

Events

INTERNATIONAL SYMPOSIUM ON MACROMOLECULAR CHEMISTRY

The International Symposium on Macromolecular Chemistry organized by the Hungarian Academy of Sciences under the sponsorship of IUPAC was held in Budapest on 25–30 August 1969. The subject of the Symposium was: Kinetics and Mechanism of Polyreactions. The full text or the detailed abstract of the lectures was published in the form of preprints by Akadémiai Kiadó, Budapest, 1969.

The following lectures of thermoanalytical interest were delivered on the meeting:

Conductometric and dielectric study of the degradation of poly(vinyl chloride) compounds.
M. Kisbényi, P. Hedvig (Research Institute for Plastics, Budapest, Hungary)

On thermal dehydrochlorination of model compounds of poly(vinyl chloride).
L. Valko, I. Tvaroška (Institute of Physical Chemistry of the Slovak Technical University, Bratislava, Czechoslovakia)

Degradation of PVC with organoaluminium compound.
A. Guyot, P. Rocanière, M. Bert (CNRS Institut de Recherches sur la Catalyse, 39 Boulevard du 11-Novembre-1918, Villeurbanne, France)

L'étude de la compatibilité des systèmes binaires et ternaires constitués par polychlorure de vinyle, polyacétate de vinyle et leur copolymère "Covicet".
I. A. Schneider, C. Vasile (Institut de Chimie Macromoléculaire "P. Poni", Jassy, Roumanie)

Thermal degradation of poly acrylonitrile obtained by radiation polymerization in urea channels.
P. Hedvig, L. Kiss (Research Institute for Plastics, Budapest, Hungary)

Über die Kinetik des thermischen Abbaues von Polystyrolen.
C. Vasile, C. N. Cascaval, I. A. Schneider (Institut für Makromolekulare Chemie der Akademie, Jassy, Rumänien)

The thermal degradation of polystyrene: some theoretical considerations of the mechanism.
G. A. Cameron, I. T. Walter (Department of Chemistry, the University of Aberdeen, Old Aberdeen, Scotland)

Kinetic of thermal and acidic degradation of poly-1,3-dioxan.

L. V. Karmilova, E. N. Kumpanenko, A. I. Varshavskaja (Institute of Chemical Physics, Academy of Sciences of the USSR, Moscow, USSR) In Russian

Decyclisation — Basic-state of thermal degradation of cis-polyisoprene.

A. S. Kuzminskij, A. A. Sokolowskii, V. V. Sedov, N. I. Kirshenstein (Institute for Rubber Industry, Moscow, USSR) In Russian

Study of thermal and thermooxidative degradation of aromatic polyimides.

I. A. Arkhipova, S. R. Rafikov, N. I. Buketova (Institute for Chemistry, Academy of Sciences of the Kazan SSR, Alma-Ata, USSR) In Russian

Thermal degradation of polyvinylpyridine and its copper chelates.

G. Geuskens, M. Borsu, E. Hellinckx, C. David

Thermal degradation of polymers from lactones.

V. Jaacks, S. Iwabuchi, F. Galil (Institute of Organic Chemistry, Universität Mainz, GFR)

Study of the thermal decomposition and stabilization of phenol-formaldehyde resins.

R. M. Aseeva, K. Al'manbetov (Institute of Chemical Physics, Academy of Sciences of the USSR, Moscow, USSR) In Russian

A comparative study of some methods of assessing kinetic parameters from thermogravimetric analysis.

J. R. Mac Callum, J. Tanner (Department of Chemistry, St. Andrews University, St. Andrews, Fife, Scotland)

Kinetic investigation of thermic degradation of polymers by means of dynamic thermogravimetry.

T. Székely, F. Till, Gy. Borossay (Laboratory for Inorganic Chemistry of the Hungarian Academy of Sciences, Budapest, Hungary)

A thermogravimetric study of hydrocarbon condensation copolymers.

