

Development of forging production ...

S/775/62/002/003/002/011

operations. Combination-type AFL are combinations of an initial, relatively simple, forging operation with a sequence of subsequent machining operations. Projected degrees of the introduction of manipulators and cranes (as means of mechanization) and automatic machines and lines (as means of automation with and without mechanization) are tabulated in 2 tables. Production economy of forging plants: Capital investments during the 7-yr Plan are anticipated to exceed 3,500 million rubles (at the price level of 1960). The tabulated projection anticipates a 25% reduction (R) in open-die forging labor consumption (per ton of product), 38-40% R in closed-die forging labor consumption, a 17 to 22% better utilization of the metal, and a 7-17.6% R in cost per ton of medium-carbon steel. There are 8 tables; no figures or references. ✓

ASSOCIATION: None given.

Card 5/5

S/182/62/000/001/001/004
D038/D113

AUTHOR: Mansurov, A.M.

TITLE: Development trends of industrial forging in the USSR

PERIODICAL: Kuznechno-shtampovochnoye proizvodstvo, no. 1, 1962, 1-5

TEXT: The reorganization and development of the Soviet machine building industry, and in particular that of industrial forging, is reviewed. This development will be realized during 1961-1980. The planned expansion of the machine building industry will be carried out to considerably increase the production of forgings, change their structure and improve their quality. To ensure a rational distribution of a wide nomenclature of forgings it is planned to: (1) build over 40 large specialized forging plants and forge shops in areas of the metallurgical industry, (2) introduce new types of fully mechanized and automated forging equipment, (3) introduce program control, (4) provide stamping and forging equipment and heating installations with remote control, (5) equip all automatic machines producing forgings by rolling and pressing with induction heaters, and (6) equip heat treatment furnaces with electronic and automatic controls. Furthermore, it is planned to use 70% of natural gas, 20% of electric power and 10% of

Card 1/2

Development trends

S/182/62/000/001/001/004
D038/D113

fuel oil in heat treatment furnaces. The author states that metallurgical plants will have to supply higher quality forgings to meet the requirements of automated production, as up till now these plants, in conformity with **ГОСТ** 535-58 (GOST 535-58), have supplied hot rolled bars of inferior quality. There are 4 figures and 5 tables. ✓

Card 2/2

MANSUROV, A.M.

New Tatra motortrucks. Art.prom. 28 no.8:44-46 Ag '62. (MIRA 16:3)
(Czechoslovakia--Motortrucks)

MANSUROV, A.M. , inzh.

Factors affecting the output of automatic presses, automatic
lines and press units with advancing action. Vest.mash.
42 no.3:70-73 Mr '62. (MIRA 15:3)
(Forging machinery)

MANSUROV, A.M.

Designing plants for mass and large-batch production of forgings.
Kuz.-shtam.proizv. 5 no.8:2-6 Ag '63. (MIRA 16:9)

MANSUROV, A.M.

Prospects for the further development of forging in the
U.S.S.R. Kuz.-shtam proizv. 4 no.1:1-5 Ja '62. (MIRA 17:3)

BYALKOVSKAYA, V.S.; MANSUROV, A.M., inzh., retsenzent; BABENKO,
V.A., dsts., red.

[Economic problems of mechanization and automation in
forging] Ekonomicheskie voprosy mekhanizatsii i avtoma-
tizatsii v kuznechnom proizvodstve. Moskva, Mashino-
stroerie, 1965. 203 p. (MIRA 18:7)

MANSUROV, A.M.; ZHUKOV, A.A., inzh., retsenzent; BABENKO, V.A.,
inzh., red.

[Mechanization and automation in forging] Mekhanizatsiia
i avtomatizatsiia v kuznechnom proizvodstve. Moskva, Ma-
shinostroenie, 1965. 211 p. (IRA 18:4)

ACC NR: AT7007352

(A)

SOURCE CODE: UR/0000/66/000/000/0111/0123

AUTHOR: Mansurov, A. M.

ORG: None

TITLE: Basic principles in the design and planning of new forging and stamping shops

SOURCE: Soveshchaniye po avtomatizatsii protsessov mashinostroyeniya. 4th, 1964. Avtomatizatsiya protsessov svarki i obrabotki davleniyem (Automation of welding and pressure treatment processes); trudy soveshchaniya. Moscow, Izd-vo Nauka, 1966, 111-123

TOPIC TAGS: forging machinery, industrial automation, metal stamping, automotive industry

ABSTRACT: The author gives some statistical data on development of forging production and construction of new forging and stamping shops in the automotive and bearing industries in the period from 1959 to 1963, and describes some of the elements incorporated in mechanized and automated continuous production lines used in these shops. The problems involved in heating large workpieces with subsequent removal of the resultant scale are discussed. The individual steps in the forging process are considered with regard to the location of the workpiece at the various stages, the direction of work flow and the types of transfer machines used. Layouts are given for a general-purpose forging shop and for shops designed for specialized forging production.

Card 1/2

ACC NR: AT7007352

Three basic groups of specialized forging shops are considered: 1. shops consisting of individual continuous lines in which stamping units are combined with heat-treat units, 2. shops consisting of individual sections in which a group of stamping units is combined with a single heat-treat unit and 3. shops consisting of individual combination lines in which stamping units are combined with machining lines. Operational data on the economic advantage achieved by implementing the given measures for improvement of forging production in the automotive and bearing industries are tabulated. Orig. art. has: 4 figures, 4 tables.

SUB CODE: 13/ SUBM DATE: None

Card 2/2

MANSUROV, A.P.

Antituberculous vaccination and revaccination of children and adolescents in a rural medical district. Sov.med, 22 no.7:82-86
Л1 '65. (MIRA 18-3)

1. Protivotuberkuleznyy kabinet Tatkinskoy uchastkovoy bol'nitsy
(glavnyy vrach K.N.Yefremenko) Ryv'skogo rayona Kurskoy oblasti.

MANSUROV, A. R., USACHEV, V. V., KOMENDANTOV, G. L., BABUSHKIN, V. I., IVANOV, P. N.
and MALKIN, V. B.

"The Effect of Accelerations Upon the Human Organism" (The Eighth All-union Congress
of Physiologists, Biochemists, and Pharmacologists), pp. 313-314, Moskva, 1955.

MAKSUROV, A.B., podpolkovnik meditsinskoy sluzhby

X-ray examinations during the action of radial accelerations on the
body. Voen.-med.zhurn. no.10:59-64 0 '56. (HLRA 10:3)

(AVIATION MEDICINE) (RADIOGRAPHY)

LANSBERG, A.R., Cand. Nat. Sci.—(ed.) "X-ray study of the effect of ⁶⁰Co ~~radial~~ ^{of} accelerations on the organism of humans and animals." 1957.
Min. of Health USSR. Central Inst. for the Development of
Physicians), 200 copies (10, 10-5, 10-2)

AGADZHANYAN, N.A., mayor med.sluzhby, kand.med.nauk; VAKAR, M.I., podpolkownik med.sluzhby, kand.med.nauk; MANSUROV, A.R., podpolkownik med.sluzhby; TSIVILASHVILI, A.S., mayor med.sluzhby

Decompression tissue emphysema and methods of its prevention. Voen.-med.zhur. no.12:45-48 D '58. (MIRA 12:12)
(DECOMPRESSION SICKNESS, prev. & control,
decompression tissue emphysema in aviators (Bus))
(EMPHYSEMA, prev. & control,
same)

IVANOV, P.N., polkovnik meditsinskoy sluzhby, kand.med.nauk; MANSUROV, A.R.,
podpolkovnik meditsinskoy sluzhby, kand.med.nauk; SOZINOV, S.I.,
podpolkovnik meditsinskoy sluzhby

Anomalies of development of the skeleton in aviators. Voen.-med.
zhur. no.3:60-62 Mr '61. (MIRA 14:7)
(AVIATION MEDICINE) (SPINE—ABNORMITIES AND DEFORMITIES)

272200

39281

S/216/62/000/001/001/002

1015/1215

AUTHOR: Yazdovskiy, V. I., Mansurov, A. R., Agadzhanyan, N. A. and Tsvilashvili, A. S.

