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Notre Dame Journal of Formal Logic
Volume XVII, Number 1, January 1976
NDJFAM

AN ADDENDUM TO MY PAPER "A CATEGORICAL EQUIVALENCE OF PROOFS"

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The definition of *canonical proofs* on page 183 of [1] should be amended as follows:

(0) If the active term of an application of (R_7) in P was an active term of an application of an application of (R_2) in a path terminating with that application of (R_7), then the relevant application of (R_2) is replaced by an application of the following new rule of inference:

$$(R_2{}') \ \frac{\Gamma,\ B,\ B,\ \Delta,\ [\Theta] \rightarrow A}{\Gamma,\ B,\ \Delta,\ [\Theta],\ [B] \rightarrow A},$$

where $[\Theta]$ denotes a sequence of bracketed terms. Moreover, all rules of inference are modified to allow bracketed terms on the extreme right of their antecedents. (R_5) and (R_6), in particular, are modified as follows:

$$(R_5{}') \ \frac{\Gamma,\ [\Phi] \rightarrow A \quad \Delta,\ [\Psi] \rightarrow B}{\Gamma,\ \Delta,\ [\Phi],\ [\Psi] \rightarrow A \wedge B} \qquad (R_6{}') \ \frac{\Gamma,\ [\Phi] \rightarrow A \quad \Delta,\ B,\ \Theta,\ [\Psi] \rightarrow C}{\Delta,\ \Gamma,\ A \supset B,\ \Theta,\ [\Phi],\ [\Psi] \rightarrow C}.$$

These replacements are to be carried out from the top left to the bottom right hand corners of P, so that the resulting sequence $[\Theta]$ of bracketed terms in the conclusion of the new proof Q_0 which results from P in this way is uniquely determined.

The meaning of the proof Q_0 is considered to be the same as that of P. In particular, Q_0 proves the same *formula* as P, and is included as a new member in the equivalence class of P.

REMARK: The presence of bracketed terms is required for the definition of the *generality* of canonical proofs.

REFERENCE

[1] Szabo, M. E., "A categorical equivalence of proofs," *Notre Dame Journal of Formal Logic*, vol. XV (1974), pp. 177-191.

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Received May 13, 1974