

Bibliography Section

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- ABDULAGATOV, I. M., ALIBEKOV, B. G. (Acad. Sci. USSR, Inst. Phys., Makhachkala, USSR): Parameter determination of model potentials of normal-alkane intermolecular interactions based on the experiment data of isochoric thermal capacity. *Zh. Fiz. Khim.* **56** (1982) 1162 (in Russian)
- ABEY, A. E., DURHAM, W. B., TRIMMER, D. A., DIBLEY, L. L. (Univ. Calif. Lawrence Livermore Natl. Lab., Livermore, Calif., 94550 USA): Apparatus for determining the thermal properties of large geologic samples at pressures to 0.2 GPa and temperatures to 750 K. *Rev. Sci. Instr.* **53** (1982) 876
- ACREE, W. E., RYTTING, J. H. (Univ. Kansas, Dept. Pharmaceut Chem., Lawrence, Kans., 66045 USA): Thermodynamic excess properties ternary alcohol hydrocarbon systems. Simplified method for predicting enthalpies from binary data. *J. Solut. Chem.* **11** (1982) 137
- AGRAWAL, Y. K., MEHD, G. D. (Maharaja Sayajirao Univ. Baroda, Fac. Technol. and Engn., Dept. Pharm., Analyt. Labs., Baroda, India): Thermal analysis of N-o-chloro and N-m-chlorophenylhydroxamic acids. *Thermo-chim. Acta* **55** (1982) 113
- ALDZHANOV, M. A., VELIEV, R. K., GUSEINOV, D. A., MAMEDOV, K. K. (Acad. Sci. AzSSR, Inst. Phys., Baku, AzSSR): Thermal properties and phonon spectrum moments of CdIn<sub>2</sub>Sn. *Fiz. Tverd. Tela* **24** (1982) 1837 (in Russian)
- ALEKSANDROVA, E. K., BUNINAKRIVORUKOVA, L. I. (Lensovet Technol. Inst. Leningrad, USSR): Thermal and catalytic rearrangements of 4-(1,1-dimethyl-2-propenoxy) toluene. *Zh. Org. Khim.* **18** (1982) 855 (in Russian)
- AMOROS, J., SOLANA, J. R., VILLAR, E. (Univ. Santander, Dept. Fundamental Phys., Santander, Spain): Analysis of some relationships between the thermal properties and surface tension of simple liquids. *Mater. Chem.* **7** (1982) 127
- ANGELL, C. A., STELL, R. C., SICHINA, W. (Purdue Univ., Dept. Chem., W. Lafayette, Ind., 47907 USA): Viscosity-temperature function for sorbitol from combined viscosity and differential scanning calorimetry studies. *J. Phys. Chem.* **86** (1982) 1540
- ANTOLINI, L., MARCOTRIGIANO, G., MENABUE, I., PELLACANI, G. C., SALADINI, M. (c/o G. C. Pallacani, Univ. Modena, Ist. Chim. Gen. and Inorgan. I-41100 Modena, Italy): Thermal, spectroscopic, magnetic and structural properties of mixed-ligand complexes of copper(II) with L-aspartic acid amines. Crystal and molecular structure of (l-asparbeto) (imidazole) copper(II) dihydrate. *Inorg. Chem.* **21** (1982) 2263
- ARAPOV, Y. G., DAVYDOV, A. B., TSIDILKOVSKI, I. M., SHELUSHININA, N. G. (Acad. Sci. USSR, Ural Sci. Ctr., Inst. Met. Phys., Sverdlovsk, USSR): On the anomalies in the temperature dependence of conductivity in Hg<sub>1-x</sub>Cd<sub>x</sub>Te. *Phys. Status Solidi B* **110** (1982) 619
- ARTYUKHIN, E. A. (Moscow Aviat Technol. Inst., Moscow, USSR): Recovery of the temperature dependence of the thermal conductivity coefficient from the solution of the inverse problem. *High Temp. transl. Teplofiz. Vysok. Temp.* **19** (1981) 698
- ASSUNCAO, F. P., CHAGAS, A. P., AIROLDI, C. (Univ. Fed. Para, Dept. Quim., BR-66000 Belem, Para, Brazil): Thermochemical study of adducts of N,N-dimethylurea with zinc, cadmium and mercury halides. *J. Chim. Phys.* **79** (1982) 253

- ATAKE, T., GYOTEN, H., CHIHARA, H. (Osaka Univ., Fac. Sci. Chem. Thermodynam. Lab., Toyonaka, Osaka, 560 Japan): A concealed anomaly at 117.5 in the heat capacity of hexamethylbenzene. *J. Chem. Phys.* **76** (1982) 5535
- BAHTA, A., SIMONAITIS, R., HEICKLEN, J. (c/o J. Heicklen, Penn. State Univ., Dept. Chem., University Pk, Pa., 16802 USA): Thermal decomposition kinetics of  $\text{CH}_3\text{O}_2\text{NO}_2$ . *J. Phys. Chem.* **86** (1982) 1849
- BALEK, V. (Nucl. Res. Inst., CS-25068 Rez., Czechoslovakia): Initial sintering stage of thoria powder investigated by emanation thermal analysis. *J. Mater. Sci.* **17** (1982) 1269
- BARTERI, M., MANTOVANI, O., PISPISA, B. (c/o B. Pispisa, Univ. Rome, Ist. Chim. Fis., I-00185 Rome, Italy): Calorimetric and chiroptical data on the interaction between ionic polysaccharides and complex ions in aqueous solution. *Macromol. Chem. Rap. Comm.* **3** (1982) 287
- BENATI, L., GROSSI, M., MONTEVECCHI, C. P., SPAGNOLO, P. (Univ. Bologna, Fac. Chim. Organ., I-40136 Bologna, Italy): Thermal reaction of phenylnitrene with sulphides. *J. Chem. Soc.* (1982) 763
- BENDICK, W., PEPPERHOFF, W. (Mannesmann AG Forschungsinst., D-4100 Duisburg, 25 GFR): The heat capacity of Ti, V and Cr. *J. Phys. F* **12** (1982) 1085
- BENTLEY, T. W., CARTER, G. E. (Univ. Wales Univ. Coll. Swansea SA2 BPP, W. Glam, G. Wales): Critical comments on the interpretation of heat capacities of activation and on the experimental evidence for other recent mechanistic proposals for solvolyses of t-butyl halides in water and in binary aqueous mixtures. *J. Chem. Soc. Faraday Trans. 1* **78** (1982) 1633
- BESMANN, T. M., LINDEMER, T. B. (Oak Ridge Natl. Lab., Div. Chem. Technol., Oak Ridge, Tenn., 37830 USA): High temperature equilibrium between uranium dicarbide, uranium dioxide, carbon and carbon monoxide. *J. Chem. Thermodyn.* **14** (1982) 419
- BEREZOVSKII, G. A., PAUKOV, I. E. (Acad. Sci. USSR, Inst. Organ. Chem., Novosibirsk, USSR): Thermal capacity of titanium monoxide in the 8,-5-305-K interval. *Zh. Fiz. Khim.* **56** (1982) 1541 (in Russian)
- BERLIN, A. A., CHERNYAVSKAYA, S. B., CHERNYAK, B. I. (Lvov Polytech. Inst., Lvov, UkSSR): Thermogravimetric studies of grafted copolymers of polymethylacrylate with nitro lignin. *Ukr. Khim. Zh.* **48** (1982) 423 (in Russian)
- BIDDULPH, M. W., BURFORD, R. P. (Univ. Nottingham, Dept. Chem. Engr. Nottingham NG7 2RD England): Thermal properties and heat transfer coefficients in cryogenic cooling. *Cryogenics* **22** (1982) 283
- BILLAUD, F., BARONNET, F., NICLAUSE, M. (Ecole Natl. Super Ind. Chim., Inpl., Dept. Chim. Phys., React., CNRS, ERA, 136 F-54042 Nancy, France): Pyrolysis of 2,2-dimethylbutane at ca 450°C. *React. Kinet. Catal. Lett.* **19** (1982) 125
- BILOBROV, V. M., SHURPACH, V. I. (Acad. Sci. UkSSR, Inst. Phys. Organ. Chem. and Coal Chem., Donetsk, 340048 UkSSR): The nature of a proton-acceptor center of base molecules and enthalpy of intermolecular hydrogen bond. *Ukr. Khim. Zh.* **48** (1982) 471 (in Russian)
- BIRNIE, D., MACHLIN, E. S., KAUFMAN, L., TAYLOR, K. (Manlabs Inc, 21 Erie St., Cambridge, Mass., 02139 USA): Comparison of pair potential and thermochemical models of the heat of formation of BCC and FCC alloys. *Calphad Comput. Coup. Phase Dia.* **6** (1982) 93
- BISWAS, M., PACKIRISAMY, S. (Indian Inst. Technol., Dept. Chem., Kharagpur, 721302 W. Bengal, India): Some observations on the thermal stabilities of modified N-vinylcarbazole polymer systems. *J. Appl. Polym. Sci.* **27** (1982) 1823
- BLACKBURN, G. M., LILLEY, T. H., WALMSLEY, E. (c/o T. H. Lilley, Univ. Sheffield, Dept. Chem., Sheffield SB 7HF, S. Yorkshire, England): Aqueous solutions containing amino acids and peptides. 13. Enthalpy of dilution and osmotic coefficients of some N-acetyl amino acid amides and some N-acetyl peptide amides at 298.15 K. *J. Chem. Soc. Faraday Trans. 1* **78** (1982) 1641
- BLAKE, P. G., SHRAYDEH, B. F. (Univ. Wales Univ. Coll. Cardiff., Dept. Chem.,

- Cardiff CF1 1XL, J. Glam, Wales): The thermal decomposition of fluorinated esters. 3. Esters without beta-hydrogen atoms. *Int. J. Chem. Kinet.* **14** (1982) 739
- BLOCK, E., COREY, E. R., PENN, R. E., RENKEN, T. L., SHERWIN, P. F., BOCK, H., HIRABAYASHI, T., MOHMAND, S., SOLOUKI, B. (Suny Albany, Dept. Chem., Albany, N. Y., 12222 USA): Synthesis and thermal decomposition of 1,3-dithietane and its S-oxides. *J. Amer. Chem. Soc.* **104** (1982) 3119
- BOBYRENKO, Y. Y., SMIRNOVA, L. A.: Kinetic parameters of thermal dehydration of the rutile surface. *Zh. Fiz. Khim.* **56** (1982) 1505 (in Russian)
- BOGER, D. L., SCHUMACHER, J., MULLICAN, M. D., PATEL, M., PANEK, J. S. (Univ. Kansas, Dept. Med. Chem., Lawrence, Kans., 66045 USA): Thermal cycloaddition of 1,3,5-triazine with enamines: regiospecific pyrimidine annulation. *J. Org. Chem.* **47** (1982) 2673
- BOMMANAVAR, A. S., MONTANO, P. A. (W. Virginia Univ., Dept. Phys., Morgantown, W. Va., 26506 USA): Mössbauer study of the thermal decomposition of FeS<sub>2</sub> in coal. *Fuel* **61** (1982) 523
- BOUCHOUX, G., DAGAUT, J. (Ecole Polytech., Synthese Organ. Lab., F-91128 Palaiseau, France): The heat of formation of the gaseous indenyl ion. *Org. Mass. Spectrom.* **17** (1982) 151
- BOWMAN, D. R., LEVIN, K. (Univ. Chicago, James Franck Inst., Chicago, Ill., 60637 USA): Maxwell's relations may not be incompatible with calorimetric measurements in spin-glasses. *Phys. Rev. Lett.* **49** (1982) 240
- BRAR, A. S., BRAR, S., SANDHU, S. S. (Indian Inst. Technol., Dept. Chem., New Delhi, 110016 India): Mössbauer study of the thermal decomposition of lithium hexaformate(III) tetrahydrate. *Radiochem. Radioanal. Lett.* **51** (1982) 285
- BRESSAN, A.: On relativistic heat conduction in the stationary and nonstationary cases, the objectivity principle and piezoelectricity (Addendum). *Lett. Nuovo Cim.* **34** (1982) 63
- BRÜCKNER, W., LEHMANN, S., POMPE, G. (CENT Inst. Solid State Phys. and Mat. Res., DDR-8027 Dresden, GDR): Heat conductivity in ZnO varistor ceramics. *Phys. Status Solidi A* **70** (1982) K47
- BUHELNIKOV, V. D., SHAVROV, V. G. (Acad. Sci. USSR. Inst. Radioengn. and Electr. Moscow, USSR): Phonon specific heat of antiferromagnets in the region of spin reorientation. *Fiz. Tverd. Tela* **24** (1982) 909 (in Russian)
- BUCKLEY, G. S., RODGERS, A. S. (c/o A. S. Rodgers, Texas A and M Univ., Dept. Chem., College Stn Tex., 77843 USA): Electrostatic model for the heats of formation and dipole moments of chlorine and fluorine-substituted methanes. *J. Phys. Chem.* **86** (1982) 2059
- BUNKIN, F. V., KIRICHENKO, N. A., LUKYANCHUK, B. S. (P. N. Lebedev Phys. Inst., Moscow, USSR): Laser thermochemistry. *Izv. Akad. Nauk SSSR Fiz.* **46** (1982) 1150 (in Russian)
- BURGESS, J., PEACOCK, R. D., SHERRY, R. (Univ. Leicester, Dept. Chem., Leicester, LE1 7RH England): The solution thermochemistry of antimony pentafluoride and some fluoroantimonates. *J. Fluorine Chem.* **20** (1982) 541
- BURY, R., TREINER, C. (c/o C. Treiner, Univ. Pierre and Marie Curie, Electrochim. Lab., Era, 310 F-75005 Paris, France): Standard enthalpies of transfer ionic surfactants from water to water + t-butyl alcohol mixtures at 298.16 K. *J. Chem. Soc. Faraday Trans. 1* **78** (1982) 1827
- BUZULUKOV, V. I., MASLENNIKOV, V. P., ALEKSANDROV, Y. A.: Thermal decomposition of 2-tertiary-butylperoxy-2-phenylethylmercury chloride in the hydrocarbon medium. *Zh. Obshch. Khim.* **52** (1982) 854 (in Russian)
- BYSTRÖM, K., MANSSON, M. (c/o M. Mansson, Univ. Lund, Ctr. Chem., Thermochem. Lab., S-22007 Lund, 7 Sweden): Enthalpies of formation of some cyclic 1,3 and 1,4-di- and poly-ethers: thermochemical strain in the -O-C-O and -O-C-C-O groups. *J. Chem. Soc. Perkin. Trans. II* (1982) 565
- CALATAYUD, J. M., REIG, F. B., RAMOS, G. R. (Fac. Ciencias Valencia, Dept. Quim. Analit., Valencia, Spain): New complexes

