

1. BERG, L. S.; GRIGOREV, A. A.; STEPANOV, N. N. (Prcf.)
2. USSR (600)
4. Geology and Geography
7. Discription of the Land of Kamachatke, By S. P. Krasheninnikov. Academicians L. S. Berg and A. A. Grigorev and Prof. N. N. Stepanov (editors). (Institute of Ethnography, Moscow, Leningrad, Press of the Main Administration of the Northern Sea Route, 1949). Reviewed by L. G. Kamanin. Sov. Eniga, No. 9, 1950.

9. FDD Report U-3081, 16 Jan. 1953. Unclassified.

GRIGOR'EV A. A.

GRIGOR'EV A. A.

26265 Znachen'ye D. N. anuchina kak. Geografa i ego vzglyady na geografiyu  
(K 25-letiyu so dnya smerti). Problemy fiz. Geografii, viv, 1949 s 3-9, s portr.  
Bibliogr: s 9.

SO: LETOIS' NO. 35, 1949

GRIGOR'YEV, A.

19831 GRIGOR'YEV, A

Pusskiye otkrytiya v Antarktike. (Ekspeditsiya Bellinsgauzena-Lazareve. 1821 ll.

S primech. red.) Smena, 1949, Noll, s. 10-11, s PORTR.

SO: LETOPIS ZHURNAL STATEY - No., 27, Moskva, 1949

GRIGOR'YEV, A. A.

USSR/Geophysics - Scientists  
Exploration

Sep/Oct 49

"Academician K. I. Satpayev," Acad A. A. Grigor'yev.  
S. N. Ryazantsev, 2 pp

"Iz Ak Nauk SSSR, Ser Geograf i Geofiz" Vol XIII,  
No 5

Satpayev is president of Acad Sci Kazakh SSR.  
From 1926 to 1941, he worked almost exclusively  
in geological exploration of Dzhezkazgan Rayon,  
Kazakh SSR. For his work in revealing the rich  
mineral resources of this rayon, he was awarded the  
Stalin Prize in 1942. He was active in organizing  
industrialization of this rayon. Submitted 25 May 49

3/50745

ISAKOV, I.S., prof., admiral flota, otv.red.; PETROVSKIY, V.A., dotsent, kand.voyenno-morskikh nauk, kontr-admiral, red. [deceased]; DEMIN, L.A., dotsent, kand.geograf.nauk, inzh.-kapitan 1 ranga, glavnyy red.; BARANOV, A.N., red.; BERG, L.S., akademik, inzh.-mayor, red.; BOLOGOV, N.A., dotsent, kontr-admiral v otstavke, red.; VITVER, I.A., professor, doktor geograf.nauk, red.; GRIGOR'YEV, A.A., akademik; YEGOR'YEV, V.Ye., zaslushenny deyatel' nauki, prof., doktor voyenno-morskikh nauk, kontr-admiral v otstavke, red.; ZIMAN, L.Ya., prof., red.; ZUBOV, N.N., prof., doktor geograf. nauk, inzh.-kontr-admiral v otstavke, red.; KAVRAYSKIY, V.V., prof., doktor fiziko-mat.nauk, inzh.-kontr-admiral v otstavke, red.; KALFSNIK, S.V., prof., doktor geograf.nauk, red.; KUDRYAVTSEV, M.K., general-leytenant tekhn.voyak, red.; LAMYKIN, S.M., kapitan 1 ranga, red.; MATUSEVICH, N.N., zaslushenny deyatel' nauki i tekhniki, prof., doktor fiziko-mat.nauk, inzh.-vitse-admiral v otstavke, red., [deceased]; MESHCHANINOV, I.I., akademik, red.; MILENKI, S.G., red.; ORLOV, B.P., prof., doktor geograf.nauk, red.; PANTELEYEV, Yu.A., vitse-admiral, red.; SNEZHINSKIY, V.A., dotsent, kand.voyenno-morskikh nauk, inzh.-kapitan 1 ranga, red.; SALISHCHEV, K.A., prof., doktor tekhn.nauk, red.; TRIBUTS, V.F., admiral, red.; FOKIN, V.A., vitse-admiral, red.; SHVEDE, Ye.Ye., prof., doktor voyenno-morskikh nauk, kontr-admiral, red.; SHULEYKIN, V.V., akademik, inzh.-kapitan 1 ranga, red.; PAVLOV, V.V., inzh.-polkovnik, red.; VOLKOV, F.G.,  
(Continued on next card)

ISAKOV, I.S.---(continued) Card 2.

podpolkovnik, pomoshchnik glavnogo red. po izd-vu; SEDOV, N.Ye., kapitan 2 ranga, uchenyy sekretar'; VOROB'YEV, V.I., kapitan 1 ranga, red.kart; MIGALKIN, G.A., inzh.-kapitan 1 ranga, red.kart; GAPONOVA, A.A., red.kart; GONCHAROVA, A.I., red.kart; GOBACHEVA, N.Ye., red.kart; GHYUNBERG, G.Yu., red.kart; DUROV, A.G., red.kart; YERSHOV, I.B., red.kart; ZIL'BERSHER, A.B., red.kart; KASTAL'SKAYA, N.I., red.kart; KUBLIKOVA, M.M., red.kart; MAKAROVA, V.N., red.kart; MOROZOVA, A.F., red.kart; PAVLOVA, Ye.A., red.kart; POCHUBUT, A.N., red.kart; ROMANOVA, G.N., red.kart; SMIRNOVA, L.V., red.kart; SMIRNOVA, L.N., red.kart; TANANKOVA, A.I., red.kart; YANEVICH, M.A., red.kart; YASINSKAYA, L.F., red.kart; VASIL'YEVA, Z.P., tekhn.red.; VIZIROVA, G.N., tekhn.red.; GOLOVANOVA, A.T., tekhn.red.; GOROKHOV, V.I., tekhn.red.; MALINKO, V.I., tekhn.red.; SVIDERSKAYA, G.V., tekhn.red.; CHERNOGOROVA, L.P., tekhn.red.; FURAYEVA, Ye.M., tekhn.red.

[Marine atlas] Morskoi atlas. Otv.red. I.S. Isakov. Glav.red. L.A. Demin. Izd. Morskogo general'nogo shtaba. Vol.1 [Navigation geography] Navigatsionno-geograficheskii. Zamestitel' otv. red. po I tomu V.A. Petrovskii. 1950. 83 maps. (MIRA 12:1)  
(Continued on next card)

ISAKOV, I.S.---(continued) Card 3.

1. Russia (1923- U.S.S.R.) Voenno-morskoye ministerstvo.
2. Nachal'nik Morskogo kartograficheskogo instituta voyenno-morskikh sil (for Lamykin).
3. Deystvitel'nyy chlen Akademii pedagogicheskikh nauk RSFSR (for Orlov).
4. Nachal'nik Gidrograficheskogo upravleniya voyenno-morskikh sil (for Tributs).
5. General'nyy gosudarstv.direktor topograficheskoy sluzhby (for Baranov).
6. Direktor topograficheskoy sluzhby (for Milenki).  
(Ocean--Maps) (Harbors--Maps)

PROCESSING AND PROPERTIES UNIT

7  
APR 1951

AMS/A+B

2.0-158  
 [Kashketov, A. A. (ed.), *Kashketov; obshchie fiziko-geograficheskie kharakteristiki*.  
 [Kashketov, A. A. (ed.), *general physico-geographical characteristics*.] Moscow, Izdat. Akademii  
 Nauk, 1950. 492 p. 56 figs., 6 tabl. charts, 11 plates, extensive bibliog. p. 462-473.  
 BLC—A substantial volume consisting of six parts, each written by one or more authorities on  
 1) the exploration, 2) physiography, 3) climate, 4) rivers and lakes, 5) vegetation and soils, and  
 6) fauna of this vast area in Central Asia. In addition to the 30 pages on Climate by L. A.  
 Chirpovskiy, (see item 2.0-159) there is much of interest to the climatologist in the section on  
 rivers and lakes (by D. I. Abdalovskiy, V. K. Anso'eva and V. E. Ivanovskiy) and the section  
 on vegetation and soil (by L. V. Anisimov). *Subject headings: Physiography, Climatology,  
 Kashketov, U.S.S.R.—M.A.*


ASD-316 METALLURGICAL LITERATURE CLASSIFICATION



1. GRIGOREV, A. A.
2. USSR (600)
4. Geology and Geography
7. Outline of the Glaciation of the Altai Mountains. By M. V. Tronov. (New Series, Vol. 9, Moscow, Geography Press). Reviewed by A. A. Grigorev. Sov. Kniga, No. 4, 1950.

9. █████ Report U-3081, 16 Jan. 1953. Unclassified.

1. GRIGOREV, A. A.; YANITISKOV, N. F.
2. USSR (600)
4. Geology and Geography
7. Bourgeois Geography in the Service of American Imperialism.  
A. A. Grigorev and N. F. Yanitiskov, editors. (Moscow-Leningrad,  
Press of Acad of Sci USSR, 1951). Reviewed by A. G. Mileykovskiy,  
Sov. Kniga, No. 6, 1951.

9.  Report U-3081, 16 Jan. 1953, Unclassified.

GRIGOR'YEV, A.

Man's precious time. Zhil.-kom. khos. 11 no.11:32-33 N '61.  
(MIRA 16:7)

(Municipal services)

GRIGOR'YEV, A. A.; GERASIMOV, I. P.; DOSKACH, A. G.; KAMANIN, L. G.; KUNIN, V. N.;  
LAVRENKO, Ye. M.; MURZAYEV, E. M.; RIKHTER, G. D.; CHUBUKOV, A. N.; FORMOZOV, A. N.

