-tsentr/>, www.heart.org/eccstudent, www.heart.org/cpr) electronic books, magazines, information resources based on evidence-based medicine. *According to the results of an anonymous survey, 100% of students noted the availability of office equipment (computers, laptops, printers) in classrooms; electronic educational resources; library collections/resources.*

During the visit, the experts attended the following classes: “Basic Life Support (BLS)”; Advanced Cardiac Life Support (ACLS); Advanced cardiopulmonary resuscitation in pediatrics - Pediatric Advanced Life Support (PALS); Providing medical care at the prehospital stage for injuries - Prehospital Trauma Life Support (PHTLS); Neonatal resuscitation – Neonatal Resuscitation Program (NRP); Training on safe ambulance driving techniques - Safe Ambulans Driving Techniques Trainings, classes were conducted according to the approved calendar and thematic plan, by highly qualified instructors and trainers trained in such reputable world organizations as: American Heart Association; Israel Continuing Medical Education; Rambam Health Care Campus; Comet Research Medical Center; Magen David Adom in Israel, which formed the basis of the courses BLS, ACLS, PALS, PHTLS, NRP (Kolkhozov A. O., Baymurzaev K. E., Grechishkin D. M., Silchenko A. V., etc.).

The duration of the cycle is from 8-16 hours, before the start of the lesson, students are given test questions in 2 languages, with the right to choose an answer, and situational problems are examined and analyzed in detail, practiced on mannequins, as well as using role-playing games to demonstrate conditions approximate to the real situation. At the same time, during the classes,

instructors discuss clinical protocols and problems of providing emergency medical care in various fields. *In the process of interviews with teaching staff/instructors and students, the expert group identified a strong point - an individual approach to students with the goal of mastering practical skills to the point of automaticity, in conditions close to reality.*

TSC ensures compliance with ethical aspects in the implementation of educational programs. Experts studied the Rules of Ethics approved by Order No. 540-Ө dated December 30, 2022 and during the interview, listeners responded that they were aware of the contents of this document.

Students can interact with each other and teachers through created chatbots, as well as through personal meetings with instructors and individual contact with them.

The procedure for informing students about their rights and responsibilities is reflected in the TSC Regulations, and is also transmitted through Documentolog information systems and e-mail.

This indicates compliance with standard 2 in terms of adapting training to the needs of students.

2.2 Scientific method

The TSC has developed 120 standardized operating procedures (SOPs) for the provision of emergency emergency care, including: Actions of the emergency medical team in the event of death of a patient/victim; Providing emergency medical care for drowning at the prehospital stage; The procedure for transporting a patient to provide specialized medical care; The procedure for maintaining medical records by an emergency medical team; Carrying out sanitary treatment of vehicles after transporting a patient with suspected infectious disease; Carrying out resuscitation measures for the patient by ambulance teams; Reception, accounting, provision of supplies of medicines and medical supplies for the emergency medical team; Rules for interaction between emergency medical teams and the Department of Internal Affairs in criminal and socially dangerous cases; Rules for the actions of emergency medical teams in case of accidents and disasters (emergencies); Rules for patient identification of emergency medical care organizations, etc., they contain elements of scientific methodologies that are based on data obtained as a result of practical work.

When talking with students, we found out that they use scientific data in their training and know the basics of evidence-based medicine. They participate in scientific and practical conferences, in international and republican forums, so employees of the MSE on the REM “City Ambulance Centre” published the results of their research in a special issue of the journal: Journal of Health Development, which is included in the list of CCSES MSHE RK No. 47 for 2022. Articles and abstracts are presented in Russian, Kazakh and English.

Access to the clinical protocols of the Ministry of Health of the Republic of Kazakhstan <http://www.rcrz.kz/index.php/ru/2017-03-12-10-51-13/klinicheskie-protokoly> is provided for students, employees and instructors), the results of scientific research by international associations (https://professional.heart.org/professional/GuidelinesStatements/UCM_316885_Guidelines-Statements.jsp), <https://ahasso.heart.org/>, and practical experience in the field of emergency medical services (<http://acutecardio.ru/>, <http://cardio-eur.asia/>, <https://lib.ossn.ru/jour/article/view/64>) and emergency medicine (<http://asmp.kz/>), to AHA electronic information resources www.ahainstructornetwork.org, copyright.heart.org, <https://ahasso.heart.org/>, which is directly used in the learning process.

When surveying students, it was found that 95.24% were satisfied with the conditions and equipment of training rooms and auditoriums.

2.3 Content of additional and non-formal education programs and their relationship with the provision of medical care

The content of educational programs (EP) is subject to the regulatory legal acts of additional and non-formal education. The quality of the content of the EP is constantly assessed for completeness of coverage of all issues of emergency medical care. Teaching methods in the emergency medicine service are analyzed, they quickly respond to the introduction of innovations and the needs of practical healthcare. Innovative programs have been developed: to hold a call with a recording for detailed discussion in practical classes; on safe driving techniques, “green traffic light” for emergency delivery of critically ill patients, etc., which is the strength of the TSC, which was first introduced in the

Republic of Kazakhstan. Taking into account the specifics of practical training on simulation equipment, briefings on safety precautions, infection control, and anti-terrorism security are constantly provided, which are additionally posted on information stands in the halls of the TSC.

For the successful implementation of educational programs, the organization has resources, mannequins, and programs for organizing the assessment of practical skills of students (over 25 items).

The consideration and approval of the EP is carried out at a meeting of the Educational and Methodological Council, which was approved by Order No. 93-Ө dated January 31, 2023, the EP is examined - mainly by experts from medical colleges, the expert group of the EEC considers it necessary to introduce members from the academic environment into the EMC medical universities, scientific centers, research institutes. In addition, the range of educational programs for persons without medical education (paramedics) should be expanded, with the subsequent development of an EP.

Teachers provide students with methodological and didactic materials, additional literature to prepare for classes, 100% completely satisfied according to the results of an anonymous survey.

Based on the results of the cycle, feedback is provided (opinions are listened to) in the form of questionnaires, analysis and work on mistakes.

At the same time, to the question “Do student representatives participate in the development of educational programs?”, the experts received an ambiguous answer that they discuss the topic, but do not participate. The students surveyed are fully satisfied with the schedule of training sessions (100%).

Management of the educational process, reflected in the self-assessment report (**Standard 2**) and general approaches to management were confirmed during a visit to the educational center and conversations with the head and employees.

The experts got acquainted with the work of the entire USC, studied the documentation, including the certificate issuance log, and noticed that the list of trained students was not posted on the website of the MSE on the REM “City Ambulance Station” of the Akimat of Astana. For the purpose of transparency of the procedure for trained students, it is recommended that upon completion of the cycle, a list of trained students in Kazakh and Russian languages, synchronized with the QR code on the certificate, should be posted on the organization’s website.

Of the 21 students surveyed, 100% responded that teachers use active and interactive teaching methods in the classroom.

Experts noted the strengths of standard 2: “Green traffic light” technology for emergency delivery of critically ill patients has been developed and implemented. An individual approach to students with the goal of mastering practical skills to the point of automation, in conditions close to reality.

Conclusions of the EEC on the criteria. Comply out of 13 standards: completely - 13, partially - 0, do not correspond - 0.

Standard 2: completed

Recommendations for improvement identified during the external visit:

- 1) The list of trained students should be posted on the website of the MSE on the REM “City Ambulance Station” of the Akimat of Astana City, which must be synchronized with the QR code of the issued certificate (clause 2.3.1.).
- 2) Expand the range of educational programs for persons without medical education (paramedics) (clause 2.3.1.).
- 3) Involve specialists from the academic environment in the examination procedure of educational programs, and also include the composition of the educational and methodological council (clause 2.3.1.).

