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Evaluating Semantic Similarity between Chinese Biomedical Terms through Multiple Ontologies with Score Normalization: An Initial Study

Wenxin Ning, Ming Yu, Dehua Kong

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5                   Wenxin Ning<sup>a</sup>, Ming Yu<sup>a\*</sup>, Dehua Kong<sup>a</sup>

6  
7       <sup>a</sup>Health Care Services Research Center, Department of Industrial Engineering, Tsinghua  
8       University, Haidian District, Beijing 100084, PR China.

9  
10       E-mail addresses:

11       [nwx14@mails.tsinghua.edu.cn](mailto:nwx14@mails.tsinghua.edu.cn) (W. Ning)

12       [mingyu@tsinghua.edu.cn](mailto:mingyu@tsinghua.edu.cn) (M. Yu)   \*corresponding author

13       [kdh15@mails.tsinghua.edu.cn](mailto:kdh15@mails.tsinghua.edu.cn) (D. Kong)

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18  
19       **Abstract**

20       **Background:** Semantic similarity estimation significantly promotes the understanding of  
21       natural language resources and supports medical decision making. Previous studies have  
22       investigated semantic similarity and relatedness estimation between biomedical terms through  
23       resources in English, such as SNOMED-CT or UMLS. However, very limited studies focused  
24       on the Chinese language, and technology on natural language processing and text mining of  
25       medical documents in China is urgently needed. Due to the lack of a complete and publicly  
26       available biomedical ontology in China, we only have access to several modest-sized  
27       ontologies with no overlaps. Although all these ontologies do not constitute a complete

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