

## Data Supplements “Affinities and architecture of Devonian trunks of *Prototaxites loganii*”

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### Notes S1 Evidence against algal affinities

Schweitzer (1983) reconstructed compressions of “*Prototaxites* cf. *P. loganii*” (here regarded as *Mosellophyton hefteri*) as a kelp-like alga of deep river channels and oxbow lakes, and was especially impressed by the thin flexuous branches of that species. However, the bases of *M. hefteri* trunks are very stout (Schaarschmidt 1974), and its overall proportions comparable with *Prototaxites loganii* and terrestrial vascular land plants (Fig. S4). Kelp has very different proportions with hollow flexuous stems narrowed near the base and capable of bending with unusually strong waves and currents (Koehl and Wainright 1977).

The histology of *Prototaxites loganii* with three distinct size-classes of tubular cells, investing and surrounding clusters of small coccoid cells (Figs. 4-5) is unlike any histology known in fossil algae. The tubular cells of *Prototaxites* rarely taper or dichotomize like filaments of green algae (Retallack 1983). Nor do tubular cells of *Prototaxites* resemble equant parenchymatous cells of red and brown algae (Koehl and Wainright, 1977; Taylor et al. 2009).

Like the New York Schunnemunk tree, *Prototaxites loganii* in Quebec is found mainly in fluvial paleochannels, distinct from plant assemblages of trimerophytes and zosterophylls associated with weakly developed gleyed paleosols (Griffing et al. 2000; Hotton et al. 2001). Nevertheless, vertical inclusions of other vascular land plants are common within permineralized *Prototaxites* from Quebec and Australia, as if it overgrew nearby vascular land plants (Hueber 2001). Unusually wide root-like structures of diffuse and anastomosing threads, unlike woody and fibrous root traces of tracheophyte fossils, have been noted in calcareous, red, carbon-lean Early Devonian paleosols in both Quebec (Dreise and Mora, 2001) and Wales (Hillier et al. 2008). Thin sections of a comparable, diffusely filamentous, root-like structure illustrated by Dreise and Mora (2001) from red paleosols in the Late Silurian (Ludlovian) Bloomsburg Formation of Pennsylvania are also associated with abundant prototaxaleans (Strother 1988). Such evidence of large nematophytes in association with erect vascular land plants in formerly well drained, carbon-lean paleosols is additional evidence against interpretation of *Prototaxites* as an aquatic alga.

### Notes S2 Evidence against liverwort affinities

Graham et al. (2010) proposed that *Prototaxites* was not really a trunk or log, but a rolled mat of thallose plants, especially marchantialean liverworts. However evidence for branching (Figs. 1-2) and observed taper of *Prototaxites loganii* (Fig. S4) falsifies such an interpretation.

Histological objections to interpretation of *Prototaxites* as a rolled mat of land plants are detailed by Taylor et al. (2010). The tubular cells of *Prototaxites* are unlike the

tracheids of vascular land plants or the hydroids of liverworts, hornworts, mosses, and other enigmatic early terrestrial fossils (Edwards, 1986; Edwards *et al.*, 1995). The growth rings of *Prototaxites* are not separate rolls of a mat, but continuous tissue breached by radial rays (Fig. 5B). The subdermal vacuity (Figs 3A, 3F-G) is not a rolled mat either, because it is connected to the layer beneath by dermal invaginations and cortical nests.

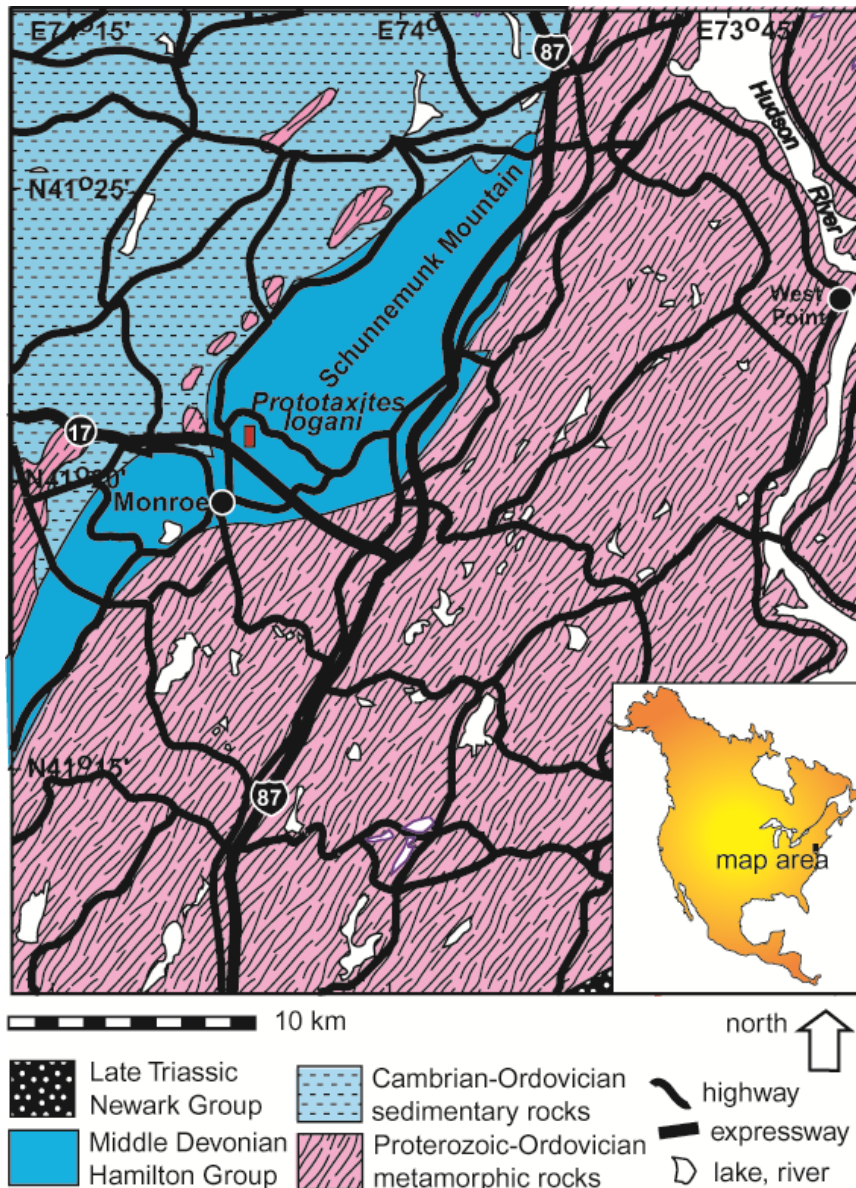
### Notes S3 History of collection of the Schunnemunk tree

*Prototaxites* is mainly known from fragments which reveal little of the overall size of this problematic fossil that is widespread in Silurian and Devonian rocks (Hueber 2001). One exception is the Schunnemunk tree in the New York State Museum. A local farmer, Ogden Cooley, first reported the fossil to the New York State Geological Survey in 1870. Cooley had excavated the entire 8.83 m length of the fossil by September 1895, when it was measured and inspected by Ries (1897). Parts of the fossil had been collected and dispersed by then, but in 1898 the uppermost 2.13 m was collected for the New York State Museum, and additional measurements were taken by Nevius (1900). This spectacular fossil tree with branch bases was on display in the museum from 1902 to 1976, but it is now in storage (as NYSM 13793).

At the time of discovery, pieces of the silica-permineralized Schunnemunk tree were sent to experts for identification. In 1890, Prosser sent specimens to F.H. Knowlton of the U.S. Geological Survey, and he forwarded one to D.P. Penhallow (1893) of McGill University, who prepared thin sections and described this fossil as “*Nematophyton crassum*”, while noting similarities of cell structure in a spectrum ranging from poor preservation like that of “*Celluloxylon primaevum*” to excellent preservation like that of “*Nematophyton Loganii*”. Clarke (1900, p. 675) reported a final identification of the Schunnemunk tree “which has, by favor of Prof. P.D. Penhallow of McGill University, been identified with his *Nematophytum logani*.” The Schunnemunk tree has been included within *Prototaxites loganii*, Family Prototaxaceae, Order Prototaxales by Hueber (2001, p. 145), but Edwards et al. (2013) include it within the Order Nematophytales.

Unpermineralized compressions of fossil branches attributed to *Prototaxites* sp. were collected by one of us (GJR) in 2011 from the same locality where Nevius (1900) noted they had been left behind in 1898. These specimens agree with his description as “so compressed that it was difficult to trace any particular one for any distance” (Nevius 1900, p. 80). The recovered limbs are now specimens NYSM 17462 and 17463. Also found in the same layers was a poorly preserved impression of the early equisetalean *Prosseria grandis* Read (1953; NYSM 17464).

This study reports additional observations of the fossil quarry and of the trunk and branches of the Schunnemunk tree. In addition, petrographic thin sections were prepared of the outermost layer of the tree, which is not often preserved in permineralized specimens of *Prototaxites* due to decortication (Hueber 2001). These thin sections were



**Fig. S1.** Simplified geological map and locality of the Schunnemunk tree in Middle Devonian, Bellvale Sandstone near Monroe, New York (after Fisher et al. 1970).

