

STEEL character



- ▶ THE “KRAZ-2008” MOTOR-SHOW
- ▶ CUBAN KRAZ TRUCKS – “TO A NEW TUNE”
- ▶ ON THE “AUTOSTRADA” OF POLAND
- ▶ A ROAD TO EQUATORIAL GUINEA

STEEL character

Corporate magazine of
“AvtoKRAZ” Holding Company

Chief editor: Nataliya Orel
pr@avtokraz.poltava.ua

Editorial board: V. Usenko,
T. Nesterenko, L. Vovk, Y. Senenko

Photographs by:
S. Popsuevich, N. Markov, M. Shelepenkov,
D. Gladkiy, L. But, S. Viazovskaia, N. Voytiuk,
V. Grebeniuk, Yu. Senenko, N. Orel,
as well as from the factory archives.

Designed and printed by PrintLux www.printlux.com.ua

When using the material a reference to the
“Steel Character” Magazine is required.
Published quarterly in an edition of 1000 copies.

“AvtoKRAZ” Holding Company

62, Kievskaya Str., Kremenchug, 39631, Ukraine
Tel.: +38 0536 766200; tel./fax: +38 0536 766208

e-mail: info@avtokraz.poltava.ua

www.autokraz.com.ua

Trade House of “AvtoKRAZ” HC

2, Yaroslavskiy Proyezd Str., Kremenchug, 39631, Ukraine
Tel.: +38 0536 766313; tel./fax: +38 0536 778986

e-mail: sale@autokraz.s-net.net.ua

Foreign Trade Firm “KRAZ”

2, Yaroslavskiy Proyezd Str., Kremenchug, 39631, Ukraine
Tel.: +38 0536 766210; tel./fax: +38 0536 771673

e-mail: office@ftfkraz.poltava.ua

Press Relations Service of “AvtoKRAZ” HC

62, Kievskaya Str., Kremenchug, 39631, Ukraine
Tel.: +38 0536 766092; fax: +38 0536 766208

paper@kraz.ua



4-5



6-7



12-14



16-19

CONTENT

NEWS OF COMPANY	4-5	15	BUILDERS OF SUBWAY BRIDGE
FOR EMERGENCY SITUATIONS	6-7	16-19	HOLIDAY KALEIDOSCOPE
CUBAN KRAZ TRUCKS - "TO A NEW TUNE"	8-9	20-21	ARCTIC HEAVY-DUTY TRUCKS
ON THE "AUTOSTRADA" OF POLAND	10-11	22	AMATEUR TUNING
A WAY TO EQUATORIAL GUINEA	12-14	23	"AVTOKRAZ" TRAINING UNIT IS THE BEST ONE IN UKRAINE



8-9



10-11



22



23



SAUDI ARABIA



ORIENTED AT SAUDI ARABIA

“AvtoKrAZ” Holding Company has signed the distribution agreement with “Abdullatif Alissa Automobile Co”, the largest player at the Saudi Arabian automobile market. The agreement was signed during a visit of the Ukrainian government delegation with Vice Prime-Minister Mr. Alexander Turchinov at the head to Saudi Arabia. The delegation also comprised the senior executives of “AvtoKrAZ” Holding Company and “KrAZ” Foreign Trade Firm Mr. Sergey Sazonov and Mr. Igor Fomenko as well. According to the agreement “Abdullatif Alissa Automobile Co” is entitled to be the representative of “AvtoKrAZ” in Saudi Arabia during the next 10 years. The agreement stipulates a performance of the KrAZ trucks test trials on the national economic facilities of the Saudi Arabia at the initial stage. Upon completion of these test-runs a type and a configuration of trucks will be specified and the deliveries will start. At the present moment the trucks produced by “AvtoKrAZ” Holding Company are certified in the compliance with the GSO standards. It enables “AvtoKrAZ” to export the KrAZ trucks into the countries-members of the Gulf Cooperation Council (GCC) and to operate them on general purpose roads.



INDONESIA



“PEACEMAKERS” IN SERVICE

15 units of the KrAZ-6322 vehicles have been delivered for the benefit of the National Police of Indonesia within the framework of the UN peace-support mission in Sudan. 12 vehicles have arrived in the workforce station, with the rest being chosen as test vehicles to conduct trials by National Police.

In order to provide maintenance and training in terms of operation and servicing of the KrAZ automotive equipment a technical expert of “AvtoKrAZ” HC was sent to Indonesia. More than 30 police officers have passed a 10-day training course in Jakarta, after which they proceeded to fulfillment of the UN peace-support mission in Sudan.

Chief executive officers of “KrAZ” FTF held the presentation on the Company’s proucts in the National Police department. The parties conducted negotiations about development of a further cooperation. Police officers shown a serious interest to KrAZ special-purpose vehicles, i.e. fire-fighting vehicles, ammunition re-supply vehicles, combined fire-fighting vehicles and water canon systems on the KrAZ chassis. The prospects of purchasing these KrAZ vehicles for subsequent peace-support missions of Indonesian police were discussed as well.

AWARDS



AWARDS OF THE UKRAINIAN MINISTRY OF DEFENSE TO THE AVTOKRAZ PEOPLE

Ministry of Defense of Ukraine have awarded General Director of “AvtoKrAZ” HC Sergey Sazonov, Technical Director Alexander Gritsenko and test driver Vasiliy UkhnaI’ with the medal “For Assistance to the Armed Forces”. They have received this award due to their fundamental contribution to the development and support of the Armed Forces life-sustaining activity, high professional skills demonstrated during conduction of state trials and passing the KrAZ-6322 trucks into service for the Ukrainian Armed Forces.



KRAZ GAINED THE AFFECTION OF VISITORS OF THE SOFEX-2008

“AvtoKraZ” Holding Company, together with “ANHAM” company, its official dealer in the Middle East, exhibited the KraZ-6322 (6x6) all-terrain vehicle at the SOFEX-2008 Special Operations Forces Exhibition. This vehicle has load carrying capacity of 12 tons and it is equipped with the 350 h.p. Deutz engine and Allison transmission.

The KraZ-6322 demonstrated its capabilities on the SOFEX proving ground, having successfully passed all the difficult obstacles. The KraZ proved to be the only truck on the test truck run which got a great tornado of applause among the exhibition visitors.

