ABSTRACT

Pesticide formulation which are available in market are only killed the mosquitos but not the larvae since its stability only 1 hour. Therefore formulation of propoxure 20 EC as insecticide to eridicate mosquitos and its larvae with agrisol and dodecyl benzen sulfonat as emulsifier nonionic and anionic hydrophilic. The present work was aimed to determine the best emulcifier concentrate in pesticide formulation so that the emulsion of oil and water will be stable for a long time. In present work the emulsifier concentrate was made, than emulsion stability test between oil and water as well as its effectivity were condected. This formulation could be used as active engridient for insecticide to kill *Aedes aigepty* mosquitos and its larvae and could be applied in the community.

The research showed that formulation consist of 17,4 % propoxure; 17,4% agrisol; 13,1% DBS, 47,8 % Xyline; 1,7% IPA, 1,7% PG and 0,9 % Toluen (%w) or Propoxur 30 EC is the best. Stability test of oil and water showed that the best solvent is thiner, and formed micro emulsi on water film for more than 12 week. Emulsion was stable by CMC 0,42 % v/v on oil film. Toxicity test revealed that LD_{50}, was 1-1,5 cc/lt both for larvae and mosquitos.

Keywords : emulsifier consentrate, dengue fever, incestiside