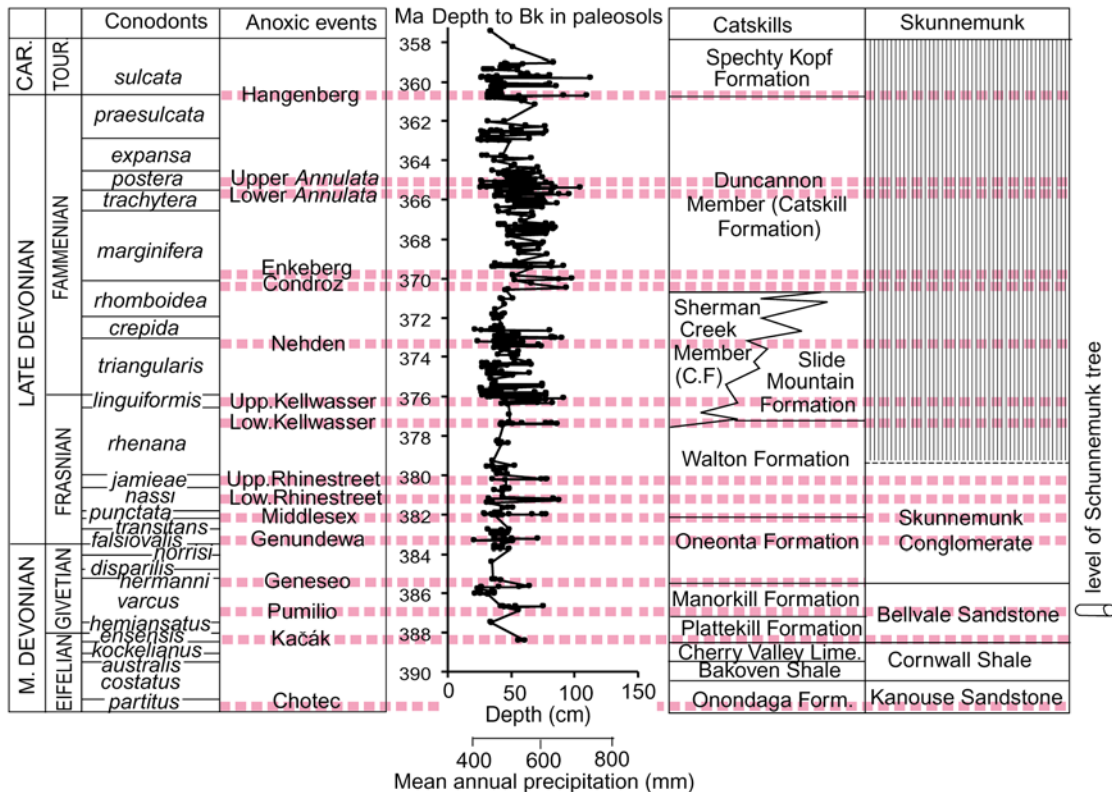
from a separate fragment of the Schunnemunk tree in the New York State Museum labelled “NYSM #13697 *Nematophyton logani* Dawson (fragment of holotype). Section no. 1 of F. Hueber”. This is certainly not the holotype of *Prototaxites loganii* from Quebec, which is much blacker, harder, and itself a fragment (Hueber 2001). The name and “holotype” designation is from Clarke (1900), referring to the material from the Schunnemunk tree described by Penhallow (1893) as “*Nematophyton crassum*”: original saw cuts on specimen NYSM 13697 mark it as the likely source of Penhallow’s specimen. Hueber (2001) acknowledges seeing this specimen, but not the Schunnemunk tree. The low curvature, color and texture of specimen NYSM 13697 are compatible with derivation from just below the base of the large trunk (NYSM 13793). Fractures in the Schunnemunk tree (NYSM 13793) were repaired with plaster and painted to resemble the

rest of the trunk for 1902 exhibition, and specimen NYSM 13697 would have been included in these elaborate repairs if from the repaired length of trunk. Other specimens of *Prototaxites* from the Cooley quarry included limbs 14 cm in diameter 6 m from the main trunk (Prosser 1902), narrower than NYSM 13597. These are unlikely to be connected, but no others were as large as the main trunk or the fragment analyzed.

**Notes S4** Rediscovery of original fossil site

A search for the locality of the Schunnemunk tree relocated the site “a mile and a half northward of the village of Monroe” in Orange County (Fig. S1), in a small quarry that matches the photographs and stratigraphic level (Fig. S2) specified by Nevius (1900). The distinctive excavated alcove is 2.5 m wide, 3 m deep, and 9 m long, and is 200 m southwest of the junction of Seven Springs and Seven Springs Mountain Roads (N 41.35560° W 74.17876° : position taken in field using a Garmin 12 track GPS, and confirmed on Google Earth). The alcove is perpendicular to the long wall of a large flagstone quarry, and now completely overgrown by trees (Fig. S3).

The fossil site is within the middle Bellvale Sandstone of the easternmost Hamilton Group in New York (Fig. S2). The Bellvale Sandstone is at least Middle Devonian (early Givetian) age based on marine fossils in the underlying Cornwall Shale (Ries 1895), which are comparable with the Hamilton Group fauna of Brett et al. (2009).



**Fig. S2.** Stratigraphic setting of the Schunnemunk tree in the Schunnemunk-Green Pond outlier (Herman and Mitchell 1991) compared with paleoclimatic and biostratigraphic subdivisions of the Catskill Mountains to the west (after Retallack and Huang 2011).





**Fig. S3.** Excavation alcove for the Schunnemunk tree in the flagstone quarry north of Monroe, New York: (a) view into alcove from main quarry to south; (b), detail of trough cross bedding in eastern wall; (c) view south out over the lip of the fossil bearing surface (this is the same view as shown in Plate I of Nevius 1900). Hammers are 30 cm long.

In the western Catskills closest to the Schunnemunk-Green Pond outlier (Herman and Mitchell 1991), the Hamilton marine fauna is found in the Bakoven Shale and Cherry Valley Limestone through the Mount Merino Formation, and further southwest in Pennsylvania within the Mahantango Formation (Fisher et al. 1970). Coarse-grained

sediment of the overlying Skunnemunk Conglomerate (this spelling of the formation name follows an earlier spelling of the locality name) may be correlated with late Givetian progradation of the Catskill Delta (upper Manorkill to lower Oneonta formations; Retallack and Huang 2011). The age of the Schunnemunk tree is thus middle Givetian (ca. 386 Ma: Gradstein et al. 2012).

The Schunnemunk tree was not in its place of growth within a paleosol, but found lying prone within sandstones with trough cross bedding and claystone breccias characteristic of a fluvial paleochannel (Fig. S3), like those documented from rocks of comparable age in the Catskill Front to the west (Bridge, 2000). Claystone breccia clasts (found in the recessive weathering layer immediately above the hammer head in Fig. 3B) include root traces and clay skins, and are mostly dark greenish grey (Munsell colour 5G5/1), rarely weak red (5R4/3), like Middle Devonian (Givetian) paleosols 50 km to the west on the Catskill front (Mintz et al. 2010; Retallack and Huang 2011). The Schunnemunk tree cut across bedding planes as shown by the unusual orientation of the apical branching portion, which lay stratigraphically lower than the flaring base (Nevius 1900). Presumably it drifted into place within the accumulating sands of a stream, and the branched upper part snagged and was buried before the floating base.

### Notes S5 Terminology

*Prototaxites* has been described here and by Hueber (2001) using a non-genetic terminology. Its interpretation as a basidiocarp by Hueber (2001) used terms for its various features that are different from the terms appropriate to the lichen interpretation offered here. A comparison of these three sets of terms are given in Table I.

**Supplementary Table I.** Mycological versus lichenological terminology for *Prototaxites*

Non-genetic terminology	Basidiomycota (Hueber 2001)	Lichen (herein)
Trunk	Basidiocarp	Podetium
Growth ring	Growth ring	Growth ring
Branch	Branch	Branch
Dermal flange	Rib	Rib
Wrinkle	Rugosity	Squamule
Wide (18–50 µm) tubular cells	Skeletal hyphae	Prosoplectenchyma
Narrow (5–7 µm) tubular cells	Binding hyphae	Paraplectenchyma
Curling (12–45 µm) cells	Generative hyphae	Enmeshing hyphae
Subdermal nest	Coltricial cluster	Live cephalodium
Cortical nest	Coltricial cluster	Dead cephalodium
Flared cell ending	Coltricial cluster	Appressorium
Lateral cell protrusions	Partial clamp connections	Appressoria
Cell cross wall	Septa	Septa
Perforate cross wall	Dolipore	Septal pore
Dermal invagination	Gill	Cortical pore
Sharply tapering cell	Protosterigma and spiculum	Phialide (parasitic?)
Much branched cells	Dendrophyses	Haustoria (parasitic?)
Subdermal vacuity	Interior hollow	Photobiont layer
Cocoid cell	Inclusion	Photobiont

**Supplementary Table II.** Branch sizes and divergences of the Schunnemunk tree

Specimen	Branch number	Diameter (mm)	Divergence angle outward from stem (°)
NYSM13793	1	101	30
NYSM13793	2	111	20
NYSM13793	3	93	20
NYSM13793	4	95	25
NYSM13793	5	105	20
NYSM13793	6	111	20
NYSM17463	x	96	x
NYSM17463	x	79	x
NYSM17462	x	89	x

**Supplementary Table III.** Widths of branch wrinkles on the Schunnemunk tree.

Specimens	Width of wrinkle out from branch (mm)
NYSM17463	9
NYSM17463	9
NYSM17463	8
NYSM17463	7
NYSM17463	8
NYSM17463	11
NYSM17463	10
NYSM17463	12
NYSM17463	14
NYSM17463	13
NYSM17463	12
NYSM17463	10
NYSM17463	8
NYSM17463	13
NYSM17463	11
NYSM17463	7
NYSM17463	14
NYSM17463	15
NYSM17463	13
NYSM17462	11
NYSM17462	21
NYSM17462	12
NYSM17462	10
NYSM17462	13
NYSM17462	14
NYSM17462	13
NYSM17462	9
NYSM17462	18
NYSM17462	17
NYSM17462	16
NYSM17462	11
NYSM17462	12
NYSM17462	9

