ABSTRACT

he porang plant (Amorphophallus muellleri Blume) is a tuberous plant and its tubers have the potential as a source of high glucomannan, making porang tubers superior to other species. Porang propagation can be done vegetatively using bulbil planting material. Bulbil experiences dormancy for 4-5 months. Sulfuric acid soaking can be used to break the dormancy of porang bulbils. This research aims to get the right concentration and length of soaking to break the dormancy of porang bulbils. This study used a two-factor Completely Randomized Design (CRD) with 3 replicates of the combination treatment. The first factor is sulfuric acid concentration consisting of 4 levels K0 (0%), K1 (10%), K2 (35%), and K3 (60%). The second factor is the length of soaking consisting of 4 levels L0 (0 minutes), L1 (10 minutes), L2 (25 minutes), and L3 (40 minutes). The results showed that the concentration of sulfuric acid had an effect on breaking the dormancy of porang plant bulbils on all benchmarks. The best concentration is at a concentration of 35%. The length of sulfuric acid soaking affected the benchmarks of germination, maximum growth potential, vigor index, appearance of growth, growth speed of germination, and shoot emergence time. The best soaking duration was 10 minutes. There was an interaction between concentration and duration of sulfuric acid.

Keywords: Consentration, Porang, Scarification, Viability, Vigor