

Table S3 : GenBank numbers for the sequences used in the phylogenetic analyses

Genus	Species	Accession	<i>ITS</i>	<i>matK</i>	<i>CYP1</i>	<i>eiFla</i>	<i>SUS</i>	<i>TIP1;1</i>
	<i>A. afraspera</i>	LSTM1	FM242584*	KT821176*	MF177955 MF177956 MF177957 MF177958	KT821096* KT821097* KT821098*	KT821123* KT821124* KT821125*	MF281545 MF281546 MF281547 MF281548
	<i>A. americana</i>	PI544122	FM242590*	MF281585	MF177961	MF177991	MF178021	MF281551
	<i>A. aspera</i>	IRRI013020	FM242623*	KT821181*				
	<i>A. ciliata</i>	IRRI013078	FM242624*	MF281598				
	<i>A. crassicaulis</i>	LSTM13	FM242594*	KT821185*				
	<i>A. cristata</i>	ILRI16880	KT821169*	KT821206*				
	<i>A. deamii</i>	LSTM24	KC540625*	MF281594	KC899136*	KC899151*	KC899182*	MF281553
	<i>A. deightonii</i>	Lopez Poveda 204	MF281641	MF281612				
	<i>A. denticulata</i>	IRRI13003	FM242626*	MF281599				
	<i>A. elaphroxylon</i>	LSTM112	KC540624*	KT821187				
	<i>A. evenia</i> ssp. <i>evenia</i>	CIAT22838	KC163299*	KT821190*	KC163219*	KC163232*	KC163271*	MF281555
	<i>A. evenia</i> ssp. <i>serrulata</i>	IRFL6945	KC163288*	MF281601				
	<i>A. filosa</i>	CIAT22466	KC540623*	MF281596	KC899134*	KC899149*	KC899180*	MF281554
	<i>A. fluitans</i>	CPI052338	KC540622*	KT821207*				
	<i>A. fluminensis</i>	LSTM17	FM242598*	MF281588	MF177962	MF177992	MF178022	MF281552
	<i>A. indica</i> 4x	PI196206	FM242601*	MF281604				
	<i>A. indica</i> 6x (Africa)	LSTM19	KC899205*	MF281605				
	<i>A. indica</i> 6x (Australia)	PI 257662	MG257910*	MH325202				
	<i>A. mediocris</i>	Bingham 10508	MF281642	MF281613				
<i>Aeschynomene</i> subgenus	<i>A. montevidensis</i>	LSTM131	KC540621*	MF281590	MF177963	MF177994	MF178024	MF281556
<i>Aeschynomene</i>	<i>A. nilotica</i>	IRRI014040	KC560767*	KT821193*				
	<i>A. paraguayensis</i>	T.M. Pedersen 9301	MF281635	MF281591				
	<i>A. parviflora</i>	IRFL02854	KC540620*	MF281589				