J. R. Mac Callum, D. H. Richards, J. Tanner (The Department of Chemistry, The Purdie Building, The University of St. Andrews, St. Andrews, Fife, Scotland)

Untersuchungen auf dem Gebiete des thermischen Abbaues von Cellulosen. II. Das thermogravimetrische Verhalten von Aminocellulosen.

N. Hurduc, I. A. Schneider, Cr. Simionescu (Lehrstuhl für phys. Chemie der "Al. I. Cuza" Universität, Jassy, Rumänien)

Thermoanalytic study of cross-linked polymers containing isocyanuric rings.

H. Alimanov, N. Andonova (Research Institute for Chemical Industry, Sofia, Bulgaria)

Investigation of mechanical degradation products of polymers by means of rubbing and wear.

S. I. Sadykh-Zade, V. A. Mustafaev, T. S. Balokhanova (Institute for Petrochemical Processes, Academy of Sciences of the Azerb. SSR, Sumgaut, USSR) In Russian

Investigations of thermal elimination reactions of polymers by thermal volatilization analysis and ultraviolet spectroscopy.

D. L. Gardner, I. C. Mc Neill (Chemistry Department, University of Glasgow, Glasgow W 2, Scotland)

Thermal degradation of vinyl chloride/vinyl acetate copolymers. I. Bulk degradation studies by thermal volatilization analysis and thermogravimetry.

N. Grassie, I. F. McLaren, J. C. Mc Neill (Chemistry Department, University of Glasgow, Glasgow W 2, Scotland)

Thermal degradation of poly-s-vinylmonothioacetals in the mass spectrometer.

R. Kroker, H. Ringsdorf, U. Zahorszky (Institute for Polymers, University of Marburg, GFR)

Thermal degradation of polyvinyl chloride. I. Structural effects in the initiation and decomposition chain lengths.

V. P. Gupta, L. E. St. Pierre (Department of Chemistry, McGill University, Montreal, Canada)

Investigation of the stabilization mechanism of polyvinyl chloride with salts of lead.

E. N. Zilberman, A. E. Kulikova, S. V. Neuman, N. A. Okladnov, V. P. Lebedev (Dzershinsk, USSR) In Russian

Synthesis and properties of ordered aliphatic polybenzoxazoleamide copolymers and fibers.

W. De Winter, C. Masquelier, W. Gouwy (NBC Laboratoire Central, Drogenbos, Belgique)

Synthesis of coordination polymers with basic inorganic chain of molecule.

A. M. Poljakova, O. V. Vinogradova, M. D. Suchkova (Institute for Elemental Organic Compounds, Acad. Sci. SSSR, Moscow, USSR) In Russian

Transformation of chlorethylene by aprotonic acids.

E. N. Zilberman, A. E. Kulikova, N. M. Pinchuk, N. N. Taikova, N. A. Okladnov (Dzerzhinsk, USSR) In Russian

Radiation-induced graft-polymerisation of methyl-methacrylate on flaky glass surface.

F. Higashide, Y. Kanazawa (Division of Technopharmaceutical Science, 160 Oshika, Shizuoka-shi, Japan)

FOURTH ALL-UNION CONFERENCE ON THERMOGRAPHY

The IVth All-Union Conference on Thermography was held in Moscow, March 25–28, 1969. This conference was organized by the Department of Physics-Chemistry and Technology of Inorganic Materials of the Academy of Sciences and Kurnakov Institute of General and Inorganic Chemistry. The Conference was attended by many representatives of various laboratories and institutes of the USSR.

There were four sections: *a)* methods and apparatus of thermal analysis; *b)* inorganic materials; *c)* minerals, silicates, glass, cement; *d)* products of organic synthesis and polymers. The results of the application of thermal analysis to study the behaviour of different substances when heated and to determine the nature of the processes have been presented by many papers.

The techniques used have been described and their further improvement has been outlined. The building of complex apparatus which would combine DTA

with other analytical methods: thermogravimetry, dilatometry, chromatography, magnetic susceptibility study and others was suggested.

