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Correction to: TOPOLOGICAL STABILITY OF SOLENOIDAL AUTOMORPHISMS

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The paper with the above title (Vol. 90, 1983, 119–135) contains omissions. They are in the proof (p. 134) of uniform continuity and uniform convergence of maps h_n stated in p. 133, $\ell \uparrow 3$.

The gaps are repaired as follows: Since $(\boldsymbol{R}^r, \gamma)$ is expansive and ψ^* is 1–1 continuous, for every $\lambda > 0$ $(\lambda < \varepsilon)$ there is $N \geqslant 0$ such that $x - y \in \psi^* B(\lambda)$ if $\sigma^j(x - y) \in \psi^* B(3\varepsilon)$ for $|j| \leqslant N$. Take $\alpha > 0$ such that if $d(x, y) < \alpha$ for $x, y \in \psi(\boldsymbol{R}^r)$ then $\max\{d(f_n^j(x), f_n^j(y)) \colon |j| \leqslant N\} < \lambda$. Remark that $\psi^* B(\varepsilon) \oplus F(\varepsilon)$ is a closed neighborhood of 0 in X; i.e. $\psi^* B(\varepsilon) \oplus F(\varepsilon) = \{x \in X \colon d(x, 0) \leqslant \varepsilon\}$. By (5), $\sigma^j\{h_n(x) - h_n(y)\} + \{f_n^j(x) - f_n^j(y)\} \in \psi^* B(2\varepsilon)$ for $|j| \leqslant N$ and hence $\sigma^j\{h_n(x) - h_n(y)\} \in \psi^* B(3\varepsilon) \oplus F(\lambda)$. Since $\bigcap_{-N}^{N} \sigma^{-j} \psi^* B(3\varepsilon) \subset \psi^* B(\lambda)$ and $\bigcap_{-N}^{N} \{\sigma^{-j} \psi^* B(3\varepsilon) \oplus F(\lambda)\} \subset \psi^* B(\lambda) \oplus F(\lambda)$, we have $d(h_n(x), h_n(y)) \leqslant \lambda$, i.e. h_n is uniformly continuous. Therefore h_n is extended to a continuous map of X into itself which is denoted by the same symbol.

Let λ nad N be as above. Since $\lim_{n,m} d(f_n^j, f_m^j) = 0$ for fixed j, there is $N(j) > 0$ such that $f_n^j(x) - f_m^j(x) \in \psi^* B(\lambda) \oplus F(\lambda)$ for $n, m \geqslant N(j)$. Thus by using (5), $h_n(x) - h_m(x) \in \sigma^{-j}\{\psi^* B(3\varepsilon) \oplus F(\lambda)\}$ for $n, m \geqslant N(j)$. Therefore for $n, m \geqslant \max\{N(j) \colon |j| \leqslant N\}$ and $x \in X$, $h_n(x) - h_m(x) \in \psi^* B(\lambda) \oplus F(\lambda)$; i.e. $\{h_n\}$ converges uniformly to some continuous map.

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