Shock Physics Papers 1991


1991, Barber, D.J. and Hutchison, R. "The Bencubbin stony-iron meteorite breccia: Electron petrography, shock history, and affinities of a 'carbonaceous chondrite' clast" Meteoritics 26 83-96
1991, Bartenev, V.P. and Stepanov, G.V. "Evaluation of stresses and strains in explosion welding" Strength Mater. 23 935-938


1991, Billingsley, J.P. and Oliver, J.M. "The relevance of the de Broglie velocity to shock loading induced reactions in lead azide", TR-RD-SS-91-10, Redstone Arsenal, Alabama, US Army Missile Command,


1991, Boustie, M. and Cottet, F. "Experimental and numerical study of laser induced spallation into aluminum and copper targets" J. Appl. Phys. 69 7533-7538


1991, Buevich, Y.A., Mityakin, P.L. and Rozental, O.M. "The compression wave during impact on a free suspension surface" J. Engng Phys. 60 160-165
1991, Coffey, C.S. "The localization of energy and plastic deformation in crystalline solids during shock or impact" J. Appl. Phys. 70 4248-4254
1991, Duffy, T.S., Ahrens, T.J. and Lange, M.A. "The shock wave equation of state of brucite Mg(OH)$_2$" J. Geophys. Res. 96 14319-14330
1991, Fabbro, R. and Faral, B. "Temperature measurements of very high pressure laser shocks above 100 Mbars using time-resolved X-UV spectroscopy" Laser Particle Beams 9 397-402
1991, Follansbee, P.S. and Gray III, G.T. "The response of single crystal and polycrystal nickel to quasistatic and shock deformation" Int. J. Plast. 7 651-660
1991, Fortov, V.E., Kostin, V.V. and Eliezer, S. "Spallation of metals under laser irradiation" J. Appl. Phys. 70 4524-4531
1991, Fu, Y.B. and Scott, N.H. "The transition from acceleration wave to shock wave" Int. J. Engng Sci. 29 617-624
1991, Gilath, I., Eliezer, S., Gazit, Y., Barnea, N. and Wagner, H.D. "Low and high strain rate experiments on model Kevlar-epoxy microcomposites" J. Reinf. Plast. Compos. 10 84-90

1991, Goldthorpe, B.D. "Constitutive equations for annealed and explosively shocked iron for application to high strain rates and large strains" J. Phys. IV France Colloq. 1(C3) 829-836


1991, Grieve, R.A.F., Bottomley, R.B., Bouchard, M.A., Robertson, P.B., Orth, C.J. and Attrep Jr., M. "Impact melt rocks from New Quebec crater, Quebec, Canada" Meteoritics 26 31-40


1991, Grosch, D., Walker, J., Mullin, S.A. and Tullos, R. "Development of an inhibited explosive hypervelocity launcher", 06-3513, Southwest Research Institute


1991, Gupta, Y.M. "Reponse au niveau microscopique de materiaux solides soumis a un choc : emploi de la spectroscopie optique resolve en temps" Revue Scientifique et technique de la defense 4 trimestre 21-26


1991, Inoue, K. and Ariyasu, T. "Sound waves and shock waves in high density deuterium" Laser Particle Beams 9 795-816
1991, Ipatev, A.S. "Effect of artificial surface defects on failure of steel plates in contact loading by explosion of a layer of explosive substance" Strength Mater. 23 943-946
1991, Johnson, J.B. "Simple model of shock-wave attenuation in snow" J. Glaciology 37 303-312
1991, Knittle, E. and Jeanloz, R. "Earth's core-mantle boundary: Results of experiments at high pressure and temperatures" Science 251 1438-1443
1991, Kondo, K.-I. "Reply to 'Comment on "Fabricating nanocrystalline diamond ceramics by a shock compaction method"'" J. Amer. Ceram. Soc. 74 1761-1762
1991, Kosinski, W. and Saxton, K. "Weak discontinuity waves in materials with semi-empirical temperature scale" Arch. Mech. 43 547-559
1991, Kovalenko, V.A. and Grigorev, V.V. "Rock destruction by dynamic load" J. Mining Sci. 27 438-443
1991, Krehl, P. "Transient pressure effects in a pinch-compressed cylindrical metallic conductor" J. Appl. Phys. 70 3488-3500