TITLE: Effect of explosive decompression of pressure overfall on the organism

PERIODICAL: Akademiya nauk. SSSR. Izvestiya. Seriya biologicheskaya, no. 1, 1962, 84-89

TEXT: Experiments were carried out on 15 rats, 21 rabbits and 13 dogs. The pressure overfall was extensive and the speed at which it occurred was 0.004-0.008 sec. Extensive and rapid pressure overfalls resulted in a number of functional and morphologic changes in the internal organs. These changes were particularly marked in the lungs: edema, atelectasis, and hemorrhages into both the parenchyma and pleural cavity were the most prominent features. X-ray observations in the thorax showed that the traumatic changes in the lungs progressed rapidly and caused death of the animals if they were subjected to great and rapid pressure overfall without any compensatory measures. The authors stressed the importance of knowing the etiology, pathology and clinico-morphological picture of pressure overfall. There is 1 figure.

ASSOCIATION: Institut normal'noy i patologicheskoy fiziologii Akademii meditsinskikh nauk SSSR (Institute of Normal and Pathological Physiology, Academy of Medical Sciences, USSR) Moscow

SUBMITTED: May 22, 1961

Card 1/1

BALAKHOVSKIY, I.S.; MANSUROV, A.R.; YAZDOVSKIY, V.I.

Effect of pure oxygen respiration on the lungs and heart
of white rats. *Biul. eksp. biol. i med.* 53 no.2:43-47 F '62.
(MIRA 15:3)

1. Predstavlena deystvitel'nym chlenom AMN SSSR V.V. Parinym.
(RESPIRATION) (HEART)
(LUNGS) (OXYGEN---PHYSIOLOGICAL EFFECT)

AGADZHANYAN, N.A.; MANSUROV, A.R.

Effect on the animal organism of oxygen deficiency and prolonged
radial accelerations. Biul. eksp. biol. i med. 53 no.4:42-46 Ap '62.
(MIRA 15:4)

1. Predstavlena deystvitel'nym chlenom AMN SSSR V.V.Parinym.
(ACCELERATION (PHYSIOLOGY)) (ANOXEMIA)
(CONDITIONED RESPONSE)

ACCESSION NR: AT4042697

S/0000/63/000/000/0314/0318

AUTHOR: Kuznetsov, A. G.; Tsvilashvili, A. S.; Mansurov, A. R.

TITLE: Changes of some physiological functions of the organism during explosive decompression

SOURCE: Konferentsiya po aviatsionnoy i kosmicheskoy meditsine, 1963. Aviatsionnaya i kosmicheskaya meditsina (Aviation and space medicine); materialy konferentsii. Moscow, 1963, 314-318

TOPIC TAGS: explosive decompression effect, physiological function, dog, rabbit, bradycardia

ABSTRACT: Experiments were performed under laboratory conditions in a special pressure chamber for the purpose of determining the nature of changes in basic physiological functions during great and fast pressure drops. Dogs and rabbits were subjected to sudden pressure drops which ranged from 0.3 to 0.004 sec in duration. In all experiments, during the first seconds after the drop in pressure all animals evidenced apnoea. Initial apnoea lasted from 2 to 15 sec, and after a single intake of breath apnoea resumed for an additional 3 to 4 sec. After

Card 1/3

ACCESSION NR: AT4042697

this respiration resumed, but its rhythm and depth were disrupted. Fluoroscopic examination, which took place 0.02 sec after the pressure drop, showed changes in the lungs, diaphragm, and heart. A significant increase in the volume of gas bubbles in the gastrointestinal tract and development of a process of steam formation in organs and tissues were also observed. Special bioelectric investigations indicated that during apnoea a constant stream of impulses proceeded from the diaphragm. Similar constant streams of impulses were observed coming from intercostal muscles. The amplitude and duration of these impulses changed depending on the magnitude and the rate of explosive decompression. In cases of severe and very rapid decompressions, the amplitude reached 300 to 400 mv and lasted for as long as 3 to 4 sec. It was found that the increase in biopotentials during explosive decompression can be observed not only from the respiratory muscles, but also from muscles not having any direct relationship to the act of respiration. This makes it possible to assume that a generalized process of excitation takes place in the motor area of the brain which induces a large flux of impulses from the periphery. Bradycardia was noted in the majority of the experiments during the first seconds after explosive decompression. Bradycardia was most marked in animals during the second and third seconds after the pressure drop. Bradycardia,

Card 2/3

ACCESSION NR: AT4042697

like apnoea, is the result of reflex activity stimulated by the effect of negative pressure on the lungs and the gastrointestinal tract. At the same time changes were noted in blood pressure. In all experiments, immediately after decompression, blood pressure in the carotid artery rose by 50 to 70 mm Hg. This increase lasted only 1 or 2 sec, after which blood pressure dropped by as much as 70 to 90 mm of Hg below the initial level. The initial rise in blood pressure is apparently due to mechanical action, but the subsequent drop appears to be based on reflex activity. An analysis of the data obtained indicates that explosive decompression causes, in the microintervals of time which follow it, serious changes in basic physiological functions of the organism. Most of these changes are reflex in nature and depend on the characteristics of the decompression.

ASSOCIATION: none

SUBMITTED: 27Sep63

ENCL: 00

SUB CODE: LS

NO REF SOV: 000

OTHER: 000

Card 3/3

L 58858-65 EWG(a)-2/EWG(c)/EWG(j)/EWG(r)/EWG(v)/EWT(1)/FS(v)-3 DD
ACCESSION NR: AP5015946 UR/2047/65/015/003/0438/0444
612.014.464+612.275 :
616-001.11+612.833.81 30
B

AUTHOR: Agadzhanian, N. A. (Moscow); Bizin, Yu. P. (Moscow); Doronin, G. P. (Moscow); Kuznetsov, A. G. (Moscow); Mansurov, A. R. (Moscow)

TITLE: Effect on animals of prolonged inhalation of pure oxygen at low barometric pressure

SOURCE: Zhurnal vysshey nervnoy deyatel'nosti, v. 15, no. 3, 1965, 438-444

TOPIC TAGS: low pressure chamber; barometric pressure, respiration, water metabolism, salt metabolism, central nervous system

ABSTRACT: Central nervous system function and some indices of water and salt metabolism were studied in dogs subjected to low pressure corresponding to an altitude of 10,000 m (198 mm Hg) during a prolonged stay (about 100 days) in an atmosphere of pure oxygen. No significant changes were detected in the animals. Firmly established chain motor conditioned reflexes were not impaired. They completely retained their structure and the temporary characteristics of the individual links.

Card 1/2

L 58858-65

ACCESSION NR: AP5015946

The first part of the experiment was marked by a weakening of internal inhibition, which was reflected in more numerous inadequate and negative reactions to the use of conditioned inhibition. As the animals adapted, these reactions became normal, an indication that the balance in the basic nerve processes was restored. During the first 30 days, changes were observed in water-salt metabolism--reduced hydrophilic capacity of the skin, reduced blood salt, increased rate of salt excretion with urine, and loss of weight. These changes became less pronounced as the animals adapted. X-ray and morphological investigations showed that the volume of the lung and thorax decreased during the first few days of the experiment. These changes were signs of congestion in the blood vessels of the pulmonary circulation and atelectasis. They proved to be functional in nature and reversible. Orig. art. has: 4 figures.

