

L 13666-63

ACCESSION NR: AP3001432

4

straight line, under the edge of the sample or at any desired angle to its surface, and are geared at one-second intervals. The duration of exposure to the flame is 1, 2, 3, 4, 5, 6, 7, and 8 seconds. The distance of the burner from the sample as well as the intensity of the flame can be set at will, and, where desired, the nozzle will supply a current of air. Sheets of vulcanized butylene and chloroprene rubbers, containing some fillers, were subjected to tests in this apparatus. It was found that the addition of urea or of a mixture of melamine with cyanuric acid markedly increased the resistance of butylene rubber to ignition. Orig. art. has: 3 drawings and 1 table.

ASSOCIATION: none

SUBMITTED: 00

DATE ACQ: 30 May 63

ENCLS: 00

SUB CODE: 00

NO REF Sov: 003

OTHER: 000

Card: 2/2

SHMELEV, Sergey Vladimirovich; MAZINA, B.V., retsenzent;
DUBROVSKAYA, A.I., spets. red.; VINOGRADOVA, G.A.,
tekhn. red.

[Technology and equipment of cotton finishing] Tekhnologija
i oborudovanie otdelochnogo khlopcatobumazhnogo proizvod-
stva. Izd.2., perer. i dop. Moskva, Rostekhizdat, 1962.
309 p. (MIRA 16:5)
(Cotton finishing) (Textile machinery)

MAZINA, F. V., SHAPIRO, S. L. and POLOZHENTSEVA, S. P.

"

"Ascorbic acid content of blood and urine in measles and the therapeutic value of hipberry extract in the treatment of pneumonia of measles." Pediatriya, 1940, No. 10, pp 29-35.

Hospitalized measles patients show, from the onset of the disease until late convalescence, a well-defined deficit of vitamin C. Per os introduction of large doses of hipberry ext. greatly diminishes this deficit and raises the blood level of vitamin C. The level in the urine generally parallels that in the blood, especially in the more robust children. In most serious cases the treatment may require up to 20 days of daily administration. Thus administered vitamin C has no effect on any of the symptoms of measles pneumonia, nor does it prevent any of the complications. However, it improves the action of other active methods of treatment of the disease, as shown by better convalescence rate.

G. M. Kosolapoff

VISHNEVSKIY, A. A;GRITSMAN, Yu. Ya;KONIKOVA, A. S;MAZINA, F. V.

Investigation on the role of the nervous system in regulation of
synthesis of hippuric acid by kidneys. Doklady Akad. nauk SSSR
83 no.4:621-624 1 Apr 1952.
(CLML 22:2)

1. Presented by Academician A. D. Speranskiy 8 February 1952.

VOROTINTSEVA, Ye.N.; MAZINA, P.V.; KRAKOVSKIY, N.I.

Amount of novocaine and of products of its hydrolysis in the blood
and urine after novocaine block. Farm. i toks. 16 no.6:38-44 N-D '53.
(MLRA 7:1)

1. Biokhimicheskaya laboratoriya (zaveduyushchiy - doktor biologicheskikh nauk A.S.Konikova) Instituta khirurgii im. A.V.Vishnevskogo Akademii meditsinskikh nauk SSSR.
(Novocaine) (Blood) (Urine)

The determination of novocaine concentration in the urine of patients and test animals after novocaine block and anesthesia. N. I. Krakovskii and V. V. Marina. *Klin. Med. (U.S.S.R.)* 31, No. 11, 29-34 (1953). In spinal block the excretion (0.0-15% depending upon diuresis) takes place during the first 2 hrs. After this period there is little if any left, irrespective of the nature of the disease, gravity of the patient's condition, or the site of injected novocaine. Diuresis, enzymic processes in the body which split up novocaine, and the site of injection determine to a large extent the amt. excreted. Dogs excrete 91.5-95.7% of novocaine. The largest amt. is excreted during the second and third hrs., with the amt. of the introduced fluid affecting the output. The effect of the site of injection upon the amt. and speed of the canine output is much more pronounced than in humans. The larger output in canines is partly due to the fact that they lack the ability to acetylate the aromatic amino derivs. of novocaine, thus retaining them in the body. The procedure used for the detn. of novocaine was Levenstein-Magidson's method modified by K. A. M.

Inst. Surgery em. A. V. Vishnevskiy, Acad Medical Sci USSR.

S/138/60/000/008/008/015
A051/A029

AUTHORS: Nusinov, M.D.; Ivanov, B.I.; Mazina, G.R.; Chernaya, V.V.; Pozin, A.A.

TITLE: The Application of Electric Contact Transmitters for Measuring Large Deformations of Latex Films

PERIODICAL: Kauchuk i Rezina, 1960, No. 8, pp. 35 - 37

TEXT: Latex balloons widely used in atmosphere probing frequently undergo premature deformations when being elevated to a given height, probably due to an uneven distribution of the deformations at different areas of their surfaces. The investigation of the deformations in the different areas of the latex balloon was undertaken, adopting experimental conditions close to those encountered in the performance of the balloons, i.e., low temperatures and electrical discharges. The authors overcame the usual difficulties of measuring deformations of large magnitudes, especially under the given conditions of low temperature and of curved object, by using transmitters of the electric contact type in a thermobaro-chamber. Measurements were made at different parts of the surface of the balloon (in the equatorial and meridional directions). The rheochord transmitter could not be used in view of the changing temperature. The transmitter showings were recorded on Card 1/4

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A051/A029

The Application of Electric Contact Transmitters for Measuring Large Deformations
of Latex Films

a photographic tape at a distance, using a magnetic-electrical oscillograph of the MNO-2 (MPO-2) type. Figure 1 is a diagram of the electric contact transmitter used by the authors, and Figure 2 is a circuit diagram of the transmitter's connection. The transmitter has the following design: Two supporting prisms (2) of 5x 5x 5 mm made of plexiglas are fastened onto the balloon surface (1), using compensation latex films (3). The No. 88 glue is used for fastening the prisms and the latex films to the balloon's surface. The prisms serve as contacts for connecting the outlets which join the transmitter to the electrical measuring circuit. The compensation films prevent the occurrence of local voltages concentrating in the balloon's film during expansion, due to its slight thickness. The thickness of the film was 0.10 - 0.15 mm at the beginning of the measurements and a few microns at the final point. The experiments were carried out only 24 hours after the transmitters were attached to the surface of the balloon to ensure satisfactory adhesion. Manganin was used as the material for the contact wire due to its low temperature coefficient. The distance between the supporting prisms, when fastened to the balloon's surface, was 25 mm. A description is given of the design

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The Application of Electric Contact Transmitters for Measuring Large Deformations
of Latex Films

of the current recorders, situated in the supporting prisms. As the balloon expands, the supporting prisms move in opposite directions and cause periodic connecting and disconnecting of the circuit in the transmitter and a corresponding jump of the current in the electrical circuit. A visual check is made by counting the number of tubes which light up connected in series with the oscillograph's vibrator. Figure 3 is a typical oscillogram of the transmitter's showings. The accuracy of the counting would depend on the accuracy of division of the contact wire into various sections. Figure 3 shows that the rate of deformation is variable at different periods of time. This fact is taken into account when studying the kinetics of the film's deformation under conditions close to real ones. The authors conclude that their method is useful in measuring large deformations, such as 500 - 600%, of non-metal materials (rubber, latex films, plastics, etc.). It is especially useful in measuring at distances under conditions similar to actual performance. There are 3 figures and 5 references: 4 Soviet and 1 English.

ASSOCIATION: Nauchno-issledovatel'skiy institut rezinovykh i lateksnykh izdeliy
(Scientific Research Institute of Rubber and Latex Articles)

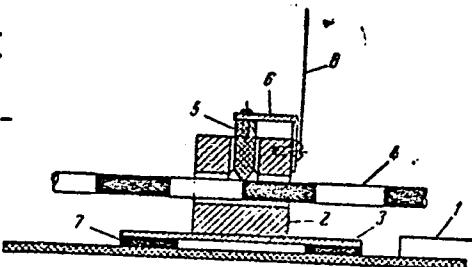
Card 3/4

S/138/60/000/008/008/015
A051/A029

The Application of Electric Contact Transmitters for Measuring Large Deformations of Latex Films

Figure 1:

Schematic Installation of an Electric Contact Transmitter (Sliding Contact):
 1-latex film;
 2-supporting prism;
 3-compensation film;
 4-manganin wire;
 5-copper-carbon brush;
 6-spring-loaded contact;
 7-place of adhesion of the compensation film;
 8-outlet wire.

Figure 2:

Electric Connection Diagram of the Transmitter
 1-latex film
 2-electric lamp;
 3-battery;
 4-prism with constant contact;
 5-prism with sliding contact;
 6-manganin wire;
 7-vibrator;
 8-compensation film.

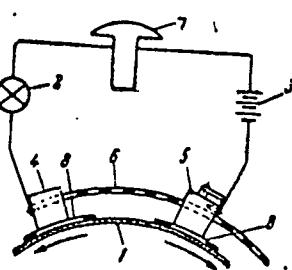
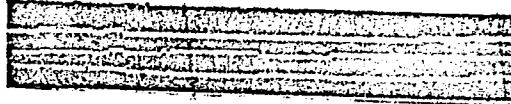


Figure 3:
 Typical Oscillogram of Transmitter Readings.



