

Events

6th ALL-UNION CONFERENCE ON THERMAL ANALYSIS

Moscow, November 1976

The 6th All-Union Conference on Thermal Analysis was organized by the Scientific Council on Thermal Analysis of the Academy of Sciences of the U.S.S.R. and the Kurnakov Institute for General and Inorganic Chemistry on November 1–4, 1976 in Moscow.

The following lectures were presented:

Plenary lectures

Lev Germanovich Berg's life and scientific activities

I. N. LEPESHKOV
(Academy of Sciences of the U.S.S.R., Kurnakov Institute for General and Inorganic Chemistry, Moscow)

Thermal analysis of fast reactions

A. V. NIKOLAEV, F. JA. GIMELSHEYN
(Siberian Department of the Academy of Sciences of the U.S.S.R., Institute for Inorganic Chemistry, Novosibirsk)

Instruments for complex thermal analysis: present state and future development

I. B. KUDIKOV, G. B. RAVICH, L. S. SEDLOVICH, V. M. NEYMARK
(Academy of Sciences of the U.S.S.R., Institute for General and Inorganic Chemistry and Central Design Department, Moscow)

DTA application for studying reactions of organic compounds

G. V. ROMANOV, N. P. ANOSHINA, A. N. PUDOVIK
(Kazan Branch of the Academy of Sciences of the U.S.S.R., Arbuzov Institute for Organic and Physical Chemistry, Kazan)

Methods and theory

Mass-spectrometric study of the decomposition kinetics of inorganic substances at high heating rates

V. V. ALEKSANDROV, V. V. VOLDYREV, V. G. MOROZOV, N. P. NOVIKOV, V. V. SOLOVEV
(Siberian Department of the Academy of Sciences of the U.S.S.R., Institute for Physico-Chemical Studies of Mineral Raw Materials, Novosibirsk)

Determination of the heat of fusion of fluorophlogopite

I. N. ANIKIN, K. G. TSOY, G. L. AKHMETOV, N. D. TOPOR

(All-Union Research Institute for Syntheses of Mineral Raw Materials, Aleksandrov, and State University Moscow)

On methods involving non-isothermal kinetics

I. V. ARKHANGELSKY, L. N. KOMISSAROVA, N. A. CHERNOVA

(State University Moscow)

Effect of heating rate on the temperatures of characteristic points for thermal curves representing various types of transformations

YU. V. AFANASEV, V. P. EGUNOV, A. M. IVANOV

(Polytechnical Institute, Kuybishev)

Gas volumetric method for determining kinetic parameters under non-isothermal conditions

N. P. BURMISTROVA, A. V. BARDYMOVA

(State University Kazan)

Study of thermophysical properties of oxide systems by DTA using no reference standard

S. G. BRATCHIKOV, A. A. ZHURAVLEV, A. A. TUMASHOV

(Uralian Polytechnical Institute, Sverdlovsk)

On the analysis technique of the kinetics of thermolysis processes of solids by derivatography

E. A. VESELKOV, E. G. SEMIN

(October Revolution Chemical Works, Rostov-na-Donu)

Calculation of kinetic parameters from TG data

F. N. VISHNEVSKY, I. T. EFIMOV, O. I. MINASYAN, A. M. MOSIN

(Ministry of the Chemical Industry, Moscow)

To the problem of enthalpy change determination by L. G. Berg's method

V. G. VLADINOS, A. G. GRIGOREV, A. A. OPRISHKO, V. M. ESKOV

(Grozny Branch of the Research Institute for Petrochemical Automation, Grozny)

An approach to the study of reactions by non-isothermal methods

V. G. VLADINOS, A. G. GRIGOREV, A. A. OPRISHKO, V. M. ESKOV

(Grozny Branch of the Research Institute for Petrochemical Automation, Grozny)

A method for calculating the isothermal aging time of polymeric electric insulators from TG data

E. T. GEVORKYAN, L. V. BARKOVA

(All-Union Research Institute for Electromechanics, Istra)

Mathematical aspects in the phenomenological theory of non-isothermal kinetics

V. M. GORBACHEV

(Siberian Department of the Academy of Sciences of the U.S.S.R., Institute for Inorganic Chemistry, Novosibirsk)

On two methods for determining the effective values of activation energy, pre-exponential factor and thermal effects in the thermooxidative pyrolysis of polymers

A. M. GRISHIN, A. YA. KUZIN

(Research Institute of Applied Mathematics and Mechanics at the Tomsk State University, Tomsk)

Method for determining rate constants of thermal decomposition processes in s^{-1} units

A. V. GULIN

(Siberian Department of the Academy of Sciences of the U.S.S.R., Institute for Inorganic Chemistry, Novosibirsk)

Discussion of the mechanism of thermal decomposition reactions (phenomenological theory and semi-empirical quantum-mechanical theory)

B. E. IVANOV, G. G. ZHILYAEV, V. N. GALEEV, K. N. AVVAKUMOVA, V. F. ZHELTUKHIN
(Arbuzov Institute for Organic and Physical Chemistry, Kazan)

The estimation of the kinetic parameters of the thermal decomposition of solids, proceeding by the consecutive-parallel mechanism, from non-isothermal kinetic data

V. N. KUMOK, N. I. RAZDOBREEVA, L. N. USHCERENKO, M. B. FIALKO
(Research Institute of Applied Mathematics and Mechanics at the Tomsk State University, Tomsk)

Non-isothermal method for determining the apparent activation energy

V. M. MTSIVANI, T. E. MACHALADZE
(Academy of Sciences of the Gruzian R.R.S., Institute for Inorganic Chemistry and Electrochemistry, Tbilisi)

Sequence of operation in thermal analysis

N. A. NEDUMOV, I. V. TANANAEV
(Kucherenko Central Research Institute for Building and Kurnakov Institute for General and Inorganic Chemistry, Moscow)

Thermal analysis of the elastic and plastic deformation of materials

N. A. NEDUMOV, N. N. SHLEHKOV, B. V. STARIKOV
(Kucherenko Central Research Institute for Building, Moscow)

Analysis of the compatibility of thermal effects taking place in the reference standard and the studied samples

N. A. NEDUMOV
(Kucherenko Central Research Institute for Building, Moscow)

Thermographic study of the self-ignition of gunpowder N

A. V. NIKOLAEV, F. YA. GIMELSHYNN, A. N. MIKHNEV, L. F. MAROV, I. P. SHAKOTKO, I. I. YAKOVLEV
(Siberian Department of the Academy of Sciences of the U.S.S.R., Institute for Inorganic Chemistry, Novosibirsk)

Determination of the constants of the Avrami equation for polymorphous transitions of ammonium nitrate by DTA

O. S. NOVIKOVA, I. I. TITOVA, YU. V. TSEKHANSKAYA, T. I. GONTARENKO
(State Institute of the Nitrogen Industry, Moscow)

On the starting temperature of the thermal effect

G. O. PILOYAN, I. B. KUDINOV
(Academy of Sciences of the U.S.S.R., Institute of Geology of Ore Deposits, Petrography, Mineralogy and Geochemistry and Institute for General and Inorganic Chemistry, Moscow)

Application of vacuum gas volumography for the estimation of the activation energy in crystal hydrate dehydration processes

