

KRAYCHIK, M.M., kand.tekhn.nauk

Properties of welded joints of 09G2 and 14G2 low-alloy steels.  
Trudy TSNII MPS no.252:14.2-154 '63. (MIRA 16:8)  
(Steel alloys--Testing)

KRAYCHIK, M.M., kand.tekhn.mash

Conditions of the initiation of brittle fracture in welded  
elements of the rolling stock and methods for its prevention.  
Trudy TSNII MPS no.260:4-30 '63.

Effect of some design and technological factors on the fatigue  
strength of welded joints. 31-35  
(MIRA 16:11)

KRAYCHIK, M.M., kand.tekhn.nauk; KOTEL'NIKOV, V.L., inzh.

Effect of various factors on the reaction of steel when burned by  
an electrode. Trudy TSNII MPS no.252:155-183 '63. (MIRA 16:8)  
(Steel--Welding)

KRAYCHIK, M. M., kand.tekhn.nauk; TSKIPURISHVILI, V. B., kand.tekhn.nauk;  
Kiyan, D. M., inzh.

Analyzing the causes of failures of the welded structures of the  
rolling stock under the conditions of low work stresses. Trudy TSN  
II MPS no.260:36-44 '63.  
(MIRA 16:11)

KRAYCHIK, M.M.; RATNER, R.S.

Fatigue strength of welded beams. Avtom. svar. 16 no.12:29-  
33 D '63. (MIRA 17:1)

1. Vsesoyuznyy nauchno-issledovatel'skiy institut zhelezno-dorozhnogo transporta Ministerstva putey soobshcheniya (for Kraychik).
2. Vsesoyuznyy zaochnyy inzhenerno-stroitel'nyy institut (for Ratner).

ASNIS, A.Ye., doktor tekhn. nauk; SHAPOV, N.P., doktor tekhn. nauk;  
VOLOKHIVYANSKAYA, E.S., kand. tekhn. nauk; KRAYCHIK, M.M., kand.  
tekhn. nauk; MAKSIMOV, V.N., kand. tekhn. nauk; SANDLER, N.I.,  
kand. fiziko-matematicheskikh nauk

Arsenous low-alloy steel for car construction. Vest. TSNII MPS  
23 no.5:27-31 '64.

(MIRA 17:11)

1. Institut elektrosvarki imeni Patona UkrSSR, Ukrainskiy institut  
metallov i Vsesoyuznyy nauchno-issledovatel'skiy institut zhelezno-  
dorozhnogo transporta Ministerstva putey soobshcheniya.

L 20529-66 EWT(d)/EWT(m)/EMP(w)/EMP(v)/T/EMP(t)/EMP(k)/EMP(h)/EMP(l) JD/EM  
ACC NR: AP5023079 (A) SOURCE CODE: UR/0125/65/000/003/0017/0013 46

AUTHOR: Kraychik, M.M. (Candidate of technical sciences); Dorodnitsyna, N.V.  
(Engineer)

ORG: All-Union Scientific Research Institute for Railway Transportation (Vsesoyuznyy nauchno-issledovatel'skiy institut zheleznodorozhnogo transporta) 46 B

TITLE: Properties of brittle fractures in welded parts of railway rolling stock

SOURCE: Avtomaticheskaya svarka, no. 9, 1965, 17-18

TOPIC TAGS: brittleness, fatigue strength, impact stress, mechanical fatigue, yield stress, welding, material deformation, low carbon steel, railway rolling stock, tensile stress

ABSTRACT: Brittle fractures in a longitudinal beam of a railway track after 6 years of operation and in a locomotive truck after 2-3 years of operation were investigated. The results show that at negative temperatures and impact a fatigue fracture 3-4 mm deep can cause brittle failure in welded metal parts under a nominal stress that is much below the yield point. It is concluded that stress concentration in the neutral axis zone and in the zone of highest tensile stress is intolerable for beams operating under variable loads and low temperatures and, particularly, for railway rolling stock.

Orig. art. has: 4 figures.

SUB CODE: 11,20 SUBM DATE: 07Aug64

ORIG REF: 005 46, 44, 56

IDC: 624.078.5.004.7h

Card 1/1 L/C

L 00777-67 EWT(m)/EWP(w)/EWP(v)/T/EWP(t)/ETI/EWP(k) JD/HM

ACC NR: AR6000441

SOURCE CODE: UR/0137/65/000/009/0005/0005

AUTHORS: Kraychik, M. M.; Kotel'nikov, V. L.; Maksimov, V. N.

TITLE: The influence of technological factors on the brittle strength of welded constructions of a mobile assembly

SOURCE: Ref. zh. Metallurgiya, Abs. 9E36

REF SOURCE: Sb. Proyektir. svarn. konstruktsiy. Kiyev, Nauk. dumka, 1965, 410-425

TOPIC TAGS: brittleness, welding technology, impact stress

ABSTRACT: An estimate of resistance to brittle failure (BF) in a construction member subjected to impact loads should be attempted only on the basis of impact tests and not on static ones. Actual influence of the resistance to BF is contributed by the scope and sequence of welding operations. Preliminary loading at room temperature even at such stresses as  $0.5 \sigma_s$  increases the resistance to BF up to the level of  $\sigma_s$ . The most probable location for the BF to occur in a welded constructions is at the sections acted upon by the smallest stresses produced by external loading. Special methods are developed for determining the tendency of steel to suffer BF along the length of zone of thermal influences, according to the degree of brittleness imparted to this zone and according to the sensitivity of steel to being burned by electrodes. M. Frolova [Translation of abstract]

SUB CODE: 13, 11, 20

Card 1/1 awm

UDC: 621.791.001:539.4

41  
B  
18

KRAYCHIK, V.R.

Changes in the fundus oculi in the toxicoses of pregnancy. Trudy  
LSGMI 18:92-97 '55. (MIRA 14:3)

1. Konsul'tant-okulist rodil'nogo doma im. prof.Snegireva.  
(PREGNANCY, COMPLICATIONS OF) (EYE)

GRIGOR'YEVA, V.I., prof.; KRAYCHIK, V.R.; SHUL'TS, V.A.; YAROSHETSKAYA, B.S.

Outpatient service to glaucoma patients. Trudy LPMI 31 no.2:40-47 '63.  
(MIRA 17:10)

1. I<sup>z</sup> kafedry glaznykh bolezney Leningradskogo pediatricheskogo meditsinskogo instituta i glaznogo otdeleniya Ob'yedinennoy bol'nitsy imeni S. M. Neva, Leningrad.

KRAYCHIK, Yu. S.

AID P - 3084

Subject : USSR/Electricity

Card 1/1 Pub. 29 - 18/29

Author : Kraychik, Yu. S., Eng.

Title : Connection diagram for automatic reclosure without use of relays of contact breakers of the VAB-2 type

Periodical : Energetik, 7, 24-25, J1 1955

Abstract : The author describes the performance of high-speed contact breakers of the VAB-2 type used to protect d-c electric traction substations. An automatic reclosure arrangement is included in the installation of contact breakers. This arrangement operates without relays. One connection diagram.

Institution : None

Submitted : No date

"APPROVED FOR RELEASE: 06/14/2000

CIA-RDP86-00513R000826310020-9

KRAYCHIK, Yu.S.; PINTSOV, A.M.

Parameters and equivalent circuits of overhead line power transmission lines. Izv. NIIFT no.2:112-127 1971. (NRA 18:9)

APPROVED FOR RELEASE: 06/14/2000

CIA-RDP86-00513R000826310020-9"

KRAYCHIK, Yu.S.; PINTSOV, A.M.