It has been shown that thermoanalytical data can be used for quantitative estimation of some thermophysical and kinetic characteristics of the processes studied.

It was pointed out that standardization is inevitable in thermoanalytical methods. First of all, it concerns the standardization of the experimental conditions and the uniform reporting of data.

The conference demonstrated a prominence of the methods of thermal analysis in the study of the properties of different materials, as well as the importance of these methods in finding out the nature and the chemistry of transformations taking place in the course of heating

I. S. RASSONSKAYA

Plenary sessions

Application of thermography in the synthesis, analysis and structure investigations of inorganic compounds.

A. V. NIKOLAEV (Institute of Inorganic Chemistry of the Siberian Division of the Academy of Science of the U.S.S.R., Novosibirsk)

DTA investigation of dehydration, hydrolysis and phase activity.

L. G. BERG (State University, Kazan)

Thermographic investigation methods of the kinetics of solid \rightarrow solid + gas type exothermic reactions.

G. O. PILOYAN (IGEM of the Academy of Science of the U.S.S.R.)

Theory and practice of the thermography of cementing materials.

O. P. MCHEDLOV-PETROSYAN (Institute of Railway Engineering, Kharkov)

Thermography as a method for investigating the phase aggregate states of polymers and their changes.

B. YA. TEITELBAUM, N. P. ANOSHINA (Institute of General and Physical Chemistry of the Academy of Science of the U.S.S.R., Kazan)

Report of the I. and II. International Conferences on Thermal Analysis.

L. G. BERG, E. I. YAREMBASH.

On the work of the Standardization Committee of the International Confederation on Thermal Analysis.

I. S. RASSONSKAYA.

Sections

Portable automated thermogravimetric equipment.

Ch. M. KASHKAI (Institute of Geology of the Academy of Science of the Azerbaidzhan S.S.R.)

Equipment for DTA.

E. V. MASHINTSEV, V. M. NEIMARK, N. K. ERMILOV, L. S. SEDLOVICH, S. I. SYCHEV (Central Design Bureau for Individual Instruments of the Academy of Science of the U.S.S.R., Moscow)

Complex differential thermal analysis.

G. B. RAVICH, V. Z. KOLODYAZHNY, A. I. ZHEMARKIN (Institute of General and Inorganic Chemistry of the Academy of Science of the U.S.S.R., Moscow)

Thermographic investigations at high temperatures and pressures.

YA. A. UGAY, A. A. BITYUTSKAYA, E. G. GONCHAROV, N. E. SOLOVEV (State University, Voronezh)

Application of an autoresonance vibroamplitudinal low-frequency viscosimeter for simultaneous viscosity measurements on the pyrometer FPK-59.

A. G. BERGMAN, V. A. KOLESNIKOV, A. S. TRUNIN, A. M. GASANALIEV (Institute of Building Engineering, Rostov on the Don)

DTA without the use of standards.

A. A. KAMARZIN, YU. A. DYADIN, A. F. NEERMOLOV, V. A. GERASIMOV (Institute of Inorganic Chemistry, Siberian Division of the Academy of Science of the U.S.S.R., Novosibirsk)

Thermography of alloys in the form of large ingots and castings.

V. YA. BILYK (Polytechnical Institute, Leningrad)

A new method of thermography based on the relative distribution of the spectral energy density of radiation.

D. YA. SVET (Institute of Metallurgy of the Academy of Science of the U.S.S.R., Moscow)

Investigation of the thermal and magnetic properties of some minerals.

I. L. LAPIDES, S. B. BRANDT (Geochemical Institute of the Siberian Division of the Academy of Science of the U.S.S.R., Irkutsk)

Use of computers for the identification of minerals belonging to the carbonate group in thermograms.

V. I. CHERNISHEV, V. P. IVANOVA, L. S. GELTMAN, Yu. K. BURKOV, Yu. A. SIMUNIN (All-Union Research Institute of Geology, Leningrad, Research Institute of Mineral Raw Materials, Perm)

Microthermographic analysis of minerals.