ASSOCIATION: none

SUBMITTED: 27 May 64

ENCL: 00

SUB CODE: LS

NO REF SOV: 007

OTHER: 002

ljp
Card 2/2

L 14286-66 EWT(1)/ES(v)-3 SCTR DD/RF

ACC NR: AT6003870

SOURCE CODE: UR/2865/65/004/000/0361/0366

AUTHOR: Mansurov, A. R.; Markaryan, S. S.

34
B+1

ORG: none

TITLE: ^{2,44} Effect of rotation on the human organism with the trunk inclined at various angles

SOURCE: AN SSSR. Otdeleniye biologicheskikh nauk. Problemy kosmicheskoy biologii, v. 4, 1965, 361-366

TOPIC TAGS: space physiology, cardiovascular system, vestibular apparatus, biologic acceleration effect, man, physiologic parameter, vestibular effect

ABSTRACT: The physiological effects of various rotational magnitudes as a function of human sitting position were studied in 988 tests with 11 male subjects. One group was exposed to acceleration of 30, 40, 60, and 120°/sec (angular rate, 1 rev/sec). Each experiment consisted of 4 rotations for 5 min with a 10-20-min interval between them. The other group experienced 15, 30, 45, 60, 120, 180, and 240°/sec² at rates of 0.5, 1.0, 1.5, and 2.0 rev/sec; the duration of each test was 1.5 min with a 15-20 min interval between tests. The body angles are shown in Fig. 1.

Card 1/4

L 14286-66

ACC NR: AT6003870

Results of the experiment showed that in the majority of cases rotation increased pulse rate by 10 beats/min. During rotation at constant rates, this index returned to normal or sometimes decreased below normal. Brain bioelectricity was unaltered. At the end of the tests, the pulse rates of all subjects had decreased 3-18 beats/min. The maximum arterial pressure decreased by 9 mm Hg, and the minimum increased by 12 mm Hg. 0

At angles beginning with 65°, and especially at 80° and 90°, subjects experienced illusions of internal organ displacement and throat constriction. After these tests, hyperemia of the eyelid was prevalent and the eyes were bloodshot. At angles of 0-30° (1.5-2.0 rev/sec) the head and legs felt heavy and movement of extremities was restricted. Multiple rotations at 0° brought about changes in the x-ray position of thoracic organs characterized, in particular, by increased capacity of lower lung areas. This symptom disappeared after 5-7 days. Repeated rotations at 20-65° disrupted the circulatory system in the vicinity of the lungs and heart. An increase in the dimensions of the heart and heavy vasculature, observed in half the cases corresponded to disrupted heart muscle contractions. These symptoms were reversible and disappeared after 5-7 days.

Card 2/4

I 74286-66
ACC NR: AT6003870

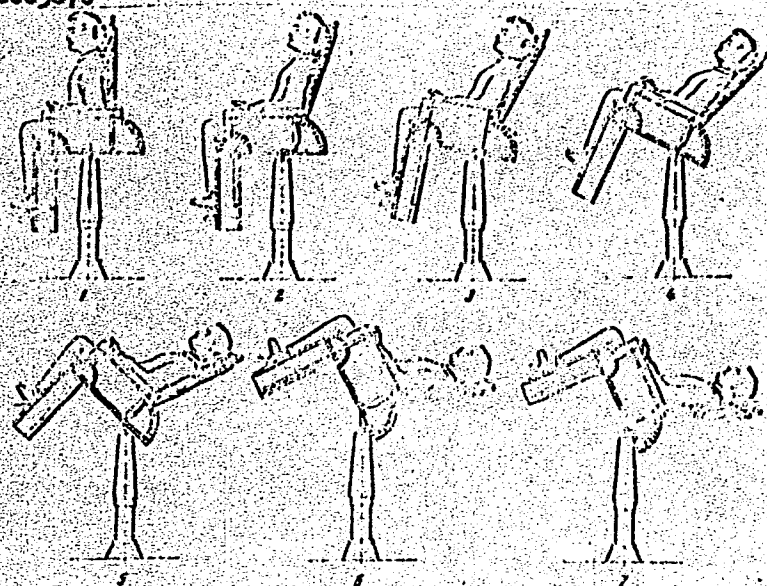


Fig. 1. Sitting position during rotation tests

1 - 0°; 2 - 20°; 3 - 30°; 4 - 45°; 5 - 65°; 6 - 80°; 7 - 90°.

Card 3/4

L 14286-66

ACC NR: AT6003870

0

A number of subjects who had low tolerance to rotation showed changes in heart muscle activity, characterized by a lack of pulsation in restricted cardiac areas when rotation had ceased. This symptom corresponded to an increase in heart dimension associated with decreased pulsation. The occurrence of so-called "silent zones" in the x-ray contour of the heart after rotation is felt to be caused by reflex vasomotor disruption of coronary circulation which would affect heart muscle. The total reaction tends to reflect excessive irritation of the vestibular apparatus due to rotation. In general, it was concluded that the observed reversible cardiovascular changes were due to vestibular lability in response to angular accelerations. Orig. art. has: 1 figure, 1 table. [ATD PRESS: 4091-E]

SUB CODE: 06 / SUBM DATE: none / ORIG REF: 009 / OTH REF: 001

80

Card 4/4

MANSUROV, B. K.

USSR / Cultivated Plants. Grains.

M-3

Abstr Jour: Ref Zhur-Biol., 1953, No 10, 72942.

Author : Salamov, A. P.; Mansurov, B. K.
Inst : North-Osetinskaya State Agricultural Experimental
Station.
Title : New Kidney Bean Varieties.

Orig Pub: Byul. nauchno-tekhn. inform. Sev.-Osetinsk. gos.
s.-kh. opyt. st., 1957, No 1, 32-34.

Abstract: "Osetinskaya 302", "Osetinskaya 21", "Belaya gor-
okhovidnaya" and "Liniya 175/50" varieties were
brought out. The "Osetinskaya 302" variety is the
best in harvest yield, most early maturing, resis-
tant to drought and diseases, with high taste qual-
ities, a protein content in the grain of 23%, but
the grain tends to shatter when overripe. "Osetin-

Card 1/2

40

USSR / Cultivated Plants. Grains.

M-3

Abs Jour: Ref Zhur-Biol., 1956, No 16, 72942.

Abstract: skaya 21" yields to "Osetinskaya 302" in harvest yield, but exceeds "Belaya gorokhovidnaya"; the grain is resistant to shattering. "Liniya 175/50" has large grain with good taste qualities, is resistant to drought and shattering. -- A. F. Khlystova.

Card 2/2

BAYKOV, N.M.; MANSUROV, E.I.

Methods for improving air tightness in the gathering of gas
and oil. Neft. khoz. 43 no.5:37-40 My '65. (MIRA 18:6)

БАЙКОВ, Н.М.; МАНСУРОВ, Е.И.; ШАПОВАЛОВ, Д.К.

Sealing oil and gas gathering systems. Nefteprom. delo no.8:24-
28 '65. (MIRA 18:9)

1. Neftepromysalovoye upravleniye "Leninogorskneft".

MANSUROV, E.M., inzh.

Block caving system. Ugol' 34 no.1:30-32 Ja '59. (MIRA 12:1)

1. Shakhta No.5/7 tresta Anzherougol'.
(Coal mines and mining)

37

CZECHOSLOVAKIA

FRUMKIN, A.N.; MANSUROV, G. N.; KAZARINOV, V.E.; BALASHOVA, N. A.

Electrochemical Institute, Soviet Academy of Sciences (Institut elektrokhemii, Akademiia nauk SSSR), Moscow (for all)

Prague, Collection of Czechoslovak Chemical Communications, No 2, Feb 1966, pp 806-813

"Study of the adsorption of cadmium cations on a platinum electrode."

MANSUROV, G. V.

MANSUROV, G. V. "Experience from eserine therapy of mental diseases", Sbornik nauch. trudov Khabar. voyen. gospitalya, III, Khabarovsk, 1948, p. 81-89.