Electric parameters of d.c. power lines equipped with metal-sheathed single cables. Izv.NIIPT no.3:289-296 '58.

(MIRA 12:1)

(Electric power distribution--Direct current)  
(Electric cables)

8(3)

AUTHORS: Pintsov, A. M., Candidate of  
Technical Sciences, Kraychik, Yu. S.  
Engineer, Vlasov, D. G., Engineer

SOV/105-59-1-20/29

TITLE: Operation of a Three-Phase Bridge Rectifier  
Fed by an Asymmetrical emf (Rabota trekhfaznogo  
mostovoego vypryamitelya pri pitanii yego nesimmetrichnoy  
c.d.s.)

PERIODICAL: Elektrichestvo, 1959, Nr 1, pp 79-83 (USSR)

ABSTRACT: This investigation concerns electromagnetic processes in a bridge converter with disturbance of voltage symmetry at its junctions. Only stabilized operating methods are being investigated, but the results are applicable to most transition processes. For, the latter proceed much more slowly than the commutations of the valves. It is assumed that the control of the converter is also unsymmetrical. Investigation concerns only the operating methods marked by a simultaneous working of 3 valves or less. Some simplifications are made which cause, however, no noticeable errors. The formulas (10), (11) and (12) are derived to determine, at a given regulation character, the limits of the operation method

Card 1/2

Operation of a Three-Phase Bridge Rectifier  
Fed by an Asymmetrical emf

SOV/105-59-1-20/29

investigated, and the ranges of change of ignition angles for each valve. 4 different operation methods of the valves are investigated in detail. There are 4 figures, 1 table, and 3 Soviet references.

SUBMITTED: July 7, 1957

Card 2/2

PINTSOV, A.M.; KRAYCHIK, Yu.S.

Operating regime of a three-phase bridge inverter fed by two single-phase transformers with windings connected in an open delta. Izv. NIIPT no.4:97-113 '59.  
(MIRA 13:2)  
(Electric transformers) (Electric current converters)

KRAYCHIK, Yu.S.

Calculation of the harmonics of the rectified current in power  
transmission system with a ground return line. Izv. NIIPt no.5:  
180-192 '60. (MIRA 14:1)

(Electric power distribution)  
(Harmonics analysis)

VAZHNOV, Aleksandr Ivanovich; ROZOVSKIY, Yuriy Aleksandrovich; SALITA, Pavel  
Zinov'yevich; KRAYCHIK, Yu.S., red.; ZHITNIKOVA, O.S., tekhn. red.

[Electrodynamic model of power systems] Elektrodinamicheskaya model'  
energosistem. Moskva, Gos. energ. izd-vo, 1961. 112 p. (MIRA 14:8)

1. Leningradskiy politekhnicheskiy institut (for Vazhnov)  
(Electric power distribution--Models) (Electric machinery)

KRAYCHIK, Yu.S., inzh. (Leningrad)

Problems concerning the criteria of the quality of electric power  
and automatic control of the operation of electric power systems.  
Elektrichestvo no.12:84 D '61. (MIRA 14:12)  
(Electric power plants) (Automatic control)

KRAYCHIK, Yu.S.

Monsymmetry of the loads of an a.c. traction substation and  
possibilities of limiting it by means of parallel transverse  
capacitive compensation of the reactive power. Izv. NIIPT  
no.9:144-166 '62, (MIRA 15:12)  
(Electric railroads—Current supply)

KRAYCHIK, Yu.S. (Leningrad)

Equalization of the statistical distribution of electric traction loads. Izv. AN SSSR. Energ.i transp. no.1:46-49 Ja-F '65.  
(MIRA 18:4)

KRAYCHIK, Yu.S., fizn.

Use of characteristic functions in the calculation and study of  
the operation of electrical networks. Elektricheskoe no.5:19-23  
Mys '65. (MIRA 18:6)

1. Nauchno-issledovatel'skii institut po tekhnicheskym issledovaniyam.

KRAYENOVА, Т.С.И.; DUSEYEVА, Ye.K., red.

[Synthetic fibers] Sinteticheskie volokna. Moskva, TSentr.  
biuro tekhn.informatsii mashinostroenija, 1959. 13 p.

(MIRA 13:11)

1. Moscow. Vystavka dostizheniy narodnogo khozyaystva SSSR.  
(Textile fibers, Synthetic)

KRAYEV, A.<sup>b</sup>

KRAYEV, A.V. -- "Anatomic-Experimental Investigation of the Lymphatic System of the Bladder." Min Public Health RSFSR, Leningrad Med Inst of Hygiene, Leningrad, 1956. (Dissertation for the Degree of Candidate in MEDICAL SCIENCES)

SO: KIZHNAYA LETOPIS' (Book Register) No 42, October 1956, Moscow

USSR / Human and Animal Morphology, Normal and Pathological.  
Lymphatic System.

S

Abs Jour : Ref Zhur - Biol., No 8, 1956, No 36005

Author : Kraynov, A. B.

Inst : Stalinabad Medical Institute.

Title : Concerning the Anatomy of the Intraorganic Lymphatic System of the Prostate Gland and Prostatic Section of the Human Urethra.

Orig Pub : Tr. Stalinabadsk. med. in-ta, 1957, 25, 207-221.

Abstract : The intraorganic lymphatic system of the prostate gland (PG) consists of a network of lymphatic capillaries in the mucous and muscular membranes of the prostatic section of the urethra (PSU) and in the PG stroma; of the abducted vessels, and of the plexus of lymphatic vessels of the 1st and 2nd rank, which are located on the external PG surface under the capsule. The local peculiarities of the network structure of the lymphatic capillaries are noted. The latter, in the PSU mucous membrane, are located under the network of the

Card 1/2

USSR / Human and Animal Morphology, Normal and Pathological  
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Abs Jour : Ref Zhur - Biol., No 8, 1956, No 36005

blood capillaries. In the PSU muscular membrane, there are two networks of lymphatic capillaries, which correspond to two muscular layers (longitudinal and circular). In the PG stroma, there is a three-dimensional network of lymphatic capillaries. The PG age changes lead to substantial alteration in the structure of the lymphatic system. Extraorganic abducent lymphatic vessels originate in the plexus of the abducent lymphatic vessels of the first and second rank. -- A. B. Kuzmina-Prigadova.

Card 2/2

USSR/Human and Animal Morphology (Normal and Pathological) Lymph System S-4

Abs Jour : Ref Zhur - Biol., No 12, 1958, № 55145

Author : Krayev A.B.

Inst : Leningrad Institute of Medicine and Sanitary Hygiene

Title : The Internal Lymphatic System of the Male Urinary Bladder

Orig Pub : Tr. Leningr. san.-gigien. med. in-ta, 1957, 35, 186-206

Abstract : In the mucosa membrane of the urinary bladder lymphatic capillary networks were disclosed (LC); in 5 months old fetuses they were found in the region of the vesical triangle, at about 7 months, in the region of the urinary bladder itself, as well as at the upper top of the bladder. At about the age of 18-19 years, a double-layer network of LC mucosa is formed around the canal of the orificium urethrae internum; in annulus urethralis, cecal outgrowth of the capillary network are described. Among the LC of the vesical triangle region, the annulus urethralis and the prostate gland direct connections are present. Basing his opinion

Card : 1/3

USSR/Human and Animal Morphology (Normal and Pathological) Lymph System S-4

Abs Jour : Ref Zhur - Biol., No 12, 1958, No 55145

upon the fact that the injected substance into corpuses diffuses into the direction of the vesical triangle and of the ureter, the author maintains that the prenatal discharge of the lymph gland is realized into the same direction also. The web of the mucous membrane interconnects with the efferent lymphatic vessels of the urinary bladder's muscular membrane and with the LC networks around arteries and veins. When referring to the muscular membrane, two intercommunicating LC networks should be described, which are situated within the connective tissue between the muscular clusters, and which possess their own efferent lymphatic vessels. Two lymphatic networks are exposed in the serous membrane of the urinary bladder: a shallow and thin one, and a fine-looped and deep one, with large sized capillaries and loops. Since a part of the LC is localized in the 4th and 3rd abdominal layers (according to the nomenclature of the author), and

Card : 2/3

cc

GIRSHGORN, L.Sh.; KRAYEV, A.G.