- of ethylene-dibiguanide-Thermal + IR studies. *An. Quim. B* 78 (1982) 83
- CAMINO, G., COSTA, L. (Univ. Turin, Ist. Chim. Macromolec., I-10125 Turin, Italy): Thermal degradation of polymer-fire retardant mixtures. IV. Mechanism of fire retardancy in polypropylene-chlorinated paraffin mixtures. *Polym. Degrad. Stabil.* 4 (1982) 167
- CANEIRO, A., BAVDAZ, P., FOULETIER, J., ABRIATA, J. P. (Comis Nacl. Energia Atom, Ctr. Atom Bartoche, RA-8400 San Carlos Barlo, Argentina): Adaptation of an electrochemical system for measurement and regulation of oxygen partial pressure to a symmetrical thermogravimetric analysis system developed using a Cahn 1000 electrobalance. *Rev. Sci. Instr.* 53 (1982) 1072
- CAPITAN-VALLVEY, L. F., GAZQUEZ, D., SALINAS, F. (Univ. Granada, Fac. Sci., Dept. Analyt. Chem., Granada, Spain): Studies on the thermal decomposition of some metal complexes 5,5'-methylendisalicylhydroxamic acid. *Thermochim. Acta* 56 (1982) 15
- CARDILLO, P.: 3rd national convention of calorimetry and thermal analysis, Genoa, Dec. 14-16. 1981. *Chim. Ind.* 64 (1982) 180
- CARUNCHIO, V., MESSINA, A. (Univ. Rome, Ist. Chim. Analyt., I-00185 Rome, Italy): Spectrophotometric and microcalorimetric study of the copper(II) thiocyanate system in some aliphatic alcohols. *Ann. Chim.* 72 (1982) 107
- CERDÁ, V., CASASSAS, F., BORRULL, F., ESTEBAN, M. (Univ. Baleares, Fac. Sci. Dept. Analyt. Chem., Palma de Mallorca, Spain): Thermometric behaviour of (methylthio) acetic, thiodiacetic and 3,3'-thiodipropanoic acids. *Thermochim. Acta* 55 (1982) 1
- CHANISHVILLI, Z. V. LAŠTOVIČKOVÁ, M., KROPÁČEK, V. (Acad. Sci. GeSSR, Inst. Geophys., Tbilisi, GeSSR): Thermal and electric conductivity of three basaltic rocks of the bohemian massif under high temperatures. *Stud. Geophys. Geod.* 26 (1982) 93
- CHARSLEY, E. L., DUNN, D. G. (Consultancy Serv., Stanton Redcroft, Copper Mill Lane, London, SW17 0BN, England): The application of thermogravimetry (TG) to the characterization and quantitative determination of carbon blocks. *Rubber Chem. Technol.* 55 (1982) 382
- CHEUNG, T. D., CHAN, W. K., KOUVEL, J. S. (Univ. Illinois, Dept. Phys., Chicago, Ill., 60680 USA): Automation of a calorimetric system. *Rev. Sci. Instr.* 53 (1982) 880
- CHOU, K. S., BURKHART, L. E. (Natl. Tsing Hua Univ., Dept. Chem. Engr. Hsinchu, 300 Taiwan): Characterization of the calcination process of yttria. *Thermochim. Acta* 55 (1982) 75
- CHOUDHURY, N. R., AHLUWALIA, J. C. (c/o J. C. Ahluwalia, Indian Inst. Technol., Dept. Chem., New Delhi, 110016 India): Enthalpies and heat capacities of transfer of sodium carboxylates and sodium dodecylsulfate from water to aqueous tert-butyl alcohol solutions. *J. Solut. Chem.* 11 (1982) 189
- CHRISTAHL, M., THÖNNISSEN, J. (Rhein Westfal TH Aachen, Lehrstuhl Tech. Thermodynam., D-5100 Aachen, GFR): The excess enthalpy reaction of solvation of the system LiBr (methanol, Zn, Br<sub>2</sub>) methanol, and LiBr (ZnBr<sub>2</sub>) methanol. *Z. Naturforsch. A* 37 (1982) 224 (in German)
- COHEN, S. S. (Ge. Corp. Res. and Dev., Signal. Electr. Lab., Schenectady, N. Y., 12301 USA): Thermal study of the Pt-Al reaction and its effects on contact resistance to silicon. *J. Appl. Phys.* 53 (1982) 3906
- CORDFUNKE, E. H. P., QUWETJES, W., PRINS, G. (Netherlands Energy Res. Fdn, Ecn, Petten, Netherlands): Standard enthalpies of formation of uranium compounds. VIII. UCl<sub>3</sub>, UCl<sub>5</sub> and UCl<sub>6</sub>. *J. Chem. Thermodyn.* 14 (1982) 495
- CREMER, D. (Univ. Köln, Lehrstuhl Theoret. Chem., D-5000 Köln, 41 GFR): Thermochemical data from ab initio calculations. I. Estimation of SCF energies for augmented basis sets and Hontree-Fock limit energies. *J. Comput. Chem.* 3 (1982) 154
- CREMER, D. (Univ. Köln, Lehrstuhl Theoret. Chem., D-5000 Köln, 41 GFR): Thermochemical data from ab initio calculations. II. Total correlation energies, Schrödinger energies, and theoretical heats of formations. *J. Comput. Chem.* 3 (1982) 165

- CZARNOTA, I. (Polish Acad. Sci., Inst. Phys. Chem., PL-01224 Warsaw, Poland): Heat capacity of 3-methylpentane at high pressures. *Bull. Acad. Pol. Sci.* 28 (1980) 651
- DANFORTH, J. D., SPEGEL, J., BLOOM, J. (Grinnell Coll., Grinnell, Ia, 50112 USA): The kinetics and mechanism of the thermal dehydrochlorination of poly(vinyl chloride). *J. Macromol. Sci.* 17 (1982) 1107
- DAS, D., UPRETI, M. C. (c/o M. C. Upreti, Reg. Res. Lab., Jorhat, 785006 India): Thermal stability and surface acidity of zeolite-X enriched by  $\text{La}^{3+}$  and  $\text{Pr}^{3+}$  cations. *Indian J. Chem. A* 21 (1982) 288
- DAS, D. K., DAS, P. B. (c/o P. B. Das, Ravenshaw Coll., Dept. Chem., Cuttack, 753003 Orissa, India): Thermodynamics of  $\text{Sr}(\text{NO}_3)_2$  and  $\text{Cd}(\text{NO}_3)_2$  in aquo-organic solvents from conductance data. *Thermochim. Acta* 55 (1982) 35
- DASH, U. N., PADHI, M. C. (Bhadrak, Coll. Bhadrak, 756100 India): Thermodynamics of the silver-silver iodate and silver-silver bromate electrodes in dioxane-water mixtures. *Thermochim. Acta* 56 (1982) 113
- DA SILVA, M. A. V. R., REIS, A. M. M. V. (Univ. Oporto, Fac. Sci. Dept. Chem., P-4000 Porto, Portugal): Enthalpy of formation of tris[bis(benzoylacetoato) nickel(II)] and the mean nickel(II)-oxygen bond dissociation enthalpies. *Thermochim. Acta* 55 (1982) 89
- DELLIEN, I. (Supra AB BOX 516 S-26124 Landskrona, Sweden): A DSC study of the phase transformations of ammonium nitrate. *Thermochim. Acta* 55 (1982) 181
- DICKENS, B. (NBS, Inst. Basic Stand, Ctr. Mat. Sci., Washington, D. C., 20234 USA): Vapor composition profiles estimated for thermally degrading polyethylene. *Thermochim. Acta* 55 (1982) 2A
- DICKENS, B. (NBS, Inst. Basic Stand, Ctr. Mat. Sci., Div. Polymer. Sci. and Stand, Washington, D. C., 20234 USA): Thermal degradation study of isotactic polypropylene using factor-jump thermogravimetry. *J. Polym. Sci. Polym. Chem. Ed.* 20 (1982) 1169
- DIRKES, H., HEUMANN, T. (Univ. Munster, Inst. Metallforsch., D-4400 Munster, GFR): Calculation of the free enthalpy of binding of impurity-vacancy in FCC very dilute alloy. *J. Phys. F* 12 (1982) L67
- DITYATEVA, L. N., TUMANOVA, A. V., SKOBLIKOVA, V. I., KOLESOV, V. P. (M. V. Lomonosov State Univ., Moscow, 117234 USSR): Standard enthalpies of formation of fluorinated acid methyl esters. *Zh. Fiz. Khim.* 56 (1982) 1038 (in Russian)
- DOI, K. (Nagoya Inst. Technol., Dept. Synthet Chem., Showa ku, Nagoya, Aichi, 466 Japan): Enthalpy of oxidation reduction for the ethylenediaminetetraacetatocobaltate (III/II) couple relative to the hydrogen ion formation. *Bull. Chem. Soc. Jap.* 55 (1982) 1431
- DUBANSKÝ, A., STRAKA, P. (Czechoslovak Acad. Sci., Inst. Geol. and Geotech., CS-18209 Prague, 8 Czechoslovakia): Pyrolysis apparatuses for some geochemical purposes. *Chem. Listy* 76 (1982) 430
- DYAGILEVA, L. M., TSYGANOVA, E. I., ALEKSANDROV, Y. A. (N. I. Lobachevskii State Univ., Chem. Res. Inst., Gorki, USSR): Thermal decomposition of tetraethyoxysilane. *Zh. Obshch. Khim.* 52 (1982) 890 (in Russian)
- EBERT, K. H., EDERER, H. J., SCHRODER, U. K. O., HAMIELEC, A. W. (Univ. Heidelberg Inst. Angew. Phys. Chem., D-6900 Heidelberg, 1 GFR): On the kinetics and mechanism of thermal degradation of polystyrene. *Makromol. Chem. Macro Chem. Phys.* 183 (1982) 1207
- EL-DAHSHAN, M. E. (King Saud Univ., Riyadh, Saudi Arabia): The oxidation of cobalt-manganese alloys at high temperatures. *Trans. Jap. Inst. Met.* 23 (1982) 177
- ERNST, D. (USN, Ctr. Surface Weap, Electrochem. Branch, Silver Spring M. D., 20910 USA): DSC study of 2 reactions in the lithium-boron alloy system. *J. Electrochem. Soc.* 129 (1982) 1573
- FEDOROVA, V. A., DONCHAK, V. A. (Lvov Polytech. Inst., Lvov, UkSSR): Studies in thermal decomposition of di-tert-butyl-diperpyromellitate. *Ukr. Khim. Zh.* 48 (1982) 409 (in Russian)

- FERRO, D., PIACENTE, C. (c/o V. Piacente, Univ. Rome, Ist. Chim. Fis., I-00185 Rome, Italy): The vapor pressure of the GeAs system. *Thermochim. Acta* 55 (1982) 209
- FINCH, A., HALL, F. M. (Univ. London Royal Holloway Coll., Bourne Lab., Egham TW20 OEX, Surrey, England): Standard enthalpies of formation and lattice energies of alkylammonium halides. 1. Propylamine hydrochlorides. *J. Chem. Soc. Dalton Trans.* (1982) 915
- FISCHER, F., MILETZKY, F., SCHIENE, R. (Tech. Univ. Dresden, Sect. Forstwirtschaft, Wissensch. Bereich Pflanzenchem., DDR-8027 Dresden, GDR): Some statements about the oxidative ammonolysis of spent sulfite liquor. Differential scanning calorimetric investigations of spent sulfite liquor. *Z. Chem.* 22 (1982) 190
- FLEETER, R., KESTIN, J., NAGASAKA, Y., SHANKLAND, I. R., WAKEHAM, W. A. (Caltech., Jet Drop. Lab., Pasadena, Calif., 91103 USA): The thermal conductivity of mixtures of methane with argon and neon. *Physica A* 111 (1982) 404
- FLEROV, I. N., KOT, L. A., KRIGER, A. I. (L. V. Kirenskii Phys. Inst., Krasnoyarsk, USSR): Low-temperature specific heat and thermal expansion of  $K_2SeO_4$ . *Fiz. Tverd. Tela* 24 (1982) 1673 (in Russian)
- FORST, W. (Univ. Laval, Dept. Chem., Quebec City, Quebec, G1K 7P4 Canada): Thermal decomposition of nitrous oxide. Comparison of theory with experiment. *J. Phys. Chem.* 86 (1982) 1776
- FOWLER, M., ZOTOS, X. (Univ. Virginia, Dept. Phys., Charlottesville, Va., 22901 USA): Bethe-ansatz quantum sine-Gordon thermodynamics. The specific heat. *Phys. Rev. B* 25 (1982) 5806
- FRIDLENDER, B. A., SOKOLOV, V. V. (Leningrad Appl. Chem. Inst., Leningrad, USSR): Thermal and temperature conductivity at high temperatures of binary alloys of the ZrC-C system obtained by chemical vapor deposition. *High Temp. transl. Teplofiz. Vysok. Temp.* 19 (1981) 702
- FRIEDMANN, G., BRINI, M. (CNRS, Ctr. Rech. Macromolec. Synthèse Organ. Lab., F-67083 Strasbourg, France): Thermal degradation of poly(diethylenglycol-bis allyl carbonate). *Polym. Degrad. Stabil.* 4 (1982) 195
- FUGER, J., HAIRE, R. G., PETERSON, J. R. (Univ. Liège, Analyt. Chem. and Radiochem. Lab., B-4000 Liège, Belgium): A new determination of the enthalpy of solution of berkelium metal and the standard enthalpy of formation of  $Bk^{3+}(aq)$ . *J. Inorg. Nucl. Chem.* 43 (1981) 3209
- FUJITA, Y., IWASA, Y., NODA, Y. (Hyogo Coll. Med., Dept. Chem., Nishinomiya, Hyogo 863 Japan): The effect of polyhydric alcohols on the thermal denaturation of lysozyme as measured by differential scanning calorimetry. *Bull. Chem. Soc. Jap.* 55 (1982) 1896
- FUKUSHIMA, S., OHMACHI, T., MAEDA, A., WATANABE, H. (Japan Atom Energy Res. Inst., Tokai, Ibaraki, 31911 Japan): The effect of gadolinium content on the thermal conductivity of near-stoichiometric (U, Gd)O<sub>2</sub> solid solutions. *J. Nucl. Mater.* 105 (1982) 201
- FURUICHI, R., ISHII, T., OSHIMA, Y. (Hokkaido Univ., Fac. Engr., Dept. Appl. Chem., Sapporo, Hokkaido, 080 Japan): Heat of immersion of iron(III) oxides in water at 25°C. *Thermochim. Acta* 56 (1982) 31
- GAÁL, F. F., AVRAMOVIĆ, B. D., VAJGAND, V. J. (Univ. Novi Sad, Fac. Sci. Inst. Chem., YU-21000 Novi Sad, Yugoslavia): Application of the aldehyde reactions for the endpoint detection in the catalytic thermometric titration of acids. *Microchem. J.* 27 (1982) 231
- GABRIEL, T. A., BISHOP, B. L., GOODMAN, M. S., SESSOMS, A. L., EINSTEIN, B., KEPHART, R. D., WRIGHT, S. C. (Oak Ridge Natl. Lab., Oak Ridge, Tenn., 37830 USA): A Monte Carlo-simulation of an actual segmented calorimeter - a study of calorimeter performance at high energies. *Nucl. Instrum. Methods Phys. Res.* 195 (1982) 461
- GANDOLFO, C., GRASSO, D. (Univ. Catania, Ist. Dipartimentale Chim. and Chim. Ind., I-95125 Catania, Italy): Phase transitions