Problemy Fizicheskoy Geografii (Problems of Physical Geography), Vol. 16, Symposium,  
Moscow, 1951.

U-1483, 25 Sept 51

1. GRIGOR'YEV, A. A. ., ED.
2. USSR (600)
4. Agriculture
7. Central black soil districts. Moskva, Izd. Akad. Nauk SSSR., 1952

9. Monthly List of Russian Accessions, Library of Congress, January 1953. Unclassified.

GRIGOR'YEV, A-A.

USSR •

SS1.388.7-351.385.3

✓6.6-321

Grigor'ev, A. A. *Novye cherty v geografii nashel strany, sozdavayemye velikimi stroikami konunizma.* [New characteristics in the geography of our country established by the great constructions of communism.] *Akademiia Nauk, SSSR, Izvestiia, Ser. Geograficheskaja, No. 7:3-10, 1952.* DLC—This is a review and enumeration of completed works, unfinished and only projected measures undertaken by the Soviet Government since 1924 in land reclamation and climatic amelioration of the forest steppe, steppe and arid zones of the Soviet South and drought control. The author points out the importance of such works as: forest shelter belts, new irrigation and water supply, measures for retention of rain and snow melt waters, reduction of surface discharge, creation of systems of ponds and other water reservoirs, introduction of grass land agriculture, complete afforestation of sandy and waste lands, construction of canals (many already completed), utilization of river resources for hydro-electric power plants, etc. *Subject Headings: 1. Climatic amelioration 2. Steppes 3. Arid zones 4. Shelter belts 5. Irrigation 6. U.S.S.R.—I.M.P.*

2

DC  
BR

GRIGOR'YEV, A. A.

"Problem of Interchange of Matter and Energy in the Lithosphere, Hydrosphere,  
and Atmosphere, and Its Significance in the General Theory of Physical Geography,"  
Iz. AN SSSR, Ser.Geog.,No.4, 1952

1. GRIGOR'YEV, A. A., Acad.
2. SSSR (600)
4. Geography
7. Important tasks of the geographers.  
Priroda 41 No. 11, 1952 pp. 68-69

Geographers are supposed to help planning organizations in proper location of industrial plants. Special attention will be paid to study of northern forested regions of the Urals, West Siberia, and Karelo-Finnish SSR seeking to work out solutions to problems of forest management. Geographical studies will be helpful in establishing new means of transportation on land and on waterways. Activities of geographical institutes should be increased. New popular geographical literature with praise of Stalin's plan for transformation of nature should be created.

259T27

9. Monthly List of Russian Accessions, Library of Congress, February 1953. Unclassified.



**GRIGOR'YEV, A.A., akademik.**

**Geographical conditions of improving agricultural utilisation of soils of the non-chernozem belt of the European part of the U.S.S.R. Isv. AN SSSR Ser. geog. no. 3:3-10 My-Je '53. (MIRA 6:9) (Land)**

Describes agrotechnical and land-improvement measures directed toward progressive increase in the productivity of the agricultural and forest economy in the non-chernozem (forest) belt of European USSR. 285T57

ORIGOR'YEV, A.A., akademik.

Importance of V.V.Dokuchaev's scientific theories in the development of  
physical geography. *Izv.AN SSSR Ser.geog.* no.6:5-16 N-D '53. (MLRA 6:12)  
(Dokuchaev, Vasilii Vasil'evich, 1846-1903)

GRIGOR'YEV, A.A., akademik.

Selection of new academicians and corresponding members for the Department  
of Geological and Geographical Sciences of the Academy of Sciences of the  
U.S.S.R. *Izv. AN SSSR Ser.geog. no.6:69-71 N-D '53.* (MLBA 6:12)  
(Academy of Sciences of the U.S.S.R.)

GRIGOR'YEV, A.A., akademik.

Great contribution to the theory of the unity of nature; on the 50th anniversary of the death of V.V.Dokuchaev. Priroda 42 no.12:27-33 D '53.  
(MISA 6:11)

(Dokuchaev, Vasilii Vasil'evich, 1846-1903) (Soils)

GRIGOR'YEV, A.A., akademik; NAGINSKIY, N.A.

Mechanism of the growth of quaternary glacial deposits of the Western  
Siberian Lowland. Dokl. AN SSSR 91 no.3:625-628 J1 '53. (MLRA 6:7)

1. Tomskiy gosudarstvennyy universitet imeni V.V.Kuybysheva (for Naginskiy).
2. Akademiya nauk SSSR (for Grigor'yev).  
(Siberia, Western--Geology, Stratigraphic) (Geology, Stratigraphic--  
Siberia, Western)

GRIGOR'YEV, B.A.

Meteorological Abst.  
Vol. 4 No. 9  
September 1953  
Part 1  
General Meteorology

4.9-21 ✓ 551.5:550.36  
 Grigor'ev, A. A. Das Problem des Stoff- und Energieaustauschs in der Lithosphäre, Hydrosphäre und Atmosphäre und seine Bedeutung für die allgemeine Theorie der physischen Geographie. [The problem of matter and energy exchange in the lithosphere, hydrosphere and atmosphere and its significance for the general theory of physical geography.] *Petermanns Geographische Mitteilungen*, 97(1):69-77, 1953. 9 refs. Trans. from: *Akademiia Nauk, SSSR, Izvestiia, Ser. Geograficheskaja*, 4:12-27, 1952. DLC—This philosophical essay sets out the complex interactions between earth, air and water. Besides evolution of soil, and mechanical erosion and deposition, circulating underground water interacts chemically with the crust to depths of 600 m or more. Atmosphere acts on lithosphere by transporting sand, dust, and volcanic ash. Interaction between hydrosphere and atmosphere is very extensive. Energy is transported by radiation, circulation and turbulent processes. *Subject Headings: 1. Geophysics 2. Meteorological philosophy. 3. Translations.—C.E.P.B.*

EH  
4/14/54

GRIGOR'YEV, A.A.

FEDOROV, Ye.Ye., professor; PREDTECHENSKIY, P.P.; BUCHINSKIY, I.Ye.;  
SEYANINOV, G.T., professor; BOSHNO, L.V.; ALISOV, B.P.; BIRYUKOV,  
N.N.; GAL'TSOV, A.P.; GRIGOR'YEV, A.A., akademik; EYGENSON, M.S.,  
professor; MURETOV, M.S.; ~~KERNOV, S.P.~~; BOGDANOV, P.N.; LEBEDEV,  
A.N.; SOKOLOV, V.M.; YANISHEVSKIY, Yu.D.; SAMOYLENKO, V.S.; USMA-  
NOV, R.F.; CHUBUKOV, L.A.; TROTSENKO, S.Ya.; VANGENGHEYM, G.Ya.;  
SOKOLOV, I.F.; STYRO, B.I.; TEMNIKOVA, M.S.; ISAYEV, E.A.; DMITRIYEV,  
A.A.; MALYUGIN, Ye.A.; LINDENAA, Ye.K.; SAPOZHNIKOVA, S.A.; RAKIPO-  
VA, L.R.; POKROVSKAYA, T.V.; BAGDASARYAN, A.B.; ORLOVA, V.V.; RU-  
BINSHTEYN, Ye.S., professor; MILEVSKIY, V.Yu.; SHCHERBAKOVA, Ye.Ya.;  
BOCHKOV, A.P.; ANAPOL'SKAYA, L.Ye.; DUNAYEVA, A.V.; UTESHEV, A.S.;  
HUDNEVA, A.V.; RUDENKO, A.I.; ZOLOTAREV, M.A.; NERSESIYAN, A.G.;  
MIKHAYLOV, A.N.; GAVRILOV, V.A.; TSOMAYA, T.I.; DEVIATKOVA, A.M.;  
ZAVARINA, M.V.; SHMETER, S.M.; BUDYKO, M.I., professor.

Discussion of the report (in the form of debates) [of the current  
state climatological research and methods of developing it]. Inform.  
abor.GUGMS no.3/4:26-154 '54. (MLBA 8:3)

1. Chlen-korrespondent Akademii nauk SSSR (for Fedorov). 2. Glavnaya  
geofizicheskaya observatoriya im. A.I.Voeykova (for Predtechenskiy,  
Lebedev, Yanishevskiy, Isayev, Rakipova, Pokrovskaya, Orlova, Rubin-  
shteyn, Budyko, Shcherbakova, Anapol'skaya, Dunayeva, Rudneva, Gavrilov,  
Zavarina). 3. Ukrainskiy nauchno-issledovatel'skiy gidrometeorologiches-  
kiy institut (for Buchinskiy).

(Continued on next card)

FEDOROV, Ye.Ye., professor; PREDTECHENSKIY, P.P., and others.

