

# Review of: "Measuring researchers' success more fairly: going beyond the H-index"

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

H-index has been widely used to quantify the influence of scientists in their respective fields since it was proposed by American physicist Jorge Hirsch in 2005. This manuscript considers the position of an author in the authors' list (when they are not listed alphabetically) and the number of authors in a paper to quantify their respective contributions, which makes it appear more reasonable than H-index.

Since 2005, more than 50 methods have been proposed to replace h-index, but none of them can truly replace it. If you are trying to demonstrate the superiority of your proposed method, you should compare it with existing new indicators to be more convincing. Obviously, this manuscript only provided a brief introduction and did not demonstrate the superiority of this method through actual validation.

Many people believe that the H-index is unfair to scientists in the early stages of their careers, as they may not have had enough time to publish papers and establish citations. In the method you propose, this drawback cannot be overcome either, and your method is more complex than the H-index.

Regarding the method you proposed, you should provide more explanation for the rationality of each step and the meaning of the transformations between these equations, rather than just performing calculations blindly. This will help readers understand the method and its rationale better.

There are some small errors in the manuscript. In Box 1, the last term of the first equation,  $[y_{n-(n-1)x}]$  should be modified to  $[y_{-(n-1)x}]$ . What's more  $n/2(n-1)x$  needs to be changed to  $[n(n-1)x]/2$ .

In conclusion, I don't think the metrics you proposed can replace the H-index, although the H-index has some shortcomings, it is still widely used. While your method considers some other factors, its rationality and superiority still need to be proven, so it's difficult for the public to accept this metric all at once.