**S2 Table. List of the studied material of Malvidae used for the divergence age estimate.**

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| --- | --- | --- | --- |
| **Taxón** | **Origin / Source / Collector** | **GenBank accession number (matK)** | **Cite** |
| *Aethionema grandiflora* L. | Germany / Botanic Garden Jena / s.n. | AF144354 | Koch et al (2001) |
| *Alliaria petiolata*L. | Thüringen, Jena, Germany / \_ / leg. KOCH | AF144363 | Koch et al (2001) |
| *Anisoptera marginata* Korth. | \_ / K / Chase 2486 | AJ581409 | Hilu et al (2003) |
| *Apophyllum anomalum*F. Muell. | \_ / MO / Covery 12044 | AY483227 | Hall et al (2004) |
| *Arabidopsis lyrata* (L.) O’Kane and Al-Shehbazssp. *lyrata* | Bash-Bish, Birkshire Cty, MA, USA / \_ / leg.MITCHELL-OLDS | AF144342 | Koch et al (2001) |
| *Arabis glabra* (L.) Bernh | Niedersteinbeck, NRW, Germany / \_ / leg. KOCH | AF144333 | Koch et al (2001) |
| *Armoracia rusticana* G.Gaertn., B.Mey. & Scherb. | \_ / \_ / \_ | FN597648 | Bakker et al (2009) |
| *Batis maritima* L. | \_ / WIS / Iltis 30500 | AY483219 | Hall et al (2004) |
| *Bixa orellana* L. | \_ / BONN / A. Worberg 040 | FM179929 | Worberg et al (2009) |
| *Bombax buonopozense* P. Beauv | \_ / WIS / Alverson s.n. | AY321171 | Nyffeler et al (2005) |
| *Brassica napus* L. | \_ / IPK (Institute of Plant Genetics and Crop Plant Research, Germany), CR162-95 / \_ | AB354273 | Lu et al (2008) |
| *Brestchneidera sinensis* Hemsl. | \_ / WIS / Leu & Lin 726 | AY483220 | Hall et al (2004) |
| *Cadaba virgata* Boj. | \_ / MO / Lewis et al. 534 | EU371753 | Hall (2008) |
| *Cakile maritima* Scop. | \_ / MO / Beilstein 01-76 | GQ424577 | Couvreur et al (2010) |
| *Capparis spinosa* L. | \_ / K / Chase 2751 | AY491650 | Hilu et al (2003) |
| *Capsella bursa-pastoris* L. | \_ / \_ / \_ | HQ619802 | Ferri et al (2008) |
| *Cardamine hirsuta* L. | \_ / \_ / \_ | HQ619803 | Ferri et al (2008) |
| *Cardaria draba* (L.) Desv. | Azores / BM / H. Schaefer 2008-295 | HM850735 | Schaefer et al (2011) |
| *Carica papaya* L. | \_ / \_ / Chase 2508 | AY042564 | Cuenoud et al (2002) |
| *Caylusea latifolia* P. Taylor. | Eritrea, Asmera town / UPS / O. Ryding 1486 | GQ891209 | Martín-Bravo et al (2010) |
| *Cleome hassleriana* Chodat | \_ / K / Chase 3015 | AY491649 | Hilu et al (2003) |
| *Cleome pilosa* Benth. | \_ / WIS / Iltis 30585 | AY483231 | Hall et al (2004) |
| *Cleome viridiflora* Schreb. | \_ / MO / Solomon s.n. | AY483232 | Hall et al (2004) |
| *Cochlearia danica* L. | Borkum, Lower Saxony, Germany / \_ / Leg. KOCH | AF174531 | Koch et al (2001) |
| *Coronopus squamatus*(Forssk.) Asch. | Azores / BM / H. Schaefer 2008-526 | HM850736 | Schaefer et al (2011) |
| *Crateva palmeri* Rose | \_ / WIS / Hall 105 | AY483229 | Hall et al (2004) |