**Supplementary Table IV.** Carbon isotopic data for the Schunnemunk tree

Specimen	Organic carbon isotope value ( $\delta^{13}\text{C}_{\text{VPDB}}$ average $\pm$ standard deviation )	Organic carbon (weight % average $\pm$ standard deviation)	Number of analyses
NYSM17462	-26.23 $\pm$ 0.24	0.46 $\pm$ 0.02	3
NYSM17462	-26.34 $\pm$ 0.18	0.59 $\pm$ 0.04	3
NYSM17463	-25.94 $\pm$ 0.07	0.18 $\pm$ 0.01	3
NYSM17463	-26.13 $\pm$ 0.21	0.11 $\pm$ 0.00	3
NYSM17463	-26.22 $\pm$ 0.69	0.38 $\pm$ 0.04	3
NYSM13697a	-24.89 $\pm$ 0.13	33.10 $\pm$ 2.49	3
NYSM13697b	-25.08 $\pm$ 0.02	9.50 $\pm$ 1.11	3
NYSM13697c	-25.04 $\pm$ 0.06	21.92 $\pm$ 2.74	3
NYSM13697d	-25.01 $\pm$ 0.13	37.51 $\pm$ 0.21	3
NYSM13697e	-25.13 $\pm$ 0.06	11.50 $\pm$ 1.16	3

Note: Analyses by Bill Hagopian in University of Hawaii Laboratory of A. Hope Jahren by combustion in a Eurovector element analyzer (EURO.EA3000) and analysis in an Isoprime continuous-flow stable isotope mass spectrometer.

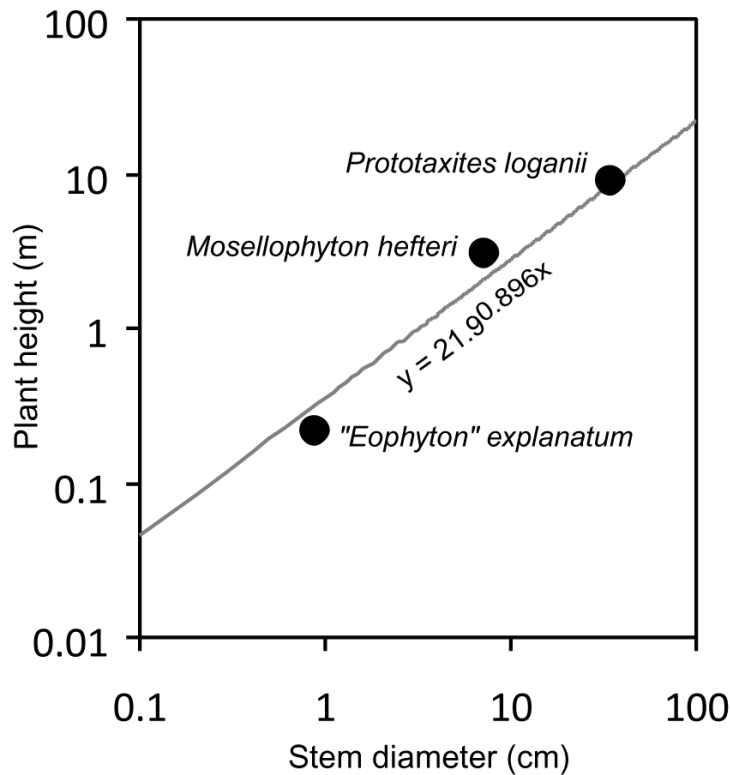
### Notes S6 Measurements and carbon isotopic analyses

Tables II and III are measurements of branches and branch wrinkles on the Schunnemunk tree. Table IV is raw carbon isotopic analyses of the trunk and branches of the Schunnemunk tree.

### Notes S7 Other fossil nematophytes

Table V is a summary of all known fossils likely related to the Schunnemunk tree *Prototaxites loganii*, with measured stem diameter and estimated plant height. These fossils not only share histology of tubular cells, but show comparable growth proportions. Other unusually complete nematophyte fossils are too small for measurement of diameter at breast height. For these fossils, stem diameter can be measured at a comparable fraction of length to the Schunnemunk tree ( $1.4/8.83 = 0.16$ ). “*Eophyton explanatum* is an axis 9 mm wide at 0.16 times its total length of 20.5 cm, with branch scars at the apical end (Hicks 1869). Nearly complete remains of *Mosellophyton hefteri* are 7.5 cm wide at 0.16 times its 3 m length (Schweitzer 1983). *Prototaxites loganii* is the largest nematophyte species, ranging from 0.3 to 22 m tall (Hueber 2001), using the allometric relationship of Niklas (1994) on other specimens The tracheophyte power law of Niklas (1994) may predict the height of nematophytes over three orders of magnitude from trees to small shrubs (Fig. S4).





**Fig. S4.** Regression relationship between diameter at breast height (1.4 m) and total height for 670 species of vascular plants (after Niklas 1994), and for two other near-complete nematophyte fossils.

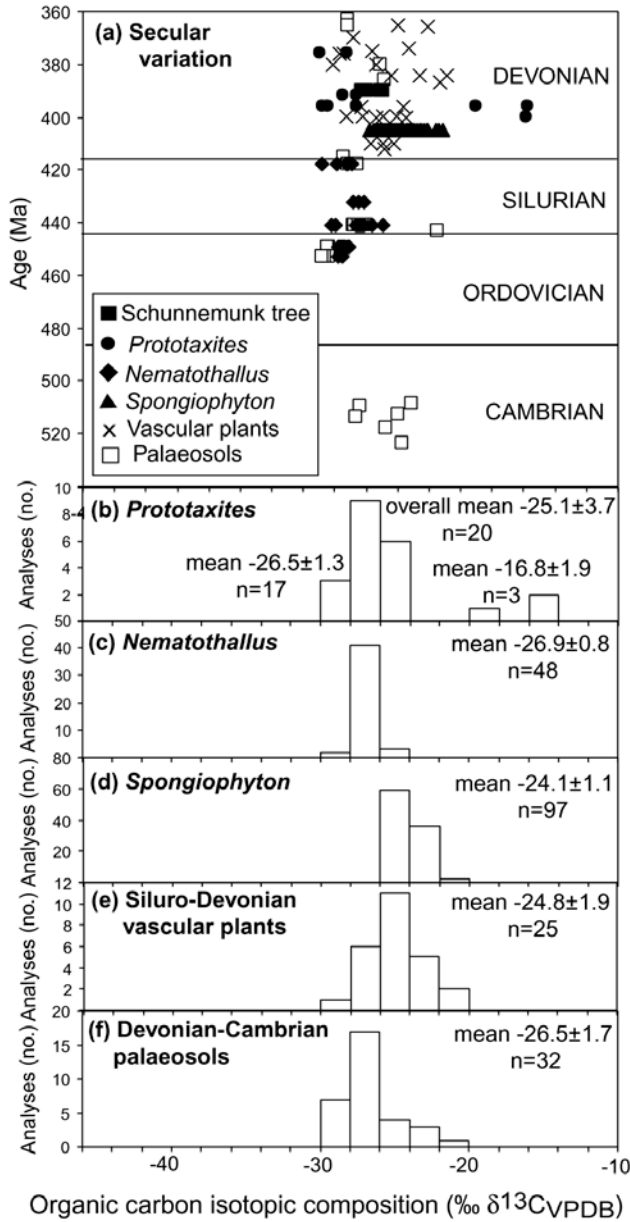
**Supplementary Table V.** Stem diameter ( $D$ ) and estimated height ( $H$ ) of fossil nematophytes.

Taxon	Local stage or zone	Age (Ma)	Formation	Locality	$D$ (cm)	$H$ (m)	References
<i>Croclophyton readi</i>	late Famennian	361	New Albany Shale	Boston, Kentucky, USA	11.5	3.15	Andrews and Alt ,1956
<i>Prototaxites ortonii</i>	lower Famennian	370	Huron Shale	central Ohio, USA	25	6.32	Cross et al., 1996a,b
<i>Prototaxites southwellii</i>	late Frasnian-early Famennian	375	Kettle Point Shale	Kettle Point, Ontario, Canada	16	4.24	Arnold , 1952; Boyce et al., 2007
<i>Prototaxites loganii</i>	Frasnian	380	Dotswood Formation	Caesar's bore, Queensland, Australia	19	4.95	Hueber, 2001
<i>Prototaxites</i> sp.	late Givetian	386	North Gavel Form.	Sloagar, Scotland	15	4.00	Cleal and Thomas, 1995
<i>Prototaxites loganii</i>	middle Givetian	390	Bellvale Sandstone	Schunnemunk Mt., New York	36	8.77	Ries, 1897; Nevius, 1900; Prosser, 1902; Brett et al., 2009
<i>Prototaxites loganii</i>	Givetian	392	Al Jauf Formation	Jebel Qiyal al Kabir, Saudi Arabia	102	22.29	Hueber, 2001
<i>Prototaxites</i> sp.	Emsian-Eifelian	398	Trout Valley Form.	Baxter State Park, Maine	60	13.86	Andrews et al., 1977
<i>Prototaxites loganii</i>	Emsian	400	La Garde Formation	Bordeaux quarries, Quebec, Canada	97.5	21.42	Hueber ,2001
<i>Mosellophyton hefteri</i>	Mid Emsian	403	Nellenköpschichten	Alken, Germany	20	5.18	Schaarschmidt ,1974; Schweitzer, 1983
<i>Prototaxites loganii</i>	earliest Emsian	406	Battery Point Formation	Gros Cap Aux Os, Quebec, Canada	0.914	0.33	Hueber, 2001
<i>Mosellophyton hefteri</i>	basal Emsian	407	Odenspielschichten	Bröltal, Germany	7.5	2.15	Schweitzer ,1983
<i>Prototaxites</i> sp.	early Emsian-late Pragian	407	Taunusquartzit	Lorch, Germany	40	9.64	Altmeyer, 1978

