

Erratum: Spiral vortices and Taylor vortices in the annulus between rotating cylinders and the effect of an axial flow [Phys. Rev. E 69, 056309 (2004)]

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(Received 21 August 2006; published 2 October 2006)

DOI: [10.1103/PhysRevE.74.049901](https://doi.org/10.1103/PhysRevE.74.049901) PACS number(s): 47.20.-k, 47.32.-y, 47.54.-r, 47.10.-g, 99.10.Cd

In the original Fig. 15 the solid lines for the bifurcation thresholds of vortex solutions out of the combined CCF-APF basic state are incorrect (as a result of a scaling error). They have been corrected in the figure below. The dashed lines for the stability boundaries of the vortex states have been rechecked also.

Thus in the case of TVF, the bifurcation threshold and the stability boundary fall together for $|\text{Re}| < 21.2$ so that TVF bifurcates as a *stable* solution. At larger $|\text{Re}|$ when at least another stable solution, i.e., one of the two spiral types, is available, TVF bifurcates unstably at onset and becomes stable upon increasing R_1 at fixed Re .

The other results presented in the paper are unaffected by these changes.

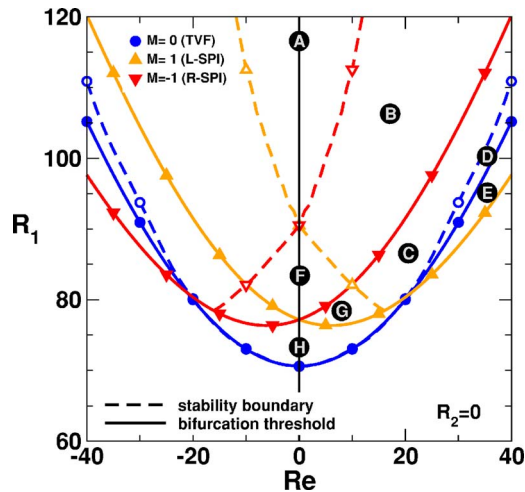


FIG. 15. (Color online) R_1 - Re phase diagram of TVF, R-SPI, and L-SPI for a stationary outer cylinder. Solid lines represent linear stability thresholds of the basic state, i.e., bifurcation thresholds of the respective vortex solutions out of the combined CCF-APF solution. Dashed lines are stability boundaries of the vortex states. The phase diagram is symmetric under $\text{Re} \rightarrow -\text{Re}$. Parameters are $R_2=0$, $\eta=0.5$, $k=3.927$.

Region	A	B	C	D	E	F	G	H
TVF	s	s	s	u	-	s	s	s
R-SPI	s	u	-	-	-	u	-	-
L-SPI	s	s	s	s	s	u	u	-

s: stable; u: unstable; -: nonexistent.