

## ABSTRAK

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Program Studi : Teknik Elektro S-1  
Judul : Implementasi Sistem Kontrol DrinkBot(Alat Pembuat Aneka Rasa Minuman Otomatis) menggunakan Kontrol Android Via Bluetooth

Implementasi sistem kontrol drinkbot (alat pembuat aneka rasa minuman otomatis) menggunakan kontrol android via Bluetooth telah berhasil dilakukan. Tahap-tahap pembuatan aneka rasa minuman disusun secara sistematis dan di kendalikan oleh mikrokontroler. Terdapat 8 menu pilihan minuman yaitu kopi pahit dingin, kopi pahit panas, kopi susu dingin, kopi susu panas, kopi manis dingin, kopi manis panas, kopi karamel dingin, dan kopi karamel panas. Pembuatan kopi pahit dingin memiliki rata-rata berat 180 mL dalam waktu 3 menit 18 detik. Pembuatan kopi pahit panas memiliki rata-rata berat 180 mL dalam waktu 2 menit 39 detik. Pembuatan kopi susu dingin memiliki rata-rata berat 190 mL dalam waktu 3 menit 43 detik. Pembuatan kopi susu panas memiliki rata-rata berat 190 dalam waktu 2 menit 31 detik. Pembuatan kopi manis dingin memiliki rata-rata berat 185 mL dalam waktu 3 menit 50 detik. Pembuatan kopi manis panas memiliki rata-rata 185 mL dalam waktu 2 menit 45 detik. Pembuatan kopi karamel dingin memiliki rata-rata berat 185 mL dalam waktu 3 menit 49 detik. Pembuatan kopi karamel panas memiliki rata-rata berat 185 mL dalam waktu 2 menit 46 detik. Alat ini menggunakan konveyor, sensor load cell, sensor infrared, sensor suhu Ds18b20, motor servo, pompa, df modul player dan pemilihan menu minuman dilakukan melalui aplikasi android yang dihubungkan dengan mesin melalui modul Bluetooth Hc-05 serta memiliki tingkat keberhasilan sebesar 87,5%.

**Kata Kunci** : Drinkbot, konveyor, sensor load cell, sensor suhu DS18B20, aplikasi android via bluetooth.

## ABSTRACT

Name : Khansa Hanifah  
Study Program : Teknik Elektro S-1  
Title : Implementation of DrinkBot Control System (Automatic Drinking Flavor Maker Tool) using Android Control Via Bluetooth

The implementation of the drinkbot control system (a tool for making various flavors of drinks automatically) using android control via Bluetooth has been successfully carried out. The stages of making various flavors of drinks are arranged systematically and controlled by a microcontroller. There are 8 drink menu choices, namely cold bitter coffee, hot bitter coffee, cold milk coffee, hot milk coffee, cold sweet coffee, hot sweet coffee, cold caramel coffee, and hot caramel coffee. Making cold bitter coffee has an average weight of 180 mL in 3 minutes 18 seconds. Making hot bitter coffee has an average weight of 180 mL in 2 minutes 39 seconds. Making cold milk coffee has an average weight of 190 mL in 3 minutes 43 seconds. Hot milk coffee brewing has an average weight of 190 in 2 minutes 31 seconds. Cold brew sweet coffee has an average weight of 185 mL in 3 minutes 50 seconds. Hot sweet coffee brew has an average of 185 mL in 2 minutes 45 seconds. Cold caramel coffee brewing has an average weight of 185 mL in 3 minutes 49 seconds. Making hot caramel coffee has an average weight of 185 mL in 2 minutes 46 seconds. This tool uses a conveyor, load cell sensor, infrared sensor, Ds18b20 temperature sensor, servo motor, pump, df player module and the selection of the drink menu is done through an android application that is connected to the machine via the Bluetooth Hc-05 module and has a success rate of 87.5 %.

**Keywords** : Drinkbot, conveyor, load cell sensor, DS18B20 temperature sensor, android application via bluetooth.