

THE NEW AVERAGED SYSTEM OF EQUATIONS FOR TURBULENT FLOWS

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In this paper, through integration of Navier Stokes equations, turbulent stress tensor image is proposed, which shows its connection to speed and continuous environmental parameters (pressure, temperature, entropy).

General equations for turbulent viscosity of non compressible and compressible liquids are offered. Equations show the speed rotor impact on the effective viscosity of a chaotic environment. This attitude shows that in toroidal movements of the flow the effective viscosity becomes negative, which means that, when a chaotic environment of orderly movements, particularly on inner surfaces of a thorium, a phenomenon, opposite to dissipation, takes place. Such a chaotic environment has the ability to carry out the mechanical energy as along the movement axis, as well as thorium center. In our daily reality this situation can be observed in tornados. It is reasonable to say that, the systematic toroidal movements around vertical downward flow is one of the main reasons of tornados amazing vitality and destructive force.

If we consider the fact that the mathematical study of the surrounding world may be based on equations of continuous environment, the proposed thesis approves, that toroidal motion of a chaotic world is systematic self-renewable process, which can exist permanently. This is confirmation of the fact that the nature can control constant movement and the world is not always and everywhere directed to balance and heat death.

References

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