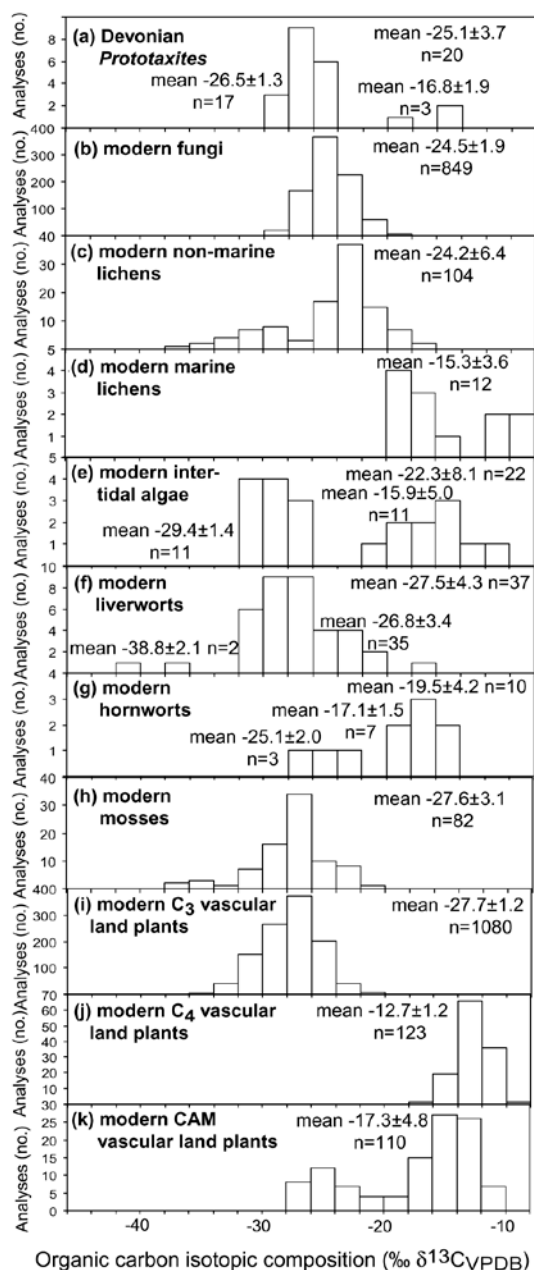
<i>Prototaxites loganii</i>	early Emsian	410	graywacke, Brück	Brück, West Germany	11	3.03	Jonker, 1979
<i>Prototaxites saharianum</i>	early Pragian	411	Tamelrick Formation	Aïr, Algeria	18	4.71	Arbey and Koeniguer, 1979; Guerrak ,1988
<i>Prototaxites sp.</i>	late Lochkovian	412	Ffynnon Limestone	Rhiw-y-fan Gully, Wales	4.1	1.25	Hillier et al., 2008
<i>Prototaxites lafontii</i>	Lochkovian	414	Sandstone	Vimy, France	3	0.95	Arbey and Koeniguer, 1979
<i>Nematasketum diversiformis</i>	<i>microrhatus-newportensis</i> zone = Lochkovian	415	2 m above Psammosteus Ls.	Lye Stream, Wales	3	0.95	Burgess and Edwards ,1988
<i>Nematasketum diversiformis</i>	late Pridolian	416	Freshwater East Formation	Freshwater East Bay, Wales	1	0.35	Lang ,1937; Burgess and Edwards, 1988
<i>Prototaxites sp.</i>	Ludlovian	419	Bloomsburg Form.	Port Clinton, Pennsylvania	3	0.95	Strother, 1988, 1993
<i>Berwynia carruthersii</i>	<i>Cyrtograptus murchisoni</i> zone = Sheinwoodian	427	Pen-y-Glog Slate	Pen-y-Glog quarry, Wales	4.4	1.33	Cleal and Thomas, 1995
cf. <i>Prototaxites sp.</i>	mid-Telychian	431	Major Mitchell Sandstone	Mt Mitchell, Victoria, Australia	32	7.89	Retallack ,2009b
<i>Mosellophyton hefteri</i> .	early Llandoveryan	436	Shawagunk Formation	Delaware Water Gap, Pennsylvania	1.6	0.54	Condon collection specimen F118318A
<i>Lepidotruncus sp.</i>	Hirnantian	445	El Golea Formation	Zmeïlet Barka, Algeria	6	1.76	Arbey and Koeniguer, 1979; Le Heron and Craig, 2008
<i>Lepidotruncus fortis</i>	d5=Katian	448	Kosov Formation	ChodouH, Czech Republic	17	4.48	Fritsch, 1908; KY~ and Pojeta, 1974
<i>Lepidotruncus sp.</i>	Katian	449	Juniata Formation	Beans Gap, Tennessee	4.2	1.28	Condon coll. F114501A
tubes: $\delta^{13}\text{C} = -23.5, -25 \text{‰}$	Sandbian	452	Gull River Form.	Ingham Mills, New York	1	0.35	Argast, 1992
<i>Truncus ramifer</i>	d1 <sup>2</sup> = Darriwillian	472	Skalka Quartzite	Libe•ov, Czech Republic	3	0.95	Fritsch ,1908: KY~ and Pojeta, 1974
" <i>Eophyton</i> " <i>explanatum</i>	earliest Floian	478	Lower Arenig	Ramsay Island, Wales	0.9	0.32	Hicks, 1869, 1872
cf. <i>Prototaxites sp.</i>	Tremadocian	483	Grindstone Range F	Wirrealpa, S. Australia	2.08	0.68	Retallack, 2009a
"land plant?"	<i>Ptychagnostus gibbus</i> zone = early Middle Cambrian	507	Beetle Creek Formation	Mt Murray, Queensland, Australia	0.5	0.18	Fleming and Rigby, 1972; Southgate ,1986

### Notes S8 Carbon isotopic compositions of fossil and living plants

The range of carbon isotopic compositions of various fossils and modern plants is depicted graphically in Figs S4-S5, and listed in Table VI. This is a large compilation of data from literature, all  $\delta^{13}\text{C}$  ‰ versus Vienna Peedee belemnite standard, as for new analyses presented here for the Schunnemunk tree (Table S3). Modern plants have such a wide range of compositions that carbon isotopic values are seldom diagnostic of botanical affinities, and fossil isotopic compositions match those of paleosols in which they lived.



**Fig. S5.** Carbon isotopic composition of paleosols (Mora et al. 1996; Ekart et al. 1999; Retallack 2001, 2008; Tomescu et al. 2009) and fossils, including *Prototaxites* (Boyce et al. 2007; Hobbie and Boyce 2010), *Nematothallus* (Tomescu et al. 2009), *Spongiophyton* (Jahren et al. 2003; Fletcher et al. 2004) and a variety of Silurian–Devonian vascular land plants (Lecuyer and Paris 1997; Beerling et al. 2002; Peters-Kottig et al. 2006; Hobbie and Boyce 2010).



**Fig. S6.** Carbon isotopic composition of *Prototaxites* (Boyce et al. 2007; Hobbie and Boyce 2010), compared with modern fungi (Kohzu et al. 1999; Hobbie et al. 1999, 2001; Henn and Chapela 2001; Taylor et al. 1997, 2003; Trudell et al. 2004; Hart et al. 2006; Clemmensen et al. 2006; Zeller et al. 2007; Mayor et al. 2009), non-marine lichens (Teeri 1981; Máguas et al. 1993, 1995; Máguas and Brugnoli 1996; Smith and Griffiths 1996a,b, 1998; Smith et al. 1998; Jahren et al. 2003; Fletcher et al. 2004), marine lichens (Raven and Johnston 1991; Fletcher et al. 2004), intertidal algae (Surif and Raven 1990; Raven et al. 1995a,b, 2002; Fletcher et al. 2004), liverworts (Rundel et al. 1979; Proctor et al. 1992; Smith and Griffiths 1996a,b; Kao et al. 2000; Jahren et al. 2003; Fletcher et al. 2004; Graham et al. 2010), hornworts (Smith and Griffiths, 1996a,b; Fletcher et al. 2004), mosses (Teeri 1981; Rundel et al. 1979; Smith and

*Griffiths, 1996a,b; Rice and Giles, 1996; Price et al. 1997; Jahren et al. 2003; Fletcher et al. 2004*), *C<sub>3</sub> vascular land plants (Smith and Brown, 1973; Troughton et al. 1977; Vogel et al. 1978; Arens et al. 2000; Diefendorf et al. 2010; Hobbie and Boyce, 2010)*, *C<sub>4</sub> vascular land plants (Smith and Brown, 1973; Vogel et al. 1978)*, and *CAM vascular land plants (Mooney et al. 1977; Troughton et al. 1977; Teeri et al. 1981)*.