SO: U-4393, 19 August 53, (Letopis 'Zhurnal 'nykh. Statey', no. 23, 1947).

MANSUROV, G. YU. i POPOV, A. D.

20064 MANSUROV, G. YU. i POPOV, A. D. Novyy portativnyy pribor — anemograf.
Svornik trudov Vracheb.-san. sluzhby Kazansk zh. d. vyp. 2, 1948, s. 118-21.

SO: LETOPIS ZHURNAL STATEY, Vol. 27, Moskva, 1949.

MANSUROV, G.Yu.; KAMALETDINOVA, S.I.

Cleaning window glass soiled by vapor condensates of certain hydrocarbons.
Gig.i san. no.6:54 Je '53. (MLBA 6:6)

1. Dorozhnaya sanitarno-epidemiologicheskaya stantsiya Kazanskoy zheleznoy
dorogi. (Hydrocarbons) (Cleaning compounds)

HANSUROV, G.Yu.; KAMALETDINOVA, S.I.

Washing work clothes soiled by lubricants and antiseptics. Gig. i
san. no.5:51 My '54. (MLBA 7:5)

1. Iz laboratorii gigiyen; truda dorozhnoy sanitarno-epidemiolo-
gicheskoy stantsii Kazanskoy zheleznoy dorogi. (Laundry)

MANUKOV, G. Yu.

KAZANTSEV, I.A.; MANUKOV, G. Yu.

Working conditions and morbidity among railway engine crews. Gig. i
san. no.12:42-43 D '54. (MLRA 8:2)

1. Iz laboratorii gigiyeny truda i promyshlennoy sanitarii dorozhnoy
sanitarno-epidemiologicheskoy stantsii Kazanskoy zheleznoy dorogi.

(INDUSTRIAL HYGIENE

railway engineers working cond. & morbidity in Russia)

(OCCUPATIONAL DISEASES

railway engineers in Russia, relation to working cond.)

KAMALETDINOVA, S.I.; MANSUROV, G.Yu.

Determination of small quantities of sulfur dioxide in the air.
Gig.i san. no.3:43 Mr '55. (MLRA 8:5)

1. Iz dorozhnoy sanitarno-epidemiologicheskoy stantsii Kazanskoy
zheleznoy dorogi.
(AIR--ANALYSIS)
(SULFUR DIOXIDE)

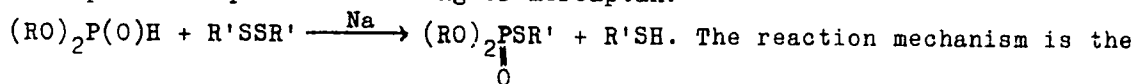
S/079/61/031/001/016/025
B001/B066

AUTHORS: Petrov, K. A., Bliznyuk, N. K., and Mansurov, I. Yu.

TITLE: Reactions of Acid Phosphites, Thiophosphites, Phosphonates, and Dialkylphosphine Oxides With Disulfides

PERIODICAL: Zhurnal obshchey khimii, 1961, Vol. 31, No. 1, pp. 176 - 179

TEXT: Following their study in Ref. 1 on the reaction of sodium dialkylphosphites with disulfides the authors found that disulfides react with acid phosphites, thiophosphites, phosphonates, and dialkylphosphine oxides in the presence of catalytic quantities of metallic sodium (in some cases even without it) giving the corresponding thiol derivatives. The corresponding thiophosphate can be obtained nearly quantitatively by allowing an equimolecular mixture of acid phosphite and dialkyl disulfide to react with a small quantity of Na (0.1 - 0.3 mole%) under conditions that permit a quick distilling of mercaptan: ✓



Card 1/3

Reactions of Acid Phosphites, Thiophosphites, S/079/61/031/001/016/025
 Phosphonites, and Dialkylphosphine Oxides With B001/B066
 Disulfides

following: when the above mixture is treated with catalytic Na, dialkylphosphite forms a salt which reacts with the disulfide according to the above equation; the presence of phosphite and mercaptide in the reaction mass gives rise to a state of equilibrium:

$(RO)_2P(O)H + R'SNa \rightleftharpoons (RO)_2PONa + R'SH$; the distillation of mercaptan from the reaction mass shifts the equilibrium to the right. The reaction proceeds more smoothly, if the resultant mercaptan has a low boiling point, and is rendered difficult if the boiling points are close to each other. Dialkyl thiophosphites readily react with disulfides even with small sodium admixtures, and give dithiophosphates. Monoalkylphosphonites (which are less acid) also react smoothly with disulfides to form thiophosphonates. Dialkylphosphine oxides which have no acid properties but are suitable reducing agents, give thiophosphonates in fair yield without Na: $R_2P(O)H + R'SSR' \longrightarrow R_2PSR' + R'SH$. The reactions of disulfides with

acid phosphites and phosphonites are determined by the acidic and reducing properties of the latter. There are 1 table and 5 references:

Card 2/3

Reactions of Acid Phosphites, Thiophosphites, S/079/61/031/001/016/025
Phosphonites, and Dialkylphosphine Oxides With B001/B066
Disulfides

3 Soviet, 1 US, and 1 Polish.

SUBMITTED: February 2, 1960

✓

Card 3/3

PETROV, K.A., BLIZNYUK, N.K., MANSUROV, I.YU.

"Reaction of acid phosphites, thiophosphites, phosphonites,
and dialkylphosphine oxides with disulfides."

Khimiya i Primeneniye Fosfororganicheskikh Soyedineniy (Chemistry and
application of organophosphorus compounds) A. YE. ALEKSEEV, Ed.
Publ. by Kazan Affil. Acad. Sci. USSR, Moscow 1962, 632 pp.

Collection of complete papers presented at the 1959 Kazan Conference on
Chemistry of Organophosphorus Compounds.

① MANSUROV, I. Z.

FRASE I BOOK REFORMATION 007/7660

Remontno-eksploatachnaya obshchestvennaya mashinostroitel'naya promyshlennost'.
Tsestral'naya pravil'nitsa. Sektorskiye remonta i modernizatsionni obratovremeniya
Modernizatsiya i remont obratovremeniya mashinostroitel'nykh sredstv (Modernization
and Repair of Machine-Building Plant Equipment) Moscow, MashGiz, 1979.
20 p. Kratkae slovo. 6,100 copies printed.

Dr. (Title page): E.A. Koskin, Candidate of Technical Sciences; Ed. (Inside book):
A.S. Poyar, Engineer; Tech. Ed.: V.D. El'vind) Managing Ed. for Literature on
Machining and Machine-Tool Construction (MashGiz); E.D. Bystrykova, Engineer;
Editorial Board: E.A. Koskin (Chairman), Candidate of Technical Sciences;
T.S. Kurinov, Engineer; V.D. Pashov, Engineer; V.I. Minogolovskiy, Engineer;
and V.P. Galov, Engineer.

NOTE: This collection of articles is intended for technical personnel dealing
with modernization and overhaul of equipment.

CONTENTS: The articles in this collection deal with the basic trends and a number
of specific problems in the modernization of the machine industry. Modernization
of foundry, forging-shop, and crane equipment and problems in the automation of
equipment repair are discussed. Information is given on the use of unitized
subassemblies in the modernization of metal-cutting machine tools, on measures
for prolonging the life of forging hammers, on methods of automatic vibra-
electric hand feeding of worn parts, on saltation, and on vibration of
forging-hammer foundations. No personalities are mentioned. References follow
several of the articles.

