Hypobaric hypoxia (HH) is a decisive factor in human health in populations that reside at high
altitude levels. Low oxygen rate affects most tissues and organs, including the testis. In humans,
hypoxia stimulates angiogenesis, testicular blood flow and increases intrascrotal temperature which
determines negative effects on sperm production. Our study researched the effects of HH in mice
testicle. Mice were housed in a hypobaric chamber with a setting at 4,200 m above sea level during
three different periods of hypoxia (8.3, 16.6 and 24.9 days). Control groups were housed at
normoxic conditions (500 m above sea level). Hypoxic mice were treated with melatonin, maca plant
(Lepidium meyenii) and melatonin and maca combination. The aim of present study was to
determine if maca consumption protects testis against harmful effects of hypoxia and to determine a
possible synergistic effect between melatonin and maca administration. In this article we have
demonstrated that hypoxia produces a co