

Publications of Marc Meyers

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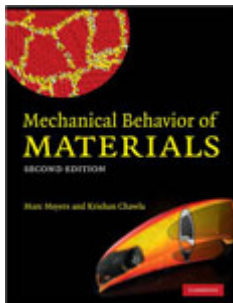
**Mechanical Behavior of Materials: Chinese translation
(2nd Edition)**



**Biological Materials Science: Biological Materials,
Bioinspired Materials, and Biomaterials, Marc André
Meyers, University of California, San Diego Po-Yu Chen,
National Tsing Hua University, Taiwan**

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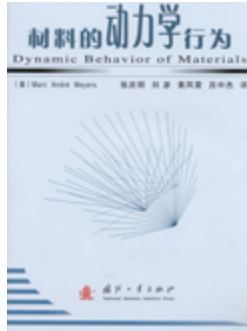
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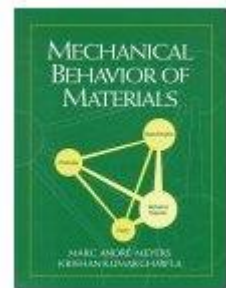
**Mechanical Behavior of Materials (Second Edition),
Meyers MA and Chawla KK, Cambridge University Press,
2009**

<http://www.cambridge.org>

ISBN: 9780521866750

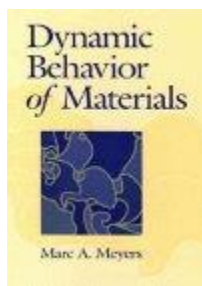


**Chinese Translation of Dynamic Behavior of Materials,
MEYERS, M.A., National Defense Industry Press, 2007**



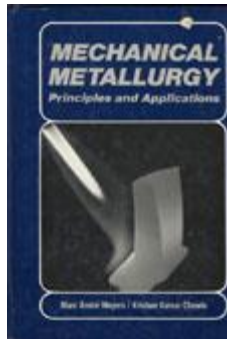
**Mechanical Behavior of Materials, Authors: MEYERS, M.A.
& CHAWLA, K.K., 1998., Prentice Hall, 1998**

ISBN: 0132628171



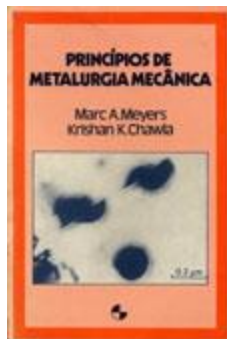
**Dynamic Behavior of Materials, Author: MEYERS, M.A., J.
Wiley, 1994**

ISBN: 047158262X



Mechanical Metallurgy: Principles and Application,
Publisher: Prentice Hall, October 1983

ASIN: 0135698634



Principios de Metalurgia Mecanica, Publisher: Editora
Edgard Blucher Ltda., Authors: M. A. Meyers and K. K.
Chawla, 1982

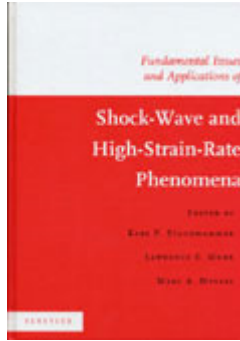


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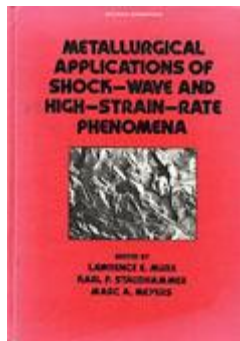


Issues and Applications of Shock-Wave and High-Strain-Rate Phenomena, by Explomet 2000: International Conference on Fundamental Issues and Appl, Karl P. Staudhammer (Editor), Lawrence Eugene Murr (Editor), Marc A. Meyers (Editor), 2001

ISBN: 0080438962

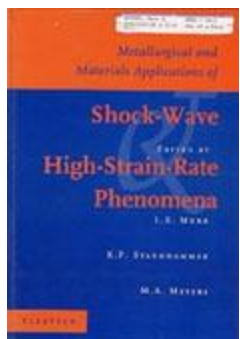


Mechanics and Materials: Fundamentals and Linkages, Editors: M. A. Meyers, R. Armstrong, H. O. K. Kirchner, Publisher: John Wiley & Sons, Inc., 1999



Metallurgical Applications of Shock-wave and High-strain Rate Phenomena, by Lawrence E. Murr, Karl P. Staudhammer, Marc A. Meyers (Editors), Marcel Dekker, June 6, 1986

ISBN: 0824776127



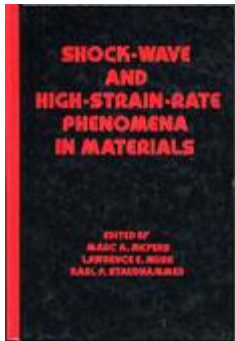
Metallurgical and Materials Applications of Shock-Wave and High-Strain-Rate Phenomena, by Lawrence E. Murr (Editor), International Conference on Metallurgical and Materials Applications O, K.P. Staudhammer, M.A. Meyers (Editors), 2001

ASIN: 0444820108



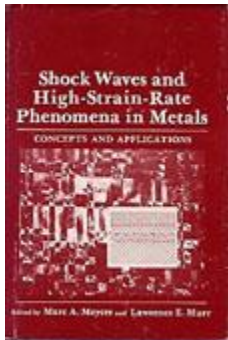
Frontiers in Materials Technologies (Materials Science Monographs, No 26), Marc A. Meyers, Osman T. Inal (Editors), Elsevier Science, 1985

ASIN: 044442462



Shock Wave and High-strain-rate Phenomena in Materials, by Marc A. Meyers, Lawrence E. Murr, Karl P. Staudhammer (Editor), Marcel Dekker, May 12, 1992

ISBN: 0824785797



Shock Wave and High Strain-Rate Phenomena in Materials Concepts and Applications, Editors: M. A. Meyers and L. E. Murr, 1981

M.A. Meyers and L.E. Murr (editors), Shock Waves and High Strain-Rate Phenomena in Metals: Concepts and Applications, Plenum Publishing Corp., N. Y., (1981) (translated into Russian, 1984).

M.A. Meyers and O.T. Inal (editors), Frontiers in Materials Technologies, Elsevier, Netherlands (1985).

L.E. Murr, K.P. Staudhammer, and M.A. Meyers (editors), Metallurgical Applications of Shock-Wave and High-Strain-Rate Phenomena, Marcel Dekker, N. Y. (1986).

M.A. Meyers, L.E. Murr, and K.P. Staudhammer, (editors), Shock-Wave and High-Strain-Rate Phenomena in Materials, M.Dekker, (1992).

L.E. Murr, K.P. Staudhammer, and M.A. Meyers (editors), Metallurgical and Materials Applications of Shock-Wave and High-Strain-Rate Phenomena, Elsevier (1995).

M.A. Meyers, R.W. Armstrong, and H.O.K. Kirchner, (editors), Mechanics and Materials: Fundamentals and Linkages, J. Wiley, 613 pages (1999).

K.P. Staudhammer, L.E. Murr, and M.A. Meyers, “Fundamental Issues and Applications of Shock-Wave and High-Strain-Rate Phenomena”, Elsevier (2001)

M.A. Meyers, R. O. Ritchie, and M. Sarikaya, “Microstructural Design of Advanced Materials”, Elsevier, (2003).

2. Published Papers

[Meyers](#)
[517](#) BS Lazarus, RK Luu, S Ruiz-Pérez, JDV Barbosa, I Jasiuk, MA Meyers, Equine Hoof Wall Deformation: Novel Aspects Revealed. Small Structures (2023): 2200402.

[Meyers](#)
[516](#) BS Lazarus, V Leung, RK Luu, MT Wong, S Ruiz-Pérez, WT Barbosa, WBA Bezerra, JDV Barbosa, and MA Meyers, Jackfruit: Composition, structure, and progressive collapsibility in the largest fruit on the Earth for impact resistance. Acta Biomaterialia (2023).

[Meyers](#)
[515](#) S Eswarappa Prameela, TM Pollock, D Raabe, MA Meyers, A Aitkaliyeva, Kerri-Lee Chintersingh, ZC Cordero, and L Graham-Brady. Materials for extreme environments. Nature Reviews Materials 8, no. 2 (2023): 81-88.

[Meyers](#)
[514](#) A Huang, SJ Fensin, MA Meyers, Strain-rate effects and dynamic behavior of high entropy alloys. Journal of Materials Research and Technology 22 (2023): 307-347.

[Meyers](#)
[513](#) CSA Shiang, C Bonney, B Lazarus, M Meyers, I Jasiuk, Hierarchical modeling of elastic moduli of equine hoof wall. Journal of the Mechanical Behavior of Biomedical Materials 136 (2022): 105529.

- [Meyers](#) [512](#) BS Lazarus, RK Luu, S Ruiz-Pérez, WBA Bezerra, K Becerra-Santamaria, V Leung, VHL Durazo, I Jasiuk, JDV Barbosa, and MA Meyers. Equine hoof wall: Structure, properties, and bioinspired designs. *Acta Biomaterialia* 151 (2022): 426-445.
- [Meyers](#) [511](#) S Tavares, K Yang, MA Meyers, Heusler alloys: Past, properties, new alloys, and prospects. *Progress in Materials Science* (2022): 101017.
- [Meyers](#) [510](#) IA Cabrera, PJ Hill, WY Zhao, TC Pike, MA Meyers, RR Rao, AYM Lin, Prosthetic Sockets: Tensile Behavior of Vacuum Infiltrated Fused Deposition Modeling Sandwich Structure Composites. *Prosthesis* 4, no. 3 (2022): 317-337.
- [Meyers](#) [509](#) BY Li, AC Li, S Zhao, MA Meyers, Amorphization by mechanical deformation. *Materials Science and Engineering: R: Reports* 149 (2022): 100673.
- [Meyers](#) [508](#) G Righi, TE Lockard, RE Rudd, MA Meyers, HS Park, Design of high-pressure iron Rayleigh–Taylor strength experiments for the National Ignition Facility. *Journal of Applied Physics* 131, no. 14 (2022): 145902.
- [Meyers](#) [507](#) FDC Garcia Filho, RO Ritchie, MA Meyers, SN Monteiro, Cantor-derived medium-entropy alloys: bridging the gap between traditional metallic and high-entropy alloys. *Journal of Materials Research and Technology* 17 (2022): 1868-1895.
- [Meyers](#) [506](#) J. Pelz, N. Ku, L. R. Vargas-Gonzalez, M. A. Meyers, Additive Manufacturing of Structural Ceramics: A Historical Perspective. *Journal of Materials Research and Technology* 15 (2021): 670-695.
- [Meyers](#) [505](#) RM Flanagan, MA Meyers, SJ Fensin, The role of pre-existing defects in shock-generated ejecta in copper. *Journal of Applied Physics* 130, no. 7 (2021): 075101.
- [Meyers](#) [504](#) D Thürmer, S Zhao, OR Deluigi, C Stan, IA Alhafez, HM Urbassek, ...M. A. Meyers, Exceptionally high spallation strength for a high-entropy alloy demonstrated by experiments and simulations. *Journal of Alloys and Compounds* 895 (2022): 162567.
- [Meyers](#) [503](#) RM Flanagan, MA Meyers, SM Valone, SJ Fensin, Collapse of helium-filled voids in extreme deformation: Dislocation mechanisms. *Materials Science and Engineering: A* 839 (2022): 142712.

- [Meyers 502](#) RM Flanagan, SJ Fensin, MA Meyers, The role of pre-existing heterogeneities in materials under shock and spall. *Applied Physics Reviews* 9, no. 1 (2022): 011305.
- [Meyers 501](#) IA Cabrera, TC Pike, JM McKittrick, MA Meyers, RR Rao, AY Lin, Digital healthcare technologies: Modern tools to transform prosthetic care. *Expert Review of Medical Devices* 18, no. sup1 (2021): 129-144.
- [Meyers 500](#) MA Meyers, H Quan, The rhythms of nature inspiring art and science. *Matter* 4, no. 10 (2021): 3089-3091.
- [Meyers 499](#) BS Lazarus, C Chadha, A Velasco-Hogan, JDV Barbosa, I Jasiuk, M Meyers, Engineering with keratin: A functional material and a source of bioinspiration. *Iscience* 24, no. 8 (2021): 102798.
- [Meyers 498](#) A Velasco-Hogan, W Huang, C Serrano, D Kisailus, MA Meyers, Tooth structure, mechanical properties, and diet specialization of Piranha and Pacu (Serrasalminidae): A comparative study. *Acta Biomaterialia* 134 (2021): 531-545.
- [Meyers 497](#) J. Pelz, N. Ku, M. A. Meyers, L. R. Vargas-Gonzalez, “Additive Manufacturing Utilizing a Novel In-Line Mixing System for Design of Functionally Graded Ceramic Composites,” ARL-TR-8851, CCDC Army Research Laboratory, 2019.
- [Meyers 496](#) S Zhao, B Li, BA Remington, CE Wehrenberg, HS Park, EN Hahn, MA Meyers, Directional amorphization of covalently bonded solids: A generalized deformation mechanism in extreme loading, *Materials Today*, 2021.
- [Meyers 495](#) G Righi, CJ Ruestes, CV Stan, SJ Ali, RE Rudd, M Kawasaki, HS Park, MA Meyers, Towards the ultimate strength of iron: spalling through laser shock, *Acta Materialia*, 2021.
- [Meyers 494](#) DR Andrews, NK Bourne, EN Brown, JP Dear, P Dickson, CJ Freeman, SG Goveas, GT Gray III, H Hauser, JM Huntley, IM Hutchings, TG Leighton, MJ Matthewson, MA Meyers, PJ Rae, CR Siviour, M Swain, D Townsend, S van der Zwaag, SM Walley, DM Williamson, Contributions to Dynamic Behaviour of Materials Professor John Edwin Field, FRS 1936–2020, *Dynamic Behavior of Materials*, 2021.
- [Meyers 493](#) H Quan, A Piroso, W Yang, RO Ritchie, MA Meyers, Hydration-induced reversible deformation of the pinecone, *Acta Biomaterialia*, 128, 370-383, 2021.

- [Meyers 492](#) W Yang, CJ Ruestes, Z Li, OT Abad, TG Langdon, B Heiland, M Koch, E Arzt, MA Meyers, Micro-mechanical response of ultrafine grain and nanocrystalline tantalum, JMRT, 12, pages 1804-1815, 2021.
- [Meyers 491](#) Z Liu, MA Meyers, Z Zhang, RO Ritchie, Functional gradients and heterogeneities in biological materials: Design principles, functions, and bioinspired applications, Progress in Materials Science, 88, pages 467-498, 2017.
- [Meyers 490](#) S Zhao, Z Li, C Zhu, W Yang, Z Zhang, DEJ Armstrong, PS Grant, RO Ritchie, and MA Meyers, Amorphization in extreme deformation of the CrMnFeCoNi high-entropy alloy, Science Advances, 7(5), (2021)
- [Meyers 489](#) AK Matsushita, L Devivo, D Kupor, J Luna, B Tierra, R Sah, Va Lubarda, M. Meyers, Cholla Cactus Frames As Lightweight and Torsionally Tough Biological Materials, Acta Biomaterialia 112, pages 213-224, 2020
- [Meyers 488](#) A Velasco-Hogan, MA Meyers, Bite force mechanics and allometry of piranha (Serrasalminidae), Journal of the Mechanical Behavior of Biomedical Materials, 104296 (2020).
- [Meyers 487](#) MA Meyers, RO Ritchie, Offering Toughness and Protection, Arapaima Scales Provide Effective Defense against Predation, Matter, Vol. 3 (6), pages 1979-1980, 2020.
- [Meyers 486](#) N Yan, Z Li, Y Xu, MA Meyers, Shear Localization in Metallic Materials at High Strain Rates, Progress in Materials Science, 100755, In press, 2020
- [Meyers 485](#) H Quan, D Kisailus, MA Meyers, Hydration-induced reversible deformation of biological materials, Nature Reviews Materials, pages 1-20, 2020.
- [Meyers 484](#) AK Matsushita, L Garcia, Z Liu, J Doan, MA Meyers, J McKittrick, Applying BIO-INSPIRED hierarchical design to jamming technology: Improving density-efficient mechanical properties and Opening application spaces Journal of Materials Research and Technology, pages 15555-15565, 2020.
- [Meyers 483](#) BS Lazarus, A Velasco-Hogan, T Gómez-del Río, MA Meyers, I Jasiuk, A Review of Impact Resistant Biological and Bioinspired Materials and Structures Journal of Materials Research and Technology, pages 15705-15738, 2020.

- [Meyers](#)
[482](#) S Dike, W Yang, A Pissarenko, H Quan, FC Garcia Filho, RO Ritchie, M. A. Meyers, On the gular sac tissue of the brown pelican: Structural characterization and mechanical properties, *Acta Biomaterialia*, pages 161-181, 2020.
- [Meyers](#)
[481](#) JS Pelz, N Ku, WT Shoulders, MA Meyers, LR Vargas-Gonzalez, Multi-material additive manufacturing of functionally graded carbide ceramics via active, in-line mixing, *Additive Manufacturing*, 101647, 2020.
- [Meyers](#)
[480](#) I.A. Babrera, T.C. Pike, J.M. McKittrick, M.A. Meyers, R.R. Rao, A.Y. Lin, Digital Healthcare Technologies: Modern Tools to Transform Prosthetic Care, *Transactions on Neural Systems and Rehabilitation Engineering*, Pages 1-15, 2020
- [Meyers](#)
[479](#) H. Quan, W. Yang, M. Lapeyriere, E. Schaible, R.O. Ritchie, M.A. Meyers, Structure and Mechanical Adaptability of a Modern Elasmoid Fish Scale from the Common Carp, *Matter*, Vol. 3, Pages 842-863, 2020
- [Meyers](#)
[478](#) H. Quan, W. Yang, Z. Tang, R.O. Ritchie, M.A. Meyers, Active defense mechanisms of thorny catfish, *Materials Today*, Vol.38, Pages 35-48, 2020
- [Meyers](#)
[477](#) A.Pissarenko, W. Yang, H. Quan, B. Poyer, A. Williams, K.A. Brown, M.A. Meyers, The toughness of porcine skin: Quantitative measurements and microstructural characterization, *Journal of the Mechanical Behavior of Biomedical Materials*, Vol. 109, Page 103848, 2020
- [Meyers](#)
[476](#) L. De Vivo, A.K. Matsushita, D. Kupor, J. Luna, B.A. Tierra, R.L. Sah, V.A. Lubarda, M.A. Meyers, J.M. McKittrick, P. Krysl, F. Kuester, Cholla cactus frames as lightweight and torsionally tough biological materials, *Acta Materialia*, Vol. 112, Pages 213-224, 2020
- [Meyers](#)
[475](#) A. Pissarenko, M.A. Meyers, The materials science of skin: Analysis, characterization, and modeling, *Progress in Materials Science*, Vol.110, Page 100634, 2020
- [Meyers](#)
[474](#) A. Pissarenko, C.J. Ruestes, M.A. Meyers, Constitutive description of skin dermis: Through analytical continuum and coarse-grained approaches for multi-scale understanding, *Acta Biomaterialia*, Vol. 106, Pages 208-224, 2020

- [Meyers 473](#) W. Yang, Y. Yu, R. O. Ritchie, M. A. Meyers, On the Strength of Hair across Species, *Matter*, Vol. 2, Page 1-14, 2020.
- [Meyers 472](#) R. M. Flanagan, E. N. Hahn, T. C. Germann, M. A. Meyers, S. J. Fensin, Molecular dynamics simulations of ejecta formation in helium-implanted copper, *Scripta Materialia*, Vol. 178, Pages 114-118, 2020.
- [Meyers 471](#) T. N. Sullivan, T. Hung, A. Velasco-Hogan, M. A. Meyers, Bioinspired avian feather designs, *Materials Science and Engineering: C*, Vol. 105, Page 110066, 2019.
- [Meyers 470](#) S. Yin, W. Yang, J. Kwon, A. Wat, M. A. Meyers, R. O. Ritchie, Hyperelastic phase-field fracture mechanics modeling of the toughening induced by Bouligand structures in natural materials, *Journal of the Mechanics and Physics of Solids*, Vol. 131, Pages 204-220, 2019.
- [Meyers 469](#) Z. Li, S. Zhao, B. Wang, S. Cui, R. Chen, R. Z. Valiev, M. A. Meyers, The Effects of Ultra-Fine-Grained Structure and Cryogenic Temperature on Adiabatic Shear Localization in Titanium, *Acta Materialia*, Vol. 181, Pages 408-422, 2019.
- [Meyers 468](#) W. Yang, H. Quan, M. A. Meyers and R. O. Ritchie, Arapaima Fish Scale: One of the Toughest Flexible Biological Materials, *Matter*, vol. 1, Oct. 16, 2019.
- [Meyers 467](#) Audrey Velasco-Hogan, Dimitri D Deheyn, Marcus Koch, Birgit Nothdurft, Eduard Arzt, Marc A Meyers, On the Nature of the Transparent Teeth of the Deep-Sea Dragonfish, *Aristostomias scintillans*, *Matter*, Vol. 1, Issue 1, Pages 235-249, 2019.
- [Meyers 466](#) Pedro Miranda, Antonia Pajares, Marc A Meyers, Bioinspired composite segmented armour: Numerical simulations, *Journal of Materials Research and Technology*, Vol. 8, Issue 1, Pages 1274-1287, 2019.
- [Meyers 465](#) M. A. Meyers, Ethics in publishing, *Journal of Materials Research and Technology*, Vol. 7, Issue 3, Page 203, 2019.
- [Meyers 464](#) P. Niksiar, F. Y. Su, M. B. Frank, T. A. Ogden, S. E. Naleway, M. A. Meyers, J. McKittrick, M. M. Porter, External Field Assisted Freeze Casting, *Ceramics*, Vol. 2, Issue 1, 2019.