Military attaches, representatives of state political institutions and business elite took an intense interest in the “AvtoKraZ” HC products.

In the course of negotiations, held within the frames of this exposition, there have been agreements reached as to the promotion of the KraZ vehicles and market representation of the company in the Middle East, upgrading of the previously supplied vehicles and increase in spare parts supply.



JORDAN



KRAZ SHOWED ITS BEST IN NIZHNIY TAGIL

For the “Russian Exhibition of Armament” in Nizhniy Tagil “AvtoKraZ” Company has presented its two “universal soldiers”: the KraZ-6322 (6x6) “Soldier” platform cross-country vehicle and the KraZ-5233BE (4x4) “Dakar” truck with an increased cross-country ability.

The proving ground of the international exhibition had become the area for demonstration of the KraZ vehicles capabilities and competitive advantages. 97 models of military, transportation and fire-fighting vehicles took part in the demonstration of operational capabilities. Artificial obstacles of the demonstration and testing ground have not been an obstacle for Ukrainian trucks – all of them have successfully passed. The KraZ-6322 was the only truck, which negotiated an artificial obstacle “Vertical wall” with the height of 0.85 meters. It was worth a storm of applauding.



RUSSIA



AVTOKRAZ HOLDS LEADING POSITIONS IN RATINGS

According to the results of the “GVardiya novatorov” rating presented by the Ukrainian Rating Agency in cooperation with “Galitskie Kontrakty” “AvtoKraZ” HC was included into the list of the Ukrainian most innovative companies. The Holding was ranked second in the branch rating, having improved its positions compared to the previous year. The ranking of the enterprises was based on such criteria as effectiveness of enterprise investment, innovative and scientific and technical activity, productivity, energy intensity of production and degree of mechanization.

In the all-Ukrainian rating program “GVardiya brendov” the “KraZ” trademark was ranked the 37th among 200 most expensive brands of Ukraine.

RATINGS



BEST SOLUTION FOR EMERGENCY SITUATIONS

The KrAZ-63221 (6x6) fire-fighting vehicle with the AKT-262.02 equipment for combined fire-fighting took part in fire liquidation on the proving ground of the "Poltavagasdobycha" gas production department in Poltava region, where trainings organized by Ministry of Emergency Situations of Ukraine were held. The aim of this military training was to demonstrate fire-fighting, special-purpose vehicles, and emergency rescue equipment of the Emergency Situations Ministry regional subdivisions as well as to identify the level of readiness for actions in case of emergency, because the greatest amount of gas and oil wells in Ukraine are situated in Poltava region. "AvtoKRAZ" HC produces a wide range of special-purpose vehicles which can effectively cope with the task of eliminating the emergency situations: fire-fighting vehicles on the KrAZ chassis with the 4x2, 4x4, 6x4 and 6x6 wheel arrangements, vehicles for infield repairs, for mine clearance of territories, removal of

the city obstructions, command and staff vehicles, and others.

During these trainings "AvtoKRAZ" presented a range of vehicles intended for emergency response, namely, the ALI-40 fire-fighting tanker on the KrAZ-5233HE (4x2) chassis, auto crane, scrap truck, skimmer on the KrAZ-65053 (6x4) chassis, the KrAZ-65032 dump trucks, and the KrAZ-65055 vehicle as well. In general, nearly 60 types of vehicles and 200 people took part in these trainings.

Vladimir Shandra, Minister for Emergency Situations, highly appreciated the KrAZ vehicles and their capabilities in course of the conversation with Sergey Sazonov, General Director of "AvtoKRAZ" HC. He ensured that in case of re-equipment of Ukrainian Emergency Situations Ministry vehicle fleet the preference will be given to the Ukrainian KrAZ vehicles. His words were proven by another company victory in the tender for delivery of vehicles to Emergency Situations Ministry of Ukraine. 15 vehicles on the KrAZ chassis will be delivered in October 2008.

The delivered vehicles include special trucks based on the KrAZ-5233 (4x4) and the KrAZ-63221 (6x6) vehicles, intended for prompt arrival to the place of detected explosives, transportation of special equipment, providing mine clearance, and further transportation of major caliber explosive objects with the total mass up to 2 tons to the place of their disposal. The vehicles will be equipped with a hydraulic crane, special equipment, particularly, a petrol blow torch, petrol-powered saw, power perforator, power plant, and radio set with GPS-navigation.

Besides, the KrAZ-65032 (6x6) dump trucks with the load capacity of 15 tons, equipped with the platform of 12 m³ capacity and auto cranes on the KrAZ-63221 (6x6) chassis with the load capacity of 25 t will be delivered as well. All-wheel drive and wide cross-section tires provide task fulfillment even in the complete cross-country conditions.



The KrAZ-63221 "Fire-fighter" during the trainings organized by Emergency Situations Ministry of Ukraine

“KRAZ” AND “TITAL” WILL FIGHT A FIRE

The new АТП-40 fire-fighting telescopic platform is produced on the KrAZ-63221 (6x6) all-wheel drive chassis in cooperation with “Tital” company – Ukrainian designer and producer of fire-fighting, emergency-rescue vehicles and equipment.

A new special vehicle intended for water and foaming solution delivery in the process of fire-fighting, carrying out rescue operations at heights is produced on request of the “Petra Kazakhstan Oil-Products” oil-refinery plant fire department (Chimkent, Kazakhstan).

The telescopic platform was tested by fire department №25 in Kiev, on the base of Obolon’ regional department of Emergency Situations Ministry Chief Administration of Ukraine. The vehicle was tested in operation in the presence of customer’s representatives. The water and foam delivery, as well as personnel ascending to the height and descending were performed in the process of fire-fighting.

The fire-fighting telescopic platform is a modular construction consisting of the KrAZ-63221-050 chassis and a hydraulic platform comprising frame with four H-type outriggers providing platform stability in the process of operation. The telescopic platform is equipped with the Volkan VFPN 400 fire pump, foam tank with 1000 l capacity, master stream nozzle, the “Purga-20.40.60” generator, system of water and foam pipelines and basket. The KrAZ vehicle is equipped with the YaMZ-238DE2 300 h.p. engine. The cab is designed for three combat crew seats.

