

ABSTRAK

Shirleen Natalia (00000018318)

OPTIMASI MODEL STOKASTIK *PROFIT-LOSS SHARING* (PLS) UNTUK KREDIT MIKRO

Skripsi, Fakultas Sains dan Teknologi (2019).

(xi + 41 halaman, 16 gambar, 4 tabel, 1 lampiran)

Di Indonesia, prinsip Syariah berkembang pesat karena mayoritas penduduknya menganut agama Islam. Prinsip Syariah merupakan konsep *Profit-Loss Sharing* (PLS). Konsep PLS membantu para pedagang atau pengusaha mikro untuk mendapatkan bantuan dana agar bisa mengembangkan usahanya. Memodelkan konsep PLS menggunakan suatu distribusi tertentu dapat memaksimalkan keuntungan bagi pemberi pinjaman dan peminjam. Maksimal keuntungan bisa dicapai dengan cara mengoptimasi besar porsi pembagian bagi hasil. Besar porsi pembagian hasil dapat dihitung menggunakan data pendapatan pedagang atau pengusaha mikro. Hasilnya adalah nilai p optimal (p^*) bagi W_t berdistribusi uniform sebesar 17%, nilai p^* bagi W_t berdistribusi *shifted eksponensial* sebesar 25%, serta nilai p^* bagi W_t berdistribusi normal sebesar 17%.

Kata kunci: konsep PLS, *Profit-Loss Sharing*, optimasi model, bagi hasil, distribusi

Referensi: 19 (1958-2018)

ABSTRACT

Shirleen Natalia (00000018318)

OPTIMIZATION OF STOCHASTIC MODEL *PROFIT-LOSS SHARING (PLS)* FOR MICRO CREDIT

Thesis, Faculty of Science and Technology (2019).

(xi + 41 pages, 16 figures, 4 tables, 1 appendix)

In Indonesia, the principle of Sharia is growing rapidly because of the majority of the Moslem population. Sharia principles are the concept of profit-loss sharing (PLS). The PLS concept helps traders or micro-entrepreneurs to get funding to develop their businesses. Modeling the concept of PLS using a certain distribution can maximize profits for lenders and borrowers. Maximum profit can be achieved by optimizing the portion of the profit sharing. The portion of the profit sharing can be calculated using income data from traders or micro-entrepreneurs. The result is optimal value of p (p^*) for W_t with a uniform distribution at 17%, the value of p^* for W_t with shifted exponential distribution at 25%, and the value of p^* for W_t with normal distribution at 17%.

Keywords: PLS concept, *Profit-Loss Sharing*, model optimization, profit sharing, distribution

References: 19 (1958 - 2018)