- [Meyers 463](#) V. R. Sherman, N. A. Yaraghi, D. Kisailus, M. A. Meyers, Microstructural and geometric influences in the protective scales of *Atractosteus spatula*, *J. R. Soc. Interface*, Vol. 13, Issue 125, 2016.
- [Meyers 462](#) A. Pissarenko, W. Yang, H. Quan, K. A. Brown, A. William, W. G. Proud, M. A. Meyers, Tensile behavior and structural characterization of pig dermis, *Acta Biomaterialia*, Vol. 86, Issue 1, Pages 77-95, 2019.
- [Meyers 461](#) W. Yang, M. A. Meyers, R. O. Ritchie, Structural architectures with toughening mechanisms in Nature: A review of the materials science of Type-I collagenous materials, *Progress in Materials Science*, Vol. 103, Pages 425-483, 2019.
- [Meyers 460](#) T. N. Sullivan, M. A. Meyers, E. Arzt, Scaling of bird wings and feathers for efficient flight, *Science Advances*, Vol. 5, Issue 1, Pages eaat4269, 2019.
- [Meyers 459](#) Z. Li, S. Zhao, R. O. Ritchie, M. A. Meyers, Mechanical properties of high-entropy alloys with emphasis on face-centered cubic alloys, *Progress in Materials Science*, Vol. 102, Pages 296-345, 2019.
- [Meyers 458](#) B. Wang, T. N. Sullivan, A. Pissarenko, A. Zaheri, H. D. Espinosa, M. A. Meyers, Lessons from the Ocean: Whale Baleen Fracture Resistance, *Advanced Materials*, Vol. 31, Issue 3, Page 1804574, 2019.
- [Meyers 457](#) H. Quan, W. Yang, E. Schaible, R. O. Ritchie, M. A. Meyers, Novel Defense Mechanisms in the Armor of the Scales of the “Living Fossil” Coelacanth Fish, *Advanced Functional Materials*, 1804237, 2018.
- [Meyers 456](#) A. Velasco-Hogan, J. Xu, M. A. Meyers, Additive Manufacturing as a Method to Design and Optimize Bioinspired Structures, *Advanced Materials*, 1800940, 2018.
- [Meyers 455](#) M. A. Meyers, Z. Li, S. Zhao, B. Wang, Y. Liu, P. K. Liaw, Shear localization of fcc high-entropy alloys, *DYMAT*, 2018.
- [Meyers 454](#) S. Zhao, B. Kad, E. Hahn, L. Chen, Y. Opachi, K. More, B. Remington, C. Wehrenberg, J. LaSalvia, W. Yang, H. Quan, M. A. Meyers, Shock-induced Amorphization in Covalently Bonded Solids, *DYMAT*, 2018.
- [Meyers 453](#) M. A. Meyers, M. S. Schneider, O. Voehringer, The Onset of Twinning in Plastic Deformation and Martensitic Transformations, *Nano and Microstructural Design of Advanced Materials*, Pages 221-231, 2003.

- [Meyers](#) [452](#) S. Zhao, R. Flanagan, E. N. Hahn, B. Kad, B. A. Remington, C. E. Wehrenberg, R. Cauble, K. More, M. A. Meyers, Shock-induced amorphization in silicon carbide, *Acta Materialia*, Vol. 158, Pages 206-213, 2018.
- [Meyers](#) [451](#) T. P. Remington, E. N. Hahn, S. Zhao, R. Flanagan, J. C. E. Mertens, S. Sabbaghianrad, T. G. Langdon, C. E. Wehrenberg, B. R. Maddox, D. C. Swift, Spall strength dependence on grain size and strain rate in tantalum, *Acta Materialia*, Vol. 158, Pages 313-329, 2018.
- [Meyers](#) [450](#) A. Zaheri, J. S. Fenner, B. P. Russell, D. Restrepo, M. Daly, D. Wang, C. Hayashi, M. A. Meyers, P. D. Zavattieri, H. D. Espinosa, Revealing the Mechanics of Helicoidal Composites through Additive Manufacturing and Beetle Developmental Stage Analysis, *Advanced Functional Materials*, Vol. 28, Issue 33, 2018.
- [Meyers](#) [449](#) J. Jung, A. Pissarenko, N. A. Yaraghi, S. E. Naleway, D. Kisailus, M. A. Meyers, J. McKittrick, A comparative analysis of the avian skull: Woodpeckers and chickens, *JMBBM*, Vol. 84, Pages 273-280, 2018.
- [Meyers](#) [448](#) T. N. Sullivan, Y. Zhang, P. D. Zavattieri, M. A. Meyers, Hydration-Induced Shape and Strength Recovery of the Feather, *Advanced Functional Materials*, Vol. 28, Issue 30, 2018.
- [Meyers](#) [447](#) A. M. Marquez, Z. Li, C. H. Braithwaite, T. P. Weihs, N. M. Krywopusk, D. J. Gibbins, M. A. Meyers, Fragmentation and mechanical performance of tailored nickel-aluminum laminate compacts, *Materials Science and Engineering A-Structural Materials Properties Microstructure and Processing*, Vol. 727, Pages 123-132, 2018.
- [Meyers](#) [446](#) Z. Li, S. Zhao, S. M. Alotaibi, Y. Liu, B. Wang, M. A. Meyers, Adiabatic shear localization in the CrMnFeCoNi high-entropy alloy, *Acta Materialia*, Vol. 151, Pages 424-431, 2018.
- [Meyers](#) [445](#) M. J. Chon, M. Daly, B. Wang, X. Xiao, A. Zaheri, M. A. Meyers, H. D. Espinosa, Lamellae spatial distribution modulates fracture behavior and toughness of african pangolin scales, *JMBBM*, Vol. 76, Pages 30-37, 2017.
- [Meyers](#) [444](#) E. Novitskaya, C. J. Ruestes, M. M. Porter, V. A. Lubarda, M. A. Meyers, J. McKittrick, Reinforcements in avian wing bones: Experiments, analysis, and modeling, *JMBBM*, Vol. 76, Pages 85-96, 2017.

- [Meyers](#)
[443](#) Y. Yu, W. Yang, M. A. Meyers, Viscoelastic properties of alpha-keratin fibers in hair, *Acta Biomaterialia*, Vol. 64, Pages 15-28, 2017.
- [Meyers](#)
[442](#) D. X. Liu, X. Pang, D. L. Li, C. G. Guo, J. Wongsangam, T. G. Langdon, M. A. Meyers, Microstructural Evolution and Properties of a Hot Extruded and HPT-Processed Resorbable Magnesium WE43 Alloy, *Advanced Engineering Materials*, Vol. 19, Issue 11, 2017.
- [Meyers](#)
[441](#) T. N. Sullivan, M. Chon, R. Ramachandramoorthy, M. R. Roenbeck, T. Hung, H. D. Espinosa, M. A. Meyers, Reversible Attachment with Tailored Permeability: The Feather Vane and Bioinspired Designs, *Advanced Functional Materials*, Vol. 27, Issue 39, 2017.
- [Meyers](#)
[440](#) M. A. Meyers, S. N. Monteiro, The Third Pan American Materials Congress: Integrating Materials Across the Americas, *Journal Of Materials*, Vol. 69, Issue 10, Pages 2019-2021, 2017.
- [Meyers](#)
[439](#) M. A. Meyers, H. Quan, The use of the h-index to evaluate and rank academic departments, *Journal of Materials Research and Technology*, Vol. 6, Issue 4, Pages 304-311, 2017.
- [Meyers](#)
[438](#) S. Zhao, B. Kad, C. Wehrenberg, B. A. Remington, E. N. Hahn, K. L. More, M. A. Meyers, Generating gradient germanium nanostructures by shock-induced amorphization and crystallization, *Proceedings of the National Academy of Science of the United States of America*, Vol. 114, Issue 37, Pages 9791-9796, 2017.
- [Meyers](#)
[437](#) T. N. Sullivan, B. Wang, H. D. Espinosa, M. A. Meyers, Extreme lightweight structures: avian feathers and bones, *Materials Today*, Vol. 20, Issue 7, Pages 377-391, 2017.
- [Meyers](#)
[436](#) V. R. Sherman, Y. Tang, S. Zhao, W. Yang, M. A. Meyers, Structural characterization and viscoelastic constitutive modeling of skin, *Acta Biomaterialia*, Vol. 53, Pages 460-469, 2017.
- [Meyers](#)
[435](#) V. R. Sherman, H. Quan, W. Yang, R. O. Ritchie, M. A. Meyers, A comparative study of piscine defense: The scales of *Arapaima gigas*, *Latimeria chalumnae* and *Atractosteus spatula*, *JMBBM*, Vol 73, Pages 1-16, 2017.
- [Meyers](#)
[434](#) Y. Yang, W. Yang, B. Wang, M. A. Meyers, Structure and mechanical behavior of human hair, *Materials Science & Engineering C-Materials for Biological Applications*, Vol. 73, Pages 152-163, 2017.

- [Meyers 433](#) E. N. Hahn, T. C. Germann, R. Ravelo, J. E. Hammerberg, M. A. Meyers, On the ultimate tensile strength of tantalum, *Acta Materialia*, Vol. 126, Pages 313-328, 2017.
- [Meyers 432](#) D. X. Liu, X. Pang, L. L. Denglu, G. G. Chenggong, J. Wongsangam, T. G. Langdon, M. A. Meyers, Microstructural Evolution and Properties of a Hot Extruded and HPT-Processed Resorbable Magnesium WE43 Alloy, *Advanced Engineering Materials*, Vol 19, Issue 3, 2017.
- [Meyers 431](#) B. Wang, M. A. Meyers, Light Like a Feather: A Fibrous Natural Composite with a Shape Changing from Round to Square, *Advanced Science*, Vol. 4, Issue 3, 2017.
- [Meyers 430](#) Z. Li, S. Zhao, H. Diao, P. K. Liaw, M. A. Meyers, High-velocity deformation of Al_{0.3}CoCrFeNi high-entropy alloy: Remarkable resistance to shear failure, *Scientific Reports*, Vol. 7, 2017.
- [Meyers 429](#) Z. Li, B. Wang, S. Zhao, R. Z. Valiev, K. S. Vecchio, M. A. Meyers, Dynamic deformation and failure of ultrafine-grained titanium, *Acta Materialia*, Vol. 125, Pages 210-218, 2017.
- [Meyers 428](#) B. Wang, M. A. Meyers, Seagull feather shaft: Correlation between structure and mechanical response, *Acta Biomaterialia*, Vol. 48, Pages 270-288, 2017.
- [Meyers 427](#) E. N. Hahn, V. Sherman, A. Pissarenko, S. D. Rohrbach, D. J. Fernandes, M. A. Meyers, Nature's technical ceramic: the avian eggshell, *Journal of the Royal Society Interface*, Vol. 14, Issue 126, 2016.
- [Meyers 426](#) S. Zhao, B. Kad, B. A. Remington, J. C. LaSilva, C. E. Wehrenberg, K. D. Behler, M. A. Meyers, Directional amorphization of boron carbide subjected to laser shock compression, *Proceedings of the National Academy of Science of the United States of America*, Vol. 113, Issue 43, Pages 12088-12093, 2016.
- [Meyers 425](#) B. Wang, W. Yang, V. Sherman, M. A. Meyers, Pangolin armor: Overlapping, structure, and mechanical properties of the keratinous scales, *Acta Biomaterialia*, Vol. 4, 2016.
- [Meyers 424](#) E. N. Hahn, S. Zhao, E. Bringa, M. A. Meyers, Supersonic Dislocation Bursts in Silicon, *Scientific Reports*, Vol. 6, 2016.

- [Meyers](#) [423](#) E. Novitskaya, M. S. Ribero Vairo, J. Kiang, M. A. Meyers and J. McKittrick, Reinforcing structures in avian wing bones, *Advances in Bioceramics and Biotechnologies II*, Ed. J. M. McKittrick and R. Narayan, Ceramic Transactions, Vol. 247, pp. 47-56, Wiley & Sons, Hoboken, NJ, 2014.
- [Meyers](#) [422](#) W. Yang, V. Nguyen, M. M. Porter, M. A. Meyers and J. McKittrick, Structural characterization and compressive behavior of the boxfish horn, *Advances in Bioceramics and Biotechnologies II*, Ed. J. M. McKittrick and R. Narayan, Ceramic Transactions, Vol. 247, pp. 105-112, Wiley & Sons, Hoboken, NJ, 2014.
- [Meyers](#) [421](#) M. I. Lopez, P.-Y. Chen, J. McKittrick and M. A. Meyers, Structural observations and mechanical behavior of deproteinized nacre, *Advances in Bioceramics and Biotechnologies II*, Ed. J. M. McKittrick and R. Narayan, Ceramic Transactions, Vol. 247, pp. 37-46, Wiley & Sons, Hoboken, NJ, 2014.
- [Meyers](#) [420](#) S. E. Naleway, C. F. Yu, R. L. Hsiong, A. Sengupta, P. M. Iovine, J. A. Hildebrand, M.A. Meyers and J. McKittrick, Bioinspired intrinsic control of freeze cast composites: Harnessing hydrophobic hydration and clathrate hydrates, *Acta Materialia*, Vol. 114, pp. 67-79, 2016.
- [Meyers](#) [419](#) B. Wang, W. Yang, V.R. Sherman and M.A. Meyers, Pangolin Armor: overlapping, structure, and mechanical properties of the keratinous scales, *Acta Biomaterialia*, In Press, 2016.
- [Meyers](#) [418](#) M. A. Meyers, Brief Biography of Ali S. Argon: Winner of the 2015 MSEA Journal Prize, *Mat. Sci. Eng. A*, 2016.
- [Meyers](#) [417](#) T. N. Sullivan, A. Pissarenko, S. A. Herrera, D. Kisailus, V. A. Lubarda and M. A. Meyers, A lightweight, biological structure with tailored stiffness: the feather vane, *Acta Biomaterialia*, 2016.
- [Meyers](#) [416](#) E. N. Hahn, S. J. Fensin, T. C. Germann and M. A. Meyers, Symmetric tilt boundaries in body-centered cubic tantalum, *Scripta Materialia*, Vol. 116, pp.108-111, 2016.
- [Meyers](#) [415](#) A. M. Marquez, C. H. Braithwaite, T. P. Weihs, N. M. Krywopusk, D. J. Gibbins, K. S. Vecchio and M. A. Meyers, Fragmentation and constitutive response of tailored mesostructured aluminum compacts, *Journal of Applied Physics*, Vol. 119, Issue 14, p. 145903, 2016.

- [Meyers](#)
[414](#) S. Zhao, E. N. Hahn, B. Kad, B. A. Remington, E. M. Bringa and M. A. Meyers, Shock compression of [001] single crystal silicon, European Physical Journal – Special Topics, Vol. 225, Issue 2, pp. 335-341, 2016.
- [Meyers](#)
[413](#) S. E. Naleway, K. C. Fickas, Y. N. Maker, M. A. Meyers and J. McKittrick, Reproducibility of ZrO₂-based freeze casting for biomaterials, Mat. Sci. Eng. C, Vol. 61, pp. 105-112, 2016.
- [Meyers](#)
[412](#) S. E. Naleway, J. R. A. Taylor, M. M. Porter, M. A. Meyers and J. McKittrick, Structure and mechanical properties of selected protective systems in marine organisms, Mat. Sci. Eng. C, Vol. 59, pp. 1143-1167, 2016.
- [Meyers](#)
[411](#) M. I. Lopez and M.A. Meyers, The organic interlamellar layer in abalone nacre: Formation and mechanical response Mat. Sci. Eng. C, Vol. 58, pp. 7-13, 2016.
- [Meyers](#)
[410](#) C. J. Ruestes, E. M. Bringa, R. E. Rudd, B. A. Remington, T.P. Remington and M.A. Meyers, Probing the character of ultra-fast dislocations, Sci. Rep., 5:16892, 2015.
- [Meyers](#)
[409](#) E. N. Hahn and M. A. Meyers, Grain-size dependent mechanical behavior of nanocrystalline metals, Mat. Sci. Eng. A, vol. 646, pp. 101-134, 2015.
- [Meyers](#)
[408](#) E. M. Criss, R. J. Smith and M. A. Meyers, Failure mechanisms in cobalt welded with a silver-copper filler, Mat. Sci. Eng. A, Vol. 645, pp. 369-382, 2015.
- [Meyers](#)
[407](#) Y. Chu, M. A. Meyers, B. Wang, W. Yang, J.-Y. Jung and C.F.M. Coimbra, A Sustainable Substitute for Ivory: the Jarina Seed from the Amazon, Sci. Rep., 5:14387, 2015.
- [Meyers](#)
[406](#) I. H. Chen, W. Yang and M. A. Meyers, Leatherback Sea Turtle Shell: A Tough and Flexible Biological Design, Acta Biomaterialia, vol. 28, pp. 2-12, 2015.
- [Meyers](#)
[405](#) S. E. Naleway, M. M. Porter, J. McKittrick and M. A. Meyers, Structural Design Elements in Biological Materials: Application to Bioinspiration, Adv. Mater., Vol. 27, Issue 37, pp. 5455-5476, 2015.
- [Meyers](#)
[404](#) F. P. D. Lopes, C.-H. Lu, S. Zhao, S. N. Monteiro and M.A. Meyers, Room Temperature Dynamic Strain Aging in Ultrafine-Grained Titanium, Met. Mat. Trans. A, Vol. 46A, pp. 4468-4477, 2015.