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L-27268-65 EWT(m)/EPP(c)/EWP(j) PC-4/Pr-4 RM

ACCESSION NR: AP4011310

S/0069/64/026/001/0072/0075

AUTHOR: Mazina, G. R.; Pechkovskaya, K. A.; Chernaya, V. V.

26

18

B

TITLE: Electron microscopic investigation of latex gel structures

SOURCE: Kolloidnyy zhurnal, v. 26, no. 1, 1964, 72-75

TOPIC TAGS: latex gel, latex film, structure, syneresis, drying, vulcanization, electron microscope, polychloroprene latex, tensile strength, stretch, shrinkage

ABSTRACT: Electron microscopic investigation of gels and films obtained by ionic deposition of polychloroprene latex showed that they have a continuous globular structure which is retained throughout all stages of the technological process.

lar structure which is retained throughout all stages of the technological process—syneresis, drying and vulcanization. Partial coalescence takes place during syneresis and drying, increasing the mean size of the globules and causing the system to become more homogeneous. This results in an increase in the tensile strength and relative stretch. Vulcanization does not cause breakdown of the globular structure, but the average size of the globules decreases, apparently due to

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shrinkage. The electron microscope findings are in agreement with the physico-chemical results which show a change in structure corresponding to changes in physical properties. Orig. art. has: 3 figures and 1 table

ASSOCIATION: Nauchno-issledovatel'skiy institut shinoi promyshlennosti
(Scientific Research Institute of the Tire Industry); Nauchno-issledovatel'skiy
institut rezinovykh i lateksnykh izdeliy, Moscow (Research Institute for Rubber

"APPROVED FOR RELEASE: 06/14/2000

CIA-RDP86-00513R001033120019-1

~~and Latex Products)~~

SUBMITTED: 26Jul62

ENCL: 00

SUB CODE: MT

NO REF SOV: 004

OTHER: 004

Card 2/2

APPROVED FOR RELEASE: 06/14/2000

CIA-RDP86-00513R001033120019-1"

CHERNAYA, V.V.; MAZINA, G.R.

Some peculiarities of vulcanizing films made of chloroprene
latex. Kauch. i rez. 20 no.9:8-11 S '61. (MIRA 15:2)

1. Nauchno-issledovatel'skiy institut rezinovykh i lateksnykh
izdeliy.

(Vulcanization)
(Latex)

MAZINA, G.R.; PECHKOVSKAYA, K.A.; CHERNAYA, V.V.

Electron microscope study of latex gel structures. Koll.shur. 26
no.1:72-75 Ja-F '64. (MIRA 17:4)

1. Nauchno-issledovatel'skiy institut shinnoy promyshlennosti i
Nauchno-issledovatel'skiy institut rezinovykh i lateksnykh izdeliy,
Moskva.

BOGORODITSKAYA, N.I.; MAZINA, L.Ya.

Geochemical characteristics of Carboniferous sediments in the Tengiz
Depression. Avtoref. nauch. trud. VNIGRI no.17:54-61 '56.

(MIRA 11:6)

(Tengiz Depression--Rocks, Sedimentary)

MAZINA, M., starshiy prepodavatel'

Bonus payment and the strengthening of business accounting.
Sots. trud 7 no.5:58-62 My '62. (MIRA 15:5)

1. Gor'kovskiy politekhnicheskiy institut.
(Gorkiy--Wages--Machinery industry)
(Bonus system)

ARTAMONOV, P. (Gor'kiy); MAZINA, M., ekonomist (Gor'kiy)

This is the group wage system, not wage equalization. Sov.
profsoiuzy 20 no.4:20-21 F '64. (MIRA 17:3)

1. Predsedatel' komissii zarabotnoy platy i normirovaniya
truda zavodskogo komiteta Gor'kovskogo avtozavoda (for
Artamenov).

MAZINA, N. M.: Master Med Sci (diss) -- "An immunochemical study of the complex antigens of cancerous and normal human tissue". Moscow, 1958. 11 pp (Acad Med Sci USSR), 200 copies (KL, No 1, 1959, 124)

MAZINA, N.M.

Immunochemical investigation of complex antigens in human tissue.
[with summary in English]. Biul.eksp.biol. i med. 45 no.2:98-102
1958. (MIRA 11:5)

1. Iz laboratorii immunokhimii (sav. - prof. V.S. Gostev) Instituta
eksperimental'noy biologii (dir.-prof. I.N. Mayskiy)-AMN SSSR.
(ANTIGENS,
immuno-chem. exam, in human tissue (Rus))

MAZINA, N.M.

Serological activity of tissue lipids in man [with summary in English]
Biul.ekspl.biol. i med. 45 no.5:74-79 My'58 (MIRA 11:6)

I. Iz laboratorii immunokhimii (zav. - prof. V.S. Gostev)
Instituta eksperimental'noy biologii (dir. - prof. I.N. Mayskiy)
AMN SSSR, Moskva. Predstavlena deystvitel'nym chlenom AMN SSSR
N.N. Zhukovym-Verezhnikovym.

(LIPIDS,
serol, reactions of lipids from various organs (Rus))

MAZINA, N.N.

immunochemical properties of various fractions of cancerous and
normal human tissues [with summary in English]. Biul.eksp.biol.
i med. 46 no.8:82-87 Ag '58 (MIRA 11:10)

1. Iz laboratorii immunokhimii (zav. - prof. V.S. Gostev)
Instituta eksperimental'noy biologii (dir. - prof. I.N.Mayskiy)
AMN SSSR, Moskva. Predstavlena deystvitel'nym chlenom AMN SSSR
N.N. Zhukovym-Verezhnikovym.

(NEOPLASMS, immunol.

immunechem. properties of various fractions of cancerous
& normal human tissues (Rus))

MAZINA, N.M.

Study of the "complete" antigen of cancerous and normal human tissue.
Vop. onk. 6 no.4:63-69 Ap '60. (MIRA 14:3)
(CANCER) (ANTIGENS AND ANTIBODIES)

MAZINA, N.N.; RASSOKHINA, I.I.; GOSTEV, V.S.; SALIMOV, M.A.

Immunochemical study of various lipid fractions in human tissue.
Vop.med.khim. 6 no.4:412-419 J1-Ag '60. (MIRA 14:3)

1. Laboratory of Immunochemistry, Institute of Experimental Biology,
the U.S.S.R. Academy of Medical Sciences, and the Chairs of Animal
Biochemistry and Physical Chemistry Moscow State University.
(LIPIDS)

GOSTEV, V.S. (Moskva, D-284, Begovaya u., 11, kv. 37); AZLETSKAYA, A.Ye.;
SAAKOV, A.K.; GRIGOR'YAN, D.G.; CHAMOVA, K.G.; ZYKOV, Yu.V.;
PERELAZNYY, A.A.; MAZINA, N.M.; KULAGIN, N.A.; MAKOVEYEVA, G.M.

Study of the antigenic properties of human tumors fractions
deprived of soluble proteins. Vop. onk. 8 no.9:18-26 '62.
(MIRA 17:6)

1. Iz laboratorii immunokhimii Instituta eksperimental'noy
biologii AMN SSSR (dir.- prof. I.N. Mayskiy).

GOSTEV, V.S.; SAAKOV, A.K.; AZLETSKAYA, A.Ye.; PERELAZNYY, A.A.; NAZARENKO, N.A.; MAZINA, N.M.; KULAGIN, A.N.; ZYKOV, Yu.V.; NIKITENKO, A.A.; SKACHEV, N.I.

Comparative immunochemical study of antisera to tissue homogenates and the mixtures of their nonprotein fractions. Biul. eksp. biol. i med. 57 no.4:94-97 Ap '64. (MIRA 18:3)

1. Laboratoriya immunokhimii (zav. - prof. V.S. Gostev) Instituta eksperimental'noy biologii (dir. - prof. I.N. Mayskiy) AMN SSSR, Moskva. Submitted May 17, 1963.

MAZINA, O. I.

"Study of Phenols Obtained by Different Methods of Gazification of Peat." Acad. Sci.
Belorussian SSR, Division of Physicomathematical and Technical Sciences, Minsk,
1955. (Dissertation for the Degree of Candidate in Technical Sciences)

SO: Knizhnaya Letopis', No. 22, 1955, pp 93-105

RAKOVSKIY, V.Ye.; MAZINA, O.I.

Effect of the conditions of gasification on the phenol content
of peat tar. Trudy Inst. torfa AN BSSR 7:162-173 '59.

(MIRA 14:1)

(Peat gasification) (Phenols)

USSR/Medicine - Eye Diseases
Medicine - Ophthalmology Nov/Dec 48

"A Case of Optic Effuvium Caused by the Larva
of a Sheep Botfly (*Oesturus oris*)", R. O.
Mazina, Eye Clinic, Chelyabinsk Med Inst, 1 p
"Vest Oftalmol" Vol XXVII, No 6

Clinical diagnosis is difficult as early form
of disease resembles tubercular or other
tridocyclitis, glioma, etc. In this case, larva
might have penetrated the orbit through the con-
junctival sac or nasal cavity, doubtless, at the
end of the summer. It remained there during its

FDD

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USSR/Medicine - Eye Diseases
(Contd) Nov/Dec 48

full cycle of development (7 - 8 months) and
emerged through the skin of the upper eyelid.

