1023-03-89   **L Luo*** (`lbluo5@yahoo.com.cn`), Collage of Mathematical Science, Beijing Normal University, People's Republic of China, Beijing, 100875. *On Non-Standard Set Theory Models and the Relativity of Real Numbers.*

In a reception with students in the 1980s Hao Wang asked what was the continuum. Set theory is written in a countable language which according to LST Theorem in model theory it has a countable model S. The set of all real numbers R in S should have only countably many elements in the model, but by the Cantor's diagonalization procedure we know that there are uncountably many elements in R. Are there truly uncountably many real numbers?

Using model theoretic methods we discover that most of the real numbers can not be identified, we can never know their digits, and it would not produce any defective theorems if they do not exist in a set theory model. We also propose a new idea to suggest that the number of all real numbers have the relativity. It is to say that it looks different from different angles. (Received July 30, 2006)