- [Meyers 403](#) B. Wang, W. Yang, J. McKittrick and M. A. Meyers, Keratin: Structure, Mechanical Properties, Occurrence in Biological Organisms, and Efforts at Bioinspiration, Progress in Materials Science, vol. 76, pp. 229-318, 2016.
- [Meyers 402](#) S. Zhao, B.Kad, E.N. Hahn, B.A. Remington, C.E. Wehrenberg, C.M. Huntington, H.-S. Park, E.M. Bringa, K.L. More and M.A. Meyers, Pressure and shear-induced amorphization of silicon, Extreme Mechanics Letters, Vol. 5, pp. 74-80, 2015.
- [Meyers 401](#) S. Zhao, E.N. Hahn, B. Kad, B.A. Remington, C.E. Wehrenberg, E.M. Bringa and M.A. Meyers, Amorphization and nanocrystallization of silicon under shock compression, Acta Materialia, Vol. 103, pp. 519-533, 2016.
- [Meyers 400](#) C.-H. Lu, E. N. Hahn, B.A. Remington, B.R. Maddox, E.M. Bringa and M.A. Meyers, Phase Transformation in Tantalum under Extreme Laser Deformation, Sci. Rep., 5:15064, 2015.
- [Meyers 399](#) M.M. Porter, D. Adriaens, R.L. Hatton, M. A. Meyers, J. McKittrick, Why the seahorse tail is square, Science, vol. 349, Issue 6243, p. 46, 2015.
- [Meyers 398](#) V.R. Sherman, W. Yang and M.A. Meyers, The materials science of collagen, JMBBM, Vol. 52, pp. 22-50, 2015.
- [Meyers 397](#) W. Yang, S.E. Naleway, M.M. Porter, M.A. Meyers, J. McKittrick, The armored carapace of the boxfish, Acta Biomaterialia, vol. 23, pp. 1-10, 2015.
- [Meyers 396](#) D. Liu, C. Guo, L. Chai, V.R. Sherman, X. Qin, Y. Ding, M. A. Meyers, Mechanical properties and corrosion resistance of hot extruded Mg-2.5Zn-1Ca alloy, Mat. Sci. Eng. B, vol. 195, pp.50-58, 2015.
- [Meyers 395](#) S.E. Naleway, C.F. Yu, M.M. Porter, A. Sengupta, P.M. Iovine, M.A. Meyers, J. McKittrick, Bioinspired composites from freeze casting with clathrate hydrates, Materials and Design, Vol. 71, pp. 62-67, 2015.
- [Meyers 394](#) W. Yang, V.R. Sherman, B. Gludovatz, E. Schaible, P. Stewart, R.O. Ritchie and M.A. Meyers, On the tear resistance of skin, Nat. Commun., 6:6649, 2015.

- [Meyers 393](#) Z.Q. Liu, D. Jiao, M.A. Meyers, Z.F. Zhang, Structure and mechanical properties of naturally occurring lightweight foam-filled cylinder – The peacock’s tail coverts shaft and its components, *Acta Biomaterialia*, Vol. 17, pp. 137-151, 2015.
- [Meyers 392](#) M.M. Porter, L. Meraz, A. Calderon, H. Choi, A. Chouhan, L. Wang, M.A. Meyers, J. McKittrick, Torsional properties of helix-reinforced composites fabricated by magnetic freeze casting, *Composite Structures*, Vol. 119, pp. 174-184, 2015.
- [Meyers 391](#) E.M. Criss and M.A. Meyers, Braze welding of cobalt with a silver-copper filler, *JMR&T*, Vol. 4, pp. 44-59, 2015.
- [Meyers 390](#) M. M. Porter , R. Imperio , M. Wen, M. A. Meyers , and J. McKittrick, Bioinspired Scaffolds with Varying Pore Architectures and Mechanical Properties, *Adv. Funct. Mater.* (2014) 24, 1978–1987.
- [Meyers 389](#) C.J. Ruestes, E.M. Bringa, A. Stukowski, J.F. Rodríguez Nieva, Y. Tang, M.A. Meyers, Plastic deformation of a porous bcc metal containing nanometer sized voids, *Computational Materials Science* 88 (2014) 92–102.
- [Meyers 388](#) T.P. Remington, C.J. Ruestes, E.M. Bringa, B.A. Remington , C.H. Lu, B. Kad, M.A. Meyers, Plastic deformation in nanoindentation of tantalum: A new mechanism for prismatic loop formation, *Acta Materialia* 78 (2014) 378–393.
- [Meyers 387](#) C.J. Ruestes, A. Stukowski, Y. Tang, D. R. Tramontina, P. Erhart, B. A. Remington, H.M. Urbassek, M. A. Meyers, E. M. Bringa, Atomistic simulation of tantalum nanoindentation: Effects of indenter diameter, penetration velocity, and interatomic potentials on defect mechanisms and evolution, *Materials Science & Engineering A* 613(2014)390–403.
- [Meyers 386](#) C.H. Lu, B.A. Remington, B.R. Maddox, B. Kad, H.S. Park, M. Kawasaki, T.G. Langdon, M.A. Meyers, Laser compression of nanocrystalline tantalum *Acta Materialia* 61 (2013) 7767–7780.
- [Meyers 385](#) W. Yang, V. R. Sherman, B. Gludovatz, M. Mackey, E. A. Zimmermann, E. H. Chang , E. Schaible, Q. Zhao, M. J. Buehler, R. O. Ritchie , M. A. Meyers, Protective role of *Arapaima gigas* fish scales: Structure and mechanical Behavior, *Acta Biomaterialia* 10 (2014) 3599–3614.

- [Meyers](#)
[384](#) M. I. Lopez, P. E. Meza Martinez , Marc A. Meyers, Organic interlamellar layers, mesolayers and mineral nanobridges: Contribution to strength in abalone (*Haliotis rufescens*) nacre, *Acta Biomaterialia* 10 (2014) 2056–2064.
- [Meyers](#)
[383](#) E. A. Zimmerman, B. Gludovatz, E. Schaible, N.K.N. Dave, W. Yang, M. A. Meyers, and R. O. Ritchie, Mechanical adaptability of the Bouligand-type structure in natural dermal armour, *Nat. Commun.*, 4:2364, 2013.
- [Meyers](#)
[382](#) C.N. Elias, M.A. Meyers, R.Z. Valiev, S.N. Monteiro, Ultrafine grained titanium for biomedical applications: An overview of performance, *JMR&T*, Vol. 2, No. 4, pp. 340-350, 2013.
- [Meyers](#)
[381](#) I.H. Chen, W. Yang, and M.A. Meyers, Alligator osteoderms: Mechanical behavior and hierarchical structure, *Mat. Sci. Eng. C*, Vol. 35, pp. 441-448, 2014.
- [Meyers](#)
[380](#) D. Ren, M. A. Meyers, B. Zhou, Q. Feng, Comparative study of carp otolith hardness: Lapillus and asteriscus, *Mat. Sci. and Eng. C*, Vol. 33, pp. 1876-1881, 2013.
- [Meyers](#)
[379](#) M.M. Porter, J. McKittrick, and M.A. Meyers, Biomimetic Materials by Freeze Casting, *JOM*, Vol. 65, No. 6, pp. 720-727, 2013.
- [Meyers](#)
[378](#) M.M. Porter, E. Novitskaya, A. B. Castro-Cesena, M.A. Meyers, and J. McKittrick, Highly deformable bones: Unusual deformation mechanisms of seahorse armor, *Acta Biomat.*, Vol. 9, pp. 6763-6770, 2013.
- [Meyers](#)
[377](#) B.R. Maddox, H.-S. Park, C.-H. Lu, B.A. Remington, S. Prsbrey, B. Kad, R. Luo, and M.A. Meyers, Isentropic/shock compression and recovery methodology for materials using high-amplitude laser pulses, *Mat. Sci. and Eng. A*, Vol. 578, pp. 354-361, 2013.
- [Meyers](#)
[376](#) Y. Tang, E.M. Bringa, and M.A. Meyers, Inverse Hall–Petch relationship in nanocrystalline tantalum, *Mat. Sci. and Eng. A*, Vol. 580, pp. 414-426, 2013.
- [Meyers](#)
[375](#) C.J. Ruestes, E.M. Bringa, A. Stukowski, J.F. Rodríguez Nieva, G. Bertolino, Y. Tang, and M.A. Meyers, Atomistic simulation of the mechanical response of a nanoporous body-centered cubic metal, *Scripta Materialia*, Vol. 68, Issue 10, pp. 817-820, 2013.

- [Meyers 374](#) W. Yang, B. Gludovatz, E.A. Zimmermann, H.A. Bale, R.O. Ritchie, and M.A. Meyers, Structure and fracture resistance of alligator gar (*Atractosteus spatula*) armored fish scales, *Acta Biomater.*, Vol. 9, pp. 5876-5889, 2013.
- [Meyers 373](#) M.A. Meyers, J. McKittrick, P.-Y. Chen, Structural Biological Materials: Critical Mechanics-Materials Connections, *Science*, Vol. 339, pp. 773-779, 2013.
- [Meyers 372](#) A.Y.M. Lin, M.A. Meyers, K.S. Vecchio, Mechanical properties and structure of *Strombus gigas*, *Tridacna gigas*, and *Haliotis rufescens* sea shells: A comparative study, *Mat. Sci. and Eng. C*, Vol. 26, pp. 1380-1389, 2006.
- [Meyers 371](#) W. Yang, I.H. Chen, B. Gludovatz, E.A. Zimmermann, R.O. Ritchie, and M.A. Meyers, Natural flexible dermal armor, *Adv. Mater.*, In Press, 2012.
- [Meyers 370](#) C.H. Lu, B.A. Remington, B.R. Maddox, B. Kad, H.S. Park, S.T. Prisdrey, M.A. Meyers, Laser compression of monocrystalline tantalum, *Acta Mater.*, Vol. 60, pp. 6601-6620, 2012.
- [Meyers 369](#) W. Yang, G.P. Zhang, X.F. Zhu, X.W. Li, M.A. Meyers, Structure and mechanical properties of *Saxidomus purpuratus* biological shells, *J.M.B.B.M.*, Vol. 4, pp. 1514-1530, 2011.
- [Meyers 368](#) Y.-S. Lin, C.T. Wei, E.A. Olevsky, M.A. Meyers, Mechanical properties and the laminate structure of *Arapaima gigas* scales, *J.M.B.B.M.*, Vol. 4, pp. 1145-1156, 2011.
- [Meyers 367](#) O. Franke, M. Göken, M.A. Meyers, K. Durst, A.M. Hodge, Dynamic nanoindentation of articular porcine cartilage, *Mat. Sci. and Eng. C*, Vol. 31, pp. 789-795, 2011.
- [Meyers 366](#) P.-Y. Chen, J. Schirer, A. Simpson, R. Nay, Y.-S. Lin, W. Yang, M. I. Lopez, J. Li, E. A. Olevsky and M. A. Meyers, Predation versus protection: Fish teeth and scales evaluated by nanoindentation, *Journal of Materials Research*, Vol. 27, pp.100-112, 2012.
- [Meyers 365](#) Y. B. Xu and M. A. Meyers, Nanostructural and Microstructural Aspects of Shear Localization at High-Strain Rates for Materials, in *Adiabatic Shear Localization*, Chapter 3, 2012, B. Dodd and Y. L. Bai, eds., Elsevier.

- [Meyers 364](#) P.-Y. Chen, J. McKittrick, M. A. Meyers, Biological materials: Functional adaptations and bioinspired designs, PMS, Vol. 57, pp. 1492-1704, 2012.
- [Meyers 363](#) C.T. Wei, V.F. Nesterenko, T.P. Weihs, B.A. Remington, H.-S. Park, M.A. Meyers, Response of Ni/Al laminates to laser-driven compression, Acta Mater., Vol. 60, pp. 3929-3942, 2012.
- [Meyers 362](#) M. M. Porter, S. Lee, N. Tanadchangsang, M.J. Jaremko, J. Yu, M. Meyers, J. McKittrick, Porous hydroxyapatite-polyhydroxybutyrate composites fabricated by a novel method via centrifugation, Mechanics of Biological Systems and Materials, Vol. 5, In Press, 2012.
- [Meyers 361](#) S. Lee, M. Porter, S. Wasko, G. Lau, P.-Y. Chen, E. E. Novitskaya, A.P. Tomsia, A. Almutairi, M.A. Meyers, and J. McKittrick, Potential Bone Replacement Materials Prepared by Two Methods, MRS Proceedings, In Press, 2012.
- [Meyers 360](#) M.M. Porter, M. Yeh, J. Strawson, T. Goehring, S. Lujan, P. Siripasopsotorn, M.A. Meyers, J. McKittrick, Magnetic freeze casting inspired by nature, Mat. Sci. and Eng. A, Vol. 556, pp. 741-750, 2012.
- [Meyers 359](#) Y. Tang, E.M. Bringa, M.A. Meyers, Ductile tensile failure in metals through initiation and growth of nanosized voids, Acta Mater., Vol. 60, pp. 4856-4865, 2012.
- [Meyers 358](#) C.H. Lu, B.A. Remington, B.R. Maddox, B. Kad, H.S. Park, S.T. Prisbrey, R. Luo, and M.A. Meyers, Laser compression of monocrytalline tantalum, AIP Conf. Proc., Vol. 1426, pp. 1391-1394, 2012.
- [Meyers 357](#) Y. Tang, E.M. Bringa, B.A. Remington, M.A. Meyers, Growth and collapse of nanovoids in tantalum monocrystals loaded at high strain rate, AIP Conf. Proc., Vol. 1426, pp. 1255-1258, 2012.
- [Meyers 356](#) E. Khaleghi, M. Torikachvili, M.A. Meyers, E.A. Olevsky, Magnetic enhancement of thermal conductivity in copper-carbon nanotube composites produced by electroless plating, freeze drying, and spark plasma sintering, Mat. Let., Vol.79, pp. 256-258, 2012.
- [Meyers 355](#) W. Yang, I.H. Chen, J. McKittrick, M.A. Meyers, Flexible Dermal Armor in Nature, JOM, Vol. 64, No. 4, pp. 475-485, 2012.

- [Meyers](#) 354 J. McKittrick, P.-Y. Chen, S.G. Bodde, W. Yang, E.E. Novitskaya, M.A. Meyers, The Structure, Functions, and Mechanical Properties of Keratin, JOM, Vol. 64, No. 4, pp. 449-468, 2012.
- [Meyers](#) 353 M.A. Meyers, Y.S. Lin, E.A. Olevsky, P.-Y. Chen, Battle in the Amazon: Arapaima versus Piranha, Adv. Biomat., Vol. 14, No. 5, pp. B279-288, 2012.
- [Meyers](#) 352 E. Vitali, C. T. Wei, D. J. Benson, M. A. Meyers, Effects of geometry and intermetallic bonding on the mechanical response, spalling and fragmentation of NiAl laminates, Acta Mater., Vol. 59, pp. 5869-5880, 2011.
- [Meyers](#) 351 C. T. Wei, B. R. Maddox, A. K. Stover, T. P. Weihs, V. F. Nesterenko, M. A. Meyers, Reaction in NiAl laminates by laser-shock compression and spalling, Acta Mater., Vol. 59, pp. 5276-5287, 2011.
- [Meyers](#) 350 S. G. Bodde, M. A. Meyers, J. McKittrick, Correlation of the mechanical and structural properties of cortical rachis keratin of rectrices of the Toco Toucan (*Ramphastos toco*), J. M. B. B. M., Vol. 4 pp. 723-732, 2011.
- [Meyers](#) 349 E. Kaleghi, Y. S. Lin, M. A. Meyers, E. A. Olevsky, Spark plasma sintering of tantalum carbide, Scripta Mat., 63, (2010) 577-580
- [Meyers](#) 348 I. H. Chen, J. H. Kiang, V. Correa, M. I. Lopez, P.-Y. Chen, J. McKittrick, M. A. Meyers, Armadillo armor: Mechanical testing and micro-structural evaluation, J. M. B. B. M., Vol. 4, pp. 713-722, 2011
- [Meyers](#) 347 Y. Tang, E. M. Bringa, B. A. Remington, M. A. Meyers, Growth and collapse of nanovoids in tantalum monocrystals, Acta Materialia 59 (2011) 1354-137.
- [Meyers](#) 346 M. A. Meyers, P.-Y. Chen, M. I. Lopez, Y. Seki, A. Y.M. Lin, Biological materials: A materials science approach, J. M. B. B. M., Vol. 4, pp. 626-657, 2011.
- [Meyers](#) 345 J. McKittrick, P.-Y. Chen, L. Tombolato, E.E. Novitskaya, M.W. Trim, G.A. Hirata, E.A. Olevsky, M.F. Horstemeyer, M.A. Meyers, Energy absorbent natural materials and bioinspired design strategies: a review, Materials Science & Engineering: C (Materials for Biological Applications), Vol. 30, pp. 331-342, 2010.