Discussion of the report (in the form of debates) [of the current state climatological research and methods of developing it]. Inform. sbor. GUGMS no.3/4:26-154 '54. (Card 2) (MIRA 8:3)

4. Vsesoyuznyy institut rasteniyevodstva (for Selyaninov, Rudenko).  
5. Bioklimaticheskaya stantsiya Kislevodsk (for Boshno). 6. Moskovskiy gosudarstvennyy universitet im. M.V.Lomonosova (for Alisov).  
7. Ministerstvo putey soobshcheniya SSSR (for Biryukov). 8. Institut geografii Akademii nauk SSSR (for Gal'tsov, Grigor'yev). 9. Geofizicheskaya komissiya Vsesoyuznogo geograficheskogo obshchestva (for Eygenson). 10. Ministerstvo elektrostantsiy i elektropromyshlennosti SSSR (for Murotov). 11. Leningradskiy gosudarstvennyy universitet im. A.A.Zhdanova (for Khromov). 12. Tsentral'nyy nauchno-issledovatel'skiy gidrometeorologicheskiy arkhiv (for Sokolov, Zolotarev). 13. Gosudarstvennyy okeanograficheskiy institut (for Samylenko). 14. Tsentral'nyy institut prognozov (for Usmanov, Sapozhnikova). 15. Institut geografii Akademii nauk SSSR i Tsentral'nyy institut kurortologii (for Chubukov). 16. Nauchno-issledovatel'skiy institut imeni Sechenova, Yalta (for Trotsenko). 17. Arkticheskiy nauchno-issledovatel'skiy institut (for Vangenzeyn).

(Continued on next card)



FEDOROV, Ye.Ye., professor; PREDTECHENSKIY, P.P., and others.

Discussion of the report (in the form of debates) [of the current state of climatological research and methods of developing it]. Inform.sbor. GUGMS no.3/4:26-154 '54. (Card 3) (MLRA 8:3)

18. Dal'nevostochnyy nauchno-issledovatel'skiy gidrometeorologicheskiy institut (for Sokolov).
19. Institut geologii i geografii Akademii nauk Litovskoy SSR (for Styro).
20. Rostovskoe upravlenie gidrometsluzhby (for Temnikova).
21. Morskoy gidrofizicheskiy Institut Akademii nauk SSSR (for Dmitriyev).
22. Vsesoyuznyy institut rasteniyevodstva (for Malyugin).
23. Akademiya nauk Estonskoy SSE (for Liedemaa).
24. Akademiya nauk Armyanskoy SSR (for Bagdasaryan).
25. Leningradskiy gidrometeorologicheskiy institut (for Milevskiy).

(Continued on next card)

FEDOROV, Ye.Ye., professor; PRIDTECHENSKIY, P.P., and others.

Discussion of the report (in the form of debates) [of the current state climatological research and methods of developing it]. Inform.sber. GUGMS no.3/4:26-154 '54. (Card 4) (MIRA 8:3)

26. Gosudarstvennyy gidrologicheskiy institut (for Bchkov).
27. Kazhskiy nauchno-issledovatel'skiy gidrometeorologicheskiy institut (for Uteshev).
28. Upravlenie gidrometsluzhby Armyanskoy SSR (for Nersesyan).
29. Leningradskoye upravleniye gidrometsluzhby (for Mikhaylov, Devyatkova).
30. Tbiliskiy gosudarstvennyy universitet (for Tsonaya).
31. Tsentral'naya aerologicheskaya observatoriya (for Shmatar).  
(Climatology)

GRIGOR'YEV, A A

USSR/Geography - Zonality

Card 1/1      Pub. 45 - 2/15

Authors      : Grigor'ev, A. A., Academician

Title        : Geographic zonality and some examples of its conformity to law (first installment)

Periodical   : Izv. AN SSSR. Ser. geog. 5. 17 - 39. Sep - Oct 1954

Abstract    : A certain regularity in the distribution of types of soil and vegetation over the earth's surface is designated as geographic zonality and is described as being in accordance with laws discovered by V. V. Dokuchaev fifty years ago. The zones are divided into subzones which succeed each other from west to east. An analysis is made of factors such as heat and moisture which produce this zonality. Special features of the zone system are discussed such as woodland, prairie and desert. Seventeen Russian and Soviet references (1891 - 1953). Tables.

Institution: Acad. of Sc., USSR, Geographic Institute

Submitted:      .....

GRIGOR'YEV, A.A.

USSR/ Geography - Zonality

Card 1/1 Pub. 45 - 4/16

Author : Grigor'iyev, A. A.

Title : Geographic zonality and some instances of its conformity

Periodical : Izv. AN SSSR, Ser. geog. 6, 41 - 50, Nov - Dec 1954

Abstract : The discussion of geographical zonality, which was continued from issue 5 of this magazine, makes reference to the subtropical and tropical regions, where the same conformity to law is found, in accordance with which there is a dependence of the structure and dynamics of the geographical surroundings on the amount of heat and the character of the relationship between the heat and moisture, just as in the colder regions.

Institution: Acad. of Sc., USSR, Geographic Institute

GRIGOR'YEV, A. A.

USSR/ Geography - Book review

Card 1/1 Pub. 45 - 10/16

Authors : Grigor'yev, A. A., Academician; and Leont'yev, N. F.

Title : Atlas of the world

Periodical : Izv. AN SSSR. Ser. geog. 6, 88 -92. Nov - Dec 1954

Abstract : A review is made of the book, "Atlas of the World," edited by A. N. Baranov, published by the Publishing Office of the Central Directorate of Geodesy and Cartography of the Ministry of Internal Affairs, in Moscow, in 1954. The book contains 87 double-page maps, 44 x 57 cm and larger and 109 single-page layouts containing 263 maps with various scales. Some shortcomings are pointed out but generally the book is rated high.

Institution: .....

Submitted: .....

GRIGOR'YEV, A. A.

3

83-48  
 Grigor'ev, A. A., and Anrimov, L. S., Puti razvitiia sovetskoi geografii: po programme stozhego s'ezda Geograficheskogo Obshchestva SSSR. [Paths of development of Soviet geography: results of 2nd Convention of Geographical Society of the USSR.] *Prroda*, Moscow, 44(11): 17-20, 1958. 1 photo; 2 refs. **DLC**—In this report the author lists some of the achievements of Soviet geographers to the Arctic and summarizes briefly studies on distribution of the vegetation in Arctic and Asiatic Russia, radiational and heat balance of the USSR and neighboring M. F. Budyko), moisture cycle of limited areas of earth's surface (O. A. Drozdov), evaporation from the earth's surface and the relationship of climatic melioration to agricultural production. **Subject Headings:** 1. Arctic expeditions 2. Geographical conferences. 3. U.S.S.R.—I.L.D.

3

92

GRIGOR' YEV. Andrey Aleksandrovich; KUMKES, S.N., redaktor; NOGINA, N.I.,  
tekhnicheskij redaktor

[The subarctic; an attempted characterization of the basic types  
of geographical environments] Subarktika; opyt kharakteristiki  
osnovnykh tipov geograficheskoi sredy. Izd. 2-oe, perer. i dop.  
Moskva, Gos. izd-vo geogr. lit-ry, 1956. 222 p. (MLRA 9:11)  
(Arctic regions)

~~GRIGOR'YEV, A.A.~~, akademik, otvetstvennyy redaktor; IVANOV, A.V., otvetstvennyy redaktor; FERYAKOV, I.L., redaktor; GLEBYKH, D.A., tekhnicheskiy redaktor; KOSHELEVA, S.M., tekhnicheskiy redaktor

[The Karelian A.S.S.R.] Karel'skaya ASSR. Moskva, Gos. izd-vo geogr. lit-ry, 1956. 332 p. (MLRA 9:12)

1. Akademiya nauk SSSR. Karel'skiy filial, Petrozavodsk. (Karelia—Economic geography)



BERG, Lev Semenovich, akademik; GELLER, S.Yu.; GERASIMOV, I.P., akademik;  
GRIGOR'YEV, A.A., akademik; KALESNIK, S.V.; LINDBERG, G.U.; MARKOV,  
K.K.; MURZAYEV, M.M., doktor geograficheskikh nauk, otvetstvennyy  
redaktor; NIKOL'SKIY, G.V.; NIKOL'SKAYA, V.V.; OBRUCHEV, D.V.;  
PAVLOVSKIY, Ye.N., akademik; SVETOIDOV, A.N.; BOLYNSKAYA, V.S.,  
redaktor izdatel'stva; KASHINA, P.S., tekhnicheskiy redaktor;  
ZEMLYAKOVA, T.A., tekhnicheskiy redaktor

[Selected works] Izbrannye trudy. Moskva, Izd-vo Akademii nauk  
SSSR. Vol.1. [The history of science] Istorii nauki. 1956. 394 f  
(MIRA 9:9)

1. Chlen-korrespondent AN SSSR (for Kalesnik, Nikol'skiy, G.V.,  
Svetovidov)  
(Science--History)

GRIGOR'YEV, A. A.

8.10-256 551.58  
Grigor'ev, A. A. A. I. Voelkov i nekotorye zadachi sovremennoi klimatologii [A. I. Voelkov and some problems of contemporary climatology.] (In: Budyko, M. I. (ed.), A. B. Voelkov i sovremennyye problemy klimatologii. Leningrad, 1956. p. 11-17) DWB - After discussing A. I. Voelkov's fundamental approach to the study of climate as determined by the radiation balance of the earth's surface, the moisture balance and the distribution of land and water, the author considers the problems of climatology at the present time. These include the formulation of climatic laws, the physical processes involved in the formation of climate as a result of the interaction of the atmosphere with the underlying surface and involving heat and moisture exchange, a physical theory of moisture exchange, etc. *Subject Headings:* 1. Problems in climatology 2. Radiation balance 3. Moisture balance. I. Voelkov, A. I. -L.L.P. 11/1

GRIGOR'YEV, A.A.

General problems of geography and physical geography in "American geography: Inventory and prospect.". Reviewed by A.A.Grigor'ev.  
Izv. AN SSSR. Ser.geog.no.1:116-121 Ja-P '56. (MLRA 9:7)  
(United States--Geography--Study and teaching)

GRIGOR'YEV, A.A., akademik.