- in mesomorphic benzylidene anilines. *Thermochim. Acta* 56 (1982) 59
- GARBARCZYK, J., WASIUCIONEK, M., JAKUBOWSKI, W., GRODZINSKI, A. (Warsaw Tech. Univ., Inst. Phys., PL-02594 Warsaw, Poland): TGA and DTA studies on moist Na, Li/Na, and AgB''-aluminas. *Phys. Status Solidi A* 70 (1982) K163
- GARN, P. D. (Univ. Akron, Akron, Ohio, 44325 USA): Calibration of thermobalance temperature scales. *Thermochim. Acta* 55 (1982) 121
- GARUN, Y. Y., TURCHIN, G. V., GLAVATI, O. L., LABUZA, I. V. (All Union Petr. Refining and Petrochem. Ind. Res. Inst., Kiev, UkSSR): Study of molecular mass distribution of atactic polypropylene in the process of thermal degradation. *Vysokomol. Soedin. B* 24 (1982) 368
- GATHER, B., BLACHNIK, R. (Univ. Siegen, Gesamtsch., Fachbereich Anorgan. Chem. 8 D-5900 Siegen 21 GFR): Enthalpies of mixing of ternary systems. II. The system Ag-Sb-Te. *Z. Metallk.* 73 (1982) 245
- GAUR, U., WUNDERLICH, B. (Rensselaer Polytech. Inst., Dept. Chem., Troy, N. Y., 12181 USA): Heat capacity and other thermodynamic properties of linear macromolecules III. Polyoxides. *J. Phys. Chem. Ref. Data* 10 (1981) 1001
- GAUR, U., WUNDERLICH, B. (Rensselaer Polytech. Inst., Dept. Chem., Troy, N. Y., 12181 USA): Heat capacity and other thermodynamic properties of linear macromolecules. IV. Polypropylene. *J. Phys. Chem. Ref. Data* 10 (1981) 1051
- GAVANDE, A. M., RAY, M. N. (c/o M. N. Ray, Nagpur Univ., Dept. Chem., Nagpur, 440010 Maharashtra, India): Thermal decomposition of irradiated cadmium bromate. *Indian J. Chem. A* 21 (1982) 287
- GAVINA, F., LUIS, S. V., CASTERO, A. M., GIL, P., PALAZÓN, B. (Univ. Valencia, Dept. Quim. Organ., Valencia, Spain): Thermogravimetric studies of polymeric reagents: a polymeric o-benzyne precursor. *Tetrahedron Lett.* 23 (1982) 2403
- GEMMERCOLOS, V., NEEB, R. (c/o R. Neeb, Univ. Mainz, Inst. Anorgan. Chem. and Analyt. Chem., D-6500 Mainz, GFR): Volatility and thermal stability of some nickel 1,1'-dithiolatochelates with a view to the gas-chromatographic determination. *Fresenius Z. Anal. Chem.* 311 (1982) 496
- GIRICHEV, G. V., PETROVA, V. N. (Ivanovo Chem. Technol. Inst., Dept. Phys. Chem., Ivanovo, USSR): Evaporation heat of niobium pentafluoride. *Izvest. Vyssh. Uch. Zav.* 25 (1982) 381
- GIULIANI, G., PRIOLA, A. (Assoreni, Polymer Res. Labs., I-20097 San Donato Milane, Italy): Dynamic thermomechanometry of networks from acrylated epoxy resins. *Polymer* 23 (1982) 761
- GOLIK, A. Z., ADAMENKO, I. I., MAKHNO, M. G. (T. G. Shevchenko State Univ., Kiev, UkSSR): Equation of state, elastic and thermal properties of benzene, toluol and ethylbenzene. *Ukr. Fiz. Zh.* 27 (1982) 708 (in Russian)
- GOLLNICK, K., HARTMANN, H. (Univ. München, Inst. Organ. Chem., D-8000 München, 2 GFR): Thermal and photochemical reactions of 1,4-dithiine and derivatives. *Tetrahedron Lett.* 23 (1982) 2651
- GOLOVEY, M. I., SHPYRKO, G. N., SLAVINETS, V. M. (All Union Monocrystal Res. Inst., Kharkov, UkSSR): Enthalpy of AgGaS<sub>2</sub> and AgGaSe<sub>2</sub> compounds. *Ukr. Khim. Zh.* 48 (1982) 355 (in Russian)
- GONCHARUK, V. V., PANKRATIEV, Y. D., SHCHERBATYUK, N. E. (Acad. Sci. UkSSR, Inst. Colloid Chem. and Water Chem., Kiev, UkSSR): Calorimetric studies of aluminosilicate catalysts. Heats and entropy of benzene adsorption on monosubstituted alkaline earth (Mg, Ca, Sr, Ba) metakaolinites at small surface coverages. *React. Kinet. Catal. Lett.* 19 (1982) 75
- GOODRICH, L. F., VERHOEVEN, J. D., FINNEMORE, D. K. (Iowa State Univ. Sci. and Technol. Us Doe, Ames Lab., Ames, Ia., 50011 USA): Specific heat of superconductor-normal metal composites. *J. Low Temp. Phys.* 47 (1982) 451
- GORBUNOV, V. E., GAVRICHEV, K. S., ZALUKAEV, V. L., GOLOVEI, M. I. (N. S. Kurnakov Gen. and Inorgan. Chem. Inst., Moscow, USSR): Thermal capacity and thermodynamic properties of Ag<sub>3</sub>AsS<sub>3</sub>

- proustite in the 10–350 K interval. *Zh. Fiz. Khim.* **56** (1982) 1121 (in Russian)
- GORDIENKO, P. S., SHEPTIL, V. I., SINYAVSKII, V. V. (Acad. Sci. USSR, Fiz. Sci. Ctr. Inst. Chem., Vladivostok, USSR): Use of Fourier fast transformation for correction of thermograms in the heat conducting calorimetry. *Zh. Fiz. Khim.* **56** (1982) 1312 (in Russian)
- GOTO, T., YOSHIZAWA, M., TAMAKI, A., FUJIMURA, T., (Tohoku Univ., Sci. Measurements Res. Inst., Sendai, Miyagi, 980 Japan): Elastic and thermal properties of the layered compound  $(\text{CH}_3\text{NH}_3)_2\text{FeCl}_4$ . *J. Phys. C* **15** (1982) 3041
- GRÁNÁSY, L., LOVAS, A., KISS, L., KEMÉNY, T., KISDI-KOSZÓ, É. (Hungarian Acad. Sci., Cent. Res. Inst. Phys. H-1525 Budapest, Hungary): Investigation of magnetic properties and thermal stability of Fe–Tm–B-metallic glasses. *J. Magn. Magn. Mater.* **26** (1982) 109
- GRANIER, W., VILMINOT, S., NABIAS, G., LETOFFE, J. M., CLAUDY, P. (Ecole Natl. Super. Chim., Chim. Minerale Appl. Chim. Mat. Lab., ERA 314 F-34075 Montpellier, France): Contribution to the study of the TlF–SnF<sub>2</sub> binary system. Ionic conductivity, structure, thermal behavior of phases encountered. *Rev. Chim. Miner.* **19** (1982) 36
- GRASSIE, N., JOHNSTON, A., SCOTNEY, A. (Univ. Glasgow, Dept. Chem. Glasgow, G12 8QQ Scotland): Thermal degradation of bromine-containing polymers. 6. An equimolar copolymer of 2-bromoethyl methacrylate and acrylonitrile. *Polym. Degrad. Stabil.* **4** (1982) 173
- GRIME, J. K., SEXTON, E. D. (Procter and Gamble CD, Ivorydale Tech. Ctr., Cincinnati, Ohio, 45217 USA): Enthalpymetric study of the surface interactions of normal-butylamine with silica gel. *Anal. Chem.* **54** (1982) 902
- GULLIKSON, E. M., SCHULTZ, S. (Univ. Calif. San Diego, Dept. Phys. La Jolla, Calif., 92093 USA): Calorimetric determination of the magnetization in a spin-glass. *Phys. Rev. Lett.* **49** (1982) 238
- GUPTA, A. K., MAITI, A. K. (Indian Inst. Technol. Ctr. Mat. Sci. and Technol., New Delhi, 11016 India): Effect of heat treatment on the structure and mechanical properties of polyacrylonitrile fibers. *J. Appl. Polym. Sci.* **27** (1982) 2409
- GUPTA, M. C., DESHMUKH, V. G. (Nagpur Univ., Dept. Chem., Nagpur, 440010 Maharashtra, India): Thermal oxidative degradation of poly-lactic acid. 1. Activation energy of thermal degradation in air. *Colloid Polym. Sci.* **260** (1982) 308
- GUPTA, M. C., DESHMUKH, V. G. (Nagpur Univ., Dept. Chem., Nagpur 440010 Maharashtra, India): Thermal oxidative degradation of poly-lactic acid. 2. Molecular weight and electronic spectra during isothermal heating. *Colloid Polym. Sci.* **260** (1982) 514
- GURYANOVA, E. N., ISAEVA, E. S., EVSEEVA, Z. A., TERENCEV, V. A. (L. Y. Karpov Physicochem. Res. Inst., Moscow, USSR): Formation enthalpy of sulfur trioxide complexes with para-donors. *Zh. Obshch. Khim.* **52** (1982) 1415 (in Russian)
- GUSEINOV, N. M., LEVINSON, Y. B. (Acad. Sci. AzSSR, Inst. Phys., Baku, AzSSR): Longitudinal long-wave phonons in non-local heat conductivity. *Zh. Eksp. Teor. Fiz.* **82** (1982) 1936 (in Russian)
- HARRIS, G. S., McKECHNIE, J. S. (Univ. St. Andrews, Dept. Chem., St. Andrews, KY16 9ST Fife, Scotland): Thermogravimetric analysis and dissociation pressure of caesium trihalides. *Polyhedron* **1** (1982) 215
- HARRIS, J. M., SHAFER, S. G., WORLEY, S. D. (Univ. Alabama Huntsville, Dept. Chem., Huntsville, Ala., 35807 USA): MINDO/3 calculation of carbocation heats of formation. *J. Comput. Chem.* **3** (1982) 208
- HAUCK, J., HEIDERICH, M. (KFA Jülich GmbH, Inst. Festkörperforsch., D-5170 Jülich 1 GFR): Low temperature decomposition of  $\text{PbMo}_6\text{S}_8$  and  $\text{Cu}_2\text{Mo}_6\text{S}_8$ . *Mater. Res. Bull.* **17** (1982) 943
- HENCHMAN, M. J., SMITH, D., ADAMS, N. G. (Brandeis Univ. Chem., Waltham, Mass., 02254 USA): Estimation of enthalpy changes in several ion/molecule reactions involving H/D exchange from zero-point energy consid-



- erations. *Int. J. Mass. Spectrom. Ion. Phys.* **42** (1982) 25
- HENNING, I. FRACH, P., HEGENBARTH, E., FRITSBERG, V. I. (Tech. Univ. Dresden, Phys. Sect., DDR-8027 Dresden, GDR): Glass-like behaviour of PLZT demonstrated by heat capacity measurements. *Phys. Status Solidi A* **70** (1982) K7
- HERNDON, W. C. (Univ. Texas, Dept. Chem., El Paso, Tex., 79968 USA): Thermal reactivities of polynuclear aromatic hydrocarbons and alkyl derivatives. *Tetrahedron* **38** (1982) 1389
- HERRINGTON, T. M., MOLE, E. L. (Univ. Reading Dept. Chem., Reading RG2 2AD, Berks, England): Heats of dilution of aqueous solutions of sodium tetraphenylboron at 25°C. *J. Chem. Soc. Faraday Trans. 1* **78** (1982) 2095
- HIRSCHLER, M. M. (City Univ. London, Dept. Chem., London, EC1V 0HB England): Flame retardant mechanisms — Recent developments. *Developments in Polym. Stabilisation-5 Edit G. Scott Applied Science Publishers (Barking), 1982, 107*
- HIRSCHLER, M. M. (City Univ. London, Dept. Chem., London, EC1V 0HB England): Effect of oxygen on the thermal decomposition of poly(vinylidene fluoride). *Eur. Polym. J.* **18** (1982) 463
- HJERTBERG, T., SÖRVIK, E. M. (Chalmers Univ. Technol. Dept. Polymer Technol., Polymer Grp S-41296 Gothenburg, Sweden): Formation of anomalous structures in PVC and their influence on thermal stability. I. Endgroup structures and labile chlorine substituted by phenol. *J. Macromol Sci. A* **17** (1982) 983
- HOFF, A., JACOBSSON, S. (Royal Inst. Technol., Dept. Polymer Technol., S-10044 Stockholm, 70 Sweden): Thermal oxidation of polypropylene close to industrial processing conditions. *J. Appl. Polym. Sci.* **27** (1982) 2539
- HOFFMANN, H., HOFFMANN, F., SCHOEPE, W. (Univ. Regensburg, Inst. Angew. Phys., D-8400, Regensburg, GFR): Magnetoresistance and non-Ohmic conductivity of thin platinum films at low temperatures. *Phys. Rev. B* **25** (1982) 5563
- HOLMES, J. I., LOSSING, F. P. (c/o F. P. Lossing, Univ. Ottawa, Dept. Chem., Ottawa, Ontario, K1N 984 Canada): Heats of formation of the ionic and neutral ends of acetaldehyde and acetone. *J. Amer. Chem. Soc.* **104** (1982) 2648
- HOLŠTEJN, L. (Res. Inst. Bast Fibers, Unicevská, CS-78701 Šumperk, Czechoslovakia): Thermal degradation, burning and retardation of burning of textile fibres and textile materials. *Chem. Listy* **76** (1982) 575
- HORN, F. L., FILLO, J. A., POWELL, J. R. (Brookhaven Natl. Lab., Upton, N. Y., 11973 USA): Thermal conductivity measurements of insulators for fusion blankets. *J. Nucl. Mater.* **103** (1982) 597
- HOUSE, J. E. (Illinois State Univ., Dept. Chem., Normal, Ill., 61761 USA): Numerical solution of nonisothermal rate equations and analysis of solutions by the Reich-Stivala method. *Thermochim. Acta* **55** (1982) 241
- HOUSER, T. J., MCCARVILLE, M. E., BIFTU, T.: Kinetics of the thermal decomposition of pyridine in a flow system. *Int. J. Chem. Kinet.* **14** (1982) 733
- HSIEH, C. K., WANG, X. A. (Univ. Florida, Dept. Mech. Engn., Gainesville, Fla., 32611 USA): Twin-slope method of measurement of specific heat and coating absorbance of solid materials. *Rev. Sci. Instr.* **53** (1982) 684
- HUSSAIN, K. I., JASIM, F. (c/o F. Jasim, Univ. Baghdad, Coll. Sci., Dept. Chem., Baghdad, Iraq): Thermoanalytical behaviour of europium(III) and erbium(III) oxides-alkali persulfates binary systems. *Thermochim. Acta* **55** (1982) 173
- HYMAN, M., ROWE, M. W. (Texas A and M Univ., College Stn, Tex., 77843 USA): Determination of pyrite in coal and lignite by thermogravimetric analysis. *J. Chem. Educ.* **59** (1982) 424
- IGNATYUK, V. P., GATSURA, V. M. (V. I. Lenin Polytech. Inst. Kharkov, UkSSR): Effect of molecular mass of polystyrene on kinetic parameters of thermal degradation. *Vysokomol. Soedin. B* **24** (1982) 350 (in Russian)

