

The Need for Improved Nursery Management Practices and Marketing in the Tree Nurseries of Northern Mindanao

Don Immanuel Edralin and Agustin Mercado Jr

*World Agroforestry Centre (ICRAF-Mindanao), MOSCAT Campus, Claveria,
Misamis Oriental, the Philippines*

ABSTRACT

Tree growing is recognized to provide economic and environmental benefits, and this has resulted in tree growing initiatives in Northern Mindanao. However, tree growing is faced with constraints including high field mortality and poor timber stands, with low merchantable height and diameter. This paper seeks to discern the quality differences of seedlings grown in three nursery types in Northern Mindanao, and to investigate the influence of nursery facilities and cultural management practices on seedling quality. Seedling quality was assessed through random sampling of planting materials. Information about nursery facilities and cultural management practices were obtained through interviews with nursery operators and through visual observations. It was found that private, communal and government nurseries have facilities designed for low-cost production of seedlings. The lack of hardening beds and raised benches used for seedling acclimatization explains the inability of seedlings to survive when outplanted. Seedlings were found to be of low quality in all nursery types, with weak stems, unbalanced root-shoot ratio and with J-root formation. It was also found that most nurseries did not apply soil treatment which is one of the basics for growing seedlings. There is an urgent need to improve nursery management practices by employing best management practices including proper hardening techniques using effective but non-expensive hardening beds and soil sterilization to improve seedling quality.

Keywords: facilities, sturdiness quotient, root-shoot ratio, hardening beds

INTRODUCTION

The 20 M Filipino people living in the uplands are the potential and effective human resource capable of rehabilitating the nation's denuded forests (Mercado and Piñon 2008). Most of these people are practicing small-scale forestry as a livelihood activity. Intensifying small-scale forestry will not only improve the economic status of people in the uplands but also improve the national economic situation by reducing timber imports. The scaling-up of small-scale forestry in the Philippines is thereby a key to successful rehabilitation efforts. Scaling-up is, however, faced with the