# Planta Tool Ka Jurnal Agrosains (Journal of Agro Science)

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# Planta Tropika Jurnal Agrosains (Journal of Agro Science)

Planta Tropika focuses related to various themes, topics and aspects including (but not limited) to the following topics Agro-Biotechnology, Plant Breeding, Agriculture Waste Management, Plant Protection, Soil Science, Post Harvest Science and Technology, Horticulture. Planta Tropika published two times a year (February and August) by Universitas Muhammadiyah Yogyakarta in collaboration with Indonesian Association of Agrotechnology / Agroecotechnology (PAGI). The subscriptions for one year: IDR 350.000.

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## **Editorial**

Journal of Planta Tropika ISSN 0216-499X published by Study Program of Agrotechnology, Faculty of Agriculture, Universitas Muhammadiyah Yogyakarta, is journal presenting scientific articles of agricultural science (Journal of Agro Science). With full sense of gratitude to the Almighty Allah, Volume 10 Number 2 for the year of 2022 has been published.

In this edition, Journal of Planta Tropika presents seven research articles in the field of Agro sciences comprising post harvest physiology, crop cultivation system, weeds management, tissue culture, land management, and climate. The scientific articles discuss about:

(1) Litter Production of Cocoa-Based Agroforestry in West Sumatera, Indonesia, (2) Analysis of Soil Penetration Resistance in Coffee Plantation Agroecosystems in Bangelan, Malang, East Java, (3) Application of Streptomyces sp. and Trichoderma sp. for Promoting Generative Plants Growth of Cherry Tomato (Lycopersicum cerasiformae Mill.), (4) Magnesium Fertilizer Increased Growth, Rhizome Yield, and Essential Oil Content of Ginger (Zingiber officinale), (5) Increasing Growth and Yield of Shallot Using Nano Zeolite and Nano Crab Shell Encapsulated NK Fertilizer in Entisols and Inceptisols, (6) Seed Bio-Priming to Enhance Seed Germination and Seed Vigor of Rice Using Rhizobacteria from The Northern Coast of Pemalang, Central Java, Indonesia, (7) Application of Empty Fruit Bunches of Oil Palm and Indigofera zollingeriana for Conservation of Oil Palm Plantation, (8) Utilization of Several Agricultural Wastes Into Briquette as Renewable Energy Source, (9) Effects of Foliar Application of Oil Palm Empty Fruit Bunch Ash Nanoparticles on Stomatal Anatomy of Potato Leaf Plants (Solanum tuberosum L.), (10) Effects of Mycorrhiza Doses and Manure Types on Growth and Yield of Cassava in Gunungkidul, (11) Fertilizers for Improving the Growth Characteristics and N Uptake of Wild Rorippa indica L. Hiern in Different Soil, and (12) Inoculation of Merapi Indigenous Rhizobacteria as A Substitute Compost for Application in Rice Cultivation on Coastal Sandy Under Drought Stress.

The editors would like to thank the authors, reviewers, executive editors, leaders and LRI UMY for their participation and cooperation. Our hope, this journal can be useful for readers or be a reference for other researchers and useful for the advancement of the agriculture.

**Editors** 

### **GUIDE FOR AUTHORS**

#### TYPE OF PAPERS

PLANTA TROPIKA receives manuscripts in the form of research papers in Bahasa Indonesia or English. The manuscript submitted is a research paper that has never been published in a journal or other publication.

#### **SUBMISSION**

The submission of the manuscript is done through our journal website http://journal.umy. ac.id/index.php/pt/index. If you need information regarding the process and procedure for sending the manuscript, you can send it via email at plantatropika@umy.ac.id. Editor's address: EMAIL: Please list one of authors' email address Program Studi Agroteknologi, Fakultas Pertanian, Universitas Muhammadiyah Yogyakarta, Il. Ring Road Selatan, Tamantirto, Kasihan, Bantul, Telp ABSTRAK: Abstrak is written in Bahasa Indone-(0274) 387646 psw 224, ISSN: 2528-7079.

#### ARTICLE STRUCTURE

The submitted manuscripts should consist of 15-20 pages of A4 size paper with 12-point Times New Roman fonts, 1.5 spacing with left-right margin and top-bottom of the paper is 2.5 cm each. ABSTRACT: Abstract is written in English All manuscript pages including images, tables and references should be page-numbered. Each table or picture should be numbered and titled.

The systematic of the manuscript writing is as follows:

TITLE: The title should be brief and informative INTRODUCTION: Introduction contains backand written bold. Only the first letter of the words is written in uppercase. Maximum length should be 14 words.