Conditions governing the application of seismic prospecting for  
oil in the north of the West Siberian Plain. Trudy VNIGRI no.225:  
184-191 '63.  
(MIRA 17:3)

KRAYEV, A.G.

Use of the land boom in seismic prospecting. Geofiz.razved.  
no.7:38-44 '62. (MIRA 15:7)  
(Seismic prospecting)

KRAYEV, A.G.

Drilling rig with self-contained drive for seismic prospecting  
in regions of the Far North. Geofiz. razv. no. 15:161-164 '64.  
(MIRA 17:7)

L 51436-65 EWT(1)/EWA(h) Feb GW  
ACCESSION NR: AP5015516

UR/0286/65/000/008/0055/0055  
550.834

16

B

AUTHOR: Shmelev, A. K.; Bovarenko, V. D.; Krayev, A. G.

TITLE: A soil evaluation unit for seismological prospecting. Class 42, No. 170175

SOURCE: Byulleten' izobretensiy i tovarnykh znakov, no. 8, 1965, 55

TOPIC TAGS: seismology, seismograph, soil structure, seismic detector

ABSTRACT: This Author's Certificate introduces a soil evaluation unit for seismological prospecting. The device consists of rigid sections with seismic detectors located inside them and a seismograph. The seismic detectors are held in a vertical position during operations on dry land by mounting each of the sections on cables located along both sides of the seismic detectors at their base.

ASSOCIATION: none

SUBMITTED: 08Apr63

ENCL: 00

SUB CODE: ES

NO REF Sov: 000

OTHER: 000

11xL  
Card 1/1

KrAYEV, Aleksandr Ivanovich; SOKOLOVA, R.K., red.

[This is chemistry; interesting figures and facts] Vot  
chto takoe khimiia; interesnye tsify i fakty. Murmansk,  
Murmanskoe knizhnoe izd-vo, 1964. 94 p. (MIRA 18:3)

KRAYEV, A.I., kand.geograf.nauk

"Bering" by Nikolai Chukovskii. Reviewed by A.I. Kraev.  
Priroda 51 no.8:95 Ag '62. (MIRA 15:9)

1. Institut istorii yestestvoznaniya i tekhniki AN SSSR, Moskva.  
(Bering, Vitus Jonassen, 1681-1741)  
(Chukovskii, Nikolai)

KRAYEV, A.I. (Moskva)

Tales about Africa; "Leaves of Lophira" by I. M. Zabelin. Reviewed by  
A. I. Kraev, Priroda 53 no.4:121-122 '64. (MIRA 17:4)

KRAYEV, A.P. [deceased]

Experience in the use of dipole sounding in rivers. Uch. zap. IGU  
no. 249:5-14 '58. (MIRA 11:5)  
(Geological research) (Geophysics)

L 10410-66 EWT(1) GW  
AM5019636

## BOOK EXPLOITATION

UR/

Krayev, Aleksandr Pavlovich

44,5

72

C4/

Geoelectric principles (Osnovy geoelektriki). 2d ed., rev. and enl.  
Leningrad, Izd-vo "Nedra," 1965. 587 p. illus., biblio. Errata  
slip inserted. 2000 copies printed.

TOPIC TAGS: earth magnetic field, electric field, electromagnetic  
field, geologic exploration

PURPOSE AND COVERAGE: This official textbook is intended for students  
and aspirants at schools of higher education and scientists and  
geophysicists dealing with geoelectric techniques. The book pre-  
sents the fundamental problems of the earth's electromagnetic field  
and its application to electric geologic exploration. The fol-  
lowing wrote additional material for this second, enlarged edition:  
A. V. Veshev, V. A. Yegorov, A. S. Semenov, B. M. Yanovskiy, M. Ya.  
Novozhilova, A. F. Fokin, and L. B. Gasanenko. 44,55

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SUB CODE: ES/ SUBM DATE: 29Mar65/. ORIG REF: 360/ OTH REF: 024

PC  
Card 4/4

KRAYEV, A.S.

Machine for testing metals for rolling wear resistance in  
the presence of a transverse slip motion. Zav. lab. 30 no.6:  
753-755 '64 (MIRA 17:8)

1. Osnovnoye parovoznoye depo stantsii imeni Gor'kogo Pri-  
volzhskoy zheleznoy dorogi.

KRAYEV, A. V.

KRAYEV, A. V. -- "Anatomic-Experimental Investigation of the Lymphatic System of the Bladder." Min Public Health RSFSR, Leningrad Med Institute of Hygiene, Leningrad, 1956. (Dissertation for the Degree of Candidate of Medical Sciences)

SO: Knizhnaya Letopis' No 42, October 1956, Moscow

KRAYEV, A.V.

Method for using radioactive isotopes for studying absorption  
into the blood and lymph vessels. Arkh.anat.gist.i embr. 33  
no.3:69-72 Jl-3 '56.  
(MIRA 12:11)

1. Iz kafedry normal'noy anatomii (zav. - chlen-korr. AMN SSSR,  
prof.D.A.Zhdanov) Leningradskogo sanitarno-gigiyenicheskogo  
meditsinskogo instituta. Adres avtora: Leningrad, 67, ul.  
Kurakina, d. 1/3, Sanitarno-gigiyenicheskiy meditsinskiy  
institut, kafedra normal'noy anatomii.

(ABSORPTION (PHYSIOLOGY)) (IODINE--ISOTOPES)

KRAYEV, A.Y.

Anatomy of the lymphatics in the prostate gland and the prostate portion of the urinary canal in man. Trudy Stal.med.inst. 25 207-222 '57  
(MIRA 11:8)

1. Iz kafedry normal'noy anatomicii (zav. -chlen-korrespondent AN Tadzhikskoy SSR, dots. A.Ya. Bakhimov) Stalinabadskogo gosudarstvennogo meditsinskogo instituta im. Abusali ibn-Sino i kafedry normal'noy anatomicii (zav. - chlen-korrespondent AMN SSSR, prof. D.A. Zhdanov) Leningradskogo sanitarno-gigiyenicheskogo meditsinskogo instituta.

(LYMPHATICS)  
(PROSTATE GLAND)

KRAYEV, A.V.

Anatomy of the lymphatics of the liver in a dog. Trudy Stal.  
med.inst. 25:231-239 '57 (MIRA 11:8)

1. Iz kafedry normal'noy anatomii (zav. -chlen-korrespondent  
AN Tadzhikskoy SSR, dots. Ya.A. Rakhimov) Stalinabadskogo gosudar-  
stvennogo meditsinskogo instituta im. Abual ibn-Sino.  
(LIVER)  
(LYMPHATICS)

KRAYEV, A.V.

USSR / Human and animal Morphology (Normal and Pathological).  
Lymphatic System.

S

Abs Jour : Ref Zhur - Biol, No 21, 1958, No 97122

Author : Krayev, A.V.