- IKEDA, K., GSCHNEIDNER, K. A. (Iowa State Univ. Sci. and Technol., Ames Lab., Ames, Ia., 50011 USA): Quenching of spin fluctuations by high magnetic fields in the capacity of  $\text{GeSn}_3$ . *Phys. Rev. B* 25 (1982) 4623
- IKEDA, K., GSCHNEIDNER, K. A., BEAUDRY, B. J., ATZMONY, U. (Iowa State Univ. Sci. and Technol., Ames Lab., Ames, Ia., 50011 USA): Heat capacity in superconducting and normal state  $\text{LaS}_x$  ( $1.333 \leq x \leq 1.500$ ) compounds. *Phys. Rev. B* 25 (1982) 4604
- IKEDA, Y., ITO, H., MIZUNO, T., MATSUMOTU, G. (Nagoya Univ., Fac. Engr. Chikusa ku, Nagoya, Aichi, 464 Japan): The vaporization and thermal stability of lithium molybdates. *J. Nucl. Mater.* 105 (1982) 103
- INGMAN, J. S., KEARLEY, G. J., KETTLE, S. F. A. (c/o S. F. A. Kettle, Univ. E Anglia, Sch. Chem. Sci., Norwich, NR4 7TJ Norfolk, England): Optical and thermal studies of transitions between phases II, III and IV of ammonium nitrate. *J. Chem. Soc. Faraday Trans. I* 78 (1982) 1817
- ISHIBASHI, Y. (Nagoya Univ., Fac. Engr., Synthet. Crystal Res. Lab., Nagoya, Aichi, 464 Japan): Calculation of specific heat in an incommensurate phase of the  $\text{K}_2\text{SeO}_4$ -type crystals. *J. Phys. Soc. Jap.* 51 (1982) 1220
- IVANCHEV, S. J., UVAROVA, L. R., MATVEENTSEVA, M. S. (A. N. Sevchenko Appl. Phys. Problem Res. Inst., Gorki, USSR): Characteristics of thermal decomposition of oligoperoxides, containing perether and diacyl peroxide groups. *Zh. Obshch. Khim.* 52 (1982) 1418 (in Russian)
- JACOBS, R. L., TAKAHASHI, Y. (Univ. London Imperial Coll. Sci. and Technol., Dept. Math., London SW7 2B2 England): A calculation of the specific heat coefficients of alloys of Ni with Rh, Ru, Ir and Os. *J. Phys. F* 12 (1982) 529
- JAMNICKY, M., JÓNA, E. (Slovak Tech. Univ., Fac. Chem. Technol., Inst. Inorgan. Chem., CS-81237 Bratislava, Czechoslovakia): Heterogeneous reactions of solid nickel(II) complexes. XVII. Stoichiometry of thermal decomposition and stereochemistry of complex compounds of the type  $\text{Ni}(\text{NCS})_2$  (3-R pyridine) $_4$  (R = Et, Cl, Br, CN and  $\text{NH}_2$ ) and of their decomposition products. *Z. Anorg. Allg. Chem.* 487 (1982) 225
- JAUHAINEN, T. P. (Univ. Joensuu, Dept. Chem. and Biol. Sci., SF-80101 Joensuu, 10 Finland): Heat capacity of poly(oxy-2,6-dimethoxy-1,-4 phenylene). *Macromol. Chem. Macromol. Chem. Phys.* 183 (1982) 925
- JOARDAR, P., CHAKRABORTY, S. (c/o S. Chakraborty, Burdwan Univ., Dept. Phys. Burdwan, 7 13104 India): Debye temperature of some tetragonal crystals. *Indian J. Pure Appl. Phys.* 10 (1982) 302
- JUNG, J., RICHTER, E., KNOBLAUCH, K., JÜNTGEN, H. (Bergbau Forsch GmbH, D-4300 Essen 13 GFR): A new reactor for the analysis of thermal decomposition reactions. *Thermochim. Acta* 55 (1982) 161
- KAGAN, D. N. (Acad. Sci. USSR, Inst. High Temp., Moscow, V-71 USSR): High-temperature reaction adiabatic calorimeter for the measurement of alkali metal liquid alloy heats of mixing. *Zh. Fiz. Khim.* 56 (1982) 1318 (in Russian)
- KALNINSH, K. K. (Acad. Sci. USSR, Inst. Macromolec. Cpds, Leningrad, USSR): Spectral and thermochemical characteristics of N-phenylenediamine solid-phase complexes. *Zh. Fiz. Khim.* 56 (1982) 1125 (in Russian)
- KHALIL, A. (Univ. Wisconsin, Madison, Wis., 53706 USA): Thermal conductivity and diffusivity measurements at cryogenic temperatures by double specimen technique. *Cryogenics* 22 (1982) 310
- KHALIL, A. A. A. (Natl. Res. Ctr., Cairo, Egypt): Kinetics of gypsum dehydration. *Thermochim. Acta* 55 (1982) 201
- KHANNA, Y. P., PEARCE, E. M. (Allied Chem. Corp., Corp. Res. and Dev., Morristown, N. J., 07960 USA): Aromatic polyamides V. Substituent effect on thermal properties. *J. Appl. Polym. Sci.* 27 (1982) 2053

- KHANNA, Y. P., PEARCE, E. M., VERNICK, D. A. (Allied Chem. Corp., Corp. Res. and Dev. Morristown, N. J., 07960 USA): Aromatic polyamides. VI. Thermal behavior of model diamides. *J. Appl. Polym. Sci.* **127** (1982) 2301
- KIBA, N., SAWADA, Y., FURUSAWA, M. (Yamanashi Univ., Fac. Engrn., Dept. Chem., Kofu, Yamanashi 400 Japan): Determination of some dithiocarbamates by catalytic thermometric titration. *Talanta* **29** (1982) 416
- KISELEV, S. V., CHUVAEV, V. F. (Acad. Sci. USSR, Inst. Phys. Chem., Moscow, V-71 USSR): Thermal dehydration and decomposition of  $H_6[P_2W_{18}O_{62}] \cdot NH_2O$  crystalline heteropolyacid. *Zh. Neorg. Khim.* **27** (1982) 699 (in Russian)
- KOCH, E. (Max Planck Inst., Strahlenchem., D-4330 Mulheim, GFR): Reaction kinetics at linearly increased temperature. I. Comparative characterization of reactions in solution and solid phase in a unique "mechanistic diagram". *Thermochim. Acta* **56** (1982) 1
- KOLPAKOVA, N. N., SINII, I. G., POLOMSKA, M., MARGRAPH, R. (A. F. Joffe Engrn., Phys. Inst., Leningrad, USSR): Phase transitions in  $Cd_2NB_2O_7$ . *Fiz. Tverd. Tela* **24** (1982) 1729 (in Russian)
- KOMAROVA, Z. B., PIRKES, S. B., ZAKHAROVA, T. V., AVERYANOVA, V. M. (N. G. Chernyshevskii State Univ., Dept. Polymer and Colloid Physicochem., Saratov, USSR): Salts of rare earth elements as thermal stabilizers of cellulose acetate. *Izv. Vyssh. Uch. Zav. Khim.* **25** (1982) 467 (in Russian)
- KOPYLOVA, V. D., VALDMAN, A. I., BOIKO, E. T., KHADRIN, A. P., PANFILOV, B. I., VALDMAN, D. I. (Moscow Cooperat Inst., Moscow, USSR): Microcalorimetric study of copper(III) ion sorption by phosphorus containing ionites. 1. Ionite nature effect. *Zh. Fiz. Khim.* **56** (1982) 899 (in Russian)
- KOPYLOVA, V. D., VALDMAN, A. I., BOIKO, E. T., KHARDIN, A. P., PANFILOV, B. I., VALDMAN, D. I. (Moscow Cooperat Inst., Moscow, USSR): Microcalorimetric study of copper(II) ion sorption by phosphorus containing ionites. 2. Effects of the polymeric net structure. *Zh. Fiz. Khim.* **56** (1982) 903 (in Russian)
- KOSHCHENKO, V. I., GRINBERG, Y. K., DEMIDENKO, A. F., ZHELAGINA, V. A. (D. I. Mendeleev Chem. Technol. Inst., Novomoskovsk, USSR): Temperature dependence of the thermodynamic properties of  $In_2Se_2$ , at 5–300° K. *Inorg. Mater.* transl. *Izv. Akad. NAUK SSSR Neorg. Mater.* **17** (1981) 1471
- KOSHCHENKO, V. I., DEMIDENKO, A. F., GRINBERG, Y. K., YACHMENEV, V. E. (D. I. Mendeleev Chem. Technol. Inst., Novomoskovsk, USSR): Specific heats and thermodynamic functions of BP, BAs, and  $B_6A_5$  at 5–310° K. *Inorg. Mater.* transl. *Izv. Akad. Nauk SSSR Neorg. Mater.* **17** (1981) 1460
- KOŠTENSÁ, I., MALINOVSKÝ, M. (Slovak Techn. Univ., Dept. Inorgan. Technol., CS-81237 Bratislava, Czechoslovakia): Molar enthalpy of fusion and degree of thermal dissociation of  $Na_3FSO_4$ . *Chem. Zvesti* **36** (1982) 151
- KOYAMA, J., SUGITA, T., SUZUTA, Y., IRIE, H. (Kobe Womens Coll. Pharm., Kobe, 658 Japan): Thermal rearrangement of cyclohexanone oxime o-benzyl ether. *Heterocycles* **19** (1982) 1291
- KOZMISKI, S. J., HARRISON, I. R. (Penn. State Univ., Dept. Mat. Sci. and Engrn., Polymer Sci. Sect., University Pk Pa., 16802 USA): Thermal analysis of poly(bisphenoxyphosphazene) single crystals and melt crystallized samples. *J. Appl. Polym. Sci.* **27** (1982) 1783
- KRAMER, C. M., MUNIR, Z. A., VOLPONI, J. V. (USN, Res. Lab., Div. Chem., Washington, D. C., 20375 USA): Differential scanning calorimetry of sodium and potassium nitrates and nitrites. *Thermochim. Acta* **55** (1982) 11
- KROTIKOV, V. A., KHARITONOV, N. P., KUZNETSOVA, L. K. (I. V. Grebenshchikov Silicate Chem. Inst., Leningrad, USSR): Thermal decomposition of polymethylphenylsiloxane in compositions with silicates, chromium oxide, and an added polyester. *J. Appl. Chem. USSR* transl. *Zh. Prikl. Khim.* **54** (1981) 1537
- KUKUSHKIN, Y. N., VRUBELEVSKAYA, L. V., ISACHKINA, T. S., POSTNIKOVA, E. S.

- (Lensovet Technol. Inst., Leningrad, USSR): Thermal conversions of diaminate type platinum(II) thiocyanate complexes. *Zh. Neorg. Khim.* 27 (1982) 1250 (in Russian)
- KULKARNI, S. J., KULKARNI, S. B. (Natl. Chem. Lab., Div. Phys. Chem., Poonia 411008 Maharashtra, India): Physicochemical characterization of ferric exchanged Y zeolites. *Thermochim. Acta* 56 (1982) 93
- KUROKI, T., IKEMURA, T., OGAWA, T., SEKIGUCHI, Y. (1-10-1 Shinmachi, Hoya Tokyo, 202 Japan): Kinetic study on the first stage during thermal degradation of polystyrene. *Polymer* 23 (1982) 1091
- KVAVADZE, K. A., TARKHNISHVILI, L. A., NADAREISHVILI, M. M., NAKHUTSRISHVILI, T. K. (Acad. Sci. GeSSR, Inst. Phys., Tbilisi, GeSSR): Calorimetric studies of low-temperature heat capacity of KCl crystals with light impurities. *J. Low Temp. Phys.* 47 (1982) 375
- LAHIRI, A. K. (Indian Inst. Sci., Dept. Met., Bangalore, 560012 Karnataka, India): Effect of experimental parameters on non-isothermal TG. *Thermochim. Acta* 55 (1982) 97
- LAZOVENKO, A. N., IGNATOV, V. A., VKOLOVA, N. N., MITYUSHINA, V. I. (Ivanovo Chem. Technol. Inst., Dept. Paint and Varnish Chem. Technol., Ivanovo, USSR): Use of differential thermography for quality analysis of sulfonamides. *Izv. Vyssh. Uch. Zav. Khim.* 25 (1982) 512 (in Russian)
- LEBEDEV, R. S., NOVIKOV, V. V., SIDOROV, A. A. (I. G. Petrovskii Teachers Inst., Bryansk, USSR): Temperature dependence of 2-iminothiazolidone 4. Thermal capacity. *Zh. Fiz. Khim.* 56 (1982) 993 (in Russian)
- LEE, H. (IBM Corp., E. Fishkill Facil, Hopewell Junction, N. Y., 12533 USA): Rapid measurement of thermal conductivity of polymer films. *Rev. Sci. Instr.* 53 (1982) 884
- LEWIS, J., OKIEIMEN, F. E., PARK, G. S. (Uwist, Dept. Chem., Cardiff, CF1 3NU, S Glam, Wales): The stabilizing effect of allyl chloride copolymer units on the thermal degradation of poly(vinyl chloride). *J. Macromol. Sci. A* 17 (1982) 915
- LEYDET, P. (Univ. Provence Marseille, F-13331 Marseille, 3 France): Établissement de relations analytiques représentant les enthalpies des binaires organiques a partir des diagrammes d'injection lineaire par calorimétrie de flux. *Thermochim. Acta* 55 (1982) 193
- LINDNER, E., STEINWAND, M., HOENHE, J. (Univ. Tubingen, Inst. Anorgan. Chem., D-7400 Tubingen, 1 GFR): Preparation structure and thermal behaviour of (2-chloroacyl) diphenylphosphanes — a new pathway to chlorokenetes. *Chem. Ber.* 115 (1982) 2181
- LLOYD, D. J., CHATURVEDI, M. C. (Alcan Int. Ltd, Kingston Labs., POB 8400 Kingston, Ontario, Canada): A calorimetric study of aluminium alloy AA-7075. *J. Mater. Sci.* 17 (1982) 1819
- LOVCHINOV, V. A., MADGE, H., CHRISTENSEN, A. A. (Inst. Solid State Phys., BU-1184 Sofia, Bulgaria): Low temperature specific heat of  $TiN_x$ . *Phys. Scr.* 25 (1982) 649
- LUKYANENKO, L. V., PETRENKO, V. V., TUROVSKI, A. A., TUROVSKI, N. A. (Acad. Sci. UkSSR, Inst. Phys. Organ. Chem. and Coal Chem., Donetsk, 340048 UKSSR): Decomposition of alkoxyradicals in a solid phase at low temperatures. *Zh. Org. Khim.* 18 (1982) 705 (in Russian)
- LUM, R. M., FEINSTEIN, L. G. (Bell Tel. Labs. Inc., Allentown, Pa., 18103 USA): Thermal degradation of polymers for Molded integrated circuit (IC) devices — the effect of a flame retardant. *Symp. on Polymer Materials for Electronic Applications at 2nd Chemical Congress of the North American Continent, Las Vegas, NV, August 26-27, 1980. Edit. E. D. Feit, C. W. Wilkins, American Chemical Society (Washington) 1982, 213*
- MACKAY, D. M., ROBERTS, P. V. (Stanford Univ., Dept. Civil Engr., Stanford, Calif., 94305 USA): The influence of pyrolysis conditions on yield and microporosity of lignocellulosic chars. *Carbon* 20 (1982) 95
- MACKAY, D. M., ROEBRTS, P. V. (Dept. Civil Engr., Stanford, Calif, 94305 USA): The influence of pyrolysis conditions on the subsequent gasification of lignocellulosic chars. *Carbon* 20 (1982) 105