- [Meyers](#) 344 R.S. Fecchio, Y. Seki, S.G. Bodde, M.S. Gomes, J. Kolososki, J.L. Jr. Rossi, M.A. Gioso, M.A. Meyers, Mechanical behavior of prosthesis in Toucan beak (*Ramphastos toco*), *Materials Science & Engineering: C (Materials for Biological Applications)*, Vol. 30, pp. 460-464, 2010.
- [Meyers](#) 343 M.A. Meyers, C.T. Lim, A. Li, B.R. Hairul Nizam, E.P.S. Tan, Y. Seki, J. McKittrick, The role of organic intertile layer in abalone nacre, *Materials Science & Engineering: C (Materials for Biological Applications)*, Vol. 29, pp. 2398-2410, 2009.
- [Meyers](#) 342 C.T. Wei, E. Vitali, F. Jiang, S.W. Du, D.J. Benson, K.S. Vecchio, N.N. Thadhani, M.A. Meyers, Quasi-static and dynamic response of explosively consolidated metal-aluminum powder mixtures, *Acta Mater.*, Vol. 60, pp. 1418-1432, 2012.
- [Meyers](#) 341 P.Y. Chen, A.Y.M. Lin, Y.S. Lin, Y. Seki, A.G. Stokes, J. Peyras, E.A. Olevsky, M.A. Meyers, J. McKittrick, Structure and mechanical properties of selected biological materials, *Journal of the Mechanical Behavior of Biomedical Materials*, Vol. 1, pp. 208-226, 2008.
- [Meyers](#) 340 E. M. Bringa, S. Traiviratana, M. A. Meyers, Void Initiation in FCC Metals: Effect of Loading Orientation and Nanocrystalline Effects, *Acta Mat*, Vol. 58, pp. 4458-4477, 2010.
- [Meyers](#) 339 W. Yang, N. Kashani, X. Li, G. Zhang, M. A. Meyers, Structural characterization and mechanical behavior of a bivalve shell (*Saxidomus purpuratus*), *Mat. Sci. and Eng. C*, Vol. 31, pp. 724-729, 2010.
- [Meyers](#) 338 M. I. Lopez, P. Y. Chen, J. McKittrick, M.A. Meyers, Growth of Nacre in Abalone: Seasonal and Feeding Effects, *Mat. Sci. and Eng. C*, Vol. 31, pp. 238-245, 2010.
- [Meyers](#) 337 Meyers MA, Remington BA, Maddox B, et al. Laser Shocking of Materials: Toward the National Ignition Facility. *JOM*. Vol. 62, Iss. 1, 24-30 . 2010.
- [Meyers](#) 336 W.J. Murphy, A. Higginbotham, G. Kimminau, B. Barbreil, E.M. Bringa, J. Hawreliak, R. Kodama, M. Koenig, W. McBarron, M.A. Meyers, B. Nagler, N. Ozaki, N. Park, B. Remington, S. Rothman, S. M. Vinko, T. Whitcher and J.S. Wark, The strength of single crystal copper under uniaxial shock compression at 100 GPa, *J Phys : Condensed Matter*, Vol. 22, 065404

- [Meyers 335](#) E.M. Bringa, V.A. Lubarda, and M.A. Meyers, Response to Shear Impossibility Comments on Void Growth by Dislocation Emission and Void Growth in Metals, Scripta Mater, Vol. 63, 148-150, 2010.
- [Meyers 334](#) E. Khaleghi, E.A. Olevsky, and M.A. Meyers, Uniaxial Freezing, Freeze-Drying, and Anodization for Aligned Pore Structure in Dye-Sensitized Solar Cells, J Am Ceram Soc, 92 1487–1491, 2009.
- [Meyers 333](#) C.T. Wei, B.R. Maddox, T.P. Weihs, A.K. Stover, V.F. Nesterenko, and M.A. Meyers, Laser Shock Compression and Spalling of Reactive Ni-Al Laminate Composites, Proc. APS 2009 Conf. Shock Compression of Condensed Matter, API, pp. 305-308, 2010.
- [Meyers 332](#) B.Y. Cao, D.H. Lassila, C. Huang, Y.B. Xu, and M.A. Meyers, Shock Compression of Monocrystalline Copper: Experiments, Characterization, And Analysis, Matls Sci and Eng A, Vol. 527, pp. 424-434, 2010.
- [Meyers 331](#) M.A. Meyers, H.N. Jarmakani, E.M. Bringa, P. Earhart, B.A. Remington, V. Nhon and Y.M. Wang, Laser Compression of Nanocrystalline Metals, Proc. APS 2009 Conf. Shock Compression of Condensed Matter, API, pp. 1051-1056, 2010.
- [Meyers 330](#) H. Yang, J.H. Zhang, Y.B. Xu, and M.A. Meyers, Microstructural Characterization Of The Shear Bands In Fe-Cr-Ni Single Crystal By EBSD, J Mat Sci Tech, Vol.24 No.6, pp. 819-828, 2008.
- [Meyers 329](#) J.S. Wark, J.F. Belak, G.W. Collins, J.D. Colvin, H.M. Davies, M. Duchaineau, J.H. Eggert, T.C. Germann, J. Hawreliak, A. Higginbotham, B.L. Holian, K. Kadau, D.H. Kalantar, P.S. Lomdahl, H. E. Lorenzana, M.A. Meyers, B.A. Remington, K. Rosolankova, R.E. Rudd, M.S. Schneider, J. Sheppard and J. S. Stolken, Picosecond X-Ray Diffraction From Laser-Shocked Copper And Iron, Shock Compression of Condensed Matter - 2005, Eds. M. D. Furnish, M. Elert, T. P. Russell, and C. T. White, AIP, 2006, 286-291.
- [Meyers 328](#) D.H. Kalantar, G.W. Collins, J.D. Colvin, H.M. Davies, J.H. Eggert, J. Hawreliak, H.E. Lorenzana¹, M.A. Meyers, K. Rosolankova, M.S. Schneider, J. Sheppard, J.S. Stlken, J.S. Wark, Direct Observation of The Transition in Alpha-Epsilon Shocked Single Crystal Iron, Shock Compression of Condensed Matter - 2005, Eds. M. D. Furnish, M. Elert, T. P. Russell, and C. T. White, A. I. P., pp. 241-243, 2006.
- [Meyers 327](#) M.A. Meyers, H. Jarmakani, B.Y. Cao, C.T. Wei, B. Kad, B.A. Remington, E.M. Bringa, B. Maddox, D. Kalantar, D. Eder, A. Koniges, Laser Compression and Fragmentation of Metals, Proc DYMAT, pp. 37-42, 2009.

- [Meyers 326](#) Y. Seki, S.G. Bodde, M.A. Meyers, Toucan and Hornbill Beaks: a Comparative Study, *Acta Biomaterialia*, Vol. 6, pp.331-343, 2009.
- [Meyers 325](#) A.Y. M. Lin and M. A. Meyers, Interfacial Shear Strength in Abalone Nacre, *J Mech Beh Biom Matls*, Vol.2, pp. 607-612, 2009.
- [Meyers 324](#) Y. Seki, M. Mackey, M.A. Meyers, Structure and micro-computed tomography based finite element modeling of Toucan beak, *J Mech Beh Biomed Matls*, Submitted, 2009.
- [Meyers 323](#) M. A. Meyers, C.T. Lim, A. Li, B.R. Hairul Nizam, E.P.S. Tan, Y. Seki, and J. McKittrick, The Role of Organic Intertile Layer In Abalone Nacre, *Matls Sci And Eng C*, Vol. 29, pp 2398-2410, 2009.
- [Meyers 322](#) A.Y.M. Lin, R. Brunner, P.Y. Chen, F.E. Talke, and M.A. Meyers. Underwater adhesion of abalone: The role of van der Waals and capillary forces, *Acta Materialia*, Vol. 57, pp 4178-4185, 2009.
- [Meyers 321](#) M.A. Meyers, H. Jarmakani, B.R. Remington, E.M. Bringa, Dislocations in Shock Compression and Release, in "Dislocations in Solids," ed. J.P. Hirth, Elsevier, Vol. 15, pp. 95-196, Chapter 89, 2009.
- [Meyers 320](#) M.A. Meyers, S. Traiviratana, V.A. Lubarda, D.J. Benson, and E.M. Bringa, The Role of Dislocations in The Growth of Nanosized Voids in Ductile Failure of Metals, *JOM*, Feb., 2009, pp. 39-45.
- [Meyers 319](#) A.E. Koniges, C. Debonnel, J. Andrew, D. Eder, D. Kalantar, N. Masters, A. Fisher, R. Anderson, A. Gielle, P. Combis, B. Gunney, B. Brown, K. Sain, J.P. Jadaud, A.M. Tobin, M.A. Meyers, H. Jarmakani, Experiments for the Validation of Debris and Shrapnel Calculations, *Proc. IFSA Conference*, Kobe, Japan, Sept. 09 ~ 14, 2007.
- [Meyers 318](#) H.N. Jarmakani, E.M. Bringa, P. Earhart, B.A. Remington, V. Nhon and M.A. Meyers, Molecular Dynamics Simulations Of Shock Compression Of Nickel: From Mono to Nano-Crystals, *Acta Mat*, 2008, 56, 5584-5604.
- [Meyers 317](#) H. Jarmakani, B.R. Maddox, C.T. Wei, D. Kalantar, A. Koniges, D. Eder, M.A. Meyers, Laser-Shock Induced Spalling And Fragmentation In Vanadium, *Acta Mat*, Vol. 58, pp. 4604-4628, 2010.

- [Meyers 316](#) C.N. Elias, J.H.C. Lima, R. Valiev, M.A. Meyers, Biomedical applications of titanium and its alloys, JOM, 2008, 60, 46-49.
- [Meyers 315](#) M.A. Meyers, A.M. Hodge, Advances in biological materials and biomaterials science, JOM, 2008, 60, 18.
- [Meyers 314](#) P.Y. Chen, A.Y.M. Lin, A.G. Stokes, Y. Seki, S.G. Bodde, J. McKittrick, M.A. Meyers, Structural biological materials: Overview of current research, JOM 2008, 60, 23-32.
- [Meyers 313](#) M.A. Meyers, A.M. Hodge, R.K. Roeder. Biological materials science and engineering: Biological materials, biomaterials, and biomimetics, JOM, 2008, 60, 21-22.
- [Meyers 312](#) E.R. Strutt, E.A. Olevsky, Radetic T, M.A. Meyers, Combustion synthesis/quasi-isostatic pressing of TiC_{0.7}-NiTi cermets: microstructure and transformation characteristics, J Mat Sci, 2008, 43, 5905-5923.
- [Meyers 311](#) E.R. Strutt, E.A. Olevsky, M.A. Meyers, Combustion synthesis/quasi-isostatic pressing of TiC-NiTi cermets: processing and mechanical response, J Mat Sci, 2008, 43, 6513-6526.
- [Meyers 310](#) H.N. Jarmakani, E.M. Bringa, P. Erhart, Molecular dynamics simulations of shock compression of nickel: From monocrystals to nanocrystals, Acta Mat, 2008, 56 5584-5604.
- [Meyers 309](#) H.J. Yang, J.H. Zhang, Y.B. Xu, M.A. Meyers, Microstructural Characterization of the Shear Bands in Fe-Cr-Ni Single Crystal by EBSD, J Mat Sci Tech, 2008, 24, 819-828.
- [Meyers 308](#) A E Koniges, C S Debonnel, J Andrew, D Eder, D Kalantar, N Masters, A Fisher, R Anderson, B Gunney, B Brown, K.Sain, F Bonneau, J-L Bourgade, J-M Chevalier, P Combis, A Geille, J-P Jadaud, Maroni, D Raffestin, J-L Ulmer, J Vierne, A M Tobin, M Meyers, H Jarmakani. Experiments for the validation of debris and shrapnel calculations, The Fifth International Conference on Inertial Fusion Sciences and Applications, Journal of Physics: Conference Series 112, 2008.
- [Meyers 307](#) Jing Cai, Fengchun Jiang, Kenneth S. Vecchio, Marc A. Meyers, and Vitali F. Nesterenko, Mechanical and Microstructural Properties of PTFE/Al/W System, APS Conference, 723-726, 2007.

- [Meyers](#)
[306](#) Sirirat Traiviratana, Eduardo M. Bringa, David J. Benson, and Marc A. Meyers, Void Growth in Single and Bicrystalline Metals: Atomistic Calculations, APS Conference, 343-346, 2007.
- [Meyers](#)
[305](#) M.A. Meyers, A.Y.M. Lin, Y.S. Lin, E.A. Olevsky and S. Georgalis, The cutting edge: Sharp biological materials, JOM, 60, 19-24, 2008.
- [Meyers](#)
[304](#) P.Y. Chen, A.Y.M. Lin, Y.S. Lin, M.A. Meyers, J. McKittrick, Structure, Function and Mechanical Properties of Selected Biological Materials, T.S.M.H. Med. Nursing J., Vol. 16, No.3, pp. 135-166, 2010.
- [Meyers](#)
[303](#) Po-Yu Chen, Albert Yu-Min Lin, Joanna McKittrick and Marc Andr Meyers, Structure and Mechanical Properties of Crab Exoskeletons, Acta. Biomater., 4, 587-596, 2008.
- [Meyers](#)
[302](#) Yongbo Xu, H.J. Yang, and Marc Andr Meyers, Dynamic recrystallization in the shear bands of FeCrNi monocrystal: Electron backscatter diffraction characterization, Scripta Materialia, 58, 691-694, 2008.
- [Meyers](#)
[301](#) S. Traiviratana, E. M. Bringa, D. J. Benson, and M. A. Meyers, Void growth in metals: Atomistic calculations, Acta mat., Vol. 56, pp. 3874-3886, 2008.
- [Meyers](#)
[300](#) H. Jarmakani, Y. M. Wang, E. Bringa, and M. A. Meyers, Modeling of the Slip-Twinning Transition in Nanocrystalline Nickel and Nickel-Tungsten under Shock Compression, APS Conference, 240-242, 2007.
- [Meyers](#)
[299](#) B. Cao, E. M. Bringa, M. A. Meyers, Shock Compression of Monocrystalline Copper: Atomistic Simulations, Met. Mat. Trans. A, 2007, 38, 2681-2688.
- [Meyers](#)
[298](#) M. Meyers, H. Jarmakani, J. M. McNaney, M. Schneider, J. H. Nguyen, B. Kad, Dynamic Response of Single-Crystalline Copper Subjected to Quasi-Isentropic Laser and Gas-Gun Driven Loading, J. Phys. IV 2006, 134, 37-42.
- [Meyers](#)
[297](#) M. Mishra, M. Martin, N.N. Thadhani, B.K. Kad, E.A. Kenik, and M.A. Meyers, High-Strain Rate Response of Ultra-Fine Grained Copper, Acta Mat., Vol. 56, pp. 2770-2783, 2008.
- [Meyers](#)
[296](#) Y. Xu, J. Zhang, Y. Bai and M. A. Meyers, Shear Localization in Dynamic Deformation: Microstructural Evolution. Met. Trans., 39A, 811-843, 2008.

[Meyers](#)
[295](#)

J. Cai, Y. Chen, V. F. Nesterenko and M. A. Meyers, Effect of Strain Rate on the Mechanical Properties of Aluminum Alloy Matrix Composite Filled with Discontinuous Carbon Fibers, *Mat. Sci. and Eng. A*, 485, 681-689, 2008.

[Meyers](#)
[294](#)

G.G. Serra, L.S. Morais, C.N. Elias, M.A. Meyers, L. Andrade, C. Mller, E.F. Palermo, and M. Mller, Systemic Levels of Metallic Ions Released from Orthodontic Mini-Implants, *Amer. J. Ortho. & Dent. Orthoped*, Vol. 135, pp. 522-529, 2007.

[Meyers](#)
[293](#)

G. G. Serra, L. S. Morais, C. N. Elias, M.A. Meyers, L. Andrade, C. Mller, and M. Mller, Sequential bone healing of immediately loaded mini-implants. *Amer. J. Ortho. & Dent. Orthoped*, Vo. 134, pp. 44-52, 2007.

[Meyers](#)
[292](#)

M. A. Meyers, M. S. Schneider, H. Jarmakani, B. Kad, B. A. Remington, D. H. Kalantar, J. McNaney, B. Cao, and J. Wark, Deformation Substructures and Their Transitions in Laser-Shock-Compressed Copper-Aluminum Alloys, *Met. Mat. Trans A*, 39A, 304-321, 2008.

[Meyers](#)
[291](#)

A.Y. M. Lin, P.Y. Chen and M.A. Meyers, The Growth of Nacre in the Abalone Shell. *Acta Biomat.*, 2008, 4, 131-138.

[Meyers](#)
[290](#)

M. A. Meyers, P.Y. Chen, A.Y. M. Lin and Y. Seki, Biological Materials: Structure and Mechanical Properties, *Prog. Mat. Sci.*, 2008, 53, 1-206.

[Meyers](#)
[289](#)

M. A. Meyers, A. Y.M. Lin, P.Y.Chen and J. Muyco, Mechanical Strength of Abalone Nacre: Role of the Soft Organic Layer, *J. Mech. Behav. Biomed. Mat.* 2008, 1, 76-85.

[Meyers](#)
[288](#)

H. Jarmakani, J. M. McNaney, B. Kad, D. Orlikowski, J. H. Nguyen and M. A. Meyers, Dynamic Response of Single Crystalline Copper Subjected to Quasi-Isentropic, Gas-Gun Driven Loading. *Mat. Sci.and Eng. A* , 2007, 463, 249-262.

[Meyers](#)
[287](#)

M. Martin, A. Mishra, M.A. Meyers and N.N. Thadhani, Instrumented Anvil-On-Rod Tests for Constitutive Model Validation and Determination of Strain-Rate Sensitivity of Ultrafine-Grained Copper. *Mat. Sci. and Eng. A* , 2007, 464, 202-209.

- [Meyers](#)
[286](#) J. Cai, S.M. Walley, R. J. A. Hunt, W.G. Proud, V.F. Nesterenko and M.A. Meyers, High-Strain, High-Strain-Rate Flow and Failure in PTFE/AL/W Granular Composites. *Mat. Sci. and Eng. A*, 2008, 472, 308-315.
- [Meyers](#)
[285](#) E.A. Olevsky, J. Ma , J. C. LaSalvia and M.A. Meyers, Densification of Porous Bodies in a Granular Pressure-Transmitting Medium. *Acta Mat.* , 2007 , 55, 1351-1366.
- [Meyers](#)
[284](#) G. G. Serra, L. S.Morais, C. N. Elias, M.A. Meyers, Sequential Bone Response to Immediately Loaded Mini-Implants, in *Vivo Study*, *Mater. Res. Soc. Symp. Proc*, 2006, Vol 925.
- [Meyers](#)
[283](#) M. Cabibbo, E. Evangelista , M. E. Kassner, and M. A. Meyers, Transmission Electron Microscopy of the Strain Induced Low and High Angle grain Boundary development in Equal-Channel Angular Pressed Commercially Pure Aluminum, *Ultrafine Grained Materials IV*, eds. Y.T. Zhu et al., TMS 2006, pp. 237-244.
- [Meyers](#)
[282](#) B. A. Remington, P. Allen, E. M. Bringa, J. Hawreliak, D. Ho, K. T. Lorenz, H. Lorenzana, J. M. McNaney, M. A. Meyers, S. W. Pollaine, K. Rosolankova, B. Sadik, M. S. Schneider, D. Swift, J. Wark, B. Yaakobi, *Material Dynamics Under Extreme Conditions of Pressure and Strain Rate*, *Materials Science And Technology* 22 (4): 474-488 APR 2006.
- [Meyers](#)
[281](#) T. Li, E. A. Olevsky, and M. A. Meyers, The Development of Residual Stresses in Ti6Al4V-Al3Ti Metal-Intermetallic Laminate (MIL) Composites, *Mat. Sci. and Eng. A*, 2008, 473,49-57.
- [Meyers](#)
[280](#) L.S. Morais, G. G. Serra, C. A. Muller, L. R. Andrade, E. F.A. Palermo, C. N. Elias and M. A. Meyers. Titanium Alloy Mini-Implants for Orthodontic Anchorage: Immediate Loading and Metal Ion Release. *Acta Biomat.*, 2007, 3, 331-339.
- [Meyers](#)
[279](#) Y. M. Wang, E. M. Bringa, J. M. McNaney, M. Victoria, A. Caro, A. M. Hodge, R. Smith, B. Torralva, B. A. Remington, C. A. Schuh, H. Jamarkani, M. A. Meyers, Deforming Nanocrystalline Nickel at Ultrahigh Strain Rates, *Applied Physics Letters* 88 (6): Art. No. 061917 FEB 6 2006.
- [Meyers](#)
[278](#) A. Mishra, B. K. Kad, F. Gregori and M.A. Meyers, Microstructural Evolution in Copper Subjected to Severe Plastic Deformation: Experiments and Analysis, *Acta Mat*, 2007, 55, 13-28.

