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SOURCE Newspapers and periodical as indicated.

BEARING PLANT INCREASES OUTPUT, CUTS WASTE;  
DISCUSS TRACTOR DEFECTS;  
TRUCK BASES OVERECONOMIZE ON LUBRICANTS

STATE BEARING PLANT USES STATISTICAL CONTROL METHOD -- Moscow, Vechernyaya Moskva, 2 Mar 51

The statistical control method is being applied successfully in the automatic lathe shop, small series shop No 1, ball-bearing section, rod and tube bearing section, and other sections of the First State Bearing Plant imeni L. M. Kaganovich.

The groove-grinding division of the ball-bearing shop had not been fulfilling its plan and had been turning out defective parts. By the combined efforts of Stakhanovites, technologists, and repair men, all the equipment has been put in order and tested for accuracy. This has made it possible to use the statistical control method on 32 machine tools. Many grinding machine operators have increased their output, eliminated waste, and now machine only excellent races while operating two or three machine tools. The groove-grinding division promises to fulfill its March plan 3 days ahead of time, to win the title of excellent-quality division, and to put 50 groove-grinding machines on statistical control by 1 April.

There had been a great deal of waste in the automatic lathe shop because of the eccentricity and depth of the races. Technologists replaced worn supports with new ones and replaced jaw chucks with collet chucks, thus increasing accuracy and decreasing waste.

BEARING PLANT SAVES METAL -- Moscow, Moskovskaya Pravda, 14 Mar 51

During the Stakhanovite watch in honor of the session of the Supreme Soviet USSR, the First State Bearing Plant imeni L. M. Kaganovich saved more than 100 tons of metal, and hundreds of thousands of rubles on tools and auxiliary materials. It assembled tens of thousands of bearings above plan.

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USE OLD BEARINGS TO REPAIR STZ-NATI TRACTOR -- Moscow, Seriya Remont, Feb 51

In repairing the STZ-NATI tractor, it is often necessary to replace two 4010 support roller bearings with a single support roller bearing from the ChTZ tractor. This is done by turning the STZ-NATI support roller down to 40 millimeters on a lathe and fitting the ChTZ bearing to it with the aid of several discarded ChTZ piston rings.

SUPPORT ROLLER BEARINGS WEAR QUICKLY -- Moscow, Seriya Remont, Feb 51

The support roller bearings for the S-80 tractor are pressed into the roller housing and fastened with six bolts. According to the factory, a clearance of minus 0.041 millimeter to plus 0.100 millimeter is permissible in fitting the bearings into the roller housing.

During operation, the bearing becomes loose in the housing, and all the load is transferred to the bearing fastening bolts, which weaken and finally shear off. When this happens, the bearing stands still and the roller operates with great friction against the bearing body. The external surface of the bearings and the walls of the openings in the support rollers wear away. Together with the wear on the bearings, the self-tightening packing glands get out of order, and lubrication of the support rollers is disrupted.

The Yermov MTS, Saratov Oblast, has devised a special jig for machining and restoring support roller bearings.

DIFFERENTIAL RIM GEARS CRACK AT RIVETS -- Moscow, Seriya Remont, Feb 51

The differential rim gear of the SKhTZ wheeled tractor has four rivet grooves equally spaced along its circumference. These grooves are for the rivets which hold the rim gear to the boss of the right half of the differential housing (part 111). The rim has 75 teeth. Since this figure cannot be divided by 4, all the grooves do not coincide with a tooth axis. Usually, one of them coincides with the axis of a tooth and the rest are displaced. In this case, one of the grooves is so close to the root of a tooth that it weakens the rim, and cracking and breaking often take place here. To remedy this defect, the rivet grooves should be relocated so that they fall in line with the axes of the gear teeth. This should be done without changing the rotation characteristics of the rim.

DT-54 FUEL PUMPS MALFUNCTION AFTER SHORT SERVICE -- Moscow, Seriya Remont, Feb 51

The fuel pump rod guide of the DT-54 tractor is not fixed at the point where the ball pin and the rod coupling are joined. After slight wear of the joint parts, the rod guide becomes disconnected from the rod coupling. As a result, there is overfeeding and consequent waste of fuel, and it becomes impossible to regulate fuel feed. This can cause a breakdown of the diesel motor. The Sovkhoz Imeni Budenry, Shadrinskiy Rayon, Kurgansk Oblast, is installing one-piece fuel pump rods of altered design which can be made in any MTS shop.

