"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

PANAYOTOVA, M.D. Cand Geo Min Sci -- (diss) "Dolyamo-Kamenyanskiy group of ultra bas[illegible] of the Rodopskiy mountains and their chromite content." Mos 1958, 16 pp (Mos State Univ im M.V. Lomonosov) 110 copies (KL, 21-58, 89)

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PANAYOTOVA, M.D.

Minerals of the chrome spinellide group and their relation with certain types of ultrabasic rocks in the Golyamo Kamenyane ore deposit (Rhodope Mountains. Bulgaria). Vest. Mosk.un.Ser.biol., pochv., geol., geog. 14 no.2:141-148 '59. (MIRA 13:4)

1. Kafedra poleznykh iskopayemykh Moskovskogo gos.universiteta.
(Golyamo Kamenyane Region, Bulgaria--Spinel group)

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PANAYOTTI, Z.F.

Effect of middle frequency noise of various intensity on the functional state of acoustic and motor analysors. Trudy LSGMI 75:156-162 '63. (MIRA 17:4)

1. Kafedra gigiyeny truda s klinikoy professional'nykh zabolevaniy (zav. kafedroy - prof. Ye.TS. Andreyeva-Galanina) Leningradskogo sanitarno-gigiyenicheskogo meditsinskogo instituta.

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PANC, K.

"Economical use of investments."

p. 350 (Sklar A Keramik) Vol. 7, no. 12, Dec. 1957
Prague, Czechoslovakia

SO: Monthly Index of East European Accessions (EEAI) LC. Vol. 7, no. 4, April 1958

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PANC, K.

For higher labor productivity in glass and ceramic industries. p.126.
(Sklar A Keramik, Vol. 7, No. 5, May 1957, Praha, Czechoslovakia)

SO: Monthly List of East European Accessions (EEAL) LC. Vol. 6, No. 9, Sept. 1957. Uncl.

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PANC, K.

"Economical utilization of investments. ; Through new techniques to a higher productivity exhibition in Liberec."

p. 338, 339 (Kozarstvi) Vol. 7, no. 12, Dec. 1957
Prague, Czechoslovakia

SO: Monthly Index of East European Accessions (EEAI) LC. Vol. 7, no. 4, April 1958

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1.Spetsialist-konsul'tant Vystavki chekhoslovatskogo stekla.
(Moscow--Glassware, Czechoslovak--Exhibitions)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

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PANC, V.

Calculating horizontal cylindrical tanks loaded with hydrostatic pressure. p. 338

INŽENÝRSKÉ STAVBY. (Ministerstvo stavebnictví) Praha

Vol. 3, no. 8, Aug. 1954

East European Accessions List Vol. 5 No. 1 Jan. 1956

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

PANC, VLADIMIR.

Improved Relaxation Method.

Panc, Vladimír, Die verbesserte Relaxationsmethode. Apl. Mat. 2 (1957), 184-201. (Czech., Russian and German summaries)

Es handelt sich um eine Verbindung der zuerst von V. Dašek und R. V. Southwell entwickelten Relaxationsmethoden [cf., e.g., R. V. Southwell, Relaxation methods in engineering science, Oxford, 1940; MR 3, 152] die sich eine Beschleunigung der auftretenden Konvergenzprozesse zum Ziel setzt. Dafür gewinnt Verfasser zwei Methoden, deren Gruppenoperationen sich von der Southwellschen Methode unterscheiden und unter Verwendung von Dreiecksmatrizen zu einer Relaxationselimination führen, welche das bekannte Gaußsche Verfahren praktisch verbessert. Nach einer theoretischen Behandlung des Systems

$$x_1+\sum_{k=0}^{n} a_{1k}x_k=a_{10},\quad x_2+\sum_{k=1}^{n} a_{2k}x_k=a_{20},\ \ldots,\quad x_n+\sum_{k=1}^{n-1} a_{nk}x_k=a_{n0}$$

werden zwei numerische Beispiele durchgerechnet. Dabei wird noch insbesondere auf die Umstände hingewiesen, welche die Anwendung der entwickelten Methoden konvergenzbeschleunigend beeinflussen können. M. Fiedler

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PANC, V.

Improved Relaxation Method.

2r

Panc, Vladimír. Die verbesserte Relaxationsmethode. Apl. Mat. 2 (1957), 184-201. (Czech. Russian and German summaries)

Es handelt sich um eine Verbindung der zuerst von V. Dašek und R. V. Southwell entwickelten Relaxationsmethoden [cf., e.g., R. V. Southwell, Relaxation methods in engineering science, Oxford, 1940; MR 3, 152] die sich eine Beschleunigung der auftretenden Konvergenzprozesse zum Ziel setzt. Dafür gewinnt Verfasser zwei Methoden, deren Gruppenoperationen sich von der Southwellschen Methode unterscheiden und unter Verwendung von Dreiecksmatrizen zu einer Relaxationselimination führen, welche das bekannte Gaußsche Verfahren praktisch verbessert. Nach einer theoretischen Behandlung des Systems

$$x_1+\sum_{k=2}^{n} a_{1k}x_k=a_{10},\quad x_2+\sum_{2\neq k=1}^{n} a_{2k}x_k=a_{20},\ \cdots,$$
$$x_n+\sum_{k=1}^{n-1} a_{nk}x_k=a_{n0}$$

werden zwei numerische Beispiele durchgerechnet. Dabei wird noch insbesondere auf die Umstände hingewiesen, welche die Anwendung der entwickelten Methoden konvergenzbeschleunigend beeinflussen können. *M. Pinl.*

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4

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PA[illegible]C, V.

"An improved relaxation method."

p. 1[illegible]4 (INSTITUTE of Mathematics, Czechoslovak Academy of Sciences) Vol. 2, no. [illegible], 1957

SO, Monthly Index of East European Accessions (EEAI) LC, Vol. 7, no. 5, May 195[illegible]

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"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

PANC, V.

Long rib-like cylindrical sheathing. p.12. (Stavebnicky Casopis. Bratislava. Vol. 5, no. 1, 1957.)

SO: Monthly List of East European Accessions (EEAL) LC. Vol. 6, no. 7, July 1957. Incl.

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PANC, V.

Modern thin-walled structures and their statival solution. p. 3

CZECHOSLOVAK HEAVY INDUSTRY. (Ceskoslovenska obchodni komora) Prague, Czechoslovakia. No. 6, 1959

Monthly List of East European Accessions (EEAI), LC, Vol. 8, No. 7, July 1959
Uncl.

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"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

14(10) PHASE I BOOK EXPLOITATION CZECH/2827

Panc, Vladimír, Candidate of Technical Sciences, Engineer

Statika tenkostěnných prutů a konstrukcí (Design of Thin-walled Beams and Structures for Static Loads) Prague, Nakladatelství Československé Akademie Věd, 1959. 423 p. (Series: Československá Akademie Věd. Studie a prameny. Sekce technická) 1,750 copies printed.

Scientific Ed.: Václav Dašek, Academician; Ed.: Lidmila Jánská; Tech. Ed.: František Koncický.

PURPOSE: The book is intended for structural design engineers, stress analysts, and scientific research workers.

COVERAGE: The book deals with the theory of thin-walled prismatic structures transversally reinforced with thin-walled or trussed bulkheads or with sufficiently rigid ribs. The subject matter is based on theories of thin-walled structures developed by Soviet scientists and on the author's own general theory of prismatic thin-walled structures. Beams with open and closed cross sections and one-cell and multicell cross sections are analyzed. The author mentions Stanislav Bechyně, Academician, and František

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Jermář, Professor, Engineer, Doctor, Corresponding Member, Academy of Sciences, Czechoslovakia, as contributors. He thanks Václav Daněk, Academician; František Faltus, Professor, Engineer, Doctor, Corresponding Member, Academy of Sciences, Czechoslovakia; and Ferdinand Lederer, Professor, Engineer, Doctor of Technical Sciences, for their assistance. There are 22 references, all Soviet.