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MAZINA, R. O.

KONSTANTINOVA, M.S.; MAZINA, T.I.; REYDLER, M.M.

Effect of ionizing radiation on the functional state of the
reticuloendothelial system. Fiziol. zhur. 47 no.2:226-229 F '61.
(MIRA 14:5)

1. From the Sechenov Institute of the Evolutionary Physiology,
U.S.S.R. Academy of Sciences, Leningrad.
(RETICULOENDOTHELIAL SYSTEM) (X RAYS--PHYSIOLOGICAL EFFECT)

MAZINA, T.I., mladshiy nauchnyy sotrudnik (Leningrad)

Amount of ascorbic acid and cholesterol in the adrenal glands
of a developing chick embryo. Probl.endok.i gorm. no.1:45-49
'62. (MIRA 15:8)

1. Gruppa evolyutsii endokrinnykh funktsiy (rukovoditel' - doktor
biologicheskikh nauk L.G. Leybson) Instituta evolyutsionnoy
fiziologii imeni I.M. Sechenova (dir. - chlen-korrespondent AN
SSSR Ye.M. Kreps).
(ASCORBIC ACID) (CHOLESTEROL) (ADRENAL GLANDS)

MAZINA, T.I.

Effect of ACTH introduction on the weight and cholesterol content
of the adrenal glands in developing chicken embryos. Fiziol. zhur.
49 no.5:589-595 My '63. (MIRA 17:11)

1. From the Sechenov Institute of Evolutionary Physiology, Leningrad.

MAZINA, T.L.

Arenal cortex reactions to insulin introduction in chicken embryos. Fiziol. zhurn. 49 no. 7:873-878. 31 '63.

1. From the Leningrad Institute of Evolutionary Physiology, Leningrad.

MAZINA, T.I.

Content of ascorbic acid in the adrenal glands of sheep embryos
following introduction of ACTH and insulin. Biol. ekspl. biol. i med.
57 no.6:54-58 Je '64. (MIRA 18:4)

1. Laboratoriya evolyutsionnoi endokrinicheskikh funktsii (zav. - doktor
biolog. nauk L.G. Leybman) Instituta evolyutsionnoi fiziology
imeni Sechenova (dir. - chlen-korrespondent AN SSSR Ye.M. Kreps),
Leningrad.

MAZINA, V.O.

Syndrome of microphakia and spherophakia combined with brachydactylyia
Oft.shur. 11 no.1:59 '56. (MIRA 9:9)

1. Iz Chelyabinskoy oblastnoy bol'nitsy.
(SYE--DISEASES AND DEFECTS)
(FINGERS--ABNORMITIES AND DEFORMITIES)
(TOES--ABNORMITIES AND DEFORMITIES)

MAZINA, V.O.

Metastatic carcinomas of the uveal tract. Oft.smr. 12 no.5:
301-306 '57. (MIRA 13:6)

1. Iz kafedry glaznykh bolezney (zav. - prof. A.V. Katsnel'son)
Chelyabinskogo meditsinskogo instituta i iz glaznogo otdeleniya
Chelyabinskoy oblastnoy klinicheskoy bol'niцы.
(EYE--CANCER)

GUSEVA, M.Ye.; MAZINA, V.O. (Chelyabinsk)

Case of electromagnetic extraction of an intracerebral nail.
Vop.neirokhir. 23 no.4:43 Jl-Ag '59. (MIRA 12:10)

1. Oblastnaya klinicheskaya bol'nitsa (Chelyabinsk)
(BRAIN, for. bodies,
electromagnetic extraction of nail (Rus))

MAZINA, V.O.

Surgical treatment of retinal detachment by resection of the sclera
with invagination of the scleral band. Vest.oft.74 no.1:38-45 '61.
(MIRA 14:3)

(RETINA--SURGERY)

MAZINA, Ye.A., kandidat meditsinskikh nauk

Significance of the X-ray examination method in selecting children
for revaccination. Probl. tub. 34 no.4:12-18 Jl-Ag '56. (MIRA 9:11)

1. Iz Yakutskogo filiala Instituta tuberkuleza AMN SSSR.
(BCG VACCINATION, in inf. and child
selection for revacc.)

BOYTSOVA, Ye.P.; MAZINA, Ye.A.; MIKHAYLOV, B.M.; OVECHKIN, N.K.;
ROSSOVA, S.N., ~~tekhn. redaktor~~, GUROVA, O.A., tekhnicheskii redaktor.

[Geology of the southwestern region of the Turgay Gates]
Geologiya iugo-zapadnoi chasti Turgaiskogo progiva. Moskva, Gos.
nauchno-tekhn. izd-vo lit-ry ip geologii i okhrane nadr, 1955.
154 p. (Leningrad. Vsesoiuznyi geologicheskii institut. Trudy,
vol. 5). (MLRA 9:5)
(Turgay Gates--Geology, Stratigraphic)

MAZINA, Ye.A.; KISELEV, L.I.

Southern continuation of the main iron-ore zone of the Turgay
trough. Trudy VSEGEI 102:104-114 '64.

(MIRA 8:2)

MAZINA, YE. G.

USSR/Medicine - Tuberculosis
Medicine - Vaccination

May/Jun 49

"Effectiveness of Vaccinating Small Children Against Tuberculosis," Ye. G. Mazina, Dispensary Sector, Inst of Tuberculosis, Acad Med Sci, 4 pp

"Prob Tuber" No 3

Vaccinated and studied 701 small children 2 - 4 years old and used a group of 233 children as control to test the effectiveness of antituberculosis medication. Tabulated results. Intracutaneous method was most effective because it produced

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USSR/Medicine - Tuberculosis
(Contd) May/Jun 49

a greater allergic reaction. A 0.02-mg dose produced greater allergic reaction than a 0.01-mg dose. Vaccinated children showed fewer incidences and milder cases than those who were not vaccinated. Suggests shortening interval of revaccination to one year, and continuing the study of various methods and doses of vaccination to increase the immunizing effect of BCG.

57/49298

MAZINA, YE.G.

OYFERBACH, M.I.; ELIISON, F.L.; SHATALOVA, O.S.; MAZINA, Ye.G.; YAMPOL'SKAYA,
V.D.

Incidence of healing in primary tuberculosis in adolescents and adults.
Prob. tuberk., Moskva no.2:31-36 Mr-Apr '50. (GIML 19:3)

1. Of the Institute of Tuberculosis of the Academy of Medical Sciences
USSR (Director -- Z.A.Lebedeva; Scientific Director -- Prof. A.Ye.Ra-
bukhin).

MAZINA, YE. G.

Tuberculosis

Significance of preventive inoculation against tuberculosis and role of nurse.
Med. sestra No. 6, 1952.

9. Monthly List of Russian Accessions, Library of Congress, September 1952. UNCLASSIFIED.

MAZINA, Ye. G.

"The Clinical Course and Prophylaxis of Tuberculosis in Adolescents." Sub
28 Nov 51, Acad Med Sci USSR.

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

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

MAZINA, YE.G.

MAZINA, Ye.G.

Methodical management of factory laboratories. Tekst.prom. 14
no.6:12-14 Je '54. (MLRA 7:7)
(Textile research)

SHCHEPETOV, M.F.; MAZINA, Ye.G.

Out-of-town session of the Yaku branch of the Tuberculosis
Institute of the Academy of Medical Sciences of the U.S.S.R.
Probl. tub. 34 no.1:67-68 Ja-F '56 (MLRA 9:5)

(TUBERCULOSIS)

MAZINA, Ye.G., kandidat meditsinskikh nauk; SHCHEPSTOV, M.F., zasluzhennyj
vrach RSFSR i Yakutskoy ASSE.

Out-of-town session of the Yakut branch of the Institute of
Tuberculosis of the Academy of Medical Sciences of the U.S.S.R.
Probl.tub. 35 no.1:114-115 '57. (MLRA 10:6)
(TUBERCULOSIS)

MAZINA Ye. G.

ANDREYEV, Ye.N., kand.med.nauk; MAZINA, Ye.G., kand.med.nauk; AMMOSOV, N.P.;
KORYAKINA, T.I.

Changes in tuberculosis epidemiology in Yakutsk during the period
1948-1955 [with summary in French]. Probl.tub. 35 no.8:3-7 '57.

(MIRA 11:4)

1. Iz Yakutskogo filiala (dir. Ye.N.Andreyev) Instituta tuberkuleza
AMN SSSR.

(TUBERCULOSIS, epidemiol.
in Russia 1948-1955 (Rus))

MAZINA, Ye.G., kand.med.nauk., MUSATOVA, A.V., KHRANOVA, M.I., NABOKINA, Ye.K.
SKOPTSOVA, S.M., KUZNETSOVA, S.A., KARPEL', L.M., DAMANSKAYA, N.V.
FILIPPOVA, T.V.