	<i>A. pfundii</i>	LSTM54	FM242629*	KT821195*				
	<i>A. pratensis</i>	IRRI13006	FM242630*	MF281611				
	<i>A. rostrata</i>	600445344	MF281638*	MF281595				
	<i>A. rudis</i>	LSTM56	FM242631*	MF281606				
	<i>A. scabra</i>	PI296044	FM242604*	MF281607				
	<i>A. schimperi</i> 4x	IRRI012146	FM242625*	KT821186*				
	<i>A. schimperi</i> 4x	ILRI000659	KT821160*	KT821196*				
	<i>A. schimperi</i> 8x	IRRI012156	FM242633*	KT821199*				
	<i>A. schimperi</i> 8x	ILRI013814	KT821166*	KT821203*				
	<i>A. selloi</i>	CPI104040	KC899207*	MF281610				
	<i>A. sensitiva</i>	LSTM28	FM242607*	MF281609				
	<i>A. sp</i> (328)	CIAT 8499	MG257911*	MH325203				
	<i>A. sp</i> (353)	AusTCFC 84952	MG257912*	MH325204				
	<i>A. tambacoudensis</i>	LSTM60	FM242634*	MF281597				
	<i>A. uniflora</i>	IRRI013158	FM242635*	KT821207*	MF177959	KT821121*	KT821148*	MF281549
					MF177960	KT821122*	KT821149*	MF281550
	<i>A. unijuga</i>	Jalisco 1952	MF281634	MF281587				
	<i>A. villosa</i>	PI546550	FM242619*	MF281586				
	<i>A. virginica</i>	LSTM63	KC560766*	MF281608				
<i>Aeschynomene</i> subgenus <i>Bakerophyton</i>	<i>A. lateritia</i>	8384	-	MF281628				
	<i>A. pulchella</i>	32798	MF281654	MF281627				
	<i>A. abyssinica</i>	ILRI13761	MF281650	MF281622	MF177977	MF178005	MF178036	MF281571
					MF177978	MF178006		MF281572
	<i>A. abyssinica</i>	ILRI7705	MF281651	MF281623				
<i>Aeschynomene</i> subgenus <i>Rueppellia</i>	<i>A. bella</i>	ILRI18422	KC540628*	MF281624	MF177975	MF178007	MF178037	MF281569
					MF177976	MF178008		MF281570
	<i>A. heurckeanae</i>	LSTM310	MF281652	MF281625				
	<i>A. pigmaea</i>	LSTM321	MF281653	MF281626				

<i>Aeschynomene</i> unclassified	<i>A. patula</i>	CPI052332	MF281636	MF281592	MF177964	MF177993	MF178023	MF281557
	<i>A. schindleri</i>	P001468	MF281637	MF281593				
<i>Bryaspis</i>	<i>B. humularioides</i>	Burgt 1734	MF281647	MF281619	MF177985 MF177986	MF178015 MF178016	MF178043 MF178044	MF281579 MF281580
	<i>B. lupulina</i>	KG369400	MF281646	MF281618	MF177983 MF177984	MF178013 MF178014	MF178041 MF178042	MF281577 MF281578
<i>Cyclocarpa</i>	<i>C. stellaris</i>	KG246518	MF281644	MF281615	MF177966 MF177967	MF177996 MF177997	MF178026 MF178027	MF281559 MF281560
<i>Geissaspis</i>	<i>G. cristata</i>		MF281648	MF281620	MF177987 MF177988	MF178017 MF178018	MF178045 MF178046	MF281581 MF281582
	<i>G. tenella</i>		MF281649	MF281621	MF177989 MF177990	MF178019 MF178020	MF178047 MF178048	MF281583 MF281584
<i>Humularia</i>	<i>H. descampsii</i>	ILRI16882	MF281657	MF281632	MF177971 MF177972	MF178001 MF178002	MF178032 MF178033	MF281565 MF281566
	<i>H. kapiiriensis</i>		MF281658	MF281633	MF177973 MF177974	MF178003 MF178004	MF178034 MF178035	MF281567 MF281568
<i>Kotschya</i>	<i>K. africana</i>		MF281655	MF281630				
	<i>K. lutea</i>		KC560762*	MF281629	MF177979 MF177980	MF178009 MF178010	MF178038 MF178039	MF281573 MF281574
	<i>K. strigosa</i>		MF281656	MF281631	MF177981 MF177982	MF178011 MF178012	MF178040 MF178041	MF281575 MF281576
<i>Smithia</i>	<i>S. abyssinica</i>	ILRI8360	KC560763*	MF281616	MF177968	MF177998	MF178028 MF178029	MF281561 MF281562
	<i>S. sensitiva</i>	ILRI23833	MF281645	MF281617	MF177969 MF177970	MF177999 MF178000	MF178030 MF178031	MF281563 MF281564
<i>Soemmeringia</i>	<i>S. semperflorens</i>	CIAT9844	MF281643	MF281614	MF177965	MF177995	MF178025	MF281558
Outgroup	<i>Pictetia angustifolia</i>		AF068171*	AF203579*				

*: Sequences previously published in Chaintreuil *et al.*, 2013, 2016a, 2018 and Arrighi *et al.*, 2012, 2013, 2014 or directly retrieved from GeneBank.