- [Meyers 277](#) M. A. Meyers, A. Y. Lin, Y. Seki, P. Chen, B. Kad and S. Bodde, Structural Biological Composites: An Overview, JOM, July, 2006. pp. 35-41.
- [Meyers 276](#) M. A. Meyers, A. Mishra, and D. J. Benson, The Deformation Physics of Nanocrystalline Metals: Experiments, Analysis, and Computations, JOM, April 2006, pp. 41-48.
- [Meyers 275](#) T. Li, M. A. Meyers, C. Jiang, E. Olevsky , K. S. Vecchio, Damage Evolution in Ti-6-4-Al3Ti Metal Intermetallic Laminate Composites, Mat. Sci. and Eng. A, 2007 , 443, 1-15.
- [Meyers 274](#) A. Mishra, V. Richard, F. Gregori, B. Kad, R. J. Asaro and M. A. Meyers, Effect of Initial Grain Size, Die Angle and Pass Sequence on the Formation of Ultrafine Grain Structure in Cu by ECAP, Proc. 2005 APS Shock Compression Conf., Vols. 503-504, pp. 25-30, 2006.
- [Meyers 273](#) H. Jarmakani, J. M. Mc Naney, M. S. Schneider, D. Orlikowski, J. H. Nguyen, B. Kad, M. A. Meyers, Dynamic Response Of Copper Subjected To Quasi-Isentropic, Gas-Gun Driven Loading, Proc. 2005 APS Shock Compression Conf. Vol. 845, p. 1319-1322, 2006.
- [Meyers 272](#) B. Y. Cao, M. A. Meyers, D. H. Lassila, M. S. Schneider, Y. B. Xu, D. H. Kalantar, B. A. Remington, Defect Substructures In Plate Impacted And Laser Shocked Monocrystalline Copper, Proc. 2005 APS Shock Compression Conf.. AIP Conference Proceedings ,2006 ,845, pp. 1145-1148.
- [Meyers 271](#) A. Y. Lin, M. A. Meyers, and K. S. Vecchio, Mechanical Properties and Structure of Strombus Giga, Tridacna Gigas, and Haliotis Rufescens Sea Shells: A Comparative Study, Mat. Sci. and Eng. C, 2006, 26, 1380-1389.
- [Meyers 270](#) Y. Seki, B. Kad, D. Benson, and M. A. Meyers, The Toucan Beak: Structure and Mechanical Response, Mat. Sci. and Eng. C, 2006, 26, 1412-1420.
- [Meyers 269](#) B. Y. Cao, M.A. Meyers, D.H. Lassila, M. S. Schneider, B. K. Kad, C. X. Huang, Y. B. Xu, D. H. Kalantar, B.A. Remington, Effect Of Shock Compression Method On The Defect Substructure In Monocrystalline Copper, Mat. Sci. and Eng A, 2005, 409, 270-281.
- [Meyers 268](#) B. K. Kad, J.-M. Gebert, M. T. Perez-Prado, M. E. Kassner, and M. A. Meyers, Ultrafine Grain-Sized Zirconium By Dynamic Deformation, Acta Mat., 2006, 54, 4111-4127.

- [Meyers](#)
[267](#) A. Mishra, V. Richard, F. Gregori, B. Kad, and M. A. Meyers, Effect of Initial Grain Size, Die Angle and Pass Sequence on the Formation of Ultrafine Grain Structure in Cu by ECAP, Materials Science Forum, Nanomaterials by Severe Plastic Deformation, Trans Tech Publications, Switzerland 2005 (Proc. NanoSPD3-2005), 2006, vol. 503-504, pp.25-30.
- [Meyers](#)
[266](#) A. Mishra, V. Richard, F. Gregori, R. J. Asaro, and M.A. Meyers, Microstructural Evolution in Copper Processed by Severe Plastic Deformation, Mat. Sci.Eng., A, 2005, 410-441, p. 290-298 .
- [Meyers](#)
[265](#) Y. Seki, M. S. Schneider, and M. A. Meyers, Structure and Mechanical Properties of the Toucan Beak, Acta Mat., 2005, 53, 5281-5296.
- [Meyers](#)
[264](#) D. H. Kalantar, E. Bringa, M. Caturla, J. Colvin, K. T. Lorenz, M. Kumar, A. M. Allen, K. Rosolankova, J. S. Wark, M. A. Meyers, M. S. Schneider, T. R. Boehly, Multiple Film Plane Diagnostic for Shocked Lattice Measurements, Rev. Sci. Instrum. 74(2003) 1929-1934.
- [Meyers](#)
[263](#) M. A. Meyers, A. Mishra, and D. J. Benson, Men, Mechanical Properties of Nanostructured Materials, Prog. Matls. Sci., 2006, 51, 427-556.
- [Meyers](#)
[262](#) M. S. Schneider, B. Kad, D. H. Kalantar, B. A. Remington, E. Kenik, V. Lubarda, and M. A. Meyers, Laser Shock Compression of Copper and Copper-Aluminum Alloys,, Int. J. Impact Eng., 2005, 32, 473-507.
- [Meyers](#)
[261](#) A. Lin and M. Meyers, Growth, Structure and Mechanical Properties of Abalone, Mat. Sci. And Eng.A, 2005, A390, 27-41.
- [Meyers](#)
[260](#) B.A. Remington, G. Bazan, J. Belak, E. Bringa, M. Caturla, J.D. Colvin, M.J. Edwards, S.G. Glendinning, D. Ivanov, B. Kad, D.H. Kalantar, M. Kumar, B.F. Lasinski, K.T. Lorenz, J.M. McNaney, D.D. Meyerhofer, M.A. Meyers, S.M. Pollaine, D. Rowley, M. Schneider, J.S. Stlken, J.S. Wark, S.V. Weber, W.G. Wolfer, B. Yaakobi, Materials Science Under Extreme Conditions of Pressure and Strain Rate, Met. and Mat. Trans., 2004, 35A, p. 2587-2608.
- [Meyers](#)
[259](#) M. S. Schneider, B.K. Kad, F. Gregori, D.H. K.H. Kalantar, B.A. Remington, and M.A. Meyers, Laser Induced Shock Defects in Copper Aluminum Alloys: Stacking Fault Energy Effects on the Slip-Twinning Transition, Materials Science Forum, 2004, 465-466, 27-34.

- [Meyers](#)
[258](#) Hsueh-Hung Fu, David J. Benson, and Marc Andr Meyers, Computational Description Of Nanocrystalline Deformation Based On Crystal Plasticity, *Acta Mat.*, 2004, 52, 4413-4425.
- [Meyers](#)
[257](#) L.P. Davila, P. Erhart, E.M. Bringa, M.A. Meyers, V.A. Lubarda, M.S. Schneider, R. Becker, M. Kumar , Shock-induced Void Collapse in fcc Metals, *Appl. Phys. Lett.* , 2004, 86, 1619021-1619023.
- [Meyers](#)
[256](#) F. Grignon, D. Benson, K. S. Vecchio and M. A. Meyers, Explosive Welding of Aluminum To Aluminum: Analysis, Computations And Experiments, *Proc. APS Topical Conf. on Shock Compression*, 2003, Shock Compression Of Condensed Matter, Eds. M. D. Furnish, Y. M. Gupta, And J. W. Forbes, Aip Conference Proceedings 706, 2004, P. 1098-1101.
- [Meyers](#)
[255](#) M. S. Schneider, B. K. Kad, F. Gregori, D. Kalantar, B. R. Remington, and M. A. Meyers, Laser-Induced Shock Compression of Copper: Orientationa and Pressure Decay Effects, *Met. And Mat. Trans.*, 2004, 35A, p.2633.
- [Meyers](#)
[254](#) M. S. Schneider, F. Gregori, B. K. Kad, D. H. Kalantar, B. A. Remington, and M. A. Meyers Laser-Induced Shock Compression Of Copper And Copper Aluminum Alloys, *Proc. 2003 A. P. S. Topical Conference*, Shock Compression Of Condensed Matter, Eds. M. D. Furnish, Y. M. Gupta, And J. W. Forbes, AIP Conference Proceedings 706, 2004, P. 605
- [Meyers](#)
[253](#) M. A. Meyers, M. S. Schneider, B. K Kad, V. A. Lubarda, F. Gregori, D.H. Kalantar, B.A. Remington, Laser Shock Compression Of Copper Monocrystals: Mechanisms For Dislocation And Void Generation, *J. de Physique IV*, vol. 110, 2003, pp. 851-856.
- [Meyers](#)
[252](#) M. A. Meyers, B. Cao, V. F. Nesterenko, D. Benson, And Y.B. Xu, Shear Localization-Martensitic Transformation Interactions In Fe-Cr-Ni Monocrystal, *Met. and Mat. Trans.*, 2004, 35A, 2575-2586.
- [Meyers](#)
[251](#) B. Y. Cao, M. A. Meyers, V. F. Nesterenko, D. Benson, And Y.B. Xu, Shear Localization-Martensitic Transformation Interactions In Fe-Cr-Ni Monocrystal, *Proc. 2003 A. P. S. Topical Conference*, Shock Compression Of Condensed Matter, Eds. M. D. Furnish, Y. M. Gupta, And J. W. Forbes, AIP Conference Proceedings 706, 2004, P. 537-541.
- [Meyers](#)
[250](#) V. A. Lubarda, M. A. Meyers, M. Schneider, B. Remington, and D. Kalantar, Void Growth in Laser-Generated Tensile Pulses, *Acta Mat.*, 2004, 52, 1397-1408.

- [Meyers 249](#) T. Li, F. Grignon, D. Benson, K.S. Vecchio, E. Olevsky, C.F. Jiang, and M.A. Meyers, Mechanical Response of Al₃Ti-Ti MIL Composites, *Matls. Sci., and Eng. A374* (2004) 10-26.
- [Meyers 248](#) F. Grignon, D. H. Benson, K. S. Vecchio, and M. A. Meyers, Explosive Welding of Aluminum to Aluminum: Experiments, Analysis, and Computations, *Intl. J. of Impact Eng.*, 30(2004)1333-1351.
- [Meyers 247](#) D. H. Lassila, T. Shen, and M. A. Meyers, Effect of Low Temperature Shock Compression on the Microstructure and Strength of Copper, *Met. and Mat. Trans.*, 2004, 35A, p. 2729-2740.
- [Meyers 246](#) L. Krger, F. Trommer, B. Wielage, S. Mcklich, L. W. Meyer, K. S. Vecchio, M. A. Meyers, Brazing of Metal Intermetallic Laminate (MIL) TiAl₃-Ti-6Al-4V Composites, *Proc. Welding and Brazing Conf.*, San Diego, 2003.
- [Meyers 245](#) Q. Xue, V. F. Nesterenko, and M. A. Meyers, Self-Organization of Shear Bands in AISI 304 Stainless Steel, *Matls. Sci. and Eng. A384* (2004) 35-46.
- [Meyers 244](#) Q. Xue, V.F. Nesterenko, and M.A. Meyers, Evaluation of the Collapsing Thick-Walled Cylinder Technique for Shear-Band Spacing, *Intl. J. of Impact Eng.*, 28 (2002)257-280.
- [Meyers 243](#) M. A. Meyers, M. T. Perez-Prado, Q. Xue, Y. Xu, and T. R. McNelley, Microstructural Evolution In Adiabatic Shear Localization In Stainless Steel, *Acta Materialia*, 51(2003)1307-1325.
- [Meyers 242](#) A. Loveridge-Smith, A. Allen, J. Belak, T. Boehly , A. Hauer ,B. Holian, D. Kalantar, G. Kyrala, R. W. Lee, P. Lomdahl, M. A. Meyers, D. Paisley, S. Pollaine ,B. Remington, D. C. Swift, S. Weber, J. S. Wark, Anomalous Elastic Response of Silicon to Uniaxial Shock Compression on Nanosecond Time Scales, *Phys. Rev. Lett.*, 86 (2001)2349-2352.
- [Meyers 241](#) Q. Xue, M.A. Meyers, and V.F. Nesterenko, Self-Organization of Shear Bands in Titanium and Ti-6% Al-4% V Alloy, *Acta Mat.*, 50(2002)575-596.
- [Meyers 240](#) M.A. Meyers, F. Gregori, B.K. Kad, M.S. Schneider, D.H. Kalantar, B.A. Remington, G. Ravichandran, and T. Boehly, Laser-Induced Shock Compression of Monocrystalline Copper, *Acta Mat.*, 51(2003)1211-1229.

- [Meyers](#)
[239](#) M.A. Meyers, F. Gregori, B.K. Kad, M.S. Schneider, D.H. Kalantar, B.A. Remington, G. Ravichandran, and T. Boehly, Plastic Deformation in Laser-Induced Shock compression of Monocrystalline Copper, in Shock Compression of Condensed Matter, 2001, (2002)619-622 AIP.
- [Meyers](#)
[238](#) M.A. Meyers, V.F. Nesterenko, J.C. LaSalvia, and Q. Xue, Shear Localization in Dynamic Deformation of Materials: Microstructural Evolution and Self-Organization, Matls. Sci. and Eng. A317 (2001) 204-225.
- [Meyers](#)
[237](#) M.A. Meyers, Q. Xue, and V.F. Nesterenko, Evolution in the Patterning of Adiabatic Shear Bands, in Shock Compression of Condensed Matter, 2001, (2002) 567-570, AIP.
- [Meyers](#)
[236](#) M.A. Meyers, M.T. Perez-Prado, Q. Xue, Y. Xu, and T.R. McNelley, Microstructural Evolution in Adiabatic Shear Localization in Stainless Steel, in Shock Compression of Condensed Matter, 2001, (2002)571-574 , AIP.
- [Meyers](#)
[235](#) M.A. Meyers, Q. Xue, Y. Xu, and V.F. Nesterenko, Microstructural Evolution and Self Organization of Shear Bands, in Impact Engineering and Application, eds. A. Chiba, S. Tanimura, and K. Hokamoto, Proc. 4th International Symposium on Impact Engineering, Kumamoto, Japan, 16-18 July 2001, Elsevier, pp. 123-130.
- [Meyers](#)
[234](#) M.A. Meyers, D. J. Benson, O. Vhringer, B.K. Kad, Q. Xue, H.-H. Fu, and Y.-J. Chen, Constitutive Description of Dynamic Deformation: Physically-Based Mechanisms, Matls. Sci. and Eng. A322(2002)194-216.
- [Meyers](#)
[233](#) M.A. Meyers, Shear Localization, in Encyclopedia of Materials: Science and Technology, Elsevier, 2001.
- [Meyers](#)
[232](#) Q.Xue, V.F. Nesterenko, and M.A. Meyers, Self-Organization of Adiabatic Shear Bands in Ti, Ti-6Al-4V and Stainless Steel, in Shock Compression of Condensed Matter, 1999, AIP(2000), pp. 431-434.
- [Meyers](#)
[231](#) V.A. Lubarda, D.J. Benson, and M.A. Meyers, Strain-Rate Effects in One-Dimensional Rheological Models of Viscoplastic Response, Intl. J. of Plasticity, 19 (2003) 1097-1118.
- [Meyers](#)
[230](#) D.J. Benson, H.H. Fu, and M.A. Meyers, On the Effect of Grain Size on Yield Stress: Extension into Nanocrystalline Domain, Matls. Sci. and Eng.A319(2001)854-861.

- [Meyers](#)
[229](#) D.H. Kalantar, B.A. Remington, J.D. Colvin, K.O. Mikaelian, S.V. Weber, L.G. Wiley, J.S. Wark, A. Loveridge, A.M. Allen, A. Hauer, and M.A. Meyers, Solid State Experiments at High Pressure and Strain Rate, Phys. Plasmas, 7(2000)1999-2006.
- [Meyers](#)
[228](#) M.A. Meyers, D.J. Benson, O. Vhringer, B.K. Kad, Q. Xue, H.H. Fu, and Y.J. Chen, Constitutive Description of Dynamic Deformation: Physically-Based Mechanisms, Matls. Sci. and Eng. 322, (2002)194-216.
- [Meyers](#)
[227](#) H.H. Fu, D.J. Benson, and M.A. Meyers, Analytical and Computational Description of Effect of Grain Size on Yield Stress of Metals, Acta Mat. 49(2001) 2567-2582.
- [Meyers](#)
[226](#) V.F. Nesterenko, Q. Xue, and M.A. Meyers, Self-Organization of Shear Bands in Ti, Ti-6%Al-4%V, and 304 Stainless Steel, J Phys. IV France. 10(2000) pp. 9-269.
- [Meyers](#)
[225](#) M.A. Meyers, V.F. Nesterenko, J.C. LaSalvia, Y.B. Xu, and Q. Xue, Observation and Modeling of Dynamic Recrystallization in High-Strain, High-Strain Rate Deformation of Metals, J Phys. IV France, 10(2000) PP. 9-51.
- [Meyers](#)
[224](#) Q. Xue, V.F. Nesterenko, and M.A. Meyers, Self-Organization of Shear bands in Stainless Steel: Grain Size Effects, Fundamental Issues and Applications of Shock-Wave and High-Strain-Rate Phenomena, ed. K. P. Staudhammer, L. E. Murr, and M. A. Meyers, Elsevier pp. 549-559 (2001).
- [Meyers](#)
[223](#) J.C. LaSalvia, E.J. Horwath, E.J. Rapacki, C.J. Shin, and M.A. Meyers, Microstructural and Micromechanical Aspects of ceramic/Long-Rod Projectile Interactions: Dwell/Penetration Transitions in Fundamental Issues and Applications of Shock-Wave and High-Strain-Rate Phenomena, ed. K. P. Staudhammer, L. E. Murr, and M. A. Meyers, Elsevier, pp. 437-446 (2001).
- [Meyers](#)
[222](#) C.J. Shih, M.A. Meyers, and V.F. Nesterenko, Dynamic Behavior of Silicon Carbide, Fundamental Issues and Applications of Shock-Wave and High-Strain-Rate Phenomena, ed. K. P. Staudhammer, L. E. Murr, and M. A. Meyers, Elsevier, pp. 209-217 (2001).
- [Meyers](#)
[221](#) D.H. Kalantar, B.A. Remington, E.A. Chandler, J.D. Colvin, D.M. Gold, K.O. Mikaelian, S.V. Weber, L.G. Wiler, J.S. Wark, A.A. Hauer, and M.A. Meyers, High Pressure Solid State Experiments on the Nova Laser, Intl Journal of Impact Eng., 23, 409-419 (1999).

- [Meyers 220](#) Y.B. Xu, W.L. Zhong, Y.J. Chen, L.T. Shen, Q. Liu, Y.L. Bai, M.A. Meyers, Shear Localization and Recrystallization in Dynamic Deformation of 8090 Al-Li Alloy, *Mat.Sci. and Eng. A* 299, pp. 287-295 (2001).
- [Meyers 219](#) E.R. Strutt, E.A. Olevsky, and M.A. Meyers, Combustion Synthesis and Quasi-Isostatic Densification of Powder Cermets, *Matls. Proc. Techn.*, (2001) 157-166.
- [Meyers 218](#) E.A. Olevsky, E.R. Strutt, and M.A. Meyers, Characterization by Indentation of Combustion Synthesized Cermets, *Scripta Mat.* 44 (2001) 1139-1146.
- [Meyers 217](#) E.R. Strutt, E.A. Olevsky, and M.A. Meyers, Combustion Synthesis/Densification of Ceramics and Cermets, in *Powder Materials: Current Research and Industrial Practices*, ed. F.D.S. Marquis, TMS-AIME, Warrendale, PA, pp. 73-89 (1999).
- [Meyers 216](#) M.A. Meyers, D.J. Benson, and H.-H. Fu, Grain-Size-Yield Stress Relationship: Analysis and Computation, in *Advanced Materials for the 21st Century*, Y-W Chung, D.C. Dunand, P.K. Liaw, and G.B. Olson, TMS-AIME, Warrendale, Pa, pp. 499-512 (1999).
- [Meyers 215](#) D.H. Kalantar, E.A. Chandler, J.D. Colvin, R. Lee, B.A. Remington, S.V. Weber, L.G. Wiley, A. Hauer, J.S. Wark, A. Loveridge, B.H. Failor, M.A. Meyers, and G. Ravichandran, Transient X-Ray Diffraction Used to Diagnose Shock Compressed Si Crystals on the Nova Laser, *Review of Scientific Instruments*, 70, No. 1, 629-632 (1999).
- [Meyers 214](#) R. Menig, M.H. Meyers, M. A. Meyers, and K.S. Vecchio, Quasi-Static and Dynamic Mechanical Response of *Strombus* (Conch) Shells, *Mat.Sci. and Eng.*, A297, pp. 203-211 (2001).
- [Meyers 213](#) M.A. Meyers, O. Vhringer, and V.A. Lubarda, The Onset of Twinning in Metals: A Constitutive Description, *Acta Mat.*, 49 (2001) 4025-4039.
- [Meyers 212](#) Q. Xue, D.J. Benson, M.A. Meyers, E.A. Olevsky, and V.F. Nesterenko, Constitutive Response of Welded HSLA 100 Steel, *Matls. Sci. and Eng.*, 54, 166-179 (2003).
- [Meyers 211](#) R. Menig, M.H. Meyers, M.A. Meyers, and K.S. Vecchio, Quasi-Static and Dynamic Mechanical Response of *Haliotis Rufescens* (Abalone) Shells, *Acta Mat.*, 48, 2383-2398 (2000).