Interrelation and interdependence of components of a geographic environment and the role of interchange of matter and energy in them. Izv. AN SSSR. Ser. geog. no. 4:38-45 J1-Ag '56. (MLRA 9:10)

1. Institut geografii Akademii nauk SSSR.  
(Physical geography)

ALAMPIYEV, P.M.; APENCHENKO, V.S.; BEKOVA, T.N.; BYUSHGENS, L.M.; GINZBURG,  
G.Z.; GORDONOV, L.Sh.; GRIGOR'YEV, A.A. akademik; GURARI, Ye.L.;  
DANILOV, A.D.; DEMIN, L.K.; DORROV, A.S.; SHIRMUNSKIY, M.M.;  
KULAGIN, G.D.; MILEYKOVSKIY, A.G.; MURZAYEV, E.M.; PAVLOV, V.V.;  
POPOV, K.M.; YANITSKIY, N.F.

Lev Iakovlevich Ziman, 1900-1956; obituary. Izv. AN SSSR. Ser. geog.  
no.6:153-154 N-D '56. (MLRA 10:1)  
(Ziman, Lev Iakovlevich, 1900-1956)

GRIGOR'YEV, A.

~~Map hanging. Geog.v shkole 19 no.6:63 N-D '56.~~  
(Maps)

(MIRA 10:1)

GRIGOR'YEV, A.A., akademik; BUDYKO, M.I.

Periodic law of geographic zonality. Dokl. AN SSSR 110 no.1:129-132  
S-0 '56. (MLBA 9:11)

1. Institut geografii Akademii nauk SSSR, Glavnaya geofizicheskaya  
observatorya imeni A.I. Voyeykova.  
(Life zones) (Phytogeography)

MURZAYEV, Eduard Makarovich; GBIGOR'YEV, A.A., akademik, otvetstvennyy redaktor; LEBEDEVA, N.G., redaktor; BOVINA, N.I., tekhnicheskiiy redaktor

[Central Asia; a sketch of its physical geography] Sredniasia Azia, fiziko-geograficheskii ocherk. Moskva, Gos. izd-vo geogr. lit-ry, 1957. 268 p. (MIRA 10:2)  
(Soviet Central Asia--Physical geography)



*GRIGOR'YEV*  
LEBEDEV, Dmitriy Mikhaylovich; ~~GRIGOR'YEV, A.A.~~ akademik, otvetstvennyy redaktor; SEMILOVA, M.N., redaktor izdatel'stva; ASTAF'YEVA, G.A., tekhnicheskii redaktor.

[Outline history of geography in Russia during the 18th century (1725-1800)] Ocherki po istorii geografii v Rossii XVIII v. (1725-1800 gg.). Moskva, Izd-vo Akad. nauk SSSR, 1957. 271 p. (MIRA 10:11)

(Geography--History)

GRIGOR'YEV, A.A., akademik.

Historical note on Soviet geography. Izv. AN SSSR. Ser. geog. no.5:  
104-110 S-O '57. (MIRA 11:2)

1. Institut geografii AN SSSR.  
(Geography)

GRIGOR'YEV, A.A., akademik.

Some basic problems of physical geography. Izv. AN SSSR. Ser. geog.  
no.6:3-17 N-D '57. (MIRA 11:1)

1. Institut geografii AN SSSR.  
(Physical geography)

GRIGOR'YEV, A.A.

Certain problems and tasks confronting Soviet physical geography.  
Geog.sbor. no.12:63-67 '57. (MIRA 11:1)  
(Physical geography)

GRIGOR'YEV, A.A.

Some problems relative to Soviet physical geography. Izv. Vses.  
Geog. ob-va 89 no.2:101-105 Mr-Apr '57. (MLBA 10:6)  
(Physical geography)

BERG, Lev Semenovich, akad., red.; GELLER, S.Yu., doktor geograficheskikh nauk, otv. red.; GERASIMOV, I.P., akad., red.; GRIGOR'YEV, A.A., akad., red.; KALESNIK, S.V., red.; LINDBERG, G.U., red.; MARKOV, K.K., red.; MURZAYEV, E.M., red.; NIKOL'SKIY, O.V., red.; NIKOL'SKAYA, V.V., red.; OBRUCHEV, D.V., red.; PAVLOVSKIY, Ye.N., akad., red.; SVETOVIDOV, A.N., red.; SPRYGINA, L.I., red. izd-va.; KUZ'MIN, I.P., tekhn. red.

[Selected works] Izbrannye trudy. Moskva, Izd-vo akad. nauk SSSR.  
Vol. 2. [Physical geography] Fizicheskaya geografiya. 1958. 425 p.  
(MIRA 11:11)

1. Chlen-korrespondent AN SSSR (for Kalesnik, Nikol'skiy, Svetovidov).  
(Physical geography)

А.А. ЗВОРЫКИН

NEMCHENKO, V.S.; BOCHAROV, M.D.; KRISTOSTUR'YAN, N.G.; CHERKASOV, V.I.;  
ANDREYANOV, V.V.; KAUFMAN, V.M.; PAKHMANOV, V.F.; ZVORYKIN, A.A.,  
otv.red.; ANICHKOV, N.M., red.; BARDIN, I.P., red.; BLAGOMRAVOV,  
A.A., red.; VVEDENSKIY, B.A., red.; GRIGOR'YEV, A.A., red.;  
KAPUSTINSKIY, A.F., red.; KOLMOGOROV, A.N., red.; MIKHAYLOV, A.A.,  
red.; OPARIN, A.I., red.; PETROV, P.M., red.; SPOLETOV, V.N., red.;  
STRAKHOV, N.M., red.; FIGUROVSKIY, N.A., red.; KOSTI, S.D., tekhn.red.

[Biographical dictionary of leaders in the natural sciences and  
technology] Biograficheskiy slovar' deiatelei estestvosnaniya  
i tekhniki. Vol.1. A - L. Otvetstvennyi red. A.A.Zvorykin. Red.  
kollegiya: N.M.Anichkov i dr. Moskva, Gos.nauchn.izd-vo "Bol'shaia  
Sovetskaya Entsiklopediya." 1958. 548 p. (MIRA 12:4)

1. Redaktsiya istorii estestvosnaniya i tekhniki Bol'shoy Sovetskoy  
Entsiklopedii (for Nemchenko, Bocharov, Kristostur'yan, Cherkasov,  
Andreyanov, Kaufman, Pakhmanov).  
(Scientists)

GRIGOR'YEV, A.A.

11-1-28/29

AUTHOR:

None Given

TITLE:

General Meeting of the Department of Geologic-Geographical Sciences of the USSR Academy of Sciences, Held on the Occasion of the 40th Anniversary of the Great Socialist October Revolution (Obshcheye sobraniye otdeleniya geologo-geograficheskikh nauk AN SSSR, posvyashchennoye 40-letiyu velikoy oktyabr'skoy sotsialicheskoy revolyutsii)

PERIODICAL:

Izvestiya Akademii Nauk SSSR, Seriya Geologicheskaya, 1958, # 1, p 117 (USSR)

ABSTRACT:

On October 29-31, 1957, a general meeting of the department of geologic-geographical sciences was held in Moscow, commemorating the 40th anniversary of the Great Socialist October Revolution. The meeting was opened by the Academician-Secretary D.I. Shcherbakov. The meeting heard the following reports: 1. Academician D.V. Nalivkin - Boundaries of Geosynclines and Plateaus on Geologic Maps. 2. Academician of the Azerbaydzhan SSR M.M. Aliyev - Development of Geologic Science in Azerbaydzhan During the Soviet Regime. 3. Member-Correspondent of the USSR Academy of Sciences I.I. Gorskiy - Biostratigraphy and Geochronology of Continental Deposits. 4. Member-Correspondent of the USSR Academy of

Card 1/2



11-1-28/29

General Meeting of the Department of Geologic-Geographical Sciences  
of the USSR Academy of Sciences, Held on the Occasion of the 40th Anniversary of the Great Socialist October Revolution

Sciences K.A. Vlasov - Genetic Types of Deposits of Rare Elements. 5. Academician A.A. Grigor'yev - Several Basic Problems of Physical Geography. 6. Member-Correspondent of the USSR Academy of Science L.A. Zenkevich; Professor V.G. Bogorov, and Professor V.I. Usachev - Regularity of Distribution of Living Beings in the Ocean. 7. Academician of the Ukrainian Academy of Sciences V.G. Bondarchuk; Professor P.N. Shul'ga - Atlas of the Paleogeographical Maps of the Ukrainian and the Moldavian SSR.

AVAILABLE: Library of Congress

Card 2/2

AUTHOR: Grigor'yev, A.A., Academician

10-58-3-3/29

TITLE: Some Geographical ~~Mechanisms~~ of Heat and Water Exchange on Land Surface and Ways of Further Studying Substance and Energy Exchange in the Geographical Environment (O nekotorykh geograficheskikh zakonomernostyakh teploobmena i vodcobmena na poverkhnosti sushi i o putyakh dal'neyshego izucheniya obmena veshchestv i energii v geograficheskoy srede)

PERIODICAL: Izvestiya Akademii Nauk SSSR, Seriya Geograficheskaya, 1958, Nr 3, pp 17-21 (USSR)

ABSTRACT: The latest investigations on the regularity of the formation and development of the geographical environment showed that the interdependence of its components, (established by V.V. Dokuchayev) is based on the exchange of substance and energy between them and between the geographical environment as a whole and solar radiation and sub-crustal substance. Quite recently, outstanding achievements have been made in the comparative study of zonal characteristics, on geochemical processes, on mineralization processes of subsurface and surface waters, on erosion accumulative geomorphological processes, on biogeochemical processes of soil formation, and on biochemical processes in flora and fauna. Studying these processes K.I. Lukashev, A.I. Perel'-

Card 1/2

10-98-3-3/29

Some Geographical ~~Mechanisms~~ of Heat and Water Exchange on Land Surface and Ways of Further Studying Substance and Energy Exchange in the Geographical Environment

man, A.O. Alekin, G.A. Maksimovich, N.I. Makkaveyev, V.A. Kovda, V.V. Ponomareva, S.L. Ivanov, Ye.A. Doroganevskaya and others have collected important material, enabling Soviet science to start fundamental investigations on the regularity of formation building, dynamics and development of the geographical environment. These studies are directed towards the artificial altering of heat and water conditions on the Earth's surface. There are 2 Soviet references.