Fire fighting by means of water usage is carried out with the help of hand fire nozzles (foam generators) and stationary master stream nozzles. The water pump is capable of spraying water up to 100 m. In the process of fire fighting, water can be delivered to the nozzle from the tanker, open water sources or another reservoir through the master stream nozzle. The master stream nozzle delivery is 3800 l/min, flow range is 60 m, and possibility of horizontal rotation is 348° and the vertical is 135°. The foam generator provides flow range of 45-50 m. The hydraulic platform has a 360° horizontal rotation. The basket lifting capacity is 400 kg, the maximum working height is 40 m and the maximum side outreach is 24.5 m.



Sergey OKATOV, Head of Obolon’ department of Emergency Situations Ministry Chief Administration of Ukraine in Kiev:

– This event has witnessed a powerful potential of Ukrainian manufacturers. No analogs of the same class, level or quality of vehicles are produced on the territory of CIS and Western Europe. This vehicle is unique for Ukraine. It has no equal for fire fighting in high-rise buildings. The fire-fighting vehicle is produced on the KrAZ chassis which has a lot of advantages. The vehicle possesses an increased cross-country ability. Such an articulated platform can be mounted only on very powerful vehicle chassis, such as KrAZ. Our colleagues from Kazakhstan are lucky. Everybody would like to have such a vehicle in service as it has given a good account of itself and it is much cheaper than vehicles of other manufacturers.



Pavel BRITSKIY, General Director of the “Tital” company:

– The KrAZ vehicles are in great demand in many countries, so we hope to expand our cooperation. Our plans include development of fire-fighting vehicle for airfields meeting the IKA0 standards (International organization of European cooperation which regulates functioning of airfields and their safety). Such vehicles are not manufactured in the CIS territory. KrAZ is a perfect base for such vehicles. Chassis of other manufacturers do not fit on account of poor specifications, low power, weak frames, as chassis’ must be outfitted with massive equipment, pumps, foaming agent bin, and other equipment.



CUBAN KRAZ TRUCKS – “TO A NEW TUNE”



Nowadays Cuba is given a top priority in the marketing policy of “AvtoKrAZ” HC. During the last several years the Company has been persistently working on reviving its presence in this market.

Valeriy GREBENIUK, Head of KrAZ vehicle fleet modernization project in Cuba, gives his evaluation of the “AvtoKrAZ” HC prospects:

► **How does the cooperation of the Kremenchug Automobile Plant with Cuban customers developing?**

After a long pause the first batch of the KrAZ vehicles was delivered to Cuba in December, 2007. Now, the quantity of the delivered vehicles is more than 200.

Methodical work in this direction resulted in signing three contracts for delivery of 146 vehicles by “AvtoKrAZ” HC to the Ministry of Construction of Cuba. The total value of the contracts amounts to EURO 10 million.

► **What vehicles will be delivered to Cuba?**

Among the vehicles being delivered there are the **KrAZ-6510** dump trucks with a load capacity of 15 tons, equipped with a platform of 10.5 m³ capacity, the **KrAZ-6124P4** concrete mixer truck with mixing equipment driven from an independent engine, the **KrAZ-64431** fifth-wheel tractor. All the vehicles are specially adapted for operating in tropical conditions, namely, they are equipped with air conditioners.

Cuba was one of the largest importers of the KrAZ vehicles until 1992. Nearly 10 000 Kremenchug heavy-duty trucks were delivered to the market during three decades, beginning from 1960.

“KP-3” (“KP-three”) – that is how Cuban drivers were used to name the KrAZ vehicles. They gave a good account of themselves by operating in difficult conditions.

With the collapse of the USSR and breakup of economic ties, the deliveries of the KrAZ vehicles to the Cuban market were suspended.

At the road construction in Havana suburb



The KrAZ vehicles will be used for road construction within the framework of state roads renovation program.

The project of modernization of the KrAZ vehicles delivered in the times of USSR will be a serious step which provides consolidation of the “AvtoKrAZ” HC positions in the Cuban market.

► **At what stage of development is this project now?**

There are a lot of old KrAZ vehicles in Cuba. You can see them not only in the center of Havana, but also in the oil field developments, at road construction and in the mountains.

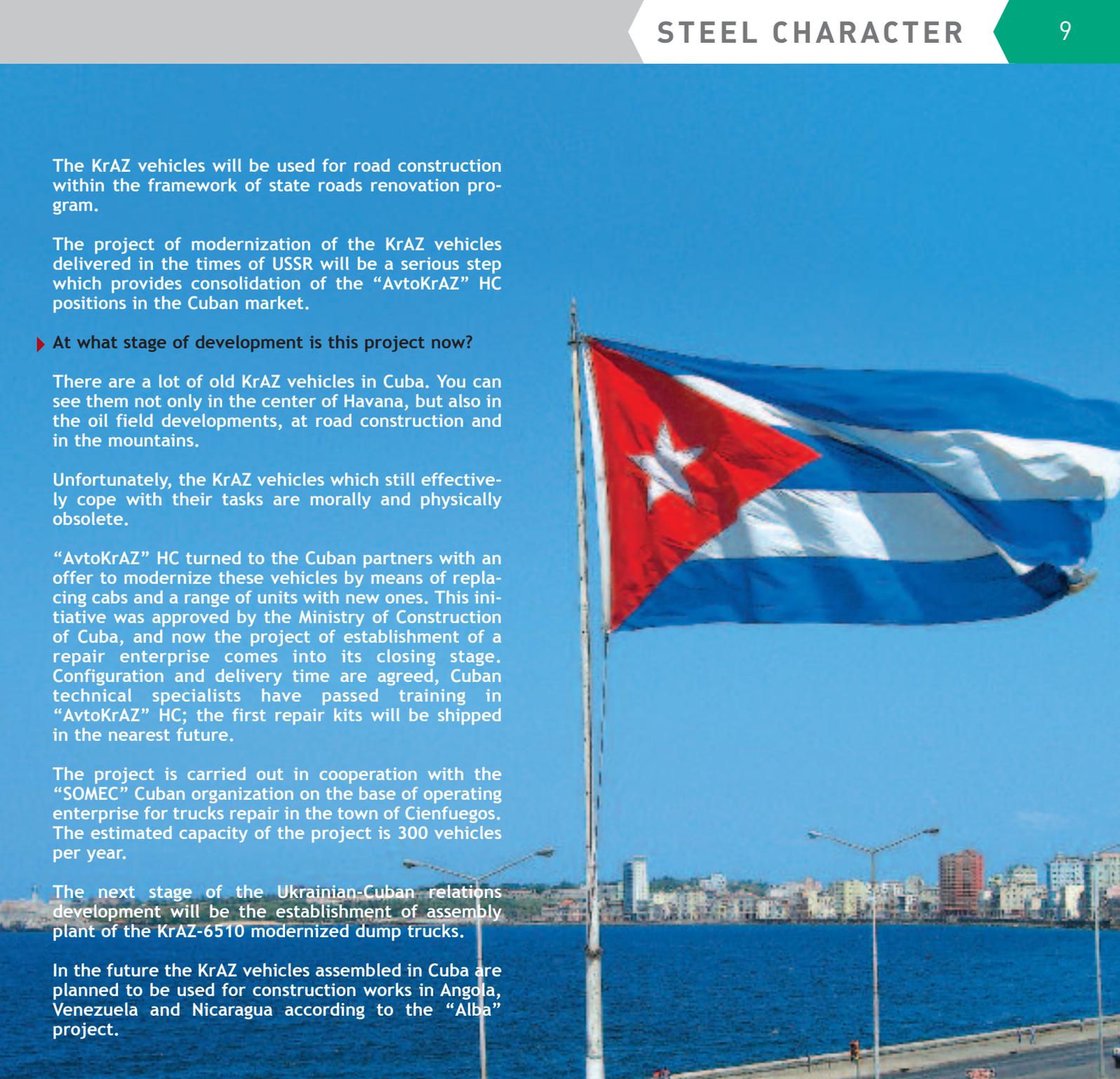
Unfortunately, the KrAZ vehicles which still effectively cope with their tasks are morally and physically obsolete.

