This book is the outcome of the 2006 Aussois Winter School: “Open problems in Celestial Mechanics”. In this school, we have reviewed the state of the art in the theory and applications of dynamical systems with particular interest in planetary and galactic dynamics. Recent developments have been achieved in two directions: (1) the application of Nekhoroshev’s theorem to the motion of planets and asteroids and (2) the dynamical origin of the diversity of the extra-solar planetary systems.

The aims of the 2006 Aussois Winter School and consequently those of this book are:

- To provide a review of the dynamics of quasi-integrable Hamiltonian systems from the viewpoint of Nekhoroshev’s theorem and its implications for slow diffusion processes.
- To introduce the dynamics of weakly dissipative systems.
- To review the dynamics of small bodies in the solar system.
- To discuss the dynamical origin and the diversity of the extra-solar planetary systems.
- To highlight special problems in galactic dynamics.

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6. The molecules are absorbed into the bloodstream and consequently affect the organs. 7. She was a bright and eager student and, consequently, did well in school. 8. Consequently ecosystem value has rigid trait which is different from the law of diminishing marginal utility. 9. Consequently, it is important to take researches of combined lift technique in order to solve the problem of depth lift. 10. Consequently, a new one-step approach to thiocarbamates was exploited via selenium-catalyzed carbonylation of nitroarenes with thiols at atmospheric pressure. 11. Consequently, skipjack landings are...Â So we put the cord consequently to show that one thing resulted because of another. Which is John failed his fin Continue Reading. The aims of the 2006 Aussois Winter School and consequently those of this book are: â€¢ To provide a review of the dynamics of quasi-integrable Hamiltonian systems from the viewpoint of Nekhoroshev's theorem and its implications for slow diffusion processes. â€¢ To introduce the dynamics of weakly dissipative systems. â€¢ To review the dynamics of small bodies in the solar system. â€¢ The second part of this chapter reviews the problems related to degenerate systems, and describes the mechanism of production of chaotic motions in short times. 1.1 Introduction Classical Mechanics emphasizes the importance of a special class of mechanical systems which are called integrable systems.