1991, Lewin, P.A. and Schafer, M.E. "Shock wave pressure sensors: Requirements and design" J. Lithotripsy Stone Disease 3(1) 1-17


1991, Manacorda, T. "Origin and development of the concept of wave" Meccanica 26 1-5


1991, Matthies, D. and Koeberl, C. "Fluorine and boron geomchemistry of tektites, impact glasses, and target rocks" Meteoritics 26 41-46
1991, Mikhaskiv, V.V. and Khai, M.V. "Interaction between coplanar cracks under dynamic shock loading" Sov. Mater. Sci. 27 258-262
1991, Mimura, K. and Tomita, Y. "Constitutive relations of mild steel and a-titanium at high rates under multiaxial loading condition" J. Phys. IV France Colloq. C3 (DYMAT '91) 1 813-820
1991, Montoya, D., Maulin, G. and Ansart, J.P. "Comportement dynamique d'une nuance de beryllium" J. Phys. IV France Colloq. C3 (DYMAT 91) 1 27-34
1991, Murphy, M.J. and Cline, C.F. "Modeling of shock wave and dynamic interactions on PC based computers" J. Phys. IV France Colloq. C3 (DYMAT 91) 1 879-885
1991, Nemirovskii, Y.V. and Romanova, T.P. "Dynamics of plastic polygonal plates with rounded corners" Strength Mater. 23 1011-1017
1991, Palczewski, J. and Gronostajski, J. "Steel 18G2A and steel 14HNMBCu strengthened by explosive and cold rolled deformation" J. Phys. IV France 1(C3) 511-518
1991, Pavlovskii, M.N., Stepanyuk, V.S. and Komissarov, V.V. "Shear strength of lead, tin, copper, aluminum, corundum, and fluoroplastic-4 behind a shock wave" Strength Mater. 23 1106-1111
1991, Rosenberg, Z., Brar, N.S. and Bless, S.J. "Dynamic high-pressure properties of AlN ceramic as determined by flyer plate impact" J. Appl. Phys. 70 167-171
1991, Sharma, B.K. "Relationship between the Grüneisen parameter, thermoacoustic parameters, and intermolecular heat capacity of liquids" Indian J. Pure Appl. Phys. 29 279-281
1991, Shukla, A. "Dynamic photoelastic studies of wave propagation in granular media" Optics Lasers Engng 14 165-184
1991, Skews, B.W. "The reflected pressure field in the interaction of weak shock waves with a compressible foam" Shock Waves 1 205-211
1991, Steinberg, D.J. "Computer studies of the dynamic strength of ceramics" J. Phys. IV France Colloq. C3 (DYMAT '91) 1 837-844
1991, Steinberg, D.J. "Equation of state and strength properties of selected materials", UCRL-MA-106439, Livermore, California, Lawrence Livermore National Laboratory
1991, Stepuk, A.V. "Phase and structure changes in metals in pulsed deformation in strong magnetic fields" Strength Mater. 23 1031-1033
1991, Sudenkov, Y.V. and Baizakov, O.D. "Experimental investigations of the influence of structure on the dynamic response of copper in submicrosecond elastoplastic deformation" Strength Mater. 23 1034-1038


1991, Taran, Y.N., Sobolev, V.V., Slobodskoi, V.Y. and Gubenko, S.I. "Formation of diamond inclusions in gray cast irons in combination with shock-wave treatment and thermal cycling" Russian Metallurgy (3)137-143


1991, Thomas, T., Bensussan, P., Chartagnac, P. and Bienvenu, Y. "Dynamic compaction of copper powder: 2D numerical simulation and experimental results" High Press. Res. 8 466-469


1991, Williams, Q., Knittle, E. and Jeanloz, R. "The high pressure melting curve of iron: A technical discussion" J. Geophys. Res. 96 2171-2184
1991, Yadav, R.P. and Kumar, S. "Strong cylindrical shock through exponentially increasing density regions" Model. Simul. Control B 40(2) 1-8