Two-Speed Parachute Design Applied to Medium Payload, a Case Study

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Abstract

The study deals with a two-speed parachute for military use, taking into account that at the time of launch one must go down as quickly as possible to be out of range of enemy fire, the descent must be somewhat fast but after 400m they must land. as slow as possible for the safety of the skydiver, implementing a dual-state parachute system to achieve this, starting with a quick fall, and ending with a slow and safe descent. The system consists of the parachute initially having a reduced diameter by winding the part of the external diameter, once descended to a safer height; the parachutist can completely release the parachute thus achieving a slow and safe descent of the parachute

Keywords
Parachute, Skydiving, Rocket, Two-Speed.

Biography
Kevin Lezcano is an undergraduate student from the Aeronautics Engineering Department at Facultad Politecnica from Universidad Nacional de Asuncion. He is currently a team member of the Rocketry Club and participating to several international competitions.