TABLE OF CONTENTS:

Moscow, I.Z. (Engineer). Basic Trends in the Modernization of Foundry Equipment	3
Sharygin, Ya.M. (Engineer). Prolongation of the Life of [Fusion] Tools for Forging Hammers	31
Dumakin, V.M. (Engineer, Sverdlovsk). Basic Trends in the Modernization of Foundry Equipment	39
Gonimov, M.K. (Engineer). Automation of Metal-Cutting Machine Tools	49
Ivanov, V.M. (Engineer, YFPI). Organization of Heavy Repair of Tig Nozzles and Inspection of Repair-Weld Quality	61
Prilutskiy, M.V. (Engineer, Khar'kovskiy avtomob. zavod transportnogo mashinostroyeniya Izmest' Malysheva (Char'kov Plant of Transportation - Machinery Construction Izmest' Malyshev)). Repair of Burn Signs of Metal-Cutting Machine Tools by External Beaching	108
Berestov, M.A. (Engineer, Kuznetsk). Use of Unitized Subassemblies in the Modernization of Metal-Cutting Machine Tools	112
Artemyev, P.F. (Candidate of Technical Sciences, Sverdlovsk). Basic Trends in the Modernization of Woodworking Equipment	132
Sokolovskiy, G.M. (Candidate of Technical Sciences, YFPI, MashGiz). Basic Trends in the Modernization of Existing Crane Equipment	136
Rias, V.F. (Engineer). Modernization and Repair of Crane Equipment	155
Shabalin, Ye.I. (Engineer, Uralsk). Modernization of Unique Equipment	165

Card 5/A

MANSUROV, I.Z.; KOZHEVNIKOV, A.A.

The KVO32 automatic cam press with 16-ton capacity. *Bul.tekh.-ekon.*
inform. no.4:14-16 '60. (MIRA 13:11)
(Power presses)

L 25996-66 EWT(σ) IJP(σ)

ACC NR: AT6013429

SOURCE CODE: UR/0000/65/000/000/0190/0199

AUTHOR: Mansurov, K.

ORG: none

TITLE: The stability of linear systems with lag

SOURCE: AN KazSSR. Sektor matematiki i mekhaniki. Issledovaniya po differentsial'nym uravneniyam i ikh primeneniyu (Research on differential equations and their application), Alma-Ata, Izd-vo Nauka, 1965, 190-199

TOPIC TAGS: ordinary differential equation, perturbation, linear system, Lagrange equation, motion equation

ABSTRACT: The stability of the following set of equations of perturbed motion is investigated

$$\frac{dx_i}{dt} = \sum_{j=1}^n [p_{ij}x_j(t) + q_{ij}x_j(t-\tau)]$$

(i = 1, 2, ..., n).

These equations are rewritten in the form

$$x_i(t) = \sum_{j=1}^n [p_{ij}x_j(t) - q_{ij}x_{jn}(t)],$$

$$x_{in}(t) = \frac{1}{h} [x_{i-1}(t) - x_{in}(t)] - \frac{h}{2} x_{i-1}''(t - \theta, h),$$

Card 1/3

6/15/65
+ 1/2

L 25996-66

ACC NR: AT6013429

0

$$0 < \theta_r < 1 \quad (l = 1, 2, \dots, n; \quad r = 1, 2, \dots, k)$$

by making use of the Lagrange formula

$$x_j(t-rh) = \frac{x_j(t-(r-1)h) - x_j(t-rh)}{h}$$
$$(j = 1, 2, \dots, n; \quad r = 1, 2, \dots, k)$$

After some algebraic manipulations, these equations are obtained in the form

$$y_v(t) = \sum_{p=1}^{n(k+1)} a_{vp} y_p(t)$$
$$y_{n+r}(t) = \sum_{p=1}^{n(k+1)} a_{n+r,p} y_p(t) - Q_r$$
$$(v = 1, 2, \dots, n; \quad p = 1, 2, \dots, n(k+1))$$

where

$$a_{ij} = \beta_{ij}, \quad a_{n+r,j} = \gamma_{ij}$$
$$a_{n+(l-1)k+j} = a_{n+(l-1)k+r}, \quad a_{n+(l-1)k+r-1} = -\frac{1}{h}$$
$$a_{n+(l-1)k+r}, \quad a_{n+(l-1)k+r} = -\frac{1}{h}, \quad \text{остальные } a_{ij} = 0$$
$$(l, j = 1, 2, \dots, n; \quad r = 2, 3, \dots, k)$$

Card 2/3

L 25996-66

ACC NR: AT6013429

$$x_i(t) = y_i(t), \quad x_{i+1}(t) = y_{i+1}(t) + \dots$$

The stability criteria are then given by the following two theorems. The trivial solution is asymptotically stable if: 1) the trivial solution of the approximate system

$$\dot{y}_i(t) = \sum_{j=1}^{n(k+1)} a_{ij} y_j(t),$$

$$y_{i+1}(t) = \sum_{j=1}^{n(k+1)} a_{i+1,j} y_j(t),$$

and the roots $\lambda_1, \dots, \lambda_{n(k+1)}$ of the equation

$$\det \| a_{ij}^{(1)} - \delta_{ij}(\lambda + h\omega) \| = 0$$

satisfy the condition

$$\lambda_i > \epsilon > 0 \quad (i = 1, 2, \dots, n(k+1)),$$

where ϵ is an arbitrarily small, fixed number, or 2) if

$$|1 - h\lambda/M^{(k)}| > 0.$$

An example is given to illustrate these conditions. Orig. art. has 50 equations.

SUB CODE: 12/ SUBM DATE: 23Jun65/ ORIG REF: 005

Card 3/3 *jt*

MANSUROV, Kh.

Analog of Euler-Maclaurin's formula for functions of two variables. Izv. AN Uz. SSR. Ser. fiz.-mat. nauk no.6:15-22 '61.
(MIRA 16:12)

1. Institut matematiki imeni V.I. Romanovskogo AN UzSSR.

MANSUROV, Kh.

Speeding up approxima's methods of solution of integral
equations. Izv. AN Uz. SSR. Ser. fiz.-mat. nauk 9 no.2:11-15 '65.
(MIRA 18:6)

1. Tashkentskiy gosudarstvennyy universitet imeni Lenina.

L 46713-66 EWT(d)/T/EWP(1) IJP(c)

ACC NR: AP6023025

SOURCE CODE: UR/0166/66/000/002/0003/0007

29
28
B

AUTHOR: Azlarov, T. A.; Mansurov, Kh.

ORG: Tashkent State University imeni V. I. Lenin (Tashkentskiy gosuniversitet)

TITLE: On the accuracy of ¹⁶approximation of functions by polynomials of a certain class

SOURCE: AN UzSSR. Izv. Ser fiz-matem n, no. 2, 1966, 3-7

TOPIC TAGS: approximation method, polynomial, *FUNCTION*

ABSTRACT: The accuracy of approximation of a function of the class $C[0, 1]$ by a new class of polynomials of the type

$$P_n(f, x) = \frac{1}{\sqrt{n\pi}} \sum_{k=0}^n f\left(\frac{k}{n}\right) \left[1 - \left(\frac{k}{n} - x\right)^2\right]^n$$

is discussed. It has been previously shown that

$$|P_n(f, x) - f(x)| \leq \left(1 + \frac{\sqrt{2}}{2}\right) \omega\left(\frac{1}{\sqrt{n}}\right) + \frac{C_1}{\sqrt{n}},$$

where ω is the modulus of continuity and C_1 is a constant depending on f . It is shown

Card 1/2

L 46713-66

ACC NR: AP6023025

that this estimate can be improved. The following inequality is proved

$$|P_n(f, x) - f(x)| \leq \frac{3}{2} \omega\left(\frac{1}{\sqrt{n}}\right) + \frac{C_2}{n},$$

It is also shown that

$$P_n(f, x) = f(x) + \frac{0,5f''(x) - 0,75f'(x)}{2n} + \frac{P_n}{n},$$

For functions with continuous second derivative, the functions

$$\tilde{P}_n(f, x) = P_n(f, x) - \frac{0,5 P_n(f'', x) - 0,75 P_n(f', x)}{2n}$$

are defined. These polynomials converge more rapidly than the P_n . In fact,

$$\tilde{P}_n(f, x) = f(x) + o\left(\frac{1}{n}\right).$$

The authors thank S. Kh. Sirazhdinov for his interest in the work. Orig. art. has: 13 formulas.