ASSOCIATION: Institut geografii AN SSSR (The Geographical Institute of the USSR AS)

AVAILABLE: Library of Congress  
Card 2/2

1. Geophysics - USSR
2. Hydrology - USSR

AUTHOR: Grigor'yev, A.A., Academician 10-56-3-12/29

TITLE: On the Scientific Activity of the First All-Union Geographical Congress (O nauchnoy deyatel'nosti pervogo vsesoyuznogo geograficheskogo s"yezda)

PERIODICAL: Izvestiya Akademii Nauk SSSR, Seriya Geograficheskaya, 1958, Nr 3, pp 76-83

ABSTRACT: The First All-Union Geographical Congress, convened by the State Geographical Society from the 11th to 18th April 1933, was attended by 803 persons. Reports on the successes of Soviet geography, on problems of physical and economic geography, etc., were delivered by the following scientists: Academician N.I. Vavilov, people's commissar N.V. Krylenko, the representative of the Armenia SSR, Professor A.Ya. Ioannessian, R. L. Samoylovich, D.V. Nalivkin, Yu.M. Shokal'skiy, A.F. Vangengeym, K.M. Deryugin, L.I. Prasolov, I.I. Gorskiy, A.A. Grigor'yev, L. Ya. Ziman, N.N. Zakharov, V.F. Glushkov, V.N. Lebedev, P.T. Sokolov, B.F. Dobrynin, A.D. Gozhev, M.A. Pervukhin, A.A. Kaminskiy, B.B. Polynov, G.D. Rikhter, L.S. Berg, I.P. Gerasimov, Ye.N. Ivanova, S.S. Shul'ts, K.K. Markov, B.L. Lichikov, N.N. Sokolov, N.V. Dumitrashko, B.A. Fedorovich, A.N. Kristofovich, B.K. Shtegman, N.N. Baranskiy, O.A. Konstantinov, I.A. Vitver,

Card 1/1

*S.Yu. Schmidt*

10-58-5-12/29

On the Scientific Activity of the First All-Union Geographical Congress

O.Yu. Shmidt. There are 4 Soviet references.

ASSOCIATION: Institut geografii AN SSSR (Geographical Institute of the AS USSR)

AVAILABLE: Library of Congress

Card 2/2

1. Conferences - Geographical Congress - USSR
2. Geography - USSR
3. Geography - Economic aspects - USSR

AUTHOR: Grigor'yev, A.A., Academician 26-58-6-9/56

TITLE: A New Tendency in Meteorology and Physical Geography (Novoye napravleniye v meteorologii i fizicheskoy geografii)

PERIODICAL: Priroda, 1958, Nr 6, p 52-54 (USSR)

ABSTRACT: The article deals with the valuable contributions to meteorology and physical geography made by Soviet scientist M.I. Budyko, who had come to the conclusion that the processes of zonality depend on the exchange of heat and humidity between the earth's surface and the atmosphere. Budyko introduced new geophysical methods for inquiring into these phenomena, covered in his monograph "Evaporation Under Natural Conditions", published in 1948. In 1956 he published a monograph on "The Heat Balance of the Earth's Surface" along with an "Atlas of Heat Balance". This material cleared up a range of general problems covering the theory of climate and explained a number of laws of geographical zonality. Budyko's works have been translated into many foreign languages.

Card 1/1 There is 1 photo and 1 Soviet reference.

1. Meteorology-Study and teaching
2. Geography

SEMDT, Otto Yul'yevich, akademik [deceased]; KUROSH, A.G., doktor fiz.-matem. nauk, otv.red.toma; GRIGOR'YEV, A.A., akademik, red.; DELONE, B.N., red.; KALASHNIKOV, A.G., doktor fiz.-matem.nauk, red.; KOZLOVSKAYA, S.V., red.; LEBEDINSKIY, A.I., doktor fiz.-matem.nauk, red.; LEVIN, B.Yu., doktor fiz.-matem.nauk, red.; MAL'TSEV, A.I., red.; KHIL'MI, G.P., doktor fiz.-matem.nauk, red.; SHEVELEV, M.I., general-leytenant, red.; POLENOVA, T.P., tekhn.red.

[Selected works; mathematics] Izbrannye trudy; matematika. Moskva, Izd-vo Akad.nauk SSSR, 1959. 315 p. (MIRA 12:2)

1. Chlen-korrespondent AN SSSR (for Delone, Mal'tsev).  
(Groups, Theory of)

GRIGORYEV, A.A.

KOMAR, I.V.. Prinimali uchastnye: POTULOV, A.A.; TEREKHOVA, V.N.;  
CHUKLENKOVA, I.N.; IVANOVA, G.V.. GRIGOR'YEV, A.A., akademik,  
otv.red.; NEMCHINOV, V.S., akademik, otv.red.; MEYEROVICH,  
O.V., red.izd-va; RILINA, Yu.V., tekhn.red.

[The Urals; economic and geographical features] Ural; ekono-  
miko-geograficheskaya kharakteristika. Moskva, Izd-vo Akad.  
nauk SSSR, 1959. 365 p. (MIRA 13:1)  
(Ural Mountain region)



3(4)

307/10-59-3-1/32

AUTHORS: Grigor'yev, A.A., Academician, and Budyko, M.I.

TITLE: Classification of the Climates of the USSR.

PERIODICAL: Izvestiya Akademii nauk SSSR, Seriya geograficheskaya, 1959, Nr 3, pp 3-19 (USSR)

ABSTRACT: The authors describe the present situation of climatological studies in the USSR and abroad, especially in Germany. After having explained and criticized other systems, they explain and justify their own proposal which they had followed in drafting the climatological map of their country (the map is attached to the article). Their classification does not only reflect physical-geographical uniformities but is also influenced by some climatologic-genetic regularities. Average temperatures and average factors of dryness were taken into consideration as well. Geobotanical charts were used as a countercheck. Table 1 shows the characteristics of 4 different degrees of humidity of a climate. Table 1a lists the characteristics of 5 different warm zones (from plus 10° C to the total yearly temperature up to 4,400°). Table 2

Card 1/3

30V/10-59-3-1/32

Classification of the Climates of the USSR

shows the characteristics of 6 different cold zones (from the average yearly temperature above 0° down to -32°). Every region is characterized in their system by three signs (e.g. II 4 D) expressing the mean values of humidity, heat and cold of the region. Table 3 is an over-all survey of the new classification of the Soviet climates. A vertical evaluation of the climates is but partially taken into consideration. The USSR is said to have 12 types of basic climatic zones for the warm period, 31 for the winter season. At the end, a more detailed characteristic of the basic Soviet climates is given. More accurate regional observations are to be organized all over the Soviet-Union. The following scientists have collaborated on this study: L.I. Zubenok, N.A. Yefimova, V.V. Mukhenberg, A.F. Gal'tsov, O.A. Drozdov, G.D. Rikhter, Ye.S. Rubinshteyn and A.M. Semenova-Tyanshanskaya. The author also mentions the following Soviet scientists: F.F. Davitaya, S.A. Sapozhnikova, G.T. Selyaninov, A.I. Kaygerodov, B.P. Alisov, M.I. Badyko, A.A. Grigor'yev, L.P. Seryakova, Ye.M. Lavrenko, V.B. Skoraya whose names

Card 2/3

30V/10-59-3-1/32

Classification of the Climates of the USSR

are also recorded in the reference list. There are 4 tables, 3 graphs, 1 map, and 37 references, 30 of which are Soviet, 6 German and 1 Swedish.

ASSOCIATION: Institut geografii AN SSSR (Institute of Geography of the AS USSR) Glavnaya geofizicheskaya observatoriya (The Main Geophysical Observatory).

Card 3/3

3(0)

SOV/10-59-3-20/32

AUTHOR: Grigor'yev, A.A., Academician

TITLE: A. Humboldt - an Outstanding Naturalist and Geographer of the First Half of the 19th Century (1769 - 1859)

PERIODICAL: Izvestiya Akademii nauk SSSR, Seriya geograficheskaya, 1959, Nr 3, pp 119-123 (USSR)

ABSTRACT: This article praises A. Humboldt on the one hundredth anniversary of his death. The Institut istorii yestestvoznaniya i tekhniki AN SSSR (Historical Institute of Natural History and Technology, AS USSR) will publish a special collection of studies written on the occasion of the first centenary of the death of A. Humboldt. There is 1 photograph.

ASSOCIATION: Institut geografii AN SSSR (Institute of Geography, AS USSR).