“AvtoKrAZ” HC turned to the Cuban partners with an offer to modernize these vehicles by means of replacing cabs and a range of units with new ones. This initiative was approved by the Ministry of Construction of Cuba, and now the project of establishment of a repair enterprise comes into its closing stage. Configuration and delivery time are agreed, Cuban technical specialists have passed training in “AvtoKrAZ” HC; the first repair kits will be shipped in the nearest future.

The project is carried out in cooperation with the “SOMEC” Cuban organization on the base of operating enterprise for trucks repair in the town of Cienfuegos. The estimated capacity of the project is 300 vehicles per year.

The next stage of the Ukrainian-Cuban relations development will be the establishment of assembly plant of the KrAZ-6510 modernized dump trucks.

In the future the KrAZ vehicles assembled in Cuba are planned to be used for construction works in Angola, Venezuela and Nicaragua according to the “Alba” project.



A string of KrAZ municipal old-timers removing construction waste in the center of Havana

A future enterprise for the KrAZ vehicles modernization in the town of Cienfuegos



ON THE “AUTOSTRADA” OF POLAND



A crane on the KRAZ-63221 chassis found its customer on the first day of the “Autostrada Polska”

“AvtoKRAZ” Holding Company in cooperation with its partner “Autokraz Polska” – company’s exclusive representative in the territory of Poland – represented its products at the “Autostrada Polska 2008, the 14th International fair of equipment and technology in road construction” (Kielce, Poland).

For the past few years the exhibition has gained in scope and today it is reputed as one of the biggest exhibitions of road construction in Europe. In 2008 more than 800 companies from 26 countries of the world took part in the fair exhibited on a 38000 sq. m area of equipment and materials for construction of roads, bridges, tunnels, overhead roads, as well as other facilities of road infrastructure.

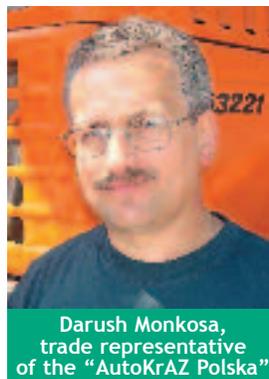
“AvtoKRAZ” Holding Company together with “AutoKRAZ Polska” and the “Drogobych plant of automobile cranes” called attention of fair visitors to the KTA-25 automobile crane on the KRAZ-63221 chassis (6x6) with a payload of 25 tons, which is equipped with a three-section boom, a lifting height of 10-21.5 m and a boom reach of 2.4-18.4.

The exposition of “AvtoKRAZ” HC and its partners has aroused an intense interest among the fair visitors, first of all as the KRAZ vehicles are well-known in Poland and enjoy authority as “unpretentious hard workers that easily overcomes any terrain”. In addition there is a real construction automotive equipment boom at the Polish

market caused by investment plans of construction of about 3 thousand kilometers of highways, 6 stadiums and a large quantity of hotels timed to Euro 2012.

Until 1992 the KRAZ vehicles were regularly supplied to Poland. Since 1960 about 8000 vehicles have been delivered to Poland. After the USSR collapse, the relations and trade channels acquired through the course of the years have been lost.

After 15 years the KRAZ vehicles of new generation are coming back to the market of Poland. For the last year, about three dozens of KRAZ vehicles have been supplied here. The major part of them is involved in work in the South of Poland, where the mining industries are concentrated.



Darush Monkosa, trade representative of the “AutoKRAZ Polska”

As **Darush Monkosa**, trade representative of the “Auto-kraz Polska” said “new KRAZ vehicles are bought as a rule by those who have already had an experience in KRAZ vehicles operation and know that the Ukrainian truck can cope with its tasks in difficult operating conditions in the best way and that they are unpretentious and reliable, as well as resistant to

difficult climate conditions”.

Many representatives of construction and mining enterprises interested in purchase of the KRAZ vehicles have visited the company stand. Most of them have already had KRAZ vehicles in their vehicle fleets and they are satisfied with their operation.

The exhibited crane has been sold out just at the exhibition to the construction company from the town of Boleslavets. This exhibition resulted in the considerable growth of the stock of orders for the KRAZ vehicles.

During their visit to Poland the representatives of “AvtoKRAZ” Holding Company have attended some open pits where KRAZ vehicles are operated. They have visited crushed stone pits of the “KRUSZGEO” company in Polish settlement Shcheguchitse, near Pilzno town. The new KRAZ-65032 vehicles are engaged there in carrying rock to the sorting unit, the haul distance is about 1.5 km. The old KRAZ vehicles operate in the pit as well.