SUB CODE: 20/

SUBM DATE: 10May65/

ORIG REF: 001/

OTH REF: 001

Card 2/2 ^{rv}

MANSURCV, Kh. Kh.

"The Effect of Sexual Hormones on Cholesterinemia Atherosclerosis and on the Development of Experimental Cholesterin Atherosclerosis." Sub 27 Jun 51, Acad Med Sci USSR.

Dissertations presented for science and engineering degrees in Moscow during 1951.

SO: Sum. No. 480, 9 May 55.

MAHSUROV, Kh.Kh., dots.

Vascular tone in subtropical anemias. Trudy Stal.med.inst. 16
119-123 '55 (MIRA 11:8)
(BLOOD VESSELS)
(ANEMIA)

MANSUROV, Kh.Kh., dotsent

Significance of studying pulse wave amplitude in cardiovascular disease. Zdrav. Tadzh. 3 no.1:28-30 Ja-F '56. (MIRA 12:7)

1. Kafedra Gospital'noy terapii Stalinabadskogo Gosudarstvennogo meditsinskogo instituta im. Abuali-ibn-Sino.

(CARDIOVASCULAR SYSTEM--DISEASES)

(PLETHYSMOGRAPHY)

MANSUROV, Kh.Kh., Doc Med Sci -- (diss) "Comparative
characteristics of higher nervous activity in certain
diseases of ^{y i} internal organs." Mos, 1958, 21 pp
(Acad Med Sci USSR) 200 copies (PL, 50-58, 127)

- 101 -

MANSUROV, Kh.Kh.

Comparative data from an investigation of the higher nervous function
in patients with hypertension and rheumatic fever. Gp.bol. no.5:
30-4 3 '58. (MIRA 13:5)

(REFLEXES)

(HYPERTENSION)

(RHEUMATIC FEVER)

MANSUROV, Kh.Kh., doktor med.nauk

Some methodological indications for a study of the physiology and pathology of the higher nervous activity in man. Zdrav.Tadzh. 6 no.4:6-10 J1-Ag '59. (MIRA 12:11)

1. Zaveduyushchiy kafedroy gospital'noy terapii Stalinahadskogo medinstituta im. Abuali ibni Sino.
(NERVOUS SYSTEM--DIAGNOSIS)
(PHYSIOLOGY)

MANSUROV, Kh.Kh., doktor meditsinskikh nauk; MAKAREVICH, Ya.A.; kand.
meditsinskikh nauk

Lipoproteids, the coefficient of esterification, and the protein
composition of blood serum in chronic colitis. Zdrav. Tadzh. 7
no. 2:38-42 Mr-Apr '60. (MIRA 13:10)

1. Iz kafedry gospital'noy terapii (zav. - doktor meditsinskikh
nauk Kh.Kh. Mansurov) Stalinabadskogo medinstituta im. Abuali
ibni Sino.

(LIPOPROTEINS) (ESTERIFICATION) (BLOOD PROTEINS)
(COLITIS)

MANSUROV, Kh.Kh., doktor med.nauk

Present status of theories on cirrhosis of the liver and basic
problems in its further development. Zdrav. Tadzh. 7 no.5:3-7
'60. (MIRA 13:12)

(LIVER--CIRRHOSIS)

MANSUROV, Kh.Kh.; KUTCHAK, S.N.; STAVISKIY, Ya.D.; MAKAREVICH, Ya.A.;
AMINDZHANOV, S.A.

Diagnostic significance of intravital liver biopsy. Zdrav. Tadzh.
7 no.5:8-13 '60. (MIRA 13:12)
(LIVER) (BIOPSY)

MANSUROV, Kh.Kh., doktor med. nauk

Treatment of chronic hepatitis and cirrhosis of the liver. Zdrav.
Tadzh. 7 no.5:46-49 '60. (MIRA 13:12)
(LIVER DISEASES)

MANSUROV, Kh.Kh.

Progressive forms of cirrhosis of the liver. Trudy Inst. Kras7.
med. AN Tadzh. SSR no.1:9-25 '62. (MIRA 17:5)

MANSUROV, M.KH.; DENISOV, A.P.

Pathogenesis of intrahepatic portal hypertension in cirrhosis of
of the liver. Trudy Inst. krsev. med. AN Tadzh. SSR no. 1:154-
163-168. (MIRA 17:5)

MANSUROV, Kh.Kh.; STAVISKIY, Ya.D.; RUDOY, D.G.

Needle biopsy of the liver; method, indications and contra-
indications. Trudy Inst. kraev. med. AN Tadzh. SSR no.1:248-
260 '62. (MIRA 17:5)

MANSUROV, Kh. Kh.

First session of the Institute of Regional Medicine of the Academy
of Sciences of the Tajik S.S.R. Zdrav. Tadzh. no.3:54-56 My-Je '61.
(MIRA 14:6)

(LIVER--DISEASES)

MANSUROV, Kh.Kh., prof.; RUDOY, D.G., kand.med.nauk

Analysis of 625 cases of needle biopsy of the liver. Terap.arkh.
no.7:72-78 j1 '62. (MIRA 15:8)

1. Iz Instituta krayevoy meditsiny AN Tadzhikskoy SSR (dir. -
prof. Kh.Kh. Mansurov). (LIVER---BIOPSY)

MANSUROV, Kh.Kh., prof.

Basic and debatable problems in the theory of so-called collagen
diseases. Zdrav. Tadzh. 9 no.1:3-9 Ja-F '62. (MIRA 15:4)
(COLLAGEN DISEASES)

MANSUROV, Kh.Kh.

Classification and nomenclature of cirrhoses of the liver. Zdrav.
Tadzh. 9 no.3:10-15 My-Je '62. (MIRA 15:8)

1. Iz Instituta krayevoy meditsiny Akademii nauk Tadzhikskoy SSR.

(LIVER—CIRRHOSIS)

MANSUROV, Kh.Kh., prof. (Dushanbe)

Epidemic hepatitis and progressive liver cirrhosis. Sov.med.
26 no.1:6-12 Ja '63. (MIRA 1614)

1. Iz Instituta krayevoy meditsiny (dir. - prof. Kh.Kh.Mansurov)
AN Tadzhikskoy SSR.
(HEPATITIS, INFECTIOUS) (LIVER—CIRRHOSIS)

MANSUROV, Kh. Kh. ; KUTCHAK, S.N.

Problems of needle biopsy of the liver. Akt. vop. pat. pech. no.2:6-27
'63. (MIRA 18:8)

MANSUROV, Kh.Kh.; MANSUROVA, I.D.; MON, N.P.

Choline, phospholipid and vitamin B₁₂ metabolism, and the fatty infiltration of the liver in acute and chronic forms of Rotkin's disease. Akt. vop. pat. pech. no.2:129-143 '63.

(MIRA 18:8)

MANSUROV, Khamid Khusenovich, prof.; KUTCHAK, Svetlana Nikolayevna,
st. nauchn. sotr. Primala uchastiye MONASTYRSKAYA, B.I.,
prof.; GESSEN, L.A., red.