Card 1/1

SOV/26-59-5-15/47

AUTHOR: Grigor'yev, A.A., Academician (Moscow)  
TITLE: A Great Naturalist and Geographer  
PERIODICAL: Priroda, 1959, Nr 5, pp 66 - 73 (USSR)

ABSTRACT: The author describes Humboldt's scientific work which covered geography, geology, atmospheric, hydrospherics, biospherics and climatology. He carried out research in these sciences in the tropical area of South America in 1799/04, the result of which appeared in "Cosmos, a Study in Geophysics" ("Kosmos, opyt fizicheskogo miroopisaniya") published in 1845. The results of his travels in Eastern Russia in 1827 were published in "Central Asia" (Tsentral'naya Aziya). The author describes the achievements of Humboldt and his influence upon later developments in science and in the materialistic philosophy elaborated by Marx and Engels. There are 5 Soviet references.

Card 1/1

A. A. Grigor'yev

3 (7)

SOV/50-59-2-15/16

AUTHOR:

Lebedev, A. N.

TITLE:

At the Geophysical Main Observatory imeni A. I. Voyeykov

PERIODICAL:

Meteorologiya i gidrologiya, 1959, Nr 2, p 58 (USSR)

ABSTRACT:

On May 29, 1959, a meeting of the Uchenyy sovet (Scientific Council) took place at the Glavnaya geofizicheskaya observatoriya (Geophysical Main Observatory). It was held in commemoration of the 100th anniversary of Alexander von Humboldt's death. The members of the Observatory mentioned, and of other institutes of Leningrad, were present. Reports were held by Academician A. A. Grigor'yev on "The Scientific Importance of A. Humboldt's Work", and by Professor Ye. A. Rubinshteyn "In Commemoration of Alexander Humboldt". Professor M. I. Budyko, Chairman of the Scientific Council, made the closing speech, pointing to the fact that Humboldt had contributed to the organization of the Geophysical Main Observatory.

Card 1/1

G-RIGOR'YEV, A A

PAGE I ROK KARTOVICH

5/7/79

Uchenye zapiski Vostochno-Sibirskogo gosudarstvennogo universiteta	
Trudy i volny roblin tekony i tektoniki (Tectonics and Water Regime of the Earth's Surface) Izdatel'stvo Gidrometeoizdat, 1969, 191 p. Errata slip inserted, 600 copies printed.	
Upravlyayushchaya Agenciya Glavnoye upravleniye gidrometeorologicheskoy sluzhby SSSR	
Eds. (with page): I. P. Gerasimov, Academician, M. I. Rukhko, Doctor of Physics and Mathematics, and A. P. Gal'vayev, Doctor of Geographical Sciences; Ed.: M. M. Yanzonobakhaya; Tech. Ed.: M. I. Braykina.	
PROVIDE: This publication is intended for geophysicists, geographers, climatologists, agronomists, and agriculturalists.	
CONTENTS: The seventeen articles contained in this publication represent condensed versions of reports presented at the conference on the Heat and Water Balance of the Earth's Surface, convened by the Gidrometeorologicheskaya observatoriya im. A. I. Vovjshova (Main Geophysical Observatory) imeni A. I. Vovjshova in April 1959. Individual articles deal with the investigation of the thermal balance of the earth's surface, problems of the generation of the thermal balance and moisture exchange, the indicators of heat and water balance in agriculture, and problems related to the effect of hydro-meteorological factors upon complex geographical processes and phenomena. No precedents are mentioned. References follow individual articles.	29
Uchenyye zapiski, B. L., and Yu. L. Rauber [Institut geograficheskoy sluzhby SSSR -- Institute of Geography, AS USSR]. The State and the Tasks of Investigating the Heat Balance of a Forest	
Card 2/3	
Kalinin, G.P. [Centralnyy Institut prognozov -- Central Institute of Weather Forecasting]. General Reasons for the Investigation of Water Balance	32
Papov, O.V., and V.I. Kuznetsov [Odeskoye gosudarstvennoye gidrometeorologicheskoye Institut -- State Hydrological Institute]. Experimental Investigation of the Elements of the Water Balance on Dry Land	35
L'vovitch, M.I. [Institute of Geography, AS USSR]. Methods of Runoff Investigation on the Basis of Water Balance	62
Antonovskiy, A.I. [Institute of Geography, AS USSR]. Investigation of the Water Balance of Soil	71
Gal'tayev, A.P. [Institute of Geography, AS USSR]. The State and the Tasks of the Studies of the General of Climate	82
Shvedt, M. M. [Main Geophysical Observatory imeni A. I. Vovjshova]. Basic Problems of the Theory of Climate	96
Gal'tayev, A.P. [Main Geophysical Observatory imeni A. I. Vovjshova]. Heat Balance Exchange in the Biosphere	107
Card 3/3	
Timofeyev, M.P. [Main Geophysical Observatory imeni A. I. Vovjshova]. Heat Balance and the Microclimate	120
Orlovskiy, A.B. [Academician, Institute of Geography, AS USSR]. The Temperature and Moisture Exchange in the Structure and Development of the Geographic World (Mainly in the Lands of the Temperate Zone) and their Significance in the Productivity of Agricultural Crops	130
Gromov, V. P. [A. I. G.S. Pupillova, Institute of Geography, AS USSR]. Hydrothermal Factors in Soil Formation	144
Kobzarev, V.A. [Akademicheskoye gosudarstvennoye SSU -- AS Airway Academy, SSU]. Total Expenditure of Energy for Soil Formation in Relation to the Hydrothermal Conditions	162
Lavrenko, Ye. M. [Botanicheskoye Institut AS SSSR -- Botanical Institute, AS USSR]. Hydrothermal Factors and the Geography and Ecology of the Vegetation Cover	180
Dmitriyev, P.P. [Central Institute of Weather Forecasting]. Water and Heat Balance of the USSR and Some Problems of Agriculture	186

SHMIDT, Otto Yul'yevich [deceased]; LEBEDINSKIY, A.I., doktor fiz.-matem. nauk, otv.red.toma; LEVIN, B.Yu., doktor fiz.-matem.nauk, otv.red.toma; KHIL'MI, G.F., doktor fiz.-matem.nauk, otv.red.toma; KALASHNIKOV, A.G., doktor fiz.-matem.nauk, red.; GRIGOR'YEV, A.A., akademik, red.; DELORE, B.N., red.; KOZLOVSKAYA, S.V., red.; KUROSH, A.G., doktor fiz.-matem.nauk, red.; MAL'TSEV, A.I., akademik, red.; SHEVELEV, M.I., general-leytenant, Geroy Sovetskogo Soyuz, red.; NOVICHKOVA, H.D., tekhn.red.; KASHINA, P.S., tekhn.red.

[Selected works; geophysics and cosmogony] Izbrannye trudy: geo-fizika i kosmogoniia. Moskva, Izd-vo Akad.nauk SSSR, 1960. 209 p. (MIRA 14:1)

(Cosmogony) (Geophysics)  
(Schmidt, Otto IUL'evich, 1891-1956)



SHMIDT, Otto Yul'yevich, akademik [deceased, 1891-1956]; GRIGOR'YEV, A.A., akademik, otv.red.toma; SHEVKELEV, M.I., general-leytenant, Geroy Sovetskogo Soyusa, otv.red.toma; DELONE, B.N., red.; KALASHNIKOV, A.G., doktor fiz.-matem.nauk, red.; KOZLOVSKAYA, S.V., red.; KUROSH, A.G., doktor fiz.-matem.nauk, red.; LEBEDINSKIY, A.I., doktor fiz.-matem.nauk, red.; LEVIN, B.Yu., doktor fiz.-matem.nauk, red.; MAL'TSEV, A.I., akademik, red.; KHIZ'MI, G.F., doktor fiz.-matem.nauk, red.; MEYEROVICH, O.V., red.izd-va; KASHINA, P.S., tekhn.red.

[Selected geographical works] Izbrannye trudy; geograficheskie raboty. Moskva, Izd-vo Akad.nauk SSSR, 1960. 212 p.  
(MIRA 13:11)

1. Chlen-korrespondent AN SSSR (for Delone).  
(Schmidt, Otto IUL'yevich, 1891-1956)  
(Arctic regions)

GREKOV, Vadim Ivanovich; PATULOV, A.A., kartograf; GRIGOR'YEV, A.A.,  
akademik, otv.red.; LEBEDEV, D.M., doktor geograf.nauk, otv.red.;  
SELYAVINA, T.D., red.isd-va; POLYAKOVA, T.V., tekhn.red.

[Outline history of Russian geographical explorations from 1725  
to 1765] Ocherki iz istorii russkikh geograficheskikh issledo-  
vaniy v 1725-1765 gg. Moskva, Izd-vo Akad.nauk SSSR, 1960.  
425 p. (MIRA 13:7)

1. Institut geografii AN SSSR (for Potulov).  
(Russia--Discovery and exploration)

BERG, Lev Semenovich, akademik; MURZAYEV, M.M., doktor geograf.nauk.  
otv.red.; PAVLOVSKIY, Ye.M., akademik, red.; GELLER, S.Yu., red.;  
GERASIMOV, I.P., akademik, red.; GRIGOR'YEV, A.A., akademik,  
red.; KALESNIK, S.V., red.; LINDBERG, G.U., red.; MARKOV, K.K.,  
red.; NIKOL'SKIY, G.V., red.; NIKOL'SKAYA, V.V., red.; OBRUCHEV,  
D.V., red.; PAVLOVSKIY, Ye.M., akademik, red.; SVETOVIDOV, A.N.,  
red.; SPRIGINA, L.I., red.izd-va; GOLUB', S.P., tekhn.red.