Effectiveness of epidermal vaccination of newborns. Vop. okh.
mat. i det. 3 no. 6:53-58 N-D '58 (MIRA 11:12)

1. Iz Yakutskogo filiala (dir. Ye.N. Andreyev) Instituta tuberkuleza
AMN SSSR.
(TUBERCULOSIS--PREVENTIVE INOCULATION)

MAZINA, Ye.G., kand.med.nauk; BERESTENNIKOVA, Ye.V.; OBUKHOVSKAYA, L.T.;
POPOVA, R.V.

Child's body reaction to repeated injection of increased doses of
BCG vaccine by enteral method. Vop. epid. i klin. tub. 5:37-45
'58. (MIRA 14:12)
(BCG--PHYSIOLOGICAL EFFECT)

ANDREYEV, Ye.N., kand.med.nauk, zasluzhennyj vrach RSFSR i Yakutskoy ASSR, red.; NAZIMA, Ye.G., kand.med.nauk, zasluzhennyj vrach RSFSR i Yakutskoy ASSR, red.; SHCHEPETOV, M.F., kand.med.nauk, zasluzhennyj vrach RSFSR i Yakutskoy ASSR, red.; D'YACHKOV-SKAYA, I.S., red. iad-va; SOLOV'YEV, Ye.P., tekhn.red.

[Tuberculosis; manual for physicians] Tuberkulez; posovie dlja vrachei. Jakutskoe knizhnoe iad-vo, 1959. 167 p.
(MIRA 14:5)

1. Akademija meditsinskikh nauk SSSR. Institut tuberkuleza.
Yakutskiy filial.

(TUBERCULOSIS)

MAZINA, Ye.G.

Preventive treatment of tuberculosis in young children in the initial period of infection and its organization in the Yakut A.S.S.R. Vop. okh.mat. i det. 4 no.4:69-73 Jl-Ag '59. (MIRA 12:12)

1. Iz Yakutskogo filiala Instituta tuberkuleza (dir. Ye.N. Andreyev).
(YAKUTIA--TUBERCULOSIS--PREVENTION)

MAZINA, Ye. G., kand. med. nauk (Yakutsk)

Chemoprophylaxis of tuberculosis in children under 1 year of age
in the Yakut ASSR. Probl. tub. no.7:10-13 '61.
(MIRA 1/12)

(YAKUTIA—TUBERCULOSIS—PREVENTION)

ANDREYEV, Ye.N., kand. med. nauk, red.; LYUBIMOV, P.V., red.;
~~MAZINA, Ye.G.~~, red.; TEKUNOV, V.S., red.; SHCHEPETOV,
M.F., kand. med. nauk, red.; D'YACHKOVSKAYA, L.S., red.
izd-va; YEGOROVA, A.V., tekhn.red.

[Data of the Interprovince Conference on the Exchange of
Experience in the Organization of Antituberculosis Aid
in Regions of the Far North] Materialy Mezoblastnogo
soveshchaniya po obmenu optyom organizatsii protivotu-
berkuleznoy pomoshchi v rayonakh Kraynego Severa. Iakutsk,
IAkutskoe knizhnoe izd-vo, 1963. 150 p. (MIRA 16:10)

1. Mezoblastnoye soveshchaniye po obmenu optyom organizatsii
protivotuberkuleznoy pomoshchi v rayonakh Kraynego Severa.
 2. Nachal'nik otdela protivotuberkuleznoy pomoshchi Minister-
stva zdravookhraneniya RSFSR (for Tekunov). 3. Ministr zdravo-
okhraneniya Yakutskoy ASSR (for Lyubimov).
- (SOVIET FAR NORTH—TUBERCULOSIS—PREVENTION)

MAZINA, Ye.G.; SHCHEPETOV, M.F.; MOCHALOVA, T.P., kand.med.nauk.

Congresses, conferences, scientific societies. Probl. tub. 42
no. 3:91-94 '64. (MIRA 18:1)

MAZINA, Ye.G.

Textile and knitting machines. Tekst.prom. 21 no.9:80-81 S '61.
(MIRA 14:10)
(Great Britain—Textile machines) (Moscow—Exhibitions)

MAZINA, Ye. G.

Use of shuttleless ribbon looms in foreign countries. Tekst.
prom. 21 no.10:71-73 0 '61. (MIRA 14:10)

1. Nachal'nik Byuro tekhnicheskoy informatsii TSentral'noy
nauchno-issledovatel'skoy laboratorii tekstil'no-galantereynoy
promyshlennosti.

(Looms)

MAZINA, Ye.G.

Technical information in the textile and haberdashery industry. Tekst.prom. №2 no.10:91-92 O '62. (MIRA 15:11)

1. Nachal'nik sektora tekhnicheskoy informatsii TSentral'noy nauchno-issledovatel'skoy laboratorii tekstil'no-galantereynoy promyshlennosti.

(Textile industry)
(Technology—Information services)

MAZINA, Ye.O.

Textile and dry goods industry; new developments in foreign
technology. Tekst.prom. 22 no.12:85-87 D '62. (MIRA 16:1)

1. Nachal'nik byuro tekhnicheskoy informatsii TSentral'noy
nauchno-issledovatel'skoy laboratorii tekstil'nogo-galantereynogo
promyshlennosti.

(Textile machinery)

MAZINA, Ye. G.

Using the knitting method for the manufacture of lace, tulle,
and curtains. Tekst. prom. 23 no. 3:86-88 Mr '63.
(MIRA 16:4)

(Lace and lacemaking) (Knitting machines)

MAZINA, Ye.G.

Manufacture of textile and dry goods. Tekst.prom. 23 no.8:86-87
Ag '63. (MIRA 16:9)

1. Nachal'nik otdela tekhnicheskoy informatsii Vsesoyuznogo
nauchno-issledovatel'skogo instituta tekstil'no-galantereynoy
promyshlennosti.

(Textile industry)

MAZINA, Ye.G.

New developments in the dry goods industry. Tekst. prom. 24 no.3:
94-95 Mr '64. (MRA 17:9)

1. Nachal'nik otdela tekhnicheskoy informatsii Vsesoyuznogo nauchno-
issledovatel'skogo instituta tekstil'no-galantereynoy promyshlennosti
(VNIITGP).

MAZINA, Ye.G.

In foreign countries: New developments in the textile and accessories industry. Tekst. prom. 24 no.9:80 S '64.

(MIA 17:11)

1. Nachal'nik otdela tekhnicheskoy informatsii Vsesoyuznogo nauchno-issledovatel'skogo instituta tekstil'no-galantereynoy promyshlennosti.

MAZING, G. A.

PHASE I BOOK EXPLOITATION

SOV/5461

Akademiya nauk SSSR. Institut teoreticheskoy astronomii.
Astronomicheskiy yezhegodnik SSSR na 1962 g. (Astronomical Yearbook of the
USSR for 1962) Moscow, Izd-vo Akademii nauk SSSR, 1960. 647 p. Errata
slip inserted. 2,000 copies printed.

Sponsoring Agency: Institut teoreticheskoy astronomii Akademii nauk SSSR.
Resp. Ed.: M. F. Subbotin, Director of the Institute of Theoretical Astronomy
of the Academy of Sciences USSR, Corresponding Member, Academy of
Sciences USSR.

PURPOSE: This book is intended for astronomers and geophysicists.

COVERAGE: The Astronomical Yearbook of the USSR for 1962 has been com-
piled in accordance with changes proposed by the International Astronomical
Union to member organizations at its meeting in 1958. In addition to usual

Card 1/10

Astronomical Yearbook (Cont.)

SOV/5461

information on the Sun, Moon, Earth, and planets, the Yearbook contains the ephemerides of the lunar crater Moesting A, which until 1960 were published by the Berliner Astronomisches Jahrbuch, [Berlin Astronomical Yearbook], and whose regular publication has now been undertaken by the Institute of Theoretical Astronomy of the USSR at the request of the Union's Committee on Ephemerides. The solar, lunar, and planetary coordinates in the Yearbook are based on data supplied by the British Nautical Almanac as stipulated by the Astronomical Union. The material in the Yearbook was compiled and prepared by the following scientists: computation of ephemerides of the lunar crater Moesting A on high-speed computer BEMS at the Vychislitel'nyy tsentr AN SSSR (Computer Center AS USSR) - D. K. Kulikov; reduction of solar and lunar ephemerides - A. G. Mal'kova and G. A. Mazing; computation of nutation on high-speed computer BEMS - D. V. Zagrebin, O. M. Gromova, and A. Ya. Faletova; computation of reduction values of visible positions of ten-day and near-polar stars - M. B. Zheleznyak and M. A. Fursenko; preparation of original data on visible positions of ten-day and near-polar stars -

Card 2/16

Astronomical Yearbook (Cont.)