In the pit “Shcheguchitse-1” near the sorting unit



The 32-year old KrAZ-255 makes nearly 30 trips every day



Grasping “krushevo” (mixture of crushed stone and sand in Polish) out of water, a crane generously load it on KrAZ-65032



Tadeush Elen', the senior master of the pit Shcheguchitse-1:

“For 10 years we have been using only KrAZ vehicles in work activity. Earlier we have used various trucks, such as Tatra or Mercedes. Then they stopped working and we started using only KrAZ vehicles, as they were the most suitable for our conditions. Now the trucks work from 6:00 am to 22:00 in difficult conditions. The trucks make about 30 trips per day. We are satisfied with the operation of the KrAZ vehicles”.



Ezhi Vadas, driver:

“I’ve been working on KrAZ for almost a year; earlier I worked on Tatra, Volvo, and Mercedes. Comparing with these trucks KrAZ is maybe less comfortable, but it perfectly copes with its tasks. I work 8 hours per day and make nearly 16 trips. KrAZ is an all-terrain vehicle! It is “on baliony” (ed. – it is how Polish drivers call vehicles on single-tyre wheels), so its cross-country ability is simply super! Our enterprise drivers treat the KrAZ vehicles with due care: every morning we carry out their technical inspection and every evening we obligatory wash them”.

A WAY TO EQUATORIAL GUINEA





The sales geography of the KrAZ vehicles is methodically expanding. In 2007 the heavy-duty trucks from Kremenchug appeared in Equatorial Guinea – a Central-African country situated a bit north of the equator. Leonid But, mechanic from the assembly shop, visited the Republic of Equatorial Guinea.

► What was the reason of your mission?

Nowadays nearly 40 KrAZ vehicles are operated in Equatorial Guinea. They are used in construction of a road of 40 kilometers in length. I was sent to this country to assist in maintenance, service and repair of the KrAZ vehicles supplied there.

These trucks were purchased by the “ICON” Company of Iran that carries out construction projects in many countries of the world, particularly, in Equatorial Guinea.

I was assigned a task to put into operation the second batch of vehicles, consisting of the KrAZ-65032 all-wheel drive dump trucks, the KrAZ-65053 fuel servicing trucks equipped with tanks of 12 and 15 m³ capacity and the KrAZ-6233P4 concrete mixer trucks (7 m³).

The first batch of the KrAZ-65055 dump trucks has been operating here since September, 2007. Here the average run of vehicles made nearly 10 thousand km.

I lived in a camp situated 10 km from the small Mokombo settlement near the town of Anizok; all the vehicles were there as well. All the managers and engineers at the road construction were Iranian specialists, while the drivers – local inhabitants. Before the drivers got down to work I had instructed them as to the peculiarities of KrAZ trucks operation and their maintenance, because they were not acquainted with our vehicles.

The KrAZ vehicles were operated in the extremely difficult conditions. Prior to my arrival the rainy season was just coming to an end. Here, the soil is clay, the country is mountainous, and so you just can imagine what happens here after heavy rains. Total impassability and impenetrable jungle!

The road construction required cutting down of glades, removing of trees, adding or taking out the ground for a road profile leveling. At the beginning the KrAZ vehicles were involved in taking out this heavy soil with the density of 1.5-1.8 t/m³. The groups consisting of 5-6 vehicles worked along the whole length of the construction site, often around-the-clock, only drivers changed work shifts. After it the roadway was rammed, and crushed stone was carried from the pit situated 150 km away.

At the present moment the “ICON” Iranian Company is also carrying out the target-oriented construction of an asphalt plant. The KrAZ-6233P4 concrete mixer trucks are operated there. Once a week fuel servicing trucks supply diesel fuel from port town of Bat to Anizok.



Just several months ago there were the jungles



Road construction is a real amusement for local kids



The KrAZ vehicles are involved in the work activity round-the-clock



To take out the heavy soil in the extreme conditions is not a difficult task for the KrAZ trucks!

► **What account did the KrAZ vehicles give of themselves in Equatorial Guinea?**

The Iranian company is very satisfied with our vehicles. The project directed by "ICON" involves only our KrAZ vehicles, trucks of other brands are not operated there. The Iranian specialists did not expect that vehicles can stand such conditions without repair or breaks, in spite of drivers' poor qualification. Not a single vehicle stopped during my presence there. Our vehicles turned out to be simply irreplaceable and gave an "excellent" account of themselves.

► **What do you remember most of all, what are your impressions of the country?**

It is an exotic country with hot and very wet climate. There are up to 2000 mm precipitations annually, and each second day in the year is rainy there. Equatorial Guinea is a small country; its population is only 500 thousand people.

The construction base was situated in the middle of nowhere, in jungle. We were encompassed with different dangers, such as snakes teeming in the exuberant vegetation.

In the villages, even in those which consist of several small houses it is obligatory to have a church, because the majority of inhabitants of Equatorial Guinea are Catholic. Magic plays a significant role in the life of population there. Sorcerers are still considered to be respectable members of the society. Cultural festivals, folk songs and dances are traditional activities for these people.

It was interesting to follow how women celebrated the 8th of March in Mokombo settlement in the neighborhood of our base. They went on demonstrating dressed in festival clothes (the inhabitants of Equatorial Guinea like bright clothes even in everyday life). Those who were preceding a group of demonstrators kept the portrait of the President. Thereafter the holiday was celebrated gaily, with songs and dances, for another 3 days.



BUILDERS OF SUBWAY BRIDGE



The construction of a subway bridge across Oka River in Nizhniy Novgorod (Russia) has already been going on for 10 years. Several years ago, the matter moved off the dead center: funds for the purchase of new engineering were allocated, and construction work was restarted. Among the purchased construction vehicles, there were concrete mixer trucks on the KrAZ-65053 chassis.

The KrAZ trucks were selected intentionally as a base for installation of mixers. Firstly, the specialists of bridge-building company in Nizhniy Novgorod are well acquainted with all the domestic trucks and they know that the KrAZ trucks will cope with their task best of all in difficult operating conditions. Secondly, the trucks from Kremenchug were operated in the Nizhniy Novgorod bridge-building company earlier, and enterprise specialists have experience in a competent maintenance and repair of these vehicles. Peculiar attention was paid to basic chassis price, as well as to such features as cross-country ability, safety, and spare parts availability.

