

# Review of: "Determining Affinity of Social Network using Graph Semirings"

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**Potential competing interests:** No potential competing interests to declare.

## General Comments:

The paper attempts to dissect Facebook's friendship network using graph theory. While the subject is intriguing and the approach novel, there are areas that warrant attention.

The title and abstract, though clear, could benefit from added specificity to better encapsulate the core findings. In the introduction, a more lucid statement of objectives and the study's contemporary relevance would guide the reader effectively.

The paper often introduces concepts, such as the Beta index, without adequate justification or context. It's essential to clarify why these metrics were preferred over others. Additionally, the Facebook user categorization appears to rely heavily on a singular study. A more comprehensive review could provide a robust foundation.

The algorithm's presentation is commendable but feels verbose. A succinct layout would enhance its clarity. Moreover, the connection between the algorithm and its practical implications, like the "People You May Know" feature, seems speculative without empirical validation.

While "Remark 1" introduces a fresh perspective, it appears slightly disconnected from the paper's primary narrative. The study would benefit significantly from a discussion on its limitations and potential biases. Furthermore, a thorough proofreading is necessary to rectify grammatical and typographical errors.

In conclusion, while the paper offers a unique lens into Facebook's friendship network, it requires depth, empirical backing, and organization. I believe with these refinements, the manuscript can achieve its full potential and cater to academic standards.