

By ~~May 2007~~ Anitei, Science Editor

[Homosexual and Bisexual Fathers Make ... Better Mothers](#)

Female fitness increased by males in plants

In the field of sex, nature got very imaginative with the plants. Sexual organs of the plants, or flowers, are extremely diversely organized: they can be male or female, or have a hermaphrodite structure. Depending on species, an individual can carry hermaphrodite flowers, or only males, or only females, or a combination of two-three types at the same time. Even the famous cannabis has female and male individuals, and as hashish can only be made from female flowers' resin, only the female individuals can produce it. And do not even think that the hermaphrodite flowers auto-satisfy themselves: usually male or female parts mature later. A widespread sexual formula of the flowers that is still an evolutionary enigma is the presence of both male and bisexual flowers in the same plant, encountered in about 4000 species: why so many male flowers? A team of evolutionary biologists from Duke University, Mario Vallejo-Marin and Mark Rausher, has shown that male flowers make a better...mother! This unexpected benefit of a "male" strategy was detected making field experiments employing horsenettle, a common weed in North America. They found that male flowers can sometimes rise seed number, enhancing not their reproductive success, but the females' too. The researchers believe the male flowers do this as they save the plant's resources, as male flowers are smaller. The saved energy is headed to increased seed production. Male flowers could also be more attractive to insect pollinators, or if they remove less from the pollen carried on by the pollinators than bisexual flowers, they leave more non-self pollen for the female fruit-producing flowers. The precise mechanisms are still not known. "We don't know yet, but these alternatives could easily be tested through more experiments", said Mario. Other approaches made on other species revealed similar results.