Standard 3: ASSESSMENT OF STUDENTS' COMPETENCIES AND DOCUMENTATION

Proof of compliance:

3.1 Assessment methods

The study of control and measurement tools (tests, situational tasks) showed that the organization has implemented an appropriate assessment policy that allows for a comprehensive assessment of the educational achievements of students. *During the interviews, students talked about assessment forms, for example, if the student did not pass the skill, then he has the opportunity to work on the skill to a professional level and retake it, and that they were satisfied with everything.* Students receive regular feedback from teachers.

To verify the data of **standard 3**, the experts asked questions to the acting. Head of the Quality Management and Risk Management Department Zhandarbek Zh.N. and checked documents and methods for assessing students. Monitoring and measuring instruments were reviewed by trainers of the TSC and teaching staff of the Department of Emergency Care of Astana Medical University.

During the visit to the organization, experts were convinced that there is a documentation system that is transparent and accessible to all teachers and staff, and includes documents such as annual operating plans, annual reports, department regulations, contracts with teachers and students, and educational and methodological documentation (work program, work curricula, syllabuses, journals), assessment tools (checklists, statements), evidence, certificates and certificates. A review of the website showed that its pages contain documents necessary for students: emergency care protocols, video lectures, and information about the class schedule, which is regularly updated.

The organization evaluates the reliability and validity of assessment methods by practicing practical skills using emergency care algorithms of the Ministry of Health of the Republic of Kazakhstan, which is presented in the table below:

№	Grade	Criteria
1.	"Passed" grade	This assessment is given if the student has demonstrated mastery of the program material by more than 66% (theory) and has not made 100% critical errors (practice), inaccuracies, completed test work in a timely and correct manner and passed practical skills, and was able to independently systematize the program material.
2.	"Failed" grade	This assessment is given if the student has discovered gaps in the knowledge of the basic material provided for by the program, has not mastered 65% (theory and practice) of the discipline program, has made fundamental, critical errors in his answers, has not completed individual tasks provided for in the current, intermediate and final control.

When conducting interviews with TSC teachers/trainers regarding assessment methods, experts received convincing information that the approach to each student is individual, and the skill is also developed to the point of professionalism. *Listeners also shared their opinions about the timeliness of providing tests, counseling before tests and certification exams, the clarity of the entire assessment procedure and its fairness. For example, students said that this "pass or fail" method is more effective when practicing and passing a practical skill.*

During the visit to the organization, management was asked the question: "Are external examiners involved in order to improve the fairness, quality and transparency of the assessment process?" And a positive response was received; teaching staff of the departments of Astana Medical University are involved in the assessment.

The experts examined the resources for organizing the assessment of knowledge and practical skills, namely, simulation equipment and video lectures of practical skills.

The interviewed representatives of employers also pointed out that the training of students corresponds to the modern development of medical practice and science, since the training uses international standards for emergency care. But the educational organization did not provide systematic feedback to them. Employers believe that they wanted to see the strongest skills in their employees, such as practical skills and knowledge.

At the same time, during a meeting and interview with employees of the Training and Simulation Center of the MSE on the REM "City Ambulance Station" of the Akimat of Astana, experts identified

a number of problems, including the lack of station passports, the lack of feedback after conducting a practical lesson with the method “debriefing”, insufficient training using the team method, which involves coordinated work of the team: driver, doctor, paramedic (secondary medical work).

3.3 Documentation of additional and non-formal education

The TSC has developed and approved the “Regulations on the TSC in the MSE on the REM “City Ambulance Station” of the Akimat of Astana” (No. 09-ø, 05/01/2020), which describes in detail the process of implementing educational programs, describes the types of training, forms of training, mechanism of remuneration of employees for participation in educational activities.

The TSC prepares and monitors the following documents:

- Orders on enrollment and expulsion of students;
- Journal of registration of issuance of certificates;
- Class attendance log;
- A personal student file is created for each listener;
- WCs, EMCDs, syllabuses;
- Class schedule;
- Agreements with organizations on the provision of educational services on a paid basis;
- Certificates, certificates of completion of advanced training courses;

Conclusions of the EEC on the criteria comply with 10 standards: fully -9, partially -1, do not comply - 0.

Standard 3: completed

Recommendations for improvement identified during the external visit:

- 1) Develop station passports including a list of skills, development of competencies and control and measuring equipment (clause.3.1.1.)
- 2) Introduce the “debriefing” teaching method with a video recording of a practical lesson, followed by a detailed analysis of the level of mastery of practical skills (clause 3.1.2.).
- 3) Consider the possibility of team training of students (driver, paramedic, doctor) with the development of an appropriate educational program. (clause 3.1.3.).

Standard 4: HEALTH PROFESSIONALS (INDIVIDUALIZED PROFESSIONAL DEVELOPMENT)

Proof of compliance:

4.1 Motivation

Issues of admission and recruitment of students are reflected in the Regulations on non-formal education (approved on November 29, 2021). The acting student spoke about the policy for enrolling students. Head of the TSC Shyntas Kasym (MD MBA). Admission of students is carried out in accordance with current regulations and internal regulations, which is reflected in the Regulations on non-formal education. From the opening of the TSC (2019) until May 2023. 5,641 specialists were trained in various current educational programs, including 878 people trained in 2021, 2226 in 2022 and in the 1st-2nd quarter of 2023. - 598 people. The most popular educational programs are BLS, PALS, ACLS, NRP, PHTLS and Safe Ambulans Driving Techniques Trainings. 277 people were trained in these programs in 2021, 338 in 2022, and 102 students in the 1st-2nd quarter of 2023.

A balance has been ensured between the existing potential of the educational organization and the opportunities for training and recruitment of students; the organization has sufficient resources: an area of 270 sq.m and is equipped with simulation equipment, including more than 15 training mannequins, over 100 types of instruments, personal computers (8), multimedia tablets (5) and so on. 8 specialists were trained by American Heart Association (AHA) and National Association of Emergency Medical Technicians (NAEMT) trainers. Currently, the Training and Simulation Center employs eight full-time, full-time international instructors who have the right to teach and issue international certificates operating everywhere.

To complete the ACLS, PHTL, PALS, NRP programs, the main requirement for admission to students is the mandatory completion of the BLS course. To take ACLS, PHTL, PALS, NRP courses, a document of education (diploma of higher or secondary medical education) is required. Thus, experts validated the data according to **standard 4**. In general, all criteria are met, but at the same time some shortcomings were identified. The potential of professional associations is not sufficiently used to discuss the training needs of additional education students. However, *the educational and methodological council (EMC) does not have listeners, that is, one of the interested parties*.

The experts reviewed the documentation for student enrollment. Regarding the practice of academic advising, personal support for students and the development of not only professional skills, experts interviewed TSC staff according to the Plan, as well as students. During the interview, it turned out that the TSC provides advisory assistance to students, both at the stage of determining the topic, content and duration of the advanced training program, and during and after the end of the cycle. Listeners noted that TSC trainers and staff are always available and ready to provide any help and support at any time if it is necessary to refresh knowledge or if an emergency situation arises with a patient on call. Due to the specific nature of providing medical care in emergency conditions and the constant presence of personnel at substations, counseling is carried out as planned - during training, as well as at any time outside of any schedule. Consultation can be carried out in person, by email <skoray_astana@med.mail.kz>, by contacting WhatsApp instant messengers, all contacts are posted on the State Medical Service website, including a reminder for the listener.