TABLE OF CONTENTS:

Preface 5

Table of Contents 7

Introduction 11

Ch. I. Basic Concepts and Equations
1. Symbols 13
2. Initial hypotheses 14
3. Derivation of the basic kinematic equation 19
4. Loading and static equilibrium conditions of a wall element 22

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

5. Equilibrium conditions for external loading and internal forces 24

Ch. II. Thin-walled Beams With Open Cross Sections
6. Determination of tangential stresses at planar distribution of elongations per unit length. Shear center of open cross sections 27
7. Pure torsion of thin-walled beams with open cross sections 30
8. Deformation of a beam under simultaneous bending and shear 33
9. Vlasov theory of restrained torsion of thin-walled beams with open cross sections 53
10. Determining the coordinates of the shear center and the sectorial characteristics for some ordinary cross sections 59
A. I-sections, T-sections, angles, and combined cross sections 61
B. [-sections 63
C. ⅂-sections 66
D. Thin-walled beam reinforced by longitudinal stiffeners 70
E. Asymmetrical compound section 74
11. Solution of the basic equation for restrained torsion 78
12. General forms of functions for restrained torsion under various types of torsional loading and boundary conditions 87

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

Design of Thin-walled Beams (Cont.) CZECH/2827

A. Beam loaded with torques at end cross sections 87
B. Beam loaded with a concentrated torque in an arbitrary cross section 89
C. Beam with uniformly distributed torque along the length 95
13. Theorem of three moments and the fundamental relationship between deformation method and force method for solution of continuous thin-walled beams and frame structures subjected to torsion 101
14. Effect of shear strains in the middle surface on the total deformation of the structure and the normal stresses 117
15. Basic formulas for the simplified theory of restrained torsion 131
16. Natural vibration of a thin-walled beam 135
17. Stability of thin-walled beams loaded on the ends with axial forces 138
A. Axial compression 140
B. Eccentric compression 144
18. Solid crane rails with a stiffening truss frame 145
19. Ribbed cylindrical shells 151
A. Basic formulas 152
B. Shells with a circular center line of the cross section 156
C. Shells with a parabolic center line of the cross section 159

Card 4/9

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

D. Design of cross ribs 161
E. Effect of shear strains in the center surface 165
20. Lateral stresses in thin-walled beams with open cross sections 175

Ch. III. Thin-walled Beams With Closed and Multicell Cross Sections
21. Tangential stresses during bending of a beam with closed cross section. Shear center of closed sections 183
22. Pure torsion of thin-walled beams with closed cross sections 187
23. Umanskiy theory of restrained torsion of thin-walled beams with closed cross sections 191
24. Solution of the basic equation for restrained torsion 197
25. Functions for restrained torsion under different types of loading and boundary conditions 202
A. Beam loaded with torques at end cross sections 202
B. Beam loaded with a concentrated torque in an arbitrary cross section 205
C. Beam with uniformly distributed torque along the length 209
26. Deformation of thin-walled beams with closed cross sections under general loading. Additional normal stress 214
27. Continuous thin-walled torsionally loaded beams with closed cross

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

sections. Basic relationships in the method of the distortion of joints 224
28. Tangential stresses during bending of beams with multicell cross sections. Shear center of multicell sections 228
29. Pure torsion of thin-walled beams with multicell cross sections 233
30. Restrained torsion of thin-walled beams with multicell cross sections 243
31. Natural vibration of thin-walled beams with closed and multicell cross sections 249
32. Stability of thin-walled beams with closed or multicell cross sections loaded at ends with axial forces 252
A. Axial compression 254
B. Eccentric compression 257
33. Lateral stresses in thin-walled beams with closed or multicell cross sections 257

Ch. IV. Thin-walled Beams With Open and One-cell Cross Sections Supported Along the Whole Length by a Suspension Hinge Eccentric to Their Flexural Axes
34. Beam with an open cross section supported by a hinge along the whole length 267

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

35. Loading of the suspension hinge, lateral stresses, additional deformation, and stresses in structures with open cross sections 275
36. Beam with open cross section supported by single-hinged supports 282
37. Beam with closed cross section supported by a hinge along the whole length 286
38. Loading of the suspension hinge, lateral stresses, and establishing a more exact relationship for normal stresses in structures with closed cross sections 303
39. Structure with closed cross section consisting of a cylindrical shell and latticed framework 318
40. Thin-walled structure with one-cell cross section 330

Ch. V. General Theory of Prismatic Thin-walled Structures With Stiffened Cross Sections
41. Derivation of the basic equation 347
42. General solution of the basic homogeneous equation 351
43. Expression of deformation functions by infinite series 354
44. A particular solution of the basic equation for a shell with circular center line of the cross section 357
45. Dependence of integration constants in the general solution of the basic equation on coefficients in series expressing the

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

deformation of the structure 362
46. Variation equation of a prismatic thin-walled structure with stiffened cross section 366
47. Thin load-carrying walls with rectangular stiffened cross sections 369
48. Thin load-carrying walls with stiffened cross sections and elastic flanges 374
49. Continuous thin-walled piping loaded with internal pressure 382
50. Forced torsion [combined bending, shear, and torsion] of a thin-walled structure with a stiffened cross section 388
51. Short ribbed shells 393
A. Plane bending combined with shear 399
B. Bending in the horizontal plane combined with shear and torsion 401

Table VII. Values of Functions of the Characteristic Quantity, K 404

List of Tables 414

List of Basic Bibliography on the Theory of Thin-walled Beams 415

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

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PANC, Vladimir, inz., C.Sc.

Stress conditions of spherical shells supported by a vertical plane. Acta techn Cz 7 no.4:345-389 '62.

1. Tschechoslowakische Akademie der Wissenschaften, Praha 6, Solinova 7.

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[illegible]ANTS, Vladimir [illegible], kandidat technickych ved

Statistical [illegible] constructions.
Acta techn Cz [illegible] '62

1. Chekhoslovatskaya Akademiya [illegible] Mesto,
Vysehradska [illegible].

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"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

2/0026/64/009/001/0001/0030

ACCESSION NR: AP4016283

AUTHOR: Panc, Vladimir (Science Candidate, Prague)

TITLE: Theory of prestressed pressure vessels with elastic rings

SOURCE: Aplikace matematiky, v. 9, no. 1, 1964, 1-30

TOPIC TAGS: stress, thin-walled cylinder, arially symmetrical problem, elastic ring, pressure vessel, Donnell equation

ABSTRACT: Known basic equations as used by various authors for solving boundary value problems in the theory of cylindrical shells with circular cross sections are reviewed, and a more accurate version of Donnell's equation is offered. As a special axially symmetrical problem, stress and deformation are studied in thin-walled pressure vessels and pipes, prestressed by elastic rings drawn while hot. On the basis of the equations for the general boundary value problem, a method is presented for stress computations for a cylindrical tank with elastic rings prestressed by internal rods. Orig. art. has 3 figures, 131 equations.

Card 1/2

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ACCESSION NR: AP4016283

ASSOCIATION: none

SUBMITTED: 26Mar63 DATE ACQ: 14Feb64 ENCL: 00

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L 33505-66 EWP(w) EM

ACC NR: AP6023470 SOURCE CODE: CZ/0026/65/010/005/0399/0422

AUTHOR: Panc, Vladimir—Pants, V. (Engineer; Candidate of sciences; Prague)

ORG: Institute of Theoretical and Applied Mechanics, CSAV, Prague (Ustav teoreticke a aplikovane mechaniky, CSAV)

TITLE: Axisymmetric stressed states of an elastic plate yielding to displacement

SOURCE: Aplikace matematiky, v. 10, no. 5, 1965, 399-422

TOPIC TAGS: shear stress, elastic plate, material deformation, stress analysis

ABSTRACT: In a consideration of transverse shearing strain, a refinement of the classical plate theory is developed for the case of thin, elastic circular plates under axisymmetric load. [JPRS]

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Card 1/1

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"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

PANC, Vladimir, inz. CSc.

The effect of the compressibility of material at the limit elastic-plastic equilibrium. Acta techn Cz 10 no.1:1-29 '65.

1. Institute of Theoretical and Applied Mechanics of the Czechoslovak Academy of Sciences, Prague 2, Vysehradska 49. Submitted May 5, 1964.

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"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

L 09063-67 EWP(w)/EWP(v)/EWP(k) EM

ACC NR: AT6033133 SOURCE CODE: HU/2504/66/053/03-/0389/0405

AUTHOR: Panc, V.--Pants, V. (Candidate of technical sciences) 8

ORG: Institute for Theoretical and Applied Mechanics, Czechoslovak Academy of Sciences, Prague

TITLE: Theory for thin-walled beams on an elastic support

SOURCE: Academia scientiarum hungaricae. Acta technica, v. 53, no. 3-4, 1966, 389-405

TOPIC TAGS: thin walled beam, shear stress

ABSTRACT: A general theory was developed for thin-walled, prismatic beams elastically supported and having rigid cross sections symmetrical to the vertical axis. As compared to the classical theory for elastically supported beams, the basic equation of the problem contains one additional member characterizing the shear strains in the center plane. The equations derived prove that for thin-walled structures the influence studied cannot be neglected.