Inst : Stalingrad Medical Institute

Title : Anatomy of the Intra-organic Lymphatic System of the  
Liver of the Dog.

Orig Pub : Tr. Stalingradsk, med. in-ta, 1957, 25, 231-239

Abstract : By the method of polychrome injection of the lymph  
vessels (LV) of the vena porta and vena hepatica, the  
hepatic artery and bile ducts, it was shown that in  
the serous membrane of the liver (L) there is one net-  
work of lymph capillaries (LC) whose loops rest in the  
deep layers of L capsule. The superficial lymphatic  
system of L is connected by LC with the lymph network,  
which lies around the central vein of II order. The  
deep lymphatic system of L consists of: 1) lymph net-  
work and efferent LV of I and II order which accompany

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USSR / Human and Animal Morphology (Normal and Pathological).  
Lymphatic System.

S

Abs Jour : Ref Zhur - Biol, No 21, 1958, No 97122

the roots of the hepatic vein; 2) lymph network and  
efferent LV of I and II order, which are distributed  
in the connective tissue around L lobules, branches of  
the vena porta, the hepatic artery and bile ducts.  
There are LC around the central veins of I and II order  
of L lobules.

Card 2/2

KRAYEV, A.V.

Methods for studying the lymphatic system. Trudy Stal.med.inst.  
25:245-248 '57 (M'RA 11:8)

1. Iz kafedry normal'noy anatomi (zav. - chlen-korrespondent AMN  
SSSR D.M. Zhdanov) Leningradskogo sanitarno-gigiyenicheskogo  
instituta i kafedry normal'noy anatomi (zav. chlen-korrespondent  
AN Tadzhikskoy SSB, dota, Ya.A. Rakhimov) Stalinabadskogo  
gosudarstvennogo meditsinskogo instituta im. Abuali ibn-Sino.  
(LYMPHATICS)

KRAYEV, A.V.

Features of the distribution of blood vessels in the muscular  
bundles of the bladder. Trudy Stal.med.inst. 25:249-255 '57

(MIHA 11:8)

1. Iz kafedry normal'noy anatomii (zav. - chlen-korrespondent  
AN Tadzhikskoy SSR, dots. Ya.A. Rakhimov) Stalinabadskogo gosudar-  
stvennogo meditsinskogo instituta im. Abuali ibn-Sino i kafedry  
normal'noy anatomi (zav. - chlen-korrespondent AMN SSSR, prof.  
D.A. Zhdanov) Leningradskogo sanitarno-gigiyenicheskogo meditsinskogo  
instituta.

(BLADDER--BLOOD SUPPLY)

VAYL', V.S., prof.; KRAYEV, A.V., dotsent

Collections of research works and other publications of the  
Avicenna Stalinabad Medical Institute for 1957 and 1958.  
Zdrav.Tadzh. 6 no.4:49-50 Jl-Ag '59. (MIRA 12:11)

1. Predsedatel' zedaktorsko-izdatel'skogo soveta Stalinabadskogo  
meditsinskogo instituta (for Vayl'). 2. Sekretar' zedaktorsko-  
izdatel'skogo soveta Stalinabadskogo meditsinskogo instituta  
(for Krayev).

(MEDICINE--BIBLIOGRAPHY)  
(BIBLIOGRAPHY--MEDICINE)

BALASHEV, V.N.; BORISOV, A.V.; KRAYEV, A.V.; ETINGEN, L.Ye.

Topic conference on the experimental morphology of the heart and  
blood vessels. Zdrav.Tadzh. 7 no.1:47-48 Ja-J '60. (MIRA 13:5)  
(CARDIOVASCULAR SYSTEM)

KRAYEV, A.V.; NIKONOV, A.P.; RASSOKHINA, L.I.; ETINGEN, L.Ye.

First conference of anatomists, histologists, and embryologists of  
Central Asia and Kazakhstan. Arkh. anat. gist. i embr. 40 no.2:111-  
115 F '61. (MIRA 14:5)

(HISTOLOGY--CONGRESSES)

KRAYEV, A.V.

Dynamics of changes in the lymphatic vessels of the liver in dogs.  
and white rats following experimental inflammation of the liver.  
Arkh. anat. i embr. 41 no.9:16-29 S '61. (MIRA 15:1)

1. Kafedra normal'noy anatomii (zav. - chlen-korrespondent AN  
SSSR prof. D.A.Zhdanov) I Moskovskogo ordena Lenina meditsinskogo  
instituta i kafedra normal'noy anatomii (zav. - chlen-korrespondent  
AN Tadzh. SSR, zasluzhennyy deyatel' nauki Ya.A.Rakhimov)  
Stalinabudskogo meditsinskogo instituta. Adres avtora: Moskva,  
Mokhovaya ul. 11, I Moskovskiy ordena Lenina meditsinskiy institut  
imeni I.M.Sechenova, kafedra normal'noy anatomii.

(LIVER-DISEASES) (LYMPHATICS)  
(CARBON TETRACHLORIDE-PHYSIOLOGICAL EFFECT) (ACTH)  
(E.GOTAMINA)

KRAYEV, Aleksandr Vasil'yevich; ETINGEN, Lev Yefimovich; RAKHIMOV,  
Ya.A., zasluzhennyy deyatel' nauki, otv.red.; FROLOV, P.M.,  
tekhn.red.

[Lymphatic system of the human urogenital organs] Lymfaticheskaia ,  
sistema mochepolovych organov cheloveka. Stalinabad, 1961.  
119 p. (Dushanbe. Gosudarstvennyi meditsinskii institut.  
Trudy, vol.46) (MIRA 16:2)

1. Chlen-korrespondent AN Tadzhikskoy SSR (for Rakhimov).  
(GENITOURINARY ORGANS) (LYMPHATICS)

VAYL', V.S., prof., zasluzhennyj deyatel' nauki Tadzhikskoy SSR; KRAYEV,  
A.V., dotsent, otv. red.; UTAYAYEV, S., tekhn. red.

[Essays on the history of Russian pediatrics of the second  
half of the 19th century]. Ocherki po istorii russkoi pediatrii  
vtoroi poloviny XIX veka. Stalinabad, 1959. 118 p. (Dushanbe.  
Gosudarstvennyi meditsinskii institut, Trudy, vol. 42).

(MIRA 16:10)

(PEDIATRICS)

KRAYEV, A.V.

State of intraorgan blood vessels in experimental acute  
intoxication and liver cirrhosis. Arkh. anat., hist. i  
embr. 47 no.9:61-72 S '64. (MIRA 18:11)

I. Kafedra normal'noy anatomiil (zav. - chlen-korrespondent  
ANN SSSR prof. D.A.Zhdanov) Universiteta druzhby narodov  
imeni Patrica Lumumby. Submitted April 21, 1964.

KRAYEV, G.A.; REL'TOV, B.F.

Attenuation of elastic waves in fracture models. Uch.zap. LGU  
no.286:125-129 '60. (MIRA 14:3)  
(Elastic waves)

ARABADZHYAN, I.N., red.; IZHAYLOVA, R.A., red.; KRAYEV, G.A., red.  
[deceased]; KRICHESKIY, I.Ye., red.; SOKOLOV, I.B., red.;  
SOLNYSHKOV, V.A., red.; STREL'TSOVA, T.D., red.; FOMIN,  
G.D., red.; SHUL'MAN, S.G., red.; ABRAMSON, L.S., tekhn.red.

