

ABSTRAK

Kulsum, Ummi. 2022. *Pengaruh Beberapa Jenis Media Perendaman Benih dan Komposisi Media Tanam Terhadap Pertumbuhan Bibit Sengon (Paraserianthes falcataria L. Nielsen).*

Skripsi, Program Studi Agroteknologi Fakultas Pertanian Universitas Panca Marga Probolinggo, dibawah bimbingan Ibu Ir. Mimik Umi Zuhroh, MM., MP sebagai Dosen Pembimbing Utama dan Bapak Ir. Moch. Su'ud. M.P sebagai Dosen Pembimbing Anggota.

Sengon merupakan tanaman fast growing, yaitu memiliki pertumbuhan yang relative cepat, masa panen yang pendek, teknik budidaya yang relative mudah, produktivitas tinggi, bersifat multi fungsi dan memberikan dampak ganda baik sebagai tanaman produksi karena kayunya dapat digunakan untuk berbagai keperluan.

Penelitian ini bertujuan untuk : 1) Mengetahui pengaruh jenis media perendaman benih terhadap pertumbuhan bibit sengon (*Paraserianthes falcataria L. Nielsen*). 2) Mengetahui pengaruh komposisi media tanam terhadap pertumbuhan bibit sengon (*Paraserianthes falcataria L. Nielsen*). 3) Mengetahui interaksi antara pengaruh jenis media perendaman benih dan komposisi media tanam terhadap pertumbuhan bibit sengon (*Paraserianthes falcataria L. Nielsen*).

Penelitian ini dilakukan pada bulan April – Juli 2022 di Dusun Krajan, Desa Randuputih, Kecamatan Dringu, Kabupaten Probolinggo. Rancangan yang digunakan adalah Rancangan Acak Kelompok (RAK) dengan 2 faktor. Faktor pertama adalah jenis media perendaman benih (tanpa perendaman, air panas 60°C, air kelapa hijau dan asam sulfat (H₂SO₄) 95%) dan faktor kedua adalah komposisi media tanam (tanah:pasir 1:2, tanah:cocopeat 1:2, tanah:arang sekam 1:2) dan diulang sebanyak 3 kali.

Kesimpulan hasil penelitian : 1) Perlakuan jenis media perendaman P3 (asam sulfat (H₂SO₄)) memberikan pengaruh berbeda sangat nyata terhadap parameter potensi tumbuh maksimum, daya berkecambah, keserempakan tumbuh, kecepatan tumbuh, indeks vigor, dan tinggi bibit pada pertumbuhan bibit sengon (*Paraserianthes falcataria L. Nielsen*). 2) Perlakuan komposisi media tanaman T2 (tanah : cocopeat) memberikan pengaruh berbeda sangat nyata terhadap parameter potensi tumbuh maksimum, daya berkecambah, kecepatan tumbuh dan indeks vigor pada pertumbuhan bibit sengon (*Paraserianthes falcataria L. Nielsen*). 3) Perlakuan interaksi jenis media perendaman benih dan komposisi media tanam P3T2 (asam sulfat dan tanah : cocopeat) memberikan pengaruh berbeda sangat nyata terhadap parameter tinggi bibit, jumlah daun, dan panjang akar pada pertumbuhan bibit sengon (*Paraserianthes falcataria L. Nielsen*).

Kata Kunci : Jenis Perendaman Benih, Komposisi Media Tanam, Bibit

ABSTRACT

Kulsum, Ummi. 2022. The Effect of Several Types of Seed Soaking Media and the Composition of Planting Media on the Growth of Sengon Seeds (Paraserianthes falcataria L. Nielsen).

Thesis, Agrotechnology Study Program, Faculty of Agriculture, Panca Marga University Probolinggo, under the guidance of Mrs. Ir. Mimik Umi Zuhroh, MM., MP as the Main Advisory Lecturer and Mr. Ir. Moch Su'ud, M.P as a Member Advisory Lecturer.

Sengon is a fast growing plant, which has relatively fast growth, short harvest period, relatively easy cultivation technique, high productivity, is multi-functional and has a double impact both as a production plant because the wood can be used for various purposes.

This study aims to: 1) Determine the effect of the type of seed soaking media on the growth of sengon seeds (Paraserieanthos falcataria L. Nielsen). 2) Knowing the effect of planting media composition on the growth of sengon seeds (Paraserieanthos falcataria L. Nielsen). 3) determine the interaction between the effect of the type of seed soaking media and the composition of the planting medium on the growth of sengon seeds (Paraserieanthos falcataria L. Nielsen).

This research was conducted from April to July 2022 in Krajan Hamlet, Randuputih Village, Dringu District, Probolinggo Regency. The design used was a Randomized Block Design (RAK) with 2 factors. The first factor is the type of seed soaking medium (without soaking, 60oC hot water, green coconut water and 95% sulfuric acid (H₂SO₄)) and the second factor was the composition of the planting medium (soil: sand 1:2, soil: cocopeat 1:2, soil: husk charcoal 1:2) and repeated 3 times.

Conclusions from the results of the study: 1) Treatment of type of immersion media P3 (sulfuric acid (H₂SO₄)) had a very significant effect on the parameters of maximum growth potential, germination, growth synchronously, growth speed, vigor index, and seedling height on the growth and development of sengon (Paraserianthes falcataria L. Nielsen). 2) Treatment of plant media composition T2 (soil:cocopeat) gave a very significant effect on the parameters of maximum growth potential, germination, growth speed and vigor index on the growth of sengon seeds (Paraserianthes falcataria L. Nielsen). 3) The interaction treatment of the type of seed soaking media and the composition of the planting medium P3T2 (sulfuric acid and soil: cocopeat) gave very significant different effects on the parameters of seedling height, number of leaves, and root length on the growth of sengon seeds (Paraserianthes falcataria L. Nielsen) .

Keywords : *Type of Seed Soaking, Composition of Planting Media, Sengon Seeds (Paraserieanthos falcataria L. Nielsen).*