

**Meeting:** 1002, Pittsburgh, Pennsylvania, SS 4A, Special Session on Partial Differential Equations and Applications

1002-35-35            **Nicolae Tarfulea\*** ([nicolae@math.umn.edu](mailto:nicolae@math.umn.edu)), School of Mathematics, University of Minnesota, 127 Vincent Hall, 206 Church St. S.E., Minneapolis, MN 55455. *Constraint-Preserving Boundary Conditions for Some Hyperbolic Systems of Differential Equations.*

We indicate a technique of finding well-posed constraint-preserving boundary conditions for some constrained hyperbolic systems. By using this technique, we provide boundary conditions consistent with the constraints for some constrained hyperbolic systems, including a recent first order symmetric hyperbolic formulation of Einstein's equations. This is a joint work with Douglas N. Arnold (IMA - University of Minnesota). (Received July 18, 2004)