K. P. PRIBYLOV, A. V. BARDYMOVA
(Kazan State University, Kazan)

Non-isothermal thermographic method for determining the kinetic parameters of interactions between metals and gases

V. I. ROZENBAND
(Academy of Sciences of the U.S.S.R., Institute for Chemical Physics, Moscow)

Determination of the enthalpy of intermetallic compound formation by the tin thermographic calorimetry method

A. S. SKOROPYANOV, L. A. MECHKOVSKY, A. A. VECHER
(Belorussian State University, Minsk)

Heat transfer by the gas evolved in the sample

I. G. STUKALOVA, V. P. EGUNOV, N. P. LUSHINA
(Polytechnical Institute, Kuybyshev)

Determination of the enthalpy of thermal dissociation by DTA

YU. L. SUPONITSKY, M. I. KOZHUKHOV, M. KH. KARAPETYANTS
(Mendeleev Institute for Chemical Technology, Moscow and Polytechnical Institute, Kuybyshev)

Energetic estimation of the dissociation of solids in derivatographic studies

V. V. TELPISH
(Polzunov Polytechnical Institute, Antay)

"Comparative" variant of thermal analysis and its application in studies on the crystallization of polymers

B. YA. TEYTELBAUM, N. P. ANOSHINA
(Kazan Branch of the Academy of Science of the U.S.S.R., Arbuzov Institute of Organic and Physical Chemistry, Kazan)

Computerized calculation of kinetic parameters from TG data

P. I. FEDOROV, L. V. ANDREEVA, V. K. ANDREEV
(Lomonosov Institute of Chemical Technology, Moscow)

Nomogram for determining thermal effects from DTA curves

A. M. FILONOVA
(State Institute of the Nitrogen Industry, Moscow)

Study on the kinetics of heat release at the high-temperature reaction between zirconium and hydrogen

S. L. KHARATYAN, YU. M. GRIGOREV, YU. S. SARDARYAN, A. G. MERZHANOV
(Academy of Sciences of the U.S.S.R., Department of the Institute of Chemical Physics, Moscow)

Instruments and equipment

Utilization of the photorecorder of an electrical survey station of oil wells for thermal analysis

R. A. ABDURAKHMANOV, R. M. RUSTAMOVA, M. I. ISMAILOV
(Bukhara Evening Courses Branch of the Tashkent Polytechnical Institute, Bukhara)

Study of the decomposition kinetics of inorganic crystals utilizing a combined x-ray-thermal analysis apparatus

I. D. BERKHSE, I. N. ERESKO, A. S. KOSHMAJ, O. P. MCCHEDLOV-PETROSYAN,
A. G. KHOLODNY
(Design Institute YUZHGPOTSEMENT, Kharkov)

Thermal analysis for studying the phase diagram and the boiling temperatures in systems based on cobalt dichloride

B. P. BURYLEV, V. L. MIRONOV, E. B. BURYLEVA, V. YA. GERSHUNIKA
(Polytechnical Institute, Krasnodarsk)

DTA up to 2700 °C

V. I. VASILENKO, YÄ. A. KOCHERZHINSKY, E. A. SHISHKIN
(Academy of Sciences of the Ukrainian S.S.R., Institute of Metallophysics, Kiev)

Scanning calorimeter for measuring heats of phase transformations and specific heat contents of solids

S. K. VASIN, V. M. MELNIKOVA
(Kolsk Branch of the Academy of Sciences of the U.S.S.R., Institute of the Chemistry and Technology of Rare Elements and Mineral Raw Materials, Apatity)

Apparatus for simultaneous thermal analysis and dielectric contact-free measurement at radio-frequencies

F. R. VERKHBITSKY
(Gorky State University, Perm)

Automated thermogravimetric apparatus with digital data recording

F. N. VISHNEVSKY, I. T. EFIMOV, I. I. SKOROKHODOV
(Ministry of the Chemical Industry, Moscow)

Accessory device to the MOM Derivatograph for digital data recording

F. N. VISHNEVSKY, YA. V. VASILEV, A. V. GERASIMOV, I. T. EFIMOV, I. I. SKOROKHODOV
(Ministry of the Chemical Industry, Moscow and Institute of Inorganic Chemistry, Siberian Department of the Academy of Sciences of the U.S.S.R., Novosibirsk)

High-accuracy digital thermometers

L. N. GALPERIN, L. B. MASHKINOV, YU. R. KOLESOV
(Academy of Sciences of the U.S.S.R., Institute of Chemical Physics, Moscow)

DTA-5 instrument for fast thermal analysis

V. P. EGUNOV, YU. V. AFANASEV
(Kuybyshev Polytechnical Institute, Kuybyshev)

High-accuracy temperature control system

A. K. ERMILOV, V. A. KUZNETSOV, S. I. LAPTEV, L. S. SEDLOVICH, S. F. CHISTOV
(Central Design Department for Single Instruments of the Academy of Sciences of the U.S.S.R.)

Development and introduction of informational measuring systems into thermal analysis

G. P. ZIMIN, V. P. EGUNOV, P. K. LANGE, A. M. KACHEEV
(Polytechnical Institute, Kuybyshev and Institute of General and Inorganic Chemistry of the Academy of Sciences of the U.S.S.R., Moscow)

Studies on the melting of $A_2^{V}B_3^{VI}$ compounds at high hydrostatic pressures by thermal analysis

V. A. KIRKINSKY, A. P. RYAPOSOV, V. G. YAKUSHEV
(Siberian Department of the Academy of Sciences of the U.S.S.R., Institute of Geology and Geophysics, Novosibirsk)

High-temperature thermal analysis instrument

A. N. KOBYLKIN, O. S. IVANOV, L. N. ALEKSANDROVA
(Academy of Sciences of the U.S.S.R., Baykov Institute of Metallurgy, Moscow)

Instrument for studying polymers: simultaneous recording of DTA curves and thermomechanical curves

V. P. KULESHOV, E. V. KUZNETSOV
(Institute of Chemical Technology, Kazan)

Compensation electrothermographic instruments for various purposes

L. B. MASHKINOV, L. N. GALPERIN, V. V. BARELKO, YU. E. VOLODIN, YU. M. GRIGOREV,
 A. G. MERZHANOV, S. L. KHARATYAN, A. B. PETIKHOV
 (Academy of Sciences of the U.S.S.R., Institute of Chemical Physics, Moscow)

Digital recording system of thermal analysis data

A. V. NIKOLAEV, V. S. BELKIN, F. YA. GIMELSHEYN
 (Siberian Department of the Academy of Sciences of the U.S.S.R., Institute of Inorganic Chemistry, Novosibirsk)

Dynamic correction of thermocouple reading in the thermal analysis of fast reactions

A. V. NIKOLAEV, A. I. BOROVIKOVA, F. A. GIMELSHEYN
 (Siberian Department of the Academy of Sciences of the U.S.S.R., Institute of Inorganic Chemistry, Novosibirsk)

Application of the thermal tube in the apparatus for measuring the thermal conductivity of metals in thermographic recording of temperature waves