SOV/5461

E. A. Mitrofanova (in charge), O. M. Gromova, G. A. Mazing, T. I. Mashinskaya, G. M. Poznyak, K. G. Shumikhina, and P. A. Gutkina; heliocentric coordinates of the large planets - O. M. Gromova, A. G. Mal'kova; reduction values (trigonometric system) - E. A. Mitrofanova, and K. G. Shumikhina; mean positions of stars - E. A. Mitrofanova, M. B. Zheleznyak, O. M. Gromova, K. G. Shumikhina, M. A. Fursenko; solar and lunar eclipses - E. A. Mitrofanova, M. A. Fursenko; planetary configurations - E. A. Mitrofanova, O. M. Gromova; ephemerides for physical solar observations - P. A. Gutkina, T. I. Mashinskaya; ephemerides for physical lunar observations - G. A. Mazing, P. A. Gutkina, K. G. Shumikhina; ephemerides of the illumination of the discs of Mercury and Venus - T. I. Mashinskaya, G. M. Poznyak; ephemerides for physical observations of Mars - G. M. Mazing, T. I. Mashinskaya; ephemerides for physical observations of Jupiter - T. I. Mashinskaya, E. A. Mitrofanova; Saturn's rings - G. A. Mazing, T. I. Mashinskaya; sunrise and sunset - A. I. Frolova; rising and setting of the moon - P. A. Gutkina and K. G. Shumikhina; altitudes and azimuths of the Polar Star - A. G. Mal'kova

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Astronomical Yearbook (Cont.)

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and K. G. Shumikhina; table for determining latitude by the altitude of the Polar Star - K. G. Shumikhina and P. A. Gutkina; preparation of manuscript for publication - V. G. Kudinova; review and edition of "Explanatory Notes", D. K. Kulikov. There are no references.

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MAZING, Georgiy Yur'yavich, kand.tekhn.nauk; KALASHNIK, G.I., red.;
MEDNIKOVA, A.N., tekhn.red.

[Ram-jet engines] Vozdushno-reaktivnye dvigateli. Moskva,
Voen.izd-vo M-va oborony SSSR, 1961. 68 p.

(Rockets (Aeronautics)--Ram-jet engines)

(MIRA 15:2)

L 24705-65 EWT(d)/FSF(h)/FSS-2/EPA/EWT(1)/EPA(s)-2/ENG(k)/EWT(m)/EPF(c)/EWP(f)/
EPR/EPA(w)-2/T-2/EPA(bb)-2/EWA(m)-2/FS(b) Pz-6/Paa-4/Pab-10/Pf-4/Pr-4/Ps-4/Pt-10
IJP(c) JWA/BW/TT/KW/JW/JND

ACCESSION NR AM5002722 BOOK EXPLOITATION

S/

95

B71

Orlov, Boris Viktorovich (Doctor of Technical Sciences, Professor);
Mazing, Georgiy Yur'yevich (Candidate of Technical Sciences, Docent)

Thermodynamic and ballistic principles of designing solid fuel rocket engines (Termodinamicheskiye i ballisticheskiye osnovy proektirovaniya raketnykh dvigateley na tverdom tonule) M.....

* * * * * 707, TWO P. 3148, D1010. Errata slip inserted. 6,000 copies
printed.

TOPIC TAGS: solid rocket engine, solid rocket propellant, solid propellant combustion, rocket thrust, rocket engine vector control, gas dynamics

PURPOSE AND COVERAGE: This book, on the basis of materials published in the domestic and foreign press, presents the thermogasdynamics principles of the design of engines, the engineering methods of calculating heat exchange processes, the principles of solid propellant combustion, and the calculation of the indicator curve of pressure in the engine combustion chamber. The book gives basic information on solid propellants used in solid rocket engines. Thrust regulation in solid rocket engines and the

ALL SOLID FUELLED ENGINES ARE EXAMINED. THE BOOK IS INTENDED FOR
Card 1/2

L 24705-55

ACCESSION NR AM5002722

students in higher technical education institutes and for engineers-technicians specializing in solid fuel rocket engines.

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Ch. II. Practical problems in gas dynamics --	25
Ch. III. Basic characteristics of solid rocket propellants --	109
Ch. IV. Heat exchange in solid fuel rocket engines --	157