- MACKENZIE, K. J. D. (Dsir, Div. Chem., Pelone, New Zealand): A Mössbauer study of the high-temperature reactions of iron oxides with calcium silicates. *J. Mater. Sci.* **17** (1982) 1834
- MAGALINSKII, V. B. (P. Lumumba Univ., Moscow, USSR): Linear dependence of thermal and caloric equations of state on solidus and liquidus lines. *Izv. Vyssh. Uch. Zav.* **25** (1982) 3 (in Russian)
- MALATI, M. A., MCEVOY, M. (Mid. Kent Coll. Higher and Further Educ., Chatham, ME5 9UQ England): The standard heats of formation of some divalent-metal orthosilicates. *Rev. Chim. Miner.* **19** (1982) 65
- MANCHE, E. P., CARROLL, B. (CUNY York Coll., Dept. Nat. Sci., Jamaica, N. Y., 11451 USA): Simultaneous thermoluminescence and differential scanning calorimetry. *Anal. Chem.* **54** (1982) 1236
- MARTIN, J. F., ANDON, R. J. L. (Univ. Strathclyde, Dept. Met., Glasgow, G1 1XW Scotland): Thermodynamic properties of organic oxygen compounds. LII. Molar heat capacity of ethanoic, propanoic and butanoic acids. *J. Chem. Thermodyn.* **14** (1982) 679
- MASALITINOVA, T. N., OLEINIKOVA, T. P., RYADNENKO, V. L., KISELEVA, N. N., LEBEDEVA, N. D. (Moscow Appl. Chem. Inst., Moscow, USSR): Thermal effect of the hydrogenation of chloronitrobenzenes. *J. Appl. Chem. USSR transl. Zh. Prikl. Khim.* **54** (1981) 1551
- MATTIASSON, B., DANIELSSON, B. (Univ. Lund, Ctr. Chem., Dept. Pure and Appl. Biochem., S-22007 Lund, 7 Sweden): Calorimetric analysis of sugars and sugar derivatives with aid of an enzyme thermistor. *Carbohydr. Res.* **102** (1982) 273
- MATYUSHIN, Y. N., KONKOVA, T. S., VOROB'EV, A. B., LOGINOVA, E. N., TITOVA, K. V., LEBEDEV, Y. A. (Acad. Sci. USSR, Inst. New Chem. Problems, Chernogolovka, USSR): Thermochemical properties of dimethyltriazanium salts. *Bull. Acad. Sci. USSR Div. Chem. Sci. transl. Izv. Akad. Nauk SSSR Khim.* **30** (1981) 1406
- MAZEN, S. A., AHMED, M. A., SABRAH, B. A. (Zagazig Univ., Fac. Sci., Dept. Phys., Zagazig, Egypt): Thermal studies on the electrical conduction mechanism of  $\text{CuFe}_2\text{O}_4$ . *Phys. Status Solidi A* **70** (1982) K 71
- McLURE, I. A., TREJO RODRIGUEZ, A. (Univ. Sheffield, Dept. Chem., Sheffield, S3 7HF, S. Yorkshire, England): Excess functions for (*n*-alkanenitrile + *n*-alkane) liquid mixtures. 1. Excess enthalpies at 298.15 K for propanenitrile and *n*-butanenitrile with some  $\text{C}_3$  to  $\text{C}_{14}$  *n*-alkanes. *J. Chem. Thermodyn.* **14** (1982) 439
- MENASHE, J., WAKEHAM, W. A. (c/o W. A. Wakeham, Univ. London Imperial Coll. Sci. and Technol., Dept. Chem. Engr. and Chem. Technol., London SW7 2A2 England): The thermal conductivity of *n*-nonane and *n*-undecane at pressures up to 500 MPa in the temperature range 35–90°C. *Ber. Bunsen Ges. Phys. Chem.* **86** (1982) 541
- MERTENS, J. J. R., JACOBS, E., CALLAERTS, A., BUEKENS, A. (c/o A. Buekens, Vruue Univ. Brussel, B-1050 Brussels, Belgium): Kinetic study of the thermal decomposition of polystyrene by means of pyrolysis gas chromatography. *Makromol. Chem. Rap. Comm.* **3** (1982) 349
- MINADAKIS, C., SABBAB, R. (c/o R. Sabbah, CNRS, Ctr. Thermodynam. and Microcalorimetrie, F-13003 Marseille, France): Thermodynamique de composés arotes. VIII. Etude thermochimique de la diéthanolamine et de la réaction de réduction de l'eau par celle-ci. *Thermochim. Acta* **55** (1982) 147
- MIQUET, A., CHARQUET, D., ALLIBERT, C. H. (Cezus, Ctr. Rech. Ugine Aciers, F-73400 Ugine, France): Solid state phase equilibria of zircaloy-4 in the temperature range 750–1050°C. *J. Nucl. Mater.* **105** (1982) 132
- MITAL, S. P., SINGH, R. V., TANDON, J. P. (Univ. Rajasthan, Dept. Chem., Jaipur, 302004, Rajasthan, India): Spectral thermal and X-ray diffraction studies of La(III) and Sm(III) complexes of nitrogen and sulphur donor ligands. *J. Inorg. Nucl. Chem.* **43** (1981) 3187
- MITCHELL, T. E., VOSS, D. A., BUTLER, E. P. (Case Western Reserve Univ., Dept. Met. and Mat. Sci., Cleveland, Ohio, 44106 USA): The observation of stress effects during the

- high temperature oxidation of iron. *J. Mater. Sci.* **17** (1982) 1825
- MONKOWSKI, M. D., MONKOWSKI, J. R., TSONG, I. S. T., STACH, J., TRESSLER, R. E. (Penn. State Univ., Dept. Mat. Sci. and Engr., University Pk, Pa., 16802 USA): Microstructure development during the thermal oxidation of silicon in chlorine containing ambients. *J. Non-Cryst. Solids* **49** (1982) 201
- MONTHEARD, J. P., CAMPS, M., KAWAYE, S., PHAM, Q. T., SEYTRE, G. (UER Sci., 23 Rue Docteur Paul Michelon, F-42023 St. Etienne, France): Poly(alpha-acetoxy-styrene) and copolymers of alpha-acetoxy-styrene with styrene and substituted styrenes obtained by thermal polymerization. Study of the microstructure and thermal stability of the polymers. *Makromol. Chem. Macro. Chem. Phys.* **183** (1982) 1191
- MOTEKAITIS, R. J., COX, X. B., TAYLOR, P., MARTELL, A. E., MILES, B., TVEDT, T. J. (c/o A. E. Martell, Texas A and M Univ., Dept. Chem. College., Str., Tex., 77843 USA): Thermal degradation of EDTA chelates in aqueous solution. *Can. J. Chem.* **60** (1982) 1207
- MOZHAROV, G. I., SAVATIMSKI, A. I. (Acad. Sci. USSR Inst. High Temp., Moscow, V-71 USSR): Specific heat of solid and liquid niobium up to 5000° K. *High Temp. transl. Teplofiz. Vysok. Temp.* **19** (1981) 691
- MUNOZ, M. A. B., CATALINA, A. A., ISCAR, J. L. M. (Univ. Salamanca, Fac. Ciencias, Dept. Quim. Inorgan, Salamanca, Spain): Thermogravimetric, magnetic and spectrophotometric study of dimethylsulphoxide complexes of lanthanide iodides. *An. Quim. B* **78** (1982) 18
- MURAISHI, K., NAGASE, K., KIKUCHI, M., SONE, K., TANAKA, N. (c/o K. Sone, Yamagata Univ., Fac. Sci., Dept. Chem. Yamagata, 990 Japan): Influence of the lanthanoid contraction on the thermal dehydration reactions of lanthanoid(III) malonate hydrates. *Bull. Chem. Soc. Jap.* **55** (1982) 1845
- MURAKAMI, M. (IBM Corp., Thomas J. Watson Res. Ctr., Yorktown, HTJ, N. Y., 10598 USA): Thermal stability of Pb-alloy Josephson junction electrode materials. VI. Effects of film edges on the strain distribution of Pb-Bi counterelectrodes. *J. Appl. Phys.* **53** (1982) 3560
- MURTHY, C. S. R., RAO, G. N., RAO, A. P. (Indian Inst. Technol., Dept. Chem., New Delhi, 110016 India): Thermal decomposition of mixed ligand complexes of cobalt(II), nickel(II), zinc(II) and cadmium(II) containing 1,3-diaminopropan-2-ol and oxalate. *Thermochim. Acta* **55** (1982) 19
- MUSSIG, B., WOCHNOWSKI, H. (Univ. Hamburg, Inst., Phys. Chem., D-2000 Hamburg, 13 GFR): Determination of the phase separation temperature of polymer solutions by differential thermoanalysis. *Angew. Makromol. Chem.* **104** (1982) 203
- NAGATA, I. (Kanazawa Univ., Dept. Chem. Engr., Kanazawa, Ishikawa, 920 Japan): Prediction of ternary phase equilibria from binary data. *Thermochim. Acta* **56** (1982) 43
- NAGY, T. T., TURCSÁNYI, B., KELEN, T., TÜDŐS, F. (Hungarian Acad. Sci., Cent. Res. Inst. Chem., H-1025 Budapest, Hungary): Effects of lead salts on thermal poly(vinyl chloride) degradation. *Angew. Makromol. Chem.* **104** (1982) 67
- NAONO, H., FUJIWARA, R., SUGIOKA, H., SUMIYA, K., YANAZAWA, H. (Kwansei Gakun Univ., Fac. Sci., Dept. Chem., Nishinomiya, Hyogo, 662 Japan): Micropore formation due to thermal decomposition of acicular microcrystals of  $\beta$ -FeOOH. *J. Colloid Interface Sci.* **87** (1982) 317
- NEDEL'KO, V. V., VERKHOVSKAYA, M. Y., KORSUNSKII, B. L., NAZAROV, A. S. (Acad. Sci. USSR, Inst. Chem. Phys., Chernogolovka, USSR): Thermal decomposition of insertion product of chlorine trifluoride into fluorinated graphite matrix. *Bull. Acad. Sci. USSR Div. Chem. Sci. transl. Izv. Akad. Nauk SSSR Ser. Khim.* **30** (1981) 1568
- NGUYEN, T. T., KING, K. D. (Univ. Adelaide, Dept. Chem. Engr., Adelaide, SA 5001 Australia): Very low-pressure pyrolysis (VLPP) of pentynes. III. Pent-2-yne. Heat of formation and resonance stabilization energy of the 3-methylpropargyl radical. *Int. J. Chem. Kinet.* **14** (1982) 613
- NICHOLS, S., LAOHAVIROJANA, F. (Univ. Hull, Dept. Appl. Phys. Hull, HU6 7RX, N.

- Humberside, England): A vacuum differential thermal analysis apparatus. *J. Phys. E* 15 (1982) 506
- NIEUWENHUYTS, G. J. (Leiden State Univ., Kamerlingh Onnes Lab., 2312 Av. Leiden, Netherlands): Specific heat of PdDy and PdEr dilute alloys crystalline electric field effects. *Physica B + C* 113 (1982) 277
- NIEWIADOMSKI, K., RATAJCZYK, M., RZEWUSKI, M. (Sch. Med., Inst. Drug Sci., Biosynth. Drugs. Lab., PL-02097 Warszawa, Poland): Synthesis of 2-(4-isobutylpiperidine)propyl amides of expected anti-inflammatory action. *Polish. J. Chem.* 55 (1982) 941
- NIFANTEV, E. E., KRYUCHKOV, A. A. (V. I. Lenin State Teachers Inst., Moscow, USSR): Characteristics of thermal stability of 4,4-dimethyl-2-ethoxy-2-oxo-1,3,2-dioxaphospholane. *Zh. Obshch. Khim.* 52 (1982) 795 (in Russian)
- NIKITINA, E. V., STAROVA, G. L., FRANK-KAMENETSKAYA, O. V., PEVZNER, M. S. A. A. Zhdanov State Univ., Leningrad, B-164 USSR): The molecular and crystal structure of bis(3 nitro-1,2,4-triazolyl)-5 dihydrate,  $C_4H_2N_8O_4 \cdot 2 H_2O$ . The relationship with thermal deformations and optical properties. *Kristallografiya* 27 (1982) 485
- NILSSON, H., SILVEGREN, C., TÖRNELL, B. (c/o B. Törnell, Lund Inst. Technol., Dept. Chem. Technol., S-22007 Lund, 7 Sweden): A calorimetric reactor system for kinetic studies of heterogeneous polymerizations. A calorimetric reactor for kinetic studies. *Chem. Scr.* 19 (1982) 164
- NIRSHA, B. M., CHUBINIDZE, A. D., VELIKODNYI, Y. A., ZHADANOV, B. V., OLIKOVA, V. A. (All Union Chem. Reagent and Highly Pure Chem. Subst. Res. Inst., Moscow, USSR): Thermal behavior of rubidium and cesium hydroformates. *Zh. Obshch. Khim.* 52 (1982) 1209 (in Russian)
- NOTIN, M., GACHON, J. C., HERTZ, J. (Univ. Nancy 1, Thermodynam. Metallurg. Lab., F-54506 Vadoeuve, Nancy, France): Enthalpie of formation of  $Al_4Ca$  and  $Al_2Ca$  and of the liquid alloys (aluminium-calcium). *J. Chem. Thermodyn.* 14 (1982) 425
- NOVIKOV, I. I., ROSHCHUPKIN, V. V., MOZGOVOI, A. G., SEMASHKO, N. A. (A. A. Baikov Met. Inst., Moscow, USSR): Specific heat of nickel and niobium in the temperature interval 300–1300° K. *High Temp.* transl. *Teplofiz. Vysok. Temp.* 19 (1981) 694
- NYVLT, J., PEKAREK, V. (Czechoslovak Acad. Sci., Inst. Inorgan. Chem., 24 Mayakovski Rd, CS-16000 Prague, 6 Czechoslovakia): Crystallization studies by thermometric methods. 4. Assessment of kinetic data from calorimetric curves. *Z. Phys. Chem.* 128 (1981) 197
- OETLING, F. L. (Rockwell Int. Corp. Energy Syst. Grp., Golden, Colo., 80401 USA): The chemical thermodynamics of nuclear materials. 7. The high-temperature enthalpy of plutonium dioxide. *J. Nucl. Mater.* 105 (1982) 257
- OKHOSKI, I., YOKOYAMA, I., WASEDA, Y., ALBLAS, B. P., VANDERLUGT, W. (Natl. Def. Acad., Dept. Math. and Phys., Yokosuka, Kanagawa, 239 Japan): Calculations of entropies and specific heats of liquid metallic elements in the Percus–Yevick phonon approximation. *Physica B + C* 113 (1982) 195
- OHLENDORF, D., SEVERIN, H. G., WICKE, E. (Inst. Phys. Chem., D-4400 Munster, GFR): Heat capacity measurements of pulverized metal hydrides between 1.5 K and 15 K by means of the Cu-tabletting method. *Z. Phys. Chem.* 128 (1982) 137
- OLSON, P., YUEN, D. M. (Johns Hopkins Univ., Dept. Earth and Planetary Sci., Baltimore, Md., 21218 USA): Crystal structure of the Mariana trough. *J. Geophys. Res.* 87 (1982) 3993
- OSTRIZHKO, F. N., YUMINOV, V. S., SALIVON, N. Y., PANSHIN, Y. A. (Plast-polymer Sci. Ind. Assoc., Okhta, USSR): Thermal and hydrolytic stability of bis-perfluoroacyl peroxides. *J. Appl. Chem. USSR* transl. *Zh. Prikl. Khim.* 54 (1981) 1555
- PAKULA, T. (Polish Acad. Sci., Ctr. Molec. and Macromolec. Stiplics, PL-90362 Łódź, 40 Poland): Comparative DSC technique.