**Supplementary Table VI.** Carbon isotopic data for fossil and modern plants and fungi

Category	Ma	ID	d13C ave	References
fossil <i>Nematothallus</i>	418	thalloid fossil	-28.78	Strother, 1988; Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	418	thalloid fossil composite	-26.89	Strother, 1988; Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	418	thalloid fossil composite	-26.92	Strother, 1988; Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	418	thalloid fossil composite	-27.3	Strother, 1988; Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	418	thalloid fossil composite	-27.19	Strother, 1988; Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	418	thalloid fossil composite	-27.3	Strother, 1988; Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	418	thalloid fossil composite	-27.9	Strother, 1988; Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	432	thalloid fossil composite	-26.82	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	432	thalloid fossil composite	-26.85	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	432	thalloid fossil composite	-26.52	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	432	thalloid fossil composite	-26.16	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	441	thalloid fossil composite	-26.13	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	441	thalloid fossil composite	-27.96	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	441	thalloid fossil composite	-28.23	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	441	thalloid fossil composite	-26.4	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	441	thalloid fossil composite	-26.3	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	441	thalloid fossil composite	-26.3	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	441	thalloid fossil composite	-24.94	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	441	thalloid fossil composite	-26.15	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	441	thalloid fossil	-26.63	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	441	thalloid fossil	-26.54	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	441	thalloid fossil composite	-26.36	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	441	thalloid fossil composite	-26.32	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	441	thalloid fossil composite	-26.36	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	441	thalloid fossil composite	-26.31	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	441	thalloid fossil composite	-26.45	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	441	thalloid fossil composite	-26.55	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	441	thalloid fossil composite	-26.21	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	441	thalloid fossil composite	-25.6	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	441	thalloid fossil composite	-25.6	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	441	thalloid fossil composite	-26.4	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	441	thalloid fossil composite	-26.1	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	449	thalloid fossil	-27.81	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	449	thalloid fossil	-27.66	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	449	thalloid fossil	-27.58	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	449	thalloid fossil composite	-27.18	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	449	thalloid fossil composite	-27.1	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	449	thalloid fossil composite	-27.41	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	449	thalloid fossil composite	-27.39	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	449	thalloid fossil	-27.5	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	449	thalloid fossil composite	-27.35	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	453	thalloid fossil	-27.78	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	453	thalloid fossil	-27.76	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	453	thalloid fossil	-27.76	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	453	thalloid fossil	-27.76	Tomescu <i>et al.</i> 2009
fossil <i>Nematothallus</i>	453	thalloid fossil composite	-27.52	Tomescu <i>et al.</i> 2009
fossil <i>Prototaxites</i>	376	<i>Prototaxites southworthii</i>	-28.9	Boyce <i>et al.</i> , 2007; Hobbie & Boyce 2010
fossil <i>Prototaxites</i>	376	<i>Prototaxites southworthii</i>	-27.2	Boyce <i>et al.</i> , 2007; Hobbie & Boyce 2010
fossil <i>Prototaxites</i>	392	<i>Prototaxites spp.</i>	-26.6	Boyce <i>et al.</i> , 2007; Hobbie & Boyce 2010
fossil <i>Prototaxites</i>	392	<i>Prototaxites spp.</i>	-27.4	Boyce <i>et al.</i> , 2007; Hobbie & Boyce 2010
fossil <i>Prototaxites</i>	396	<i>Prototaxites loganii</i>	-28.4	Boyce <i>et al.</i> , 2007; Hobbie & Boyce 2010
fossil <i>Prototaxites</i>	396	<i>Prototaxites loganii</i>	-28.7	Boyce <i>et al.</i> , 2007; Hobbie & Boyce 2010
fossil <i>Prototaxites</i>	396	<i>Prototaxites loganii</i>	-26.6	Boyce <i>et al.</i> , 2007; Hobbie & Boyce 2010
fossil <i>Prototaxites</i>	396	<i>Prototaxites loganii</i>	-26.6	Boyce <i>et al.</i> , 2007; Hobbie & Boyce 2010





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fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-24.31	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-24.24	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-24.21	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-24.21	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-24.18	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-24.17	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-24.12	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-24.1	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-24.1	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-24.07	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-24.01	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-23.94	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-23.92	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-23.9	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-23.89	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-23.88	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-23.85	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-23.78	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-23.75	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-23.74	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-23.71	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-23.67	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-23.65	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-23.48	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-23.45	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-23.42	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-23.34	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-23.31	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-23.24	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-23.19	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-23.16	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-23.16	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-23.11	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-23.11	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-23.09	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-23.07	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-23.06	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-22.98	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-22.97	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-22.74	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-22.64	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-22.54	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-22.51	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-22.36	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-22.21	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-22.12	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-21.59	Jahren <i>et al.</i> , 2003
fossil <i>Spongiophyton</i>	405	<i>Spongiophyton minutissimum</i>	-21.09	Jahren <i>et al.</i> , 2003
fossil vascular land plant	365	<i>Rhacophyton ceratangium</i>	-24	Beerling <i>et al.</i> , 2002; Hobbie & Boyce 2010
fossil vascular land plant	365.8	<i>Rhacophyton condrusorum</i>	-22.1	Peters-Kottig 2006
fossil vascular land plant	370	<i>Callixylon</i>	-26.8	Maynard 1981
fossil vascular land plant	374	VEG-2 sorted tubular elements	-23.3	Lecuyer & Paris, 1997
fossil vascular land plant	375	<i>Callixylon</i>	-25.6	Maynard 1981
fossil vascular land plant	376	<i>Callixylon newberryi</i>	-27.7	Boyce <i>et al.</i> , 2007; Hobbie & Boyce 2010
fossil vascular land plant	376	<i>Callixylon newberryi</i>	-27.4	Boyce <i>et al.</i> , 2007; Hobbie & Boyce 2010
fossil vascular land plant	380	<i>Archaeopteris jacksoni</i>	-28.1	Beerling <i>et al.</i> , 2002; Hobbie & Boyce 2010
fossil vascular land plant	380	<i>Archaeopteris macilenta</i>	-25.4	Beerling <i>et al.</i> , 2002; Hobbie & Boyce 2010
fossil vascular land plant	384	<i>Eospermatopteris erianus</i>	-24.4	Beerling <i>et al.</i> , 2002; Hobbie & Boyce 2010
fossil vascular land plant	384	<i>Leclercqia complexa</i>	-20.9	Peters-Kottig 2006; Hobbie & Boyce 2010
fossil vascular land plant	384	<i>Tetraxylopteris schmidtii</i>	-22.6	Peters-Kottig 2006; Hobbie & Boyce 2010
fossil vascular land plant	387	<i>Leclercqia complexa</i>	-21.3	Beerling <i>et al.</i> , 2002; Hobbie & Boyce 2010
fossil vascular land plant	396	<i>Psilophyton forbesi</i>	-26.3	Beerling <i>et al.</i> , 2002; Hobbie & Boyce 2010
fossil vascular land plant	396	<i>Psilophyton princeps</i>	-23.6	Boyce <i>et al.</i> , 2007; Hobbie & Boyce 2010
fossil vascular land plant	399.5	<i>Bitelaria dubjanskii</i>	-24.1	Peters-Kottig 2006; Hobbie & Boyce 2010
fossil vascular land plant	399.5	<i>Crenaticaulis verruculosus</i>	-24.9	Peters-Kottig 2006; Hobbie & Boyce 2010
fossil vascular land plant	399.5	<i>Pertica varia</i>	-27.3	Peters-Kottig 2006; Hobbie & Boyce 2010
fossil vascular land plant	399.5	<i>Renalia hueberi</i>	-26.2	Peters-Kottig 2006; Hobbie & Boyce 2010
fossil vascular land plant	400	<i>Psilophyton forbesi</i>	-25.4	Beerling <i>et al.</i> , 2002; Hobbie & Boyce 2010

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fossil vascular land plant	400	<i>cf Sawdonia</i>	-23.5	Boyce <i>et al.</i> , 2007; Hobbie & Boyce 2010
fossil vascular land plant	410	<i>Aglaophyton major</i>	-25.7	Boyce <i>et al.</i> , 2007; Hobbie & Boyce 2010
fossil vascular land plant	410	<i>Asteroxylon mackei</i>	-24.9	Boyce <i>et al.</i> , 2007; Hobbie & Boyce 2010
fossil vascular land plant	410	<i>Rhynia gwynne-vaughani</i>	-24.2	Boyce <i>et al.</i> , 2007; Hobbie & Boyce 2010
fossil vascular land plant	412	VEG-1 sorted plant cuticles	-24.8	Lecuyer & Paris, 1997
living C4 plant	0	<i>Alloteropsis semialata</i>	-11.5	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Arundinella nepalensis</i>	-12.1	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Axonopus compressus</i>	-12.6	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Chloris gayana</i>	-13	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Cymbosetaria sagittifolia</i>	-13.9	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Cynodon dactylon</i>	-12.7	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Cypholepis yeminica</i>	-13	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Duigitaria decumbens</i>	-12.9	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Digitaria macroglossa</i>	-12.4	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Digitaria swazilandensis</i>	-11.8	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Elionurus argenteus</i>	-11.5	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Enneapogon brachystachus</i>	-13.3	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Enneapogon cenchroides</i>	-14.8	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Enneapogon scaber</i>	-13	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Enneapogon scoparius</i>	-14.2	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Entoplocamia aristulata</i>	-16.4	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Eragrostis capensis</i>	-13.2	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Eragrostis curvula</i>	-13.4	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Eragrostis cyperoides</i>	-13.1	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Eragrostis spinosa</i>	-14.9	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Eragrostis superba</i>	-13.1	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Hemanthria altissima</i>	-12.2	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Heteropogon contortis</i>	-11.4	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Microstegium capense</i>	-12.5	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Monelytrum luderitzianum</i>	-14.5	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Odyssea paucinervis</i>	-14	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Panicum gilvum</i>	-11	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Panicum lanipes</i>	-12.6	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Panicum phragmitoides</i>	-12.7	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Paspalum polystachyum</i>	-12.1	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Paspalum virgatum</i>	-12.9	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Schmidtia kalahariensis</i>	-13	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Schmidtia pappophoroides</i>	-12.3	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Sporobolus fimbriatus</i>	-13.2	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Tragus koeleroides</i>	-12	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Triraphis fleckii</i>	-14.5	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Triraphis pumilio</i>	-11.8	Vogel <i>et al.</i> 1978
living C4 plant	0	<i>Panicum anceps</i>	-11.8	Smith & Brown 1973
living C4 plant	0	<i>Panicum antidotale</i>	-14.1	Smith & Brown 1973
living C4 plant	0	<i>Stenotaphrum secundatum</i>	-15.7	Smith & Brown 1973
living C4 plant	0	<i>Panicum capillare</i>	-14.3	Smith & Brown 1973
living C4 plant	0	<i>Panicum dichotomiflorum</i>	-14.1	Smith & Brown 1973
living C4 plant	0	<i>Panicum geminatum</i>	-11.3	Smith & Brown 1973
living C4 plant	0	<i>Panicum hallii</i>	-13.4	Smith & Brown 1973
living C4 plant	0	<i>Panicum maximum</i>	-13.3	Smith & Brown 1973
living C4 plant	0	<i>Panicum obtusum</i>	-12.7	Smith & Brown 1973
living C4 plant	0	<i>Panicum plenum</i>	-11.9	Smith & Brown 1973
living C4 plant	0	<i>Panicum purpurascens</i>	-11.3	Smith & Brown 1973
living C4 plant	0	<i>Panicum reptans</i>	-11.4	Smith & Brown 1973
living C4 plant	0	<i>Panicum tenerum</i>	-11.4	Smith & Brown 1973
living C4 plant	0	<i>Panicum urvilleanum</i>	-12.1	Smith & Brown 1973
living C4 plant	0	<i>Panicum virgatum</i>	-11.7	Smith & Brown 1973
living C4 plant	0	<i>Panicum ramisetum</i>	-11.7	Smith & Brown 1973
living C4 plant	0	<i>Panicum reverchonii</i>	-11.9	Smith & Brown 1973
living C4 plant	0	<i>Anthaenantia rufa</i>	-12.2	Smith & Brown 1973
living C4 plant	0	<i>Axonopus affinis</i>	-10.6	Smith & Brown 1973
living C4 plant	0	<i>Brachiaria platyphylla</i>	-12.7	Smith & Brown 1973
living C4 plant	0	<i>Cenchrus ciliaris</i>	-11.7	Smith & Brown 1973
living C4 plant	0	<i>Cenchrus incertus</i>	-11.5	Smith & Brown 1973
living C4 plant	0	<i>Digitaria adscendens</i>	-11.6	Smith & Brown 1973
living C4 plant	0	<i>Trichachne californica</i>	-11.2	Smith & Brown 1973
living C4 plant	0	<i>Antheophora elegans</i>	-10.8	Smith & Brown 1973
living C4 plant	0	<i>Antheophora elongata</i>	-10	Smith & Brown 1973

