

**DEFINABILITY OF 1-TYPES IN WEAKLY
 \mathcal{o} -MINIMAL THEORIES***B. S. Baizhanov*

In the article, we prove a criterion for definability of 1-types over sets in weakly \mathcal{o} -minimal theories in terms of left and right convergences of a formula to a type.

Van den Dries proved that every type over the field of reals is definable. Marker and Steinhorn strengthened his result. They (and, later, Pillay) proved the following assertion. Let $M \prec N$ be a pair of models of some \mathcal{o} -minimal theory. If, for each element of N , the type of this element over M is definable then, for each tuple of elements of N , the type of this tuple over M is definable.

We construct a weakly \mathcal{o} -minimal theory for which the Marker–Steinhorn theorem fails; i. e., some pair of models of the theory possesses the following property: For all elements of the larger model, the 1-type over the smaller model is definable but there exists a tuple of elements of the larger model whose 2-type over the smaller model is not definable.

Key words and phrases: definable type, weakly \mathcal{o} -minimal theory, non-orthogonality of types.

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