

PREFACE

The problem of introduced or alien plants in Hawai'i's natural areas is as critical now as it ever has been. As the "crossroads of the Pacific," Hawai'i is subject to greater commerce and visitation with time. Alien plants are increasingly well distributed in other parts of the world for potential transport to Hawai'i. Growing numbers of residents in the State -- many from different parts of the world -- means more international and interisland travel, which also favors alien plant introduction and dispersal. Fragmentation of Hawai'i's few remaining natural areas provides more boundaries and corridors for alien plants to invade, and degradation of natural areas (for example, disturbance of soil by hooved mammals and development for industry or housing) provides more sites for introduced plant establishment. Some alien plants can modify areas to favor their own survival and to discourage that of native plants through shading, chemical changes in soils and nutrient cycles, and changing fire regimes. Indeed, the vegetation of many large areas of Hawai'i is now almost entirely comprised of introduced plant species, and significant invasions of natural areas continue.

Most of the 44 papers in this volume began as presentations at a 1986 symposium entitled "Control of Introduced Plants in Hawai'i's Native Ecosystems." The Symposium, organized by the National Park Service and the Cooperative National Park Resources Studies Unit at the University of Hawaii, was held in conjunction with the Sixth Conference in Natural Sciences at Hawaii Volcanoes National Park in 1986. In the past few years, most of the papers have been updated considerably, and a few contributions, including a concluding chapter, have been added. One milestone publication in 1990, the *Manual of the Flowering Plants of Hawai'i*, caused the changing of plant taxonomy in the papers to conform with current usage. For some papers, this was a major task. Other important statewide and local progress in the past few years also necessitated significant revisions.

The purpose of the Symposium was to summarize and communicate research results, management implications, needs, and perspectives of special interest groups on the topic of introduced or alien plants in Hawai'i. Efforts at control of introduced plants in native Hawaiian ecosystems was the emphasis of the meeting and remains the primary focus of this book. We hope that those responsible for and those simply interested in alien plant problems will find something useful herein, whether in the Hawaiian Archipelago, other islands of the world, or in natural areas on the continents.