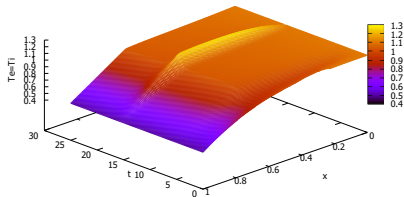


# L→H Transition Threshold Physics at Low Collisionality

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Spontaneous LH transition with suppressed shear flow

- ▶ A new analytical and numerical 4-field model for describing  $L \rightarrow H$  transitions in weakly collisional ITER-related regimes is developed

- ▶ transitions in collisionless, electron heated regimes where the electron-ion coupling is allowed to be completely *anomalous*, due to the fluctuation of  $\langle \mathbf{E} \cdot \mathbf{J} \rangle$  work on electrons and ions, are studied
- ▶ New transition scenarios, characterized by the sensitivity of transition evolution to pre-existing L-mode profiles are considered (see Figure).