L. I. RYBAKOVA, P. E. KOMMISSAROV, T. V. KHROMOVA (All-Union Research Institute of Mineral Raw Materials, Moscow)

Thermal analysis under vacuum and inert atmosphere conditions.

V. L. VOLKOV, A. A. FOTIEV (Institute of Chemistry of the Uralian Branch of the Academy of Science of the U.S.S.R., Sverdlovsk)

Combined method for investigating phase diagrams.

M. P. GLAZYRIN, A. A. FOTIEV, V. A. MAKAROV (Institute of Chemistry of the Uralian Branch of the Academy of Science of the U.S.S.R., Sverdlovsk)

Melt diagrams obtained by a static method based on vapour pressure measurements.

A. K. BAEV, S. E. OREKHOVA, L. G. FEDULOVA (Belorussian Technological Institute, Minsk)

Specific features of processes in respect to quantitative thermal analysis.

L. G. BERG, V. I. EGUNOV (State University, Kazan)

Thermodynamic investigation of the heating curve method of binary systems.

N. K. VOSKRESENSKAYA, I. B. MARKINA (Institute of General and Inorganic Chemistry of the Academy of Science of the U.S.S.R., Moscow)

Application of thermography for the investigation of high-temperature processes in oxide systems.

A. K. KUZNETSOV, E. K. KEJLER (Institute of Silicate Chemistry of the Academy of Science of the U.S.S.R., Leningrad)

Thermographic and thermochromatographic investigation of the formation of some industrial catalysts.

E. Z. GOLOSMAN, V. I. YAKERSON, Yu. M. SHUTOV (Branch of the State Institute of the Nitrogen Industry, Novomoskovsk, Institute of Organic Chemistry of the Academy of Science of the U.S.S.R., Moscow)

Application of thermography combined with gas chromatography for the investigation of heterogeneous catalytic systems.

V. A. FERAPONTOV, I. R. KONENKO, A. A. TOLSTOPYATOVA (Institute of Organic Chemistry of the Academy of Science of the U.S.S.R., Moscow)

Investigation of endothermic and exothermic effects in various materials by the method of varying external and internal heat and electric fields.

I. S. LISKER (Agrophysical Research Institute, Leningrad)

Some methodologic problems of low-temperature thermography.

V. A. MOLOCHKO, P. I. FEDOROV, G. M. KURDYUMOV (Research Institute of Reagents, Moscow, Technological Institute of Light Chemicals, Moscow)

Determination of the thermophysical characteristics of materials by DTA.

O. A. DEMIDOV, V. S. GORSHKOV (All-Union Research Institute for VNIINSM, Moscow)

Application of quantitative thermography for the investigation of the thermodynamics of melts.

V. I. BERSAK, M. N. SMIRNOVA (State Institute of Non-ferrous Metals, Moscow)

Application of nuclear γ -resonance for the identification of thermal effects.

G. B. SEIFER, B. V. BORSHAGOVSKY, V. I. GOLDANSKY, R. A. STUKAN, Z. A. TARASOVA (Institute of General and Inorganic Chemistry of the Academy of Science of the U.S.S.R., Moscow)

Universal equipment for differential thermal analysis.

N. M. GALBIDIS, B. G. STRONGIN, N. S. PARASINCHU (State University, Chernovtsy)

Application of thermography for the investigation of metallothermal reduction processes of metals from their chlorides.

V. D. SAVIN (State Institute for Non-ferrous Metals, Moscow)

The determination of thermophysical characteristics by DTA.

A. V. RALKO (Polytechnical Institute, Kiev)

Determination of thermophysical characteristics of electrovacuum-deposited metals in the temperature range of 20 to 400 °C by thermography.

S. I. SOROKIN, G. Yu. MESSEL (State University, Saratov)

Application of DTA for the investigation of heat transfer and crystallization processes in metals and alloys.