[Selected works] Izbrannye trudy. Moskva, Izd-vo Akad.nauk SSSR.  
Vol.3. [Central Asia. Loess] Sredniasia Azia; Loess. 1960.  
550 p. (MIRA 13:11)

1. Chleny-korrespondenty AN SSSR (for Kalesnik, Nikol'skiy, Svetovidov).  
(Soviet Central Asia--Physical geography) (Loess)

ORIGOR'YEV, A.A., akademik

Impressions at the Third Congress of the Geographical Society  
of the U.S.S.R. Izv.AN SSSR.Ser.geog. no.3:108-110 My-Je  
'60. (MIRA 13:6)

(Geography--Congresses)

S/010/60/000/005/001/001  
A053/A029

AUTHOR: Grigor'yav, A.A., Academician

TITLE: Election of New Members and Corresponding Members of the Academy of Sciences USSR, Department of Geology-Geography

PERIODICAL: <sup>12</sup> Izvestiya Akademia nauk SSR, Seriya Geograficheskaya, 1960, No. 5, pp. 156-157

TEXT: On the June 1960 session of the Academy of Sciences USSR the regular election of members and corresponding members took place: Yevgeniy Konstantinovich Fedorov was elected member and Grigoriy Aleksandrovich Avsyuk - corresponding member of the Academy of Sciences USSR, Department of Geology-Geography. Ye.K.Fedorov was born in 1910 and is an outstanding scientist, whose investigations in the Arctic have won world fame. He made geographic-geophysical observations during his drift on the ice floe "North Pole No. 1" in 1937-1938. In recognition of his achievements Fedorov was appointed Hero of The Soviet Union, Doctor of Geography and in 1946 he won the Stalin Prize. Since he joined the Academy of Sciences in 1947, Fedorov has concentrated on the geophysics of the atmosphere in the higher strata with the intention of finding methods of actively

Card 1/3

S/O10/60/000/005/001/001  
A053/A029

Election of New Members and Corresponding Members of the Academy of Sciences  
USSR, Department of Geology-Geography

influencing meteorological processes. In 1955 Fedorov organized the Institut prikladnoy geofiziki (Institute of Applied Geophysics), which is engaged in research and development work under Fedorov's supervision. Fedorov has recently been working on questions concerning checking on nuclear explosions. Since 1959 Fedorov is Chief Scientific Secretary of the Presidium of the Academy of Sciences USSR. G.A. Avsyuk, born in 1906, is a prominent scientist in the field of glaciology, geodesy and cartography. He studied the ice movements and ice formations of the Arctic Sea and the laws governing the ice flow on the large rivers; finally he explored the glacial regions of Tyan Shan and Pamir. In 1947 Avsvuk established the observation post Vysokogornaya Tyan-Shanskaya fiziko-geograficheskaya Stantsiya (High-Mountain Tyan-Shan Physico-Geographical Station) of the Geographical Institute of the Academy of Sciences USSR, of which he was the head during 10 years. Considerable interest presents his method of artificial glacier melting, contributing to increased water flow in mountain rivers. In 1957 Avsvuk was placed in charge of all glaciological work in the USSR scheduled to be con-

Card 2/3

S/010/60/000/005/001/001  
A053/A029

Election of New Members and Corresponding Members of the Academy of Sciences USSR,  
Department of Geology-Geography

ducted in accordance with the program of the International Geophysical Year. The  
procedure to be adopted in this connection was approved and recommended by the  
Assembly of the IGY in Brussels. Avsyuk is the author of 120 scientific publica-  
tions. ✓

Card 3/3

GRIGOR'YEV, A.A.

Basic steps in the development of thought on physical geography  
from the middle of the 18th century. Vop.ist.est.i tekhn. no.10:100-105  
'60. (MIRA 14:3)

(Physical geography)



GRIGOR'YEV, Andrey Aleksandrovich, akademik; KARASIKOV, M.A., red. izd-va;  
VOLKOVA, V.V., tekhn. red.

[Development of physico-geographical concepts in Russia in the 19th  
and the beginning of the 20th century] Razvitie fiziko-geografiche-  
skoi mysli v Rossii (XIX-nachalo XX v.); kratkii ocherk. Moskva,  
Izd-vo Akad. nauk SSSR, 1961. 89 p. (MIRA 14:9)  
(Physical geography)

FRANKIN, Naum Grigor'yevich; GRIGOR'YEV, A.A., akademik, otv. red.:  
SINILOVA, M.N., red. izd-va; NOVICHKOVA, N.D., tekhn. red.

[History of research on the physical geography of the U.S.S.R.,  
1917-1927] Ocherki po istorii fiziko-geograficheskikh issle-  
dovaniy territorii SSSR, 1917-1927 gg. Moskva, Izd-vo Akad.  
nauk SSSR, 1961. 245 p. (MIRA 14:5)  
(Physical geography)

GRIGOR'YEV, A.A., glav. red.; TIKHOMIROV, V.P., zam. glav. red.

[Concise geographical encyclopedia] Kratkaiia geograficheskaia entsiklopediia. Glav. red. A.A.Grigor'ev. Chleny red. kollegii: P.M.Alampiev i dr. Nauchn. sovet izd-va: A.P.Aleksandrov i dr. Moskva, Gos. nauchn. izd-vo "Sovetskaiia entsiklopediia." Vol.2. Evlakh - Millibar. 1961. 592 p. (MIRA 14:8)

(Geography--Dictionaries)

GRIGOR'YEV, A.A.

Regions of the Kirghiz Range marked by increased moisture.  
Meteor. i. gidrol. no.9:33-34 S '61. (MIRA 14:8)  
(Adygine Valley—Precipitation (Meteorology))

GRIGOR'YEV, A.A., akademik

Alluring prospects. Priroda 50 no.8:15 Ag '61.

(MIRA 14:7)

1. AN SSSR.

(Space sciences)

GRIGOR'YEV, A.A., akademik

Founder of Russian geography. Priroda 50 no.11:32-37 N '61.  
(MIRA 14:10)

(Lomonosov, Mikhail Vasil'evich, 1711-1765)

BERG, Lev Semenovich, akademik; NIKOL'SKIY, G.V., otv. red.; OB. UCHEV, D.V., doktor ~~biol. nauk~~, otv. red.; GELLEN, S.Yu., red.; GEMASIMOV, I.P., akademik, red.; GRIGOR'YEV, A.A., akademik, red.; KALESNIK, S.V., red.; LINDBERG, G.U., red.; MARKOV, K.K., red.; MURZAYEV, E.M., red.; NIKOL'SKAYA, V.V., red.; PAVLOVSKIY, Ye.N., akademik, red.; SVETOVIDOV, A.M., red.; SABLINA, T.B., red. izd-va; YEGOROVA, N.F., tekhn. red.

[Selected works] Izbrannye trudy. Moskva, Izd-vo Akad. nauk SSSR. Vol.5. [General biology, biogeography, and paleoichthyology] Obshchaya biologiya, biogeografiya i paleo-ikhtiologiya. 1962. 513 p. (MIRA 15:10)

1. Chlen-korrespondent Akademii nauk SSSR (for Kalesnik, Nikol'skiy Svetovidov).  
(Biology) (Geographical distribution of animal and plants)  
(Fishes, Fossil)

BELYANKIN, D.S., akademik; BETEKHTIN, A.G., akademik; BORISYAK, A.A., akademik; GRIGOR'YEV, A.A., akademik; NALIVKIN, D.V., akademik; SHATSKIY, N.S., akademik; VLASOV, K.V.; ZHEMCHUZHNIKOV, Yu.A.; ORLOV, Yu.A.; FEDOROV, S.F.; KUZNETSOV, I.V., red.; MIKULINSKIY, S.R., red.; KUZNETSOVA-YERMOLOVA, Ye.B., red.; KRO UCHKOVA, V.N., tekhn. red.

[Russian scientists; sketches about outstanding workers in natural sciences and technology; geology and geography] Liudi russkoi nauki; ocherki o vydaiushchikhsia deiateliakh estestvoznaniia i tekhniki. Geologiya, geografiia. Moskva, Gos. izd-vo fiziko-matem. lit-ry, 1962. 579 p. (MIRA 15:3)

1. Chlen-korrespondent Akademii nauk SSSR (for Vlasov, Zhemchuzhnikov, Orlov, Fedorov).  
(Geology) (Geography)



GRIGOR'YEV, A.A., glav. red.

[Concise geographical encyclopedia]Kratkaia geograficheskaiia  
entsiklopediia. Glav. red. A.A.Grigor'yev. Chleny red. kollegii:  
P.M.Alampiev i dr. Nauchn. sovet izd-va: A.P.Aleksandrov i dr.  
Moskva, Gos.nauchn. izd-vo "Sovetskaia entsiklopediia." Vol.3.  
[Milos-Soluz SSR. 1962. 580 p. (MIRA 16:1)  
(Geography--Dictionaries)

GRIGOR'YEV, A.A.

M.V.Lomonosov's role in developing geography and the science of natural history in Russia. Izv. AN SSSR. Ser. geog no.1:115-120 Ja-F '62. (MIRA 15:2)

1. Institut geografii AN SSSR.  
(Lomonosov, Mikhail Vasil'evich, 1711-1765)  
(Geography)  
(Natural history)

ARBATSKIY, A.V.; GRIGOR'YEV, A.A.; KLIMENKO, M.Ya.

Preparation of a new flotation reagent - 1,1,3-triethoxybutane.  
Khim.prom. no. J:176-181 Mr '62. (MIRA 15:4)  
(Butane)

GRIGOR'YEV, A.A., akademik; BUDYKO, M.I.