SUB CODE: PR, PP
OTHER: 091

SUBMITTED: 27Aug64 NR REF Sov: 074

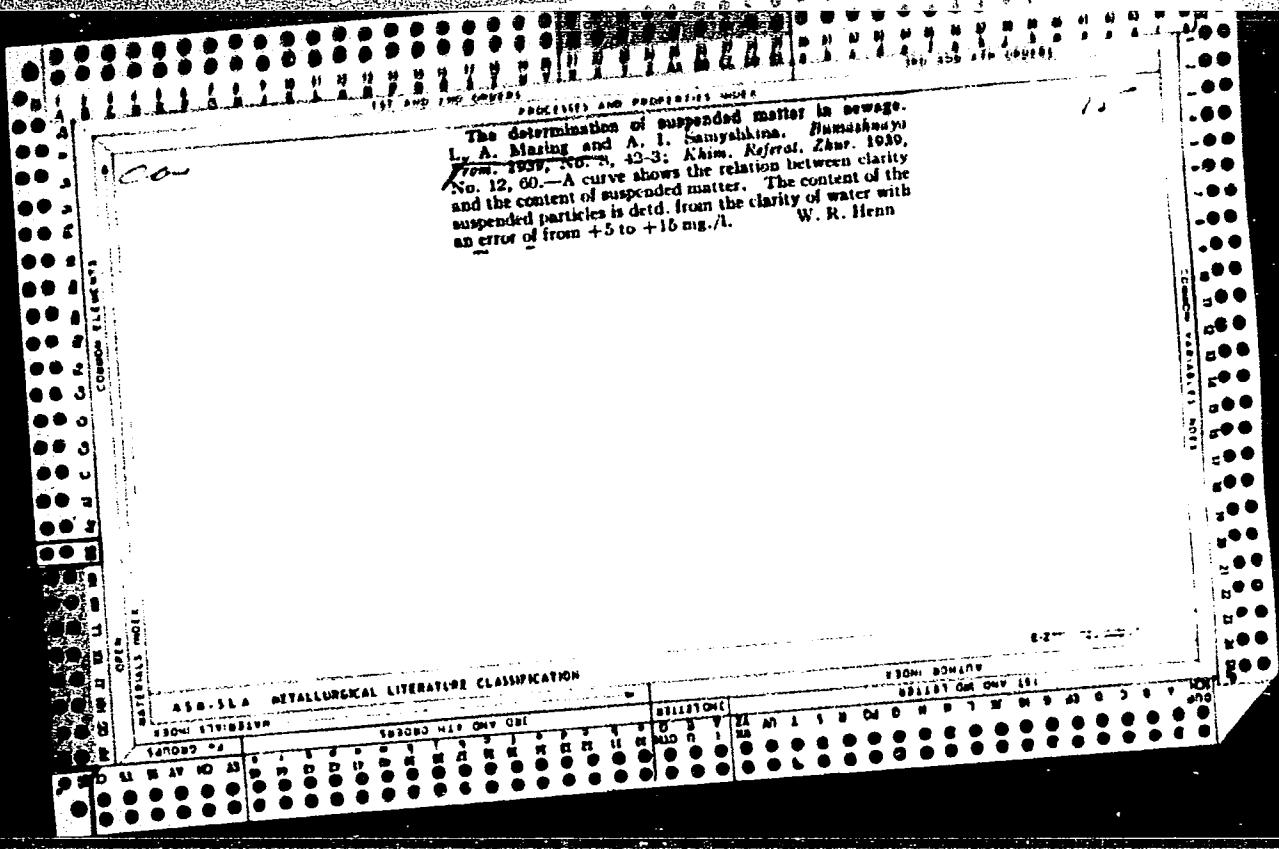
Card 2/2

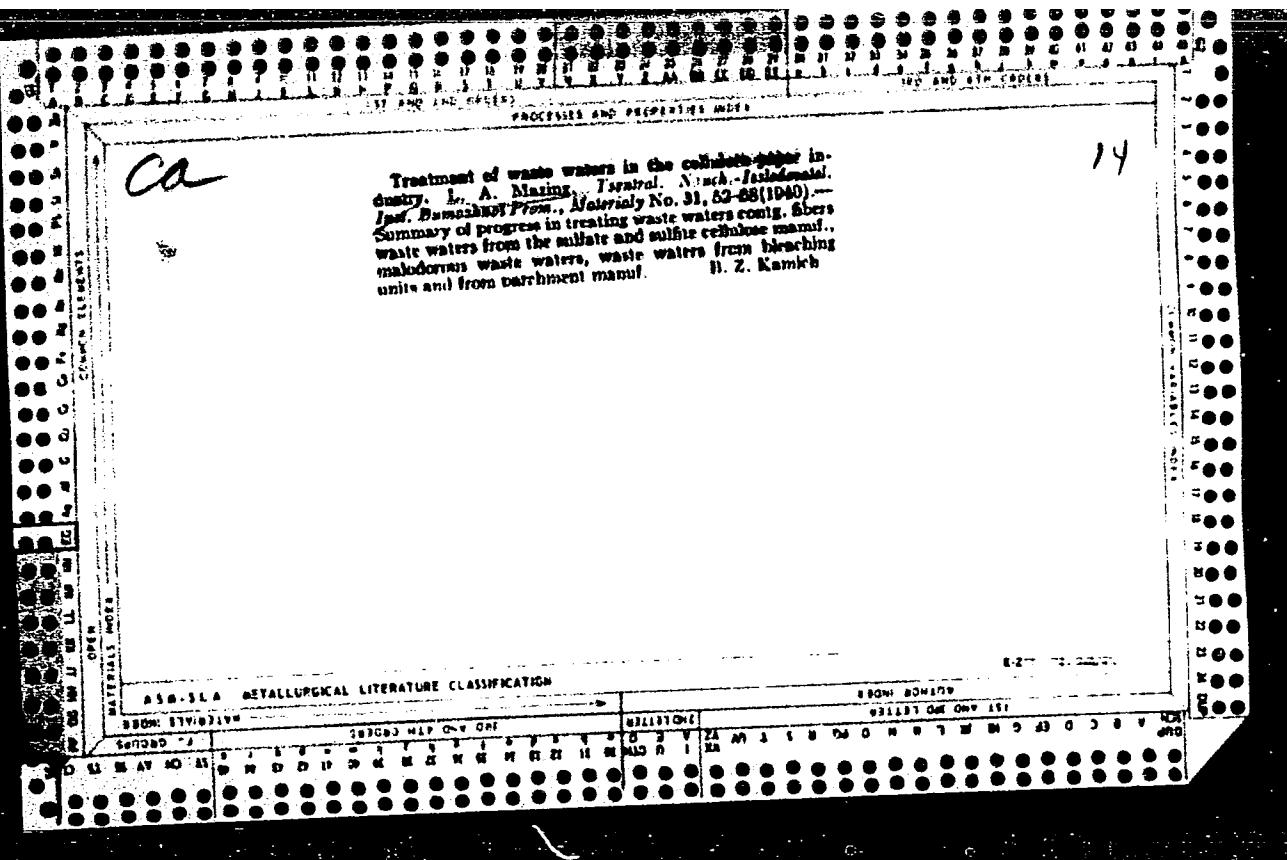
MAZING, I. V.

VINARSKIY, Ye.N., inzhener; LINKOV, A.V., inzhener; MAZING, I.V., inzhener;
CHERETYANKO, V.I., inzhener; RYKHINA, R.I., inzhener; CHUPRINA,
N.A., inzhener; PLOTNIKOVA, M.Z., inzhener; LEVPSH, A.M., inzhener;
LELYAKOVA, L.P., inzhener; MANDALOVSKAYA, M.V., inzhener; UZUMKUYAN,
I.D., inzhener; SEVRYUKOV, Ye.G., inzhener; VINARSKIY, Ye.N., redaktor;
ALADOVA, Ye.I., tekhnicheskiy redaktor

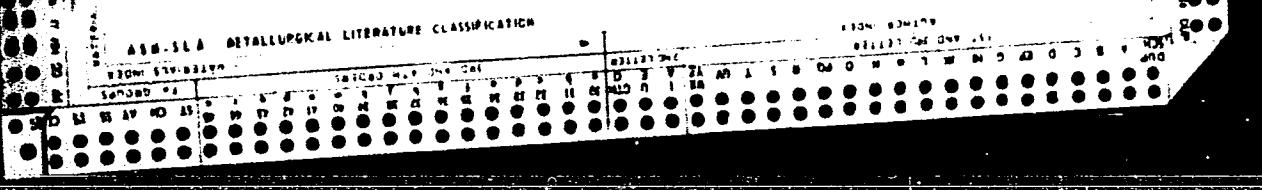
[Metal demountable headframe] Prokhodcheskie metallicheskie sborno-
rasbornye kopyry. Moskva, Ugletekhizdat, 1954. 110 p. (MIRA 8:4)

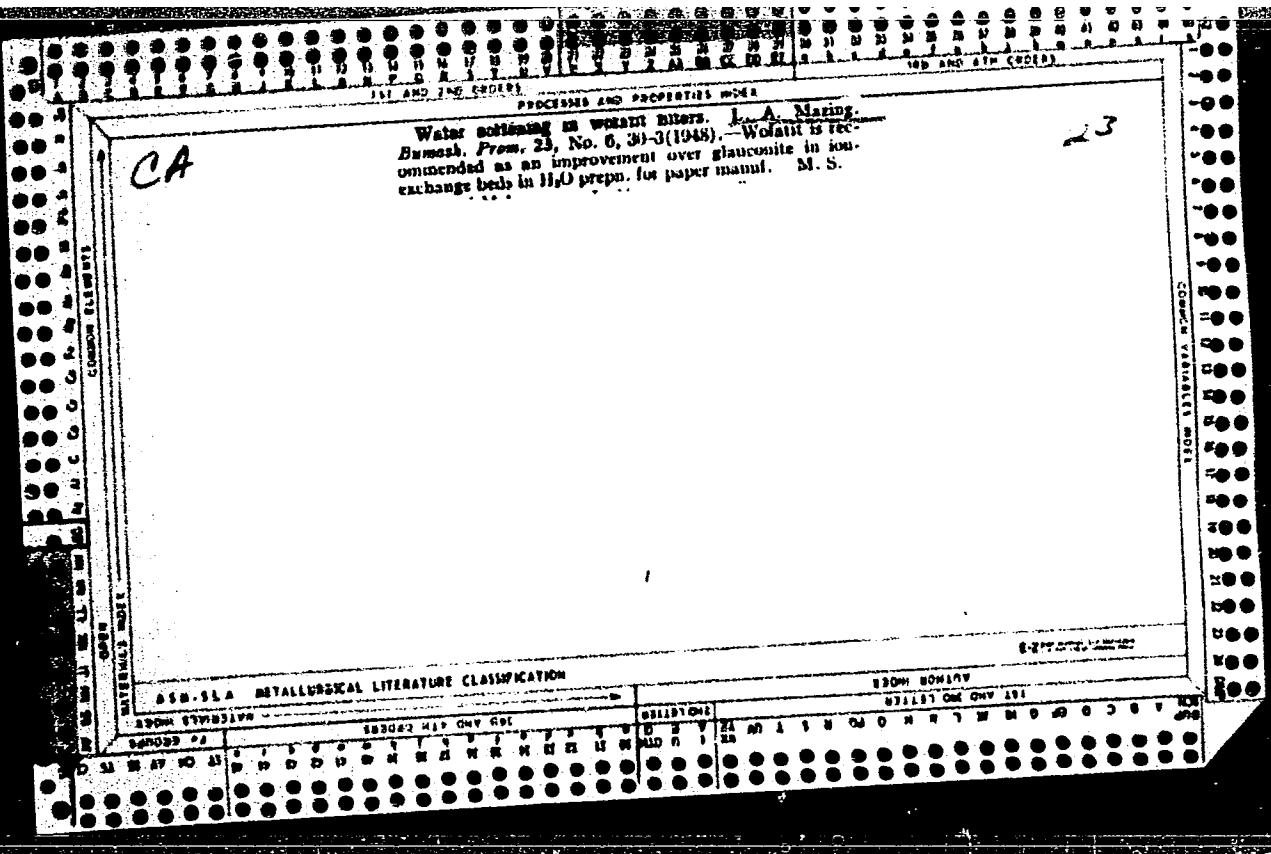
1. Moscow. Vsesoyuznyy nauchno-issledovatel'skiy institut organizatsii
i mekhanizatsii shakhtnogo stroitel'stva.
(Mine buildings)





Purification of waste waters in the production of vulcanized fiberboard. L. A. Masing and N. M. Kalkina. Bumuzhnoye Prom. 18, No. 6, 23-4 (1940).—Tests with crucian carp (8-10 cm. long) showed that $ZnCl_2$ at a concn. of 5 mg./l. is visibly injurious and at a concn. of 15 mg./l. is fatal to the fish within a period of 5-10 days. Waste waters contg. 500-1000 mg./l. $ZnCl_2$ can be made 98% pure by decompg. with a calkd. amt. of $Ca(OH)_2$, soin and settling of the $Zn(OH)_2$. C. B.





MAZING, L. A.

Mazing, L. A. - "Fresh industrial water requirements for the paper-pulp industry," Mateiraly Tsentr. nauch.-issled. in-ta bumazhnoy prom-sti, Issue 37, 1948, p. 275-96

So: U-3566, 15 March 53, (Letopis 'Zhurnal 'nykh Statey, No. 13, 1949)

~~MAKING~~, I.A. BUSLAEVA, N.S.

Use of activated silicates for the coagulation of waste water.
(MIRA 10:1)
Bum.prom.31 no.10:13-14 O' 56.
1. Tsentral'nyy nauchno-issledovatel'skiy institut tsellyuloznoy i
bursazhnoy promyshlennosti.
(Factory and trade waste) (Potassium silicates)

MAZING, I.A., SHUKMAN, F.G., KOVALEVVA, A.A.

