

Yield and quality of cucumber as influenced by 3G cutting

Name: Basant Raj Bhattarai and Ritambar Ghimire
 Affiliation: Faculty of Agriculture, Far Western University
 Contact number: +977- 9863124576 | Email address: bhattaraibasantraj2@gmail.com

Introduction

Cucumber, an important vegetable crop, is mainly consumed as salad and pickles in Nepal. The productivity of this crop is less than half the world's average productivity, which is associated with imbalance in male to female ratio. Hence, there is a need to increase female flowers for improving its productivity.

Research questions

- Is it possible to alter the male to female ratio by 3G cuttings?
- How do 3G cuttings affect productivity?
- What kind of problems arise during 3G cuttings?

Methodology

The field experiment aimed to evaluate the effect of 3G cutting on sex expression, yield and quality of cucumber cv. Malini. The research was performed using randomized complete block design (RCBD) with six replications and three treatments. The site had sandy clay loam soil with pH 7.32.

Key findings

The ratio of male to female flowers was significantly lower on the tertiary branch by 3G cutting with 78.50% and 26.10% over primary and secondary branch, respectively. Similarly, the fruit yield was significantly higher by 3G cuttings with 7.24% and 18.15% increase in yield over 2G and no cutting respectively

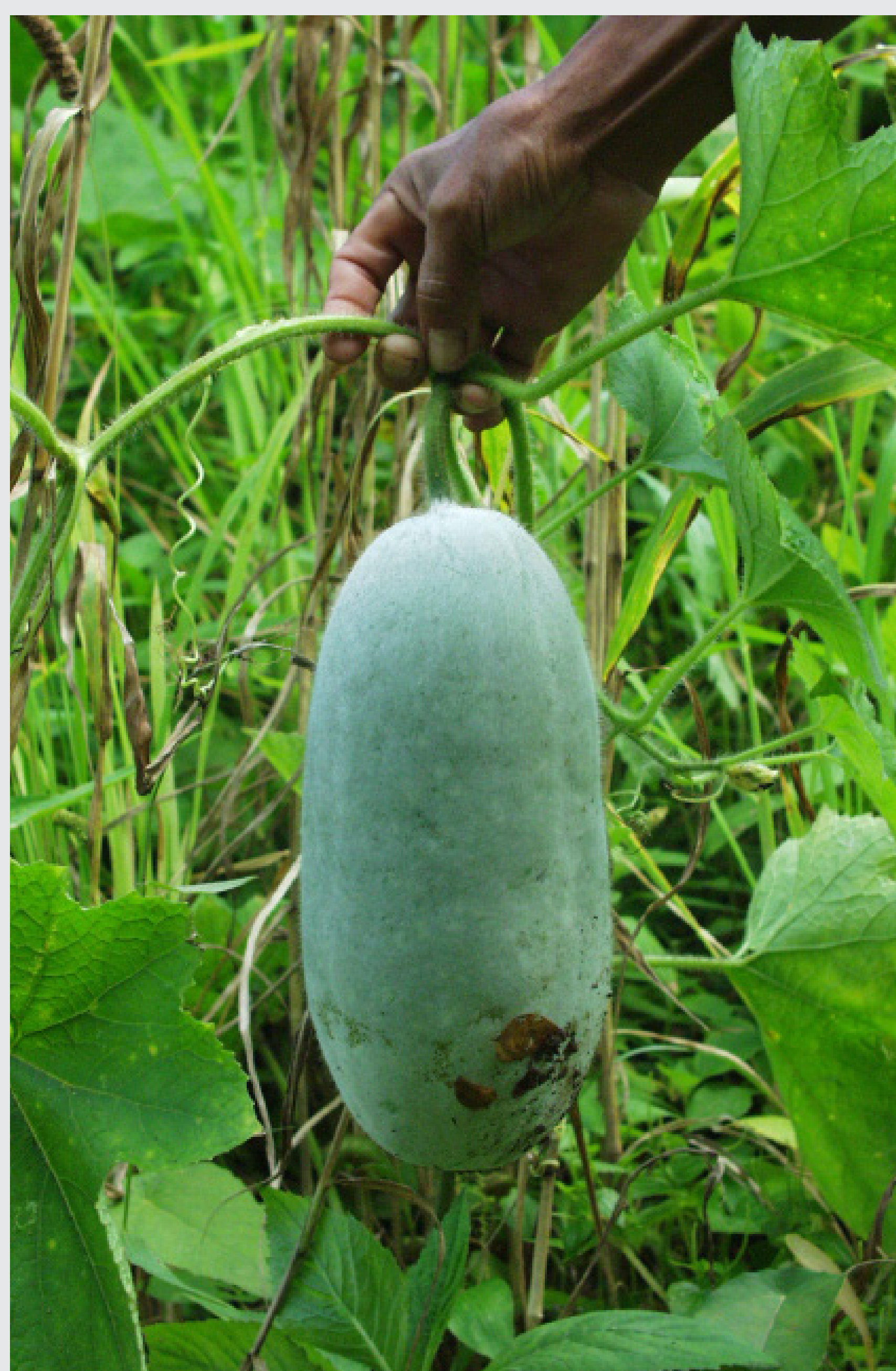


Figure 1 Male to female ratio of 3G cutting of cucumber in Godawari municipality, Kailali, 2024.

