

**IDENTIFIKASI *Curvularia eragrostidis* (Henn.) J.A.Mey. DAN
PENGENDALIANNYA DENGAN EKSTRAK DAUN SINGKAI (*Peronema
canescens* Jack) PADA TANAMAN KELAPA SAWIT (*Elaeis
guineensis* Jacq.)**

**Anya Via Febriani
21/490097/PBI/01803**

INTISARI

Kelapa sawit adalah komoditas perkebunan yang berperan penting karena menjadi sumber penghasil devisa terbesar dari ekspor sektor pertanian. Penyakit bercak daun menjadi salah satu penyakit utama yang menginfeksi bibit kelapa sawit pada tahap *pre-* dan *main-nursery*. Jamur *Curvularia* sp. ditemukan sebagai penyebab penyakit bercak daun di pembibitan kelapa sawit di Indonesia, akan tetapi jenis *Curvularia* yang menginfeksi daun kelapa sawit tersebut belum jelas teridentifikasi. Pengendalian penyakit bercak daun menggunakan fungisida kimia secara terus menerus dapat menyebabkan berkembangnya jamur patogen resisten dan menimbulkan dampak buruk dalam jangka panjang terhadap lingkungan sehingga diperlukan alternatif fungisida yang lebih ramah terhadap lingkungan yaitu ekstrak air daun sungkai (*Peronema canescens* Jack). Tujuan penelitian ini adalah untuk mengidentifikasi jenis *Curvularia* yang menyebabkan penyakit bercak daun pada tanaman kelapa sawit, menganalisis daya hambat ekstrak air daun sungkai terhadap *Curvularia* secara *in vitro*, dan menganalisis pengaruhnya terhadap infeksi *Curvularia* pada tanaman kelapa sawit. Penelitian identifikasi jamur *Curvularia* dilakukan berdasarkan karakter morfologi secara makroskopis dan mikroskopis, sedangkan penelitian uji ekstrak air daun sungkai secara *in vitro* menggunakan metode *poison food* dan uji secara *in vivo* menggunakan Rancangan Acak Lengkap dengan 5 perlakuan dan 3 ulangan. Hasil identifikasi menunjukkan bahwa jenis jamur penyebab penyakit bercak daun pada tanaman kelapa sawit teridentifikasi sebagai *Curvularia eragrostidis*, ekstrak air daun sungkai dapat menghambat pertumbuhan *C. eragrostidis* secara *in vitro* dengan persentase penghambatan 22,12-32,60% dengan kategori aktivitas antifungi lemah-sedang, dan ekstrak air daun sungkai konsentrasi 25% dapat digunakan untuk mengendalikan infeksi *C. eragrostidis* berdasarkan jumlah bercak sebesar 36,25-59,50% dengan kategori kurang efektif - cukup efektif dan dapat mengendalikan infeksi *C. eragrostidis* berdasarkan diameter bercak sebesar 12,50-27,78% dengan kategori sangat tidak efektif - kurang efektif.

Kata Kunci : Bercak Daun, *Curvularia*, Kelapa Sawit, Penyakit, Sungkai

**IDENTIFICATION OF *Curvularia eragrostidis* (Henn.) J.A.Mey. AND
ITS CONTROL WITH FALSE ELDER (*Peronema canescens* Jack) LEAF
EXTRACT IN OIL PALM (*Elaeis guineensis* Jacq.)**

**Anya Via Febriani
21/490097/PBI/01803**

ABSTRACT

Oil palm is a plantation commodity that plays an important role because it is the largest source of foreign exchange from agricultural exports. Leaf spot disease is one of the main diseases that attacks oil palm seedlings at the pre- and main-nursery. *Curvularia* sp. was found causing leaf spot disease in oil palm nurseries in Indonesia but the species of *Curvularia* that infects oil palm leaves has not been clearly identified. Control of leaf spot disease using chemical fungicides continuously can cause the development of resistant pathogenic fungi and have a long-term negative impact on the environment, so an alternative fungicide that is more friendly to the environment is needed, namely false elder (*Peronema canescens* Jack) leaf water extract. The aimed of this study was identify the species of *Curvularia* that caused leaf spot disease in oil palm, to analyze the inhibition of *P. canescens* leaf water extract against *Curvularia* in vitro, and to analyze its effect on *Curvularia* infection in oil palm. *Curvularia* identification research was based on macroscopic and microscopic morphological characters, while the in vitro test of *P. canescens* leaf water extract used the poison food method and the in vivo test used a Completely Randomized Design with five treatments and three replications. Based on the research results, it was concluded that the species of fungus that caused leaf spot disease in oil palm was identified as *Curvularia eragrostidis*, *P. canescens* leaf water extract could inhibit the growth of *C. eragrostidis* in vitro with an inhibition percentage of 22.12-32.60% with a weakly to moderate antifungal activity category, and *P. canescens* leaf water extract with a 25% concentration could be used to control *C. eragrostidis* infection based on the number of spot was 36.25-59.50% with less effective to quite effective category and could control *C. eragrostidis* infection based on the diameter of spot was 12.50-27.78% with very ineffective to less effective category.

Keywords: *Curvularia*, Disease, False Elder, Leaf Spot, Oil Palm