Kremenchug vehicles did not get the easiest job. Since the end of 2007, when the trucks just got down to work, they had to storm the snow virgin land, icy upgrades and other obstacles. The KrAZ trucks perfectly showed themselves in the spring muddy season on wet clay where they had no equal due to the optimal axle load distribution and due to the good stability in the cross-country conditions. Once the MAZ-5516 dump truck working at the subway bridge construction failed to climb a slippery hill at the foot of which the KrAZ-based mixer was standing. Rolling down the hill with reverse gear engaged, the MAZ gathered rather high speed and ran into the front part of the KrAZ cab. A blow was taken mostly in

KrAZ solid frame and thus the engine and the cab were protected. The driver in the cab got no injury, and we had to replace only the KrAZ front part. Each truck has already exceeded 15 thousand km. They work from 8 a.m. till 8 p.m., under any weather and road conditions. Specialists note that they had no problems with the vehicles during this period.

And now a few words about the vehicles themselves. The KrAZ-65053 (6x4) appeared in the model range of the Kremenchug Automobile Plant in the middle of the 90's. It was originally designed as a chassis for installation of cranes, concrete mixers, oil-and-gas equipment etc. Depending on configuration the chassis payload varies within the range of 18-21 t, the frame installed length – from 5.5 m to 7 m. The KrAZ-65053 chassis was equipped with concrete mixing equipment of the Dzerzhinskiy Vehicle-Repair Plant with the capacity of 7 m³. The mixer drum is driven by an independent engine, installed behind the truck cab. The total load carrying capacity of the vehicle is 17.5 tons of concrete mixture.

Today the Kremenchug Automobile Plant produces a line of 7m- and 9-m³ concrete mixer trucks on 3- and 4-axes KrAZ chassis; moreover, it produces mixer trucks equipped with mixing equipment driven by means of hydro-mechanical drive from transmission, as well as from independent engine.

In addition to the new KrAZ concrete mixer trucks, the KrAZ-65101 platform and concrete pump on the KrAZ-250 chassis are involved in construction of the subway bridge.

Sergey Ukhov

HOLIDAY KALEIDOSCOPE



At the end of June “AvtoKrAZ” Holding Company celebrated just two holidays: Day of the Kremenchug Automobile Plant and the “KrAZ-2008” Motor-Show.



For the second year in a row, on the 27th of June, “KrAZ” celebrated the Automobile Plant Day as a holiday of Kremenchug’s automakers glory, recognition of professionalism and craftsmanship of the automobile plant workers and expression of gratitude for their labor. Holiday celebrations took place on the testing ground of “AvtoKrAZ” HC. Over 3 thousand of the plant workers, their relatives, and guests became participants of this breathtaking show; they got an inside look at the world of “KrAZ”, and see the capabilities of vehicles produced by Kremenchug automakers.

This holiday started with a vehicle parade. It was opened by historical vehicles reconstructed by hands of plant workers. They are exhibited in the plant museum: the KrAZ-222 “Dnieper” – first-born of the Kremenchug Automobile Plant, shock-worker in the construction of the Bratsk and Ust’-Ilimsk hydroelectric power stations, Karaganda Metallurgical Works and other large-scale constructions of the USSR; the legendary KrAZ-214 truck with M/1-20 gun-howitzer acknowledged as the best heavy military truck in the world; the KrAZ-2555 with a boat with cross-country ability had no equal and the KrAZ-260 with the “Hyatsinth” 152-millimetric gun.

The continuation of the strength and power parade was entrusted to the KrAZ production vehicles: dump trucks, fifth-wheel tractors, platform cross-country vehicles, special technical equipment on KrAZ chassis. The parade gave way to the demonstration of the KrAZ vehicles capabilities. Heavy-duty all-wheel drive trucks which inherently do not possess such qualities as agility and maneuverability, simply “flittered” on the polygon. The skillful art of overcoming different obstacles on the polygon, such as 60-centimeter vertical wall, forcing of a deep pool and springboard jumps drew a storm of applause.

This drive was a warm-up before the presentation of the enterprise new developments. A real furor was created by appearance of the KrAZ-7238C4 cab-over-engine dump truck, the “KrAZy Crocodile” show-vehicle and the KrAZ-5233BE sport automobile which went on marks of the “Lisbon-Dakar 2008” rally.

Zaporozhye cossacks of the horse theatre from the Hortitsa Island have shown their skills during the holiday celebration. The special operations detachment carried out demonstration trainings with the task of releasing the hostages taken by the terrorists.

For the first time in “KrAZ” history, on the occasion of the Automobile Plant Day, the best workers were awarded for their perfect work and high achievements with the medal “For Merits” instituted by the Company administration.



On the 28th of June the holiday of “KrAZ strength and power” moved to the central Kremenchug square named Pobeda Square, which hosted an impressive exposition of 33 KrAZ vehicles, both of serial production and the historical ones. Four years in a row “AvtoKrAZ” has presented this holiday – the “KrAZ 2008” motor-show – to the Kremenchug people and guests of the city.



Visitors of the motor-show could get familiar not only with a model range of “powerful heroes” produced by the automobile plant, but also see eye to eye with the “Dozor-D” armored carrier, BTR-4 of the Morozov Design Engineering Department (Kharkiv) and missile launchers of the Kremenchug Rocket Artillery Regiment, retro-vehicles of the “Faeton” Zaporozhye Motor Club, and the “Megamet” Kremenchug Club, as well as motor-cycles.

Opening the show, General Director of “AvtoKrAZ” HC Mr. Sergey Sazonov said: “The “KrAZ-2008” Motor-Show is the demonstration of the level that has been achieved by the biggest in Ukraine and one of the largest in the territory of the former Soviet Union automobile scene. The trucks we represent today are only the minor part of products manufactured by our Company. We work at the markets of dozens of world countries and we are in need of experts to conquer these continents. We create new models and we require vigorous hands. We are willing for KrAZ to restore its former strength and do all for it”.

The high spot of the show was the presentation of the “KRAZY Crocodile” show-truck made by “AvtoKrAZ” Holding Company, as well as of the latest development of the Kremenchug auto makers – the KrAZ-7238C4 dump truck with the cab above engine design that is absolutely new for “KrAZ”.