N. A. NEDUMOV, V. B. BESSONOV, V. A. EFIMOV, B. A. BUKLAN (Institute of Metallurgy of the Academy of Science of the U.S.S.R., Moscow, Institute for Casting Problems of the Academy of Science of the U.S.S.R., Kiev)

Development and applications of quantitative thermography.

Yu. P. BARSKY (All-Union Research Institute VNIIFTRI)

A novel method for quantitative thermography, the heat bridge method.
M. Sh. YAGFAROV (Institute of General and Physical Chemistry of the Academy of Science of the U.S.S.R., Kazan)

Application of quantitative thermography for the determination of the thermal characteristics of solid fuels.

A. A. AGROSKYN, E. I. GONCHAROV, L. V. LOVETSKY, L. A. MAKEEV (VZIPP, Moscow)

Investigation of the heat of crystallization of slags and of the thermal effects of the oxidation of iron ore pellets by thermography.

L. L. OSINOVSKY, B. P. YUREEV, S. G. BRATCHIKOV, M. I. PANFILOV, N. N. KOCHETOV, G. M. MAIZEL (Uralian Research Institute for Iron Metals, Sverdlovsk)

Investigation of the systems Be-LaBe₁₃, Be-CeBe₁₃, Be-ReBe₂₀ and Be-NbBe₁₂.
L. V. MOLCHANOVA, V. P. ZHEBELEV, N. D. NAGORSKAYA, A. B. HOBOSELOVA (State University, Moscow)

Thermographic investigation of the formation reactions of lanthanum and yttrium oxyhalogenides.

L. Ya. MARKOVSKY, E. Ya. PESINA, L. M. LOEV (State Institute of Applied Chemistry, Leningrad)

DTA of the formation of tungstates and molybdates of rare earths and other elements.

E. A. RODE, V. N. KARPOV, M. M. IVANOVA, G. M. BALAGINA, G. V. LYSANOVA, L. Z. GOKHMAN (Institute of General and Inorganic Chemistry of the Academy of Science of the U.S.S.R., Moscow)

Investigation of rare earth element-chalcogen systems.

E. I. YAREMBASH (Institute of General and Inorganic Chemistry of the Academy of Science of the U.S.S.R., Moscow)

Thermographic and X-ray investigation of the molybdates of rare earths.

L. A. DROBYSHEV, V. I. PONOMAREV, I. P. FROLKINA, YU. N. VENEVTSEV, G. C. ZHDANOV, YU. Ja. TOMASHPOLSKY (Physico-chemical Research Institute, Moscow)

The application of thermography in the synthesis of inorganic compounds.

A. V. NIKOLAEV, A. Q. OPALOVSKY, V. E. FEDOROV, K. A. KHADLOYANIDI (Institute of Inorganic Chemistry of the Siberian Division of the Academy of Science of the U.S.S.R., Novosibirsk)

Thermal analysis of the perchlorates of alkali and alkali earth metals.

A. S. KARNAUKHOV, I. N. LEPESHKOV, S. A. KUDRYAKOVA, E. N. TROITSKY (Pedagogic Institute, Yaroslavl, Institute of General and Inorganic Chemistry of the Academy of Science of the U.S.S.R., Moscow)

Application of thermography in the investigation of the chlorination of metal oxides and the sulphatation of calcium oxide.

A. N. KETOV, L. P. KOSTIN, V. V. LARIKOV (Pharmaceutical Institute, Perm)

Investigation of the meltability of salt systems containing uranium trichloride.

V. N. DESYATNIK, YU. T. MELNIKOVA, I. F. NICHKOV, S. P. RASPOPIN, V. V. MAKOSOV (Uralian Polytechnical Institute, Sverdlovsk)

Thermographic analysis of gallium alloys crystallizing at temperatures below 20 °C.