Orig. art. has: 4 figures and 31 formulas. [Based on author's Eng. abst.] [JPRS: 36,645]

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PANCER, O.

The rationalization of work in agriculture and its popularization through teaching and training. p. 659.
(Tehnika, Vol. 12, no. 4, 1957. Beograd, Yugoslavia)

SO: Monthly List of East European Accessions. (EEAL) LC. Vol. 6, No. 7, July 1957. Uncl.

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"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

PANCER, O.

Seventh Congress of the International Committee for Farm Work Organization (CIOSTA). p. 826.
(Tehnika, Vol. 12, No. 5, 1957, Beograd, Yugoslavia)

SO: Monthly List of East European Accessions (EEAL) Lc. Vol. 6, No. 8, Aug 1957. Uncl.

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"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

PANCER, Zdzislaw, Pplk. dypl.

Cosmocrator, cosmocrator - here is the earth. Przegl techn no.15:3,4 Ap '62.

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PANCESCU, S., ing.

Observations on check valve cementing. Petrol si gaze 14 no.5:251-254 My'63.

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

PANCESCU, Sergiu, ing.

Redrilling of wells. Petrol si gaze 14 no.1:22-27 Ja '63.

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"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

L 4363-66

ACC NR: AP4028420 SOURCE CODE: BU/0011/65/018/001/0035/0038

AUTHOR: Mihajlov, M.; Pancev, A.

ORG: Institute for Organic Chemistry of the Bulgarian Academy of Sciences (Institut fur organische Chemie an der Bulgarischen Akademie der Wissenschaften)

TITLE: Production of a mixture of α-aminoacid hydrochlorides from gelatin and its esterification with butanol

SOURCE: Bulgarska akademiya na naukite. Doklady, v. 18, no. 1, 1965, 35-38

TOPIC TAGS: ester, amino acid, polymer, protein, esterification

ABSTRACT: [German article] The polycondensation of α-aminoacid esters under the influence of carbon dioxide and other catalyzers has been lately the subject of very interesting studies (see, Mezhdunarodnyy simpozium po mikromolekulyarnoy khimii SSSR, Doklady i avtoreferaty [International Symposium of Micromolecular Chemistry USSR, Contributions and Reports], M., 14-18, VI 1960, I Sec. p. 210). It represents a convenient method for the production of model-polypeptides of given composition and structure. The esters of the α-aminoacids represent also useful raw material for the synthesis of other interesting polymers, and consequently, the authors present in this article a method for the production of α-aminoacids from proteins and their esterification. Curves present the time dependence of the acid

Card 1/2

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L 4363-66

ACC NR: AP5028420

number and the specific weight of the reacting mixture, of the degree of completion of the hydrolysis, of the changes in $[\alpha]_D^{20}$, and of the kinetics of water separation. The paper was presented by B. Kurtev, Corresponding Member, 28 Aug 64. Orig. art. has: 4 figures, 1 table [JPRS]

SUB CODE: OC, GC / SUBM DATE: 28Aug64 / OTH REF: 003 / SOV REF: 002

Card 2/2

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"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

PANCHWICZ, Ignacy (Krakow, ul. Kopernika 40)

Early diagnosis of esophageal cancer. Polski przegl. chir. 26 no. 7:623-630 July 54.

1. Z I Kliniki Chirurgicznej Akademii Medycznej im. prof. M.Ruthkowskiego w Krakowie. Kierownik: prof. dr J.Boguss.
(ESOPHAGUS, neoplasms,
diag., early)

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"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

MRUK, Jozef; PANCEWICZ, Ignacy (Krakow)

A case of perforation of deep femoral artery in the course of endocarditis lenta. Przegl.lek., Krakow 11 no.5:136-138 '55.

1. Z II Kliniki Chorob Wewnetrznych A.M. w Krakowie Kierownik: Prof. dr J. Boguas.

(ENDOCARDITIS SUBACUTE, BACTERIAL, complications
femoral artery, deep, rupt.)
(ARTERIES, FEMORAL rupture
with endocarditis subacute, bacterial)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

PANCEWICZ, Ignacy

Diagnostic difficulties in invagination in adults. Polski przegl. chir. 28 no.10:1037-1042 Oct 56.

1. Z II Kliniki Chirurgicznej A.M. w Krakowie Kierownik: prof. dr. K. Michejda, Adres autora: Krakow, ul. Kopernika 21.
(INTUSSUCEPTION, diagnosis, difficulties in adults (Pol))

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

PANCEWICZ, Ignacy; SZNAJDER, Wlodzimierz; WROBLEWSKI, Wincenty; GIL, Henryk

The signigicance of contrast media in the diagnosis and treatment of intussusception in children. Polski przegl. chir. 28 no.1:17-25 Jan 56.

1. Z I Kliniki Chirurgicznej A. M. w Krakowie Kierownik: prof. J. Bogusz Krakow, ul. Kopernika 21.
(INTUSSUSCEPTION, in inf. & Child,
diag. & ther. value of contrast media. (Pol))
(CONTRAST MEDIA,
in diag. & ther. of intussusception in child. (Pol))

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

WOLOCHOWICZ-JOZWIAKOWA, Zofia; PANCEWICZ-OLSZEWSKA, Janina

Abnormal arterial vascularization of the lower lobe of the left lung. Polski przegl.chir. 32 no.7:655-659 Jl '60.
(PULMONARY ARTERY abnorm)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

BROSZEWSKI, J.; PANCEWICZ-OLSZEWSKA, W.

A case of obstructive jaundice caused by chronic inflammation of the head of the pancreas. Pediat. polska 34 no.6:835-838 June 59.

1. Z I Kliniki Chorob Dziecicych A. M. w Poznaniu Kierownik: prof. dr med. T. Rafinski i z III Kliniki Chirurgicznej A. M. w Poznaniu Kierownik: doc. dr med. J. Borszewski
(JAUNDICE OBSTRUCTIVE, etiol.)
(PANCREATITIS, compl.)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

PANCHAREVSKII, D.

MIKHAILOV, P.; PANCHAREVSKII, D.

Pathogenesis, clinical aspects, therapy, and prevention of occupational dermatitis. Suvrem. med., Sofia 4 no.9:54-63 1953. (CLML 25:5)

1. Of the Dermato-Venereological Scientific-Research Institute for the Republic (Director --Prof. P. Popkhristov).

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

PANCHARTEK, J.; ALLAN, Z.J.; MUZIK, F.

Aromatic azo and diazo compounds. XXXIX. Chromatographic constitutionsl analysis of synthetic dyes. Coll Cz Chem 25 no.11:2783-2799 N '60. (ERAI 10:6)

1. Organisch-technologisches Laboratorium I, Forschungsinstitut fur organische Synthesen, Pardubice-Rybitvi.

(Azo compounds) (Diazo compounds) (Chromatography) (Dyes and dyeing)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

PANCHATEK, O.

Seventh General Conference of the International Atomic Energy Agency. Jaderna energie 10 no. 2:68-70 F '64.

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

BOYKO, B.T.; PANCHEKHA, P.A.; POLENOVA, V.M.; FUKS, M.Ya.

Comparing the degree of disorientation of separately reflecting regions in thin vacuum condensates and solid specimens of aluminum. Fiz. met. i metalloved. 16 no.4:540-543 O '63. (MIRA 16:12)

1. Khar'kovskiy politekhnicheskiy institut.

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

L 00739-67 EWT(1)/EWT(m)/EWP(t)/ETI IJP(c) JD/AT/JH

ACC NR: AP6018942 SOURCE CODE: UR/0126/66/021/006/0848/0853

AUTHOR: Palatnik, L. S.; Fuks, M. Ya.; Boyko, B. T.; Pancheskha, P. A.

