

ABSTRAK

Siska Juita, 2023, Keaneekaragaman Collembola di Lahan Pertanian Selada (*Lactuca sativa* L.) Organik dan Anorganik Desa Sukajaya, Lembang, Bandung Barat. Dibimbing oleh Prof. Dr. H. Toto Sutarto Gani Utari, M.Pd. dan Drs. Suhara, M.Pd.

Telah dilakukan penelitian tentang keaneekaragaman Collembola di lahan Pertanian Selada (*Lactuca sativa* L.) yang dikelola dengan dua sistem pertanian. Yaitu sistem pertanian organik yang mengelola lahan tidak menggunakan bahan kimia dan sistem pertanian anorganik yang mengelola lahan menggunakan bahan kimia. Metode yang digunakan pada penelitian ini yaitu deskriptif kuantitatif dengan desain penelitian *belt transect*, serta teknik pengambilan sampel dengan metode *pitfall trap* dan pengapungan. Pengambilan sampel dilakukan sebanyak tiga kali. Sampel ke-1 pada empat HTS, sampel ke-2 19 HTS, dan sampel ke-3 43 HTS. Data utama yang diambil yaitu data keaneekaragaman Collembola dan data pendukung yaitu faktor klimatik meliputi intensitas cahaya, kelembapan tanah, suhu tanah, dan pH tanah. Hasil perhitungan indeks keaneekaragaman jenis di lahan pertanian selada organik sampel ke-1, ke-2, dan ke-3 yaitu, 1.20, 1.62, dan 1.68. Di lahan anorganik sampel ke-1, ke-2, dan ke-3 yaitu 2.26, 1.11, dan 1.50. Nilai indeks keaneekaragaman Collembola di lahan pertanian selada organik mengalami kenaikan dikarenakan tidak adanya pengaruh pestisida. Nilai indeks keaneekaragaman Collembola di lahan anorganik pada sampel ke-1 menuju sampel ke-2 mengalami penurunan karena terdapat pengaruh pestisida, dan pada pengambilan sampel ke-3 mengalami kenaikan karena dipengaruhi oleh kondisi tanaman yang sudah berdaun lebat dan pembusukan tanaman selada yang menyebabkan banyaknya sumber makanan.

Kata Kunci : *Keaneekaragaman, Collembola, Pertanian, Selada*

ABSTRACT

Siska Juita, 2023, Collembola diversity in Organic and Inorganik Lettuce (Lactuca sativa L.) farmland of Sukajaya village, Lembang, West Bandung. Supervised by Prof. Dr. H. Toto Sutarto Gani Utari, M.Pd. and Drs. Suhara, M.Pd.

Research has been conducted on Collembola diversity in lettuce (Lactuca sativa L.) farms managed with two farming systems. Namely organic farming systems that manage land without using chemicals and inorganic farming systems that manage land using chemicals. The method used in this research is descriptive quantitative with a belt transect research design, and sampling techniques with pitfall trap and flotation methods. Sampling was done three times. The 1st sample at four days after planting, the 2nd sample 19 days after planting, and the 3rd sample 43 days after planting. The main data taken is Collembola diversity data and supporting data are climatic factors including light intensity, soil moisture, soil temperature, and soil pH. The results of the calculation of the species diversity index in organic lettuce farmland in the 1st, 2nd, and 3rd samples are 1.20, 1.62, and 1.68. On inorganic land, the 1st, 2nd, and 3rd samples are 2.26, 1.11, and 1.50. Collembola diversity index value in organic lettuce farmland increased due to the absence of pesticide influence. The index value of Collembola diversity in inorganic land in the 1st sample to the 2nd sample decreased due to the influence of pesticides, and in the 3rd sampling increased because it was influenced by the condition of plants that were already leafy and the decay of lettuce plants which caused many food sources.

Keywords: Diversity, Collembola, Agriculture, Lettuce

RINGKESAN

Siska Juita, 2023, Kaanekaragaman Collembola di Kebon Saladah (*Lactuca sativa* L.) Organik sareng Anorganik Desa Sukajaya, Lembang, Bandung Barat. Diawas ku Prof. Dr. H. Toto Sutarto Gani Utari, M.Pd. dan Drs. Suhara, M.Pd.

Tos dilakukeun panalungtikan kaanekaragaman Collembola di kebon saladah (*Lactuca sativa* L.) nu diatur ku dua sistem nyaeta ku cara organik anu teu ngangge bahan kimia sareng anorganik nu ngangge bahan kimia. Metode anu dianggo dina ieu panalungtikan yaéta dèskriptif kuantitatif anu nganggo rancangan panalungtikan *belt transect*, sareng tehnik nyandak sampling ku metoda *pitfall trap* sareng pangapungan. Kanggo nyandak sampling dilaksanakeun tilu kali. Sampling ka-1 dinu poe ka opat saatos penanaman, sampling ka-2 dinu poe ka 19 saatos penanaman, sareng sampling ka-3 dinu poe ka 43 saatos penanaman. Hasil na nunjukeun yen kaanekaragaman jinis di kebon saladah organik sampling ka-1, ka-2, sareng ka-3 nyaéta 1.20, 1.62, sareng 1.68. Hasil di kebon saladah anorganik sampling ka-1, ka-2, sareng ka-3 nyaéta 2.26, 1.11, sareng 1.50. Hasil indeks kaanekaragaman di kebon saladah organik naek kusabab teu aya pangaruh tina pestisida. Nilai indeks kaanekaragaman di kebon saladah anorganik sampling ka-1 maju ka sampling ka-2 turun kusabab aya pangaruh tina pestisida, di sampling ka-3 nilai na naek kusabab aya pangaruh ti kondisi tutuwuhan nu daun na kandel sareng buruk na tutuwuhan saladah nyebabkeun seueur sumber pangan.

Kata Kunci : *Kaanekaragaman, Collembola, Tatanen, Saladah*