N. P. KOROLEVA, B. A. FOMIN (State Institute of Rare Metals, Moscow)

Thermal, microstructural and X-ray phase analysis of the system Cd-Sb.
E. I. YAREMBASH, M. L. KORSAKOVA, A. A. ELISEEV (Institute of General and Inorganic Chemistry of the Academy of Science of the U.S.S.R., Moscow)

Thermogravimetric investigation of the reactions in the solid-phase synthesis of zinc, cadmium and mercury tellurites and the thermal stability of these compounds.
L. Ya. MARKOVSKY, G. F. PRON (State Institute of Applied Chemistry, Leningrad)

DTA, microscopic, X-ray phase and spectral analysis for the investigation of phase transformations in zinc silicates and germanates.
I. A. BONDAR, A. Ya. VALTERE (Institute of Silicate Chemistry of the Academy of Science of the U.S.S.R., Leningrad)

Thermographic investigation of chemical and phase transformations of iron and aluminium phosphates in the process of preparing transparent polyphosphoric acid.
V. M. BORISOV, Yu. V. AZHIKINA (Research Institute for Fertilizers, Insecticides and Fungicides, Moscow)

Application of thermographic analysis for the investigation of phase transformations of aluminium hydroxides and oxides.
Z. F. OSHIS, L. K. LEPIN, A. Kh. BAUMANIS, B. M. KADEK (Institute of Inorganic Chemistry of the Academy of Science of the Latvian S.S.R., Riga)

Behaviour of iron oxide at the polymorphous transformation of quartz.
V. F. CHURBAKOV, I. B. KUDINOV (Mining Institute, Moscow, Institute of General and Inorganic Chemistry of the Academy of Science of the U.S.S.R., Moscow)

Application of thermography for the investigation of decomposition processes of higher selenium oxides.
E. E. SIDOROVA, K. N. MOCHALOV, S. N. KONDRATEV, G. I. BLAGOVESHCHENSKAYA (Institute of General and Physical Chemistry of the Academy of Science of the U.S.S.R., Kazan, Institute of Chemical Technology, Kazan)

Thermal decomposition of ferrocyanides and the polarisation characteristics of the extra-spherical cations.
G. B. SEIFER, Z. A. TARASOVA (Institute of General and Inorganic Chemistry of the Academy of Science of the U.S.S.R., Moscow)

Thermal decomposition of zirconium and hafnium borohydrides.
V. A. GRIGOREV, A. N. KANEV (Institute of Inorganic Chemistry of the Siberian Division of the Academy of Science of the U.S.S.R., Novosibirsk)

Thermal stability of alkali selenites.
T. B. KLUSHINA, N. M. SELIVANOVA (Institute of Chemical Technology, Moscow)

Thermal stability of sodium perxenate.
V. Ya. MISHIN, I. S. KIRIN, V. K. ISUPOV, Yu. K. GUSEV (Institute of Technical Physics of the Academy of Science of the U.S.S.R., Leningrad)

Investigation of the system $\text{Bi}_2\text{O}_3\text{-WO}_3$ and $\text{Bi}_2\text{O}_3\text{-MoO}_3$.
V. M. SKORIKOV, E. I. SPERANSKAYA, S. M. ANTONOVA (Institute of General and Inorganic Chemistry of the Academy of Science of the U.S.S.R., Moscow)

Investigation of the system CaO-TeO_2 by thermography.
M. Kh. KARAPETYANTS, K. K. SAMPLAVSKAYA, S. A. MALYUTIN (Institute of Chemical Technology, Moscow)

Estimation of melting heats of alkali metaphosphates by means of heating curves.
N. K. VOSKRESENSKAYA, I. B. MARKINA (Institute of General and Inorganic Chemistry of the Academy of Science of the U.S.S.R., Moscow)

Thermographic analysis of iron phosphate.
M. T. SAIBOVA, T. AZIZOV, M. KAZAKOV, N. A. PARPIEV (Institute of Chemistry of the Academy of Science of the Uzbekian S.S.R., Tashkent)

Thermal analysis and the investigation of dehydration processes.
I. S. RASSONSKAYA (Institute of General and Inorganic Chemistry of the Academy of Science of the U.S.S.R., Moscow)

