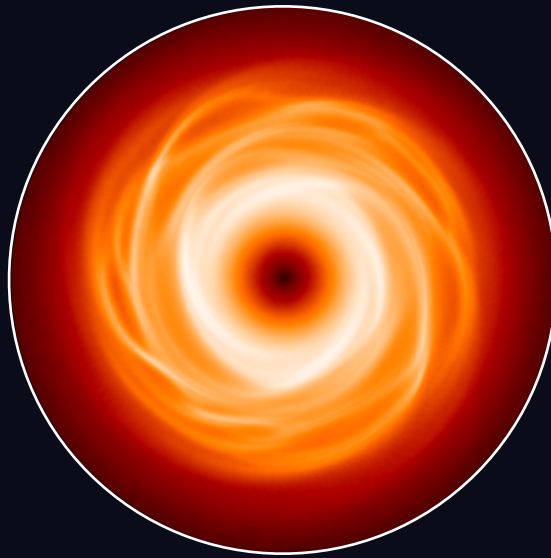


# SUPPRESSING GRAVITATIONAL INSTABILITIES IN SELF-GRAVITATING PROTOPLANETARY DISCS

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Scan or click here for  
more details with  
animations!



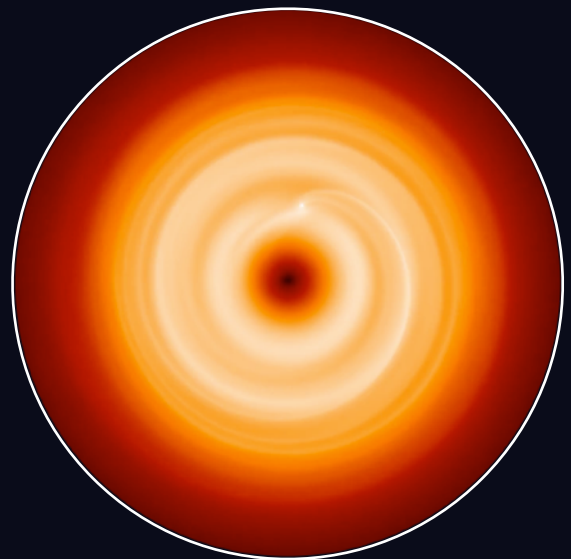
Going from a gravitationally  
unstable disc to a gravitationally  
stable disc by



Warping the Disc



Introducing a  $3M_{\text{Jup}}$  Planet



Spiral structures due to gravitational instabilities are suppressed  
yielding an axisymmetric disc