| Title | Errata : On regular neighbourhoods of 2- <br> manifolds in 4-Euclidean space. I |
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## ERRATA, VOL. 8

T. Tamura: Indecomposable completely simple semigroups except groups. p. 38, line 15. (Lemma 7). For " $\bar{D}$ " read " $D$ ", for " $D_{E}$ " read " $\bar{D}_{E}$ ". p. 38, line 25. (Lemma 8). For " $\left(\lambda_{1}, \mu_{1}\right)$ ", read " $(\lambda, \mu)$ ".
p. 40, line 24. For "is not" read "goes".
T. Tamura: The theory of construction of finite semigroups. I.
p. 247, line 25. For " $=\bigvee_{\infty} \bar{\varphi}_{\infty} " \operatorname{read} "=\bigvee_{\alpha} \varphi_{\alpha} "$.
p. 254, line 30. For " $u$ " read " $z$ ".
p. 254, line 31. For " $z$ " read " $u$ ".
p. 257, line 12. For " 6 " read " 9 ".
p. 260, line 21. (§11). For "idempotent" read "unipotent".

## Remark

On page 253, we defined a monomial $f\left(x_{1}, \cdots, x_{n}\right)$ of $x_{1}, \cdots, x_{n}$, in which we wrote "we must contain a variable at least", but this is to be excluded. (See Example 12, p. 254) However, we must add, "When monomials are used in an equality $f\left(x_{1}, \cdots, x_{n}\right)=g\left(x_{1}, \cdots, x_{n}\right)$, one at least of both sides must contain a variable at least".

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Theorem 1 (p. 229) is false. But it holds if we restrict the concept of regular neighbourhood as follows:

By a regular neighbourhood of $K$ in $M^{n}$ which has no boundary we shall mean a subcomplex $U\left(K, M^{n}\right.$ ) of $M^{n}$, such that $\left|U\left(K, M^{n}\right)\right|$ is an $n$-manifold having $|K|$ in its interior and $\left|U\left(K, M^{n}\right)\right|$ contracts geometrically into $|K|$.

For "oriented" read "orientable oriented", lines 23, 29 page 230; lines 3,12 page 231 ; line 17 page 237 ; line 34 page 238 ; lines 11,36 page 240 ; lines 27,28 page 241 ; lines $3,11,17$ page 242 .

I withdraw the eight-th line of page 231.
The proof of Lemma $n$ in 4.2 (pp. 234-235) is not correct. Hence all the proofs in sections 4,5 and 6 are erroneous.

Lemma 5.8 (pp. 239-240) is false. In fact, therein each point $o_{i}$ is a double point, using the notation of the Lemma, $D \cap o_{i}=o_{i}$ for each $i$. Hence $D \cup\left(\bigvee_{i=1}^{k} D_{i}\right) \cup D_{0}$ is not a 2 -sphere. Furthermore the assertion of this Lemma contradicts the unpublished result obtained by R. H. Fox and J. W. Milnor. Ths invalidates Theorem 4 (p. 240).

I thank Professor V. K. A. M. Gugenheim who pointed out errors and Professors R. H. Fox and J. W. Milnor who communicated their unpublished results to me.

## ERRATA, VOL. 9.

T. Tamura: The theory of construction of finite semigroups II
p. 7, line 26. For " 0 in $U^{*}$ " read " $0 *$ in $U$ ".
p. 8, line 21. For " $g(\alpha)$ " read " $\eta(\alpha)$ ".
p. 14, line 28. (Theorem 10). For "a finite" read "an".
p. 15, line 26. For "semilattice" read "semigroup".
p. 17, line 22. For "lattice" read "semilattice".
p. 21, line 2. For "defined" read "denoted".
p. 21, line 33. For " $H$ " read " $S$ ".
p. 27, line 7. Insert " $n \geqq 2$ " between " $n-1$ " and "are".
p. 28, line 12. For " $\varphi_{\infty}(y)=y$ " read " $\rho_{\infty}(y)=y \neq 0$ ".
p. 31, line 17. For " 23 " read " 24 ".
p. 31, line 32. Insert "for certain minimal element" next to "holds".
p. 34, line 8. For " $\tau$ " " read " $\tau$ ".
p. 34, line 22. Delete "if exists".
p. 34, line 23. Insert "if exists" between " $S^{\prime}$ " and "causes".
p. 37, line 12. For " $S_{\sigma_{p(i)}}^{\prime}$ " read " $S_{\sigma_{1}}^{\prime}$ ".
p. 41, line 6 (the case of ${\underset{\sim}{e}}_{e}=a b b b$ and $\rho_{e}=b b b b$ of the table). For "none" read "isomorphic to 1048 ".