ORG: Kharkov Polytechnic Institute im. V. I. Lenin (Khar'kovskiy politekhnicheskiy institut)

TITLE: Electron diffraction study of the block structure of aluminum condensates

SOURCE: Fizika metallov i metallovedeniye, v. 21, no. 6, 1966, 848-853

TOPIC TAGS: aluminum, metal film, electron diffraction analysis

ABSTRACT: In an earlier paper, the authors described the electron diffraction microbeam method for determining the size and disorientation of block crystallites in aluminum vacuum condensates 60-200 Å thick after annealing at 300° and above. In the present work, this technique was developed by increasing the resolution of the various reflections, so that the point diffraction lines on the electron diffraction patterns were obtained with films in the initial (unannealed) state. This made it possible to study the substructure of the films without altering it by the subsequent action of heat. The average length of the blocks in unannealed Al films condensed on an unheated substrate changes from 220 to 320 Å as the film thickness changes from 150 to 750 Å. The lower limit of the disorientation angles is 1.5-2°. Films 150 Å thick have a monoblock structure in their thickness. At 400 Å and higher, the monoblock character is impaired; it is probably a structural factor which determines the effect of the thick-

Card 1/2 UDC: 548.4

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

L 00739-67

ACC NR: AP6018942

ness on certain structurally sensitive properties. The presence of a sufficiently large number of blocks in the thickness of the film makes the latter similar to massive bodies. The density of the stream of condensing atoms is one of the parameters determining the form of the blocks, i. e., their size in the plane of the film and along the normal to it. Physical properties sensitive to the substructure may be different in the plane of the film and along the normal. Orig. art. has: 1 figure, 1 table, and 5 formulas.

SUB CODE: 11/ SUBM DATE: 15Jun65/ ORIG REF: 006/ OTH REF: 004

Card 2/2

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

L 09010-67 EWT(m)/EWP(t)/ETI IJP(c) JD/JH

ACC NR: AP6027788 (A) SOURCE CODE: UR/0126/66/022/001/0073/0077

AUTHOR: Palatnik, L. S.; Fuks, M. Ya.; Boyko, B. T.; Panchekha, P. A.

ORG: Khar'kov Polytechnic Institute im. V. I. Lenin (Khar'kovskiy politekhnicheskiy institut)

TITLE: X-ray diffractometric investigation of the substructure of thin aluminum condensates

SOURCE: Fizika metallov i metallovedeniye, v. 22, no. 1, 1966, 73-77

TOPIC TAGS: diffractometer, x ray diffraction analysis, aluminum, metal vapor deposition / / URS-50IM diffractometer

ABSTRACT: This work is a continuation of a previous investigation (Palatnik, L. S., et al. FMM, 1966, 21, 848), with the difference that it employs the x-ray diffractometric method to verify the possibility of differences between certain structurally sensitive physical properties in the plane of the thin film and along the normal with respect to this plane, which is assumed to be conditioned by different mechanisms of formation of regions of coherent scattering as a function of the condensation rate. To this end, 99.999 % pure Al was vacuum--evaporated on two unheated glass substrates coated with NaCl and located at different distances

Card 1/2 UDC: 620.183.48

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"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

L 09010-67

ACC NR: AP6027788

from the evaporator. The mean condensation rate on one substrate was 7 Å· sec^{-1} and on the other substrate, 23 Å· sec^{-1}. The film obtained on the substrate closer to the evaporator was 1600 Å thick, while the film obtained on the more distant substrate was 500 Å thick. Packets of these films were then investigated with the aid of an URS-50IM diffractometer. Findings: for the thicker films (1600 Å), due to the higher condensation rate as compared with the thinner films (500 Å), the mean volume of regions of coherent scattering (r.c.s.) is greater, with the size of these regions increasing both the plane of the film and at right angles thereto. Even so, however, the increase in film thickness becomes greater than the increase in the size of the r.c.s. in the direction normal to the film plane so that, after passing through some critical thickness, the formerly monocrystalline film now becomes polycrystalline in thickness. Orig. art. has: 1 figure, 2 tables.

SUB CODE: 20, 11, 13/ SUBM DATE: 16Jul65/ ORIG REF: 006/ OTH REF: 002

Card 2/2 nst

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

PANCHEKHIN, R. (g.Zhdanov)

Great love. Okhr. truda i sots. strakh. 3 no.5:42-45 My '60.
(MIRA 13:12)

(Zhdanov--Industrial hygiene)
(Zhdanov--Industrial relations)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

KIMEL', L.R.; PANCHENKI, A.M.; POLYAKOV, V.I.; TERENT'YEV, V.P.

Experimental study of the distribution function of monodirectional point sources of γ-quanta with initial energies of 0.661 and 1.25 Mev. in concrete, aluminum, iron, and lead. Vop. doz. i zashch. ot izluch. no.2:28-39 '63. (MIRA 17:3)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

PANCHENKO
25688

Bor'ba S Poteryami Pri Khranenii Vina V Otkrytykh Chanakh. [illegible]
Vinogradarstvo SSSR, 1948, No. 6, s. 46

SO: LETOPIS NO. 30, 1948

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

2568 PANCHENKO

Bor'ba s poteryami pri khranenii vina v otkry'ykh chanakh.
Vinodelie i Vinogradarstvo S[illegible], 1947, No. 6, s. 46.

SO: Letopis' Zhurnal'nykh Statey, No. 30, Moskva, 1948

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

ZONNENBERG, M., inzh.; PANCHENKO, A., inzh.

Shaft kiln for burning lime. Sil'.bud. 7 no.7:12-13 Jl '57. (MIRA 12:11)

(Kilns) (Lime)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

PANCHENKO, A.

Stopping gear in the hoist cage. Mast. ugl. 7 no.3:21 Mr '58. (MIRA 11:3)

1.Glavnyy mekhanik shakhty No. 204 tresta Kopeyskugol', kombinata Chelyabinskugol'.
(Mine hoisting) (Mine railroads--Cars)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

PANCHENKO, A. (Kirovskaya oblast')

In a lumbering enterprise. NTO no.11:48-49 N '59.
(MIRA 13:4)

(Kirov Province--Lumbering)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

PANCHENKO, A.

The value of 1 ¼ and a minute. Grazhd.av. 17 no.7:3 Jl '60. (MIRA 13:8)

(Airplanes--Maintenance and repair)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

VLASENKO, N.K.; PANCHENKO, A.A.

In reference to A.E.Lyskii's article "Causes of priming of boiler water in the Shpanov Sugar Factory." Sakh.prom.31 no.9:51-52 S '57. (MIRA 10:12)

1. Ukrgiprosakhar.

(Feed water)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

IVANENKO, A.P., inzh.; PANCHENKO, A.A., inzh. (Brest)

Freight cars used for hauling grain. Zhel. dor. transp. 40 no.8:88 Ag '58. (MIRA 11:9)
(Railroads--Freight cars) (Grain--Transportation)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

PANCHENKO, A.A., elektromekhanik

Dispatcher communication with ticket offices. Avtom., telem. i sviaz' 7 no.8:40 Ag '63. (MIRA 16:9)

1. Orenburgskaya distantsiya signalizatsii i svyazi Kuybyshevskoy dorogi.

(Railroads—Communication systems)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

[illegible], [illegible], SAFOGOV, N.V., TROFIMOVA, I. I.

[illegible]ption of metal ions by carboxyl base exchanging compounds [illegible] the form of hydrogen. Izv. vys. uchab. zav.; tsvet. met. 8 no.5 43-48 '65. (MIRA 18:1[illegible])

1. Ural'skiy politekhnicheskiy institut.

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

NURYLYBAYEV, A.N.; PANCHENKO, A.G.; PATRIKEYEV, S.B.

Sodalite-nepheline syenites in the Kubasadyr massif within the Dzharkainagach natural boundary (central Kazakhstan). Izv. AN Kazakh. SSR. Ser. geol. no.1:28-35 '61. (MIRA 14:[illegible])
(Akmolinsk Province--Syenite)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

PONOMAREV, V.D.; MONICH, V.K.; NURLYBAYEV, A.N.; NI, L.P.; SOLENKO, T.V.; PANCHENKO, A.G.

Nepheline rocks of the Virgin Territory as a comprehensive raw material for the production of aluminum oxide, soda products and cement. Vest. AN Kazakh. SSR 18 no.4:23-31 Ap '62. (MIRA 16:11)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

D[redacted]OTOV, A.A., inzh.; PANCHENKO, A.G., inzh.; SAVEL'YEV, D.N., inzh.; [redacted]ENKO, Ye.A., inzh.; BRYUNETKIN, M.G., inzh.; KRAVTSOV, N.F., inzh.; TIMOFEYEVA, R.G., inzh.