Complex thermal analysis of hydrated vanadium pentoxide.
L. K. TOLSTOV, V. L. ZOLOTAVIN (Institute of Chemistry of the Uralian Branch of the Academy of Science of the U.S.S.R., Sverdlovsk)

Thermal analysis of crystal hydrates of rubidium and caesium double sulphates with lithium sulphate.
N. K. SEMENDYAEVA (Institute of General and Inorganic Chemistry of the Academy of Science of the U.S.S.R., Moscow)

Investigation of the structure of the coordination spheres of EDTA chelates by thermal analysis data.
V. A. LOGVICHENKO, A. V. NIKOLAEV, L. I. MYACHINA (Institute of Inorganic Chemistry of the Siberian Division of the Academy of Science of the U.S.S.R., Novosibirsk)

Thermographic investigation of boro-12-tungstic acid and some of its salts.
Z. N. SAIDNASYROVA, E. M. OSIPOVA (Agricultural Institute, Tashkent)

Simultaneous recording of electric conductivity and DTA for the investigation of triple salt systems.
N. P. BURMINSTROVA, E. G. VOLOZHANINA, N. V. DUBKOVA (State University, Kazan)

Thermograms of the coordination compounds of urea with some transition metals.
P. I. PROTSENKO, Kh. I. KALAEVA, L. N. VENEROVSKAYA (State University, Rostov on the Don)

Determination of the surface of powders by air adsorption using an automated gas buret.
L. G. BERG, R. A. ABDURAKHMANOV (State University, Kazan)

Electric conductivity and thermal characteristics of minerals.
I. L. LAPIDES, S. B. BRANDT (Institute of Geochemistry of the Siberian Division of the Academy of Science of the U.S.S.R., Irkutsk)

Thermographic characteristics of sulphides using solid oxidants.
L. G. BERG, E. N. SHLYAPKINA (State University, Kazan)

Thermal investigation and comparative characteristics of the phase transformations of alunite and its mixture with other minerals.
M. A. KASHKAI, I. A. BABAIEV (Institute of Geology of the Academy of Science of the Azerbaidzhan S.S.R., Baku)

Techniques for preparing soils and friable minerals for the determination of the mineralogical composition and hydrophilicity of their highly dispersed part by means of thermographic methods.
N. I. GORBUNOV, B. M. TUNIK (Soil Institute, Moscow)

Quantitative and qualitative determination of dispersed organic material in rocks by derivatography.

L. E. KOZLOVA, T. A. KORNEVA (Institute of Geology and Geophysics of the Siberian Division of the Academy of Science of the U.S.S.R., Novosibirsk)

Comparative thermographic characteristics of natural and synthetic oxidation products of siderites.

V. I. KAURKOVSKY (Branch of the Dnepropetrovsk Metallurgical Institute, Zaporozhe)

Determination of the surface and form of absorption of organic materials in soil by thermogravimetry.

S. N. ALESHIN, A. I. KURBATOV (Agricultural Academy, Moscow)

Investigation of the formation mechanism of organic alumina complexes by thermogravimetry.

N. F. PSHENICHNAYA, M. V. EIRISH (Institute of Geology of the Academy of Science of the Kazakh S.S.R., Alma-Ata)

Thermal investigation of the system $PbO-SiO_2-ZnFe_2O_4-PbSO_4$.

N. I. KOPYLOV (All-Union Research Institute of Non-ferrous Metals, Ust-Kamenegorsk)

Thermographic and high-temperature X-ray investigations of lead silicates.

E. I. BOGOSLOVSKAYA, E. V. SAVINA (State Institute of Non-ferrous Metals, Moscow)

Application of thermography for the investigation of vitrification in the systems $P_2O_5-Sb_2O_3-R_xO_y$.

T. N. MILLER, V. K. DOMBROVSKA, Z. A. KONSTANT, A. Ya. VAIIVAD, R. Ya. BERZIN (Institute of Inorganic Chemistry of the Academy of Science of the Latvian S.S.R., Riga)

Thermographic investigation of glass enamels.