- Application to studies of melting of branched polyethylene. *Makromol. Chem. Macro. Chem. Phys.* **183** (1982) 1577
- PAPA, T., SCUDIARI, F. (Univ. Rome, Fac. Ingn. Ist. Fis., I-00100 Rome, Italy): Photoacoustic determination of thermal conductivity of ion implanted silicon. *Opt. Commun.* **41** (1982) 431
- PAPAZIAN, J. M. (Grumman Aerosp. Corp., Dept. Res., Bethpage, N. Y., 11714 USA): Calorimetric studies of precipitation and dissolution kinetics in aluminium alloys 2219 and 7075. *Metal Trans. A* **13** (1982) 761
- PAPINA, T. S., KOLESOV, V. P. (M. V. Lomonosov State Univ., Moscow, 117234 USSR): Standard enthalpy of the 1,2-dichlorotetrafluoroethane formation. *Zh. Fiz. Khim.* **56** (1982) 1108 (in Russian)
- PASECHNIK, L. A., SLESARENKO, N. V. (Kiev Polytech. Inst., Kiev, UkSSR): Specific heat of orthorhombic gadolinium molybdate. *Fiz. Tverd. Tela* **24** (1982) 944 (in Russian)
- PATEL, R. D., PATEL, M. R. BHARDWAJ, I. S. (c/o M. R. Patel, Sardar Patel Univ., Dept. Chem., Vallabh Vidynagar, 388120 Gujarat, India): Synthesis and characterization of thermally stable poly-N,N'-arylene-bismaleimide. *Thermochim. Acta* **55** (1982) 49
- PEEHS, M., DORR, W., GRADEL, G., MAIER, G. (Kraftwerk Union AG, Postfach 3220, D-8520 Erlangen, GFR): Thermal conductivity and plasticity of  $\text{UO}_2$  with added Gd. *J. Nucl. Mater.* **106** (1982) 221
- PELIKH, L. N., ZVYAGIN, A. I. (Acad. Sci. UkSSR, Inst. Low Temp. Engrn. Phys., Kharkov, 108 UkSSR): Phase transitions in layered  $\text{Cs}_{1-x}\text{K}_x\text{Dy}(\text{MoO}_4)_2$  and  $\text{Cs}_x\text{Rb}_{1-x}\text{Dy}(\text{MoO}_4)_2$  crystals. *Fiz. Tverd. Tela* **24** (1982) 1536 (in Russian)
- PELLY, I. (Ben Gurion Univ. Negev., Dept. Geol. and Mineral, IL-84120 Beersheba, Israel): The thermal decomposition of doped ammonium perchlorate. *Thermochim. Acta* **55** (1982) 27
- PENNINGER, J. M. L. (Akzo Zout Chem. Nederland BV, POB 25 7550 GC Hengelo, Netherlands): New aspects of the mechanism for the thermal hydrocracking of indan and tetralin. *Int. J. Chem. Kinet.* **14** (1982) 761
- PETERSON, M. W., RICHMAN, R. M. (c/o R. M. Richman, Carnegie Mellon Univ., Dept. Chem., Pittsburgh, Pa., 15213 USA): Photochemical and thermal studies of bis(diethyl-dithiocarbamate) dioxomolybdenum. *Inorg. Chem.* **21** (1982) 2609
- PFESTORF, R., KUCHENBECKER, D., QUITZSCH, K. (Karl Marx Univ., Sekt. Chem., DDR-7010 Leipzig, GDR): Caloric excess characteristics of liquid nonelectrolyte systems. 4. Experimental determination and predetermination of the mean molar enthalpies of normal-alkylamine normal-alkane systems. *Z. Phys. Chem.* **263** (1982) 233
- PHILLIPS, C. R., LUYMES, R., HALAHEL, T. M. (Univ. Toronto, Dept. Chem. Engrn. and Appl. Chem., Toronto, Ontario, M5S 1A4 Canada): Enthalpies of pyrolysis and oxidation of athalasca oil sands. *Fuel* **61** (1982) 639
- PHILLIPS, W. E. (NBS, Div. Semiconductor Mat. and Proc., Washington, D. C., 20234 USA): Improved thermometry for deep-level measurements. *J. Phys. E* **15** (1982) 499
- POPOVA, T. I. (Kaliningrad State Univ., Dept. Analyt. Chem., Kaliningrad, USSR): Methods of emission analysis for studying the mechanism of thermal decomposition reactions of solid component mixtures. *Izv. Vyssh. Uch. Zav. Khim.* **25** (1982) 243 (in Russian)
- POPPELWELL, J., ALQENAIE, A., CHARLES, S. W. (Univ. Wales Univ. Coll. N. Wales, Sch. Phys. and Molec. Sci., Bangor LL57 2UW Gwynedo, Wales): Thermal conductivity measurements on ferrofluids. *Colloid Polym. Sci.* **260** (1982) 333
- POUCL'Y, ŽIVNÝ, A., BIROS, J., SIKORA, A. (Czechoslovak Acad. Sci., Inst. Macromolec. Chem., CS-16206 Prague, Czechoslovakia): Contribution to the theory of heat capacity of associated systems. *Chem. Listy* **76** (1982) 337
- RADCLIFFE, D. J., ROSENBERG, H. M. (Comp. Aided Design. Ctr., Cambridge, England): The thermal conductivity of glass-fibre and carbon-fibre/epoxy composites from 2 to 80 K. *Cryogenics* **22** (1982) 245



- RAHARISOA, A., FILLIATRE, C., VILLENAVE, J. J. (c/o J. J. Villenave, Univ. Bordeaux 1, Ecole Natl. Super. Chim., Chim. Appl. Lab., F-33405 Talence, France): Determinations cinétiques par analyse microcalorimétrique différentielle. XIII: Décomposition, catalyse par l'éthyl-2 hexanoate de cuivre, du perbenzoate de t-butyle en solution. *Thermochim. Acta* 55 (1982) 135
- RAMIREZ, A. P., WOLF, W. P. (Yale Univ., Becton Ctr., New Haven, Conn., 06520 USA): Specific heat of CsNiF<sub>3</sub>: evidence for spin solitons. *Phys. Rev. Lett.* 49 (1982) 227
- RASCHELLA, D. L., HAIRE, R. G., PETERSON, J. R. (Westvaco Res. Lab., Johns Hopkins RD, Laurel, M. D., 20810 USA): First determination of the enthalpy of solution of californium metal. *Radiochim. Acta* 30 (1982) 41
- RAZUVAEV, G. A., MÁRIN, V. P., DRUSHKOV, O. N., VYSHINSKAYA, L. I. (c/o V. P. Marin, Acad. Sci. USSR, Inst. Chem., Gorki, USSR): Thermal decomposition of bis(cyclopentadienyl) hafnium compounds and their deuterated analogues. *J. Org. Chem.* 231 (1982) 125
- RAZUVAEV, G. A., SIROTKIN, N. I., ARTEMOV, A. N., SMIRNOV, A. S. (N. I. Lobachevskii State Univ., Chem. Res. Inst., Gorki, USSR): Thermal decomposition of bis(phenylchromium tricarbonyl) mercury. *Bull. Acad. Sci. USSR Div. Chem. Sci. transl. Izv. Akad. Nauk SSSR Khim.* 30 (1981) 1766
- REN, S. Y., DOW, J. D. (Univ. Sci. and Technol. China, Dept. Phys., Hefei, Peoples R. China): Thermal conductivity of superlattices. *Phys. Rev. B* 25 (1982) 3750
- REZNITSKII, L. A., FILIPPOVA, S. E., (M. V. Lomonosov State Univ., Dept. Gen. Chem., Moscow, 117234 USSR): An approximate calculation of heats of formation of hafnium oxycarbides. *Vestn. Mosk. Univ. Khim.* 23 (1982) 299 (in Russian)
- RIVORY, J., FRIGERIO, J. M., HARMELIN, M., OUIVY, A., CALVAYRAC, Y., BIGOT, J. (Univ. Paris, 06 Opt. Solides Lab., CNRS, ERA 462 F-75230 Paris, 05 France): Preparation of Cu<sub>x</sub>Zr<sub>1-x</sub> metallic glasses by sputtering and their thermal stability electrical and optical properties. *Thin Solid Films* 89 (1982) 323
- ROBERT, J., VASSILEV, G., COLOMB DE DAUNANT, I., BAUDON, J., BOCVARSKI, V. (Univ. Paris 13 CNRS Phys. Lasers Lab., 282 F-93430 Villeteuse France): Differential measurements of metatable Ar(3p<sup>5</sup>4As, <sup>3</sup>P<sub>0,2</sub>) on Ar(3p<sup>6</sup>, <sup>1</sup>So) collisions at thermal energies. *J. Phys. Lett.* 43 (1982) L 299
- RODANTE, F. (Univ. Rome, Fac. Ingn., Ist. Chim., I-00100 Rome, Italy): Study of solvent and substituent effects on organic acids. I. Consistency of a thermodynamic and an electrostatic model with experimental results of m-benzoic acid derivatives. *Thermochim. Acta* 56 (1982) 83
- ROMAIN, P. D., PATTERSON, D. (c/o D. Patterson, McGill Univ., Dept. Chem., Montreal, H3A 2N6 Quebec, Canada): Isomer effects in the excess enthalpies of mixtures of alkanes and cycloalkanes. *J. Solut. Chem.* 11 (1982) 119
- RUBLEV, B. L., VANCHINSYAM, Y. Y., GRINENKO, N. M., CHUIKO, G. S. (Lvov Polytech. Inst., Lvov, UKSSR): Estimation of thermochemical parameters of peroxide monomers by quantum-chemical method. *Ukr. Khim. Zh.* 48 (1982) 412 (in Russian)
- RUDERT, M., MULLER, G. (Univ. Heidelberg, Inst. Sedimentforsch., D-6900 Heidelberg, 1 GFR): Experimental investigation on the influence of various parameters (hydrochemistry, temperature experimental conditions, growth substrate) on formation of carbonate incrustation. (Boilers Scales). *Chem. Z.* 106 (1982) 191
- RUDNEV, A. V., ABRAMENKOVA, I. A., KALYAZIN, E. P. (M. V. Lomonosov State Univ., Radiat Chem. Lab., Moscow, 117234 USSR): The simulation of mechanism of the methanolformaldehyde system reactions initiated by radicals resulting from the thermal decomposition of t-butylperoxide. *Vestn. Mosc. Univ. Khim.* 23 (1982) 117 (in Russian)
- RUFFA, A. R. (USN, Res. Lab., Washington, D. C., 20375 USA): Thermal potential, mechanical instability, and melting entropy. *Phys. Rev. B* 25 (1982) 5895