DECEASED

[Collection of papers on hydraulic engineering] Sbornik dok-  
ladov po gidrotekhnike. Moskva, Gosenergoizdat, 1962. 284 p.  
(MIRA 17:3)

1. Nauchno-tehnicheskaya konferentsiya molodykh nauchnykh  
rabitnikov. 4th, 1962.

GOL'DIN, A.L., red.; ZHILENKOV, V.N., red.; IZMAYLOVA, R.A., red.;  
KRAYEV, G.A., red.; KRICHESKIY, I.Ye., red.; KYAKK, V.A.,  
red.; SOKOLOV, I.B., red.; SUDAKOV, V.B., red.; FOMIN, G.D.,  
red.; SHUL'MAN, S.G., red.; ABRAMSON, L.S., tekhn. red.

[Collection of reports on hydraulic engineering; the third  
engineering conference of young scientists] Sbornik dokladov  
po gidrotekhnike; tret'ia nauchno-tehnicheskaya konferentsiya  
molodykh nauchnykh rabotnikov. Moskva, Gosenergoizdat, 1961.  
183 p.  
(MIRA 17:2)

1. Leningrad. Nauchno-issledovatel'skiy institut gidrotekhniki.

KRAYEV, G.I., elektromekhanik

The quality of presently manufactured telephones should be improved.  
Avtom., telam. i sviaz' 6 no.7:44 Jl '62. (MIRA 16:2)

1. Kizelevskaya distantsiya signalizatsii i svyazi Sverdlovskoy  
dorogi.

(Telephone—Equipment and supplies)

KHAYEV, I., Inst.

The new railroad regulations and elements in combined waterway and railroad transport. Rech. trunq. 24 no. 6(5)-10 165. (MIRA 18:8)

KRAYEV, I.N.; VELYMEKIIY, Yu.B.

All-Union conference of Institutions for higher education on  
measurements of the consumption of liquids, gases and granular  
materials. Izm.tekh. no.9:56. 3 '65.

(MTR A 18:10)

AKHILLO, V.Kh., dotsent; KRAYEV, I.S., redaktor; VOLCHOK, K.M., tekhnicheskiy redaktor

[Cargo handling] Gruzovedenie. Moskva, Gos. izd-vo vodnogo transporta, 1954. 396 p.  
(Ships—Cargo) (Material handling) (MIRA 7:9)

KRAYEV, I.

Develop the moving of freight by combined railroad and water transport.  
Blok.agit.vod.transp. no.16:1-7 S '56. (MLRA 9:11)  
(Railroads--Freight)  
(Inland water transportation)

BODROV, A.D.; SHIPILIN, N.N.; SLONOV, N.M., ~~rezensent~~, KRAYEV, I.S.,  
rezensent; ZAVITAYEV, Ye.P., redaktor; VINOGRADOVA, N.M.,  
redaktor Izdatel'stva; TSVETKOVA, S.I., tekhnicheskiy redaktor

[Manual for the receiving and shipping clerk of dry cargos] Posobie  
priemosdatchiku skhogruzov. Izd. 3-eo. Moskva, Izd-vo "Rechnoi  
transport," 1957. 199 p.  
(Dry-goods--Transportation)  
(Inland water transportation) (MLRA 10:10)

KRAYEV

Ivan Stepanovich; SLONOV, M.N., retsenzent; MAYORSKIY, G.I.,  
retsenzent; ZAVITAYEV, Ye.P., red.; MAKRUSHINA, A.N., red.izd-va;  
SALAZKOV, N.P., tekhn.red.

[Principles of the commercial exploitation of river transportation  
and the organization of freight operations] Osnovy kommercheskoi  
eksploatatsii technogo transporta i organizatsii gruzovykh rabot.  
Moskva, Izd-vo "Rechnoi transport," 1957. 322 p. (MIRA 11:6)  
(Inland water transportation)

KRAYEV, I.

Textbook on the commercial operation of inland water transportation.  
Rech.transp. 16 no.2:31-32 F '57.  
(Inland water transportation) (MLRA 10:3)

KRAYEV, I.S., inzh.; TEPLOV, V.G.

Increase cargo transportations in mixed railroad-water communications. Rech.transp. 18 no.12:3-7 D '59. (MIRA 13:4)  
(Inland water transportation) (Railroads--Freight)

"APPROVED FOR RELEASE: 06/14/2000

CIA-RDP86-00513R000826310020-9

GREBENSHCHIKOV, A.I.; KRAYEV, I.T.

Effect of electric fields on the readings of a laboratory  
balance. Izm.tekh. no.8;30 Ag '62.  
(Balance—Testing) (MIRA 16:4)

APPROVED FOR RELEASE: 06/14/2000

CIA-RDP86-00513R000826310020-9"

KRAYEV, L.N.

Our experience in the change-over to a shorter work week.  
Gidroliz.i lesokhim.prom. 13 no.6:17-18 '60. (MIRA 13:9)

1. Leningradskiy gidroliznyy zavod.  
(Leningrad---Hydrolysis) (Hours of labor)

KRAYEV, L.N.; LOMAKIN, M.I.

Introduction of the method of continuous neutralization of hydrolyzates  
into plant practice. Gidroliz.i lesokhim.prom. 15 no.3:23-26 '62.  
1. Leningradskiy gidroliznyy zavod.  
(Leningrad--Hydrolysis) (MIRA 15:5)

S/081/61/000/021/002/094  
B102/B138

AUTHOR: Krayev, M.

TITLE: Analytical wave functions and energy levels of the  $1s2p^3P$  state of two-electron atoms

PERIODICAL: Referativnyy zhurnal. Khimiya, no. 21, 1961, 11, abstract 21B76 (Dokl. Bolg. AN. v. 13, no. 2, 1960, 147 - 149)

TEXT: The energy of the  $1s2p^3P$  states of two-electron ions with  $Z = 2 - 10$  were calculated by a variational method with Slater AO's. The divergence between calculated and experimental energies grows from 0.002 atomic units at  $Z = 2$  to 0.028 at  $Z = 10$ . The divergence can be considerably reduced by introducing an empirical term  $\sim Z^{-4}$  to the energy expression which takes account of relativistic effects. [Abstracter's note: Complete translation.] ↗

Card 1/1

S/081/62/000/006/001/117  
B166/B101

AUTHOR:

Krayev, M.

TITLE:

Analytic wave functions and the ground-state energy value  
of the boron atom

PERIODICAL:

Referativnyy zhurnal. Khimiya, no. 6, 1962, 5, abstract  
6B7 (Izv. Fiz. in-t s ANEB, v. 9, no. 1, 1961, 137-142)

TEXT: The wave functions of the energy of the boron atom in the  $1s^2 2s^2 2p^2$  state were determined using the method of variation of the parameters of the single-electron functions. The single-electron functions were taken in the following form:  $\psi_{1s} = \sqrt{\alpha/\pi} \exp(-ar)$ ,  $\psi_{2s} = \sqrt{3\beta^5/\pi} (\beta^2 - \alpha\beta + \alpha^2) : (1 - \alpha + \beta/3 \cdot r) \exp(-\beta r)$ ,  $\psi_{2p} = \sqrt{5/\pi} \exp(-\beta r) r \cos \theta$ . The following quantities were obtained for  $\alpha$ ,  $\beta$ ,  $r$ , and the energy  $E$  in the state  $1s^2 2s^2 2p^2$ :  $\alpha = 4.755$ ;  $\beta = 1.574$ ;  $r = 1.196$ ;  $E = -24.4916$  atomic units. The theoretical value of the energy differs from its experimental value.

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Analytic wave functions and the...

S/081/62/000/006/001/117  
B166/B101

$\langle E_{\text{exp.}} \rangle = -24.6545$  atomic units by  $\Delta E = -0.1629$  atomic units. [Abstractor  
ter's note: Complete translation.]