In order to inform the public and potential consumers of educational services, the organization regularly sends out information letters about available training programs for doctors, paramedical workers and non-medical workers; all the necessary information regarding cycles is also available on the MSE on the REM "City Ambulance Station" website. If necessary, in agreement with the applicant, the approved program is adjusted at the request of the customer (additional topics, etc.), and on-site cycles are organized. At the end of the cycles, an anonymous survey of students is carried out in order to monitor the quality of training and evaluate the educational program, and collect proposals on new training topics. Training results are monitored. Satisfaction among non-formal education course participants averages 99%. During the interviews and while working with documents, it turned out that the main motivating factors for students to enroll is the need to constantly improve their qualifications (lifelong learning); updating knowledge; obtaining a certificate of admission to clinical practice. As the students, including medical employers from third-party organizations, noted, at the TSC there is a real opportunity to get acquainted with the modern training center and the latest simulation equipment. Students gain work skills taking into account the specifics of the activities of EMC service organizations, technologies, including emergency care monitoring, and also receive methodological and practical assistance on clinical issues; they are given the opportunity to learn advanced practices on a modern basis in accordance with international standards, with the methodology and standards of the world-class American Heart Association.

An important factor for students is the right of the TSC to assign official international documents confirming its status in the territories of countries guided by the standards of medical care BLS, ACLS, PALS, PHTLS, NRP.

4.2 Teaching Strategies

While working with materials, directly attending classes and during interviews with TSC staff and students, it was established that the teaching methods used make it possible to identify the abilities of each person and meet the needs of healthcare professionals to achieve the mission of the educational organization, as well as the final results of training. Individual work is carried out with each student to identify his professional and personal qualities, inclinations, and abilities (questionnaires, conducting various levels of tests, and analysis of situational tasks). The formation of a contingent is carried out by accepting individual applications and applications from medical organizations, in the case of traveling to the base of a medical organization when forming a group of no more than 6-12 people. Classes are held in an interesting interactive form, in groups of no more than 10 people, interviews and practical skills training are carried out with each individual

individually. The students themselves are interested in the results of the training and are motivated to master skills to the point of automaticity, realizing that tomorrow this will save the patient's life. At the end of the training, students undergo a final test and receive an assessment of their knowledge of the course. The training strategies have a clear practical focus: students gain skills in choosing emergency medical care tactics, strict adherence to clinical protocols and SOPs, taking into account possible complications, and are taught teamwork and communication skills. Trainers use active learning methods, elements of distance learning, simulation technologies, and work with modern equipment. During a visit to the TSC, it was found that the classrooms have mannequin simulators for practicing cardiopulmonary resuscitation skills at all levels with the ability to monitor and provide feedback. The instructors (coaches) themselves were trained to practice and master practical skills at the AHA.

When developing program topics, the opinions of students and their needs are taken into account, so the educational programs include updated clinical protocols of the Ministry of Health of the Republic of Kazakhstan (<https://diseases.medelement.com/>, rcrz.kz- Electronic database of clinical protocols of the Ministry of Health of the Republic of Kazakhstan. Interactive directory of diseases and laboratory parameters , and AHA guidelines).

In accordance with the order of the Ministry of Health of the Republic of Kazakhstan dated February 25, 2021 No. 105 "On approval of the Rules for training in emergency medical care skills in accordance with international standards," distance learning is not provided for. At the same time, in addition to traditional educational technologies, the TSC uses elements of distance educational technologies based on electronic, information and telecommunication systems. The listener sends an application through the "Training and Simulation Center" section at the link: <https://103-astana.kz/uchebnyy-tsentr/kursy/> and can select the name of the training program. After processing the application, the TSC methodologist contacts the sender of the application to set a date for training. In addition, at the TSC, training is conducted according to AHA international standards, which includes the use of simulation equipment. Training in non-formal education courses makes it possible to improve professional competencies, gain the required number of hours to pass certification, and successfully complete the algorithm of actions for providing emergency medical care during certification. Upon completion of the training, the student receives a certificate.

4.3 Participation and influence of students in additional and non-formal education programs

During a visit to the organization and based on the results of interviews with trainees, it turned out that before the start of training, the TSC provides trainees with a list of training requirements necessary for the previous level of education for higher and middle-level health workers, respectively; It is mandatory to pass the final test of knowledge and skills. For successful completion of training, the TSC provides comprehensive assistance in the selection of material; Lecture and methodological material is provided in a convenient format - on electronic media; During classes, practical skills are developed together with instructors and independently. During the learning process, by observing the mastery of the material and while practicing practical skills, the student's weaknesses, both theoretical and practical, are identified, and instructors give recommendations to such specialists for practical work. In addition, upon completion of training, instructors go to students' workplaces, conduct tracers and observe the implementation of skills in real conditions. In some cases, individual on-the-job training is offered.

Practical skills are practiced together with instructors and independently. If production problems arise, students can contact and receive direct advice from TSC specialists, which subsequently affects the success of their career growth. It should be noted that in the emergency medical service there is a certain turnover of personnel due to various circumstances. In this organization, during the survey, it turned out that employees have permanent experience in this organization for over 10 years, which indicates the right steps taken by management to retain staff (non-punitive environment, help from psychologists, places for snacks and rest, places to read literature, moral measures and material incentives - valuable gifts, bonuses, awards for the best employees, etc.). There is a system of

motivating students to study at the TSC, for example, a 20% discount is provided for third-party organizations if a group of more than 20 people is formed

The content and topics of courses and programs, the choice of one or another module of educational programs is influenced by the opinion of practical healthcare specialists by collecting and analyzing feedback (the wishes and recommendations of students are taken into account and included in the programs). At the request of students, the TSC is currently conducting training using elements of distance learning; training materials for preparing for the courses are available on the website for students; recordings of classes are also posted on the YouTube channel for convenience). *The wish of the listeners was the release of a methodological manual on cardiopulmonary resuscitation.*

In 2020, three guidelines were developed on the following topics: Basic resuscitation; Advanced cardiopulmonary resuscitation; Advanced cardiopulmonary resuscitation in pediatrics.

3 weeks before the course, future students receiving an AHA international certificate are sent a preliminary letter, including the key to the online part of the course, materials for students (Provider's e-book) and the course program.

TSC specialists are members of the "Emergency Medical Care Association", which makes it possible to participate in solving all current problems and issues of the EMC service and take part in their solution.

Despite all the positive aspects, the influence of listeners on the formation and content of educational programs remains indirect. It is necessary to ensure the participation of students in the work of the EMC, which guarantees their involvement in the process of discussion and updating of educational programs.

4.4 Working conditions

During the visit to the TSC, it was established that the working and training conditions in the organization were favorable. There are stands for preventing emergencies, fires, terrorist threats, etc. The organization has category 1 of National accreditation, which implies constant support of personnel safety standards. "Code red" skills are constantly being practiced; "code white"; "code black", etc. There is an occupational health program that helps create a safe and healthy working environment for personnel. To implement educational programs, appropriate conditions are created to maintain the health of students.

Educational programs are implemented within strictly defined time frames in accordance with the calendar and thematic plan. Each topic of the program has its own duration, in accordance with the standards (for example, 4 or 6 and 8 hour classes, time spent in the center). When accepting a student, the time frame and form of the lesson are discussed (face-to-face, with elements of distance learning). Students are sent for training by heads of medical organizations outside of work. If there is an application to conduct a short-term course directly in a medical organization, then the TSC organizes training at a time convenient for the organization so that it does not affect the activities of the clinic or any other customer organization.

When visiting the educational premises of the TSC, it turned out that there were quite good technical and material conditions for conducting the educational process. The educational process is carried out in safe conditions on the territory of the TSC and the clinical departments of the State Emergency Medical Center in rooms with an area of 51; 32.3; 41.8; 52.1 sq. m., which can accommodate up to 15 people at a time, equipped with high-tech equipment and certified workplaces. Metrological verification of learning conditions in classrooms (rooms) and equipment are carried out regularly. All information is recorded in a special journal.

The engineering, technical and economic service of the State Emergency Medical Service provides safety conditions for the operation of medical equipment in the TSC.