[Liver biopsy; atlas of histological studies] Biopsia pe-
cheni; atlas gistologicheskikh issledovani. Dushanbe,
Akad. med. nauk SSSR, 1964. 137 p. ___ [Atlas of color
microphotographs] Atlas tsvetnykh mikrofoto-fanii. 54 p.
(MIRA 18:2)

APROSINA, Z.G., kand. med. nauk; AFANAS'YEVA, K.A., kand. med. nauk;
AKHREM-AKHREMOVICH, R.M., prof.; BLYUGER, A.F., doktor med.
nauk; BONDAR', Z.A., prof.; VASILENKO, V.Kh., prof.; KIKODZE,
I.A., kand. med. nauk; LINDENBRATEN, L.D., prof.; LOGINOV,
A.S., kand. med. nauk; MANSUROV, Kh.Kh., prof.; NAZARETYAN,
Ye.L., kand. med. nauk; NOGALLER, A.M., prof.; PLOTNIKOV,
N.N., prof.; SEMENDYAYEVA, M.Ye., kand. med. nauk; TAREYEV,
Ye.M., prof.; TAREYEV, I.Ye., kand. med. nauk;
TER-GRIGOROVA, Ye.N., prof.; CHERNYSHEVA, Ye.V., kand. med.
nauk; SHVARTS, L.S., prof.; MYASNIKOV, A.L., prof., zam. otv.
red.; BOGOSLAVSKIY, V.A., red.; SEMENDYAYEVA, M.Ye., red.

[Multivolume manual on internal diseases] Mnogotomnoe rukovodstvo po vnutrennim bolezniam. Moskva, Meditsina. Vol.5. 1965. 724 p. (MIRA 18:9)

1. Deystvitel'nyy chlen AMN SSSR (for Tareyev, Ye.M., Vasilenko, Myasnikov).

MANSUROV, Kh.Kh., prof.

Some new data on the pathogenesis and clinical aspects
of chronic hepatitis and cirrhosis of the liver following
hepatitis. Akt.vop.pat.pech. no.3:7-22 '65.

(MIRA 18:11)

ATAKHANOV, E.I.; MANSUROV, Kh.Kh.; SEMENDYAYEVA, M.Ye.

Symposium on the enzymological diagnosis of diseases of the liver.
Sov. med. 28 no.9:148-150 S '65. (MIRA 18:9)

SOV/112-57-6-12221

Translation from: Referativnyy zhurnal. Elektrotehnika, 1957, Nr 6, p 77 (USSR)

AUTHOR: Mansurov, Kh. M.

TITLE: Excitation System with a Ferroresonance Forcing in the Compound Circuit
(Sistema vozbuzhdeniya s ferrezonansnoy forsirovkoy v tsepi
kompaundirovaniya)

PERIODICAL: Dokl. AN Uz SSR, 1956, Nr 5, pp 37-42

ABSTRACT: Fundamental principles are set forth for designing a synchronous-generator excitation system with contactless forcing in the compounding circuit obtained from a current ferroresonance in the compounding circuit. The ferroresonance circuit is formed by a magnetization branch of the current transformers and by a capacitor connected to the transformers secondary. The compounding system is connected directly to the excitation winding of the generator; the exciter is designed to excite the generator under no-load conditions. Constant exciter load current is attained by means of an additional field winding of the exciter which passes the compounding current. Intensive

Card 1/2

SOV/112-57-6-12221

Excitation System with a Ferroresonance Forcing in the Compound Circuit

damping of the excitation system is secured by a special device acting on the field winding of the exciter. A model of the above system was tested in a laboratory. The article notes the advantages of the system, such as: smoother generator operation under normal conditions, an increased (by 20-25%) steady-state stability limit of the transmission, etc.

G.F.B.

Card 2/2

MANSUROV, Kh.M.

Excitation systems of synchronous machines with nonlinear
compounding. Izv. AN Uz.SSR.Ser.tekh.nauk no.3:21-30 '57.

(MIRA 11:7)

(Electric machinery, Synchronous)

MANSUROV, Kh.M.

Using the model of a long-distance electric-power transmission system for investigating an excitation system with nonlinear compounding. Izv. AN UzS.SSR. Ser. tekhn. nauk. no. 6:32-38 '59.
(MIRA 13:4)

1. Institut energetiki i avtomatiki AN UzSSR.
(Electric generators--Testing)

MANSUROV, K.M., dotsent

A method for determining main stresses and their direction. Sbr.
nauch.--issl.rab. TTI no.9:39-41 '60. (MIRA 15:6)
(Strains and stresses)

LEYDERMAN, Yu.R.; MANSUROV, K.M.; ZINKINA, P.G.

Method for evaluating bending moments and shearing forces due to
the action of seismic loads on a flexible structure. Sbor.nauch.-
issl.rab. TTI no.9:105-117 '60. (NERA 15:6)
(Earthquakes and building)

16.6500

S/044/62/000/006/091/127
B166/B112

AUTHOR: Mansurov, Kh.

TITLE: One method of improving the convergence of formulas of cubature

PERIODICAL: Referativnyy zhurnal. Matematika, no. 6, 1962, 39, abstract 6V182 (Tr. Tashkentsk. un-ta, no. 189, 1961, 37-47)

TEXT: Assuming that the function $f(x,y)$ given in the rectangle $A \{ a \leq x \leq b, c \leq y \leq d \}$ has continuous partial derivatives up to and including the order of $2r$, the author uses the following formula (which is an analog of the well-known Euler - Maclaurin formula) to improve the convergence of formulas of cubature in the case of a double integral:

$$\frac{1}{S} \int_a^b \int_c^d f(t_1, t_2) dt_1 dt_2 = f(x, y) + \sum_{k=1}^{2r} \sum_{i=1}^{2r-k+1} \frac{1}{k!i!} B_k\left(\frac{x-a}{h_1}\right) \cdot B_i\left(\frac{y-c}{h_2}\right) h_1^{k-1} h_2^{i-1} \Delta f^{(k-1, i-1)}(\cdot, \cdot) - \sum_{i=1}^{2r} \frac{1}{i!} \left[B_i\left(\frac{y-c}{h_2}\right) \nabla_y f^{(0, i-1)}(x, \cdot) h_2^{i-1} \right]$$

Card 1/3

One method of improving the ...

S/044/62/000/006/091/127
B166/B112

$$+ B_1 \left(\frac{x-a}{h_1} \right) \nabla_x f^{(i-1,0)}(\cdot, y) h_1^{i-1} + R_{2r}, \quad (1)$$

where $f^{(i,k)}(x,y) = \frac{\partial^{i+k} f}{\partial x^i \partial y^k}$, $h_1 = b - a$, $h_2 = d - c$, and the residual term

R_{2r} has the form:

$$R_{2r} = \frac{h_1^r h_2^r}{(r!)^2} \frac{1}{S} \int_a^b \int_c^d f^{(r,r)}(t_1, t_2) B_r^* \left(\frac{x-t_1}{h_1} \right) B_r^* \left(\frac{y-t_2}{h_2} \right) dt_1 dt_2$$

$$- h_2^{2r} \frac{1}{a_2} \int_c^d \left[\sum_{k=1}^r \frac{B_k \left(\frac{x-a}{h_1} \right)}{k! (2r - k + 1)!} \cdot \nabla_x f^{(k-1, 2r-k+1)}(\cdot, t_2) \lambda^{k-1} B_{2r-k+1}^* \left(\frac{y-t_k}{h_2} \right) \right.$$

$$\left. - \frac{1}{(2r)!} f^{(0, 2r)}(x, t_2) B_{2r}^* \left(\frac{y-t_2}{h_2} \right) \right] dt_2 - h_1^{2r} \frac{1}{h_1} \int_a^b \left[\sum_{k=1}^r \frac{B_k \left(\frac{y-c}{h_2} \right)}{k! (2r - k + 1)!} \right.$$

$$\left. \cdot \nabla_y f^{(2r-k+1, k-1)}(t_1, \cdot) \frac{1}{\lambda^{k-1}} B_{2r-k+1}^* \left(\frac{x-t_1}{h_1} \right) - \frac{1}{(2r)!} f^{(2r, c)}(t_1, y) B_{2r}^* \left(\frac{x-t_1}{h_1} \right) \right] dt_1.$$

Card 2/3

One method of improving the ...