Improving the performance of open-hearth furnaces. Stal' 23 no.4: 304-308 Ap '63. (MIRA 16:4)

(Open-hearth furnaces)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

L 00376-66 EWT(d)/EEC(k)-2/EWP(v)/EWP(k)/EWP(h)/EED-2/EWP(1) IJP(c) BB/GG/GS

ACCESSION NR: AT5013562 UR/0000/64/000/000/0148/0160

AUTHOR: Panchenko, A.G.44

TITLE: A method of input information processing for digital programming devices

SOURCE: AN SSSR. Institut elektromekhaniki. Avtomatika, telemekhanika i priborostroyeniye (Automatic control, remote control, and instrument manufacture). Moscow, Izd-vo Nauka, 1964, 148-160

TOPIC TAGS: information processing, metal cutting machine tool, computer input unit, digital computer, computer programming, computer component

ABSTRACT: Among the most difficult tasks of programmed control of metal-cutting machine tools is the preparation of information for the interpolators. Considerable calculations are required to determine all the reference points of the mill center from which the interpolator establishes the continuous trajectory of the cutter (equidistant). The author investigates the tabular method because the processing of information by that method is particularly time consuming. To reduce the volume of input information concerning the path, maintain the possible control of intermediate and final computations, and eliminate the errors in initial data on reference points, he proposes an n-th order parametrically-

Card 1/2

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"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

L 00376-66

ACCESSION NR: AT5013562

specified interpolation formula using the even and odd differences at n + 2 lattice points. The formula can be used for the preparation of the initial data for the linear as well as parabolic interpolators. The present paper discusses the case concerning the preparation of the initial data for a linear oscillator. The formulas proposed are simple, permit a convenient estimate of the errors during the establishment of the particular polynomial, allow the determination of the errors in initial data and the removal of the "irremovable" error, and contain a convenient curve-smoothness criterion at the point of contact between two polynominals. Orig. art. has: 44 formulas and 6 tables.

ASSOCIATION: none

SUBMITTED: 24Oct64 ENCL: 00 SUB CODE: DP, IE

NO REF SOV: 002 OTHER: 000

Card 2/2

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

L 42198-66

ACC NR: AT6008920 SOURCE CODE: UR/0000/65/000/000/0038/0046

AUTHOR: Panchenko, A. G.

ORG: none

TITLE: Algorithm for preparing input information for nonlinear interpolator

SOURCE: AN SSSR. Institut elektromekhaniki. Avtomaticheskiye i teleinformatsionnyye sistemy (Automatic and teleinformation systems). Moscow, Izd-vo Nauka, 1965, 38-46

TOPIC TAGS: information processing, interpolation, automatic control, algorithm, metal machining

ABSTRACT: In the preparation of programs for machining metal surfaces or contours, Lagrange polynomials, least-square method, iteration method, etc., have been used. All these methods require much labor and have proven to be costly; in addition, they have serious drawbacks, such as a large-storage computer required, complicated process of error evaluation, etc. This new algorithm is proposed for a 4th degree interpolator:

Card 1/3

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"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

L 42190-66

ACC NR: AT6008920

$$F(t) = y_0 + \frac{t}{2}(\Delta y_0 + \Delta y_{-0.5}) + \frac{1}{2 \cdot 2!}[t\Delta^2 y_{-1} + (t-1)\Delta^2 y_{-0.5}] +$$
$$\ldots + \frac{t}{2(n)!}(t^2 - 1^2) \ldots \left[t^2 - \left(\frac{n}{2} - 1\right)^2\right]\left[t\Delta^n y_{-\frac{n}{2}} +\right.$$
$$\left. + \left(t - \frac{n}{2}\right)\Delta^n y_{-0.5(n-1)}\right] + \frac{t}{2(n+1)!}(t^2 - 1^2) \ldots \left[t^2 - \left(\frac{n}{2} - 1\right)^2\right] \times$$
$$\times \left(t - \frac{n}{2}\right)\left[\left(t + \frac{n}{2}\right)\Delta^{n+1} y_{-\frac{n-1}{2}} + (t - 0.5)\Delta^{n+1} y_{-\frac{n}{2}}\right] \ldots$$

or, for n=4

$$F(t) = A_0 + A_1 t + A_2 t^2 + A_3 t^3 + A_4 t^4, \qquad (1)$$

where $t = \frac{x - x_0}{h}$, $t \in (-2, +3)$, h is the argument step,

$$\left.\begin{aligned}
A_0 &= y_0, \\
A_1 &= \frac{1}{2}\left(\Delta y_0 + \Delta y_{-0.5} - \frac{1}{2}\Delta^2_{-0.5} - \frac{1}{6}\Delta^3 y_{-1.5} + \frac{1}{12}\Delta^3 y_{-1} + \right. \\
&\qquad \left. + \frac{1}{12}\Delta^4 y_{-1.5}\right), \\
A_2 &= \frac{1}{4}\left(\Delta^2 y_{-0.5} + \Delta^2 y_{-1} - \frac{1}{2}\Delta^3 y_{-1} - \frac{1}{12}\Delta^4 y_{-1.5} - \frac{1}{12}\Delta^4 y_{-2}\right), \\
A_3 &= \frac{1}{12}\left(\Delta^3 y_{-1} + \Delta^3 y_{-1.5} - \frac{1}{2}\Delta^4 y_{-1.5}\right), \\
A_4 &= \frac{1}{48}(\Delta^4 y_{-1.5} + \Delta^4 y_{-2}).
\end{aligned}\right\} \qquad (2)$$

Card 2/3

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"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

L 42190-66

ACC NR: AT6008920

Formulas for ordinary and central differences and for errors are given. These advantages of the new algorithm are claimed: (1) Simplicity and convenience of setting up the interpolation polynomial; (2) Practical evaluation of the error involved; (3) Possibility of checking intermediate and final results; (4) Determination of error of the final result; (5) Practically acceptable criterion of the curve smoothness at the point of joining of two polynomials; (6) Small storage in the digital computer; (7) No undulation between reference points; (8) Minimum input information. Orig. art. has: 26 formulas and 1 table.

SUB CODE: 13, 12 / SUBM DATE: 14Jul65 / ORIG REF: 004

Card 3/3

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

NURIYBAYEV, A.N.; MONICH, V.K. [deceased]; PANCHENKO, A.G.

New data on the geology of the Kubasadyr Massif of alkali rocks. Izv. AN Kazakh. SSR. Ser. geol. 22 no.1:57-61 Ja-F '65.

MIRA 18:6

1. Institut geologicheskikh nauk im. K.I. Satpayeva, g. Alma-Ata.

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

PANCHENKO, A.G. (Leningrad)

Programming algorithm for machining a three-dimensional part on a program controlled machine tool. Mashinovedenie no.5:59-69 '65. (MIRA 18:9)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

AKOL'ZIN, L.Ye.; BEDILO, V.Ye.; BOROZDOV, I.A.; LISHBERGOV, V.D.; TSOY, D.; DUGIN, Ye.V., otv.red.; DUKALOV, M.F., red.; BUBYR', V.A., red.; TYUTYUNIK, Ya.I., red.; MOHIN, M.I., red.; PANCHENKO, A.I., red.; BELYAYEV, F.R., red.; RABINKOVA, L.K., red.izd-va; KOROVENKOVA, Z.A., tekhn.red.

[Standard cross sections of mine workings] Tipovye secheniia gornykh vyrabotok. Moskva, Gos.nauchno-tekhn.izd-vo lit-ry po gornomu delu. Vol.3. [Cross section of workings lined with concrete and artificial stone for 2 and 3-ton cars] Secheniia vyrabotok, zakreplennykh betonom i iskusstvennym kamnem, dlia 2- i 3-tonnykh vagonetok. 1960. 447 p. (MIRA 13:11)

1. Moscow. Gosudarstvennyy proyektnyy institut Yuzhgiproshakht.
(Mining engineering)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

AKOL'ZIN, L.Ye.; LISHBERGOV, V.D.; SHCHUKINA, G.F.; TSOY, D.; DUGIN, Ye.V., otv.red.; DUKALOV, M.F., red.; BUBYR', V.A., red.; TYUTYUNIK, Ya.I., red.; MONIN, M.I., red.; PANCHENKO, A.I., red.; VARSHAVSKIY, I.N., red.; BELYAYEV, F.R., red.; RABINKOVA, L.K., red.izd-va; KOROVENKOVA, Z.A., tekhn.red.