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living C4 plant	0	<i>Antheophora hermaphroditica</i>	-11.1	Smith & Brown 19733
living C4 plant	0	<i>Antheophora pubescens</i>	-12.5	Smith & Brown 1973
living C4 plant	0	<i>Arthropogon villosus</i>	-13.3	Smith & Brown 1973
living C4 plant	0	<i>Reynaudia filiformis</i>	-11.6	Smith & Brown 1973
living C4 plant	0	<i>Snowdenia polystachya</i>	-13.5	Smith & Brown 19733
living C4 plant	0	<i>Arundinella berteroniana</i>	-14.5	Smith & Brown 1973
living C4 plant	0	<i>Arundinella deppeana</i>	-11.7	Smith & Brown 1973
living C4 plant	0	<i>Garnotia stricta</i>	-9.5	Smith & Brown 1973
living C4 plant	0	<i>Melinis minutiflora</i>	-12.7	Smith & Brown 19733
living C4 plant	0	<i>Rhynchelytrum roseum</i>	-12.7	Smith & Brown 1973
living C4 plant	0	<i>Trachys muricata</i>	-11.6	Smith & Brown 1973
living C4 plant	0	<i>Andropogon glomeratus</i>	-14.1	Smith & Brown 1973
living C4 plant	0	<i>Andropogon perforatus</i>	-11.7	Smith & Brown 19733
living C4 plant	0	<i>Andropogon saccharoides</i>	-11.7	Smith & Brown 1973
living C4 plant	0	<i>Bothriochloa alta</i>	-12.4	Smith & Brown 1973
living C4 plant	0	<i>Chrysopogon montanus</i>	-11.8	Smith & Brown 1973
living C4 plant	0	<i>Cymbopogon citratus</i>	-14.8	Smith & Brown 1973
living C4 plant	0	<i>Eremochloa ophiuroides</i>	-11.2	Smith & Brown 1973
living C4 plant	0	<i>Ratraya petiolata</i>	-12.8	Smith & Brown 1973
living C4 plant	0	<i>Saccharum officinarum</i>	-13.9	Smith & Brown 19733
living C4 plant	0	<i>Echinochloa crusgalli</i>	-11.4	Smith & Brown 1973
living C4 plant	0	<i>Leptoloma cognatum</i>	-12.2	Smith & Brown 1973
living C4 plant	0	<i>Paspalum publiflorum</i>	-12.6	Smith & Brown 1973
living C4 plant	0	<i>Paspalum urvillei</i>	-11.3	Smith & Brown 19733
living C4 plant	0	<i>Pennisetum ciliare</i>	-11.3	Smith & Brown 1973
living C4 plant	0	<i>Reimarochloa acuta</i>	-12.3	Smith & Brown 1973
living C4 plant	0	<i>Setaria scheelei</i>	-12.6	Smith & Brown 1973
living C4 plant	0	<i>Setaria vulgare</i>	-13.8	Smith & Brown 19733
living C4 plant	0	<i>Themeda tgrandra</i>	-12	Smith & Brown 1973
living C4 plant	0	<i>Euchlaena perennis</i>	-11.9	Smith & Brown 1973
living C4 plant	0	<i>Tripsacum dactyloides</i>	-12.2	Smith & Brown 1973
living C4 plant	0	<i>Zea mays</i>	-13.6	Smith & Brown 19733
living C4 plant	0	<i>Aristida glauca</i>	-13.4	Smith & Brown 1973
living C4 plant	0	<i>Aristida purpurea</i>	-13.8	Smith & Brown 1973
living C4 plant	0	<i>Distichlis spicata</i>	-12.8	Smith & Brown 1973
living C4 plant	0	<i>Jourvea pilosa</i>	-11.4	Smith & Brown 19733
living C4 plant	0	<i>Monanthochloe littoralis</i>	-14.1	Smith & Brown 1973
living C4 plant	0	<i>Vaseyochloa multinervosa</i>	-14.6	Smith & Brown 1973
living C4 plant	0	<i>Bouteloua curtipendula</i>	-12.5	Smith & Brown 1973
living C4 plant	0	<i>Bouteloua filiformis</i>	-12.8	Smith & Brown 19733
living C4 plant	0	<i>Buchloe dactyloides</i>	-14.3	Smith & Brown 1973
living C4 plant	0	<i>Chloris cucullata</i>	-15.9	Smith & Brown 1973
living C4 plant	0	<i>Cynodon dactylon</i>	-12.8	Smith & Brown 1973
living C4 plant	0	<i>Dactyloctenium aegyptiacum</i>	-12.2	Smith & Brown 19733
living C4 plant	0	<i>Gymnopogon ambiguus</i>	-13.4	Smith & Brown 1973
living C4 plant	0	<i>Eragrostis intermedia</i>	-15.6	Smith & Brown 1973
living C4 plant	0	<i>Tridens albescens</i>	-13.5	Smith & Brown 1973
living C4 plant	0	<i>Tridens pilosus</i>	-13.4	Smith & Brown 19733
living C4 plant	0	<i>Lepturus repens</i>	-12.7	Smith & Brown 1973
living C4 plant	0	<i>Neostapfia colusana</i>	-13.3	Smith & Brown 1973
living C4 plant	0	<i>Orcuttia californica</i>	-13.6	Smith & Brown 1973
living C4 plant	0	<i>Pappophorum bicolor</i>	-13.4	Smith & Brown 19733
living C4 plant	0	<i>Spartina alterniflora</i>	-13.1	Smith & Brown 1973
living C4 plant	0	<i>Lycurus phleoides</i>	-13.8	Smith & Brown 1973
living C4 plant	0	<i>Muhlenbergia emersleyi</i>	-11	Smith & Brown 1973
living C4 plant	0	<i>Muhlenbergia lindheimeri</i>	-12.4	Smith & Brown 19733
living C4 plant	0	<i>Sporobolus wrightii</i>	-12.3	Smith & Brown 1973
living C4 plant	0	<i>Hilaria belangeri</i>	-13.8	Smith & Brown 1973
living C4 plant	0	<i>Zoysia japonica</i>	-14.7	Smith & Brown 1973
living C4 plant	0	<i>Zoysia matrella</i>	-12.3	Smith & Brown 19733
living CAM plants	0	<i>Dudleya caespitosa</i>	-16.4	Troughton <i>et al.</i> 1977
living CAM plants	0	<i>Dudleya palmeri</i>	-15.8	Troughton <i>et al.</i> 1977
living CAM plants	0	<i>Dudleya pulverulenta</i>	-17.4	Troughton <i>et al.</i> 1977
living CAM plants	0	<i>Sedum botteri</i>	-24.1	Teeri <i>et al.</i> 1981
living CAM plants	0	<i>Sedum tortuosum</i>	-26.3	Teeri <i>et al.</i> 1981
living CAM plants	0	<i>Sedum dendroideum</i>	-15.7	Teeri <i>et al.</i> 1981
living CAM plants	0	<i>Sedum oxypetalum</i>	-24.3	Teeri <i>et al.</i> 1981
living CAM plants	0	<i>Sedum obcordatum</i>	-23.1	Teeri <i>et al.</i> 1981

