## ABSTRACT

Infant Warmer is one of the tools used elekromedik to provide protection and keep the baby's temperature to remain stable, ie for newborns, premature or post-operative care. Serves as a temperature sensor at room temperature controllers and baby skin sensor mat that serves as a pointer to the patient's temperature tersebut.Cara Infant Warmer is working to keep the baby's body temperature to remain stable. Infant Warmer is the operation by setting the temperature where the temperature is adjusted to the conditions of selection of the baby while the baby's body temperature is detected by a sensor skin.

Remember importance of this tool is to provide protection and keep the baby's body temperature to remain stable, and provide treatment to infants suffering from jaundice Infant Warmer then made modifications completed and Phototeraphy Skin Sensor. Problems with the equipment prior to the modification of Infant Warmer is a total damage and none of the remaining components of the tool. Barriers experienced is the lack of manual book (User Guide) of Infant Warmer tool that will do the modification.

With limitations on Infant warmer which means the total damage it has done modifications Infant Warmer skin and sensor-based Digital Phototeraphy that aims to make the tool can be used again.

Based on the measurement of skin sensors with an average error (error%) of 0.44%. Based on the measurement of timer 1 hour, 2 hours, 3 hours, 4 hours, 5 hours and 6 minutes obtained an average% error of 0.015%.

From the calculation error (% error) above can be concluded that the error is still within the tolerance limits and in the manufacture of this equipment is in conformity with the plan.

Keywords: Infant Warmer, Blue Light, Skin