[Standard cross sections of mine workings]Tipovye secheniia gornykh vyrabotok. Moskva, Gos.nauchno-tekhn.izd-vo lit-ry po gornomu delu. Vol.1. [Cross section of timber-supported workings for 1, 2, and 3-ton cars] Secheniia vyrabotok, zakreplennykh derevom dlia 1, 2 i 3-tonnykh vagonetok. 1960. 345 p. (MIRA 13:11)

1. Moscow. Gosudarstvennyy proyektnyy institut Yuzhgiproshakht. (Mining engineering)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

BEDILO, V.Ye.; BOROZDOV, I.A.; YERSHOV, V.S.; MOGILKO, A.P.; NIKOLAYEV, G.P.; DUGIN, Ye.V., otv.red.; DUKALOV, M.F., red.; BUBYR', V.A., red.; VARSHAVSKIY, I.N., red.; TYUTYUNIK, Ya.I., red.; MOSIN, M.I., red.; PANCHENKO, A.I., red.; BELYAYEV, F.R., red.; RABINKOVA, L.K., red.izd-va; BOLDYREVA, Z.A., tekhn.red.

[Standard cross sections of mine workings] Tipovye secheniia gornykh vyrabotok. Moskva, Gos.nauchno-tekhn.izd-vo lit-ry po gornomu delu. Vol.2. [Cross section of workings lined with concrete and artificial stone, for 1-ton cars] Secheniia vyrabotok, zakreplennykh betonom i iskusstvennym kamnem, dlia 1-tonnykh vagonetok. 1960. 459 p. (MIRA 13:11)

1. Moscow. Gosudarstvennyy proyektnyy institut Yuzhgiproshakht. (Mining engineering)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

ISMAILOV, I.M., inzh.; GAVRILENKO, I.V., kand.tekhn.nauk; Prinimali uchastiye: KUTYAVIN, S.M.; ORESHKIN, D.K.; TADZHIBAYEV, G.T.; AKHUNDZHANOV, A.I.; TONKIKH, P.I.; PANCHENKO, A.I.; FEL'DSHER, M.G.; VORONINA, M.D.

Lowering the solvent content in seed meal before treatment in evaporators. Mas.l.-zhir.prom. 26 no.10:7-13 O '60. (MIRA 13:10)

1. Vsesoyuznyy nauchno-issledovatel'skiy institut zhirov (for Ismailov, Gavrilenko). 2. Uch-Kurganskiy masloekstraksionyy zavod (for Kutyavin, Oreshkin, Tadzhibayev). 3. Sredneaziatskiy filial Vsesoyuznogo nauchno-issledovatel'skogo instituta zhirov (for Panchenko, Fel'dsher, Voronina).
(Uch-Kurgan--Oil industries--Equipment and supplies)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

AKOL'ZIN, L.Ye.; BOROZDOV, I.A.; BEDILO, V.Ye.; TERESHKIN, F.N. Prinimali uchastiye: BELYAYEV, F.H.; BEREZHNOY, N.V.; BUBYR', V.A.; VARSHAVSKIY, I.N.; DUDKO, V.P.; YERSHOV, V.S.; DUGIN, Ye.V.; DUKALOV, M.F.; IVANOV, P.S.; KONAREVA, V.F.; MONIN, M.I.; MOGILKO, A.P.; ~~RANCHENKO~~, A.I.; POKALYUKOV, S.N.; PRIKHOD'KO, N.D.; RUBIN, I.A.; SIDORENKO, P.A.; TYUTYUNIK, Ya.I.; KHMEL'NITSKIY, L.Ya.; BONDAR', V.I.; KRIVTSOV, A.T.; LOKSHIN, V.D.; SOF'YENKO, N.P. RABINKOVA, L.K., red.izd-va; BOLDYREVA, Z.A., tekhn.red.

[Types of mine cross section] Tipovye secheniia gornykh vyrabotok. Moskva, Gos.nauchno-tekhn.izd-vo lit-ry po gornomu delu. Vol.4. [Cross section of mines supported by a sectional reinforced-concrete lining of URP-11 panels for 1-, 2- and 3-ton railroad cars] Secheniia vyrabotok, zakreplennykh sbornoi zhelezobetonnoi krep'iu iz plit URP-II, dlia 1-, 2- i 3-tonnykh vagonetok. 1960. 278 p. (MIRA 13:12)

1. Khar'kov. Gosudarstvennyy proyektnyy institut Yuzhgiprosnakht.
(Mine timbering)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

AKOL'ZIN, L.Ye.; BEDILO, V.Ye.; BOROZDOV, I.A.; VINARSKIY, I.S.; GOLOVATYUK, S.A.; NIKOLAYEV, G.P. Prinimali uchastiye: DATSUN, N.V.; ZHEGOV, V.T.; IVANITSKAYA, S.Yu.; KOMISSAROV, M.A.; KALINCHUK, I.G.; LISHBERGOV, V.D.; SERGEEVNIKOVA, S.O.; FILIN, V.D. DUGIN, Ye.V., otv.red.; DUKALOV, M.F., red.; BUBYR', V.A., red.; TYUTYUNIK, Ya.I., red.; VARSHAVSKIY, I.N., red.; MONIN, M.I., red.; PANCHENKO, A.I., red.; BELYAYEV, F.R., red.; RABINKOVA, L.K., red.izd-va; BOLDYREVA, Z.L., tekhn.red.

[Types of mine cross section] Tipovye secheniia gornykh vyrabotok. Moskva, Gos.nauchno-tekhn.izd-vo lit-ry po gornomu delu. Vol.5. [Cross section of mines with reinforced-concrete supports and hinge-hung crossbars for 1-, 2- and 3-ton railroad cars] Secheniia vyrabotok, zakreplennykh zhelezobetonnymi stoikami s sharnirno-podvesnym vekhniakom, dlia 1-, 2- i 3-tonnykh vagonetok. 1960. 411 p. (MIRA 13:12)

1. Khar'kov. Gosudarstvennyy proyektnyy institut Yuzhgiproshakht. (Mine timbering)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

PANCHENKO, A.M., inzh.

Hand saws with teeth of new shape. Ugol' 33 no.11: N '58. (MIRA 11:11)

1. Shakhta No.6 kombinata Vorkutugol'.
(Coal mines and mining--Equipment and supplies) (Saws)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

PANCHENKO, A.M., inzh.

Planning and expense accounting in operating a mine on a business basis. Izv. vys. ucheb. zav.; gor. zhur. no.9:61-66 '60. (MIRA 13:9)

1. Khar'kovskiy inzhenerno-ekonomicheskiy institut. Rekomend. kafedroy bukhgalterskogo ucheta i statistiki.
(Mining engineering--Accounting)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

PANCHENKO, A.M.; FEDOROV, G.B.

"Atoms for peace" pavillion at the Industrial Exhibition of the U.S.S.R. in Iraq. Atom.energ. 9 no.1:63-64 Jl '60. (MIRA 13:7)

(Atomic energy—Exhibitions)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

PANCHENKO, A.M.

Improvement in planning and accounting for industrial expenditures in coal mining. Ugol' 35 no.11:59 N '60. (MIRA 13:12)

1. Khar'kovskiy ekonomicheskiy institut.
(Coal mines and mining—Accounting)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

S/796/62/000/003/007/019

AUTHORS: Kimel', L.R., Mashkovich, V.P., Panchenko, A.M.

TITLE: Shielding against the radiation of electron accelerators with a maximum energy of the accelerated electrons of 30 mev.

SOURCE: Moscow. Inzhenerno-fizicheskiy institut. Pribory i metody analiza izlucheniy. no.3. 1962, 71-78.