The important qualities of the KrAZ-7238C4 are the improved maneuverability and overview, ergonomics of the driver’s seat advanced up to modern requirements. For the first time the vehicle with the 6x4 wheel arrangement has reached 25 tons payload. The truck is equipped with the platform of a new design with semi-circular section of 15 m³ in capacity, Cummins engine of 380 h.p. (Euro-3) and Eaton gearbox.

A dark-green tuned truck with the “KrAZy” number plate has taken fancy of the Kremenchug people. Such a powerful, beautiful KrAZ truck has not been seen yet!!! The KrAZ-255B1 has become a base for “KRAZY Crocodile”. A truck cab is equipped with sleeping



Yevgeniy Taran, Victor Babenko, Vladislav Tswelykh – they breathed life into the “Crocodile”



compartment with a hatch in its upper part. There are two steering and two dashboards in the cab symbolizing the company capability to produce its trucks both with L.H. and R.H. steering. A powerful winch in the front part and jib crane form the armory due to which KrAZ can recover or tow any stuck or broken truck. Brilliant rivets, chrome plates diesel locomotive horns, unknown gears, pirate chest, cash of beer, huge exhaust pipes on the cab sides, air filters on the front fenders, massive chromized bumper with “bonnet guard” of incredible design and dimensions – that is an impertinent and swashbuckling approach to creation of show-stopper!

During the press-conference Mr. Sergey Sazonov, General Director of “AvtoKRAZ” HC noted: “The creation of a show-truck is the step to the company possible rebranding. The existing brand has its drawbacks. We have analyzed KrAZ in terms of its appearance, psychological perception and have found out that the next by perception creature in the fauna is a crocodile which outlook has

not been improved by the million-years evolution. He was a stupid, sharp-nosed, not a very attractive sharp-toothed log but which swims, crawls and runs with the fantastic speed, and it has remained the same. It is respected by everybody, it can survive in any conditions and it is actually a phenomenon from the view point of vital force and energy given by the nature. KrAZ is the same by appearance. Not the most attractive one... Surely, it can not be brought into line with Mercedes “Actros”, for example, or with any other “fashionable Europeans”. But take a look, how it transforms when it is in his element: marsh, dirt, mountains and sands. It operates there with the maximum efficiency, at a higher level than “fashionable Europeans”. KrAZ has the same “nose”, the same powerful heart and powerful paws, the same powerful skeleton. It will pass everywhere! By creating this truck we have shown an immense stretch of imagination of design engineers, of those who work at “KRAZ”. This is a phantasmagoria, image of KrAZ filled with energy which is powerful and catching in any form, even in such a fantastic one”.

ARCTIC HEAVY-DUTY TRUCKS



Creation of a north modification of the KrAZ-256B dump truck in the model range of the Kremenchug Automobile Plant has required some time. In the 60-ies the industry of Siberia has developed intensively: the plants evacuated across Ural during the War were expanding, the new ones were built, new towns appeared in place of taiga villages. The most powerful and exclusive railway main line "Moscow – Vladivostok" did not reach the places of explored reserves of oil, gas, coal, gold, diamonds in Yakutia, North-Western Siberia, beyond the Northern Arctic Circle. The intensively developing industry and development of inexhaustible natural resources have required vehicles adapted to operation in severe climate and cross-country conditions.

Three prototype models of the KrAZ-3256BC of a north modification were designed and produced on request of the Ministry of Automobile Industry of the USSR by the beginning of 1967.

Cab of an arctic dump truck was heat-insulated and had the double-glass window. Truck was equipped with the device for heating a powerful storage battery and fuel tank with the help of exhaust gases. This vehicle also had a cab heater. For engine to start up easily after parking at low temperatures the trucks were equipped with more powerful prestarting preheater. The "start-pilot" was installed to provide the engine emergency starting. Automakers installed the electromagnetic fan clutch into the engine as well as radiator blind instead of radiator gill. It enabled to keep a normal temperature mode of an engine and ensure its stable work. The parts manufactured of plastics, metal ceramics and special sorts of cold-resistant rubber became common use in the northern trucks design.

Tests of the trucks were conducted in two stages: first – at the plant and then in another enterprise with the state committee at the head for controlling the process.

By autumn 1967 "KraZ" has accomplished the factory tests of all the three models, where each of them had a run of nearly 9 thousand km.

Since December the tests of the KrAZ-3256BC at the state level have been started. A program determined the test site in Krasnoyarsk Territory, city of Norilsk – the Norilsk Order of Lenin Mining-and-Metallurgical Integrated Works.

Just from the airplane board the "heroes" from Kremenchug happened to come into the pit of the Mining-and-Metallurgical Integrated Works. The effectiveness of design innovations was thoroughly proven in the course of testing.

Strength and endurance examination has been carried out from February till April 1967. The dump trucks have got an "excellent" mark.

In the process of testing the trucks have shown considerable advantages over their "non-northern" fellow trucks. At the environmental temperature of -47°C the temperature in the cab was fixed at the level of $+24^{\circ}\text{C}$. The system of fuel tank and storage battery heating worked effectively and allowed to increase the temperature difference in relation to the environmental temperature from 15 up to 34°C . All the devices operated trouble-free. According to the parameters fixed during the state tests, the temperature in the storage battery box reached $+12^{\circ}\text{C}$ with the full heating switched on, while the outboard temperature made -27°C .

Dmitriy Demchenko, test manager from "KraZ" informed about the results of the northern KrAZ trucks operation: "Cab is warm and sealed. Driver works in light working clothes. Engine starts without problems. Prestarting preheater shows an excellent operation. This truck makes a good impression. The tests have being performed. There is no idle time due to the absence of breakages. Trucks

successfully perform their work according to their “profession” and function. We transport ore from the pit to the processing plant. We make 10-12 trips per shift carrying 124-250 t of load. Daylight hours make almost 14 hours, and 8 minutes are added to it every day. The sun shines, but it does not warm.”

During the testing period at the Norilsk Mining-and-Metallurgical Integrated Works the KrAZ-Э256БС dump trucks have transported in general almost 30 thousand tons of ore, each of them ran 20 thousand km in the pit conditions which are characterized by frequent turns, upgrades and descents, snowdrifts, and they showed high economic effectiveness of transportations. After considering the results of testing the inspection board recommended to launch the production of northern KrAZ-Э256БС trucks.