Card 2/2

L 34518-66 EWT(1)

ACC NR: AP6024738

SOURCE CODE: BU/0011/65/018/010/0895/0898

AUTHOR: Krayev, M.

ORG: Institute of Physics, BAN

4/9

B

TITLE: Influence of the noncoincidence of the centers of mass and charge

SOURCE: Bulgarska akademiya na naukite. Doklady, v. 10, no. 10, 1965, 895-898

TOPIC TAGS: Coulomb field, tunnel effect, deuteron, molecular theory

## ABSTRACT:

Since the Coulomb field acts on the proton and not on the center of mass of the deuteron, one can expect that this circumstance may affect the magnitude of the tunneling effect through Coulomb potential barriers. The author carries out a rigorous evaluation of the transmission coefficient through the barrier and finds that for atomic number  $Z = 10$ , deuteron energy  $E = 2$  MeV, and nuclear radius  $R_n = 3.5295 \cdot 10^{-13}$  cm the correct transmission coefficient is  $W = 0.166$  as compared with the value of  $W = 0.155$  calculated without taking into account the difference between the positions of the centers of mass and charge. This paper was presented by Academician Kh. Kristov on 21 June 1965. Orig. art. has: 15 formulas. [Orig. art. in Russian.]

JPRS: 34,780

SUB CODE: 20 / SUBM DATE: none / SOV REF: 001

Card 1/1 4/14.5

ABRAMOV, V.A.; ALEKSEYEV, A.N.; AL'TER, L.B.; ARAKELYAN, A.A.; BAKJAROV, G.I.;  
BASOVA, I.A.; BLYUMIN, I.O.; BOOGHOLOV, O.T.; BUN, N.Z.; BREZEL',  
N.Ya.; VIMYTHMAN, H.H.; VIKHNIYEV, A.I.; GAL'TSOV, A.D.; GERTSOVSKAYA,  
N.N.; GLADKOV, I.A.; DVORKIN, I.N.; DRAGILEV, M.S.; YEFIMOV, A.N.;  
ZHANIN, V.A.; ZHUK, I.N.; ZANYATNIN, V.N.; IGNAT'YEV, D.I.; IL'IN,  
M.A.; IL'IN, S.S.; IOFFE, Ye.A.; KAYE, V.A.; KAMENITSER, S.Ye.;  
KATS, A.I.; KLIMOV, A.G.; KOZLOV, G.A.; KOLGANOV, M.V.; KONTOROVICH,  
V.G.; KRAYEV, M.A.; KRONRUD, Ye.A.; LAKHMAN, I.L.; LIVANSKAYA, F.V.;  
LOGOVINSKAYA, R.L.; LYUBOSHITS, L.I.; MALYSH, A.I.; MENCHINSKIY,  
Ye.A.; MIKHAYLOVA, P.Ya.; MOISEYEV, M.I.; MOSKVIN, P.M.; NOTKIN,  
A.I.; PARTIGUL, S.P.; PIRVUSHIN, S.P.; PIROV, A.I.; PETRUSHOV, A.M.;  
PODGORNNOVA, V.M.; RABINOVICH, M.A.; RYVKIN, S.S.; RYNDINA, M.N.;  
SAKSAGANSKIY, T.D.; SAMSONOV, L.N.; SMEKHOV, B.M.; SOKOLIKHIN, S.I.;  
SOLLERTINSKAYA, Ye.I.; SUDARIKOV, A.A.; TATAR, S.K.; TERENT'YEV,  
P.V.; TYAGAY, Ye.Ya.; FEYGIN, Ya.G.; FIGURNOV, P.K.; FRUMKIN, A.B.;  
TSYRLIN, L.M.; SHAMBERG, V.M.; SHAPIRO, A.I.; SHCHENKOV, S.A.;  
EYDEL'MAN, B.I.; KHIN, P.E.; MITROFANOVA, S., red.; TROYANOVSKAYA, N.,  
tekhn.red.

[Concise dictionary of economics] Kratkii ekonomicheskii slovar'.  
Moskva, Gos.izd-vo polit.lit-ry, 1958. 391 p. (MIRA 11:7)  
(Economics--Dictionaries)

KRAYEV, M A

Pobeda Kolkhoznogo Stroya v SSSR (Victory of  
the Collective Farm System in the USSR)  
Moskva, Gospolizdat, 1954

719 p. Tables.

Bibliographical Footnotes.

N/5  
722.101  
.K9

KRAYEV, M.

Combined trench silos. Sel'stroi. 11 no.7:3 Jl '56. (MLRA 9:9)

1. Nachal'nik Arzamasskogo oblastnogo upravleniya po stroitel'stvu v  
kolkhozakh.  
(Arzamas Province--Silos)

KU YEV, M.

Basic features of the collectivization of agriculture in the U.S.S.R.  
Vop. ekon. no.11:54-66 N '57. (MIRA 11:2)  
(Russia--Agricultural policy)

KRAYEV, Mikhail Aleksandrovich; POLYAKOVA, N., red.; MUKHIN, Yu., tekhn.  
red.

[New stage in the development of collective farms] Novyi etap v  
razvitiu kolkhoznogo stroia. Moskva, Gos. izd-vo polit. lit-ry,  
1958. 54 p.  
(MIRA 11:9)

(Collective farms)

AMINOVA, R.Kh., kand. ist. nauk; TETENEVA, I.G., kand. ist. nauk;  
ALIMOV, I.A.; DMITRIYEV, G.L.; DZHAMALOV, O.B., doktor  
ekon. nauk, redaktor ; DZHURAYEVA, T., kand. ist. nauk,  
red.; ATFENYUK, S.Ya., red.; DANILOV, V.P., glav. red.;  
BELOV, G.A., red.; GRIGOR'YAN, L.I., red.; IBRAGIMOV, Z.I.,  
red.; IVNITSKIY, N.A., red.; IL'YASOV, S.I., red.; KAKABAYEV,  
S.D., red.; KAMENSKAYA, N.V., red.; KRAYEV, M.A., red.;  
KULIYEV, O.K., red.; MAKHARADZE, N.S., red.; OBICHKIN, G.D.,  
red.; PLESHAKOV, S.T., red.; RADZHABOV, Z.I., red.; SELEZNEV,  
M.S., red.; TURSUNBAYEV, A.B., red.; FEDOROV, A.G., red.;  
SHEPELEV, T.V., red.; PATLAKH, B., red.; MASHARIPOVA, D.,  
red.; BULATOVA, R., red.; GOR'KOVAYA, Z.P., tekhn. red.;  
KARABAYEVA, Kh.U., tekhn. red.