TEXT: The paper expounds a simplified method and initial data indispensable for the calculation of shielding against bremsstrahlung and photoneutron radiation for accelerators with a maximum accelerated-electron energy of 30 mev. The electron beam is treated as monoenergetic; in nonmonoenergetic beams the energy distribution spectrum of the electrons can be divided into energy intervals, and each interval is then treated as a monoenergetic beam. Shielding calculations require a knowledge of the distribution of the dosage fields of the bremsstrahlung and the photoneutron fluxes around the target, also their spectral distribution. Shielding thicknesses for either type of radiation are first calculated separately, whereupon the shield thicknesses required to afford protection against both radiations are selected. Bremsstrahlen shielding: The bremsstrahlen dosage rate is a function of the target flux, the electron energy, the atomic number, and the target thickness. The linear dependence of the integral intensity of the bremsstrahlen on the target

Card 1/3

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"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

Shielding against the radiation of electron accelerators. S/796/62/000/003/007/019

atomic number, as experimentally obtained and reported by Price-Horton-Spinney (cited in Russian translation), is accepted in preference to the quadratic dependence stipulated by Bethe-Heitler theory. Calculations are made for the radiationally most dangerous case, namely, for a target with maximal atomic number and optimal thickness. The angular distributions of bremsstrahlen dosage rates, under such premise, can be calculated according to Lawson's intensity formula (Nucleonics, v. 10, 1952, 61), since the spectral distribution of bremsstrahlen are independent of the angle (Levin, S., Nucleonics, v.6, 1954, 54). Data for the dosage spectrum are taken from U.S. literature. From the dosage rate thus obtained, the shield thickness for a nonmonochromatic bremsstrahlung is calculated by the competitive-line method (Gusev, N.G. Spravochnik po radioaktivnym izlucheniyam i zashchite - Radioactive radiation and shielding manual. Moscow. Medgiz, 1956). The thicknesses of concrete (density 2.3 g/cm^3) required for various attenuation fractions are tabulated. Gusev's competitive-line method is used up to 6 mev, the experimental data of F.Kirn and R.Kennedy (Nucleonics, v.6, 1954, 44) for higher energies. Thicknesses calculated according to these two references are graphically compared. The calculated points lie some 8% above the experimental points, presumably because the Gusev tables employ infinite geometry. Photoneutron shielding is required only when the maximal bremsstrahlen energy exceeds the threshold value of the (γ,n) reaction which determines the binding energy of the neutron in the nucleus. This occurs at above 6 mev for almost all elements, except for Be (1.67

Card 2/3

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Shielding against the radiation of electron accelerators. S/796/62/000/003/007/019

mev) and D (2.23 mev). The photoneutron flux is a function of the maximal bremsstrahlen energy, the atomic number, and the target geometry. For greatest safety, unless other stipulations are made, a target with high atomic number, e.g., U, which releases the greatest number of photoneutrons, is selected for shielding calculations. Photoneutron outputs per ma of flux versus impinging-electron energy for Cu, Pb, Bi, and U targets are taken from V.I.Gomonay, et al. (Atomnaya energiya, v.7, no.5, 1959, 476); using these outputs, and assuming the angular neutron distribution to be isotropic (Price,G.,et al., Phys.Rev.,v.77, 1950, 806), the neutron intensity at any given distance is calculated as a function of the electron flux on the target. The maximal energy of the photoneutrons is obtained from the difference between the maximal energy of the bremsstrahlung and the binding energy of the neutron in the target-substance nucleus; the photoneutron spectrum is assumed to have a Maxwellian distribution in which the maximum is shifted toward the weaker energies. From the solid-angle and the spectral distributions thus obtained, the required attenuation fraction can be calculated, whence the wall thickness follows. A specific numerical example is illustrated. The frontal wall of the sample shielding is designed for bremsstrahlung, the other three for photoneutron protection. Thanks expressed to O.I.Leypunskiy, N.G.Gusev, and Ye.L.Stolyarova for valuable advice. There are 6 figures, 1 (unnumbered) table, and 15 references (4 Russian-language Soviet and 11 U.S. references, of which 9 are in English, 2 in Russian translation).

ASSOCIATION: None given.

Card 3/3

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

PANCHENKO, A.M., inzh.

Determination of the calculated load maximum and selection of the power of section transformer substations in coal mines. Izv. vys. uch. zav.; gor. zhur. 5 no.6:121-128 '62. (MIRA 15:9)

1. Vorkutinskiy sektor Gosudarstvennogo proyektno-konstruktorskogo i eksperimental'nogo instituta ugol'nogo mashinostroyeniya. Rekomendovana kafedroy gornoy elektrotekhniki Sverdlovskogo gornogo instituta imeni Vakhrusheva.

(Electricity in mining)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

45448
S/892/62/000/001/010/022
B102/B186

21.6000

AUTHOR: Panchenko, A.M.

TITLE: Use of standard dosimeters in γ-ray pulsed fields

SOURCE: Moscow. Inzhenerno-fizicheskiy institut. Voprosy dozimetrii i zashchity ot izlucheniy, no. 1, 1962, 74-77

TEXT: The errors arising when standard gamma dosimeters designed for continuous radiation are used in pulsed fields are investigated for the widely used microroentgenometer "Kaktus". The accumulation efficiency f for the 5-liter ionization chamber mostly used with this instrument is calculated, assuming that (1) the pulse duration is short with respect to the ion accumulation time, (2) the time between the pulses is equal to or greater than the positive-ion drift period, and (3) $E \leqslant 3$ Mev.

$f = \frac{1}{u} \ln(1+u)$ (cf. Brit.J.Radiol.25,274,601,1950) where $u = \alpha n_0 d^2/(k_1+k_2)U$; α is the recombination coefficient; $k_{1,2}$ the (+,-) ion mobilities; d the electrode spacing; U the plate voltage; and n_0 the number of ion

Card 1/2

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"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

KIMEL', L.R.; PANCHENKO, A.M.; TERENT'YEV, V.P.

Calculation of the spectral-angular distribution of scattered gamma quanta from a Cs^{137} monodirectional point source in iron. Atom. energ. 15 no.4:328-331 O '63. (MIRA 16:10)

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

ACCESSION NR: AT4021247 S/2892/63/000/002/0024/0027

AUTHOR: Panchenko, A. M.

TITLE: Boundary effects in measuring the intensity of scattered radiation of a unidirectional point source in water

SOURCE: Voprosy* dozimetrii i zashchity* ot izlucheniy, no. 2, 1963, 24-27

TOPIC TAGS: Monte-Carlo method, energy scattering, γ radiation, water medium, point source, unidirectional source

ABSTRACT: The author investigates the field of scattered γ radiation of a unidirectional point source in a semi-infinite water medium. The amount of scattered energy at the boundary at a distance of 3 lengths of the free course along the radius from the beam is decreased to 40% in comparison with infinite geometry. The experiments were conducted in water with a unidirectional point source having an initial energy of 0.661 MeV. A detector (a counter SBM-19 with a filter) (reference Panchenko, A. M. Atomnaya energiya, 14, Vy*p. 4, 408 (1963)) was placed in the tank at fixed distances along the beam. The measurements usually began at a water layer thickness above the detector equal to 1-2 cm. The influence of the boundary decreases as the distance from the beam increases. Relatively larger

Card 1/2

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ACCESSION NR: AT4021247

error is observed with measurements in the medium lying to the left of the entrance of the beam into the water, but this takes place only at very close distances to the boundary. Orig. art. has: 3 figures.

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

SUBMITTED: 00 DATE ACQ: 06Apr64 ENCL: 00

SUB CODE: PH, NS NO REF SOV: 001 OTHER: 001

Card 2/2

APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7"

"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

ACCESSION NR: AT4021246 S/2892/63/000/002/0006/0023

AUTHOR: Kimel', L. R., Panchenko, A. M., Terent'yev, V. P.