| *Cylicomorpha parviflora* Urban | Nairobi, Kenya / \_ / Muasy A.M. | AY461575 | Kyndt et al (2005) |
| *Daphne bholua* Buch. | \_ / BONN / A. Worberg 026 | FM179927 | Worberg et al (2009) |
| *Descurainia sophia* (L.) Webb ex Prantl | \_ / MO / Beilstein 01-19 | GQ424581 | Couvreur et al (2010) |
| *Dombeya spectabilis* Boj. | \_ / WIS / Alverson 4008 | AY321173 | Nyffeler et al (2005) |
| *Erophila verna* (L.) DC. | \_ / \_ / \_ | HQ619804 | Ferri et al (2008) |
| *Erysimum handel-mazzettii* Polatschek | China, Yunnan, Zhongdian / KUN / Yue0 369 | DQ409262 | Yue et al (2006) |
| *Floerkea proserpinacoides* Willd. | \_ / MICH / Reznicek 8609 | EU002178 | Wang et al (2009) |
| *Forchhammeria trifoliata* Radlkofer | \_ / WIS / Hansen 3002 | AY483245 | Hall et al (2004) |
| *Gerrardina foliosa* Oliv. | \_ / KEW / Balkwill et al. 11983 | FM179924 | Worberg et al (2009) |
| *Gyrostemon thesioides* (J.D. Hook) A.S. George. | Australia, Naraacorte / MA / C.R. Alcock 3115 | FJ212199 | Martín-Bravo et al (2009) |
| *Halimium lasianthum* (Lam.) Spach lasianthum | Málaga, Spain / \_ / P. Vargas 3PV06 | GQ281698 | Guzman et al (2009) |
| *Halimolobos jaegeri* (Munz) Rollins | \_ / \_ / \_ | DQ406763 | Oyama et al (2008) |
| *Helianthemum scopulicola* L. | cultivated / MA / B. Guzmán 67BGA04 | DQ092970 | Guzman & Vargas (2005) |
| *Heliophila variabilis* Burch. ex DC. | \_ / \_ / \_ | GQ424588 | Couvreur et al (2010) |
| *Hibiscus syriacus* L. | USA / cultivated (TENN) / R. Small s.n. | EF207270 | Koopman & Baum (2008) |
| *Hornungia petraea* Rchb. | \_ / NMW, NMW3528 / \_ | JN893991 | de Vere et al (2012) |
| *Iberis amara* L. | \_ / \_ / Mummenhoff 1695 | GQ424589 | Couvreur et al (2010) |
| *Isatis tinctoria*L. | Tajikistan / IPK (Institute of Plant Genetics and Crop Plant Research, Germany), (ISA 23/03) / \_ | AB354278 | Lu et al (2008) |
| *Jacaratia digitata* (Poeppig et Endl.) Solms.-Laubach | Zamora, Ecuador / RUG36, GENT / Romeijin-Peeters E.H. et Romero J.P. | AY461574 | Kyndt et al (2005) |
| *Koeberlinia spinosa* Zucc.  | \_ / MO / Al Shehbaz s.n. | AY483222 | Hall et al (2004) |
| *Lepidium apetalum* Willd. | \_ / KUN / SCSB-HNJ-0228 | JF954301 | Li et al (2011) |
| *Lepidium campestre* (L.) W.T.Aiton | Ontario, Canadá / "University / of Guelph Herbarium, OAC 89379" / AP464 | HQ593342 | Burgess et al (2011) |
| *Lepidium heterophyllum* (DC.) Bentham | \_ / NMW, NMW3532 / \_ | JN894631 | de Vere et al (2012) |
| *Lepidium latifolium* L. | \_ / NMW, NMW3534 / \_ | JN894790 | de Vere et al (2012) |
| *Lepidium perfoliatum* L. | \_ / \_ / \_ | DQ406766 | Oyama et al (2008) |
| *Lepidium ruderale* L. | \_ / KUN / LiuJQ0149 | JF954308 | Li et al (2011) |
| *Luehea seemannii* Triana & Planch. | \_ / BCI 735189 / \_ | GQ982036 | Kress et al (2009) |