[Socialist reorganization of agriculture in Uzbekistan]  
Sotsialisticheskoe pereustroistvo sel'skogo khoziaistva v Uz-  
bekistane, 1917-1926 gg. Pod red. O.B.Dzhamalova. Tashkent,  
Izd-vo Akad. nauk UzSSR. Vol.1. 1962. 792 p. (MIRA 16:5)

1. Akademiya nauk Uzbekskoy SSR, Tashkent. Institut istorii i  
arkheologii.

(Uzbekistan--Agriculture)

GLADKOV, I.A., doktor ekon. nauk; KOSSOV, A.I., kand. ekon. nauk;  
VIDOMOV, S.S., nauchn. sotr.; SAMOYLOVA, I.D., nauchn. sotr.;  
GORBUNOV, E.P., kand. ekon. nauk; MAYEVSKIY, I.V., doktor  
ekonom. nauk; CHEBOTAREV, V.A., kand. ekon. nauk; KANUSHER,  
L.N., nauchn. sotr.; STROYEVA, Z.N., nauchn. sotr.; FOMINA,  
L.V., nauchn. sotr.; VOLOB'YEV, Yu.F., kand. ekon. nauk;  
KRAYEV, M.A., doktor ekon. nauk; KAPLINSKIY, Ye.M., kand.  
ekon. nauk; LAPINA, S.N., nauchn. sotr.; YAKOVTSSEVSKIY, V.N.,  
kand. ekon. nauk; ORLOV, B.P., kand. ekon. nauk; DIKHTYAR,  
G.A., doktor ekon. nauk [deceased]; PLOTNIKOV, K.N.;  
MALIKOVA, A.I., nauchn. sotr.; TOVMOSYAN, M.Ye., red.izd-va;  
POLYAKOVA, T.V., tekhn. red.

[Socialist national economy of the U.S.S.R. in 1933 to 1940]  
Sotsialisticheskoe narodnoe khoziaistvo SSSR v 1933-1940 gg.  
Moskva, Izd-vo AN SSSR, 1963. 665 p. (MIRA 16:12)

1. Akademiya nauk SSSR. Institut ekonomiki. 2. Sektor istorii  
narodnogo khozyaystva Instituta ekonomiki AN SSSR (for  
Stroyeva, Fomina, Kaplinskiy, Lapina). 3. Chlen-korrespondent  
AN SSSR (for Plotnikov).

(Russia--Economic conditions)

KRAYEV, N.

SUBJECT: USSR/Schooling 27-8-20/32

AUTHOR: Krayev, N., Tutor of Building School # 4, (Gor'kiy Oblast')

TITLE: From the Experience of Educating Builders (Iz praktiki vospitaniya stroiteley)

PERIODICAL: Professional'no - Tekhnicheskoye Obrazovaniye, Aug. 1957,  
1/14 # 8, p 28 (USSR)

ABSTRACT: The author lays stress on the necessity of having a good production base for practical training and refers in this connection to the pupils of Building School # 4 of the Gor'kiy oblast, who, with the help of the base enterprise, are building themselves a new school. They have also had other practice in the workshops of the Paper Combine, the House of Technics, etc.  
He explains the new methods applied in practical training and adds that positive results have also been obtained from the political-educational work in the school.  
He further speaks of the plan that is being fulfilled 130-150 % monthly, the way of selecting new students, of social

Card 1/2

27-8-20/32

TITLE: From the Experience of Educating Builders (Iz praktiki vospitaniya stroiteley)

meetings with former students, of the role played by the Komsomol Organization and of the students' social activities.

INSTITUTION: Stroitel'naya Shkola # 4 (Gor'kiy Oblast') Building School # 4 (Gor'kiy Oblast')

PRESENTED BY:

SUBMITTED:

AVAILABLE:

Card 2/2

Subject : USSR/Heat Engineering AID P - 4353  
Card 1/1 Pub. 110-a - 4/19  
Author : Krayev, O. A., Eng. Moscow Institute of Engineering  
and Physics  
Title : A method establishing the dependence of thermal conductivity upon temperature after a single experiment.  
Periodical : Teploenergetika, 4, 15-18, Ap 1956  
Abstract : A new method of measuring in a single operation the thermal conductivity in insulating and building materials is discussed. The experimental installation used in research is described in detail, and the theory and methods of testing are explained. Two diagrams. Two Russian references, 1952-1954.  
Institution : None  
Submitted : No date

KRAYEV, O.A., inzh.

Measuring heat conductivity of metals in a wide range of temperatures  
in one experiment. Teploenergetika 4 no.12:69-73 D '57. (MLRA 10:11)

1. Moskovskiy inzhenerno-fizicheskiy institut.  
(Heat--Conduction)

KRAYEV, O. A., Cand Tech Sci -- (disc) "Elaboration of methods ~~of~~ for  
determination ~~of~~ the dependence of temperature conductivity on the tem-  
perature in a single experiment." Mos, 1958. 8 pp (Min of Higher Edu-  
cation USSR, Mos Engineering-Phys Inst), 100 copies (KL, 17-58, 108)

- 43 -

K R A Y E V , O. A.

AUTHOR: Krayev, O.A., Engineer.

96-4-16/2A

TITLE: A simple method of measuring the thermal conductivity of heat-insulating materials. (Простой метод измерения температуропроводности теплоизоляторов).

PERIODICAL: Teploenergetika, 1958, No.4, pp. 31-32 (USSR).

ABSTRACT: In an article in Teploenergetika, No.12, 1957, the author offered a new method of measuring the thermal conductivity of metals. In the present article this method is extended to heat-insulating materials, and, unlike existing techniques, it can be used to determine thermal conductivity over a wide range of temperature in a single test. Firstly, there is a brief mathematical treatment of the case of a cylindrical specimen of heat-insulating material heated from one side at a slow rate. A temperature distribution symmetrical relative to the height of the cylinder and uniform throughout the height is assumed. A formula is then derived for the coefficient of thermal conductivity. The experimental apparatus is illustrated in Fig.1 and described. The material under investigation is contained in a thin-walled stainless steel tube; thermo-couples are fitted Card 1/2 at the centre of the sample and in the middle of the

A simple method of measuring the thermal conductivity of heat-insulating materials.

outer surface of the steel tube. The whole is placed in a tubular furnace and packed around with sand. Temperature/time curves, plotted by means of the two thermo-couples, enable the thermal conductivity to be derived. The method was verified in the case of the thermal conductivity of aluminium oxide by employing the alternative technique of regular conditions. The procedure for doing this is described. The values obtained by the two methods are compared in Fig.2 and show good agreement. The error of the method is estimated to be 3 - 3 1/2%. There are 2 figures and 3 Russian references.

ASSOCIATION: Moscow Physics and Engineering Institute.  
(Moskovskiy Tekhnicheskij Institut)

AVAILABLE: Library of Congress.

Card 2/2



55800

5(4), 28(5)

AUTHOR:

Krayev, O. A.

68286

S/032/60/026/02/024/057  
B010/B009TITLE: A Method for Measuring the Thermal Conductivity of LiquidsPERIODICAL: Zavodskaya laboratoriya. 1960, Vol 26, Nr 2, pp 183 - 184  
(USSR)ABSTRACT: The paper describes an apparatus that may be used for determining the thermal conductivity of liquids (Fig 1). The liquid is filled into the cylindrical interstice between two cylindrical copper blocks. The outer block is surrounded by a heater, and is heated slowly. The heat from the outer cylinder is thus transmitted through the liquid to the inner cylinder. Thermocouples are introduced from above into both cylinders. In the test the time required for the temperature equalization between the inner and outer cylinders is determined. The thermal conductivity  $\lambda$  of the liquid is then calculated from an equation. Several conditions must be satisfied in order that the calculation formula holds. Values obtained for the thermal conductivity of several liquids are in close agreement with the respective data found in publications (Ref 2). The maximum relative error of the present method is 3-4%. There are

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A Method for Measuring the Thermal Conductivity of Liquids  
S/032/60/026/02/024/057  
B010/B009

2 figures and 2 Soviet references.

ASSOCIATION: Moskovskiy inzhenerno-fizicheskiy institut (Moscow Physics and Engineering Institute)

Card 2/2

*Q. A.*  
KRAYEV, Q.-A. and STEL'MAKH, A. A. (Novosibirsk)

"Heat conductivity of tungsten, molybdenum, and niobium at temperatures above 2000C."

