



Corrigendum

Corrigendum to “Isostables, isochrons, and Koopman spectrum for the action-angle representation of stable fixed point dynamics” [Physica D 261 (2013) 19–30]



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In the original manuscript, Definition 1 (isostables of linear systems) does not consider the case of complex eigenvectors v_j , with $j \geq 2$. It should be replaced by the following definition.

Definition 1 (*Isostables of Linear Systems*). For the system (1), the isostable \mathcal{I}_τ associated with the time τ is the $(n - 1)$ -dimensional manifold

$$\mathcal{I}_\tau = \left\{ \mathbf{x} \in \mathcal{B}(\mathbf{x}^*) \mid \mathbf{x} = \Re \{ \mathbf{v}_1 e^{i\theta} \} e^{\sigma_1 \tau} + \sum_{\substack{j \in \mathcal{J} \\ j \geq 2}} (\alpha_j \Re \{ \mathbf{v}_j \} + \beta_j \Im \{ \mathbf{v}_j \}) , \forall \alpha_j, \beta_j \in \mathbb{R}, \forall \theta \in \Theta \right\},$$

with $\Theta = \{0, \pi\}$ if $\lambda_1 \in \mathbb{R}$ and $\Theta = [0, 2\pi]$ if $\lambda_1 \notin \mathbb{R}$, and with $\mathcal{J} = \{i \in \{1, \dots, n\} \mid \lambda_i \in \mathbb{R} \text{ or } \lambda_i = \lambda_{i+1}^\epsilon \notin \mathbb{R}\}$.

Note that (5) and (8) should also be modified accordingly.

This erratum does not affect the results presented in the paper, and in particular the more general Definition 2 (isostables of nonlinear systems) is correct.

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