S. I. SOROKIN, YU. V. GUSAROV, L. V. KOVALEVA, V. A. ZABELIN, V. V. TSEPUKIN
 (State University Saratov)

Apparatus for complex quantitative thermal analysis within a wide temperature range

L. G. FILATOV
 (Design and Research Institute PROSTROYNIIPROEKT, Kharkov)

Volume recording of evolved gas

A. G. KHOMEISKAYA, V. P. EGUNOV
 (Polytechnical Institute, Kuybyshev)

Complex studies of salt decomposition by thermal analysis, using the Kurnakov pyrometer and a seismic station: measurements of dielectric constants, magnetic susceptibility and electrical conductivity

V. G. SHEVCHUK, V. N. YUKHIMETS
 (Engineering and Building Institute, Poltava)

*Inorganic substances**Studies on the thermolysis of rare earth chlorides and oxychlorides in the synthesis of anti-Stokes luminophors*

B. V. ABALDUEV, A. F. BOSHAKOV, A. V. LAPITSKAYA, S. B. PIRKES, L. G. SOKOLOVA
 (State University Saratov and Receiving Amplifier Tube Factory, Saratov)

Study on the thermal transformations and sorption properties of chromium hydroxide and products of its thermal processing

R. A. ABDURAKHMANOV, R. M. RUSTAMOVA, M. I. ISMAILOV
 (Bukhara Evening Courses Branch of the Tashkent Polytechnical Institute, Bukhara)

Thermal analysis for studying dehydration processes of some crystal hydrates

B. A. BEREZHKHMANOV, G. M. SEKUNOV
 (Kazakh State University, Alma-Ata)

Thermal analysis of nickel hydroxides

P. N. BITYUTSKY, V. A. ZABELIN
 (Research Institute of Electrical Sources, Saratov)

Thermoanalytical studies on the polymorphism of solid solutions of alkali earth carbonates

A. F. BOLSHAKOV, B. V. ABALDUEV
 (Research Institute of Chemistry at the Saratov University and Receiving Amplifier Tube Factory, Saratov)

Interaction of magnesium nitrate with acetoamide

I. A. BORUKHOV, T. F. KALIEVICH, M. T. SAIBOVA

(Academy of Sciences of the Uzbek S.S.R., Institute of Chemistry, Tashkent)

Study of complex formation in chloride systems of cadmium and alkali metals by DTA and electrical conductivity measurement

N. P. BURMISTROVA, D. M. SHAKIROVA, N. G. SABADASH

(State University Kazan)

Study on the mechanism of the interaction between calcium oxide and lead halogenides by DTA

N. P. BURMISTROVA, R. G. FITSEVA, E. A. BURNNOVA

(State University Kazan)

Determination of the thermodynamic characteristics of some fluorides by quantitative thermal analysis

L. M. VOLODKOVICH, R. A. BECHER, A. A. VECHER

(Belorussian State University)

Thermal stability of the carboxylates of some rare earths

L. M. VDOVINA, O. E. KOBLOVA

(State University, Saratov)

Study of titanyl and ammonium sulphates

M. M. GODNEVA, D. L. MOTOV, R. F. OKHRIMENKO, R. A. POPOVA, S. D. NIKITINA

(Kolsk Branch of the Academy of Sciences of the U.S.S.R., Institute of Chemistry, Apatity)

Thermoanalytical study of basic hafnium sulphates

M. M. GODNEVA, R. A. POPOVA, D. L. MOTOV, F. R. OKHRIMENKO

(Kolsk Branch of the Academy of Sciences of the U.S.S.R., Institute of Chemistry, Apatity)

Derivatographic study of the thermal decomposition of magnesium monocarboxylates

B. M. GORYAEV, D. N. SHEGROV, A. V. LAZARCHIK

(Belorussian State University of Economic Science, Minsk)

Thermal stability of vanadium fluoride complexes

R. L. DAVIDOVICH, L. G. KHARLAMOVA

(Far-East Centre of the Academy of Sciences of the U.S.S.R., Institute of Chemistry, Vladivostok)

Study on the thermal decomposition of aluminium — lithium double hydroxosalts

V. P. DANILOV, I. N. LEPESHKOV, I. S. ZAYTSEVA, T. O. ASHCHYAN, L. T. KOTOVA

(Academy of Sciences of the U.S.S.R., Kurnakov Institute of General and Inorganic Chemistry)

Kinetics of the thermal decomposition of lithium monoborates

A. E. DZENE, E. M. SHVARTS

(Riga)

Thermoanalytical study of rare earth compounds formed with alkyl-substituted malonic acids

T. V. ZAKHAROVA, A. V. LAPITSKAYA, S. B. PIRKES

(Chemical Research Institute, State University Saratov)

Effect of experimental conditions on the thermal decomposition process of adducts from aromatic amines with cadmium halogenides

V. YA. IVANOVA, N. D. TOPOR, A. V. ABLOV

(Academy of Sciences of the Moldavian S.S.R., Institute of Chemistry, Kishinev and Moscow State University, Moscow)

On the thermal decomposition of copper(I), silver(I), copper(II) and mercury(II) thiocyanates

A. P. ILIN, L. P. EREMIN, T. S. GORINA, V. A. DROZDOV
(Kirov Polytechnical Institute, Tomsk)

Utilization of thermal analysis for studying the dehydration process of a number of boron compounds

I. A. KANTEEVA, I. A. LEONTEVA, K. V. TKACHEV
(Uralian Chemical Research Institute, Sverdlovsk)

Utilization of the triple heat bridge method for determining the specific heat of inorganic oxides

A. A. KOZYRO, A. G. GUSAKOV, G. S. PETROV, R. A. VECHER, A. A. VECHER
(Belorussian State University, Minsk)

Thermal properties of metal diethylmonothiocarbamates

L. A. KOSAREVA, S. V. LARIONOV
(Siberian Department of the Academy of Sciences of the U.S.S.R., Institute of Inorganic Chemistry, Novosibirsk)

Thermal studies on some magnesium orthophosphates

A. G. KOTLOVA, N. I. SHEPOCHKOVA
(Academy of Sciences of the U.S.S.R., Institute of Geology of Ore Deposits, Petrography, Mineralogy and Geochemistry, Moscow)

Thermal transformations of yttrium oxalate, formate and carbonate hydrates

V. V. KOKHANOVSKY
(Academy of Sciences of the Belorussian S.S.R., Institute of General and Inorganic Chemistry, Minsk)

Thermal transformations of dimeric platinum(II) complexes formed with organophosphoric ligands

YU. N. KUKUSHKIN, V. F. BUDANOVA, G. N. SEDOVA, E. S. POSTNIKOVA,
L. F. KUZMICHEV
(Lensovet Technological Institute, Leningrad)

DTA utilization for the study of cobalt(II), nickel(II) and copper(II) halogenide complexes with pyrazol derivatives

G. M. KURDYUMOV, O. I. AGAPOVA
(Moscow Institute of Chemical Reagents Technology, Moscow)

Synthesis and thermal stability of isostructural cubic oxides $M_xPt_3O_4$ and $M_xPd_3O_4$ ($M =$ metal of group I or II)

V. B. LAZAREV, I. S. SHAPLYGIN
(Academy of Sciences of the U.S.S.R., Kurnakov Institute of General and Inorganic Chemistry, Moscow)

