

Corrigendum to “Categorical abstract algebraic logic: The criterion for deductive equivalence”

George Voutsadakis*

School of Mathematics and Computer Science, Lake Superior State University,
Sault Sainte Marie, MI 49783, USA

Received 19 June 2005

Published online 1 October 2005

We give a correction to the paper [2] mentioned in the title.

© 2005 WILEY-VCH Verlag GmbH & Co. KGaA, Weinheim

I was recently made aware that a good colleague of mine from the Universitat de Barcelona, José Gil-Férez, has provided in [1] a counterexample to my Theorem 13 (the Criterion for Deductive Equivalence) of [2]. Moreover, despite the fact that I have not yet seen José’s counterexample, I have now discovered a simple, but grave, mistake in the proof of the key Lemma 9 of [2]. Namely, commutativity with substitutions is erroneously used, at the top of page 351, to justify an equality that is not true in general. I am, therefore, withdrawing any claim for the validity of Lemma 9 and all its consequences, including the main Theorem 13.

As the sole person responsible, I deeply regret and apologize for these errors. I am indebted to José for triggering their discovery and for not having allowed them to linger on.

References

- [1] J. Gil-Férez, Categorical abstract algebraic logic: the isomorphism theorem. In: Algebraic and Topological Methods in Non-Classical Logics II, Universitat de Barcelona, June 15 – 18, 2005, pp. 31 – 32. This paper is available under <http://www.mat.ub.es/~logica/meeting2005/Booklet.pdf>.
- [2] G. Voutsadakis, Categorical abstract algebraic logic: the criterion for deductive equivalence. Math. Logic Quart. **49**, 347 – 352 (2003).

* e-mail: gvoutsad@lssu.edu