L. G. KHODSKY, L. I. IVASHKO (Institute of General and Inorganic Chemistry of the Academy of Science of the Belorussian S.S.R., Minsk)

Thermographic investigation of $CaO-Al_2O_3-SiO_2$ slags hydrated in autoclaves.

A. A. GOVOROV, N. A. OVRAMENKO (Institute of Colloidal Chemistry and Water Chemistry of the Academy of Science of the U.K.S.S.R., Kiev)

Application of thermogravimetry for the investigation of firing processes in silicate technology.

A. V. SHLYKOV (All-Union Research Institute for Building Materials, Kraskovo, Moscow District)

Extension of the field of application of combined thermal analysis in the chemistry of cement.

I. V. KRAVCHENKO, G. I. CHISTYAKOV, B. E. YUDOVICH (Research Institute for Cement, Moscow)

Investigation of clinker formation processes by complex thermal analysis.

N. A. TOROPOV, I. L. LUGININA, V. K. KLASSEN (Institute of Silicate Chemistry, Leningrad, Kazakh Institute of Chemical Technology, Chimkent)

Effect of organic and inorganic additions on the firing of aluminosilicate and magnesia refractories.

G. V. KUKOLEV, I. I. NEMETS, G. L. SEMCHENKO, G. B. DOBROVOLSKY (Polytechnical Institute, Kharkov)

Catalysed crystallization of glasses prepared of slags of the phosphate industry.
L. N. SHELDYAKOV, Yu. A. MARKONRENKOV, O. I. SLYUSAREVA (Institute of Chemistry of the Academy of Science of the Kazakh S.S.R., Alma-Ata)

Application of thermography for the investigation of the structural characteristics of consolidating solutions.

I. P. GRASS, E. I. KAPKOVA, N. L. BASTEEVA (Institute for Road Construction, Kharkov)

DTA of organic compounds.

G. B. RAVICH (Institute of General and Inorganic Chemistry of the Academy of Science of the U.S.S.R., Moscow)

Thermographic investigation of lignine without separating it from wood.

G. E. DOMBURG, V. N. SERGEEVA (Institute of Wood Chemistry of the Academy of Science of the Latvian S.S.R., Riga)

Application of thermography for the investigation of hydrocracking processes of aromatic hydrocarbons.

E. I. ELBERT, K. V. SMIRNOV, Ya. R. KATSOBASHVILI (Kuznetsk Branch of the Eastern Research Institute for Coal Chemistry, Novokuznetsk, INCS of the Academy of Science of the U.S.S.R., Moscow)

Thermal analysis of the immobile liquid phase in gas-liquid chromatography.

V. A. BYLEV, L. A. POLYAKOVA, M. S. VIGDERGAUZ (Institute of General and Physical Chemistry of the Academy of Science of the U.S.S.R., Kazan)

Thermographic investigation of the destruction of polyphenylethoxysiloxanes.

T. N. MILLER, A. A. MYAGKOVA, U. A. TSILEN, A. Ya. VAIBAD (Institute of Inorganic Chemistry of the Academy of Science of the Latvian S.S.R., Riga)

Application of thermography for the investigation of the interaction of boric acid and multifunctional alcohols.

E. M. SHVARTS, V. V. GRUNDSHTEIN, A. F. IEVINSH (Institute of Inorganic Chemistry of the Academy of Science of the Latvian S.S.R., Riga)

Application of DTA and thermogravimetry for the selection of starting compounds for the synthesis of phthalocyanines.

L. L. SHKLOVER, N. A. NOVIKOVA, L. S. MAKSIMOVA (Research Institute of Reagents, Moscow)

Thermographic investigation of the salts of rare earth elements with organic acids.

L. M. DVORNIKOVA, M. N. AMBROZHY, V. G. EGOROVA, L. S. LAZAREVA, V. P. SEVOSTYANOV, V. E. UGOLNIKOVA, M. A. KOCHARYAN, L. V. BONDAREVA, I. L. KOSOBUDSKY (Chemical Institute of the State University, Saratov)