

## THE USE OF PAINTS AND VARNISHES IN AUTOMOBILE TRANSPORT

**Sabirova Dilorom Kabulovna**

*Tashkent State Transport University*

*Candidate of Technical Sciences, Associate Professor*

**Annotation:** *In the socio-economic life of the Republic of Uzbekistan, Road Transport and highways, which are another important part of the transport system, also occupy one of the important places. There is not a single sector of the national economy that does not use Road Transport. The importance of automobile transport in the transportation of cargo and passengers over short distances, in the provision of services to residents and organizations in settlements where there are no other types of modern transport, especially in mountainous areas that are unfavorable for transportation, is invaluable. This article will walk you through ideas and considerations about the use of paints and varnishes in road transport.*

**Keywords:** *car, transport, paint, varnish, use, car parts, process.*

Depending on the importance of highways, the location of the population has been formed, and this process continues now. On roads of this international, state and local importance, the population is quite densely populated. But, road transport consumes only a lot of fuel compared to other transport networks and causes only minor damage to the environment. as a measure, it is advisable to use cars powered by an electro dvigatel.

The material and technical base of the country's Motor Transport is being strengthened. The fleet of vehicles is imported from foreign countries (Germany, South Korea) and is increasingly Updated at the expense of buses, passenger cars produced in our homeland. Auto plants, road construction farms are provided with modern techniques. All this will serve the development and prospects of our motherland. The prospect of connecting Uzbekistan with neighboring distant foreign countries is opening up by road transport. Our country turns out to be Initiative or directly participates with all the countries of Central Asia. For example, the role and essence of transport in the socio-economic development of any territory and raising the standard of living of the population is incomparable. Transport is one of the most important branches of material production. The level of its development has a direct impact on the country's economy, the location and development of productive forces in it.

Over time, the paintwork of any car loses its original appearance, while its protective properties are also reduced. The main factors affecting the destruction of the paint layer of the car:

1. ambient temperature;
2. chemically active environment;

3. ultraviolet radiation;
4. external mechanical loads.

At the same time, if the vehicle operates in conditions of increased dust and air pollution, the rate of destruction of paints and varnishes increases significantly (up to one and a half times). In such a situation, aggressive gases present in the atmosphere accelerate the process of destruction: CO, SO<sub>2</sub>, NH and others. With constant preventive care, premature aging of the paint can be prevented, but this process cannot be completely stopped. In some cases, it is possible to restore the paint layer by performing a small repair, which consists in local staining of the problem part of the body. In the event of more serious problems (cracking and cleaning of paint, the appearance of bubbles and corrosion centers, etc.), a complete painting of the vehicle is required. The process of painting a car is a very time-consuming and time-consuming work, which is usually trusted by professional car artists. However, if a motorist, for some objective reason, wants to do this work on his own, then painting a car body with his own hands in the conditions of a "garage" requires some theoretical knowledge and practical skills.

Before performing work, it is necessary to choose a place for painting and carefully prepare it. The spray booth should be equipped in a well-ventilated indoor room. The correct Organization of lighting requires appropriate attention. For self-painting of a car, a fine dispersive paint powder is used, the particles of which inevitably fall into the air during the spraying process, which remain in a suspended state and significantly worsen the interior appearance. In addition, insufficient lighting prevents you from seeing all color defects that may appear on the car body during Operation. For best results, it is recommended to use ceiling and wall light sources at the same time, the use of which provides the necessary comfortable conditions for high-quality painting in the car body.

This is the most time-consuming part of the car body painting process. Both the visual appearance of the car and the service life of the paint and varnish materials applied to the body depend on the quality of their implementation. First of all, the car must be well washed from dust and dirt. In this case, special attention should be paid to cleaning the trunk, the interior of the doors and the engine compartment. This is necessary in order not to blow dust from these gaps of the car during the process of spraying paint under high pressure. As additional protection against dust, you can use moistened cloth covers that are evenly distributed over the inner surface of the doors. The absence of a drying chamber is fully compensated by the use of an industrial hair dryer.