Study of the peculiar features of the dehydration process of some chromium compounds by thermal analysis

I. A. LEONTEVA, I. A. KANTEEVA, B. P. SEREDA
(Uralian Chemical Research Institute, Sverdlovsk)

Study on dehydration processes of EDTA chelates under quasi-isothermal and quasi-isobaric conditions

V. A. LOGVINENKO, F. PAULIK, J. PAULIK
(Department of Analytical Chemistry, Technical University Budapest and Siberian Department of the Academy of Sciences of the U.S.S.R., Institute of Inorganic Chemistry, Novosibirsk)

Structural transformations and nucleus growth kinetics in the thermal dehydration of copper sulphate pentahydrate

N. Z. LYAKHOV, A. I. RAGRAY, A. P. CHUPAKHIN, V. V. BOLDYREV

(Siberian Department of the Academy of Sciences of the U.S.S.R., Institute for Physico-Chemical Studies of Mineral Raw materials, Novosibirsk)

Study on the interaction of alkali metal borohydrides with compounds of the chromium subgroup during heating

N. N. MALTSEVA, S. ALEKSEEEVA, Z. K. STERLYADKINA, V. I. MIKHEEVA

(Academy of Sciences of the U.S.S.R., Kurnakov Institute of General and Inorganic Chemistry, Moscow)

TG study of the interaction between alkali silico-fluorides and ammonium sulphate and ammonium hydrogen sulphate

M. A. MIKHAYLOV, G. P. SHETININA, D. G. EPOV

(Far-East Scientific Centre of the Academy of Sciences of the U.S.S.R., Chemical Institute, Vladivostok)

Physico-chemical characteristics and kinetics of calcium nitrate — urea decomposition

O. A. MOMOT, M. T. SAIBOVA, M. N. NABIEV

(Academy of Sciences of the Uzbek S.S.R., Institute of Chemistry, Tashkent)

Thermoanalytical study of fluoroaluminates

V. G. MOROZOV, R. A. POPOVA, R. I. SHEGOLEVA, S. A. KABYCHEMA, S. D. NIKITINA, N. L. MIKHAYLOVA

(Kolsk Branch of the Academy of Sciences of the U.S.S.R., Institute for the Chemistry and Technology of Rare Elements and Mineral Raw Materials, Apatity)

Thermodynamic study of the dehydration process of $\text{Th}(\text{SeO}_3)_2 \cdot \text{H}_2\text{O}$

V. P. NESTERENKO, S. E. OREKHOVA

(Belorussian Technological Institute, Minsk)

Solid-phase intramolecular transformation of coordination compounds during heating

A. V. NIKOLAEV, V. A. LOGVINENKO

(Siberian Department of the Academy of Science of the U.S.S.R., Institute of Inorganic Chemistry, Novosibirsk)

Study on the oxidation mechanism of various allotropic modification of phosphorus

A. V. NIKOLAEV, V. I. KOSYAKOV, V. A. LOGVINENKO, A. I. SIDOROV, G. F. LITSEVANOV

(Siberian Department of the Academy of Sciences of the U.S.S.R., Institute of Inorganic Chemistry, Novosibirsk)

Study on the oxidation of red phosphorous with sodium nitrate

A. V. NIKOLAEV, V. I. KOSYAKOV, F. YA. GIMELSHEYN, A. N. MIKHEEV, A. I. SIDOROV, G. F. LITSEVANOV

(Siberian Department of the Academy of Sciences of the U.S.S.R., Institute of Inorganic Chemistry, Novosibirsk)

Study on the thermal behaviour of the coordination compounds of metal nitrates with some nitrogen-containing ligands

A. V. NIKOLAEV, S. V. LARIONOV, N. I. BATRACHENKO, T. G. LEONOVA, A. PATRINA, L. G. LAVRENOVA, Z. A. SAVELEVA, D. YA. GIMELSHEYN

(Siberian Department of the Academy of Sciences of the U.S.S.R., Institute of Inorganic Chemistry, Novosibirsk)

Application of DTA in aggressive fluorine-containing gas atmospheres

A. V. NIKOLAEV, V. N. MITKIN, S. V. ZEMSKOV, YU. I. NIKONOROV
 (Siberian Department of the Academy of Sciences of the U.S.S.R., Institute of Inorganic Chemistry, Novosibirsk)

Study of dehydration and dissociation processes of iron(III) sulphate using DTA and static thermal analysis

R. I. NOVIKOV, A. V. SHNYP
 (Belorussian Technological Institute, Minsk)

Thermal decomposition of copper(II) salts formed with various dicarbonic acids

G. V. NYSH, L. F. TRUSHINA, G. G. SAVELEV, V. M. IKRIN, M. B. FIALKO,
 V. L. SCHCHERINSKY
 (Tomsk Polytechnical Institute)

Thermoanalytical and thermogravimetric study of "acetic acid" solvates of alkali hexafluoro-stannates

A. A. OPALOVSKY, T. F. GUDIMOVICH, L. D. ISHKOVA, V. P. POPOV, L. M. KORNENKO,
 E. U. LABKOV
 (Odessa State University and All-Union Research Institute for Luminophors, Stavropol)

Thermal properties of acetate and formate solvates of alkali hexafluorophosphates

A. A. OPALOVSKY, I. I. SEYFULINA, T. V. PETROVA, E. U. LABKOV
 (Odessa State University)

Thermal analysis of the reaction between TiO_2 and alkali bifluorides

A. A. OPALOVSKY, A. F. POSHARITSKY, E. M. BELOUSOVA, A. I. NIKOLAYCHUK
 (Odessa State University)

Thermal analysis of the reaction between sulphur hexafluoride and inorganic substances

A. A. OPASOVSKY, A. U. LABKOV, L. G. ERYGANNOVA, L. K. KUCHUMOVA,
 (Odessa State University)

High-temperature oxidation of cubic ($NaCl$ -type) titanium hydroxycarbides in air

I. E. PAVLOV, S. I. ALYAMOVSKY, G. P. SHVEYKIN
 (Uralian Scientific Centre of the Academy of Sciences of the U.S.S.R., Institute of Chemistry, Sverdlovsk)

Complex study on the mechanism of the thermal decomposition of zinc monocarboxylates

V. V. PANEVCHIK, V. M. GORIAEV, L. N. SHEGROV
 (Kuybyshev Belorussian Economic Institute)

Study of the thermal properties of some complex rhodium(III) compounds

I. V. PROKOFEEVA, T. P. SIDOROVA, L. K. SHUBOCHKIN
 (Academy of Sciences of the U.S.S.R., Kurnakov Institute of General and Inorganic Chemistry, Moscow)

Thermoanalytical study of the dehydration and thermal decomposition of rare earth bichromates

M. V. SAVELEVA, I. V. SHAKHNO
 (Lomonosov Institute of Preparative Chemical Technology, Moscow)

Study of the thermal stability of the thiourea coordination compounds of rare earth carboxylates and chlorides

YU. G. SAKHAROVA, G. M. BORISOVA, V. N. PEROV
 (Saratov State University)

