

ABSTRACT

The blood transfusion service process involves the donor, the receiver and the Blood Donor Unit (UDD) PMI as agencies that serve the supply and distribution of blood. In the blood supply of services, the efforts made by UDD PMI and Hospital Blood Bank (BDRS) not maximum due to the lack of information on the availability of blood in BDRS as a reference for UDD to distribute blood. Services that have not been up this can result in the patient experiencing delays blood transfusions even death. One example is the maternal mortality rate (MMR) due to 28% caused of bleeding. Based on these problems need to design information systems that can assist in distributing blood and meet the needs.

The system is designed with a waterfall method that considers the needs of users in the design of the system. This system is built using a language-based programming PHP using the CodeIgniter framework and MySQL as database. System testing is done with the user acceptance test and debugging test to see that the needs of the user has been filled.

The result of these research is a web-based information systems which provide the availability of blood at each BDRS location. This system also provides a feature graph showing blood consumption an blood donor schedule.

Blood Management Information System for the Red Cross Blood Bank and blood availability chart there are features that provide information about the condition of the blood stock BDRS which is a reference in the distribution of blood and blood fulfillment by the UDD. In addition to these features there is also a graphic use of blood every month for a year. This data is a reference to determine the policy of targeting the blood supply of the following year. Schedule a blood donation activity is one important feature in preparing blood donation activities in an effort to meet the need for blood.

Keywords: PMI, Blood Bank, Waterfall, Information System