

Status of *Mimosa pigra* Biological Control Agents (to March 2010)

Since 1983, 14 insects & 2 fungi have been released on *Mimosa pigra* in Australia

Well established and effective agents

Biological Control Agent	Plant part damaged	Release Date	Status	Areas established
INSECTS				
COLEOPTERA (Beetles)				
Bruchids (seed beetles)				
<i>Acanthoscelides puniceus</i>	mature hard seeds	1 April 1983	widely established, 0-10% seed kill	widespread throughout NT
<i>Acanthoscelides quadridentatus</i>	mature hard seeds	1 April 1983	established, rare, little impact	
Chrysomelids (leaf beetles)				
<i>Chlamisus mimosae</i>	leaves & stems	1 November 1985	established, fluctuating populations, little impact	Finniss River
<i>Malacorhinus irregularis</i>	young stems, leaves	1 October 2000	established, impact unknown	Adelaide, Finniss, Moyle, Mary, Daly & Docherty Rivers
<i>Nesaecrepida infuscata</i>	leaves, roots	1 October 2007	released at sites on the Mary, Adelaide, Finniss, Moyle, Docherty & Daly Rivers	
Curculionids (weevils)				
<i>Coelocephalapion aculeatum</i>	flower-buds	1 January 1992	did not persist	
<i>Coelocephalapion pigrae</i>	leaves & flower-buds	1 May 1994	established, destroys 10% of flowers	All catchments
<i>Chalcodermus serripes</i>	mature green seed	1 May 1996	found to be established	Finniss River
<i>Sibinia fastigiata</i>	immature green seed	1 December 1997	did not establish	
Rynchitids				
<i>Temnocerus debilis</i>	young leaves & tips	in Quarantine 1998-2010	not host-specific	

Biological Control Agent	Plant part damaged	Release Date	Status	Areas established
LEPIDOPTERA (Moths)				
Geometrids (loopers)				
<i>Macaria pallidata</i>	leaves	1 September 2002	established and spreading, early signs of causing substantial damage	Adelaide, Finnis, Mary, Moyle, & Daly Rivers
<i>Leuciris fimbriaria</i>	leaves	1 December 2004	evidence of establishment	Adelaide River
Gracillariids				
<i>Neurostrota gunniella</i>	young stems	1 February 1989	established, abundant & widespread, impact quantified	widespread in all catchments
Sesiids				
<i>Carmenta mimosa</i>	older stems	1 January 1989	established and spreading, very damaging	Adelaide, Finnis, Reynolds, Mary, & Daly Rivers
Xyloryctidae				
<i>Maroga setiotricha</i>	stem borer	Native	damaging native moth	throughout NT
PATHOGENS (fungi)				
<i>Diabole cubensis</i>	leaves & stems	1 June 1996	did not establish	
<i>Phloeospora mimosae-pigrae</i>	leaves & stems	1 January 1995	did not establish	

A full list is available from NT Department of Natural Resources, Environment the Arts & Sport Senior Biological Control Officer (08) 8999 4567