According to the curriculum, in the CPD programs, students perform independent work, in addition to the USC, study at the Astana branch of the Republican Scientific and Technical Library JSC, the library of the Astana Medical University JSC, the electronic library of the USC, and practice practical skills in the classroom. Students use the resources of the TSC to practice and improve practical skills, regardless of the training plan, at any time in agreement with the trainers. For this

purpose, the TSC has a conference hall with 90 seats, 4 training rooms with a total area of 270 sq.m for 12, 15, 10 and 6 seats, located on the 3rd floor of the building. All classrooms are equipped with video equipment, a portable projector and laptop for conducting training sessions, flip charts, writing boards, and simulation equipment with a function for monitoring practical skills and feedback. During the experts' visits to the classes, an educational film was shown to the students.

Upon completion of training, the acquired knowledge and skills of CIS students are monitored (testing, solving situational problems; practicing action algorithms, passing practical skills on mannequins; assessment and analysis of one's own practice through self-assessment by the student). It can be noted that TSC staff have the opportunity to undergo professional training and advanced training at the expense of the organization, which is important for further professional development. In advanced training courses and cycles, students who have successfully completed non-formal education programs, taken an active part in the practical part of the training, and shown good results, receive recommendations for assignment to the status of potential instructors.

Conclusions of the EEC on the criteria. Compliant out of 11 standards: fully - 11, partially - 0, do not comply - 00

Standard 4: completed

Recommendations for improvement identified during the external visit:

- 1) Involve students in the development of educational programs by including students in the educational and methodological council.

Standard 5: TEACHERS

Proof of compliance:

5.1 Faculty Admission Policy

The personnel policy of the MSE on the REM "City Ambulance Station" has a transparent recruitment system. The Rules for Employment in the USC, approved by Order No. 462-Θ dated December 31, 2021, define the purpose and procedure for searching for personnel; the Human Resource Management Department creates a database of candidates for instructors and trainers from practical healthcare, and is also guided by the current regulatory legal acts (order of the Ministry of Health and Human Resources dated December 21, 2020 No. MoH RK-303/2020 "On approval of the rules for additional and non-formal education of specialists in the field of healthcare, qualification requirements for organizations implementing educational programs for additional and non-formal education in the field of healthcare, as well as rules for recognizing learning results obtained by specialists in the field of healthcare through additional and non-formal education"; order of the Ministry of Health of the Republic of Kazakhstan No. 105 dated 02/25/2021 "On approval of the Rules for training in emergency medical care skills in accordance with international standards").

The strategic plan for the development of the MSE on the REM "City Ambulance Station" for 2021-2025, approved by the decision of the Supervisory Board (protocol No. 5 of September 22, 2021 and amended protocol No. 2 of June 28, 2022), defines the goals. *Goal 1 is: to form a pool of highly qualified personnel trained to operate according to international standards.* In this direction, work is being carried out to actively attract and retain highly qualified medical personnel. One of the important tasks of personnel policy is the training and retraining of personnel who have modern knowledge and are able to ensure the economic and clinical efficiency of medical care. TSC employees (training staff/instructors, trainers) are trained under the BLS, ACLS, PALS, PHTLS, NRS safe driving programs free of charge.

Experts noted that the number of trained employees in the MSE on the REM "City Ambulance Station" is increasing annually. For example, in 2021 192 people were trained, and in 2022 -1009. For 5 months of 2023 - 232 people. Teaching staff/instructors, trainers participate in the development of regulations (orders, SOPs, clinical protocols, etc.), which gives them the right to convey information to students practically first-hand.

In total, the TSC has 15 people on its staff, including 12 instructors and 1 advanced training methodologist. Of these, 1 employee has a master's degree (MBA), 1 has the highest category, 2 have the first category, and 2 people have the second medical category.

Instructors/trainers have been trained in the following certification programs: BLS - 9, ACLS - 6, PALS - 5, PHTLS - 6, NRP - 3, Safe Driving -1, which fully meet the need for training. Thus, there are no part-time workers involved. Certified specialists (managers) from 4 MSE on the REM "City Ambulance Station" substations are involved in the training process. The work experience of teaching staff/instructors is from 5 to over 20 years.

Certification of the professional competence of specialists is carried out once a year, documented in a protocol and stored in the human resource management department.

According to the results of a survey conducted by ECAQA, 100% of teaching staff/instructors are satisfied with the organization of the educational process, the organization of work and the workplace, and the work of the HR service.

At the TSC, teachers have the opportunity to engage in scientific work and publish the results of research - 50% completely agree, 20% partially and 10% disagree. However, during the visit, the experts saw that there were employees' own developments that should be published in scientific domestic and international journals, and their own teaching aids and recommendations should be developed.

Satisfied with the salary - 80% completely agree, 20% partially agree.

5.2 Faculty Commitment and Development

During the visit to practical classes, and during interviews with teaching staff/instructors, it was noted that active teaching methods mainly use lectures and oral discussion of the topic. The results of the survey confirmed this, since 80% of the surveyed teachers use the format of lectures and topic reviews, and 20% of respondents more often use the format of work in small groups and written work.

At a meeting with the head of the human resource management department and during interviews with teachers and experts, an opinion was obtained on approaches to the development of the pedagogical competence of instructors, trainers, including questions on teaching methods, development of educational programs, control and measuring equipment (CIS), etc. A survey of 10 teachers about advanced training (PT) in their specialty profile showed the following: 70% of respondents completed PT during the current year; more than 3 years ago -20%; over 5 years -10%.

Experts noted that the MSE on the REM "City Ambulance Station" has a KAZANADA certificate, which confirms the fact of recognition from the American Heart Association (AHA) with ID number No. TS5 0884.

MSE on the REM "City Ambulance Station" has a certificate of recognition from the National Association of Emergency Medical Services (NAEMT) with ID number No. 8424 and registration in the international database valid until February 1, 2024.

Experts have found that teachers develop in students the need for additional training and independent work with literature, medical documentation; links to an electronic library and AHA recommendations for emergency medical care, various audio and video materials available at the TSC are available on the website.

70% of the surveyed teachers completely agree that at the TSC there is an opportunity for career growth and development of teacher competencies, and 30% partially agree with this.

The TSC implements social support programs for teachers: 40% answered that "yes, such programs exist," 30% "I have already taken advantage of it," 10% of respondents answered that there are no such programs, and 20% of respondents do not know about it. 90% of teaching staff/instructors responded that they satisfy their requests for the purchase of teaching materials, office equipment, and teaching aids.

Thus, experts note the strength of standard 3: The presence of international certificates in emergency care for teachers/instructors, as well as their participation in the development of regulations (orders, SOPs, clinical protocols, etc.).

Conclusions of the EEC on the criteria. Comply with 9 standards: completely - 9, partially - 0, do not correspond - 0.

Standard 5: completed

Recommendations for improvement identified during the external visit:

- 1) Conduct training for TSC teachers/instructors on teaching methods, development of educational programs and control and measuring equipment (clause 5.1.3).
- 2) Develop mechanisms for stimulating teachers/instructors to publish in scientific domestic and international journals, develop original teaching aids and recommendations (clause 5.1.3).

Standard 6: EDUCATIONAL RESOURCES

Proof of compliance:

6.1 Material and technical base

The TSC signed an agreement with the NJSC Astana Medical University, according to which students have the opportunity to use the library fund of the university (the total book fund is 458,686 copies). The website contains a link to the Library section, which is under development and expansion. *The UCC does not have its own library, but there is an electronic version of professional literature for students of emergency medicine programs (AHA).*

TSC employees have access to the official electronic information resources of the European Resuscitation Council and American Heart Association. These are thematic collections, e-books, magazines, information resources based on evidence-based medicine. MEDLINE Complete is the largest database of published medical information in the world. MEDLINE is a key component of PubMed and provides full text for more than 2,300 medical journals. Employees, if necessary, have access to any information after its publication. To develop a team approach in providing emergency medical care to the TSC, there is a need to equip it with robotic mannequins.

