

ABSTRACT

Carrier bags on the market today have experienced rapid development. Along with the development of this carrier bag is also followed by the development of development in the field of technology. This development provides an opportunity for the development of carrier bags into smart bags. The development of carrier bags into smart bags is based on the presence of device technology that becomes a human companion so that to be able to become a smart bag still needs adjustments that accommodate the security of electronic devices of its users. The purpose of this research is to produce a carrier bag with the right material application to support the use value of smart carrier bags. Seeing this, it is necessary to develop a carrier bag that can accommodate the need to protect electronic devices when climbing mountains and protect electronic devices from uncertain threats. Applying the material comparison method in order to provide an appropriate alternative for the needs of devices, especially RFID. The design of this carrier bag aims to help improve the development of bags to meet the needs of users in the digital era through the application of appropriate and appropriate materials in the carrier bag to protect the electronic devices inside. Data collection in this design is obtained through qualitative methods of existing materials and distributing questionnaires with mountain climbers. Through this process, it is ultimately able to design smart bags that are suitable and meet the eligibility requirements for outdoor use while still presenting the technology inside.

Keywords: *carrier bag, hiker, material, RFID*