Study of the thermal decomposition of organic cation iron(III)-cyanides

G. B. SEYFER, YU. YA. KHARITONOV, Z. A. TARASOVA

(Academy of Sciences of the U.S.S.R., Kurnakov Institute of General and Inorganic Chemistry, Moscow)

Cyanide ligand transfer in the thermal decomposition process of complex salts

V. B. SEYFER, YU. N. KHARITONOV, B. V. BORSHAGOVSKY, Z. A. TARASOVA

(Academy of Sciences of the U.S.S.R., Kurnakov Institute of General and Inorganic Chemistry, Moscow)

Thermal behaviour of gallium and hafnium double sulphates

YU. P. SOZINOV, R. A. POPOVA, L. D. MOTOV

(Kolsk Branch of the Academy of Sciences of the U.S.S.R., Apatity)

Thermal analysis of divalent-metal decavanadates

P. I. FEDOROV, V. K. ANDREEV

(Lomonosov Institute of Preparative Chemical Technology, Moscow)

Thermoanalytical estimation of the formation enthalpy of binary alkali compounds

K. A. CHUNTONOV, S. P. YATSENKO, S. P. BUSHMANOV, A. N. KUZNETSOV

(Uralian Scientific Centre of the Academy of Sciences of the U.S.S.R., Institute of Chemistry, Sverdlovsk)

Thermoanalytical study of some rare earth acetates

I. S. SHAPLYGIN, V. B. LAZAREV, V. P. KOMAROV

(Academy of Sciences of the U.S.S.R., Kurnakov Institute of Chemistry, Moscow and All-Union Polytechnical Correspondence Institute, Moscow)

Phase transformations at the thermal decomposition of alkali earth osmates(IV)

I. S. SHAPLYGIN, V. B. LAZAREV

(Academy of Sciences of the U.S.S.R., Kurnakov Institute of General and Inorganic Chemistry, Moscow)

Formation and thermal stability of RhMO₄ (M = element of the Vth group)

I. S. SHAPLYGIN, I. I. PROSYCHEV, V. B. LAZAREV

(Academy of Sciences of the U.S.S.R., Kurnakov Institute of General and Inorganic Chemistry, Moscow)

Study of the reaction between boric acid and salicylic acid by thermal analysis

E. M. SHVARTS, V. V. GRUNDSHTEYN

(Academy of Sciences of the Latvian S.S.R., Institute of Inorganic Chemistry, Riga)

Behaviour of rhodium(III) tri- and tetraamines during heating in air

L. K. SHUBOCHKIN, O. V. POPOV, E. F. SHUBOCHKINA

(Academy of Sciences of the U.S.S.R., Kurnakov Institute of General and Inorganic Chemistry, Moscow)

Study of the fluorination processes of some oxides with ammonium bifluoride

D. G. EPOV, M. A. MIKHAYLOV, E. I. MELNICHENKO

(Far-East Scientific Centre of the Academy of Sciences of the U.S.S.R., Institute of Chemistry, Vladivostok)

Application of the DTA method for checking the purity of synthetical RbI₃

D. D. YUSHINA, I. C. KOCHERGINA, I. G. ROZANOV

(Uralian Scientific Centre of the Academy of Sciences of the U.S.S.R., Institute of Electrochemistry, Sverdlovsk)

Thermoanalytical study of schoenite-type sulphate and sulphite compounds

O. K. YANATEVA, V. T. ORLOVA, N. M. SELIVANOVA, L. A. PRIMOVA
 (Academy of Sciences of the U.S.S.R., Kurnakov Institute of General and Inorganic Chemistry, and Mendeleev Institute of Chemical Technology, Moscow)

*Organic substances, polymers**Thermal properties of cellulose acetates*

V. M. AVERIANOVA, N. I. PANINA
 (Saratov State University)

Thermal analysis of microcrystalline solutions of poly (p-phenylene-terephthalamide)

I. N. ANDREEVA, N. V. VASILEVA, B. G. KULICHIKHIN, A. T. KALASHNIK, S. P. PAPKOV
 (All-Union Research Institute of Man-Made Fibres, Mytishchi)

Study of polymer cross-linking by derivatography

L. V. BARKOVA, E. T. GEVORKYAN
 (All-Union Research Institute of Electromechanics, Istra)

Study on the kinetics of complex transformations in organic compounds by multiple thermoanalytical techniques

YA. A. BELIKHMAER, S. I. SMOLYANINOV, L. V. SHISHMINA
 (Tomsk Polytechnical Institute)

Thermal decomposition of simple amides and their salts

B. A. BEREMZHANOV, N. N. NURAKHMETOV
 (Kirov Kazakh State University, Alma-Ata)

Thermoanalytical study of benzoamide compounds

B. A. BEREMZHANOV, N. N. NURAKHMETOV, R. SH. ERKASOV
 (Kirov Kazakh State University, Alma-Ata)

DSC study of the melting characteristics of polyacetals depending on their crystal structure

V. S. BIL, N. I. KUZINA, E. V. SAMARUDKOV
 (Research Institute of Plastics, Moscow)

Thermal analysis of irradiated amorphous and amorpho-crystalline polycarbonate films

V. S. BIL, N. I. KUZINA, E. V. SAMARUDKOV, V. I. SERGEEV, V. S. TIKHOMIROV
 (Research Institute of Plastics, Moscow)

Thermoanalytical study of the thermooxidative destruction of polysiloxanes filled with dispersed metal oxides

M. T. BRYK, V. K. KARDANOV
 (Academy of Sciences of the Ukrainian S.S.R., Institute of Colloid Chemistry and Water Chemistry, Kiev)

Thermal decomposition of arsenic acids and their alkylammonium salts

V. S. GAMAYUROVA, K. A. AVVAKUMOVA, B. D. CHERNOKALSKY
 (Kazan Institute of Chemical Technology)

Study of the thermal decomposition of ferrocene derivatives by differential mass spectrometry and DSC

P. N. GAPONIK, V. G. GUSLEV, O. A. IVASHKEVICH, I. I. KOLBASKO, A. I. LESNIKOVICH
 (Lenin Belorussian State University, Minsk)

Thermal and kinetic analysis of the thermal destruction of styrene-divinylbenzene copolymers

V. M. GORBACHEV, V. B. DURASOV, S. F. NIKITINA, V. I. FIRSOV

(Siberian Department of the Academy of Sciences of the U.S.S.R., Institute of Inorganic Chemistry, Novosibirsk)

Effect of the structure of carbon fibres on their stability to oxidation at high temperatures

V. O. GORBACHEVA, T. K. MIKHAYLOVA, N. F. EROFEEVA, L. D. VAZHEVA,

T. A. GALASHKOVA

(All-Union Research Institute for Man-Made Fibres, Mytishchi)

Thermal decomposition of lignin in the presence of inorganic additives

G. V. DOBELE, G. E. DOMBURG

(Academy of Sciences of the Latvian S.S.R., Institute of Wood Chemistry, Riga)

Thermal destruction of celloignins

G. E. DOMBURG, G. V. DOBELE, T. E. SHARPOVA, T. N. SKRIPCHENKO

(Academy of Sciences of the Latvian S.S.R., Institute of Wood Chemistry, Riga)