6.2 Training bases

MSE on the REM "City Ambulance Station" has its own base on which the TSC is located, including the clinical substations of MSE on the REM "City Ambulance Station": "Esil", "SaryArka", "Baikonir", "Almaty", in which training rooms with the necessary equipment are deployed. Classrooms comply with sanitary rules and regulations. There are only 4 classrooms, which are equipped with special technical security equipment and fire alarm devices. Equipment, consumables, information resources, etc. are provided for training.

To practice the skills of transporting, loading and unloading patients, and practicing the skills of extracting victims from hard-to-reach places and vehicles, the TSC used 3 (three) units of HYUNDAI H-1 ambulances (complete ambulances). To improve the educational process, the administration of the MSE on the REM "City Ambulance Station" provides the right to use all necessary medical equipment and medical products for practical training.

A review of the resources showed that they correspond to the goals and objectives of educational activities, and the employees of the educational organization ensure collegial and ethical relationships with medical staff and the management of the clinical site to achieve the final results of training students. The educational process is provided with a sufficient number of thematic patients, modern equipment that is available to students, and employees who simultaneously perform the roles of teachers and curators (mentors) provide high-quality training in compliance with ethics and deontology. Before starting the training, the student receives a syllabus from the teacher and knows what skills he should improve and develop during the training.

During a visit to the USC, where experts examined the resources, their compliance with training programs, accessibility for teachers and students, how modern this equipment is and meets the needs of students and practical healthcare, the experts received evidence of compliance with standard 6, as well as validation of the self-assessment report information.

In order to validate the implementation of the self-assessment report data and obtain evidence about the quality of the programs, interviews were conducted with trainees. The experts asked questions about satisfaction with training, sufficient time to develop practical skills, work in Damumed

with medical documentation, satisfaction with teaching methods and qualifications of teachers, social and moral support for students in need, and availability of resources from international databases of professional literature.

In general, students were satisfied with the training, assessment methods, and purposefully wrote an application to this organization, because they believe that the educational organization has good resources, image and international connections.

The experts studied such student documents as portfolios, certificates, feedback questionnaires and an algorithm of practical skills of the examinee.

6.3 Information technology

MSE on the REM "City Ambulance Station" has its own website www._103-astana.kz, which informs about the services provided, resources, and news from MSE on the REM "City Ambulance Station". The structure of the MSE on the REM "City Ambulance Station" has a public relations department, which provides information not only through the official website, but also through social networks about all the news of the MSE on the REM "City Ambulance Station", including ongoing educational events.

MSE on the REM "City Ambulance Station" is also registered on social networks Facebook (<https://web.facebook.com/zhedelzhardem.nursultan>, https://www.instagram.com/103_astana.kz). MSE on the REM "City Ambulance Station" employees have access to electronic information resources, which they can access from a personal computer at their workplaces and in the TSC, which is also connected to the general Internet network.

6.4 Interaction with colleagues

For this purpose, the curator carries out mutual attendance at classes, and also conducts joint training in the exchange of pedagogical experience, in organizing the structure of the educational process. Techniques of mutual control and mutual verification help to learn objectivity in assessment and develop critical thinking.

At the TSC, active work is carried out to develop the competencies of colleagues and representatives of related professions; TSC specialists attend cycles and contribute to a deeper understanding of service issues by their colleagues, participate in trainings, congresses, and master classes on the basis of the TSC.

Students have free access to patients at clinical sites and all conditions for improving their practical skills - 96% of teachers completely agree with this, 3% partially agree, 1% found it difficult to answer. In order to exchange international experience, membership in specialized associations on simulation training is necessary, which will expand opportunities to participate in conferences and provide access to specialized literature.

6.5 Formal and non-formal types of learning

Educational programs are coordinated, especially in terms of elective disciplines, with students, health care organizations (place of work of potential students), for better quality training and achievement of learning outcomes. The program is formed and built on an individual approach, since the training is mainly for practicing medical workers with higher and secondary medical education, who already have a specific goal and objectives during their training.

6.6 Research and scientific achievements

Due to the lack of interest and motivation of teachers, research work is not carried out at the TSC. An interview with TSC teachers, including full-time employees, showed that there are both successes and problems in the management of education, depending on the specific base (admission of students to equipment, a sufficient number of thematic patients, time to maintain medical records, independent work).

The examination is carried out in the form of an analysis of the needs for specialists, an analysis of training methods for students, and the results allow us to draw conclusions about the quality of innovative changes in additional education.

6.7 Training in alternative educational organizations

Training in alternative educational institutions is not considered by students due to the fact that training is carried out at the expense of TSC funds in the workplace, and when scheduling educational courses, the days of classes convenient for students are taken into account.

Conclusions of the EEC on the criteria. Comply with standard 15: completely -14, partially -1, do not correspond - 0

Standard 6: completed

Recommendations for improvement identified during the external visit:

- 1) To equip the TSC with robotic mannequins in order to develop a team approach in providing emergency medical care (clause 6.1.4).
- 2) Provide for the possibility of membership in simulation training associations for the purpose of exchanging international experience (clause 6.7.2).

Standard 7: EVALUATION OF COMPLEMENTARY AND NON-FORMAL EDUCATION PROGRAMS

Proof of compliance:

7.1 Mechanisms for monitoring and evaluating educational programs

During a visit to the TSC, during interviews and work with documents, it was possible to establish that monitoring and evaluation of educational programs is carried out throughout the entire educational process, starting from the stage of developing an educational program in accordance with the needs of practical healthcare, taking into account the relevance and relevance of the topic of courses on consumer requests. Educational programs are developed in accordance with the following regulations: Order of the Minister of Health of the Republic of Kazakhstan dated December 21, 2020 No. MoH RK-303/2020; Order of the Ministry of Health of the Republic of Kazakhstan dated February 25, 2021 No. 105 "On approval of the Rules for training in emergency medical care skills in accordance with international standards", OPs are reviewed and approved by the EMC TSC.

At the end of each training program, students are surveyed. Based on the feedback from students and employers, educational programs are updated, supplemented and revised, as necessary, for the purpose of actualization by leading specialists of the MSE on the REM "City Ambulance Station". Requirements for the design and content of working educational programs are regulated by the Regulations on non-formal education in the TSC.

Assessment of the quality of educational programs and discussion of required changes is carried out at the level of the TMS by council members and instructors. Reports on the completed cycles and training results are heard at meetings of the educational and methodological council, which is reflected in the relevant minutes. Based on monitoring of the development of educational programs, changes are made to the content of programs, teaching methods and methods of assessing knowledge by decision of the EMC.

Based on the study of the TSC institutional self-assessment report, the studied TSC documentation, the results of the visit and interviews with TSC staff, it was possible to draw a conclusion about the process of evaluation and monitoring of educational programs, which includes:

1) assessment of data on the implementation of non-formal education programs and the achievement of final learning outcomes (documented in the minutes of the meeting of the educational and methodological council of the TSC);

2) examination of educational programs aimed at assessing certain parameters, namely: compliance of the educational program; compliance with the weekly workload of students; the ratio of classroom and independent work of students; methodological support of the educational process; the examination is carried out through internal (specialists of the organization itself) and external (practical healthcare specialists represented by heads and deputy heads of third-party medical organizations) assessment;

3) provision of educational programs with material and human resources;

4) program effectiveness - conducted to ensure adequate training and to identify relevant areas in need of improvement;

5) feedback from students through questionnaires, based on the results of which changes and additions are made to the training programs. The questionnaires were presented in the appendix to the Self-Assessment Report (No. 21-25) and during the visit.

6) a cross-section of knowledge, including theoretical and practical sections, is carried out quarterly, and is regulated by the document “Regulations on the conduct of tracers” (approved by the UMS). Experienced instructors visit the tracer and assess the level of theoretical knowledge and practical skills in BLS, ACLS, PALS, PHTLS, safe driving, and the use of medical equipment directly at the workplace (on calls, at the organization’s substations). If an employee does not demonstrate the required level of knowledge, he is sent for repeated training in a specific program.