S/044/62/000/006/091/127
B166/B112

The quantities encountered in these relations have the following meaning:

$$S = h_1 \cdot h_2, \quad \lambda = \frac{h_1}{h_2}, \quad \nabla_x f(.,y) = f(b,y) - f(a,y); \quad \nabla_y f(x,.) = f(x,d) - f(x,c),$$

$$\Delta f(.,.) = f(b,d) - f(a,d) - f(b,c) + f(a,c),$$

and the function $B_n^*(x)$ is defined by the relations

$$B_n^*(x) = B(x) \text{ for } 0 \leq x < 1, \quad B_n^*(x+1) = B_n^*(x), \text{ where } B_n(x)$$

($n = 0, 1, 2, \dots$) are Bernoulli's polynomials. A better approximation can be obtained if the rectangle A is broken up into partial rectangles of small area and formula (1) is applied to each of these. The formulas thus obtained for the particular cases $r = 1$ and $r = 2$ are used to improve the convergence of formulas of cubature. There is a numerical example. [Abstracter's note: Complete translation.]

Card 3/3

MANSUROV, K.

On the Stability of an Isodromic Control Systems for Mining Machines with
Smooth Feed p. 152

TRANSACTIONS OF THE 2ND REPUBLICAN CONFERENCE ON MATHEMATICS AND MECHANICS
(TRUDY VTOROY RESPUBLIKANSKOY KONFERENTSIY PO MATEMATIKE I MEKHANIKE), 184
pages, published by the Publishing House of the AS KAZAKH SSR, ALMA-ATA, USSR, 1962

MANSUROV, Kh.

A method for improving convergence in the theory of approximations. Izv. AN Uz. SSR. Ser. fiz.-mat. nauk 6 no.3:87-88 '62.
(MIRA 15:8)

1. Institut matematiki imeni V.I.Romanovskogo AN UzSSR.
(Convergence) (Approximate computation)

167400

42171
S/235/62/000/010/003/004
E140/E463

AUTHOR: Mansurov, K.

TITLE: On a sufficient criterion for the stability of nonlinear automatic control systems

PERIODICAL: Akademiya nauk Kazakhskoy SSR. Izvestiya. Seriya matematiki i mekhaniki, no.10 (14), 1962, 56-59

TEXT: Let there be given an indirect control system

$$\dot{\eta}_s = \sum_{k=1}^n b_{sk} \eta_k + n_s \xi \quad (s = 1, 2, \dots, n) \quad (1)$$

$$\dot{\xi} = h\sigma + \varphi(\sigma), \quad \sigma = \sum_{k=1}^n j_k \eta_k - r\xi,$$

where the nonlinear function $\varphi(\sigma)$ satisfies the conditions

$$\varphi(\sigma) = \begin{cases} 1, & \sigma > 0 \\ 0, & \sigma = 0 \\ -1, & \sigma < 0 \end{cases} \quad \lim_{\sigma \rightarrow 0} \frac{\varphi(\sigma)}{\sigma} = 0. \quad (2)$$

Card 1/2

On a sufficient criterion ...

S/235/62/000/010/003/004
E140/E463

Eliminating ξ , Eq.(1) is written in the form

$$\begin{aligned} \dot{\eta}_s &= \sum_{k=1}^n q_{sk} \eta_k - m_s \sigma \quad (s = 1, 2, \dots, n) \\ \dot{\sigma} &= \sum_{k=1}^n p_k \eta_k - \gamma(\sigma) \cdot \sigma, \end{aligned} \tag{3}$$

where

$$q_{sk} = b_{sk} + m_s j_k; \quad m_s = \frac{n_s}{r} \quad (r \neq 0); \quad p_k = \sum_{s=1}^n j_s b_{sk} + r j_k$$

$$\gamma(\sigma) = \rho + r[h + \psi(\sigma)]; \quad \rho = \sum_{s=1}^n m_s j_s, \quad \psi(\sigma) = \frac{\varphi(\sigma)}{\sigma}. \tag{4}$$

Then the stability condition for the system (1) may be written in the form

$$4(\rho + rh) + \omega > 2\sqrt{ac} \tag{11}$$

A numerical example is given.

Card 2/2

11111-34-00 L.A.

MUKHIN, M.Ye., kand.tekhn.nauk; MANSUROV, L.A., gornyy inzh.; RAFIYENKO, D.I.,
gornyy inzh.

Breaking ore by means of small diameter boreholes during lode
mining. Gor. zhur. no.1:32-34 Ja '58. (MIRA 11:3)

1. Institut gornogo dela AN SSSR.
(Mining engineering)

GOLOVANOV, I.M.; MANSUROV, M.; MAMONTOV, B.V.; YESIMOV, B.O.

Bismuth mineralization in magnesium magnetite skarns in one
of the ore manifestations in the Kurama Range. Uzb. geo. zbur.
9 no.6:10-17 '65. (MIRA 19:1)

1. Institut geologii i geofiziki imeni Abdullayeva AN UzSSR.
Submitted March 19, 1965.

MANSUROV, M.Kh.; ZUFAROV, T.Z.

Eradication of malaria in Komsomol District, Samarkand Province,
by measures preventing the appearance of new malarial foci [with
summary in English]. Med.paraz. i paraz.bol. 27 no.5:581-583
S-0 '58. (MIRA 12:1)

1. Iz Instituta malyarii i meditsinskoy parazitologii Ministerstva
zdravookhraneniya Uzbeskoy SSSR (dir. instituta - prof. L.M. Isayev)
i iz Komsomol'skoy rayonny sanitarno-epidemiologicheskoy stantsii
(glavnyy vrach O.A. Azimova, zav. parazitologicheskim otdelim M.Kh.
Mansurov).

(MOSQUITOES,

Anopheles, eradiction & prev. of re-establishment
of malarial foci (Rus))

AKOPOV, I.E.; MANSUROV, M.M.

Effect of *Lagochilus* on blood pressure. Voen.-med. zhur. no.9:
43 S '55. (MLRA 9:9)
(BLOOD PRESSURE) (BOTANY, MEDICAL)

MANSUROV, M. M. Cand Med Sci -- (diss) "On the problem of the effect of infusions and tinctures of flowers and leaves of intoxicating lagoonchylus^{ph} on the cardiovascular system." ~~XXXXXXXXXXXX~~ Kuybyshev, 1957. 11 pp 21 cm. (Kuybyshev State Med Inst), 200 copies. (KL, 13-57, 101)

AKOPOV, I.E., KONOVALOVA, V.A., MANSUROV, H.M.

Pharmacology of stachydrin hydrochloride. Farm. i toks. 21 no.3:44-46
My-Je '58 (MIRA 11:7)

1. Kafedra farmakologii (zav. - prof. I.E. Akonov) Samarkandskogo
meditsinskogo instituta imeni I.P. Pavlova.

(ALKALOIDS.

Legochilus hirtus alkaloid stachydrin HCl, pharmacol.
(Rus))

MANSUROV, M.M.

Effect of infusions of *Lagochylus inebrians* on venous pressure
under experimental conditions. Med.zhur.Uzb. no.3:60-61 Mr '62.

(MIRA 15:12)

1. Iz kafedry farmakologii (zav. - dotsent S.M.Tregubov,
nauchnyy rukovoditel' - prof. I.E.Akopov) Samarkandskogo meditsin-
skogo instituta.

(LAGOCHYLUS)

(BLOOD PRESSURE)

(HYPERTENSION)

MANSUROV, M.M.; RAKHIMOVA, M.K., dotsent

Effect of capers on the retraction of blood clots and the
quantity of thrombocytes. Farm. i toks. 28 no.5:551-552
S-0 '65. (MIRA 18:12)

1. Kafedra farmakologii (zav. - dotsent S.M.Tregubov) i
kafedra normal'noy fiziologii (zav. - dotsent M.K.Rakhimova)
Samarkandskogo meditsinskogo instituta imeni I.P.Pavlova.
Submitted February 12, 1965.