- RYCHKOVA, I. E., KOROBEB, M. V., SIDOROV, L. N. (M. V. Lomonosov State Univ., Moscow, 117234 USSR): Vapor pressure and sublimation enthalpy of rhodium trifluoride. *Zh. Fiz. Khim.* 56 (1982) 1529 (in Russian)
- RYUMIN, A. I., CHUMAKOV, V. G., SMIRNOV, I. I., SORKINOVA, G. A. (M. I. Kalinin Nonferrous Met. Inst., Krasnoyarsk, USSR): Reaction of nickel and ammonium chlorides during heating. *Zh. Neorg. Khim.* 27 (1982) 1223 (in Russian)
- SAIKAL, Y., VERSAUD, P. C. (Univ. Libanaise, Fac. Sci., CNRS, Chim. Minerale Lab., 1, Beyrouth, Lebanon): Preparation and thermal decomposition of oxalato complexes of vanadyl and alkaline metal in the solid state. *Compt. Rend. II* 294 (1982) 839 (in French)
- SAINT-PAUL, M., LASJAUNIAS, J. C., LOCATELLI, M. (Inst. Venezolano Invest. Cient., Ctr. Fis., Caracas, 101017 Venezuela): Low-temperature thermal properties of neutron-irradiated crystalline quartz. *J. Phys. C* 15 (1982) 2375
- SALEH, A. F., MISHO, R. H., DUBEY, K. S. (Univ. Basrah, Coll. Sci., Dept. Phys., Basrah, Iraq): Lattice thermal conductivity of polymers at low temperature. *Acta Phys. Acad. Sci. Hung.* 50 (1981) 321
- SAMPATH, S., CHADHA, A., CHACKRABURTTY, D. M. (Bhabha Atom Res. Ctr., Div. Radiochem., Bombay, 400085 India): Thermal behaviour of co-precipitated mixtures of chromium(III) and uranium(VI). *Thermochim. Acta* 55 (1982) 249
- SANDROCK, R. (Ruhr Univ. Bochum, Dept. Chem. Phys. Chem. Lab., D-4630 Bochum, GFR): High-pressure high-temperature differential scanning calorimeter. *Rev. Sci. Instr.* 53 (1982) 1079
- SATO, S., KLEPPA, O. J. (Kyushu Univ., Dept. Nucl. Engr., Fukuoka, 812 Japan): Enthalpies of formation of borides of iron, cobalt and nickel by solution calorimetry in liquid copper. *Met. Trans. B* 13 (1982) 251
- SATO, T., MIYAKO, Y. (Hokkaido Univ., Fac. Sci., Dept. Phys. Sapporo, Hokkaido, 060 Japan): Nonlinear susceptibility and specific heat of  $(\text{Pd}_{0.9966}\text{Fe}_{0.0034}/0.95\text{Mn}_{0.05})$ . *J. Phys. Soc. Jap.* 51 (1982) 1394
- SAVIN, V. D., MIKHAILOVA, N. P. (Moscow Rare Met. Ind. Res. Inst., Moscow, USSR): Thermochemical characteristics of the reaction of calcium with gadolinium chloride in melts. *Zh. Fiz. Khim.* 56 (1982) 1129 (in Russian)
- SCHAUBROECK, J., GOEMINNE, A. M. (c/o A. M. Goeminne, State Univ. Ghent, Gen. and Inorgan. Chem. Lab. B., B-9000 Ghent, Belgium): Calorimetric determination of the thermodynamic properties involved in the complex formation of silver(I) with some sulphur-containing pyridines. *Thermochim. Acta* 56 (1982) 25
- SCHICK, C., TANNEBERGER, H., DONT, H. E. (Pedagog. Hsch. Liselotte Hermann Gustrow, Sekt. Math. Phys., DDR-2600 Gustrow, GDR): Time dependence of enthalpy in the glass transition region of poly(vinyl chloride). *Acta Polym.* 33 (1982) 163
- SCHINK, H. J., VANDENBERG, R., LECOMTE, G. V., DING, X. M., VONLOHNEYSSEN, H. (Rhein-Westfal. TH Aachen, Inst. Phys. 2 D-5100 Aachen, GFR): Low temperature specific heat of the metallic glass  $\text{Ti}_{50}\text{Be}_{40}\text{Zr}_{10}$  before and after structural relaxation. *Solid State Commun.* 42 (1982) 619
- SEGAL, E. (Polytech. Inst. Bucharest, Dept. Phys. Chem. and Electrochem. Technol., Bucharest, Romania): Non-isothermal kinetics with non-linear temperature programme. V. Non-linear heating programmes with exact solutions for the temperature integral. *Thermochim. Acta* 55 (1982) 43
- SEKHAR, J. A. (Univ. Illinois, Dept. Met. and Mining Engr., Urbana, Ill., 61801 USA): Errors in the DTA and DSC measurement of crystallization interface temperature. *Mater. Res. Bull.* 17 (1982) 837
- SEKKINA, M. M. A. EL-DISSOUKY, A. (Tanta Univ., Fac. Sci., Dept. Chem., Tanta, Egypt): Effect of temperature and absorbed ionizing radiation doses on the electric and electronic properties of copper(II) complexes. *Thermochim. Acta* 55 (1982) 231
- SELIVERSTOVA, I. A., SILAKOVA, N. S., RUDAKOVA, G. Y., SHUGAL, N. F. (All

- Union Chem. Reagent and Highly Pure Chem. Subst. Res. Inst., Moscow, USSR): Thermogravimetric study of complex compounds of rare earth elements of 2,3-dioxy-1,4-diaminobutanetetraacetic acid. *Zh. Neorg. Khim.* 27 (1982) 1126 (in Russian)
- SHAUB, W. M. (NBS, Div. Chem. Kinet., Washington, D. C., 20234 USA): Procedure for estimating the heats of formation of aromatic compounds: chlorinated benzenes, phenols and dioxins. *Thermochim. Acta* 55 (1982) 59
- SHCHEGROV, L. N., VDOVENKO, O. P., ZHUPIK, V. I. (Ukrainian Agr. Acad. Dept. Inorgan. and Analyt. Chem., Kiev, UkSSR): Quantitative evaluation of the composition of products from potassium dihydroortho phosphate thermal dehydration. *Izv. Vyssh. Uch. Zav. Khim.* 25 (1982) 131 (in Russian)
- SHEVCHENKO, Y. N., GOLUB, N. B. (L. V. Pisarzhevskii Phys. Chem. Inst., Kiev, UkSSR): Complex salts of cobalt(III) halogenides with pyridine and their thermal stability. *Ukr. Khim. Zh.* 48 (1982) 345 (in Russian)
- SHEVCHENKO, Y. N., SACHOK, V. V. (L. V. Pisarzhevskii Phys. Chem. Inst., Kiev, UkSSR): Thermal conversions of isomeric hexamine mixed-ligand complex salts of Cr(III) on air and in helium atmosphere. *Zh. Obshch. Khim.* 52 (1982) 1368 (in Russian)
- SHIH, C., SWENTON, J. S. (c/o J. S. Swenton, Ohio State Univ., Dept. Chem., Columbus, Ohio, 43210 USA): Thermal and photochemical rearrangement of (*o*-tolylcarbonyl) trimethylsilane. A 1,5-shift of a trimethylsilyl group from oxygen to carbon. *J. Org. Chem.* 47 (1982) 2668
- SHILO, I., FRANZEN, H. F., SCHIFFMANN, R. A. (Iowa State Univ. Sci. and Technol. Ames. Lab., Ames., Ia., 50011 USA): Enthalpies of formation of niobium aluminides as determined by the Knudsen-effusion. *J. Electrochim. Soc.* 129 (1982) 1608
- SHIMADA, S., MacKENZIE, K. J. D. (Hokkaido Univ., Fac. Engr., Sapporo, Hokkaido, 060 Japan): Solid-state reactions in the system Cu-Sb-O; formation of a new copper(II) antimony oxide. *Thermochim. Acta* 56 (1982) 73
- SHPIL'RAIN, É. É., KAGAN, D. N., UL'YANOV, S. N. (Acad. Sci. USSR, Inst. High Temp., Moscow, V-71 USSR): Setup for calorimetric experiments. *High Temp. transl. Teplofiz. Vysok. Temp.* 19 (1981) 758
- SHTREMPER, G. I., MURZUBRAIMOV, B., RYSMENDEEV, K. (Osha Teachers Inst., Osha, USSR): Thermal stability of complex compounds based on thiosemicarbazide. *Zh. Neorg. Khim.* 27 (1982) 789 (in Russian)
- SHUKLA, A. K., SEN, P., SARMA, D. D.: Transformations in  $Ag_{2+\delta}S$  and  $Ag_{2+\delta}Se$ : a calorimetric study. *Ber. Bunsen Ges. Phys. Chem.* 86 (1982) 198
- SIDEL'KOVSKAYA, V. G., ABRAMKINA, N. P., SURIN, S. A., SEMENOVA, E. S., LIKHOVA, Z. N., KALIKO, M. A., NEFEDOV, B. K. (All Union Petr. Proc. Res. Inst., Moscow, USSR): Derivatographic investigation of alumina-nickel molybdenum catalysts for hydrogenation processes in petroleum refining. *Kinet. Catal. transl. Kinet. Katal.* 22 (1981) 772
- SIROTA, N. N., TOMILO, Z. M. (Acad. Sci. BeSSR, Inst. Solid State and Semicond. Phys., Minsk, BeSSR): Specific heat capacity and thermodynamic functions of yttrium over the temperature range from 5 to 300 K. *Dokl. Akad. Nauk BSSR* 26 (1982) 405 (in Russian)
- SLADKOV, I. B. (M. I. Kalinin Polytech. Inst., Leningrad, 195251 USSR): Simple method for the approximate calculation of isobaric heat capacity of inorganic compound vapors. *Zh. Fiz. Khim.* 56 (1982) 1267 (in Russian)
- SMOLENSKII, E. A., KOCHAROVA, L. V. (All Union Physicotech. and Radioengn. Measurement Res. Inst., Moscow, USSR): Thermochemical conformational analysis and the calculation of standard formation enthalpies of Cl-substituted alkanes. *Dokl. Akad. Nauk SSSR* 264 (1982) 112 (in Russian)
- SORAI, M., YOSHIOKA, H., SUGA, H. (Osaka Univ. Fac. Sci. Chem. Thermodynam. Lab., Toyonaka, Osaka, 580 Japan): Studies of mesogenic disc-like molecules. III. Heat

- capacity of benzene-hexa-n-octanoate from 13 to 393 K. *Mol. Cryst. Liquid Cryst.* **84** (1982) 39
- SRIEDHAR, A. K., CHAUDHURI, N. (Def. Sci. Ctr. Metcalfe House, Delhi, 110054 India): Thermal conductivity in high purity materials. *Pure Appl. Chem.* **54** (1982) 909
- SRIVASTAVA, P. C. (India Ltd., Phys. Res. Wing, Sindri, 828122 India): Inner orbital splitting in some  $3d^h$  transition metal complexes with oxygen, sulphur and nitrogen donor ligands. *Thermochim. Acta* **55** (1982) 125
- SRIVASTAVA, T. N., SRIVASTAVA, P. C., KUMAR, R. (Univ. Lucknow, Dept. Chem., Lucknow, 226007 Uttar Pradesh, India): Synthesis, thermal decomposition and antibacterial activity of unsymmetric diorganotellurium dicarboxylates. *Indian J. Chem. A* **21** (1982) 309
- STEWART, G. R., SMITH, J. L., GIORGI, A. L., FISK, Z. (Univ. Calif. Los Alamos Natl. Lab., Los Alamos, N. M., 87545 USA): Specific heat of well-characterized  $TiBe_2$  at 0 and 7 T. *Phys. Rev. B* **25** (1982) 5907
- STOKKA, S., FOSSHEIM, K., JOHANSEN, T., FEDER, J. (Univ. Trondheim, Norwegian Inst. Technol., Dept. Phys., N-7034 Trondheim, Norway): Specific heat of  $CsPbCl_3$  near three phase transitions. *J. Phys. C* **15** (1982) 3053
- STRUKOV, B. A., SPIRIDONOV, T. P., MINAYEVA, K. A., FEDORIKHIN, V. A., DAVTYAN, A. V. (M. V. Lomonosov State Univ., Moscow, 117234 USSR): On the character of anomalies of thermal and elastic properties of TGS crystals with impurities. *Kristallografiya* **27** (1982) 313
- SUGÁR, I. P. (Semmelweis Med. Univ., Inst. Biophys., H-1444 Budapest, Hungary): A theoretical model of the temperature and pressure-induced phase transition of phospholipid bilayers. *Biophys. Chem.* **15** (1982) 131
- SUKKAR, M. H., SADOWAY, D. R. (MIT, Dept. Mat. Sci. and Engn., Cambridge, Mass., 02139 USA): Electrical conductivity and thermal stability measurements of a mixed perovskite oxide system. *J. Appl. Phys.* **53** (1982) 3686
- SUZUKI, M., KANADA, M., KAKIMOTO, Y. (Kanazawa Univ., Fac. Technol., Kanazawa, Ishikawa, 920 Japan): Thermal stability of pure A-Si films prepared by RF-bias sputtering. *Jap. J. Appl. Phys.* **21** (1982) L 89
- SUZUKI, T., TSUBOI, Y., TAKAKI, H. (Hiroshima Inst. Technol., Dept. Electr., Itsukaichi, Hiroshima, 738 Japan): Ac temperature calorimetry for thin films at low temperatures. *Jap. J. Appl. Phys.* **21** (1982) 368
- TAKAHASHI, Y., MATSUBARA, Y., TAĐOKORE, H. (Osaka Univ., Fac. Sci., Dept. Macromolec. Sci., Toyonaka, Osaka, 560 Japan): Mechanism for crystal phase transformations by heat treatment and molecular motion in poly(vinylidene fluoride). *Macromolecules* **15** (1982) 334
- TAKAMIZAWA, K., OGAWA, Y., OYAMA, T. O. (Kyushu Univ., Fac. Engn., Dept. Appl. Sci., Fukuoka, 812 Japan): Thermal behavior of normal-alkanes from normal -C-32H-66 to normal -C-80H-162, synthesized with attention paid to high purity. *Polym. J.* **14** (1982) 441
- TANAKA, H., TAMAMOTO, H., NEGITA, H. (Hiroshima Univ., Fac. Sc. Educ., Chem. Lab., Hiroshima, 730 Japan): Deuterium isotope effects in the thermal dehydration of  $K_2Mg(SO_4)_2 \cdot 6H_2O$ . *Thermochim. Acta* **56** (1982) 65
- TANIEWSKA-OSIŃSKA, S., GÓRALSKI, P. (Univ. Łódź, Dept. Phys. Chem., PL-91416 Łódź, Poland): Calorimetric investigations on association in ternary systems. 2. Thermodynamic functions of complex formation of pentahalogenobenzoic acids and 1,1-dinitroethane with proton acceptors. *J. Chem. Soc. Faraday Trans. 1* **78** (1982) 1755
- TARASEVICH, Y. I., POLYAKOV, V. E., PADALKA, L. I. (Acad. Sci. UkSSR): Inst. Colloid Chem. and Water Chem., Kiev, UkSSR): Thermochemical study of the adsorption of water on cation-substituted forms of clinoptilolite. *Colloid J. USSR transl. Kolloidn. Zh.* **43** (1981) 972
- TEMIRBULATOV, S. I. (S. M. Kirov State Univ., Alma Ata, KaSSR): Ill-posed mixed problems of the heat conductivity.