After washing, all decorative parts must be removed from the machine, and all non-removable elements that do not need to be painted must be protected from painting with masking tape or a special mixture that prevents painting parts. Partial dismantling of body parts, such as:

1. luggage cover;
2. doors;

3. foam;
4. wings.

The next stage of preparation is the identification of the Centers of corrosion of the metal. To do this, in the maximum light, the car is checked for the presence of rust, after which measures are taken to remove it. Corrosion can be eliminated mechanically and chemically. The mechanical method consists in cleaning the surface of the car from rust using abrasive tools and materials. Corrosion of a large area of the body is removed using an orbital machine. To prevent the formation of dust, paraffin or white spirit is applied to the damaged part of the body before mechanical cleaning. The chemical method involves exposure to corrosion centers using special compounds that effectively dissolve rust without damaging the metal surface.

Next, you need to grind and degrease the entire car body. To do this, the entire surface painted is processed using an orbital machine with abrasive abrasive wheels to a stage where the old paint layer has the same matte shade. After that, all the dust formed during operation is removed from the surface of the body. The lining of the body is the next stage of preparatory work. Acrylic primer is used as a primer mixture, with the help of a sprayer it is recommended to apply the primer evenly over the entire surface of the car, at least twice, this will allow each layer to dry well.

The most effective way to paint is to spray paint powder with a special gun - sprayer. The main task of this method is to choose the desired diameter of the gun nozzle based on the percentage of adhesion of the paint. An incorrectly selected nozzle diameter leads to the appearance of streaks and irregularities on the painted surface of the body. In the process of spraying paint, the optimal removal of the automaton from the surface of the car is from 30 to 35 cm. Deviation above this value leads to excessive consumption of Coloring matter and poor adhesion of paint to the metal surface. smaller-to the formation of lines and Stripes.

1. The next layer has a larger thickness and is applied to the metal surface perpendicular to the first layer of enamel. This method of spraying paint will avoid the appearance of unpainted areas of the car. The thickness of the last layer is less than the thickness of the second, and the enamel is less dense. When deciding which paint to choose for a car, keep in mind that the surface can be:

2. shiny. The car shines brightly, reflecting the sun's Rays. This type of surface is possible when choosing any paint for cars, except for alkyd - when applying it, the surface will need to be additionally varnished and polished;

3. mat. Such a surface does not shine and does not reflect objects. Achieving this effect is possible when using alkyd enamels and special matte varnishes;

4. metal. A special pigment is added to the enamel, which gives the metal shine. This type of coloring has its own difficulties - it is better to entrust it to professionals;

5. chameleon.

Painting a car is the stage of repair work that can completely transform your car at a reasonable price. Great opportunities open up for the owner who decides to completely paint the car body:

1. change aesthetic characteristics, refresh the shade or choose a unique color, thereby giving originality and original luxury;

2. complete painting of the car, the cost of which, as a rule, is not prohibitive, gives the body an ideal appearance and, accordingly, maximizes the cost of the car;

3. Get a practically new car by painting the body while maintaining the familiar and beloved - this is for those who value a specific car or for those who consider it wrong to overpay for the purchase of a new car, if it can be improved over and over again. the quality of the existing.

**In conclusion**, the material and technical base of the country's Motor Transport is being strengthened. The fleet of vehicles is imported from foreign countries (Germany, South Korea) and is increasingly updated at the expense of buses, passenger cars produced in our homeland. Auto plants, road construction farms are provided with modern techniques. All this will serve the development and prospects of our motherland. The prospect of connecting Uzbekistan with neighboring distant foreign countries is opening up by road transport.