Thermal properties of poly(vinyl alcohol) films prepared from organic solvents

L. G. DUBINA, G. F. MIKULSKY, A. S. BUNTYAKOV

(Saratov State University)

DTA of metal-filled polymers

N. I. EGORENKO, D. G. LIN, V. A. BELY

(Academy of Sciences of the Belorussian S.S.R., Institute of the Mechanics of Metal-Polymer Composites, Minsk)

Utilization of thermoanalytical data for determining the primary solvation number of ions with sp-connected shells

E. F. IVANOVA, A. I. KRUGLYAK

(Kharkov State University)

Utilization of DTA for structural studies of crystalline copolymers, polymer blends and filled polymers

S. A. KAMAROVSKAYA, L. V. ZARINYA, A. E. KREYTUS

(Polytechnical Institute Riga)

Study of phase diagrams of microcrystalline substances by DTA and polythermal microscopy

G. I. KARPUSHKINA, N. K. SEMENDLYAEVA, A. A. KOTLYAR, V. N. SHOSHIN

(Academy of Sciences of the U.S.S.R., Institute of General and Inorganic Chemistry, Moscow)

Application of DTA in structural-chemical studies of carbon materials

V. I. KASATOCHKIN, E. S. MUTKINA, V. M. ELIZEN

(All-Union Research Institute for Electrocarbon Components, Moscow)

Study of the thermal destruction of some poly(amido-arylazols) by thermal analysis

V. N. KOLOT, G. I. KUDRYAVTSEV, I. F. KHUDOSHEV, I. YA. KVITKO

(All-Union Research Institute for Man-Made Fibres, Mytishchi)

Thermal analysis of polyfunctional organotitanium oligomers

V. V. KRIVONISHCHENKO, V. I. ABRAMOVA, A. D. SUVOROV

(Uralian Scientific Centre of the Academy of Sciences of the U.S.S.R., Institute of Chemistry, Sverdlovsk)

Thermal analysis of carbon materials

N. A. LAPINA, V. S. OSTROVSKY

(Moscow)

Application of EGA by mass spectrometry for studies of macromolecular compounds

I. M. LUKASHENKO, R. A. KHMELNITSKY, G. A. KALINKEVICH, E. S. BRODSKY, V. A. KONCHITS, A. YU. TOMASHCHUK
(Timiryazev Agricultural Academy, Moscow)

Dependence of phase transformation temperatures on the effect of substituents, as evidenced by the example of arylanilides

N. P. LUSHINA, A. I. BLESNOVA, V. I. STRELKOVA, I. G. STUKALOVA, A. G. KHOMSKAYA
(Polytechnical Institute, Kuybishev)

Methodological particulars of DTA for systems consisting of low-melting nematic liquid crystals

V. A. MOLOCHKO, O. P. CHERNOVA, G. M. KURDYUMOV
(Lomonosov Institute of Preparative Chemical Technology, Moscow)

TG study of polycondensation products of cyclophosphazenes

A. F. NIKOLAEV, V. M. BONDARENKO, A. N. AFANASEVA, A. V. AFANASEV,
M. V. VINOGRADOV
(Lensovet Technological Institute, Leningrad)

Study of the reaction of trivalent phosphorus with ketones by DTA

S. KH. NURTDINOV, N. M. ISMAGILOVA, R. B. SULTANOVA, V. S. TSIVUNIN
(Kirov Institute of Chemical Technology, Kazan)

Study of the thermal decomposition of polymers by DSC and TGA

V. P. OBIDIN, YU. E. FRAYMAN, F. B. YUREVICH
(Academy of Sciences of the Belorussian S.S.R., Lykov Institute for Heat and Mass Transfer, Minsk)

Thermoanalytical study of the effect of the gas atmosphere on the carbonization of carbon materials

V. S. OSTROVSKY, N. A. LAPINA, N. A. MAKSIMOVA, E. M. CHEREDNIK
(Moscow)

Study of the thermal properties of primary and secondary cellulose acetates and their blends with other polymers

M. V. POLOVNIKOVA, B. E. GELLER
(Institute of the Textile and Light Industry, Tashkent)

Thermal analysis of phosphines

G. V. ROMANOV, A. N. PUDOVKIN, E. M. LAVROV, M. SH. YARFAROV
(Kazan Branch of the Academy of Sciences of the U.S.S.R., Arbuzov Institute of Organic and Physical Chemistry)

Method for studying the effect of thermal decomposition on some strength properties of the surface layers of polymer composites subjected to intense thermal action

YU. I. AKUNENKO, V. S. BIL
(Research Institute of Plastics, Moscow)

Effect of the heating rate on the parameters of the TG curves of some polymers

YU. I. SAKUCHENKO, V. S. BIL
(Research Institute of Plastics, Moscow)

Thermal analysis of thermotropic liquid crystals

A. A. SITNOV, I. P. ZHUK
(Academy of Sciences of the Belorussian S.S.R., Institute of Heat and Mass Transfer, Minsk)

Study of humic and fulvic acids by EGA using mass spectrometry

R. A. KHMELNITSKY, V. A. CHERNIKOV, YA. YA. KRYMSKY, I. M. LUKASHENKO, T. V. NAZAROVA, V. A. RASKATOV
(Timiryazev Agricultural Academy, Moscow)

Prediction and determination of the coordinates of eutectic compositions in multiconstituent liquid crystal systems

P. O. CHERNOVA, V. A. MOLOCHKO, G. M. KURDYUMOV
(Lomonosov Institute of Preparative Chemical Technology, Moscow)

Application of complex DTA in studies of microbiological synthesis product

I. M. CHIRKOV, A. T. AYSAKOV, V. A. GAVRISH, S. V. MAVRINA
(All-Union Research Institute for the Biosynthesis of Proteins)

Study of the thermooxidative destruction of metal-filled polymers

T. V. CHUBAR, V. N. VYSOTSKAYA, Z. G. BOVKUN, V. K. KARDANOV, M. T. BRYK
(Academy of Sciences of the Ukrainian S.S.R., Institute of Colloidal Chemistry and Chemistry of Water, Kiev)

Study of the recrystallization process based on stepwise thermal analysis

M. SH. YAGFAROV
(Kazan Branch of the Academy of Sciences of the U.S.S.R., Arbuzov Institute of Organic and Physical Chemistry, Kazan)

Thermoanalytical determination of the heat of evaporation for some classes of phosphoroorganic compounds

M. SH. YAGFAROV, N. S. IGONINA
(Kazan Branch of the Academy of Sciences of the U.S.S.R., Arbuzov Institute of Organic and Physical Chemistry, Kazan)

*Oxide and metallic systems, glassy substances**Derivatographic study of the heterogeneous catalytic system $\text{KH}_2\text{PO}_4 - \text{SiO}_2 - \text{Al}_2\text{O}_3$*

N. A. ANDREEVA, A. M. DVOSKY, N. I. POPOVA
(Lensoviet Technological Institute, Leningrad)

Derivatographic study of the heterogeneous catalytic system "vanadium catalyst KS"

N. A. ANDREEVA, S. YU. ELISEEV
(Lensoviet Technological Institute, Leningrad)

TG studies of $\text{PbB}'_{-\beta} \text{B}''_{\beta} \text{O}_3$ -type compounds and their formation reactions from oxides

