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Abstract :

High pressure turbine blade profile sections of GTX-35 VS engine were analysed by 2D-Euler code and a boundary layer code employing a (K-ϵ) turbulence model. Computation was carried out to study velocity distribution on the profile surfaces and separation phenomenon for prescribed inlet free stream turbulence. The report presents the results of computation carried out on stator hub, mean and tip sections and rotor, hub and mean sections in detail.