

# Collaborative Robotic Arm

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**Abstract:** *This project is all about creating an affordable and user-friendly Collaborative Robotic Arm(Cobot) that works alongside humans." Using Arduino, servo motors, and sensors, the robotic arm can automate tasks while adapting to human input in real time, ensuring safety and efficiency. Designed with small and medium-sized businesses (SMEs) in mind, the system makes automation more accessible. By utilizing open-source software and widely available components, this project aims to bring the benefits of collaborative robotics to a broader audience without the high costs typically associated with such technology.*

**Keywords:** Arduino uno, Servo motor, Power supply, Touch sensor, Buck convertor module, PVC pipe