| *Maerua kirkii (*Oliv.) F. White | \_ / WIS / Hall 261 | AY483230 | Hall et al (2004) |
| *Moringa oleifera* Lam. | \_ / WIS / Iltis 30500 | AY483223 | Hall et al (2004) |
| *Nasturtium officinale* R.Br. | \_ / WIS / Stahmann 233 | AY483225 | Hall et al (2004) |
| *Neslia paniculata* (L.) Desv. | \_ / \_ / \_ | DQ406767 | Oyama et al (2008) |
| *Noccaea cochleariformis* (DC.) A.Love & D.Love | \_ / MO / Beilstein 01-21 | GQ424598 | Couvreur et al (2010) |
| *Ochradenus baccatus* Delile. | Somalia, Mait/ UPS / M. Thulin 4351 | GQ891194 | Martín-Bravo et al (2010) |
| *Oligomeris linifolia* MacBride | \_ / WIS / Ertter 5613 | AY483240 | Hall et al (2004) |
| *Peddiea africana* Plant ex Meisn | \_ / \_ / \_  | FJ572800 | Motsi et al (2010) |
| *Pentadiplandra brazzeana* Baill. | \_ / WIS / Hall 263 | AY483239 | Hall et al (2004) |
| *Podandrogyne decipiens* (Triana & Planch.) Woodson | \_ / WIS / G. Mora 380 | EU371815 | Hall (2008) |
| *Raphanus landra* Moretti ex DC. | Russia / IPK (Institute of Plant Genetics and Crop Plant Research, Germany), RA230-80 / \_ | AB354265 | Lu et al (2008) |
| *Reseda crystallina* Webb & Berthel. | Spain, Canary Islands, Fuerteventura / LD / S. Snogerup 16461 | FJ212200 | Martín-Bravo et al (2009) |
| *Reseda lutea* L. | \_ / WIS / Rodman 535 | AY483241 | Hall et al (2004) |
| *Reseda luteola* L. | Greece, Crete / UPOS / S. Martín-Bravo 391SMB05 | FJ212206 | Martín-Bravo et al (2009) |
| *Rorippa islandica* (Oeder) Borbás | \_ / \_ / \_ | DQ406770 | Oyama et al (2008) |
| *Sesamoides purpurascens* (L.) G. López. | Spain, Seville, El Castillo de las Guardas / UPOS / S. Martín-Bravo 36SMB04 | FJ212208 | Martín-Bravo et al (2009) |
| *Sisymbrium irio* L. | \_ / SENDAI Arabidopsis Seed Center / JOS18 | AF144366 | Koch et al (2001) |
| *Stanleya pinnata* (Pursh) Britton | California, USA / HUH (Harvard University Herbaria) / 1735-69 | JN585005 | Hall et al (2011) |
| *Sterculia tragacantha* Lindl. | \_ / WIS / Alverson 4011 | AY321178 | Nyffeler et al (2005) |
| *Tapiscia sinensis* Oliver | \_ / K / M. W. Chase 1201 | EU002190 | Wang et al (2009) |
| *Tersonia cyathiflora* (Fenzl) A.S.George | \_ / Cranfield PERTH no. 02068682 / \_ | AY483238 | Hall et al (2004) |
| *Thlaspi arvense* L. | Hagen a.T.W., Lower Saxony, Germany / \_ / leg. KOCH | AF144360 | Koch et al (2001) |
| *Thymelaea hirsuta* Endl. | \_ / K / M. W. Chase 1882 | EU002191 | Wang et al (2009) |
| *Tovaria pendula* Ruiz. & Pav. | \_ / WIS / Smith and Smith 1834 | AY483242 | Hall et al (2004) |
| *Tropaeolum majus* L. | \_ / WIS/ Rodman 529 | AY483224 | Hall et al (2004) |
| *Vella pseudocytisus* L. subsp. *paui* Gómez-Campo | \_ / K, ABH / Mateo 5-V-9 | GQ248209 | Hollingsworth et al (2009) |

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