

ABSTRAK

SITI AFNI. NIM 4152141021 (2021). Pengembangan Ensiklopedia Produksi Senyawa Metabolit Sekunder dan Rumah Kaca Sebagai Tempat Aklimatisasi Tanaman Hasil Kultur Jaringan. Skripsi. Universitas Negeri Medan.

Penelitian ini bertujuan untuk mengetahui kelayakan buku ensiklopedia produksi senyawa metabolit sekunder dan rumah kaca sebagai tempat aklimatisasi tanaman hasil kultur jaringan. Subjek dalam penelitian ini adalah (1) satu orang dosen ahli materi, (2) satu orang dosen ahli desain instruksional, (3) satu orang dosen ahli media pembelajaran, (4) satu orang guru biologi SMA N 11 Medan dan (5) siswa kelas XII SMAN 11 Medan. Penelitian ini merupakan penelitian pengembangan dengan model 4-D modifikasi dengan 3 tahap yaitu *define*, *design*, dan *development*. Hasil penelitian menunjukkan bahwa (1) penilaian ahli materi berdasarkan kelayakan isi, kelayakan penyajian dan kelayakan bahasa diperoleh skor rata-rata persentase sebesar 86,3% dengan kategori sangat baik, (2) penilaian ahli desain berdasarkan kelayakan ukuran buku, kelayakan desain cover dan kelayakan desain isi diperoleh skor rata-rata persentase sebesar 96,7% dengan kategori sangat baik, (3) penilaian oleh dosen ahli media pembelajaran berdasarkan kesesuaian materi, sistematika penyampaian materi, efisiensi ensiklopedia, dan kebahasaan diperoleh skor rata-rata persentase sebesar 90,9% dengan kategori sangat baik, (4) penilaian oleh guru biologi kelas XII berdasarkan tampilan buku, penguasaan konsep dan motivasi belajar siswa diperoleh skor rata-rata persentase 94,6% dengan kategori sangat baik dan (5) penilaian oleh siswa termasuk kategori sangat baik yang terdiri dari nilai uji coba perorangan diperoleh 88,4%, uji coba kelompok kecil diperoleh 93,2% dan uji coba kelompok terbatas diperoleh 92,2%. Sehingga dapat disimpulkan bahwa ensiklopedia kultur jaringan yang dikembangkan telah layak menurut dosen ahli materi, ahli desain instruksional, ahli media pembelajaran, guru biologi, dan siswa sehingga buku Ensiklopedia Produksi Senyawa Metabolit Sekunder dan Rumah Kaca Sebagai Tempat Aklimatisasi Tanaman Hasil Kultur Jaringan dapat digunakan sebagai buku pendamping atau tambahan bagi guru, siswa dan pembaca secara umum yang tertarik di bidang kultur jaringan.

Kata kunci : Pengembangan, Ensiklopedia, Metabolit sekunder, Rumah kaca.

ABSTRACT

SITI AFNI. NIM 4152141021 (2021). Development of Encyclopedia of Production of Secondary Metabolite Compounds and Greenhouses as Places for Acclimatization of Tissue Culture Plants. Thesis. Medan State University. 2021.

This study aims to determine the feasibility of an encyclopedia book on the production of secondary metabolites and greenhouses as a place for acclimatization of tissue cultured plants. The subjects in this study were (1) one material expert lecturer, (2) one instructional design expert lecturer, (3) one learning media expert lecturer, (4) one biology teacher at SMA N 11 Medan and (5) students class XII SMAN 11 Medan. This research is a development research with a modified 4-D model with 3 stages, namely define, design, and development. The results showed that (1) the assessment of material experts based on the feasibility of content, presentation feasibility and language feasibility obtained an average percentage score of 86.3% with a very good category, (2) the design expert's assessment was based on the feasibility of book size, cover design feasibility and the feasibility of the content design obtained an average percentage score of 96.7% with a very good category, (3) an assessment by expert lecturers of learning media based on the suitability of the material, systematic delivery of material, encyclopedia efficiency, and linguistics obtained an average percentage score of 90, 9% in the very good category, (4) the assessment by the class XII biology teacher based on the appearance of the book, mastery of concepts and students' learning motivation obtained an average percentage score of 94.6% in the very good category and (5) the assessment by students in the very category both consisting of individual trial scores obtained 88.4%, small group trials obtained 93.2% and limited group trials obtained 92.2%. So it can be concluded that the tissue culture encyclopedia developed has been feasible according to material expert lecturers, instructional design experts, learning media experts, biology teachers, and students so that the encyclopedia book on the production of secondary metabolites and greenhouse as a place for acclimatization of tissue cultured plants can be used as reference book for teachers, students and readers in general who are interested in the field of plants tissue culture.

Kata kunci : Development, Encyclopedia, secondary metabolites, greenhouse.