7) assessment of employers' satisfaction with training results.

The experts were familiarized with information (reviews) from medical organizations, in which employers answered questions about the level of training and made suggestions for improving the educational process. There are reviews from employers for 2023: Director of the Institution, Medical College "Shipager"; EE Higher Medical College "Danalyk" named after Z.G. Murzagulova, Multidisciplinary City Children's Hospital No. 3 of the Akimat of Astana; MSE on the REM “City Center for Phthisiopulmonology” of the Akimat of Astana; MSE on the REM “City Clinic No. 2” of the Akimat of Astana; Primary health care center “Dostyk” in Astana, where they express gratitude to the TSC instructors for the high level of training and are ready to re-train at the TSC.

The positive point is that based on the training results, the statistics of successful resuscitations by visiting teams of the State Emergency Medical Service are assessed. *This proves effectiveness and achievement of learning objectives. An analysis of resuscitation statistics in 2021 showed that out of 73 resuscitations provided by ambulance teams, 40 were successful, which is 55%. In 2022, out of 78 resuscitations, 56 were successful, amounting to 72%. Thus, the results of training of ambulance workers influenced the positive dynamics.* It can be concluded that the increase in the level of qualifications of MSE on the REM "City Ambulance Station" employees was achieved as a result of continuous internal training at the TSC according to international standards in BLS, ACLS, PALS, PHTLS.

At the same time, despite the efforts made by the TSC in relation to the assessment and monitoring of educational programs, it is necessary to build the assessment of programs in the form of a whole system, strengthening the assessment of educational programs before the approval stage at the EMC, by expanding the number of experts from practical healthcare, with the mandatory involvement professional associations, teachers of universities, colleges.

The TSC should build a clear scheme for ensuring the quality of educational programs with mandatory evaluation and monitoring, documenting this (for example, develop a Regulation on quality and monitoring, etc.), develop criteria for monitoring and evaluating educational programs (for example, a checklist with certain questions), which will increase the responsibility of experts, employers and provide specific answers to questions.

7.2 Feedback

The interview with 6 employers was conducted online and included questions such as: satisfaction with the basic knowledge and skills of students, criteria for choosing an organization, feedback channels with the educational organization; what is the organization’s assistance to practical healthcare; Are there any discounts on training? the degree of participation of employers in updating educational programs; participation of employers in advisory bodies (ABBs), reviewing educational programs; satisfaction with the organization as a clinical training site for colleges; qualifications and availability of instructors; the state of the material and technical base; level of methodological material; visibility of the organization on social networks; channels for exchanging information about new courses, etc. *In general, positive answers were received to all questions, but employers found it difficult to answer the question about reviewing educational programs and participation in the work of*

the EMS. Also, employers were unable to answer the question about the availability of other channels and sources of information about training courses other than information letters.

The TSC conducts a survey of employers and students after each training course (questionnaire) using a specially developed questionnaire form. Analysis of questionnaires allows you to evaluate the level of the program, the work of the instructor and receive suggestions for improving the content of the programs. The questionnaire includes questions on satisfaction with the content of the programs, accessibility, sequence of presentation of the material, volume of material received, and offers suggestions for improving the program.

Feedback questionnaires based on the evaluation of the training program are stored in students' personal files. In order to improve the programs, based on the results of the survey and training, adjustments are made to the EP and teaching methods are improved.

In the 1st-2nd quarter of 2023, 700 students were trained. Satisfaction with training was 100%. The survey covered 100% of course participants. A quarterly analysis is carried out based on feedback on all training programs and adjustments are made to the training programs. In 2021, the main problem was technical support for training. This remark was eliminated by modernizing technical support. The TSC carries out work to monitor employers' satisfaction with training results. The experts were shown information from urban primary health care facilities, in which employers provided feedback on the trained workers and suggestions for improving the educational process. For example, there is a proposal to strengthen the competencies of nursing staff: to expand the number of educational programs for mastering medical manipulations by nurses.

Conclusions of the EEC on the criteria. Compliant out of 10 standards: fully -9, partially - 1, do not comply - 0

Standard 7: completed

Recommendations for improvement identified during the external visit:

- 1) Expand the number of educational programs on mastering medical manipulations in order to strengthen the competencies of paramedical workers (clause 7.2.7).
- 2) Strengthen the evaluation of educational programs to the stage of approval by the educational and methodological council by involving practical healthcare specialists and members of professional associations in the evaluation (clause 7. 1.2.).
- 3) Develop criteria for monitoring and evaluating educational programs (clause 7.1.2.).

Standard 8: ORGANIZATION

Proof of compliance:

8.1 Documentation and needs for planning additional and non-formal education

In order to ensure the implementation of educational services and meet the needs of practical healthcare, planning of the educational process and activities related to it is carried out continuously in accordance with the requirements of the legal regulations of the Ministry of Health of the Republic of Kazakhstan and the Ministry of Science and Higher Education of the Republic of Kazakhstan and the internal document - the Regulations on the TSC. In order to inform the public and generate demand from interested parties, responsible employees of the TSC regularly send information letters to medical organizations with information about available educational programs and requesting proposals for the content of the calendar and thematic plan (seminars, master classes, trainings, etc.).

Experts analyzed how training needs are analyzed, topics and directions, duration, and terms of training are determined. As a rule, all wishes of customer-partners are taken into account. Collectively, together with the management of the TSC and instructors, the choice of strategy for the implementation of educational programs is determined (duration and methods of training, place of training, provision of appropriate resources, the competencies of teachers are taken into account). The implementation of educational programs is carried out using the own resources of the State Medical Service. Documentation (educational programs, educational and methodological complexes (EMC),

documents regulating the educational process) are developed by TSC methodologists and instructors with further examination for the correctness of design and compliance of content and then approved by the EMC. If deficiencies are identified in the design or content of the main teaching materials, the materials are returned for revision in accordance with the requirements.

Information about educational programs based on the TSC is regularly posted and updated on the website, on social networks, they are available to potential participants of training courses.

8.2 Academic leadership and administration

The MSE on the REM "City Ambulance Station" has an organizational structure approved on November 4, 2022 by the director of the MSE on the REM "City Ambulance Station". The Charter of the State Emergency Service was approved by the Resolution of the Akimat of the city of Astana dated November 1, 2022, No. 106-3108. In accordance with the organizational structure, the TSC is part of the State Medical Centre and reports directly to the director. The subject of the USC's activities is the implementation of non-formal education programs. During the visit to the State Emergency Service and during interviews with the director and employees, experts concluded that the leadership of the State Emergency Service is highly interested in the availability, development and modernization of the TSC.

When describing standards 4.7 of this report, information is included on positive reviews from practical healthcare, where a high level of specialist training is noted; increasing rates of successful resuscitation, which indicates the direct practical significance of the trainings conducted by the TSC; popularity of the TSC in the region, all trainers have international status and a corresponding certificate; TSC is a clinical base for college students - all this became possible with the advent of this unit.

The leadership of the MSE on the REM "City Ambulance Station", through various mechanisms of moral and material incentives, training at the expense of the MSE on the REM "City Ambulance Station" in leading international centres, strongly supports instructors. *To the survey question "Does the head of the educational centre listen to your opinion regarding issues related to the educational process, research work, clinical/practical work", 50% of teachers answered that systematically, 30% answered "sometimes", 10% "quite rarely", 10% respondents did not give an answer.*

MSE on the REM "City Ambulance Station" is under the authority of the Astana City Public Health Department. Training at the TSC is carried out in the form of informal training - master classes, seminars, trainings.

8.3 Allocation of budget and resources for training

Educational programs of non-formal education are financed from various sources: paid courses for specialists from third-party medical organizations of the Republic of Kazakhstan; training of employees at the expense of the State Social Insurance Fund.