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MODERNIZE MACHINE TOOLS FOR HIGH-SPEED METAL CUTTING -- Stalinabad, Kommunist Tadzhikistana, 14 Mar 51

High-speed metal cutting is finding ever wider application at the Stalinabad Traktorodetal' Plant, which makes rocker arms for the STZ-NATI tractor, fan pulleys and pistons for the Universal tractor, and other parts.

The former maximum cutting speed at this plant was 40-50 meters per minute; now it is 100-200 meters per minute. The plant had more than 50 machine tools working on the high-speed method at the beginning of 1951. The plant's machine tools were not sufficiently powerful for conversion to high-speed cutting, but in almost every case it was possible to modernize them by increasing their power and rotation speed. This task did not require much work or time.

The plant's workers are chiefly young people who have graduated from trade schools. Many of them are already setup men and foremen. However, it must be noted that these young people did not receive even an elementary understanding of high-speed metal cutting or of the new geometrical principles of cutting tools in the trade schools. This must be attributed to serious shortcomings in the trade school courses, which should be corrected by the Administration of Labor Reserves.

Efforts are being made to asphalt the ground in the plant's production shops to improve the machine-tool operators' working conditions. -- S. Kovrigin, engineer-technologist, Traktorodetal' Plant

PRODUCE SPARE PARTS FOR TRACTORS -- Vil'nyus, Sovetskaya Litva, 8 Mar 51

The Kaunas Metalas Plant fulfilled the first-quarter plan for casting spare parts for tractors and agricultural machinery on 18 February. Plant personnel promised to fulfill the first-quarter plan by 25 March, to put out 600,000 rubles' worth of above-plan production by the opening day of the Seventh Congress of the Lithuanian Communist Party, to fulfill the first-quarter plan for agricultural machinery spare parts by 15 March, and to save 55,000 rubles' worth of materials, fuel, and electric power.

SHIP TRACTORS, TRUCKS TO CANAL SITE -- Leningradskaya Pravda, 18 Mar 51

The Chelyabinsk Tractor Plant imeni Kirov has already shipped a consignment of tractors, which were to have taken a year to build, to the Volga-Don Canal site. The Moscow Automobile Plant imeni Stalin, the Mytishchinskiy Automobile Assembly Plant, and the Gor'kiy Automobile Plant imeni Molotov have completed orders from the Volga-Don Canal builders for many types of trucks.

MAKE CONNECTING RODS IN PARTS PLANT -- Moscow, Pravda, 16 Feb 51

The machine shop of the Kuybyshev Avtotraktorodetal' Plant has organized the production of connecting rods for the ZIS-5 truck without acquiring additional production space or machine tools.

SKIMP ON LUBRICANTS, CAUSE TRUCK BREAKDOWNS -- Leningradskaya Pravda, 2 Mar 51

Trucks are breaking down at the First Bread-Baking Trust because of insufficient lubrication. In one case, only 40 percent of the compulsory norms of nigrol and solidol was used for greasing. The automobile bases of the

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Administration of Trade in Foodstuffs, the Transport Office of Building Trust No 19, the Central Automobile Park of Lenenergo, (Leningrad Regional Electric Power Administration), and a number of other organizations have reduced the consumption of lubricants like nigrol and solidol by one half, to the detriment of motor transport.

Documents available at the Krasnyy Neftyanik Petroleum Base show what a variety of lubricants transport organizations receive. Automobile Inspection workers are to be censured for not seeing that the norms for automobile lubrication are observed, and for looking machines over superficially. -- P. Sudakov, chief, Sales Department, Krasnyy Neftyanik Petroleum Base

MAKE SEALING OF SPEEDOMETERS COMPULSORY -- Moscow, Seriya Remont, Feb 51

In conformance with State Automobile Inspection, all motor vehicles must have sealed flexible speedometer shafts. The shaft must be sealed at the points where it is attached to the speedometer and the speedometer gear drive shaft.

BICYCLE PLANT ADOPTS NEW METHODS -- Riga, Sovetskaya Latvija, 6 Mar 51

The Riga Sarkana Zvaygzne Bicycle Plant has increased the output per unit of equipment 20 percent in one year by applying high-speed methods, modernizing machine tools, and extending Stakhanovite methods. Last year the enterprise fulfilled the plans for gross production and range of items and gave the state 2,276,000 rubles above the plan. Bicycle output in 1950 was five times the prewar output.

In the near future, the plant will increase the speed of metal cutting on automatic machine tools to 120 meters a minute, and will raise the productivity of milling machines 50 percent. Welding will be mechanized and made automatic, and many parts which are now ground will be drop forged.

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