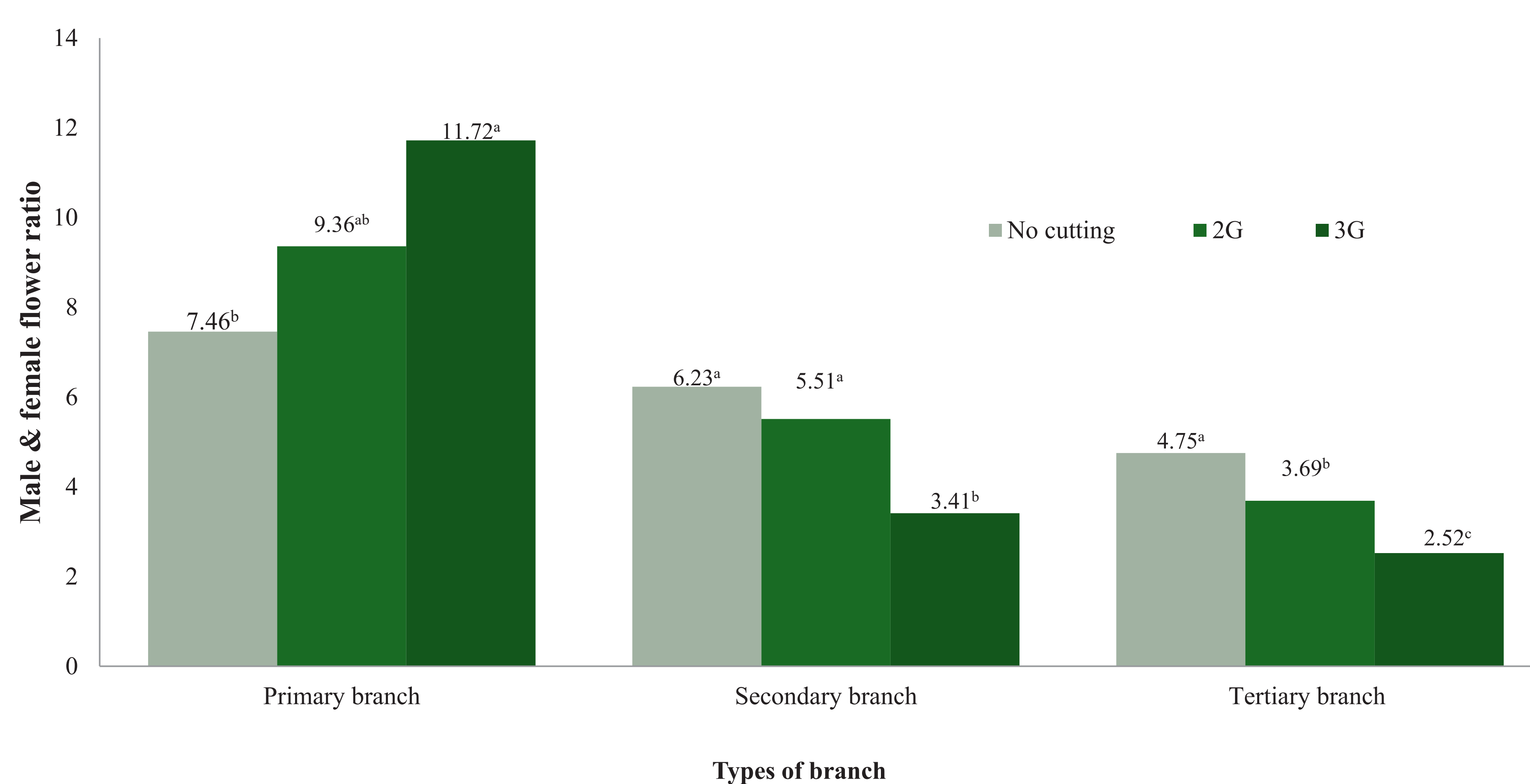
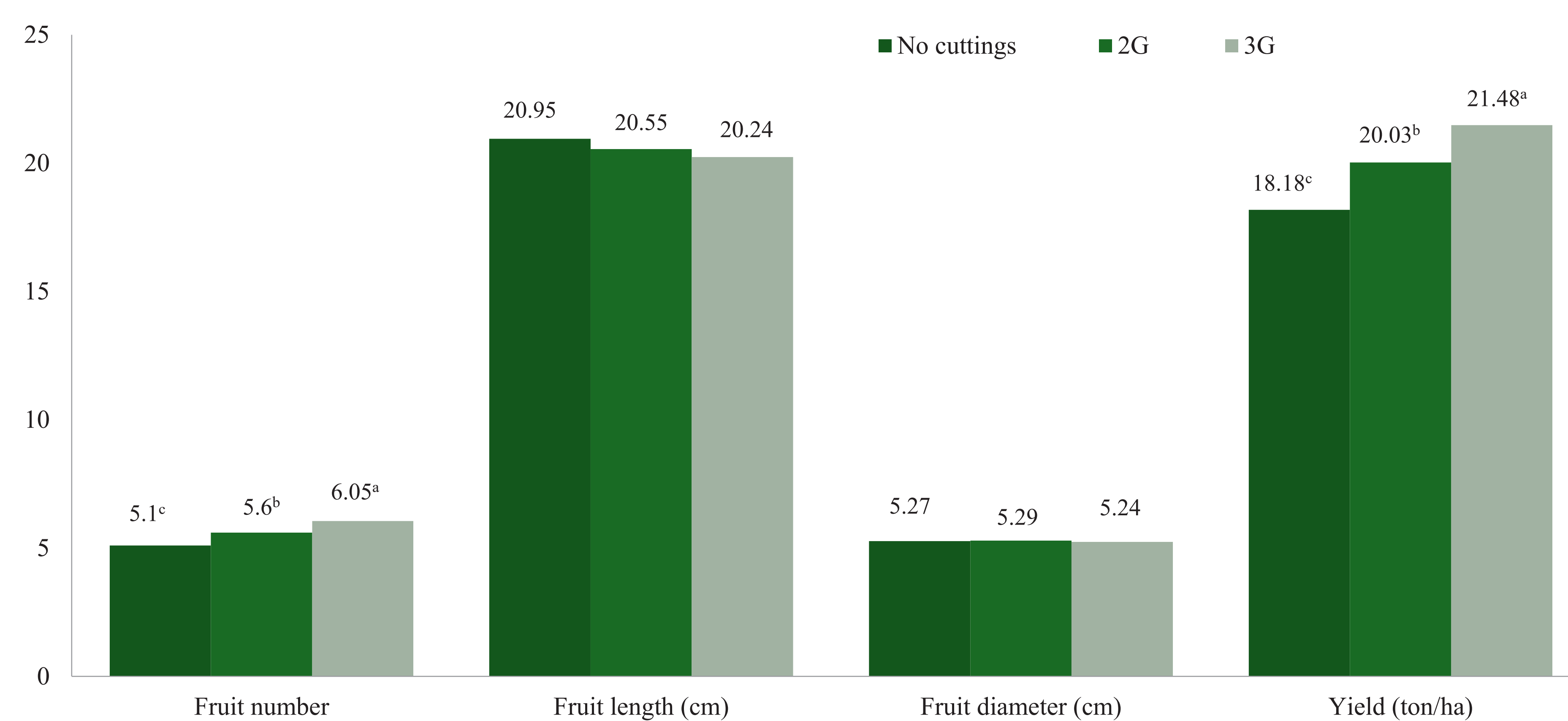


Figure 2 Yield and yield attribute traits of different generation cutting of cucumber in Godawari municipality, Kailali, 2024.



Conclusion

3G cutting has immense potential as it increases the number of female flowers in cucumber resulting in increased yield without using commercial chemical inputs.. Therefore, farmers can use this technique to improve productivity and the quality of cucumbers.