According to the studied documentation and the results of the interviews, it was possible to establish that there is a trend towards an increase in the number of paid services, especially in 2022. *However, the MSE on the REM "City Ambulance Station" does not sufficiently use all available potential and, mainly, budget programs are implemented; The majority of students are our own employees. The growth of paid educational services would have a beneficial effect on the possibility of modernization and acquisition of the latest equipment, achieving self-sufficiency and self-sufficiency in order to invest in human resources and the development of the State Medical Service.*

During the interviews, employers were not sufficiently informed about the developed teaching materials and educational films available in the organization, which are freely available on the YouTube channel and website, which would also affect the positive image of the organization.

As for the means of informing the public, the State Social Media Service does not make sufficient use of the capabilities of SMM, PR and other modern means of communication. Having its own innovative discoveries and technologies ("green traffic light", "call hold", etc.), the MSE on the REM "City Ambulance Station" did not commercialize them, which could be an additional source of income. Although there is a positive trend in the growth of successful resuscitations, author's certificates and relevant publications have not been received.

Table on the number of trained specialists in emergency medical care skills in accordance with international standards from 2021 to 2023 (May)

№	Course name	Number of listeners for 2021	Number of listeners for 2022	Number of listeners for 2023 (January-May)
1	Enterprise employees - 8ч	192	1009	232
	On a paid basis – 8 h	432	745	70
	BLS	624	1754	302
2	Enterprise employees -16ч	118	296	202
	On a paid basis - 16 h	55	44	4
	ACLS	173	340	206
3	Enterprise employees -16 h	32	31	0
	On a paid basis - 16 h	1	9	0
	PALS	33	40	0
4	Enterprise employees -16 h	48	15	199
	On a paid basis – 16 h	0	27	0
	PHTLS	48	42	199
5	Enterprise employees -16 h	0	50	0
	On a paid basis – 16 h	0	0	0
	NRP	0	50	0
6	Enterprise employees – 8 h	227	289	93
	On a paid basis – 8 h	50	49	9
	Safe driving	277	338	102
Total		1155	2564	809

A positive point can be considered that the MSE on the REM "City Ambulance Station" supports a policy of continuous professional development of its own personnel. The experts got acquainted with the “Regulations on non-formal education in the Training and Simulation Centre”, “Regulations on the organization of paid educational services in the TSC of the MSE on the REM "City Ambulance Station"”. Budgetary funds are allocated annually to improve the qualifications of doctors and nursing staff.

In 2022, agreements were concluded in the amount of 1,704 thousand tenge (Agreement No. 281 dated November 7, 2022 with Kazakhstan Medical University “HSPH” LLP in the amount of 1,116 thousand tenge for the increase of nursing staff in the amount of 120 hours; Agreement No. 283 dated 14.11.2022 with Semey Medical University NJSC in the amount of 588 thousand tenge for the increase of medical personnel in the amount of 120 hours).

In 2023, it is planned to improve the qualifications of doctors and nursing staff in the amount of 3,173 thousand tenge.

To introduce new technologies into the educational process, healthcare professionals have the opportunity to choose a training program abroad or in the country in other educational organizations. In 2022, agreements were concluded with Kazanada LLP in the amount of 19,892 thousand tenge.

In 2023, it is planned to train instructors and providers of monitoring groups BLS, ACLS, PALS, PHTLS, NRP, EVOS in the amount of 10,800 thousand tenge.

Paid services are provided on the basis of the approved price list. In order to ensure efficiency, effectiveness, transparency, responsibility, differentiation and independence, the expenditure of funds from the provision of services is carried out in accordance with the accounting policy. During the interview, management shared information about the purchase of new training equipment (mannequins) in the current quarter of this year.

During the visit and visits to the TSC, experts were convinced that sufficient conditions had been created for the implementation of educational programs at the State Medical Centre, office equipment was purchased, departments were provided with computers and multifunctional devices. Funds are allocated for the purchase of consumables for practicing practical skills.

8.4 Management of educational programs

After making a strategically important decision to create a Training and Simulation Centre on the basis of the State Medical University in 2019, in order to properly manage and ensure the quality of the educational process, appropriate administrative and academic staffs was formed to support and implement educational programs, proper management and resource allocation.

During the visit to the organization, it was found that educational programs of non-formal education are implemented in accordance with regulations approved by the Ministry of Health of the Republic of Kazakhstan (Order No. 303/2020 dated December 21, 2020 "On approval of the rules for additional and non-formal education of specialists in the field of healthcare, qualification requirements for organizations implementing educational programs of additional and non-formal education in the field of healthcare, as well as rules for recognizing learning results obtained by health care specialists through additional and non-formal education"; order No. 218 of November 30, 2020. "On approval of the list of specialties and specializations , subject to certification of specialists in the field of healthcare"; order No. 283 dated December 20, 2020 "On approval of the rules for confirming the results of continuous professional development of healthcare workers"), order of the Ministry of Health of the Republic of Kazakhstan No. 105 dated February 25, 2021 "On approval of the Rules for training in the skills of providing emergency medical care in accordance with international standards."

During the interviews, it was found that the analysis of the needs for additional training of employees is carried out by the heads of structural divisions, taking into account the introduction of new technologies, services, standards, clinical protocols, etc. The annual application for advanced training of State Emergency Service personnel with the allocation of budget funds is drawn up on the basis of applications from heads of structural divisions, in agreement with the first deputy director and approved by the first head. Proper management of educational programs is controlled by the head of the human resources department and the relevant department of the TSC, which includes issues of organization, planning, monitoring and analysis of educational activities on CPD.

The experts familiarized themselves with the internal documents of the TSC: Regulations on the TSC; Job descriptions for management, instructors and employees; Regulations on non-formal education; TSC plans and reports; TSC Ethics Rules; internal regulations (orders).

General supervision on educational issues is carried out by the head of the training and simulation center in collaboration with the head of the human resources department. In addition to the TSC employees, the legal department, financial and economic service, accounting department, clinical departments and deputy directors for areas are involved in ensuring the implementation of the educational process.

The legal department ensures the regulation of contractual relations with students and instructors. The Economic Analysis and Planning Sector is responsible for the effective planning of financial

resources and their utilization for educational activities and simulation equipment. The Department of Legal Support and Public Procurement is responsible for the timely conclusion of contracts for public procurement of training equipment. The head of the human resource development department is responsible for planning educational activities for specialists and monitoring the work of the educational program. The TSC department is engaged in the preparation of a general plan of educational activities, for the formation of educational and methodological documentation, according to the requirements, personal files of students, the timely preparation and issuance of documents on completion of courses, their mandatory registration, monitoring the progress of the educational process, the effective use of material and technical base for conducting educational events.

As a result of interviews with departments of the organization, a high degree of their involvement was revealed not only in the provision of medical care, but also in the successful functioning of the TSC.

Conclusions of the EEC on the criteria. Comply out of 10 standards: fully - 9, partially - 1, do not comply - 0

Standard 8: completed

Recommendations for improvement identified during the external visit:

- 1) Consider the possibilities of additional financing through the provision of paid services to third-party organizations.

Standard 9: CONTINUOUS RENEWAL

Proof of compliance:

The strategic development plan of the enterprise for 2021-2025 reflects an increase in profitability and provision of adequate financing, through competent planning, and the implementation of a resource-saving policy. Creation of a patient-oriented system of medical care by passing the international accreditation of the “gold standard” JCI. Increasing management efficiency and productivity through the implementation of unified information systems. In order to systematize management decisions, it is planned to introduce a balanced scorecard system (BSS). The expert group notes the regularly carried out work on: updating internal documents for compliance with legal regulations; using mechanisms to detect and eliminate documented deficiencies in their activities; improving the learning environment through regular updating, expanding and strengthening the material and technical base and equipment for mastering practical skills, in order to comply with the development of additional and non-formal education; allocating financial resources for continuous improvement.

