$$\frac{\partial \rho}{\partial t} = -\nabla(\rho \underline{v})$$

$$\frac{\partial}{\partial t}(\rho \underline{v}) = -\nabla.(\rho \underline{v}\underline{v}) - \nabla P + \underline{j} \wedge \underline{B} - \rho \underline{g}$$

$$\frac{\partial \underline{B}}{\partial t} = \nabla \wedge (\underline{v} \wedge \underline{B}) - \nabla \wedge (\eta j)$$

$$\frac{\partial}{\partial t}(\rho \varepsilon) = -\nabla.(\rho \varepsilon \underline{v}) - P \nabla . \underline{v} + \eta j^2$$