

## ABSTRAK

Sukmawati, Diva Ayu. 2026. *Pengembangan Bahan Ajar Biologi SMA Berdasarkan Kearifan Lokal Kopi Jember dan Bermuatan Karakter Islami*. Skripsi, Program Studi Pendidikan Biologi, Fakultas Keguruan dan Ilmu Pendidikan, Universitas Muhammadiyah Jember.  
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**Kata Kunci:** Bahan ajar biologi, karakter Islami, kearifan lokal kopi Jember, penelitian pengembangan.

Bahan ajar merupakan suatu komponen penting pada aktivitas pembelajaran yang membimbing siswa untuk memahami materi dengan runtut serta mendukung ketercapaian tujuan pembelajaran. Namun, pembelajaran biologi di SMA selama ini masih banyak mempergunakan bahan ajar yang bersifat umum dan jarang mengaitkan materi dengan kearifan lokal di sekitar siswa. Di samping itu, karakter islami dalam pembelajaran biologi belum dilaksanakan secara optimal, alhasil pembelajaran cenderung terfokus kepada penguasaan konsep biologi semata. Kondisi ini memperlihatkan perlunya pengembangan bahan ajar yang tidak sekadar menekankan penguasaan konsep, namun juga mengaitkannya dengan kearifan lokal dan pembentukan karakter islami pada siswa. Studi ini bertujuan mengembangkan e-modul biologi SMA berdasarkan kearifan lokal kopi Jember dan bermuatan karakter islami serta mengetahui tingkat kevalidan dan kepraktisannya. Penelitian ini mempergunakan metode *Research and Development (R&D)* model yang dipergunakan yaitu ADDIE (*Analysis, Design, Development, Implementation, Evaluation*). Studi ini dilaksanakan pada bulan Agustus 2025 di SMA Negeri 2 Jember. Subjek penelitian adalah siswa kelas X SMA Negeri 2 Jember sebagai responden uji coba. Data dikumpulkan melalui angket validasi, angket respons siswa menggunakan instrumen skala Likert dan lembar *pretest-postes*. Data dianalisis secara deskriptif kuantitatif dengan menghitung persentase skor. Hasil validasi memperlihatkan e-modul memperoleh rerata skor 89% berkategori sangat valid. Hasil uji coba memperlihatkan persentase kepraktisan 87,11% pada kelompok kecil dan 83,12% pada kelompok besar. Maka dari itu, e-modul yang dikembangkan valid, praktis, dan layak dipergunakan sebagai bahan ajar biologi yang kontekstual serta mendukung pembentukan karakter islami siswa.

## ABSTRACT

*Sukmawati, Diva Ayu. 2026. Development of Senior High School Biology Teaching Materials Based on Jember Coffee Local Wisdom and Incorporating Islamic Character Values. Thesis, Biology Education Study Program, Faculty of Teacher Training and Education, Muhammadiyah University of Jember.*  
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**Keywords:** *Biology teaching materials, Islamic character, Jember coffee local wisdom, research and development.*

*Teaching materials are a crucial component of learning activities that guide students to understand materials systematically and support the achievement of learning objectives. However, biology learning in high schools has predominantly utilized general teaching materials and rarely linked the content to local wisdom surrounding the students. In addition, Islamic character integration in biology learning has not been implemented optimally, resulting in learning that tends to focus solely on biological concept mastery. This condition highlights the need to develop teaching materials that do not only emphasize conceptual mastery but also integrate local wisdom and the formation of Islamic character in students. This study aims to develop a high school biology e-module based on Jember coffee local wisdom with Islamic character content, as well as to determine its level of validity and practicality. This research employs the Research and Development (R&D) method using the ADDIE model (Analysis, Design, Development, Implementation, Evaluation). The study was conducted in August 2025 at SMA Negeri 2 Jember. The research subjects were tenth-grade students of SMA Negeri 2 Jember as trial respondents. Data were collected through validation questionnaires, student response questionnaires using Likert scale instruments, and pretest-posttest sheets. Data were analyzed descriptively and quantitatively by calculating the percentage scores. The validation results showed that the e-module obtained an average score of 89%, categorized as very valid. The trial results showed practicality percentages of 87.11% in the small group and 83.12% in the large group. Therefore, the developed e-module is valid, practical, and feasible to be used as a contextual biology teaching material that supports the formation of students' Islamic character.*