Considering the existing highly qualified potential of TSC employees, the availability of an equipped material and technical base, the presence of a KAZANADA certificate, and unique developments, there is a demand for training among other medical organizations. Thus, when interviewing employers, the director of the MSE on the REM “City Center for Phthisiopulmonology” noted that over the past year 401 employees have trained at this centre. This indicates a high level of trust in the MSE on the REM “City Ambulance Station” of the Akimat of Astana. It should be noted that the TSC is the base of practice for medical colleges, including the Higher Medical College of Astana, Shipager, Danalyk, Tomiris, whose graduates successfully work in the structure of emergency medical care.

The number of specialists trained in emergency medical care skills in accordance with international standards for the period from 2021 to May 2023 demonstrates positive dynamics: in 2021. - 1155; in 2022 - 2564, for five months of 2023. -809 people, which undoubtedly indicates the high rating and demand for these cycles.

A statistical analysis of patients seeking ambulance and emergency care, defects in the provision of emergency medical care showed the dynamics of successful resuscitation: in 2021 -55%, in 2022. - 72%, this is one of the important indicators and is stimulated by the management of the enterprise.

At the same time, experts note insufficient work to inform the public about existing unique developments and video materials.

The training and simulation center has unique developments: “chat bot”, “call hold”, “open courtyard”, “green traffic light” control tracers that contribute to the achievement of the organization’s mission.

Conclusions of the EEC on the criteria. Compliant out of 5 standards: fully - 5, partially - 0, do not comply - 0.

Standard 9: completed

Recommendations for improvement identified during the external visit:

- 1) Taking into account the existing innovative technologies, equipped material and technical base, highly qualified specialists, certified instructors, geographical location, consider the possibility of creating a coordinating centre for emergency care in the Northern region of Kazakhstan on the basis of the TSC (clause 9.4).
- 2) Continue the development of teaching materials - educational videos, educational films, followed by widespread public awareness (clause 9.4).
- 3) Strengthen the capabilities of SMM and PR services for promotion, commercialization of educational programs and popularization of emergency medical services for the population (clause 9.4).

Thus, when conducting an external institutional assessment, out of 92 accreditation standards, full compliance of 88 accreditation standards was established, including 62 basic standards and 30 improvement standards. 4 improvement standards are partially met. No non-compliance with standards has been identified. Compliance with improvement standards demonstrates the compliance of the TSC of the MSE on the REM “City Ambulance Station” with best international practice in such areas as mission and final results; educational programs; healthcare professionals; teachers.

5. Recommendations for improving the institutional activities of the educational organization of the MSE on the REM "City Ambulance Station" of the Akimat of Astana:

- 1) Make the mission and vision of the TSC accessible to all interested parties by posting it in the form of visual information in accessible places (training rooms, hall, etc.) (clause 1.1.2).
- 2) The list of trained students should be posted on the website of the MSE on the REM “City Ambulance Station” of the Akimat of Astana City, which must be synchronized with the QR code of the issued certificate (clause 2.3.1.).
- 3) Expand the range of educational programs for persons without medical education (paramedics) (clause 2.3.1.).
- 4) Involve specialists from the academic environment in the examination procedure of educational programs, and also include the composition of the educational and methodological council (clause.2.3.1.).
- 5) Develop station passports including a list of skills mastering the competence of control and measuring equipment (clause.3.1.1.)
- 6) Introduce the “debriefing” teaching method with a video recording of a practical lesson, followed by a detailed analysis of the level of mastery of practical skills (clause.3.1.2.).
- 7) Consider the possibility of team training for students (driver, paramedic, doctor) with the development of an appropriate educational program. (clause.3.1.3.).
- 8) Involve students in the development of educational programs by including students in the educational and methodological council (clause 4.2.1.).
- 9) Conduct training for TSC teachers/instructors on teaching methods, development of educational programs and control and measuring equipment (clause 5.1.3).
- 10) Develop mechanisms for stimulating teachers/instructors to publish in scientific domestic and international journals, develop original teaching aids and recommendations (clause 5.1.3).
- 11) Refurbish the TSC with robotic mannequins in order to develop a team approach in providing emergency medical care (clause 6.1.4).

- 12) Provide for the possibility of membership in simulation training associations for the purpose of exchanging international experience (clause 6.7.2).
- 13) Expand the number of educational programs on mastering medical procedures in order to strengthen the competencies of paramedical workers (clause 7.2.7).
- 14) Strengthen the assessment of educational programs to the stage of approval by the educational and methodological council by involving practical healthcare specialists and members of professional associations in the assessment (clause 7.1.2.).
- 15) Develop criteria for monitoring and evaluating educational programs (clause 7.1.2.).
- 16) Consider the possibilities of additional financing through the provision of paid services to third-party organizations. (clause 8.3.3)
- 17) Taking into account the existing innovative technologies, equipped material and technical base, highly qualified specialists, certified instructors, geographical location, consider the possibility of creating a coordinating centre for emergency care in the Northern region of Kazakhstan on the basis of the TSC (clause 9.4).
- 18) Continue the development of teaching materials - educational videos, educational films, followed by widespread public awareness. (clause 9.4).
- 19) Strengthen the capabilities of SMM and PR services for promotion, commercialization of educational programs and popularization of emergency medical services for the population (clause 9.4).

6. Recommendation to the ECAQA Accreditation Council

Members of the EEC established the compliance of the “Training and Simulation Center” of the MSE on the REM “City Ambulance Station” of the Akimat of Astana with the Accreditation Standards and came to a unanimous opinion to recommend that the ECAQA Accreditation Council accredit this organization for a period of 5 (five) years.

	Full name	Signature
Chairperson of EEC	Kauysheva Almagul Amangeldinovna	
Foreign Expert	Oleg Mikhailovich Uryasev	
Academic Expert	Imasheva Bagdat Sakenovna	
National Academic Expert	Kolbaev Meyerbek Tolegenovich	

**Quality profile and criteria for external institutional assessment of the TSC MSE on the
REM “City Ambulance Station” (summary)**

Standard	Criteria for evaluation	Number of standards	Basic standards/ Improvement Standards	Rating		
				Totally compliant	Partially compliant	Does not compliant
1.	MISSION AND END RESULTS	9	7/2	9	0	0
2.	EDUCATIONAL PROGRAMS	13	9/4	13	0	0
3.	ASSESSMENT OF LISTENERS' COMPETENCIES AND DOCUMENTATION	10	7/3	9	1	0
4.	HEALTH PROFESSIONALS (INDIVIDUALIZED PROFESSIONAL DEVELOPMENT)	11	8/3	11	0	0
5.	TEACHERS	9	4/5	9	0	0
6.	EDUCATIONAL RESOURCES	15	10/5	14	1	0
7.	EVALUATION OF ADDITIONAL AND NON-FORMAL EDUCATION PROGRAMS	10	5/5	9	1	0
8.	ORGANIZATION	10	7/3	9	1	0
9.	CONTINUOUS RENEWAL	5	5/0	5	0	0
	Total:	92	62/30	88	4	0
				92		

List of documents studied by members of the EEC as part of an external assessment of the educational organization

№	Document names	Quantity
1.	Regulations on non-formal education TSC	1
2.	Self-assessment report	1
3.	Job descriptions of a doctor-instructor, safe driving instructor, paramedic (nurse)-instructor	1
4.	Educational programs BLS, ACLS, Call Hold (tests, score sheet, expert opinion)	1
5.	Certificate issuance log	1
6.	TSC Ethics Rules	1
7.	Standardized operating procedures	5
8.	List of standardized operating procedures approved by Order No. 250-Θ	1
9.	Rules for hiring UTSC employees	1
10.	Calendar plan for 2023	1
11.	List of simulation equipment	1
12.	Certificate of training (ready version)	1
13.	Teacher certificates	10
14.	Agreement on joint activities with the International Training Center "Kazanada"	1
15.	List of medical equipment TSC	1
16.	List of employers	1