Testing the "Kintzle" wire filter. Bum.prom. 35 no.8:22-23 Ag
'60. (MIRA 13:8)

1. TSentral'nyy nauchno-issledovatel'skiy institut tsellyuloznay
i bumazhnay promyshlennosti.
(Woodpulp) (Filters and filtration)

MORGENSHTERN, V.S., kand.tekhn.nauk; MAZING, L.A., kand.tekhn.nauk

Purification of waste waters from woodpulp and paper factories.
Zhur. VKHO 6 no.2:150-155 '61. (MIRA 14:3)
(Sweage—Purification)(Paper industry)

MAZING, L.A., kand.tekhn.nauk; GURICHEVA, Z.G., nauchnyy sotrudnik;
YEVILEVICH, M.A., nauchnyy sotrudnik; LOMOVA, M.A., nauchnyy
sotrudnik; KOVALEVA, A.A., nauchnyy sotrudnik

Methods of sewage purification. Bum.prom. 37 no.9:7-10 S
'62. (MIRA 15:9)

1. Vsesoyuznyy nauchno-issledovatel'skiy institut tsellyulozno-
bumazhnoy promyshlennosti.
(Sewage--Purification)

MORGENSHTERN, V.S., red.; MAZING, L.A., red.; POSTNOVA, I.D.,
nauchn. red.

[Purification of waste waters] Ochistka stochnykh vod.
Moskva, 1963. 56 p. (MIRA 17:5)

l. Moscow. TSentral'nyy nauchno-issledovatel'skiy in-
stitut informatsii i tekhniko-ekonomicheskikh issledovaniy
po lesnoy, tsellyulozno-bumazhnoy, derevoobrabatyvayushchey
promyshlennosti i lesnomu khozyaystvu.

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MAZING, M. A.

28(7)

BOOK EXPLORATION

SOV/2700

Ukr. Universitet.

Mazin, I. Vsesoyumno sovetskogo po spetsprospektu, 1956.
8. II. Akademya spetskraupiya (Materials of the 10th All-Union Conference on Spectroscopy, 1956, Vol. 2). Atomic Spectroscopy,
(Izdat. Izd-va L'govskogo Univ., 1958, 368 p.). (Series: 158;
Frantsuzskyi zhurnal, vyp. 1(9); 30,000 copies printed.

Additional Sponsoring Agency: Akademiya nauk SSSR. Komissiya po spektroskopii.

Editor: O.J. Landberg, Academician, (Resp. Ed.);

Scientific Reportant: Doctor of Physical and Mathematical Sciences;

Editor: P. A. Pashiniansky, Doctor of Physical and Mathematical Sciences;

Editor: Doctor of Physical and Mathematical Sciences; S.M. Raskitsky;

Candidate of Technical Sciences: I. K. Klimovskaya;

Candidate of Physical and Technical Sciences: V. S. Miliyanchuk;

(Deceased), Doctor of Physical and Mathematical Sciences; A.Ye.

Gol'dbergman, Doctor of Physical and Mathematical Sciences;

Ed.: S.L. Gasser, Tech. Ed.; T.V. Samaryuk.

This book is intended for scientists and research personnel in the field of spectroscopy, as well as for technical personnel using spectra analysis in various industries.

CONTENTS: This volume contains 177 scientific and technical studies of atomic spectroscopy presented at the 10th All-Union Conference on Spectroscopy in 1955. The studies were carried out by members of scientific and technical institutions and include extensive bibliographies of Soviet and other sources. The studies cover many phases of spectroscopy: use of rare earths, electromagnetic radiation, physicochemical methods for controlling uranium production, physics and technology of gas discharges, optics and spectroscopy, abnormal dispersion in metal vapors, spectroscopy and the combustion theory, spectrum analysis of ores and minerals, photographic methods for quantitative spectrum analysis of metals and alloys, spectral determination of the hydrogen content of metals by means of isotopes, tables and classes of spectral lines, spark spectrographic analysis, statistical study of variation in the parameters of calibration curves, determination of traces of metals, spectrum analysis in metallurgy, thermochromistry in metallurgy, and principles and practice of spectrochemical analysis.

Card 2/31

Rudnevskiy, N.K., and Yu.S. Kalinin. Experimental Study of A-C Arc Temperature Dependence on Component Concentration in Some Binary Alloys 298

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Card 18/31

MAZING, M.A.; MANDL'SHTAM, S.L.

Broadening and shift of spectrum lines in the plasma of a
gas discharge. Fiz.sbor. no.4:305-307 '58. (MIRA 12:5)

1. Fizicheskiy institut imeni P.N.Lebedeva AN SSSR.
(Spectrum analysis) (Electric discharges through gases)

AUTHORS:

Vaynshteyn, L. A., Kolosnikov, V. G.,
Maz'ing, M. A., Mandel'shtam, S. L.,
Sobelman, I. I.

sov/48-22-6-20/28

TITLE:

On the Broadening and Displacement of Spectral Lines in a Highly
Ionized Plasma (Ob ushireniyi i sдвиге spektral'nykh liniy v
vysokoionizovannoy plazme)

PERIODICAL:

Izvestiya Akademii nauk SSSR, Seriya fizicheskaya, 1958, Vol. 22,
Nr 6, pp. 718-719 (USSR)

ABSTRACT:

The investigation of the breadth and shape of spectral lines does not characterize the excitation of atoms with sufficient accuracy, and therefore an investigation of the breadth and the displacement of the lines is more advantageous for determining the causes of these phenomena. The principal cause of the broadening and displacement of spectral lines in a highly ionized plasma is its interaction with charged particles. For lines with quadratic Stark effect the impact theory of broadening results in the following expressions for the breadth of lines and their displacement:

$$\gamma = 11.4C_4^{2/3} \nu^{1/3} N, \Delta = 9.8C_4^{2/3} \nu^{1/3} N,$$

where C_4 denotes the constant of the quadratic Stark effect,

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On the Broadening and Displacement of Spectral
Lines in a Highly Ionized Plasma

v - velocity, N - the density of the excited particles. Herefrom it follows that the ratio between the breadth and the displacement of $C_4 \cdot v$ and N is independent and equal to: $\gamma/\Delta = 1,16$. In the case of interaction of a different kind, as e.g. according to the equation by Van der Vaal $\gamma/\Delta = 2,8$. The task to be carried out by the present paper was to find a correct explanation of the interaction between radiating atoms and charged particles, i. e. the applicability of the aforementioned γ -formula with respect to the lines with quadratic Stark effect. As objects the lines Ar II, which are excited in the channel of the spark discharge, were selected. Measurements of breadths and displacements of lines were carried out photographically. Results are given by a table. By checking these results it was found that those obtained by experiment contradicted theoretical results completely. This is explained by the fact that the initial expression for the displacement of the frequency of the atom oscillator $\Delta\omega = C_4/R^4$, where R denotes the distance to the exciting electron, is not applicable in this case because the electrons playing the principal part

Card 2/3

On the Broadening and Displacement of Spectral
Lines in a Highly Ionized Plasma

SOV/4B-22-6-20/28

the broadening of the lines form a Weisskopf radius that is too small. The field formed by the electrons turns out to be so strong on this occasion that the Stark effect ceases to be quadratic and goes over to linearity. There is no reason to believe that the field changes slowly and is quasistatic as is alleged by a well-known theory. The problem is still being discussed. There are 1 table and 3 references, 2 of which are Soviet.

ASSOCIATION: Fizicheskiy institut im. P. N. Lebedeva Akademii nauk SSSR
(Physics Institute imeni P. N. Lebedev, AS USSR)

1. Spectroscopy 2. Electron gas--Spectra 3. Perturbation theory

Card 3/3

MAZING, M. A., Candidate Phys-Math Sci (diss) -- "The widening and shifting of spectral lines in a gas-discharge plasma". Moscow, 1959. 7 pp (Acad Sci USSR, Phys Inst im P. N. Lebedev), 150 copies (KL, No 26, 1959, 123)

21(0),2k(0)	PLATE I BOOK EXPLOITATION	SOV/32
<i>MASING, M.A.</i>		
Academicheskiy Institut Nauk SSSR. Fizicheskii Institut Izdatelstvo po Experimental'noi i Teoreticheskoi Fizike: [Sbornik] [Studies on Experimental and Theoretical Physics; Collection of Articles] Moscow, Izd-vo AN SSSR, 1959. 308 p. Errata slip. Inserted. 2,300 copies printed.		
Ed.: I. L. Pashenkov, Doctor of Physical and Mathematical Sciences; Eds. of Publishing House: A. L. Chernyak and V. G. Berkgrat. Tech. Ed.: Yu. V. Reitman, Commission for Publishing the Collection in Memory of G. Goryainov. Samoilov, N. A. Leonovich, Academician; P. A. Barmin, Academician; N. A. Leonovich, Academician; S. L. Mandel'shtam, Doctor of Physical and Mathematical Sciences; I. L. Pashenkov, Doctor of Physical and Mathematical Sciences; P. G. Landsberg-Saryshansky, Candidate of Physical and Mathematical Sciences; and G. P. Kotulev (Secretary), Candidate of Physical and Mathematical Sciences.		
PURPOSE: This book is intended for physicists and researchers engaged in the study of electromagnetic radiations and their role in investigating the structure and composition of materials. CONTENTS: The collection contains 30 articles which review investigations in spectroscopy, acoustics, molecular optics, semi- conductor physics, nuclear physics, and other branches of physics. The introductory chapter gives a biographical profile of G. S. Landsberg, Professor and Head of the Department of Optics of the Division of Physical Technology at Moscow Uni- versity, and reviews his work in Rayleigh scattering, combat waves, spectral analysis of metals, etc. No personalities are mentioned. References accompany each article.		
Bazulin, P. A., V. L. Malyshev and M. M. Shishchikov. The Work of G. S. Landsberg. In: The Field of Molecular Spectroscopy 37	27	
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(MAZ-TN G, M.A.)