- [Meyers 210](#) H.C. Chen, V.F. Nesterenko, and M.A. Meyers, Controlled High-Rate Deformation of Ti-Graphite and Ti-Ultrafine Diamond Mixtures, Mat.Sci. and Eng., (2000) ACCEPTED.
- [Meyers 209](#) M.A. Meyers, Q. Xue, V.F. Nesterenko, and J.C. LaSalvia, Shear localization in materials: Microstructural Evolution and Self-Organization, Mat.Sci. and Eng., A317(2001)204-225.
- [Meyers 208](#) E.A. Olevsky, E.R. Strutt, and M.A. Meyers, Modeling and Experimentation on Indentation of Combustion Synthesized Cermets, in Advances in Powder Metallurgy and Particulate Materials 1998, MPIF, pp.3-93 - 3-100.
- [Meyers 207](#) E.A. Olevsky, J.C. La Salvia, and M.A. Meyers, Modeling and Experimentation on Quasi-Isostatic Pressing, in Advances in Powder Metallurgy and Particulate Materials-1997, MPIF, (1997), pp. 20.13-20.19.
- [Meyers 206](#) M.A. Meyers, Dynamic Deformation and Failure, in Mechanics and Materials: Fundamentals and Linkages, eds., M.A. Meyers, R.W. Armstrong, and H.O.K. Kirchner, J. Wiley, N.Y., pp.489-594(1999).
- [Meyers 205](#) H.O.K. Kirchner, R.W. Armstrong, and M.A. Meyers, The Mechanics- Materials Linkage, in Mechanics and Materials: Fundamentals and Linkages, eds., M.A. Meyers, R.W. Armstrong, and H.O.K. Kirchner, J. Wiley, N.Y., pp.1-18 (1999).
- [Meyers 204](#) M.A. Meyers, O. Vhringer, and Y.J. Chen, A Constitutive Description of the Slip-Twinning Transition in Metals, in Advances in Twinning, TMS-AIME, eds. S. Ankem and C. S. Pande pp.43-65 (1999).
- [Meyers 203](#) E.R. Strutt, E.A. Olevsky, and M.A. Meyers, Combustion Synthesis/Quasi-Isostatic Pressing of TiC-NiTi and TiB₂-NiTi Cermets; Microstructure and Shape Distortion, Matls. Sci. and Eng., submitted (1998).
- [Meyers 202](#) M.A. Meyers, D. Benson, and E.A. Olevsky, Shock Consolidation: Microstructurally-Based Analysis and Computational Modeling, Acta Mat., 47, 2089-2108 (1999).
- [Meyers 201](#) M.A. Meyers, V.F. Nesterenko, K.S. Vecchio, S.S. Batsanov, Shock and Shear Induced Chemical Reactions in Mo-Si, Nb-Si, and Ti-Si Systems in Molybdenum Alloys, ed. A.N. Crowson, E. Chen, TMS-AIME. pp. 221-239 (1998)

- [Meyers 200](#) C.J. Shih, M.A. Meyers, V.F. Nesterenko and S.J. Chen, Damage Evolution in Dynamic Deformation of Silicon Carbide *Acta Mat.*, 48, 2399-2420 (2000).
- [Meyers 199](#) V.A. Lubarda and M.A. Meyers, A Note on Engineering Constants of Anisotropic Materials and Negative Poisson Ratio in Monocrystalline Zinc *Scripta Mat.*, 40, No. 8, 975-977 (1999).
- [Meyers 198](#) Y.J. Chen, M.A. Meyers, and V.F. Nesterenko, Spontaneous and Forced Shear Localization in High-Strain-Rate Deformation of Tantalum. *Mat. Sci. and Eng.*, A268, 70-82 (1999).
- [Meyers 197](#) V.I. Levitas, V.F. Nesterenko, and M.A. Meyers, Strain-Induced Structural Changes and Chemical Reactions. II Modeling of Reactions in Shear Band. *Acta Mat.*, 46, 5947-5963 (1998).
- [Meyers 196](#) V.I. Levitas, V.F. Nesterenko, and M.A. Meyers, Strain-Induced Structural Changes and Chemical Reactions. I. Thermomechanical and Kinetic Models, *Acta Mat.*, vol. 46, 5929-5945 (1998).
- [Meyers 195](#) A.A. Hauer, J.S. Wark, D. Kalantar, B. Remington, R. Kopp, J. Cobble, B. Failor, G. Kyrala, M. Meyers, R. Springer, and T. Boehley, Transient X-ray Diffraction and Its Applications to Materials Science and X-ray Optics, *Proc. SPIE Conf.*, Vol. 3157, 72-83 (1998).
- [Meyers 194](#) S.S. Batsanov, S.M. Gavrilkin, L.I. Kopaneva, I.I. Maksimov, M.A. Meyers, H.C. Chen, R. Primmer, E.E. Seiko, and V.A. Vazyulin, h-BN/w-BN Phase Transition Under Dynamic-Static Compression, *J. Matls. Sci. Ltrs.*, 16, 1625-1627 (1997).
- [Meyers 193](#) K. Hokamoto, S. Tanaka, M. Fujita, S. Itoh, M.A. Meyers, H.-C. Chen, High Temperature Shock Consolidation of Hard Ceramic Powders, *Physica B*, 239, 1-5 (1997).
- [Meyers 192](#) C.J. Shih, M.A. Meyers, and V.F. Nesterenko, High-Strain-Rate Deformation of Granular Silicon Carbide, *Acta Mat.*, 46, 4037-4015 (1997).
- [Meyers 191](#) E.A. Olevsky, E.R. Kristofetz, and M.A. Meyers, Controlled Net Shape, Density, and Microstructure of TiC-NiTi Cermets Using Quasi-Isostatic Pressing, *Intl. J. Comb. Synth.*, 7, 517-528 (1998).

- [Meyers](#)
[190](#) E.A. Olevsky, E. Kristofetz, C. Uzoigwe, and M.A. Meyers, Optimization of the Combustion Synthesis/Quasi-Static Pressing processing Sequence in TiC-Based Cermets, in Advances in Powder Metallurgy and Particulate Materials 1997, MPIF, pp. 3-43 - 3-49.
- [Meyers](#)
[189](#) H.C. Chen, V.F. Nesterenko, and M.A. Meyers, Controlled High-Rate Deformation of Ti-Graphite and Ti-Ultrafine Diamond Mixtures, Matls. Sci. and Eng., accepted (1998).
- [Meyers](#)
[188](#) H.C. Chen, V.F. Nesterenko, and M.A. Meyers, Shear Localization and Chemical Reaction in Ti-Si and Nb-Si Powder Mixtures: Thermochemical Analysis, J. Appl. Phys., 84 (1998).
- [Meyers](#)
[187](#) H.C. Chen, J.C. LaSalvia, V.F. Nesterenko, and M.A. Meyers, Shear Localization and Chemical Reaction in High-Strain, High-Strain-Rate Deformation of Ti-Si Powder Mixtures, Acta Mat., 46, 3033-3046 (1998).
- [Meyers](#)
[186](#) S.S. Batsanov, S.M. Gavrilkin, F.D. Marquis, and M.A. Meyers, Thermodynamics and Kinetics of MSi_2 Formation under Shock Compression, Russian Journal of Inorganic Chemistry, Vol. 42, No. 1, 103-109 (1997).
- [Meyers](#)
[185](#) H.C. Chen, V.F. Nesterenko, J.C. LaSalvia, and M.A. Meyers, Shear-Induced Exothermic Chemical Reactions, J. Phys. IV, C3, Proc. EURODMAT, Sept. 1997, Toledo, Spain, pp. C3 27-32.
- [Meyers](#)
[184](#) C.J. Shih, V.F. Nesterenko, and M.A. Meyers, Shear Localization and Commution in High-Strain-Rate Deformation of Silicon Carbide, J. Appl. Phys., vol. 83, 4660-4671 (1998).
- [Meyers](#)
[183](#) C.J. Shih, V.F. Nesterenko, and M.A. Meyers, Shear Localization and Comminution of Granular and Fragmented Silicon Carbide, J. Phys. IV, C3, Proc. EURODMAT, Sept. 1997, Toledo, Spain, pp. C3 - 577-582.
- [Meyers](#)
[182](#) Y.J. Chen, J.C. LaSalvia, V.F. Nesterenko, M.A. Meyers, M.P. Bondar, and Y.L. Lukyanov, High-Strain, High-Strain-Rate Deformation, Shear Localization, and Recrystallization in Tantalum, Proc. EURODMAT, Sept. 1997, Toledo, Spain, pp. C-435-440.
- [Meyers](#)
[181](#) M.A. Meyers, J.C. LaSalvia, V.F. Nesterenko, and B.K. Kad, Dynamic Recrystallization in High-Strain-Rate Deformation, in Recrystallization and Related Phenomena, Ed. J.R. McNelley, Proc. Rex. 96, 279-286.

- [Meyers 180](#) T. Dmmer, J.C. LaSalvia, G. Ravichandran, and M.A. Meyers, Effect of Strain Rate on Plastic Flow and Failure in Polycrystalline Tungsten, *Acta Materialia*, 46 pp. 6267-6290 (1998).
- [Meyers 179](#) S. Pappu, C. Kennedy, L.E. Murr, and M.A. Meyers, Deformation Twins in a Shock-Loaded Ta-2.5 Precursor Plate and a Recovered, Ta-2.5 Explosively Formed Penetrator, *Scripta Mat.*, 35, No. 8 (1996) 959-965.
- [Meyers 178](#) J.C. LaSalvia, Y.J. Chen, M.A. Meyers, V.F. Nesterenko, M.P. Bondar, and Y.L. Lukyanov, High-Strain, High-Strain-Rate Response of Annealed and Shocked Tantalum, in *Tantalum*, TMS-AIME, Warrendale, PA, (1996) 139-144.
- [Meyers 177](#) D.H. Lassila, M.M. LeBlanc, M.A. Meyers, Effect of Shock Prestrain on the Mechanical Behavior of Tantalum and Tantalum-Tungsten Alloys, in *Tantalum* TMS-AIME, Warrendale, PA, (1996), 185-190.
- [Meyers 176](#) L.E. Murr, S. Pappu, C. Kennedy, C-S. Niou, and M.A. Meyers, Tantalum Microstructures for High-Strain-Rate Deformation: Shock Loading, Shaped Charges, and Explosively Formed Penetrators, in *Tantalum*, TMS-AIME, Warrendale, PA, (1996), 145-155.
- [Meyers 175](#) L.E. Murr, M.A. Meyers, C-S. Niou, Y.J. Chen, S. Pappu and C. Kennedy, Shock-Induced Deformation Twinning in Tantalum, *Acta Met. et. Mat.*, 45 (1997) 157-175.
- [Meyers 174](#) D. Benson, V.F. Nesterenko, F. Jonsdottir, and M.A. Meyers, Quasistatic and Dynamic Regimes of Granular Material Deformation under Impulse Loading, *J. Mech. Phys. Solids*, 45, No. 11/12, 1955-1999 (1997).
- [Meyers 173](#) H.C. Chen, V.F. Nesterenko, and M.A. Meyers, Shear-Induced Chemical Reactions in Controlled High-Strain-Rate Shear Bands, in *Shock Compression of Condensed Matter 1995*, ed. S.C. Schmidt and W.C. Tao, AIP Press, (1996) 713-716.
- [Meyers 172](#) H.C. Chen, M.A. Meyers, and V.F. Nesterenko, Shear Localization in Granular and Comminuted Alumina, in *Shock Compression of Condensed Matter 1995*, ed. S.C. Schmidt and W.C. Tao, AIP Press, (1996) 607-610.

- [Meyers](#)
[171](#) J.C. LaSalvia and M.A. Meyers, Microstructure, Properties, and Mechanisms of TiC-Mo-Ni Cermets Produced by SHS, Intl. J. Comb.Synth., 4 (1995) 43-57.
- [Meyers](#)
[170](#) V.F. Nesterenko, M.A. Meyers, J.C. LaSalvia, M.P. Bondar, Y.J. Chen, and Y.L. Lukyanov, Investigation of High-Strain, High-Strain-Rate Behavior of Tantalum Using the Collapse of a Thick-Walled Cylinder, Matls. Sci. and Eng., A229 23-41 (1997).
- [Meyers](#)
[169](#) S.S. Batsanov, F.D.S. Marquis, and M.A. Meyers, Shock Synthesis of Mo and Nb Silicides, in Metallurgical and Materials Applications of Shock-Wave and High-Strain-Rate Phenomena, eds. L.E. Murr, K.P. Staudhammer, and M.A. Meyers, Elsevier, 715-722 (1996).
- [Meyers](#)
[168](#) S. Pappu, C-S. Niou, C. Kennedy, L.E. Murr, L. DuPlessis and M.A. Meyers, High-Strain-Rate Behavior of Pure Tantalum in Explosively Formed Penetrator and Shaped Charge Regimes, in Metallurgical and Materials Applications of Shock-Wave and High-Strain-Rate Phenomena, eds. L.E. Murr, K.P. Staudhammer, and M.A. Meyers, Elsevier, 495-502 (1996).
- [Meyers](#)
[167](#) H.C. Chen, M.A. Meyers, and V.F. Nesterenko, Chemical Reaction in Ti-Si Mixture under Controlled High-Strain-Rate Deformation, in Metallurgical and Materials Applications of Shock-Wave and High-Strain-Rate Phenomena, eds. L.E. Murr, K.P. Staudhammer, and M.A. Meyers, Elsevier, 723-729 (1996).
- [Meyers](#)
[166](#) M.A. Meyers, V.F. Nesterenko, Y.J. Chen, J.C. LaSalvia, M.P. Bondar, and Y.L. Lukyanov, High-strain, high-strain-rate Deformation of Tantalum: the Thick-Walled Cylinder Method, in Metallurgical and Materials Applications of Shock-Wave and High-Strain-Rate Phenomena, eds. L.E. Murr, K.P. Staudhammer, and M.A. Meyers, Elsevier, 487-494 (1996).
- [Meyers](#)
[165](#) V.F. Nesterenko, M.A. Meyers, and T.W. Wright, Collective Behavior of Shear Bands, in Metallurgical and Materials Applications of Shock-Wave and High-Strain-Rate Phenomena, eds. L.E. Murr, K.P. Staudhammer, and M.A. Meyers, Elsevier, 397-404 (1996).
- [Meyers](#)
[164](#) V.F. Nesterenko, M.A. Meyers, and H-C. Chen, Shear Localization in High Strain, High Strain Rate Deformation of Granular Alumina, Acta Met. et Mat., 44 2017-2026 (1996).
- [Meyers](#)
[163](#) V.F. Nesterenko, M.A. Meyers, and T.W. Wright, Self-Organization in the Initiation of Shear Bands in High-Strain-Rate Deformation, Acta Met. et Mat., 46 327-340 (1998).

- [Meyers](#)
[162](#) A.J. Strutt, M.A. Meyers, and K.S. Vecchio, "Analytical Electron Microscopy of Shock-Synthesized Niobium Silicide Composites," Proc. 52nd Ann. Meet. MSA, G.W. Bailey and A.J. Garratt-Reed Eds., 704-705 (1995).
- [Meyers](#)
[161](#) J.C. LaSalvia, D.K. Kim, and M.A. Meyers, "Effect of Mo on Microstructure and Mechanical Properties of TiC-Ni-Based Cermets Produced by Combustion Synthesis/Impact Forging Technique," Mat. Sci. and Eng., A206 71-80 (1995).
- [Meyers](#)
[160](#) V.F. Nesterenko, M.A. Meyers, H.C. Chen, and J.C. LaSalvia, "The Structure of Controlled Shear Bands in Dynamically Deformed Reactive Mixtures," Met. and Mat. Trans., 26A 2511-2519 (1995).
- [Meyers](#)
[159](#) R.V. Raman, S.V. Rele, S. Poland, J. LaSalvia, M.A. Meyers, and A.R. Niller, "The One-Step Synthesis of Dense Titanium-Carbide Tiles," J. Of Metals, March 23-25 (1995).
- [Meyers](#)
[158](#) S.S. Shang and M.A. Meyers, "Shock Consolidation of Silicon Carbide," J. Matls. Sci., 31 252-261 (1996).
- [Meyers](#)
[157](#) M.A. Meyers, Y.J. Chen, F. Marquis, and D.S. Kim, "High-Strain, High-Strain-Rate Deformation of Tantalum," Met. and Mat. Trans., 26A 2493-2509 (1995).
- [Meyers](#)
[156](#) J.C. LaSalvia and M.A. Meyers, "Combustion Synthesis in the Ti-C-Ni-Mo System: II Analysis," Met. and Mat. Trans., 26A 3011-3019 (1995).
- [Meyers](#)
[155](#) J.C. LaSalvia, D.K. Kim, R.A. Lipsett, and M.A. Meyers, "Combustion Synthesis in the Ti-C-Ni-Mo System: I. Macrokinetics and Micromechanisms," Met. and Mat. Trans., 26A 3001-3009 (1995).
- [Meyers](#)
[154](#) V.F. Nesterenko, M.A. Meyers, H.C. Chen, and J.C. LaSalvia, "Controlled High-Rate Localized Shear in Porous Reactive Media," Appl. Phys. Letters, 65 3069-3071 (1994).
- [Meyers](#)
[153](#) M.S. Hsu, M.A. Meyers, and A. Berkowitz, "Synthesis of Nanocrystalline Titanium Carbide by Spark Erosion," Scripta Met. et Mat., 32, 805-808 (1995).

- [Meyers](#)
[152](#) M.A. Meyers, S.S. Batsanov, S.M. Gavrilkin, H.C. Chen, J.C. LaSalvia, and F.D.S. Marquis, "Effect of Shock Pressure and Plastic Strain on Chemical Reactions in Nb-Si and Mo-Si Systems," Mat. Sci. and Eng., 201, 150-158 (1995).
- [Meyers](#)
[151](#) D.K. Kim, J.C. LaSalvia, D.A. Hoke, and M.A. Meyers, "Combustion Synthesis/Dynamic Compaction of TiB₂-SiC Composite," J. Am. Ceram. Soc., 78, 275-284 (1995).
- [Meyers](#)
[150](#) D.A. Hoke and M.A. Meyers, "Consolidation of Combustion Synthesized Titanium Diboride-Based Materials," J. Am. Ceram. Soc., 78[2], 275-284 (1994).
- [Meyers](#)
[149](#) J.C. LaSalvia, M.A. Meyers, and D.K. Kim, "Combustion Synthesis/Dynamic Densification of TiC-Ni Cermets," J. Mater. Syn. Proc., 2, [4] 255-274 (1994).
- [Meyers](#)
[148](#) S.S. Shang, D.J. Benson, and M.A. Meyers, "Microstructurally-based Analysis and Computational Modeling of Shock Consolidation," Proc. EURODMAT 94, ed. J. Harding, Oxford, J. de Physique IV, 4 C8-521-526 (1994).
- [Meyers](#)
[147](#) M.A. Meyers, "Dynamic Failure: Mechanical and Microstructural Aspects," Proc. EURODMAT 94, ed. J. Harding, Oxford, J. de Physique IV, 4 C8-587-630 (1994).
- [Meyers](#)
[146](#) U. Andrade, M.A. Meyers, A.H. Chokshi, and K.S. Vecchio, "Recrystallization and Grain-Size Effects in Shock-Hardened Copper," Proc. EURODMAT 94, ed. J. Harding, Oxford, J. de Physique IV, 4, C8-361-366 (1994).
- [Meyers](#)
[145](#) U. Andrade, M.A. Meyers, K.S. Vecchio, and A.H. Chokshi, "Dynamic Recrystallization in High-Strain, High-Strain-Rate Plastic Deformation of Copper," Acta Met. et Mat., 42 3183-3195 (1994).
- [Meyers](#)
[144](#) M.A. Meyers, U. Andrade, and A.H. Chokshi, "The Effect of Grain Size on the High-Strain, High-Strain-Rate Behavior of Copper," Met. and Mat. Trans., 26A 2881-2893 (1995).
- [Meyers](#)
[143](#) U. Andrade, M.A. Meyers, and A.H. Chokshi, "Constitutive Description of Work- and Shock-Hardened Copper," Scripta Met. et Mat. 30 933-938 (1994).

