The Navier-Stokes equations describe the viscous compressible flow. They can be solved using triangular or quadrilateral meshes. For a flow past an airfoil, physical effects proceeding in the boundary layer and the wake can be captured with the quadrilateral meshes while out of this area it is more effective to use the triangular meshes. In this work we investigate the use of hybrid meshes - combination of triangles and quadrilaterals.