**AUTHOR NAMES**: The author names should be written in lowercase letters (only the first letter of the words is written in uppercase) and should be written from the first author and followed by the others along with the marker of each author's affiliation.

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sia using single space in a paragraph with maximum length of 200 words. It should contain background, objective, method, results, and conclusion followed by keywords containing maximum of 5 words.

using single space in a paragraph with maximum length of 200 words. It should contain background, objective, method, results, and conclusion followed by keywords containing maximum of 5 words.

ground, hypothesis or problem outline, and the objective of the research.

MATERIALS AND METHOD: Explaining in REFERENCE TO AN ARTICLE IN detail about materials and method used in the research as well as the data collection and analysis.

**RESULT AND DISCUSSION**: The results of the research should be clear. State the results collected according to analyzed data. Discussion should include the significance of the results.

**CONCLUSION**: Authors are expected to give brief conclusion and to answer the objective of the research.

#### ACKNOWLEDGEMENT: If necessary.

**REFERENCES**: Single space, according to the authors' guide of Planta Tropika.

#### EXAMPLES ON HOW TO WRITE **REFERENCES**

References are written in alphabetical order according to the rules below:

#### REFERENCE TO A BOOK

Gardner, F.P., R.B. Pearce, and R.L. Mitchell. 1991. Fisiologi Tanaman Budidaya (Translated by Herawati Susilo). UI Press. Jakarta.

#### REFERENCE TO A JOURNAL PUBLICATION

Parwata, I.G.M.A., D. Indradewa, P.Yudono dan B.Dj. Kertonegoro. 2010. Pengelompokan genotipe jarak pagar berdasarkan ketahanannya terhadap kekeringan pada fase pembibitan di lahan pasir pantai. J. Agron. Indonesia 38:156-162.

#### REFERENCE TO A THESIS/DISSERTATION

Churiah. 2006. Protein bioaktif dari bagian tanaman dan akar transgenic Cucurbitaceae serta aktivitas antiproliferasi galur sel kanker in vitro. Disertasi. Sekolah Pascasarjana. Institut Pertanian Bogor. Bogor.

# **PROCEEDING**

Widaryanto dan Damanhuri. 1990. Pengaruh cara pengendalian gulma dan pemberian mulsa jerami terhadap pertumbuhan dan produksi bawang putih (Allium sativum L.). Prosiding Konferensi Nasional X HIGI hal. 376-384.

#### FIGURE FORMATTING

Title should be given below each figure. Additional information (notes) should be written in lowercase letters except the first letter in each sentence. All figures need to be numbered respectively. Figures should be placed close to explanation/ discussion about the figure.

#### Examples:

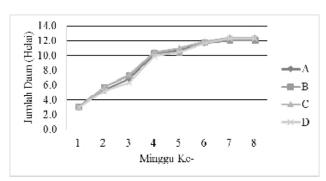


Figure 1. Number of leaves of corn plant

A = 250 kg KCl/ha + 0 kg KJP/haB = 125 kg KCl/ha + 273,89 kg KJP/haC = 62.5 kg KCl/ha + 410.84 kg KJP/haD = 0 kg KCl/ha + 547,79 kg KJP/ha

Fig. 1., Fig. 2., and so on. The title of the figure is written with lowercase letters (use uppercase letter at the beginning of the title only) and without full stop (.). Additional information (notes) is placed below the figure.

#### TABLE FORMATTING

The title of the table should be written above the table started from the left (left alignment). Additional information related to the table (notes) is placed below the table. The information is written in uppercase letters at the beginning only as well as the titles inside the table. Table is placed close to the discussion of the table.

#### Examples:

Table 1. Fruit compost analysis

Variable	Jatropha before composted	Jatropha after composted	SNI (National standard) for compost	Category
Water content	22,49 %	45,79 %	≤ 50 %	Qualified
рН	7,05	8,02	4-8	Qualified
C-Organic content	10,01	5,11	9,8-32 %	Not qualified
Organic matter	17,42 %	8,81 %	27-58	Not qualified
N-Total	0,97 %	2,69 %	< 6 %	Qualified
C/N Ratio	10,44	1.90	≤ 20	Qualified
Potassium	-	9,06 %	< 6 %**	Qualified

Notes: \*\*) Certain materials originated from natural organic matters are allowed to contain  $P_2O_5$  dan  $K_2O$  level > 6% (proved with the results of laboratory analysis).