

## **Explosion Mechanics**

### **Explosion Mechanics**

*The term “explosion mechanics” is used here to encompass the science of events emanating from the transfer of energy from conventional explosives to the immediate surroundings. This field normally excludes the chemical nature of the event and the focus is on mechanical effects of a ballistic nature, such as acceleration, velocity, deformation, morphology, fragmentation, pressure, impulse and impact of blast waves.*

*Although concerned primarily with mechanical effects, explosion mechanics also implicitly includes aspects of a wider field of science, such as thermodynamics (equations of state), computational mechanics, materials science and novel experimental methods to observe ultra-high speed events.*

*The International Ballistics Society is interested in many areas and applications of explosion mechanics. Examples of typical topics of interest to ballisticians in the field of explosion mechanics are shaped charge theory and experiments, fragmentation effects, explosive blast and mitigation, and detonative transfer methods.*