I. N. BELYAEV, O. N. RAZUMOVSKAYA, T. B. TOKMYANINA
(State University Rostov)

Study on the oxidation mechanism of vanadium-containing converter slags by thermal analysis and dilatometry

N. A. BATOLIN, N. G. MOLEVA
(Uralian Scientific Centre of the Academy of Sciences of the U.S.S.R., Institute of Metallurgy, Sverdlovsk)

Utilization of the instrument "Setaram" for studying the kinetics of disintegration of mixed oxides (on the example of the synthesis of CaMoO_4 and SrMoO_4)

S. F. VEKSLER, M. S. MARKOV, E. V. TKACHENKO, V. M. ZHUKOVSKY
(Uralian State University, Sverdlovsk)

DTA study of microinhomogeneous structure in glasses

N. V. GABUNIYA

(Gruzian Research Institute of Building materials, Tbilisi)

DTA study of phase transformations in non-equilibrium alloys of the Al-Mn and Al-Cr-C systems

B. O. GORIACHOK, R. D. VENGRENOVICH, I. V. ZHAROVSKY

(State University Chernovets)

*TG study of powders subjected to various mechanochemical processes*I. V. ZHAROVSKY, P. I. MELNIK, I. F. MIRONYUK, B. O. GORIACHOK, R. D. VENGRENOVICH
(State University Chernovets)*Thermoanalytical study of phases with varying compositions*

V. A. ZHILYAEV

(Uralian Scientific Centre of the Academy of Sciences of the U.S.S.R., Institute of Chemistry, Sverdlovsk)

Derivatographic study of the oxidation mechanism of niobium carbide

V. A. ZHILYAEV, T. A. TIMOSHUK

(Uralian Scientific Centre of the Academy of Sciences of the U.S.S.R., Institute of Chemistry, Sverdlovsk)

Thermal study of the system $B_2O_3-SO_3-H_2O$

S. N. KONDRADEV, S. I. MELNIKOVA

(Kirov Chemical-Technological Institute, Kazan)

Thermoanalytical study of iron alloys containing 25–30% nickel, in relation to atom arrangement and memory effect

I. I. KORNILOV, N. M. MATVEEVA, A. A. KOLYADA

(Baykov Institute of Metallurgy, Moscow)

Study of phase transformations in the system $HfO_2-Pr_2O_3-Dy_2O_3$ by DTA and conductivity measurement up to 2100 °C

A. K. KUZNETSOV, P. A. TIKHONOV, M. V. KRAVCHINSKAYA, E. K. KELER

(Grebenshchikov Institute of Silicate Chemistry, Leningrad)

DTA study of the products of iron corrosion under coastal conditions of the Baltic

O. K. KUKURS, A. YU. UPITE, A. YA. VAJVAD, I. M. PURVINSH, A. A. MYAGKOVA

(Academy of Sciences of the Latvian S.S.R., Institute of Inorganic Chemistry, Riga)

Thermal analysis of the reaction product of zirconium dioxide and gaseous selenium dioxide

V. P. NESTERENKO

(Belorussian Technological Institute, Minsk)

Study on the kinetics of the synthesis and crystallization of complex semiconductor compounds by statistical thermal analysis

I. V. NIKOLAEV, B. I. KIDYAROV

(Siberian Department of the Academy of Sciences of the U.S.S.R., Institute of Semiconductor Physics, Novosibirsk)

Thermoanalytical study of cadmium-containing amalgams

M. V. NOSEK, N. A. ATAMANOVA

(Academy of Sciences of the Kazakh S.S.R., Institute of Chemistry, Alma-Ata)

Thermoanalytical study of the formation of ferroelectric phases in the $BaO-Na_2O-Nb_2O_5-TiO_2$ system

L. M. PROSKUYAKOVA, E. K. ZVORYKINA, V. A. SUCHILIN

(State University, Rostov)

Study of the carbothermal reduction of iron oxides containing chromium at non-isothermal heating

D. I. RYZHONOV, V. A. KOLCHANOV, S. B. SORIN
(Moscow Institute of Steel and Alloys)

DTA for studying reduction processes

D. I. RYZHONOV, V. A. KOLCHANOV, T. S. SHISHKHANOV, I. V. MELENTEV
(Moscow Institute of Steel and Alloys, and Scientific Department Tulchermet, Tula)

Application of DTA for studies of refractory oxide systems

A. V. SHEVCHENKO, L. M. LOPATO
(Academy of Sciences of the Ukrainian S.S.R., Institute of Material Testing, Kiev)

Potentials for studying the kinetics of glass crystallization by DTA

P. G. Usov, E. P. TSIMBALYUK, V. I. VERESHCHAGIN
(Tomsk Polytechnical Institute)

Investigation of solid-phase reactions by thermoanalytical and high-frequency methods

V. F. UST-KACHKINTSEV, F. R. VERZHBITSKY, G. B. PETROVA
(Gorky State University, Perm)

Study of some amalgams by quantitative DTA

L. M. FILIPPOVA, A. I. ZEBREVA, N. D. OMAROVA
(Kirov Kazakh State University, Alma-Ata)

Study of some structural transformation of glasses taking place at their thermal processing

L. G. KHOLSKY, A. E. KOFRMAN, M. T. MELNIK, V. S. KAMINSKAYA, A. I. BRAZGOVSKAYA,
L. K. USHAKOVA
(Academy of Sciences of the Belorussian S.S.R., Institute of General and Inorganic
Chemistry, Minsk)

Mineralogy and applied mineralogy

Thermoanalytical study of rare earth-alumina garnets

S. F. AKHMETOV, G. L. AKHMETOVA, G. A. GAZIZOVA, V. S. KOVALENKO,
T. F. MIRENKOVA

Thermoanalytical study of natural apatite-like calcium phosphates

V. Z. BLISKOVSKY, T. S. KUZMINA

Application of TG for mineral fertilizer investigations

V. M. BORISOV, YU. V. AZHIKINA
(Research Institute for Fertilizers, Insecticides and Fungicides, Moscow)

DTA for studies on phase transformations in solid solutions based on lithium orthosilicate

E. I. BURMAKIN, I. G. ROZANOV, I. G. DUBROVINA, G. K. STEPANOV
(Uralian Scientific Centre of the Academy of Sciences of the U.S.S.R., Institute of Electro-
chemistry, Sverdlovsk)

DTA study of solid electrolytes based on NaAlO₂

E. I. BURMAKIN, I. G. ROZANOV, G. SH. SHEKHTMAN, G. K. STEPANOV
(Uralian Scientific Centre of the Academy of Sciences of the U.S.S.R., Institute of Electro-
chemistry, Sverdlovsk)

Study on the thermal stability and synthesis conditions of calcium and magnesium silicates

N. A. VESELOVA, V. M. ZHUKOVSKY, N. V. TKACHENKO, M. S. MARKOV

The nature of water and phase transformations in the course of heating in the structure of seladonite

G. V. GVAKHARIYA, T. V. BATIASHVILI, D. D. KOTELNIKOV

Composition and nature of transformations in thermal processing of coal-dressing refuse