- Dokl. Akad. Nauk SSSR* 264 (1982) 45 (in Russian)
- TEPLITSKY, A. B., GLUKHOVA, O. T., SUKHODUB, L. F., YANSON, I. K., ZIELENKIEWICZ, A., ZIELENKIEWICZ, W., KOSINSKI, J., WIERCHOWSKI, K. L. (c/o K. L. Wierzchowski, Polish Acad. Sci., Inst. Biochem. and Biophys., PL-02532 Warsaw, Poland): Thermochemistry of aqueous solutions of alkylated nucleic acid bases. IV. Enthalpies of hydration of 5-alkyluracils. *Biophys. Chem.* 15 (1982) 139
- TINET, D., PARTYKA, S., ROUQUEROL, J., FRIPIAT, J. J. (Ctr. Rech. Solides, 18 Rue Ferrollerie, Org. Cristalline Imparfait, F-45045 Orleans, France): Microcalorimetry applied to hydrogen bronzes. *Mater. Res. Bull.* 17 (1982) 561
- TITOV, L. V., EREMIN, E. R., ROSOLOVSKII, V. Y. (Acad. Sci. USSR, Inst. New Chem. Problems, Moscow, V-71 USSR): Synthesis and study of thermal decay of kalium octahydrotriborate monosolvate with dioxane. *Zh. Neorg. Khim.* 27 (1982) 891 (in Russian)
- TITOVA, L. F., BAZHANOV, Y. V., BASNER, M. E., NEFEDOVA, A. I., CHAPLITS, D. N., BELIKOVA, N. A. (Moscow Synth. Rubber Monomer Res. Inst., Moscow, USSR): Thermal reaction kinetics of butadiene with dimers and codimers of 1-methylcyclopentadiene, 2-methylcyclopentadiene and cyclopentadiene. *Zh. Org. Khim.* 18 (1982) 710 (in Russian)
- TIWARI, M. D. (Garhwal Univ., Dept. Phys., Srinagar, 246174 India): Specific heat and thermal conductivity of dielectrics at low temperature. *Phys. Rev. B* 25 (1982) 4230
- TRAINOR, A. (Univ. Birmingham, Ctr. Mat. Sci., Birmingham, 815 2 TT W Midlands England): The measurement of the thermal conductivity of poly(methylmethacrylate) by Forbes method, using infra-red-temperature measurement. *Polymer* 23 (1982) 1108
- TSAPOVETSKII, M. I., LAIUS, L. A. (Acad. Sci. USSR, Inst. Macromolec. Cpd's, Leningrad, USSR): Analysis of kinetics of thermal cyclization of polyamic acids in solid state. *Vysokomol. Soedin. A* 24 (1982) 979 (in Russian)
- TSOI, P. V. (Tadzhik Polytech. Inst. Dushanbe, TaSSR): Basis coordinates in direct and inverse thermal conductivity problems. *High Temp.* transl. *Teplofiz. Vysok. Temp.* 19 (1981) 731
- TSUCHIYA, R., UEHARA, A., OHTSUKA, Y. (Kanazawa Univ., Fac. Sci., Dept. Chem., Kanazawa, Ishikawa, 920 Japan): A calorimetric study on the relative thermal stability in some nickel(II) complexes containing N,N' or N,N-diethylethylenediamine. *Bull. Chem. Soc. Jap.* 55 (1982) 1858
- TSVETKOV, O. B. (Leningrad Refrigerat Ind., Technol. Inst., Leningrad, USSR): Correlation based on gas mixture thermal conductivities. *Zh. Fiz. Khim.* 56 (1982) 1117 (in Russian)
- TU, K. N., OTTAVIANI, G., THOMPSON, R. D., MAYER, J. W. (IBM Corp., Thomas J. Watson Res. Ctr. Yorktown, HTS, N. Y., 10598 USA): Thermal stability and growth kinetics of Co<sub>2</sub>Si and CoSi in thin-film reactions. *J. Appl. Phys.* 53 (1982) 4406
- UCHIDA, Y., KOZUKA, S. (Osaka Inst. Technol., Dept. Appl. Chem., Asahi-ku, Osaka, 535 Japan): The thermal decomposition of N,O-diacyl-N-t-butylhydroxylamine. III. Novel routes to 2-substituted 1,2-benzisothiazol-3(2H)-ones. *Bull. Chem. Soc. Jap.* 55 (1982) 1183
- UDUPA, M. R. (Indian Inst. Technol., Dept. Chem., Madras, 600036 Tamil Nadu, India): Thermal decomposition of oxalato cuprates(II). *Thermochim. Acta* 55 (1982) 117
- UDUPA, M. R., RAMACHANDRA, G. K. (Indian Inst. Technol., Dept. Chem., Madras, 600036 Tamil Nadu, India): Thermal decomposition of Mn(II), Fe(II), Co(II), Ni(II), Cu(II), Zn(II) and Cd(II) glycolates. *Indian J. Chem. A* 21 (1982) 162
- UTRACKI, L. A., CATANI, A. M., BATA, G. L., KAMAL, M. R., TAN, V. (Natl. Res. Council Canada, Ind. Mat. Res. Inst., Montreal, Quebec, H4C 2K3 Canada): Melt rheology of blends of semicrystalline polymers. I. Degradation and viscosity of poly(ethylene terephthalate)-polyamide-6,6 mixtures. *J. Appl. Polym. Sci.* 27 (1982) 1913

- VALIGI, M., GAZZDI, D., CORDISCHI, D. (Univ. Rome, Ist. Chim. Gen. CNR Ctr. Studio Strutt. and Attivita Catalit Sistemi Ossidi, I-00100 Rome, Italy): A structural thermogravimetric and ESR study of the  $\text{RhO}_x\text{-TiO}_2$  system. *J. Mater. Sci.* **17** (1982) 1277
- VALISHEV, M. G., YESIN, Y. O., GELD, P. V. (S. M. Kirov Polytech. Inst., Sverdlovsk, USSR): Short-range order influence on enthalpy of binary alloy formation. *Fiz. Metal. Metalloved.* **53** (1982) 1221 (in Russian)
- VAN de VELDE, G. M. H., LONGE, T. A., SPITSBERGEN, U. (Twente Univ. Technol., Dept. Chem. Engrn., 7500 AE Enschede, Netherlands): A simple device in a horizontal TG analyzer to prevent mixing of corrosive and protective gases. *Thermochim. Acta* **56** (1982) 109
- Van HIMBERGEN, J. E. (Univ. Utrecht, Int. Theoret. Phys., 3508 Ta Utrecht, Netherlands): Helicity modulus and specific heat of the periodic Gaussian model in two dimensions. *Phys. Rev. B* **25** (1982) 5977
- VARGHA-BUTLER, E. I., SOULARD, M. R., HAMZA, H. A., NEUMANN, A. W. (Univ. Toronto, Dept. Mech. Engrn., Toronto, Ontario, M5S 1A4 Canada): Determination of specific heats of coal powders by differential scanning calorimetry. *Fuel* **61** (1982) 437
- VARSCHAVSKY, A. (Univ. Chile, Fac. Ciencias Fis. and Matemat., Inst. Invest and Ensayes Mat., Santiago, Chile): Differential scanning calorimetry evaluations in alpha Cu-Al alloys, energetics. *Met. Trans. A* **13** (1982) 801
- VASILEV, V., BONCHEVA-MLADENOVO, Z., VASILINA, B. S. (Higher Inst. Chem. Technol., Sofia, Bulgaria):  $\text{Ag}_4\text{SSe}$  thermal conductivity. *Zh. Fiz. Khim.* **56** (1982) 1302 (in Russian)
- VASILEV, V. P., KOZLOVSKII, E. V., MOKEEV, A. A. (Ivanovo Chem. Technol. Inst., Ivanovo, USSR): Standard enthalpies of formation of crystalline mercury(II) bromide in perchloric acid aqueous solutions. *Zh. Neorg. Khim.* **27** (1982) 632 (in Russian)
- VERNEKAR, V. R. P., MOHANA RAO, J. R., SUBBA RAO, B. K., TIRUNARAYANAN, M. A. (Indian Inst. Sci., Dept. Inorgan. and Phys. Chem. Bangalore 560012 Karnataka, India): Thermal decomposition and ignition of coal. *Fuel* **61** (1982) 634
- VESELÝ, F., DOHNAL, V., PRCHAL, M. (Prague Inst. Chem. Technol. Dept. Phys. Chem., CS-16628 Prague 6, Czechoslovakia): Heats of mixing of the ternary systems 1-propanol-n-alkane-cyclohexane. *Collect.* **47** (1982) 1045
- VIJAYAKUMAR, C. T., FINK, J. K. (Univ. Min. and Met. Leoben, Inst. Chem. and Phys. Technol. Kunststoffe, A-8700 Leoben, Austria): Investigations on the mechanism of flame retardancy in HET acid containing unsaturated polyester resins. *J. Appl. Polym. Sci.* **27** (1982) 1629
- VOROBEV, A. F., MALKOV, I. V., VASILEV, V. A., LARKOV, A. P.: Thermal capacity and density of nickel and potassium iodide aqueous solutions at 298-15 K. *Zh. Fiz. Khim.* **56** (1982) 1021 (in Russian)
- VOROBEV, A. F., YAKOVLEV, P. N. (D. I. Mendeleev Chem. Technol. Inst., Moscow, USSR): Thermal capacity of potassium chloride and iodide solutions in dimethylformamide-water mixtures with considerable content of water. *Zh. Fiz. Khim.* **56** (1982) 1252 (in Russian)
- WAGNER, W., EWERS, J., SCHMIDT, R. (Ruhr Univ. Bochum, Inst. Thermo- and Fluid-dynam., D-4630 Bochum, GFR): An equation for the ideal-gas heat capacity of molecular oxygen for temperatures from 30-3000 K. *Ber. Bunsen Ges. Phys. Chem.* **86** (1982) 538
- WATANABE, D., SEKIGUCHI, T., TANAKA, T., WAKIYAMA, T., TAKAHASHI, M. (Univ. Tokyo, Fac. Engrn., Dept. Synthet. Chem., Bunkyo ku, Tokyo, 113 Japan): Study of the temperature dependence of the magnetization direction in cobalt single crystals by 1-MV Lorentz electron microscopy. *Jap. J. Appl. Phys.* **21** (1982) L 179
- WENDLANDT, W. W. (Univ. Houston, Dept. Chem., Houston, Tex., 77004 USA): Thermal analysis. *Anal. Chem.* **54** (1982) R 97

- WENGER, L. E., MYDOSH, J. A. (Wayne State Univ., Dept. Phys., Detroit, Mich., 48202 USA): Relation between heat capacity and magnetization in a spin-glass. *Phys. Rev. Lett.* **49** (1982) 239
- WILLEY, R. J., MULLIN, J. T. (Glasgow Coll. Technol. Dept. Phys., Glasgow, G4 OBA, Scotland): Temperature and time stability of MnZn ferrites. *J. Magn. Mater.* **26** (1982) 315
- WOLFE, C. R. (Stanford Univ., Dept. Phys., Stanford, Calif., 94305 USA): A study of the neutral to ionic phase transition in TTF/chloranil by micro AC calorimetry. *Mol. Cryst. Liquid Cryst.* **85** (1982) 1727
- WU, C. H., INLE, H. R. (KFA Jülich GmbH, Inst., Chem., D-5170 Jülich 1, GFR): Thermochemistry of the dimer lithium hydride molecule  $\text{Li}_2\text{H}_2(\text{g})$ . *Symp. on Metal Bonding and Interactions in High Temp. Systems at the 181st Meeting of the Amer. Chem. Soc. Atlanta, GA March 31–April 3, 1981, Edited J. C. Gole, W. C. Stwalley, Amer. Chem. Soc. (Washington)* (1982) 265
- WUBENGA, G.: The enthalpy of formation of  $\text{UPd}_3$  by fluoride bomb calorimetry. *J. Chem. Thermodyn.* **14** (1982) 483
- YABLOKOV, V. A., SLUCHEVSKAYA, N. P., YABLOKOVA, N. Y., KALININ, V. N., IZMAILOV, B. A. (N. I. Lobachevskii State Univ., Chem. Res. Inst., Gorki, USSR): Effect of volumetric substituents on the thermal decomposition rate of carboranyl methyl containing silylperoxides. *Zh. Obshch. Khim.* **52** (1982) 893 (in Russian)
- YUREV, Y. N. (All Union Petrochem. Proc. Res. Inst., Leningrad, USSR): New concepts on mechanism of ozonide thermal decomposition. *Zh. Org. Khim.* **18** (1982) 1181 (in Russian)
- YUSHMANOV, P. N. (I. V. Kurchatov, Atom Energy Inst., Moscow, USSR): Thermal conductivity due to ripple-trapped ions in a tokamat. *Nucl. Fusion* **22** (1982) 315
- ZABORENKO, K. B., KAPUSTIN, O. A., BRYUKVIN, V. A., (M. V. Lomonosov State Univ., Fac. Chem., Moscow, 117234 USSR): Use of emanation – thermal analysis for studying the structural conversions in melts of nickel sulfides. *Zh. Fiz. Khim.* **56** (1982) 1454 (in Russian)
- ZADORINA, Y. N., VISHNEVSKII, G. Y., ISAEV, K. S., SAKUNENKO, Y. I., MIKITAIEVA, N. K., ZELENEV, Y. V. (S. Ordzhonikidze Aviat Inst., Moscow, USSR): Effect of composition of poly(arylate-butadiene) block copolymer on temperature-time characteristics of its thermodegradation. *Vysokomol. Soedin. A* **241** (1982) 948 (in Russian)
- ZAITLIN, M. P. (Dartmouth Coll., Dept. Phys. and Astron., Hanover, N. H., 03755 USA): Heat capacity and density of states of a normal-metal-superconductor bilayer. *Phys. Rev. B* **25** (1982) 5729
- ZAITSEVA, L. G., SARKISYAN, A. T., ERLIKH, R. D. (Moscow Organ. Intermed. Prod. and Dye Inst., Moscow, USSR): Thermal decomposition of para-tolylamide of 1,2-naphtho-quinonediazide-(1)-3-carboxylic acid. *Zh. Org. Khim.* **18** (1982) 1330 (in Russian)
- ZENER, C., NORIEGA, J. (Carnegie Mellon Univ., Pittsburgh, Pa., 15213 USA): Periodic explosions by positive feedback in rising loam column (surfactants micelles thermal conductivity). *Proc. Nat. Acad. Sci. Unit. Stat. Amer.* **79** (1982) 3384
- ZHORIN, V. A., GODOVSKII, Y. K., YENIKOLOPYAN, N. S. (Acad. Sci. USSR Inst. Chem. Phys., Moscow, V-71 USSR): Calorimetric study of changes in crystalline polymers and their blends under the simultaneous action of high pressures and shear strains. *Vysokomol. Soedin.* **24** (1982) 953 (in Russian)
- ZIELENKIEWICZ, W., TABAKA, A. (Polish Acad. Sci., Inst. Phys., Chem., PL-01224 Warsaw, Poland): Analysis of heat transfer of a diathermic calorimeter. 2. Spatial distribution of heat power. *Bull. Acad. Pol. Sci.* **29** (1981) 41
- ZIELENKIEWICZ, W., TABAKA, A. (Polish Acad. Sci., Inst. Phys. Chem., PL-01224 Warsaw, Poland): Analysis of heat transfer of a diathermic calorimeter. 3. Identification of the domain model of heat transfer. *Bull. Acad. Pol. Sci.* **29** (1981) 51

ZIELENKIEWICZ, W., TABAKA, A. (Polish Acad. Sci., Inst. Phys. Chem., PL-01224 Warsaw, Poland): Analysis of heat transfer of a diathermic calorimeter. 4. Evaluation of heat power founded on 3 representative temperature responses of the calorimeter. *Bull. Acad. Pol. Sci.* 29 (1981) 61

ZIELENKIEWICZ, W., TABAKA, A. (Polish Acad. Sci., Inst. Phys. Chem. Kasprzaka 44-52 PL-01224 Warsaw, Poland): Analysis of heat transfer of a diathermic calorimeter. 1. Design and performance of the calorimeter. *Bull. Acad. Pol. Sci. Chim.* 28 (1980) 727