Report presented at the Seminar on the Problems of research on thermophysical properties of substances at high temperatures, Novosibirsk, 9-10 April 1963.

ACCESSION NR: AP4000395

S/0294/63/001/001/0008/0011

AUTHOR: Krayev, O. A.; Stel'makh, A. A.

TITLE: Thermal diffusivity of tungsten at 1600—2960C

SOURCE: Teplofizika vysokikh temperatur, v. 1, no. 1, 1963, 8-11

TOPIC TAGS: thermal diffusivity, high temperature thermal diffusivity, tungsten thermal diffusivity, tungsten

ABSTRACT: The article describes a method and a laboratory unit for measuring thermal diffusivity of metals at high temperatures, and the results of the measurement of tungsten thermal diffusivity in the 1600—2960C range. The method is based on measurements of the phase shift between the fluctuations of heat flow on the electron-bombarded side of a flat specimen and the temperature fluctuations on the opposite side. The method was used to measure the thermal diffusivity coefficient ( $\alpha$ ) of rolled commercial-grade tungsten in the form of disks 0.2 mm thick and 7—8 mm in diameter. The temperature fluctuation frequency varied from 280 to 1200 cps; accordingly, the phase shift was from 110° to 180°. The results of the measurements are

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ACCESSION NR: AP4000395

shown in Fig. 1 of the Enclosure. The calculated maximum measurement error of about 5% can probably be appreciably reduced with further refinement of the procedure. Orig. art. has: 4 figures and 3 formulas.

ASSOCIATION: Institut teplofiziki Sibirskogo otdeleniya Akademii nauk SSSR (Institute of Heat Physics, Siberian Department, Academy of Sciences SSSR)

SUBMITTED: 22Apr63 DATE ACQ: 13Dec63 ENCL: 01  
SUB CODE: PH, MA NO REF Sov: 003 OTHER: 000

Card 2/3

KRAYEV, O. A.

ACCESSION NR: AP4000408 S/0294/63/001/001/0156/0156

AUTHOR: Petrov, V. A.

TITLE: Seminar on production methods, physical properties, and electron structure of refractory metals, compounds, and alloys

SOURCE: Teplofizika vysokikh temperatur, v. 1, no. 1, 1963, 156

TOPIC TAGS: refractory metal, refractory compound, refractory alloy, thermal conductivity, electric conductivity, thermal diffusivity, tantalum, niobium, tungsten, molybdenum, emission capacity, thermal expansion, chromium, zirconium

ABSTRACT: A seminar on extraction methods, physical properties, and electron structure of refractory metals, compounds, and alloys, organized by the Institut metallokeramiki i spetsplavov AN USSR (Institute of Powder Metallurgy and Special Alloys AN USSR) was held in Kiev from 25 to 29 April 1963. The thermophysical properties of refractory materials at high temperatures were discussed in the following papers: "Investigation of the temperature dependence of heat and electrical conductivity and thermal diffusivity of tantalum

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and niobium" (N. Z. Pozdnyak and K. G. Akhmetzanov); "Thermal diffusivity of tungsten and molybdenum at high temperatures" (O. A. Kravev and A. A. Stel'makh); "Experimental determination of integral emissivity and monochromatic emissivity of metals at high temperatures" (V. A. Petrov, V. Ya. Chekhovskov, and A. Ye. Sheyndlin); "The application of electron beam heating in the investigation of integral blackness of heat-resistant alloys and compounds" (D. L. Timrot, V. E. Peletskiy, and V. Yu. Voskresenskiy); "Measuring of emissivity of solids at temperatures over 1000°C" (L. A. Novitskiy, L. V. Trushchitsina, and V. I. Akimov) "On the thermal expansion of chromium-base alloys" (N. V. Ageyev and N. S. Model); "Investigation of thermal expansion of tungsten, molybdenum, tantalum, niobium, and zirconium at high temperatures" (V. M. Avonenko, P. N. V'yugov, and A. S. Gumennyuk); "Determination of the true heat capacity of metals at high temperatures" (V. S. Fedorov and V. I. Akimov); "Heat capacity of tungsten, tantalum, and niobium at high temperatures" (Ya. A. Kraftmakher); "Heat conductivity of materials in vacuum and inert gases" (S. P. Rusin and O. S. Gurvich); "Results of the investigation of electrical and heat conductivity of certain refractory compounds" (L. F. Mal'tseva and E. N. Marmer). Considerable attention was given to the development of experimental

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equipment for investigation of the thermophysical properties of substances in a wide range of temperatures.

ASSOCIATION: none

SUBMITTED: 00 DATE ACQ: 13Dec63 ENCL: 00

SUB CODE: PH, ML NO REF SOV: 000 OTHER: 000

Card 3/3

KRAYEV, O. A.

TITLE: Seminar on refractory metals, compounds, and alloys (Kiev, April 1963).

SOURCE: Atomnaya energiya, v. 15, no. 3, 1963, 266-267

ACCESSION NR: AP3008085

composition on thermal stresses.

T. A. Sultanyan. Electron-microscope investigation of the nature of fracture.

N. S. Pozdnyak, K. G. Akhmetzanov. Heat and electric conductivity of high-purity tantalum and niobium.

O. A. Krayev, A. A. Stel'makh. Thermal diffusivity of tungsten and molybdenum at high temperatures.

S. P. Rusin, O. S. Gurvich. Heat conductivity of loose refractory powders in vacuum and inert gas.

L. F. Mal'tseva, E. N. Marmer. Heat and electric conductivity of refractory compounds.

V. B. Fedorov, V. I. Akimov. Heat capacity of metals at high temperatures.

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ACCESSION NR: AP4038445

S/0294/64/002/002/0302/0302

AUTHOR: Krayev, O. A.; Stel'makh, A. A.

TITLE: Thermal diffusivity of tantalum, molybdenum, and niobium at temperatures above 1800K

SOURCE: Teplofizika vy\*sokikh temperatur, v. 2, no. 2, 1964, 302

TOPIC TAGS: tantalum, tantalum thermal diffusivity, molybdenum, molybdenum thermal diffusivity, niobium, niobium thermal diffusivity

ABSTRACT: The thermal diffusivity of tantalum, molybdenum, and niobium at temperatures ranging from 1900 to 3150K, from 1900 to 2500K, and from 1800 to 2600K, respectively, has been determined by the method of "temperature waves." Disk-shaped specimens 8—9 mm in diameter were used which were 0.2 mm thick in the case of tantalum and 0.3 mm thick in the case of molybdenum and niobium. The frequency of temperature oscillation was 290 and 530 cps for

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tantalum and 130 and 230 cps for molybdenum and niobium. The values of thermal diffusivity determined in  $m^2/sec \cdot 10^{-4}$  are given in Table 1 of the Enclosure. Orig. art. has: 1 table.

ASSOCIATION: Institut teplofiziki, Sibirskoye otdeleniye Akademii nauk SSSR (Institute of Heat Physics, Academy of Sciences SSSR, Siberian Branch)

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ENCLOSURE: 01

Table 1. Values of thermal diffusivity

T°K	1800	1900	2000	2100	2200	2300	400	2500	2600	2700	2800	2900	3000	3100	3150
Tantalum	—	0.220	0.217	0.214	0.212	0.209	0.206	0.203	0.201	0.198	0.195	0.191	0.186	0.178	0.175
Molybdenum	—	0.261	0.252	0.243	0.233	0.223	0.211	0.198	—	—	—	—	—	—	—
Niobium	—	0.228	0.225	0.221	0.218	0.214	0.209	0.202	0.194	0.183	—	—	—	—	—

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