- [Meyers](#)
[142](#) A.J. Strutt, K.S. Vecchio, L.-H. Yu, M.A. Meyers, and R.A. Graham, "Shock Synthesis of Nickel Aluminides," in "High-Pressure Science and Technology-1993," eds. S.C. Schmidt, J.W. Shaner, G.A. Samara, and M. Ross, AIP Press, NY, 1259-1262 (1994).
- [Meyers](#)
[141](#) L.H. Yu, W.J. Nellis, M.A. Meyers, and K.S. Vecchio, "Shock Synthesis of Niobium Silicides," in "High-Pressure Science and Technology-1993," eds. S.C. Schmidt, J.W. Shaner, G.A. Samara, and M. Ross, AIP Press, NY, 1291-1294 (1994).
- [Meyers](#)
[140](#) M.A. Meyers, D.J. Benson, and S.S. Shang, "Energy Expenditure and Limitations in Shock Consolidation," in "High-Pressure Science and Technology-1993," eds. S.C. Schmidt, J.W. Shaner, G.A. Samara, and M. Ross, AIP Press, NY 1239-1242 (1994).
- [Meyers](#)
[139](#) A.K. Zurek and M.A. Meyers, "Microstructural Aspects of Dynamic Failure," invited chapter in "Dynamic Fracture and Fragmentation," eds. L. Davison, D.E. Grady, and M. Shahinpoor, Springer, NY, 25-70 (1996).
- [Meyers](#)
[138](#) M.A. Meyers, G. Subhash, B. Kad, and L. Prasad, "Evolution of Microstructure and Shear Band Formation in a-hcp Titanium", Mech. of Matls., 17 175-193 (1994).
- [Meyers](#)
[137](#) D.A. Hoke, D.K. Kim, J.C. LaSalvia, and M.A. Meyers, "Combustion Synthesis/Dynamic Compaction of TiB₂-SiC Composite", J. Am. Cer. Soc., 79 177-182 (1996).
- [Meyers](#)
[136](#) J.H. Beatty, Y.-F. Li, M.A. Meyers, and S. Nemat-Nasser, "Adiabatic Shear-Banding in High-Strength Alloys", Proc. 12th Army Symposium on Solid Mechanics, ed. S.C. Chou, 331-345 (1991)
- [Meyers](#)
[135](#) L.H. L. Louro, J.R.A. Ribeiro, and M.A. Meyers, "Dynamic Fragmentation of Alumina: A Simplified Model," 13th International Symposium on Ballistics, Stockholm, 1-3 June, (1992).
- [Meyers](#)
[134](#) M.A. Meyers, L-H. Yu, and K.S. Vecchio, "Shock Synthesis of Silicides, Part II: Thermodynamics and Kinetics," Acta Met. et Mat., 42, 715-729 (1994)
- [Meyers](#)
[133](#) K.S. Vecchio, L.-H. Yu, and M.A. Meyers, "Shock Synthesis of Silicides, Part I: Experimentation and Microstructural Evolution," Acta Met. et Mat., 42, 701-714 (1994).

- [Meyers](#)
[132](#) M.A. Meyers, S.S. Shang, and K. Hokamoto, "The Role of Thermal Energy in Shock Consolidation," in Applications of Shock Waves in Materials Science, edited by A. B. Sawaoka, Springer-Verlag, 145-176 (1993).
- [Meyers](#)
[131](#) M.A. Meyers, J.C. LaSalvia, D. Hoke, J.-M. Jamet, and D.K. Kim, "Combustion Synthesis/Densification of Ceramics and Ceramic Composites," Proceeding of International Conference on Advanced Synthesis of Engineered Structural Materials, September, 43-57 (1993).
- [Meyers](#)
[130](#) S.S. Shang, M.A. Meyers, L.-H. Yu, and K. Hokamoto, "The Use of Thermal Energy in Shock-Wave Compaction of Ceramics and Intermetallics", Proceeding of International Conference on Advanced Synthesis of Engineered Structural Materials, September, 87-91 (1993).
- [Meyers](#)
[129](#) M.A. Meyers, E.A. Olevsky, J. Ma, and J.-M. Jamet, "Combustion Synthesis/Densification of an Al₂O₃-TiB₂ Composite, Mat.Sci. and Eng., 311(2001) 83-99.
- [Meyers](#)
[128](#) K.S. Vecchio, J.C. LaSalvia, M.A. Meyers, G.T. Gray III, "Microstructural Characterization of Self-Propagating High-Temperature Synthesis/Dynamically Compacted and Hot Pressed Titanium Carbides", Met. Trans. A, 23A, 87-97 (1992).
- [Meyers](#)
[127](#) L.H. Yu, M.A. Meyers, and K.S. Vecchio, "Shock Synthesis of Silicides: Microstructures and Mechanisms", Proceedings of the 2nd International Symposium on Intense Dynamic Loading and its Effects, ed. Zhang Zhemin, Sichuan University Press, Chengdu, Sichuan, China, 741-748 (1992).
- [Meyers](#)
[126](#) S. Nemat-Nasser, Y. Sano, S.N. Chang, and M.A. Meyers, "Incubation Time and Growth Pattern of Martensite under a Short Stress Pulse", in Shock Compression of Condensed Matter - 1991, eds. S.C. Schmidt, R.D. Dick, J.W. Forbes, D.G. Tasker, North-Holland, Amsterdam, 181-185 (1992).
- [Meyers](#)
[125](#) K.S. Vecchio, U. Andrade, M.A. Meyers, and L.W. Meyer, "Microstructural Evolution in High Strain, High Strain-Rate Deformation", in Shock Compression of Condensed Matter - 1991, eds. S.C. Schmidt, R.D. Dick, J.W. Forbes, D.G. Tasker, North-Holland, Amsterdam, 527-530 (1992).
- [Meyers](#)
[124](#) M.A. Meyers, L.-H. Yu and K.S. Vecchio, "Shock Synthesis of Silicides", in Shock Compression of Condensed Matter - 1991, eds. S.C. Schmidt, R.D. Dick, J.W. Forbes, D.G. Tasker, North-Holland, Amsterdam, 629-632 (1992).

- [Meyers 123](#) S. Shang, K. Hokamoto and M.A. Meyers, "Hot Dynamic Consolidation of Hard Ceramics", J. Matls. Sci., 27, 5470-5476 (1992)
- [Meyers 122](#) M.A. Meyers, J.C. LaSalvia, L.W. Meyer, D. Hoke, and A.Niiler, "Reaction Synthesis/Dynamic Compaction of Titanium Carbide and Titanium Diboride", in Proc. DYMAT, Strasbourg, France, J. de Physique, C3-123-130 (1991).
- [Meyers 121](#) M.A. Meyers, L.W. Meyer, K.S. Vecchio, and U. Andrade, "High Strain, High Strain-Rate Deformation of Copper", in Proc. DYMAT, Strasbourg, France, J. de Physique, C3-11-17 (1991).
- [Meyers 120](#) K. Hokamoto, S.S. Shang, L.H. Yu, and M.A. Meyers, "Hot Shock Consolidation of Diamond and Cubic Boron Nitride Powders", in "Shock Waves and High-Strain-Rate Phenomena in Materials", eds., M.A. Meyers, L.E. Murr, and K.P. Staudhammer, M. Dekker, 453-461 (1992).
- [Meyers 119](#) D.A. Hoke, M.A. Meyers, L.W. Meyer, and G.T. Gray III, "Reaction synthesis/Dynamic Compaction of Titanium Diboride", Metallurgical Transactions A, 23A, 77-86 (1992).
- [Meyers 118](#) L.W. Meyer, J.C. LaSalvia, and M.A. Meyers, "Densification of Reaction Synthesized Titanium Carbide by High-Velocity Forging", J. Am. Cer. Soc., 75, 592-602 (1992).
- [Meyers 117](#) Y. Sano, S.N. Chang, M.A. Meyers, and S. Nemat-Nasser, "Identification of Stress Induced Nucleation Sites for Martensite in Fe-31.8 wt % Ni-0.02 wt % C Alloy", Acta Met., 40, 413-417 (1992).
- [Meyers 116](#) S.S. Shang and M.A. Meyers, "Shock Densification/Hot Isostatic Pressing of Titanium Aluminide", Met. Trans., 22A, 2667-2676 (1991).
- [Meyers 115](#) L.H. Yu and M.A. Meyers, "Shock Synthesis and Synthesis-assisted Shock Consolidation of Silicides", J. Matls. Sci., 26, 601-611 (1991).
- [Meyers 114](#) L.H. Yu, M.A. Meyers, and T.C. Peng, "Shock Consolidation of Al-Li Aluminum-Lithium Alloy Powders", Mater. Sci. and Eng., A132, 257-265 (1991).
- [Meyers 113](#) H.L. Coker, M.A. Meyers, and J.F. Wessels, "Dynamic Consolidation of Rapidly Solidified Titanium Alloy Powders by Explosives", J. Matls. Sci., 26, 1277-1286 (1991).

- [Meyers](#)
[112](#) A. Ferreira, M.A. Meyers, N.N. Thadhani, S.N. Chang, and J.R. Kough, "Dynamic Compaction of Titanium Aluminides by Explosively Generated Shock Waves: Experimental and Materials Systems", Met. Trans., 21A, 685-695 (1991).
- [Meyers](#)
[111](#) A. Ferreira, M.A. Meyers, and N.N. Thadhani, "Dynamic Compaction of Titanium Aluminides by Explosively Generated Shock Waves: Microstructure and Mechanical Properties", Met. Trans., 23A, 3251-3261 (1992).
- [Meyers](#)
[110](#) R.B. Scorzelli, I.S. Azevedo, J. Danon, and M.A. Meyers, "Mossbauer study of shock-induced effects in the ordered alloy Fe₅₀Ni₅₀ in meteorites," J. Phys. F: Met. Phys., 17, 1993-1997 (1987).
- [Meyers](#)
[109](#) J.H. Beatty, L.W. Meyer, M.A. Meyers, and S. Nemat-Nasser, "Formation of Controlled Adiabatic Shear Bands in AISI 4340 High Strength Steel", in "Shock Waves and High-Strain-Rate Phenomena in Materials", eds., M.A. Meyers, L.E. Murr, and K.P. Staudhammer, M. Dekker, p. 645-656 (1992).
- [Meyers](#)
[108](#) M.A. Meyers, L.W. Meyer, J. Beatty, U. Andrade, K.S. Vecchio, and A. Chokshi, "High Strain, High-Strain Rate Deformation of Copper", in "Shock Waves and High-Strain-Rate Phenomena in Materials", eds., M.A. Meyers, L.E. Murr, and K.P. Staudhammer, M. Dekker, p. 529-542 (1992).
- [Meyers](#)
[107](#) S.S. Shang and M.A. Meyers, "Shock Densification/Hot Isostatic Pressing of Titanium Aluminides", in "Shock Waves and High-Strain-Rate Phenomena in Materials", eds., M.A. Meyers, L.E. Murr, and K.P. Staudhammer, M. Dekker, p. 393-406 (1992).
- [Meyers](#)
[106](#) A. Ferreira and M.A. Meyers, "Method for Determining the Pressure Required for Shock Compaction of Powders", in "Shock Waves and High-Strain-Rate Phenomena in Materials", eds., M.A. Meyers, L.E. Murr, and K.P. Staudhammer, M. Dekker, p. 361-370 (1992).
- [Meyers](#)
[105](#) L.H. Yu and M.A. Meyers, "Shock Synthesis of Silicides", in "Shock Waves and High-Strain-Rate Phenomena in Materials", eds., M.A. Meyers, L.E. Murr, and K.P. Staudhammer, M. Dekker, p. 303-310 (1992).
- [Meyers](#)
[104](#) J. LaSalvia, L.W. Meyer, D. Hoke, A. Niller, and M.A. Meyers, "Reaction Synthesis/Dynamic Compaction of Titanium Carbide and Titanium Diboride", in "Shock Waves and High-Strain-Rate Phenomena in Materials", eds., M.A. Meyers, L.E. Murr, and K.P. Staudhammer, M. Dekker, p. 261-270 (1992).

- [Meyers 103](#) A.H. Chokshi and M.A. Meyers, "The Prospects for Superplasticity at High Strain Rates: Preliminary Considerations and an Example", *Scripta Met.*, 24, p. 605-610 (1990).
- [Meyers 102](#) L.H.L. Louro and M.A. Meyers, "Stress-Wave Induced Fragmentation in Alumina-Based Ceramics", in *Shock Waves in Condensed Matter-1989*, eds. S.C. Schmidt, J.N. Johnson, and L.W. Davidson, North-Holland, p. 465-468 (1990).
- [Meyers 101](#) A. Ferreira, L.H. Yu, N.N. Thadhani, S.N. Chang, S.S. Shang, and M.A. Meyers, "Shock Compaction, Synthesis, and Chemically Assisted Bonding of Aluminides and Silicides", in *Shock Waves in Condensed Matter-1989*, eds. S.C. Schmidt, J.N. Johnson, and L.W. Davidson, North-Holland, p. 495-498 (1990).
- [Meyers 100](#) H.L. Yu, M.A. Meyers, and N.N. Thadhani, "Reaction-Assisted Shock Consolidation of RSR Ti-Al Alloys", *J. Matls. Res.*, 5, p. 302-312 (1990).
- [Meyers 99](#) M.A. Meyers and C.L. Wittman, "Effect of Metallurgical Parameters on Shear Band Formation in Low-Carbon (~0.20 wt. pct.) Steels", *Met. Trans.*, 21A, pp. 3153-3164 (1990).
- [Meyers 98](#) C.L. Wittman, M.A. Meyers, and H.-r. Pak, "Observation of an Adiabatic Shear Band in AISI 4340 Steel by High-Voltage Transmission Electron Microscopy", *Met. Trans.A*, 21A, p. 707-716, (1990).
- [Meyers 97](#) S.J. Work, L.H. Yu, N.N. Thadhani, M.A. Meyers, R.A. Graham, and W.F. Hammett, "Shock-Induced Chemical Synthesis of Intermetallic Compounds", in *Combustion and Plasma Synthesis of High-Temperature Materials*, eds. Z.A. Munir and J.B. Holt, VCH, New York, p. 133-143 (1990).
- [Meyers 96](#) S. Kuriyama and M.A. Meyers, "Generation and Formation of Adiabatic Shear Band Produced by Simple Shearing", *J. of the J.S.T.P.*, Vol. 30, p. 961-968, (1989). (In Japanese.)
- [Meyers 95](#) L.H.L. Louro and M.A. Meyers, "Effect of Stress-State and Microstructural Parameters on Impact Damage of Alumina-Based Ceramics", *J. Matls. Sci.*, 24, p. 2516-2532, (1989).
- [Meyers 94](#) M.A. Meyers, N.N. Thadhani, and L.H. Yu, "Explosive Shock Wave Consolidation of Metal and Ceramic Powders", in *Industrial Applications of Shock Waves*, ed., L. E. Murr, Noyes Publications, p. 265-334 (1989).

- [Meyers 93](#) D.M. Bowden, P.J. Meschter, L.H. Yu, M.A. Meyers, and N.N. Thadhani, "Synthesis of Novel Aluminide-Based Materials", J. Metals, p. 18-20, September (1988).
- [Meyers 92](#) L.H. Yu, N.N. Thadhani, and M.A. Meyers, "Dynamic Powder Consolidation and Synthesis of Intermetallic Compounds", in Proc. DYMAT 88 (Ajaccio, France), J. de Physique, 49, p. C3-659-666, (Colloque-3) (1988).
- [Meyers 91](#) L.H.L. Louro, A. Lindfors, and M.A. Meyers, "Stress-Wave-Induced Damage in Alumina", in Proc. DYMAT 88 (Ajaccio, France), J. de Physique, 49, p. C3-333-338, (Colloque-3) (1988).
- [Meyers 90](#) M.A. Meyers, N.N. Thadhani, and H.L. Coker, "Shock Consolidation of Rapidly-Solidified Titanium Alloy Powders", in Rapidly Solidified Materials: Properties and Processing, Proceedings of the 2nd International Conference on Rapidly Solidified Materials, San Diego, CA, 7-9 March 1988, eds., P.W. Lee and J.H. Moll, ASM International, Metals Park, Ohio, p. 191-197 (1988).
- [Meyers 89](#) S.N. Chang, M.A. Meyers, N.N. Thadhani, and D.C. Erlich, "Martensitic Transformation Induced by Tensile Stress Pulse in an Fe-Ni-Mn Alloy", in Shock Waves in Condensed Matter, eds., S.C. Schmidt and M.C. Holmes, North Holland, p. 143-146 (1988).
- [Meyers 88](#) S.L. Wang, M.A. Meyers, and A. Szecket, "Warm Shock Consolidation of IN 718 Powder", J. Matls. Sci., 23, p. 1786-1796 (1988).
- [Meyers 87](#) M.A. Meyers, N.N. Thadhani, and S.N. Chang, "Martensitic Transformation Induced by Tensile Stress Pulses", in Proc. DYMAT 88 (Ajaccio, France), J. de Physique, 49, p. C3-355-362 (Colloque-3) (1988).
- [Meyers 86](#) M.A. Meyers and S.L. Wang, "An Improved Method for Shock Consolidation of Powders", Acta Met., 36, p. 925-936 (1988).
- [Meyers 85](#) M.A. Meyers, C.L. Wittman, H.-r. Pak, and S. Kuriyama, "Observation and Modeling of High-Strain-Rate Shear Localization", in Impact Loading and Dynamic Behavior of Materials, Deutsche Gesellschaft fr Metallkunde, eds., C.Y. Chiem, L.W. Meyer, and H.D. Kunze, p. 719-728 (1987).
- [Meyers 84](#) S.N. Chang and M.A. Meyers, "Martensitic Transformation Induced by a Tensile Stress Pulse in Fe-22.5 wt% Ni-4 wt% Mn Alloy", in Acta Met., 36, p. 1085-1098, (1988).

