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## EFFECT OF NON-UNIFORM HEAT SOURCE FOR THE UCM FLUID OVER A STRETCHING SHEET WITH MAGNETIC FIELD

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### Abstract

*This article is concerned effect of Non-uniform heat source for the UCM fluid over a stretching sheet with the combined effect of external magnetic field and non-uniform heat source/sink. By means of similarity transformations, the non-linear equations governing the flow are reduced to an ordinary differential equation using similarity transformations. These equations are solved numerically by using standard fourth order Runge–Kutta method with the given set of parameters. The results are compared with the earlier published results and our results are better in agreements under some limiting cases. The effect of several parameters controlling the velocity and temperature profiles are shown graphically and discussed briefly.*

### Author Keywords

Boundary layer, Elastic Parameter, Eckert number, Maxwell fluid, Magnetic parameter, Non-uniform heat source

### Index Keywords

Non-uniform, UCM fluid, Runge–Kutta method, Graphically and discussed

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