#### REFERENCES:

1. Amirov A., Geyumov A. Mechanical engineering technology. Training manual. - Tashkent, Uzbekistan: 2003

2. Gurin F.V., Klepikov V.D., Rein V.V.. Automotive technology. Textbook. - Tashkent, 2001

3. Mamatov X. Cars. Part 1. Textbook. - Tashkent, Uzbekistan: 1995

4. Mamatov X. Cars. Part 2. Textbook. - Tashkent, Uzbekistan: 1998

5. Feyzullaev E. and others. The structure and theory of the vehicle. Textbook. - Tashkent, new age generation: 2006

## MATEMATIKA FANINI O'QITISH JARAYONIDA NAZARIY PEDAGOGIKADAN FOYDALANISHNING MUHIM JIHATLARI.

**Yulchibayeva Gulnoza Bahodirovna**

*O'zbekiston Respublikasi Ichki ishlar vazirligi matematika fani o'qituvchisi*

**Annontatsiya:** *Ushbu maqolada matematika fanini o'qitish jarayonida nazariy pedagogika haqida hamda dars o'tish jarayonida zamonaviy metodlar haqida fikr yuritilgan.*

**Kalit so'zlar:** *Matematika, nazariya, amaliy, pedagogika, natija, o'quvchi.*

Zamonaviy ta'limni tashkil etishda qo'yiladigan muhim tadbirlardan biri ortiqcha ruhiy va jismoniy kuch sarf etmay, qisqa vaqt ichida yuksak natijalarga erishishdir. Qisqa vaqt orasida muayyan nazariy bilimlarni o'quvchilarga yetkazib berish, ularda ma'lum faoliyat yuzasidan ko'nikma va malakalarni hosil qilish, shuningdek, o'quvchilar faoliyatini nazorat qilish, ular tomonidan egallangan bilim, ko'nikma hamda ma'lum faoliya yuzasidan ko'nikma va malakalarni hosil qilish, shuningdek, o'quvchilar faoliyatini nazorat qilish, ular tomonidan egallangan bilim, ko'nikma hamda malakalar darajasini baholash o'qituvchidan yuksak pedagogik mahorat hamda ta'lim jarayoniga nisbatan yangicha yondashuv talab etadi. Bugungi kunda bir qator rivojlangan mamlakatlarda bu borada kata tajriba to'plangan bo'lib, ushbu tajriba asoslarini tashkil etuvchi metodlar interfaol metodlar nomi bilan yuritilmoqda. Ta'limni isloh qilinishi jarayonining ajralmas, muhim qismi hisoblangan zamonaviy pedagogik texnologiyalar, interfaol metodlar ta'lim jarayoniga o'zlari bilmagan holda qiziqishi bilan kirishib ketadilar. Tajriba shuni ko'rsatadiki, zamonaviy interfaol strategiyalar bo'lga bilimlarni samarali o'zlashtiradi. Chunki bugun sinflarni to'ldirib o'tirgan o'quvchilar sho'x beg'ubor bolalik gashtini surayotgan, ba'zan xayolparast bolalardir. Ular orasida hatto 45 daqiqalik dars jarayonining nihoyasini intiqlik bilan kutib, ta'limga yuzaki qaraydigan o'quvchilar ham yo'q emas.

Matematikani o'qitishda texnologiyadan foydalanishning kengaytirilganligi o'quv jarayonini yanada moslashtirishga imkon beradi. Ikkala o'quvchi bir-biriga o'xshash emasligi sababli, texnologiya individual talabalarga, ayniqsa, ularning shaxsiy ehtiyojlari uchun foydali bo'lgan tarkib va yordamlarni taqdim etishi mumkin. Bolalar darslarni, o'quv qo'llanmalarini, ekran yozuvlarini va boshqa o'quv vositalarini o'z qurilmalarida va o'zlarining tezligida ko'rishlari mumkin. Shunday qilib, agar bitta talaba hanuzgacha mavzuda adashib qolgan bo'lsa, boshqasi qo'shimcha muammolarga tayyor bo'lsa, texnologiya har biriga tegishli keyingi qadamni qo'yishga imkon beradi.

Matematik ta'limga texnologiyani integratsiyalashuvi uchta muhim omil bilan bog'liqligi aniqlandi; texnologiya, o'quv faoliyati va vazifalarini loyihalash; o'qituvchining