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living CAM plants	0	<i>Sedum Stahlia</i>	-13.1	Teeri <i>et al.</i> 1981
living CAM plants	0	<i>Sedum longipes</i>	-24.9	Teeri <i>et al.</i> 1981
living CAM plants	0	<i>Sedum ebractatum</i>	-16.1	Teeri <i>et al.</i> 1981
living CAM plants	0	<i>Sedum greggii</i>	-25	Teeri <i>et al.</i> 1981
living CAM plants	0	<i>Sedum moranense</i>	-24.3	Teeri <i>et al.</i> 1981
living CAM plants	0	<i>Sedum telephioides</i>	-25.2	Teeri <i>et al.</i> 1981
living CAM plants	0	<i>Sedum nevii</i>	-27.8	Teeri <i>et al.</i> 1981
living CAM plants	0	<i>Sedum wrightii</i>	-22.6	Teeri <i>et al.</i> 1981
living CAM plants	0	<i>Cremonophila nutans</i>	-13.8	Teeri <i>et al.</i> 1981
living CAM plants	0	<i>Lenophyllum texanum</i>	-13.3	Teeri <i>et al.</i> 1981
living CAM plants	0	<i>Parvisedum pumilum</i>	-25.4	Teeri <i>et al.</i> 1981
living CAM plants	0	<i>Sedum dendroideum</i>	-13.7	Teeri <i>et al.</i> 1981
living CAM plants	0	<i>Sedum praealtum</i>	-16.2	Teeri <i>et al.</i> 1981
living CAM plants	0	<i>Sedum stahlia</i>	-14.7	Teeri <i>et al.</i> 1981
living CAM plants	0	<i>Sedum greggi</i>	-25.1	Teeri <i>et al.</i> 1981
living CAM plants	0	<i>Sedum pachyphyllum</i>	-11.5	Teeri <i>et al.</i> 1981
living CAM plants	0	<i>Sedum rubrotinctum</i>	-11.6	Teeri <i>et al.</i> 1981
living CAM plants	0	<i>Cremonophila nutans</i>	-12.9	Teeri <i>et al.</i> 1981
living CAM plants	0	<i>Cremonophila nutans</i>	-12.4	Teeri <i>et al.</i> 1981
living CAM plants	0	<i>Cremonophila linguifolia</i>	-13.2	Teeri <i>et al.</i> 1981
living CAM plants	0	<i>Sedum greggi x C.linguifolia</i>	-18.5	Teeri <i>et al.</i> 1981
living CAM plants	0	<i>Cremonophila nutansxS.praealtum</i>	-15.6	Teeri <i>et al.</i> 1981
living CAM plants	0	<i>Cremonophila nutans x S. stahlia</i>	-13.2	Teeri <i>et al.</i> 1981
living CAM plants	0	<i>Sansevieria thyrsiflora</i>	-13.0	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Aizoanthemum galenioides</i>	-22.0	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Hypertelis salsoloides</i>	-23.7	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Psilocaulon kuntzei</i>	-13.4	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Ruschia caroli</i>	-23.7	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Ruschia sedoides</i>	-15.0	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Trichodiadema sp.</i>	-23.6	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Arthraerus leubnitzia</i>	-26.0	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Arthraerus leubnitzia</i>	-20.5	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Pachypodium succulentum</i>	-24.7	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Caralluma mammillaris</i>	-14.4	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Caralluma sp.</i>	-12.5	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Trichocaulon pedicellatum</i>	-12.9	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Salsola aphylla</i>	-13.4	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Senecio radicans</i>	-16.7	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Andromischus mamillaris</i>	-14.7	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Andromischus rhombifolius</i>	-14.5	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Cotyledon orbiculata</i>	-11.0	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Cotyledon orbiculata</i>	-13.7	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Cotyledon paniculata</i>	-16.9	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Cotyledon ramosissima</i>	-13.7	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Crassula acutifolia</i>	-15.7	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Crassula capitella ssp thyrsifolia</i>	-16.9	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Crassula cultrata</i>	-13.6	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Crassula expansa</i>	-20.3	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Crassula flava</i>	-20	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Crassula lycopodioides</i>	-18.7	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Crassula lycopodioides</i>	-12.8	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Crassula orbicula</i>	-11	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Crassula orbicula</i>	-15.9	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Crassula perfoliata</i>	-14.8	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Crassula perforata</i>	-13.1	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Crassula portulacea</i>	-15	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Crassula portulacea</i>	-14.3	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Crassula rupestris</i>	-14.10	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Crassula tetragona</i>	-16.3	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Crassula tetragona ssp robusta</i>	-15.8	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Crassula trachysantha</i>	-16.9	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Kalanchoe rotundifolia</i>	-15.3	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Euphorbia avasmontana</i>	-15.1	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Euphorbia bothae</i>	-14.6	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Euphorbia burmanni</i>	-18.3	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Euphorbia caput-medusae</i>	-13.3	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Euphorbia gariepina</i>	-14.6	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Euphorbia gorgonis</i>	-12.9	Mooney <i>et al.</i> 1977

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living CAM plants	0	<i>Euphorbia gregaria</i>	-11.6	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Euphorbia inermis</i>	-14.9	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Euphorbia mauretanic</i>	-22	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Euphorbia mauretanic</i>	-16.9	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Euphorbia mauretanic</i>	-16	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Euphorbia nesemanii</i>	-11.6	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Euphorbia pentagona</i>	-14.9	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Euphorbia polygona</i>	-10.7	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Euphorbia sp.</i>	-16.8	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Euphorbia squarrosa</i>	-12.5	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Euphorbia squarrosa</i>	-16.9	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Euphorbia tetragona</i>	-14.7	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Euphorbia triangularis</i>	-13.6	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Pelargonium peltatum</i>	-16.9	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Sarcocaulon mossamedense</i>	-24.5	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Sarcocaulon mossamedense</i>	-26.1	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Aloe ferox</i>	-14.7	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Aloe microstigma</i>	-14.6	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Aloe speciosa</i>	-20.3	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Bulbine caulescens</i>	-26.4	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Gasteria pillansii</i>	-12.4	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Haworthia margaritifera</i>	-12.1	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Ademia pechuelii</i>	-18.3	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Anacampseros filamentosa</i>	-15.4	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Portulacaria afra</i>	-17.5	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Tetragonia reduplicata</i>	-24.3	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Tetragonia reduplicata</i>	-12.5	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Cyphostemma currorii</i>	-12.2	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Cyphostemma quinatum</i>	-14.8	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Zygophyllum simplex</i>	-14.8	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Zygophyllum stapfii</i>	-26.5	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Zygophyllum stapfii</i>	-24	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Zygophyllum stapfii</i>	-27	Mooney <i>et al.</i> 1977
living CAM plants	0	<i>Zygophyllum stapfii</i>	-27.4	Mooney <i>et al.</i> 1977
living fungus	0	<i>Arrhenia obscurum</i>	-20.7	Hobbie & Boyce 2010
living fungus	0	<i>Galerina spp.</i>	-22.1	Hobbie & Boyce 2010
living fungus	0	<i>Inocybe lacera</i>	-25.8	Hobbie & Boyce 2010
living fungus	0	<i>Laccaria montana</i>	-25.9	Hobbie & Boyce 2010
living fungus	0	<i>Arrhenia obscurum</i>	-13.6	Hobbie & Boyce 2010
living fungus	0	<i>Arrhenia obscurum</i>	-25	Hobbie & Boyce 2010
living fungus	0	<i>Amanita longistriata</i>	-25	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Amanita pantherina</i>	-23.7	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Amanita rubrovolvata</i>	-24.3	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Amanita sp.</i>	-25.4	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Aureoboletus thibetanus</i>	-27.5	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Boletellus russellii</i>	-25.2	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Leccinum scabrum</i>	-24.6	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tylopilus castaneiceps</i>	-24.6	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tylopilus sp.</i>	-23.3	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Xanthoconium affine</i>	-24.1	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Inocybe sp.</i>	-24	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Lactarius sp.</i>	-23.7	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula sp.</i>	-25.1	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula sp.</i>	-24.4	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula sp.</i>	-24.2	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula sp.</i>	-25	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Strobilomyces sp.</i>	-25.7	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Thelephoraceae sp.</i>	-24.3	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Laccaria sp.</i>	-23	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Ganoderma applanatum</i>	-21.8	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Phellinus xeranticus</i>	-23.4	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hygrophoropsis aurantiaca</i>	-20.4	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Daedalea dickinsii</i>	-20.2	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Fomes fomentarius</i>	-22.7	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Laetiporus sulphureus</i>	-22.6	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Laetiporus sulphureus</i>	-21.1	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Oxyporus cuneatus</i>	-23.5	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Trametes versicolor</i>	-24.2	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009