N. P. GORYUNOVA, Yu. V. IRKIN, N. K. SEMENDYAEVA, M. Ya. SHPIRG

(Academy of Sciences of the U.S.S.R., Institute of Mineral Fuels, Institute of General and Inorganic Chemistry, Moscow)

Thermoanalytical study of fozhasite-type zeolites deficient in sodium and aluminium

V. Ya. DANYUSHEVSKY, I. V. MISHIN, L. I. LAFER, V. I. YAKERSON, A. M. RUBINSHTEYN
(Academy of Sciences of the U.S.S.R., Zhelinsky Institute of Organic Chemistry, Moscow)

Thermal study of the minerals belonging to the isomorphous series magnesioribekite—ribekite—glauophane

Z. P. ERSHOVA

(Academy of Sciences of the U.S.S.R., Institute of the Geology, of Ore Deposits, Petrography, Mineralogy and Geochemistry, Moscow)

Application of DTA to predict the liability of sulphidic ores to oxidation and self-ignition

I. N. ZAJTSEVA, E. V. GAVRILOVA

Thermoanalytical and x-ray studies of some secondary minerals from kimberlites and surface soil from Yakutland

N. N. ZINCHUK, D. D. KOTELNIKOV, A. L. KHARKIV

Application of thermal analysis for the study of the reaction products of borates and monocarboxylic acids

V. G. KALACHEVA, I. L. EREMEEVA, G. E. KIM, D. G. GUBASHEVA, I. D. LEONOV

On the significance of thermal analysis in determining the mineralogical composition of anthophyllite— asbestos ores

B. K. KASATOV, N. V. LUTSKINA, G. I. KUSHNYR

(All-Union Geological Research Institute, Leningrad)

Thermoanalytical study of the ammonium forms of zeolites

E. K. KVANTALIANI, G. O. PILOYAN, G. V. TSITSISHVILI

(Academy of Sciences of the Gruzian S.S.R., Institute of Physical and Organic Chemistry, Tbilisi)

High-temperature transformations of augelite

B. M. KOBTSEV

Properties of mica and their change in the course of heating

B. N. KOLODIEV, M. A. LITSAREV, G. P. PILOYAN, I. V. ARKHANGELSKY

Determination of secondary re-formations in plagioclases by thermal analysis

T. A. KORNEVA

Thermal study of vivianite

A. G. KOTLOVA, N. I. SHCHEPOCHKINA

(Academy of Sciences of the U.S.S.R., Institute of Geology of Ore Deposits, Petrography, Mineralogy and Geochemistry, Moscow)

DTA combines with conductivity measurement for investigating Portland cement clinker

I. V. KRAVCHENKO, M. T. VLASOVA, V. Yu. YUDOVICH, G. I. CHISTYAKOV,

G. V. CHEREPKOVA

(All-Union State Research Institute of the Cement Industry, Moscow)

DTA study of the hydration products of swelling cement

I. V. KRAVCHENKO, T. V. KUZNETSOVA

(All-Union State Research Institute of the Cement Industry, Moscow)

Application of DTA for characterizing the elementary processes in cement hydration

I. V. KRAVCHENKO, B. E. YUDOVICH, G. M. TARNARUTSKY, G. I. CHISTAKOV,

G. V. CHEREPKOVA

(All-Union State Research Institute of the Cement Industry, Moscow)

Thermoanalytical study of fibrous minerals from the serpentine group

E. P. KRAINEVA

(All-Union Research and Design Institute of the Asbestos Industry, Asbest)

Changes in carbonaceous-graphitic rocks based on dynamomorphism, evidenced by the DTA method on the example of the South Ural

G. I. KRYLOVA

(All-Union Research Institute for the Synthesis of Mineral Raw Materials, Aleksandrov)

Low-temperature desorption analysis as a method for studying the structure of hydrosilicate systems

O. P. MCCHEDLOV-PETROSYAN, YU. LIBENKO, D. A. UGINCHUS

(Kirov Institute of Railway Transport Engineering, Kharkov)

Study of the nature of water in amorphous silica

G. P. PANASYUK, G. P. BUDOVA, V. B. LAZAREV, M. N. DANCHEVSKAYA,

B. P. MAKAROV

(Academy of Sciences of the U.S.S.R., Institute of General and Inorganic Chemistry, Moscow)

Study on the nature of the storage of the energy of ionizing radiation in muscovite crystals by DTA

E. A. PODPIETNEVA, V. I. PODPIETNEV

(Institute of High-Pressure Research of the Polytechnical Institute, Tomsk)

Reactions during heating the systems $Me_2O - CaO - Al_2O_3 - SiO_2 - NO_3^- - CO_3^{2-} - H_2O$

A. P. PROTOSYUK

(Kolsk Branch of the Academy of Sciences of the U.S.S.R., Apatity)

Reactions of alkali and calcium nitrates and carbonates with kyanite

A. P. PROTOSYUK

(Kolsk Branch of the Academy of Sciences of the U.S.S.R., Apatity)

Thermoanalytical study on the interaction of the particles in clay minerals

I. B. SAMATOV

(Academy of Sciences of the Kazakh S.S.R., Satpaev Institute of Geology, Alma-Ata)

Thermal study of the dehydration of synthetic zeolites

V. V. SAMUSKEVICH, E. A. PRODAN, M. M. PAVLYUCHENKO

(Academy of Sciences of the Belorussian S.S.R., Institute of General and Inorganic Chemistry, Minsk)

Application of thermal analysis for studying the physico-chemical changes occurring in thermal processing of manganese ores

L. K. SVANIDZE, D. V. MOSIYA, T. N. ZAGYU, T. I. SIGUA

(Academy of Sciences of the Gruzian S.S.R., Institute of Metallurgy, Tbilisi)

Application of thermal analysis for the identification of absorption bands in the IR spectra of hydrated clinker minerals

M. I. TATARINTSEVA, A. T. LOGVINENKO, G. D. URYVAEVA

(Sibirian Department of the Academy of Sciences of the U.S.S.R., Institute of Physico-Chemical Fundamentals for Processing Mineral Raw Materials, Novosibirsk)

Kinetics of the non-isothermal dissociation of the constituents of set cement

L. G. FILATOV

(Research Design Institute of Industrial Building, Kharkov)

Thermogravimetric interaction in natural compounds of silica and alumina

V. F. CHURBAKOV, I. V. OSTACHKOVA, V. I. MEDVEDEV, E. I. KUTUZOVA,

A. V. MEDVEDEV

(Moscow Institute of Mining)

TG study of physico-chemical interactions in the system $CaO - MgO - SiO_2 - Al_2O_3$

V. F. CHURBAKOV, I. V. OSTASHKOVA, V. I. MEDVEDEV, E. I. KUTUZOVA,

A. V. MEDVEDEV

(Moscow Institute of Mining)

Application of thermal analysis to elucidate the nature of bonds between organic and mineral matter in the soil and the structure of humic compounds

V. A. CHERNIKOV, V. A. KONCHITS

(Timiryazev Agricultural Academy, Moscow)

Semi-quantitative TG analysis of water-containing mineral systems, on the example of zeolitic rocks

E. H. SHLYAPKINA

(All-Union Geological Research Institute of Non-Ore Mineral Deposits, Kazan)