Seasonal variations in the climatic factors of geographical  
zonality. Dokl. AN SSSR 143 no.2:391-393 Mr '62.  
(MIRA 15:3)

(Climatology)

GRIGOR'YEV, A. A.; MARKOV, M. M.

Practice in the agroclimatic regionalization of the Kirghis  
S.S.R. Izv. Kir. fil. Geog. ob-va SSSR no.3:129-135 '62.  
(MIRA 15:10)

(~~Kirghisistan—Agriculture and climate~~)  
(~~Kirghisistan—Agricultural geography~~)

POTEKHIN, I.I., glav. red.; BARANOV, A.N., red.; BELYAYEV, Ye.A., red.;  
GELLER, S.Yu., red.; GRAVE, L.I., st. nauchnyy red.; GRIGOR'YEV,  
A.A., red.; GUBER, A.A., red.; KULAGIN, G.D., red.; MALIK, Ya.A.,  
red.; MANCHKHA, P.I., red.; MILOVANOV, I.V., red.; NERSESOV, G.A.,  
red.; OL'DEROGGE, D.A., red.; ORLOVA, A.S., red.; POPOV, K.M.,  
red. ROZIN, M.S., kand. ekon. nauk, red.; SMIRNOV, S.R., red.;  
UFIMOV, I.S., red.; SHVEDOV, A.A., red.; YASTREBOVA, I.P., red.;  
PAVLOVA, T.I., tekhn. red.

[Africa; encyclopedia] Afrika; entsiklopedicheski spravochnik.  
Glav. red. I.I.Potekhin. Chleny red. kollegii: A.N.Baranov i dr.  
Moskva, Vol.1. A - L. 1963. 474 p. (MIRA 16:4)

1. Sovetskaya entsiklopediya, Gosudarstvennoye nauchnoye izdatel'-  
stvo, Moscow.

(Africa--Dictionaries and encyclopedias)

AVSYUK, G.A.; BUDYKO, M.I.; GERASIMOV, I.P.; GRIGOR'YEV, A.A.; DAVITAYA, P.F.;  
KOLESNIK, S.V.; SOCHAVA, V.G.

Geography in the system of science studying the earth. Izv. AN  
SSSR. Ser. geog. no.4:102-111 JI-Ag '63. (MIRA 16:8)  
(Geography)

GERASIMOV, I.P., akademik; GRIGOR'YEV, A.A., akademik; DAVITAYA, F.F.,  
akademik; AVSYUK, G.A.; KALESNIK, S.V.; BUDYKO, M.I., doktor fiz.-  
matem. nauk

Physical geography and its position in the system of sciences  
of the earth. Vest. AN SSSR 33 no.10:24-28 O '63. (MIRA 16:11)

1. AN Gruzinskoy SSR (for Davitaya). 2. Chlen-korrespondent  
AN SSSR (for Avsyuk).



KOMAR, Igor' Valer'yanovich. Prinimali uchastiye: KOLOTIYEVSKIY, A.M., dots.; KHISMATOV, M.F., dots.; GRIGOR'YEV, A.A., akademik, otv. red.; NEMCHINOV, V.S., akademik, otv. red. ERADKIN, N.G., red.izd-va; RYLINA, Yu.V., tekhn. red.

[Geography of the economy of the Urals by regions] Geografiiia khoziaistva Urala; poraionnaia ekonomiko-geograficheskaiia kharakteristika. Moskva, Izd-vo "Nauka," 1964. 393 p.  
(MIRA 17:4)

GRIGOR'YEV, A.A.

[Development of the theoretical problems of Soviet physical geography, 1917-1934] Razvitie teoreticheskikh problem sovetskoi fizicheskoi geografii (1917-1934 gg.). Moskva, Nauka, 1965. 345 p. (MIRA 18:3)

GRIGOR'YEV, A.A., akademik; BUDYKO, M.I.

Relation between the balances of heat and moisture and the intensity of geographic processes. Dokl. AN SSSR 162 no.1: 151-154 My '65. (MIRA 18:5)

1. Chlen-korrespondent AN SSSR (for Budyko).

AVSYUK, G.A.; ARMAND, D.L.; VENDROV, S.L.; GELLER, S.Yu.; GERASIMOV, I.P.;  
GRIGOR'YEV, A.A.; GRICHUK, V.P.; DZERDZEYEVSKIY, B.L.; KAMANIN, L.G.;  
ISAKOV, Yu.A.; LEONT'YEV, N.F.; L'VOVICH, M.I.; MURZAYEV, E.M.;  
NEYSHTADT, M.I.; RIKHTER, G.D.; SOBOLEV, L.N.

On Academician Vladimir Nikolaevich Sukachev's 85th birthday.  
Izv. AN SSSR. Ser. geog. no.4:3-4 J1-Ag '65.

(MIRA 18:8)

GRIGOR'EV, A. D., jt. au.

Hydraulic calculation tables for asbestos-cement water pipes.

Moskva, Gos. izd-vo lit-ry stroitel'stvu i arkhitekture, 1953. 30 p. (54-18941)

TP885.P5M4

<sup>ГЛЕВ</sup>  
GRIGOR'EV, A. D.

GRIGOR'EV, A. D.: "Investigation of the possibility of using lignin-containing raw materials in the production of veratraldehyde (an intermediate product in papaverine production)". Sverdlovsk, 1955. Min Higher Education USSR. Ural Polytechnic Inst imeni S. M. Kirov. (Dissertations for the degree of Candidate of Technical Science.)

SO: Knishnaya Letopis' No. 50 10 December 1955. Moscow.

PUSHKAROVA, Z.V.; GRIGOR'YEV, A.D.

Obtaining vanillin from raw material containing lignin. Med.prom.  
11 no.8:6-11 Ag '57. (MIRA 10:11)

1. Ural'skiy politekhnicheskiy institut imeni S.M.Kirova.  
(VANILLIN) (LIGNIN)

PHASE I BOOK EXPLOITATION

SOV/6417

Suslov, Nikolay Ivanovich, Aleksey Dmitriyevich Grigor'yev, Igor' Veniaminovich Pimenov, Yevgeniy Pavlovich Krestnikov, Valentina Ivanovna Susorova, Valentina Ivanovna Morotskaya, Tamara Vasil'yevna Basargina, and Pavel Alekseyevich Zaytsev

Nemetallicheskiye materialy; spravochnik (Nonmetallic Materials; A Handbook). Moscow, Mashgiz, 1962. 360 p. Errata slip inserted. 32,000 copies printed.

Ed. (Title page): N.I.Suslov, Engineer; Reviewers: A.V.Podol'skiy, Engineer, A.I.Lesik, Engineer, T.V. Basargina, Engineer, and Yu.I. Bagin, Engineer; Tech. Ed.: N.A.Dugina; Executive Ed. of Ural-Siberian Department (Mashgiz): N.D.Chilikina, Engineer.

PURPOSE: This handbook is intended for engineers and technicians in the machine building industry.

COVERAGE: The book contains systematized information on non-metallic materials used in machine building in the Soviet Union.

Card 1/3



Nonmetallic Materials (Cont.)

SOV/6417

Trade names, GOST designations, properties, and applications are given in tabular form for plastics, adhesives, varnishes, dyes, oils, and chemicals. The book deals primarily with plastics, which are divided into seven classes. Chapter I was compiled by Engineer N.I.Suslov; Chapter II, by Candidate of Technical Sciences A.D.Grigor'yev and Engineer I.V.Pimenov; Chapter III, by Engineer V.I.Susorova; Chapter IV, by Engineers E.P.Krestnikov, V.I.Morotskaya, and T.V.Basargina; and Chapter V, by Engineer P.A. Zaytsev. There are 84 references: 83 Soviet and 1 English.

TABLE OF CONTENTS:

Preface	5
Ch. I. Plastics	7
Ch. II. Adhesives	151

Card 2/3

GRIGOR'YEV, A.D.

Comparative study of methods for preparing vanillin from hydrolytic  
lignin and coniferous wood sawdust. Trudy Ural.politekh.inst.  
no.96:4-7 '60. (MIRA 14:3)  
(Vanillin) (Lignin) (Wood waste)

GRIGOR'YEV, A.D.; PUSHKAREVA, Z.V.

Preparation of vanillin from coniferous wood sawdust and hydrolytic  
lignin by means of copper oxide. Trudy Ural.politekh.inst.

no.96:8-18 '60.

(MIRA 14:3)

(Vanillin)

(Lignin)

(Wood waste)

S/120/62/000/003/032/048  
E032/E114

AUTHORS: Grigor'iyev, A.D., Mikhaylov, Yu.G., Reynov, N.M.,  
Rumyantseva, A.V., and Smirnov, A.P.

TITLE: An apparatus for producing films by evaporation in  
vacuo

PERIODICAL: Pribory i tekhnika eksperimenta, no.3, 1962, 133-135

TEXT: A description is given of a laboratory apparatus  
(including a full sectional drawing) for the production of films  
of metals and dielectrics. It can be used to evaporate five  
different materials and to obtain (in a single pumping cycle) multi-  
layer systems consisting of films with ten different  
configurations in any desired sequence. The thickness of the  
films is determined in situ from their resistance. Alundum  
evaporators heated directly by tungsten spirals are employed  
(maximum temperature 1700 °K, 160 W). The pumping speed (oil  
diffusion pump) is 250 litres/sec and the working pressure is  
 $5 \times 10^{-6}$  mm Hg. The targets are cooled by liquid nitrogen.  
There are 3 figures.

Card 1/2