

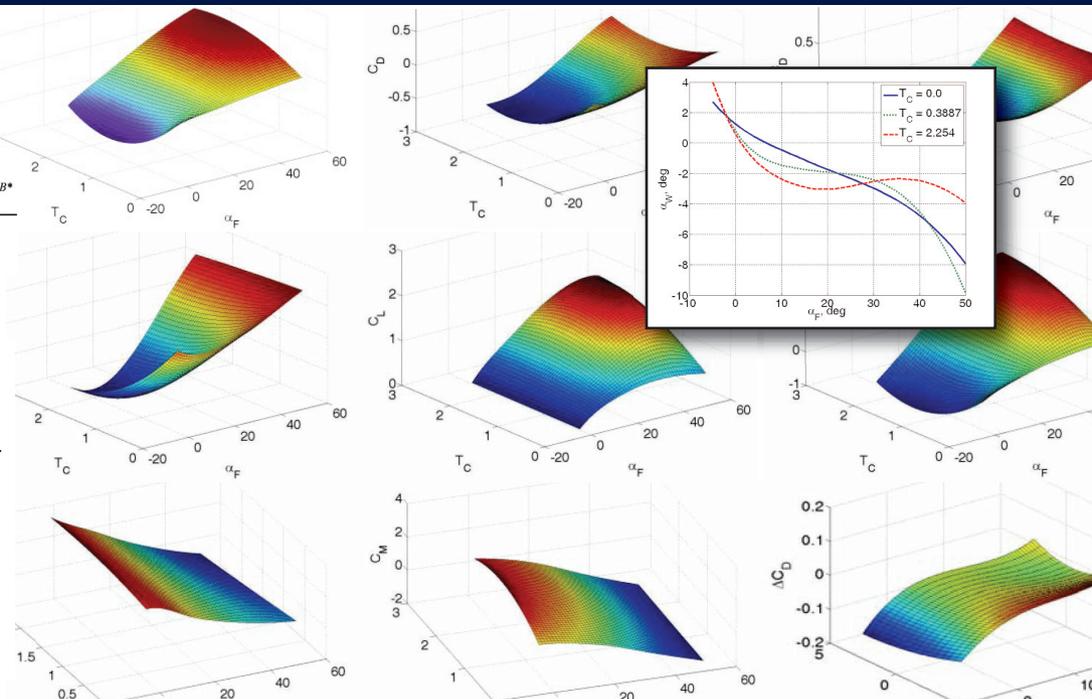
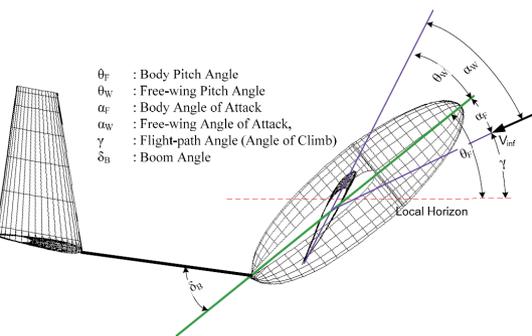
THE AERONAUTICAL JOURNAL

Covering all aspects of Aerospace

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$$\begin{aligned} \vec{f}_1 &= T - mg \sin \theta + q_\infty S_{ref} (-C_D \cos \alpha_F + C_L \sin \alpha_F) \\ \vec{f}_2 &= mg \cos \theta + q_\infty S_{ref} (-C_D \sin \alpha_F - C_L \cos \alpha_F) \\ \vec{f}_3 &= q_\infty S_{ref} \bar{c} \left[C_M^p - (C_D \sin \alpha_F + C_L \cos \alpha_F) \right] \left(\frac{x^p - x^{B^*}}{\bar{c}} \right) \end{aligned}$$



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