TITLE: Calculation of the spectral angular distribution of scattered radiation of a point unidirectional cesium 137 source in iron by means of the Monte-Carlo method

SOURCE: Voprosy* dozimetrii i zashchity* ot izlucheniy, no. 2, 1963, 6-23

TOPIC TAGS: Monte-Carlo method, computers, Strela-3, energy scattering, spectral distribution, angular distribution, point source, unidirectional source, γ quantum, Compton effect, photoeffect, energy albedo, iron

ABSTRACT: In the article by Berger, M. J., Spenser, L. V. (radiation RES., vol. 10, no. 5, page 552 (1959)) the problem on the distribution of scattered energy of a unidirectional point source with an initial γ quantum energy of 1.28 MeV in a semi-infinite water medium was solved by a combination of the analytic method and the Monte-Carlo method. The authors have undertaken the task of presenting the spectral angular distribution of this type of source. The calculations of this article are based on the Monte-Carlo method and were done on the electronic computer Strela-3 of VTsAN SSSR. The results were obtained on the analysis of 5420 γ quantum histories. The unidirectional point source with an initial γ quanta energy of

Card 1/3

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"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

ACCESSION NR: AT4021246

E_0 = 0.661 MeV is located in an infinite iron medium with a density of ρ = 7.89 g/cm^3. The sequence of the calculation is as follows: 1) the track of the γ quanta is found; 2) the type of interaction is determined; 3) the angle of the quantum scattering in the Compton process is set; 4) the quantum energy after scattering is determined; and 5) the azimuthal angle of scattering is found, disregarding the polarization of the γ quanta. The spectral angular distribution and function of the attenuation of the scattered radiation is obtained. Some data, known from literature, is also calculated for the purpose of verifying the method. These are correlated in different graphs. The energy albedo is determined as a relationship of the amount of energy reflected from the semi-infinite medium to the energy falling on this medium for an identical length of time. The angular distribution of scattered energy for the central areas is constructed from the graphs. A shift of the spectra in a low energy region is noted with the increase of the angle. Radial distribution of the scattered energy corresponding with experimental data done by Gol'dshteyn (Osnovy* zashchity* reaktorov. M., Gosatomizdat, 1961) are obtained. The numerical and energy albedo and the attenuation of the primary beam are also calculated. The authors express their thanks to O. I. Leypunskiy for his constant attention to the article and to V. N. Seleznev for aid given in the programming of the problem. Orig. art. has: 16 formulas, 12 figures, and 2 tables.

Card 2/3

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"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

S/089/63/014/004/013/019
A066/A126

AUTHOR: Panchenko, A.M.

TITLE: Some dosimetric characteristics of the small counter CBM-10 (SBM-10)

PERIODICAL: Atomnaya energiya, v. 14, no. 4, 1963, 408 - 409

TEXT: The small shielded halogen β-counter SBM-10 (Fig. 1), recently developed by the industry, was tested for its applicability as a gamma detector. The operating voltage is 400 v, the counting plateau is not less than 100 v, the natural background does not exceed 8 pulses/min, and the thickness of the steel cathode is 40 mg/cm^2. The sensitivity of the counter within the range 0.1 - 1.25 Mev was found to be $8.2 \cdot 10^{-3}$ pulses · cm^2/Mev with an error of ± 11%. The experiments were carried out with Hg^{203} (0.28 Mev), Cr^{51} (0.33 Mev), Cs^{137} (0.661 Mev), Cs^{134} (0.72 Mev), Zn^{65} (1.12 Mev), and Co^{60} (1.25 Mev) sources, and also with filtered x-rays. The counter proved sufficiently isotropic within the energy range under consideration and can be used for measuring the intensity of

Card 1/2

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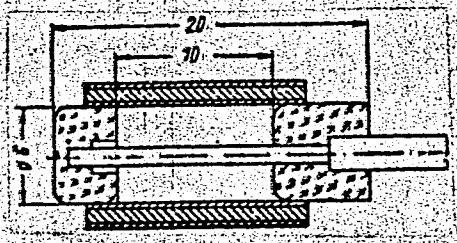
Some dosimetric characteristics of the S/089/63/014/004/013/019
A066/A126

γ-radiations with complex spectral angular distribution. There are 3 figures.

SUBMITTED: July 11, 1962

Figure 1: Schematic diagram of SBM-10 shielded counter.



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L 9874-63 EWT(1)/EPF(n)-2/BDS AFFTC/ASD/AFWL/SSD Pu-4 IJP(C)
ACCESSION NR: AP3002266 S/0089/63/014/006/0577/0579 65 63

AUTHOR: Leypunskiy, O. I.; Kimel', L. P.; Panchenko, A. M.

TITLE: Gamma-radiation field of collimated point sources Cs sup 137 and Co sup 60 in iron 19

SOURCE: Atomnaya energiya, v. 14, no. 6, 1963, 577-579

TOPIC TAGS: gamma radiation, point radiation sources, Cs sup 137, Co sup 60, iron, plane radiation sources, energy buildup factors

ABSTRACT: Measurements have been made of the spatial distribution of scattered gamma quanta in an iron block measuring 16 x 18 x 25 cm from highly collimated point sources Cs sup 137 and Co sup 60 with activities from 1 to 0.55 curie. The geometry of the experimental setup is shown in Fig. 1 of the Enclosures. The block consisted of separate sheets of iron. An SBM-10 gas-discharge counter, with a special screen to reduce energy dependence and provide practically isotropic sensitivity of the counter, served as the detector. The measurements were made at points with h and r coordinates, where h = beam distance from the entrance to the middle, and r = radial distance in the plane

Card 1/2

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ACCESSION NR: AP3002266

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perpendicular to the beam. For Cs sup 137 the measurements were made at five fixed points: 1.19, 2.56, 3.92, 5.28, and 6.65 (where the numbers represent multiples of the mean free path). For Co sup 60, the values used were 1, 4, and 5. The results are shown in Figs. 1 and 2. A formula (see Formula 1 of the Enclosures) has been derived from data for the Cs sup 137 source for calculating the buildup factor B sub E for a plane collimated source. Within the limits of experimental error, the calculated values of the buildup factor for a plane collimated source in iron at the energies of primary gamma quanta of 0.661 Mev were found to be in good agreement with the experimental data of H. Goldstein and S. Wilkins (US AES Report NYO-3075 (1954)). Similar experiments have been conducted for concrete, aluminum, and lead. "In conclusion, the authors express their appreciation to V. I. Ivanov and V. P. Mashkovich for valuable advice expressed during the review of the work." Orig. art. has: 3 figures and 1 formula.

ASSOCIATION: none
SUBMITTED: 29Sep62 DATE ACQ: 12Jul63 ENCL: 03
SUB CODE: 00 NO REF SOV: 004 OTHER: 005

Card 2/3

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"APPROVED FOR RELEASE: 06/15/2000 CIA-RDP86-00513R001238920018-7

L 24405-65 EWT(m)/EPR/EWP(t)/EWP(b) Ps-4 IJP(c) JD

ACCESSION NR: AT5003278 S/2892/64/000/003/0020/0024

AUTHOR: Panchenko, A. M.

TITLE: Distribution function of a point unidirectional source with 2.76 Mev initial gamma quanta energy in aluminum, iron, and lead

SOURCE: Moscow. Inzhenerno-fizicheskiy institut. Voprosy dozimetrii i zashchity ot izlucheniy, no. 3, 1964, 20-24

TOPIC TAGS: gamma radiation, point source, radiation distribution function, radiation shielding, aluminum shielding, iron shielding, lead shielding

ABSTRACT: This paper is a continuation of previously published experiments (L. R. Kimel' et al. Voprosy dozimetrii i zashchity ot izlucheniy: V. I. Ivanov, Editor, no. 1, M., Gosatomizdat, 1963). The equipment, geometry, and procedures were the same as those given in the above reference. Here, in the form of graphs, the author presents the distribution functions of a point unidirectional source with 2.76 Mev initial γ-quanta energy in Al, Fe, and Pb, and a table of energy accumulation factors for a plane unidirectional source whose values agree quite well with those given by G. Gol'dshteyn (Osnovy zashchity reaktorov. M, Gosatomizdat,

Card 1/2

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1961). "The author thanks V. I. Polyakov and V. P. Terent'yev for their help in carrying out the experiment." Orig. art. has: 1 formula, 3 figures, and 1 table.

ASSOCIATION: None

SUBMITTED: 00 ENCL: 00 SUB CODE: NP

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AUTHOR: Panchenko, A. M.

TITLE: A study of the radiation field from point unidirectional sources. (Brief survey)

SOURCE: Moscow. Inzhenerno-fizicheskiy institut. Voprosy dozimetrii i zashchity ot izlucheniy, no. 3, 1964, 45-54

TOPIC TAGS: radiation field, spatial radiation distribution, point source, unidirectional source, gamma ray scattering, fast neutron scattering, air, water, paraffin, reactor shielding 19

ABSTRACT: After comparing the results published in 22 Soviet and Western references, the author concludes that: 1) the experimental and theoretical data on the distribution of γ-rays from collimated sources refer basically to water and air. The only exceptions are the papers by W. P. Stinson (Nucleonics, 12, 9, 50, 1954), who presents the topography of reactor γ-ray intensities scattered in paraffin, and D. P. Osanov (Pribory i metody analiza izlucheniy. M, Gosatomizdat, no. III, 1962, p. 53), who gives theoretical calculations of doses behind iron barriers in

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