The arctic KrAZ-Э256БС started to come off the assembly

line in 1969. Its manufacture has been stopped in 1980. It was for the first time ever that the domestic dump truck was intended for operation at the environmental temperature down to -60 °C. In 1981, after complete adaptation of the modernized KrAZ-256Б1 dump truck with new split double-circuit pneumatic brake system on the assembly line, the arctic modifications of KrAZ-256Б1С were launched into production on its base; their production lasted for more than 10 years. The last KrAZ-256Б1С dump truck was assembled in January 1994. The Kremenchug Automobile Plant has manufactured totally 13608 arctic dump trucks in general. Here 1901 units were represented by KrAZ-256БС, the remaining vehicles were KrAZ-256Б1С.

By implementing the practiced solution, the plant worked out arctic modifications of all the vehicles belonging to the second family and being produced at that time. produced at that time.

KRAZ-65032-064: THE BEST TRUCK FOR THE NORTHERN LATITUDES!

Nowadays “AvtoKrAZ” offers its customers the KrAZ-65032 all-wheel drive dump truck with the 6x6 wheel arrangement for transportation of bulk cargo on all the road types in the northern latitudes conditions.

This truck equipped with the platform of 12 m³ capacity can carry 14 tons of load.

The arctic vehicles are equipped with double-

glass windows, Webasto prestarting preheater, front glass electric heater, storage battery and fuel tank heater. The dump truck platform is heated with the help of exhaust gases.

The powerful 330 h.p. YAMZ turbocharged engine, all-wheel drive, wide cross-section tyres 30/70R21 (550/75R21) ensure its perfect operating capacity in hard-to-reach and boggy areas of northern roads enabling it to cope with any task.



AMATEUR TUNING

“Why have I chosen the KrAZ? Because I needed a reliable and powerful vehicle which would be capable to transport heavy loads. So I’ve got it. My truck tows a 30-ton trailer, plus 60 tons atop.”



One warm summer day an unusual KrAZ truck stopped at the central entrance to “AvtoKrAZ” HC attracting the attention of passers-by who were in a hurry on business.

The truck’s owner is Yuriy Ustimenko, driver from Dneprodzerzhinsk. At the beginning of the 90s he started to re-equip his truck trying to make it dissimilar to its “relatives”, produced by the Kremenchug Automobile Plant. Since then for almost 15 years KrAZ-255 has been involved in transportation of heavy loads on large distances travelling around the country and surprising everybody with its appearance.

“We came to the plant-manufacturer of KrAZ trucks in order to demonstrate our “brainchild”, – Yu. Ustimenko says. – I’d been assembling it with my own hands from purchased spare and component parts for a year and seven months.

Why have I chosen the KrAZ? Because I needed a reliable and powerful vehicle which would be capable to transport heavy loads. So I’ve got it. My truck tows a 30-ton trailer, plus 60 tons atop.

The vehicle is equipped with two turbines and two hydraulic boosters. It makes up to 100 km/h, but we run with such a speed not very often, we prefer to keep the speed of 70 km/h. I’ve equipped the truck with air conditioner, on-board computer which measures pressure in the transfer box, temperature in the axles, gearbox, hub etc. All devices in my truck are electronic.”



The base of the truck is the famous KrAZ frame, 330 h.p. YAMZ engine, axles, transfer box and tyres.

There are two seats in the cab: for driver and passenger, with an entrance to the living quarters between them. Here there is all you need for a long-distance trip: on both sides of the box van there are two berths with a folding table over one of them and boxes for storage of some domestic things under both of them. There is a small refrigerator, shower cabin with water flowing from the tanks placed on the roof: one of them contains 110 l of cold water, the other – 70 l of hot water, heated up autonomously.

You can easily go for a long-distance run or pleasure trip with such a vehicle. All you need is at your hand!

“AVTOKRAZ” TRAINING UNIT IS THE BEST ONE IN UKRAINE



Computer class of the training unit

A new training unit of “AvtoKrAZ” opened its doors. The present unit claims to be the best one in the territory of the former Soviet Union.

The training unit is technologized according to the up-to-date standards. Here, all the categories of “AvtoKrAZ” HC staff are trained, retrained, have their qualification improved; besides, the unit deals with training of the service and dealer centers specialists as well as training foreign specialists how to operate and maintain KrAZ vehicles of all modifications.

The training unit can ensure a simultaneous training of 100 technical specialists.

All the classes are equipped with video and audio facilities.

The automobile classes are intended for studying design of KrAZ vehicles, peculiarities of their maintenance and repair. The aggregates and split units of KrAZ vehicles are used as visual aids.

In the computer class, technologized with modern computer and office equipment, the “AvtoKrAZ” HC staff studies operation in OS Windows XP and in modules of the “Galaxy” complex informational system implemented in the enterprise etc.

A class of welding, lifting, electric equipment and pressure tanks is outfitted with stands and production prototypes.

A prototype of lifting equipment consists of the beam

crane, arm crane and monorail.

Welding equipment is presented by the welding unit, CO₂, oxygen, acetylene and kerosene cylinders as well as by welder’s tools.

Switches, relays, control buttons, solenoid starters, fuses, contactor, contact-breaker, automatic switches and distributing board are placed on the electric equipment stand.

Different courses improving a qualification of “AvtoKrAZ” HC specialists are carried out for engineers and technicians in the training class.



Class of welding, lifting, electric equipment and pressure vessels



Split units and devices in the automobile class

LEASING FROM THE MANUFACTURER



The shortest way to
Your business success

JXZ 37-4.16HP
concrete pump on the
KrAZ-65053 chassis



KrAZ-6333P4
motor-truck
concrete mixer

KrAZ-7133C4-021
dump truck



KTA-28 crane truck
on the KrAZ-65101
chassis

Leasing term – from 12 to 60 months
Advance payment – 20-30%
Interest rate – 10-18% per annum

Trade House of "AvtoKRAZ" HC
2, Yaroslavskiy Proyezd Str.,
Kremenchug, Ukraine
Tel.: +38 (0536) 76 63 13, 77 89 86
E-mail: sale@autokraz.s-net.net.ua
www.autokraz.com.ua

"KrAZ-LEASING" Co., Ltd
33, Yanvarskogo Vosstania Str.,
Kiev, Ukraine
Tel.: +38 (044) 201 03 54, 201 03 58
E-mail: lizing@autokraz.kiev.ua
www.autokraz.com.ua