- [Meyers 83](#) K.K. Chawla and M.A. Meyers, "Metallurgy, Mechanical", in Encyclopedia of Physical Science and Technology, ed., R.A. Meyers, Academic Press, Vol. 8, p. 181-196 (1987).
- [Meyers 82](#) M.A. Meyers, "Shock-Wave Consolidation of Rapidly-Solidified Metal Powders", in Proc. of the Fourth Conference on Rapid Solidification Technology, eds., R. Mehrabian and M. Cohen, Santa Barbara, CA, 14 pages, (December 1986).
- [Meyers 81](#) M.A. Meyers and N.N. Thadhani, "Martensitic Transformation Induced by Tensile Stress Pulses", in Proc. 9th Intl. Conf. on High Energy Rate Fabrication, Novosibirsk, USSR, eds., I.V. Yakovlev and V.F. Nesterenko, p. 90-97 (August 1986).
- [Meyers 80](#) N.N. Thadhani and M.A. Meyers, "Kinetics of Isothermal Martensite Transformation", Progress in Materials Science, 30, (1), p. 1-37 (1986).
- [Meyers 79](#) N.N. Thadhani and M.A. Meyers, "Kinetics of Martensitic Transformation Induced by a Tensile Pulse", Acta Met., 34 (8), 1625-1641 (1986).
- [Meyers 78](#) M.A. Meyers and H.-r. Pak, "Observation of an Adiabatic Shear Band in Titanium by High Voltage Transmission Electron Microscopy", Acta Met., 34, p. 2493-2499 (1986).
- [Meyers 77](#) M.A. Meyers and C. McCowan, "The Formation of Annealing Twins: Overview and New Thoughts", in Interface Migration and Control of Microstructure, eds., C.S. Pande et al., ASM, p. 99-124 (1986).
- [Meyers 76](#) S. Christy, H.-r. Pak, and M.A. Meyers, "Effect of Metallurgical Parameters on Dynamic Fracture by Spalling of Copper", in Metallurgical Applications of Shock-Wave and High-Strain-Rate Phenomena, eds., L.E. Murr, K.P. Staudhammer, and M.A. Meyers, M. Dekker, N. Y., p. 835 (1986).
- [Meyers 75](#) H.-r. Pak, C.L. Wittman, and M.A. Meyers, "High Voltage Transmission Electron Microscopy of Shear Bands in Titanium and AISI 4340 Steel", in Metallurgical Applications of Shock-Wave and High-Strain-Rate Phenomena, eds., L.E. Murr, K.P. Staudhammer, and M.A. Meyers, M. Dekker, N. Y., p. 749 (1986).
- [Meyers 74](#) M.A. Meyers and S. Kuriyama, "Modeling of Instability at the Tip of a Shear Band", in Shock Waves in Condensed Matter, ed., Y. M. Gupta, Plenum Press, N. Y., p. 321 (1986).

- [Meyers 73](#) S.L. Wang, M.A. Meyers, R.A. Graham, "Determination of Parameters for Shock Consolidation of IN-100 Superalloy", in Shock Waves in Condensed Matter, ed., Y.M. Gupta, Plenum Press, N. Y., p. 731 (1986).
- [Meyers 72](#) S. Kuriyama and M.A. Meyers, "Numerical Analysis of Adiabatic Shear Band due to Simple Shear Deformation", in Proc. IUTAM Symp. on Macro- and Micro-Mechanics of High-Velocity Deformation and Fracture, Aug. 12-15, Tokyo (1985).
- [Meyers 71](#) S. Kuriyama and M.A. Meyers, "Formation and Propagation of Adiabatic Shear Band due to Simple Shear Deformation", Proc. of Spring Conf., Japan Soc. Tech. Plasticity, Nagaoka, p. 289 (in Japanese) (1985).
- [Meyers 70](#) S. Kuriyama, M.A. Meyers, and D. Jaramillo, "Numerical Analysis of Wedge Indentation by FEM", Proc. of the 36th Joint Conf., Japan Soc. Tech. Plasticity, Nagaoka, p. 627 (in Japanese) (1985).
- [Meyers 69](#) S. Kuriyama and M.A. Meyers, "Numerical Modeling of the Tip of an Adiabatic Shear Band", Met. Trans., 17A, p. 443 (1986).
- [Meyers 68](#) M.A. Meyers, Discussion of "Pressure-Shear Impact and the Dynamic Viscoplastic Response of Metals", Mechanics of Materials, 4, p. 387 (1985).
- [Meyers 67](#) M.A. Meyers and O.T. Inal, "Developments and Prospect in Materials Technologies", in Frontiers in Materials Technologies, eds., M. A. Meyers and O.T. Inal, Elsevier, Holland, p. 3, Ch.1 (1985).
- [Meyers 66](#) N.N. Thadhani, M.A. Meyers, and D.C. Erlich, "Inhomogeneities of Shock Deformation", Journal of Applied Physics, 58, p. 2791-2794 (1985).
- [Meyers 65](#) M.A. Meyers, "Mechanical Testing", in Metals Handbook Desk Edition, ed. M.A. Meyers, American Society of Metals, Chapter 34, (1985).
- [Meyers 64](#) M.A. Meyers and T. Tantevee, "Stresses Induced in Iron-Ore Agglomerates by Hydrogen Direct Reduction", Met. Trans., 17B, p. 217-227 (1986).
- [Meyers 63](#) H.A. Grebe, H.-r. Pak, and M.A. Meyers, "Adiabatic Shear Localization in Titanium and Ti-6 pct Al-4 pct V Alloy", Met. Trans., 16A, p. 761 (1985).

- [Meyers 62](#) M.A. Meyers and H.-r. Pak, "Mechanical and Thermal Response of Shock-Consolidated Mar M 200 Rapidly Solidified Powder", J. of Matls. Sci., 20, p. 2133 (1985).
- [Meyers 61](#) D. Jaramillo V., S. Kuriyama, and M.A. Meyers, "A Continuous Indentation Test for Metals", Acta Met., 34, p. 313 (1984).
- [Meyers 60](#) C.T. Aimone, M.A. Meyers, and N. Mojtabai, "Shock-Wave-Induced Fragmentation of Copper Porphyries", in Rock Mechanics in Productivity and Protection, eds., C. H. Dowding and M. M. Singh, SME-AIME, p. 979 (1984).
- [Meyers 59](#) M.A. Meyers, S.L. Wang, and B.B. Gupta, "Mechanical and Thermal Response of Shock-Consolidated MAR-M200", in Shock Waves in Condensed Matter, eds., J. R. Asay, R. A. Graham, and G. K. Straub, Elsevier, p. 447 (1984).
- [Meyers 58](#) M.A. Meyers, D. Jaramillo V., and S. Kuriyama, "Um Ensaio de Penetracao Continua para Metais", Proc. 39th Annual Meeting of the Brazilian Society for Metals, Vol. 3, p. 121 (1984).
- [Meyers 57](#) M.A. Meyers, N.N. Thadhani, D.C. Erlich, and P.S. De Carli, "Martensitic Transformation Induced by Tensile Stress Waves", in Shock Waves in Condensed Matter, eds., J. R. Asay, R. A. Graham, and G. K. Straub, Elsevier, p. 411-414 (1984).
- [Meyers 56](#) M.A. Meyers, P.P. Meyers, and T. Tantevee, "Reducao Direta de Pelotas por Hidrogenio-I Alteracao de Resistencia a Compressao e Trincomento", Proc. 39th Annual Meeting of the Brazilian Society for Metals, Vol. 1, p. 227 (1984).
- [Meyers 55](#) M.A. Meyers, "Reply to Comments on a Model for the Effect of Grain Size on the Yield Stress of Metals", Phil. Mag., 48A, p. L59 (1983).
- [Meyers 54](#) K.-C. Hsu, K. Robino, and M.A. Meyers, "The Attenuation of Shock Waves in Nickel: Second Report", Mat. Sci. and Eng., 59, p. 235 (1983).
- [Meyers 53](#) M.A. Meyers and C.T. Aimone, "Dynamic Fracture (Spalling) of Metals", Prog. in Matls. Sci., 28, p. 1 (1983).

- [Meyers 52](#) M.A. Meyers and L.E. Murr, "Propagation of Stress and Shock Waves in Metals", in Explosive Welding, Forming, and Compaction, ed. T. Z. Blazynski, Elsevier, Chapter 2, p. 17 (1983).
- [Meyers 51](#) L.E. Murr and M.A. Meyers, "Metallurgical Effects of Shock Waves in Metals", in Explosive Welding Forming, and Compaction, ed. T. Z. Blazynski, Elsevier, Chapter 3, p. 83 (1983).
- [Meyers 50](#) M.A. Meyers and P.P. Meyers, "Ensaio Mecanico em Pelotas, Verificacao da Resistencia a Compressao", Metalurgia - ABM, 39, 199-201 (1983).
- [Meyers 49](#) A.G. Dhere, H.-J. Kestenbach, and M.A. Meyers, "Correlation Between Texture and Substructure of Conventionally and Shock-Wave Deformed Aluminum", Mat. Sci. and Eng., 54, 113-120 (1982).
- [Meyers 48](#) M.A. Meyers, L.E. Murr, C.Y. Hsu, and G.A. Stone, "The Effect of Polycrystallinity on the Shock Wave Response of Fe-34.5wt.%Ni and Fe-15wt.%Cr-15wt.%Ni", Mat. Sci. and Eng., 57, p. 113-126 (1983).
- [Meyers 47](#) M.A. Meyers and E. Ashworth, "A Model for the Effect of Grain Size on the Yield Stress of Metals", Phil. Mag., 46, p. 737-759 (1982).
- [Meyers 46](#) M.A. Meyers, S.H. Wang, and K. Couch, "Fratura Dinamica e Estihacamento: Um Estudo Metalurgico", Proc. 37th Annual Meeting of the Brazilian Society for Metals, Vol. 1, p. 23-40, July (1982)
- [Meyers 45](#) M.A. Meyers, B.B. Gupta, and L.E. Murr, "Shock-Wave Consolidation of Rapidly-Solidified Superalloy Powders", J. of Metals, 33, p. 21-26, Oct. (1981).
- [Meyers 44](#) M.A. Meyers, "The Effects of Shock-Loading Temperature and Pulse Duration on the Tensile Response of AISI 304 Stainless Steel", Mat. Sci. and Eng., 51, p. 261 (1981).
- [Meyers 43](#) M.A. Meyers and P.P. Meyers, "Compressive Strength of Iron-Ore Agglomerates", Trans. S.M.E.-AIME, 274, p. 1875-1884 (1981).
- [Meyers 42](#) M.A. Meyers and R.N. Orava, "Thermomechanical Processing by Shock Waves: An Overview", in Shock Waves and High Strain-Rate Phenomena in Metals: Concepts and Applications, eds., M. A. Meyers and L. E. Murr, Plenum Press, N. Y., p. 805-826 (1981).

- [Meyers](#)
[41](#) P.S. de Carli and M.A. Meyers, "Design of Uniaxial Strain Shock Recovery Experiments", in Shock Waves and High Strain-Rate Phenomena in Metals: Concepts and Applications, eds., M. A. Meyers and L. E. Murr, Plenum Press, N. Y., p. 341-373 (1981).
- [Meyers](#)
[40](#) C.Y. Hsu, K.C. Hsu, L.E. Murr, and M.A. Meyers, "The Attenuation of Shock Waves in Nickel", in Shock Waves and High Strain-Rate Phenomena in Metals: Concepts and Applications, eds. M. A. Meyers and L. E. Murr, Plenum Press, N. Y., p. 433-452 (1981).
- [Meyers](#)
[39](#) M.A. Meyers and L.E. Murr, "Defect Generation in Shock-Wave Deformation", in Shock Waves and High Strain-Rate Phenomena in Metals: Concepts and Applications, eds., M. A. Meyers and L. E. Murr, Plenum Press, N. Y., p. 487-530 (1981).
- [Meyers](#)
[38](#) M.A. Meyers and P.P. Meyers, "Ensaaios Mecanicos em Pelotas", Metalurgia - ABM, 37, p. 506 (1981).
- [Meyers](#)
[37](#) M.A. Meyers and K.C. Hsu, "O Crescimento da Martensita Lenticular", Metalurgia - ABM, 38, p. 333-338, Proc. 36th Annual Meeting of the Brazilian Society for Metals, Vol. 1, p. 215, July (1981).
- [Meyers](#)
[36](#) M.A. Meyers and E. Ashworth, "O Efeito do Tamanho de Grao sobre o Limite de Escoamento em Metais", Proc. 36th Annual Meeting of the Brazilian Society for Metals, Vol. 1, p. 17-32, July (1981).
- [Meyers](#)
[35](#) M.A. Meyers, "Comments on the Electroplastic Effect in Aluminum", Scripta Met., 14, p. 1033-1034 (1980).
- [Meyers](#)
[34](#) M.A. Meyers, C. Sarzeto, and C.Y. Hsu, "A Technique for Obtaining Shock-Wave Parameters Using Wave Superposition in Low-Carbon Steel", Met. Trans., 11A, p. 1737-1745 (1980).
- [Meyers](#)
[33](#) M.A. Meyers, "On the Growth of Lenticular Martensite", Acta Met., 28, p. 757-770 (1980).
- [Meyers](#)
[32](#) M.A. Meyers, H.-J. Kestenbach and C.A.O. Soares, "The Effects of Temperature and Pulse Duration on the Shock-Loading Response of Nickel", Mat. Sci. and Eng., 45, p. 143-152, (1980).

- [Meyers 31](#) M.A. Meyers, "An Estimate of the Nucleation Time in Martensitic Transformation", Met. Trans. A, 10A, p. 1723-1727 (1979).
- [Meyers 30](#) M.A. Meyers, "A Model for Dislocation Generation in Shock-Wave Deformation", in Strength of Metals and Alloys, ed. P. Haasen, V. Gerold and G. Kostorz, Pergamon Press, N. Y., p. 547-552 (1979).
- [Meyers 29](#) M.A. Meyers, J.R.C. Guimaraes, and R.R. Avillez, "On Stress Relaxation Experiments and their Significance under Strain-Aging Conditions", Met. Trans. A, 10A, p. 33-40 (1979).
- [Meyers 28](#) M.A. Meyers, "A Mechanism for Dislocation Generation in Shock-Wave Deformation of Metals", Scripta Met., 12, p. 21-26 (1978).
- [Meyers 27](#) M.A. Meyers and L.E. Murr, "A Model for the Formation of Annealing Twins in FCC Metals and Alloys", Acta Met., 26, p. 951-962 (1978).
- [Meyers 26](#) H.-J. Kestenbach and M.A. Meyers, "The Effect of Stress and Strain State on the Residual Substructure of Shock-Loaded Nickel", Proc. IV Coloquio Bras. de Microc. Electron., Sao Paulo, 2-7 July, p. 134-135 (1978).
- [Meyers 25](#) M.A. Meyers and J.R.C. Guimaraes, "Limitacoes em Ensaio de Relaxacao de Tensao" Metalurgia - ABM, 34, p. 707-709 (1978).
- [Meyers 24](#) R.N. Orava, M.A. Meyers, and G.A. Stone, "The Effect of Shock-Wave Parameters on the Strengthening of Nickel and Iron", Proc. 6th Internat. Conf. on High Energy Rate Fabrication, Essen, Germany, September, p. 5.2.1-19. (1977).
- [Meyers 23](#) J.R.C. Guimaraes, J.C. Gomes, and M.A. Meyers, "The Effects of Shock Loading and Grain Refining on the Kinetics of Deformation Induced Martensite in Fe-31% Ni-0.1% C", Trans. Jap. Inst. Met., 18, p. 803-806 (1977).
- [Meyers 22](#) M.A. Meyers, "A Model for Elastic Precursor Waves in the Shock Loading of Poly-crystalline Metals", Mat. Sci. and Eng., 30, p. 99-111 (1977).

- [Meyers 21](#) M.A. Meyers, "Work Softening in Shock-Loaded Nickel", Met. Trans. A., 8A, p.1581-1583 (1977).
- [Meyers 20](#) M.A. Meyers, "Discussion of Residual Strength of Shock-Loaded RMI 38644", Met. Trans. A, 8A, p. 1641-1644 (1977).
- [Meyers 19](#) K.K. Chawla, J.R.C. Guimaraes, and M.A. Meyers, "Fractography of a Meta-stable Austenite", Metallography, 10, p. 201-208 (1977).
- [Meyers 18](#) J.R.C. Guimaraes and M.A. Meyers, "Concerning Stress Relaxation Experiments in Commercial Purity Titanium", Scripta Met., 11, p. 193-195 (1977).
- [Meyers 17](#) M.A. Meyers, C.A.O. Soares, and M.S. Carvalho, "Ondas de Choque em Metais Policristalinos", Metalurgia - ABM, 34, p. 35-39 (1977).
- [Meyers 16](#) H.-J. Kestenbach and M.A. Meyers, "The Effect of Grain Size on the Shock-Loading Response of 304-Type Stainless Steel", Met. Trans. A, 7A, p. 1943-1950 (1976).
- [Meyers 15](#) M.A. Meyers, "The Effect of Grain Size on the Shock-Hardening Response of Type 304 Stainless Steel", Proc. ICM II, Boston, Mass., August 16-20, p. 1804-1805 (1976).
- [Meyers 14](#) J.R.C. Guimaraes, J.C. Gomes, and M.A. Meyers, "The Effects of Shock Loading and Grain Refining on the Tensile Response of a Metastable Fe-31% Ni-0.1% C Alloy", Proc. First J. I. M. International Symposium, Kobe, Japan, May (1976), Suppl. Trans. J. I. M., 17, p. 411-417 (1976).
- [Meyers 13](#) M.A. Meyers and J.R.C. Guimaraes, "Shock-Induced Martensite Formation in a Fe-31% Ni-0.1% C Alloy", Mat. Sci. and Eng., 24, p. 289-292 (1976).
- [Meyers 12](#) M.A. Meyers, "Inhomogeneities of Transformation in Shock-Loaded Type 304 Stainless Steel", Scripta Met., 10, p. 255-256 (1976).
- [Meyers 11](#) M.A. Meyers and M.S. Carvalho, "Shock Front Irregularities in Polycrystalline Metals", Mat. Sci. and Eng., 24, 131-135 (1976).

- [Meyers 10](#) M.A. Meyers, "Comments on Flow Stress - Grain Size Relationship in Aluminum", Scripta Met., 10, p. 159-160 (1976).
- [Meyers 9](#) M.A. Meyers and R.N. Orava, "Thermomechanical Processing of Inconel 718 by Shock-Wave Deformation", Met. Trans., 7A, p. 179-190 (1976).
- [Meyers 8](#) M.A. Meyers, C.O. Ruud, and C.S. Barrett, "Ordenamento da Fase Beta no Sistema Cu-Mn-Sn", Metalurgia - ABM, 32, p. 177-180 (1976).
- [Meyers 7](#) M.A. Meyers and R.N. Orava, "Processamento Termomecânico de uma Superliga por Ondas de Choque", Metalurgia - ABM, 32, p. 249-254 (1976).
- [Meyers 6](#) M.A. Meyers, "A "Wavy Wave" Model for the Shocking of Polycrystalline Metals", Proc. of the 5th International Conference on High Energy Rate Fabrication, Denver Research Institute, Denver, June, p. 1.4.1-21, (1975).
- [Meyers 5](#) M.A. Meyers, "The Effect of Surface Condition on Shock Hardening", Scripta Met., 9, p. 667-669 (1975).
- [Meyers 4](#) M.A. Meyers and M.T. Hepworth, "Determinação Calorimétrica das Entalpias de Formação das Ligas Cu-Mn-Sn", Rev. Circ. Mil.Eng., No. 74, S133-135 (1975).
- [Meyers 3](#) M.A. Meyers and R.N. Orava, "A Geometrical Method for the Determination and Indexing of Electron Diffraction Patterns", Metallography, 7, 231-240 (1974).
- [Meyers 2](#) M.A. Meyers, C.O. Ruud, and C.S. Barrett, "Observations on the Ferromagnetic Beta Phase of the Cu-Mn-Sn System", J. Appl. Cryst., 6, 39-41 (1973).
- [Meyers 1](#) M.A. Meyers and M.T. Hepworth, "The Enthalpies of Formation of Ferromagnetic Cu-Mn-Sn Alloys", Met. Trans., 3, p. 2544-2544 (1972).