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244.3/10
AUTHORS: Granovskiy, V.I., Slobotynov, I.O., Sivilev, G.V. and Sirotenko, I.G.
TITLE: Report on the Second All-Union Conference on Gas Electronics
PERIODICAL: Radiotekhnika i elektronika, 1959, Vol. 4, No. 8, pp 1359 - 1358 (USSR)

ABSTRACT: The conference was organised by the Ac.Sc.USSR, the Ministry of Higher Education and Moscow State University. Achi. Filimonov - "Measurement of the Gas Density During the Dynamic Operation of a Discharge" (see p 1306 of the Journal); A.V. Rodosopov - "The Nature of a Striated Positive Column"; P.I. Parkh and Yu.M. Kagan - "The Theory of Probes for Relatively Low Pressures"; P.M. Kogan et al. - "The Positive Column of a Discharge in a Diffusion Regime". N.Y. Konstantin - "Influence of the Processes of the Annihilation of the Negative Ions on Their Concentration in the Column"; L.M. Paschenko - "Anomalous Scattering"; N.D. Gubanishvili and L.M. Paschenko - "Resonance Oscillations and Plasma Resonance Lost by Charged Particles for Excitation of Plasma Oscillations in Plasmas (the Langmuir-Poole-Kondratenko Oscillations)"; "Theory of Non-Linear Plasma Oscillations" (see p 1355); "The Theory of Non-Linear Oscillations and the Theory of Non-Linear Dependence of T.G. Martitov and I.O. Nevezhichin - "Dependence of the Temperature in The Near-Anode Zone Section of a Pulse Discharge on the Material of the Electrodes"; G.I. Markina and B.N. Livanov - "Formation of Light Spots on the Anode of a Gas Discharge" (see p 1350 of the Journal). N.A. Novikova - "Distribution of Binary Mixtures of Inert Gases in a.c. Discharges"; V.L. Stepanov and V.P. Zakharchenko - "Some Phenomena in Rarefied Plasma"; V.O. Skorobogat'ko and V.S. Rukai - "The Possibility of Obtaining Highly Concentrated Plasmas"; G.V. Balakin, V. V. Kostylev and K.M. Borodulin - "Some Characteristics of the Discharge in an Ion Pump and in a Magnetic Isolation Vacuum Duct"; Ye.T. Kucherenko and O.L. Marakushko - "Properties of a Discharge with Electron Oscillations in a Magnetic Field" (see p 1355 of the Journal); The paper by L.M. Baburman and A. Vilenko considered the appropriate methods for determining the concentration of atoms at the radiation levels; I.I. Golubkin and I.A. Verbitskii read a paper on "A Non-Stationary Theory of the Stark Broadening of the Spectral Lines in Plasma"; N.N. Mandel'shtam - "The Broadening of Spectral Lines in a Gas-discharge Plasma"; and the Shift of Spectral Lines in a Gas-discharge Plasma (England) - "The Kinetic of Molecular Hydrogen in Leading to the Brightness of the Molecular Hydrogen in a Hydrogen Discharge"; V.M. Kolosnikov et al. - "Some Properties of the Arc Discharge in an Atmosphere of Inert Gases"; A.A. Huk and N.D. Manukov - "Production of High Temperatures By Means of Spark Discharges".

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SOV/48-23-8-18/25

24(7)

AUTHORS:

Mandel'shtam, S. L., Mazing, M. A.

TITLE:

Widening and Shift of Spectral Lines in the Plasma of Gas Discharge

PERIODICAL:

Izvestiya Akademii nauk SSSR. Seriya fizicheskaya, 1959,
Vol 23, Nr 8, pp 1017-1020 (USSR)

ABSTRACT:

In the present paper the widening of spectral lines with quadratic Stark effect due to charged particles is investigated. The equations (1) for the width and shift of the lines are described. To compare theory with experimental results, the dependence of width and shift on the constant of the quadratic Stark effect and the ratio of width to shift are investigated. The results show remarkable disagreement with the theory by Weisskopf and Lindholm. Analysis of this disagreement resulted in the development of an unsteady theory of the widening of lines. According to the assumptions of the theory, a smaller effect of the collision of electrons with atoms as well as inelastic collision of electrons with atoms are taken into account. For this theory, the nondimensional parameter β is given by formula (2), which characterizes the width and shift of

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Widening and Shift of Spectral Lines in the Plasma of Gas Discharge

lines. The ratio of width to shift depends on this parameter. Figure 1 shows a comparison of theoretical values - calculated by the unsteady theory - to experimental results. Good agreement could be obtained. It was found that this theory permits the determination of electron density from the width and shift of lines. Table 4 compares electron densities calculated by the steady and unsteady method. There are 1 figure, 4 tables, and 2 references, 1 of which is Soviet.

ASSOCIATION: Fizicheskiy institut im. P. N. Lebedeva Akademii nauk SSSR
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21(7)

SOV/56-36-4-66/70

AUTHORS: Mazing, M. A., Mandel'shtam, S. L.TITLE: On the Widening of Spectral Lines in a Highly Ionized Plasma
(Ob ushirenií spektral'nykh liniy v sil'no ionizovannoy plazme)PERIODICAL: Zhurnal eksperimental'noy i teoreticheskoy fiziki, 1959, Vol 36,
Nr 4, pp 1329-1331 (USSR)ABSTRACT: Already in earlier papers the authors measured width and shift
of spectral lines in spark discharges (Ref 1); here a short
introductory report is given about this problem and also about
the theoretical connections between line width, shift, and the
plasma parameters. The authors carried out much more accurate
measurements of the line width γ and the shift Δ of 50 Ar II -
lines as well as of some He I -lines in the plasma of a spark
discharge in argon and helium. Experimental data: $U = 14$ kv,
 $C = 0.02$ F, $L = 10$ H, $T = 30 - 40000^{\circ}$ K, electron concentra-
tion $\sim 10^{17}$ cm³. The spectra were photographed by means of a
spectrograph with a dispersion of $2\text{\AA}/\text{mm}$. The accuracy of measur-
ing line width amounted to 5 - 10%, the smallest still record-
able shift was $\sim 0.03 \text{\AA}$. The results obtained from measuring

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On the Widening of Spectral Lines in a Highly Ionized Plasma

6 Ar II -lines are shown by a table; they are typical of this kind of measurements.

$\lambda, \text{\AA}$	$10^{-11} \gamma \text{ sec}^{-1}$	$10^{-11} \Delta \text{ sec}^{-1}$	γ/Δ
4579.4	5.1	0.45	11.5
4460.4	3.8	0.66	5.8
4598.8	8.4	2.7	3.1
3561.0	12	5.0	2.4
3559.5	13	5.6	2.3
4474.8	15	7.8	1.9

There are 1 figure, 1 table, and 6 references, 3 of which are Soviet.

ASSOCIATION: Fizicheskiy institut im. P. N. Lebedeva Akademii nauk SSSR
(Physics Institute imeni P. N. Lebedev of the Academy of Sciences, USSR)

SUBMITTED: February 12, 1959

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MAZING, M.A.

Useful book for nature lovers ("Light and color in nature" by
Minnaert. Reviewed by M.A. Mazing, O.P. Shelkova). Priroda 48
no.6:118-120 Je '59. (MIRA 12:5)
(Meteorological optics) (Light) (Color)

MAZING, M. A.

S/051/60/008/03/037/038
E201/E191

AUTHOR: S.F.

TITLE: VIII-th International Colloquium on Spectroscopy

PERIODICAL: Optika i spektroskopiya, 1960, Vol 8, Nr 3,
pp 431-432 (USSR)

ABSTRACT: The VIII-th International Colloquium on Spectroscopy was held on September 14-18, 1959 in Lucerne (Switzerland) with the cooperation of the Swiss Union on Spectroscopic Analysis. Over 400 people from more than 30 countries took part in the Conference. The Soviet Union was represented by three delegates: S.A. Ukholin, M.A. Mazing and the Corresponding Member of Acad.Sci. USSR S.E. Frish. The Colloquium was divided into three sections: (1) emission spectroscopy, (2) mass spectroscopy, and (3) X-ray spectroscopy; four review papers were also read. Only one paper was contributed by the Soviet delegation: M.A. Mazing dealt with "Non-Stationary Theory of Broadening and Displacement of Spectral Lines". Among the activities organised by the Colloquium Committee were excursions to spectroscopic laboratories in factories and an exhibition of spectroscopic apparatus.

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1/1

MAZING, M.A.

Widening and displacement of spectral lines in the plasma of a
gas discharge. Trudy Fiz. inst. 15:55-122 '60. (MIRA 14:7)
(Plasma (Ionized gases)—Spectra)