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living fungus	0	<i>Trichaptum biforme</i>	-22.3	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Mycena</i> sp.	-21.2	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Mycena</i> sp.	-21.5	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Oudemansiella venusolamellata</i>	-23.5	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Aphylophorales</i> sp.	-20.8	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Agaricus subrutilescens</i>	-25	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Lepiota clypeolaria</i>	-21.5	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Pseudocolus schellenbergiae</i>	-23.9	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Coprinus</i> sp.	-23.8	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Lycoperdon perlatum</i>	-23.3	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Pholiota lenta</i>	-25.5	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Marasmius</i> sp.	-22.4	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Dermocybe cinnamomea</i>	-26.7	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Laccaria amethystea</i>	-27.9	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tricholoma saponaceum</i>	-24	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Coprinus radians</i>	-22	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Pleurotus ostreatus</i>	-25.7	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Naematoloma fasciculare</i>	-24	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Flammulina velutipes</i>	-24	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Phallus impudicus</i>	-23	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Kobayasia nipponica</i>	-23.2	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Oudemansiella mucida</i>	-22.9	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Amanita abrupta</i>	-25	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Amanita esculenta</i>	-23.4	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Amanita neo-ovoidea</i>	-24	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Amanita pantherina</i>	-24.5	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Amanita vaginata</i>	-27	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Amanita</i> sp.	-25.4	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Aureoboletus subvirens</i>	-25.6	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Boletus pseudocalopus</i>	-24	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Boletus pseudocalopus</i>	-23.7	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Suillus bovinus</i>	-25.2	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Suillus granulatus</i>	-24.1	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	Boletaceae sp.	-25.3	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	Boletaceae sp.	-24.5	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius</i> sp.	-22.6	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hebeloma vinosophyllum</i>	-24.8	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinariaceae</i> sp.	-24.8	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Entoloma clypeatus</i>	-23.4	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Entoloma</i> sp.	-22.8	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hydnum repandum</i>	-26	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Pisolithus tinctorius</i>	-24.7	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Rhizopogon</i> sp.	-25.4	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Lactarius chrysorrhoeus</i>	-23.9	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Lactarius chrysorrhoeus</i>	-23.3	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Lactarius hatsudake</i>	-24.8	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula alboareolata</i>	-25.3	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula</i> aff. <i>Mariae</i>	-24.6	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Scleroderma verrucosum</i>	-27.4	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Lyophyllum fumosum</i>	-23.2	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Clavicornia pyxidata</i>	-22.4	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Onnia vallata</i>	-24.2	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Calvatia craniiformis</i>	-23.3	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Laetiporus</i> sp.	-22.5	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Polyporus arcularius</i>	-22.4	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Roseiformes subflexibilis</i>	-22.3	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Lentinula edodes</i>	-24.8	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Mycena haematopoda</i>	-22.4	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Agaricus praeclaresquamosus</i>	-23.2	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Agaricus subrutilescens</i>	-23.5	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Agaricus</i> sp.	-22.8	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Lepiota acutesquamosa</i>	-22.7	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Macrolepiota</i> sp.	-23.5	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Phaeolepiota aurea</i>	-21.4	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Coprinus disseminatus</i>	-23.5	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Psathyrella</i> sp.	-22.5	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Psathyrella</i> sp.	-23.9	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Calvatia craniiformis</i>	-23.4	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009

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living fungus	0	<i>Lycoperdon</i> sp.	-24.3	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Pholiota lubrica</i>	-22.3	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Psilocybe</i> sp.	-19	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Collybia dryophila</i>	-23.9	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Leucopaxillus giganteus</i>	-23	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Marasmius maximus</i>	-23	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Mycena pura</i>	-22.7	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Mycena</i> sp.	-28	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Amanita angustilamellata</i>	-26.8	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Amanita angustilamellata</i>	-24.8	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Amanita aff. Ovalispora</i>	-28.3	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Amanita</i> sp.	-27.2	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tylopilus</i> sp.	-23.5	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tylopilus</i> sp.	-23.9	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tylopilus</i> sp.	-24.7	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	Boletaceae sp.	-25.8	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	Clavariaceae sp.	-31.7	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	Cortinariaceae sp.	-27	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hydnum repandum</i>	-28.6	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Ramaria</i> sp.	-27.4	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Scleroderma</i> sp.	-28.9	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Heimiella</i> sp.	-25.6	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Strobilomyces polypyramis</i>	-27.1	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	Thelephoraceae sp.	-27.6	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	Hymenogasterales sp.	-26.3	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Ganoderma australe</i>	-27.4	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Pleurotus</i> sp.	-22.2	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Earliella scabrosa</i>	-23.5	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Fomitopsis feei</i>	-25.5	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hexagonia tennis</i>	-26	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Lentinus</i> sp.	-24.2	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Microporus vernicipes</i>	-28.9	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Microporus vernicipes</i>	-24	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Perenniporia</i> sp.	-24.5	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Polyporus tenuiculus</i>	-23.9	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Trametes scopulosa</i>	-26.5	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	Ramariaceae sp.	-25.3	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Marasmius</i> sp.	-25.2	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	Tricholomataceae sp.	-23.1	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Gomphus fujisanensis</i>	-24.6	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Crepidotus</i> sp.	-22.1	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Chroogomphus tomentosus</i>	-24.8	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Chroogomphus tomentosus</i>	-25.4	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Boletus subvelutipes</i>	-24	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cantharellus cibarius</i>	-25.5	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Entoloma</i> sp.	-23.7	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula delicata</i>	-24.5	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hydnellum caeruleum</i>	-22.7	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Phellodon niger</i>	-24.6	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Catathelasma ventricosum</i>	-23.5	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Bondarzewia montana</i>	-22.1	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hygrophoropsis aurantiaca</i>	-19.4	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Polyporus alveolaris</i>	-23.3	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hebeloma radicosoides</i>	-25	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Chroogomphus tomentosus</i>	-24.7	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius</i> sp.	-23.8	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius</i> sp.	-23.4	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius</i> sp.	-24.4	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Dermocybe</i> sp.	-23.1	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Rozites caperata</i>	-25.3	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula</i> sp.	-25.1	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula</i> sp.	-24	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula</i> sp.	-22.9	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Fomes fomentarius</i>	-22.9	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Ischnoderma resinatum</i>	-21.1	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Trametes versicolor</i>	-23.2	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	Polyporaceae sp.	-20.6	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Pholiota astragalina</i>	-22.1	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009

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living fungus	0	<i>Pholiota flammans</i>	-23.2	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Agaricales</i> sp.	-20	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Aphyllorphorales</i> sp.	-21	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Mycocleptodonoides aitchisonii</i>	-22.1	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Armillariella mellea</i>	-22.2	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula</i> sp.	-24.5	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Trametes</i> aff. <i>T. brevis</i>	-23.8	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Collybia dryophila</i>	-22.3	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tricholoma</i> sp.	-24.3	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tricholoma</i> sp.	-25.3	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hygrophoropsis aurantiaca</i>	-20.2	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Grifola frondosa</i>	-21.8	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Trametes versicolor</i>	-23.1	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Mycena haematopoda</i>	-20.2	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Lycoperdon</i> sp.	-24.9	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Clitocybe clavipes</i>	-23.6	Kohzu <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius</i> (23)	-25.6	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hygrophorus</i> (8)	-25.3	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula</i> (16)	-25.8	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tricholoma</i> (4)	-24.8	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Coprinus</i> (3)	-23.1	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Fomitopsis</i> (3)	-23.5	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Mycena</i> (5)	-22.3	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Polyporus</i> (8)	-22.5	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Gomphidius oregonensis</i>	-26.6	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Inocybe</i>	-23.1	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Boletus zoelleri</i>	-25	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula</i>	-24.3	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Lactarius</i>	-25.9	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cantharellus cibarius</i> 1	-25.2	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Amanita</i>	-24.4	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Amanita vaginata</i>	-27.8	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Boletus zelleri</i>	-26.8	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cantharellus cibarius</i>	-26.4	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius cinnamomeoluteus</i>	-26.9	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Inocybe geophylla</i>	-26.9	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Inocybe leiocephala</i>	-25.9	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Laccaria amethystina</i>	-27.4	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Lactarius uvidus</i>	-26	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula albonigra</i>	-27	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula cremericolor</i>	-27.3	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula</i> ex gr. <i>R. fragilis</i>	-27.1	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula krombholzii</i>	-28.1	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tricholoma imbricatum</i>	-26.7	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Lepiota</i> sp.	-23.1	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Psathyrella</i>	-25	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Collybia</i>	-22.4	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Agaricus</i>	-21.4	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Pleurocybe porrigens</i>	-21.3	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hypholoma fasciculare</i>	-22.8	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hygrophoropsis aurantiaceae</i>	-19.6	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Psathyrella</i>	-24.8	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Stereum</i>	-21.4	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Fomes pinicola</i>	-22.5	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hirschioparus</i>	-22.1	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Stereum ostrea</i>	-23.2	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Fomes caj</i>	-23.4	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Phellinus pini</i>	-21.8	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Fomes pinicola</i>	-20.7	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Fomes pinicola</i>	-22.3	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Fomes pinicola</i>	-21.8	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Galerina heterocystis</i>	-27.6	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hypholoma fasciculare</i>	-24.3	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Mycena</i> ex gr. <i>M. murina</i>	-24	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Psathyrella</i> ex gr. <i>P. tephrophylla</i>	-22.3	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Stropharia ambigua</i>	-23.3	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tricholomopsis sulfureoides</i>	-22	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Pseudohydnum gelatinosum</i>	-24	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009

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living fungus	0	<i>Polyporus badius</i>	-22.3	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Helvella lacunosea</i>	-25.4	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Otidia (concitin?)</i>	-25.3	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Clavulina cristata group</i>	-26.1	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Ramaria</i>	-25.8	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Helvella crispa</i>	-26.7	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Oridea onotica</i>	-27.1	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Helvella</i> sp.	-24	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Ramaria</i> sp.	-25.6	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Clavulina cristata</i>	-26.4	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Clavulina rugosa</i>	-26.4	Hobbie <i>et al.</i> 1999; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-26.7	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-26.6	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-26.6	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-26.6	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-26.6	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-24.1	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-24.3	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-26.8	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-25.3	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-25	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-24.9	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-28.2	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-28.2	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-24.5	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-25.4	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-24.8	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-24.7	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-24.9	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-20.6	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-20.5	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-22.5	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-22.2	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-22.3	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-22.1	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-22.2	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-22.3	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-23	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-23.7	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-23.8	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-24.1	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-24.4	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-24.8	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-25.3	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-21.4	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-20.9	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-22.1	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-22.4	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-21.7	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-22	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-22.3	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-21.9	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-21.6	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	unidentified fungus	-22	Henn & Chapela 2001; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Chalciporus piperatus</i>	-22.3	Taylor <i>et al.</i> 2003; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Leccinum molle</i>	-27.6	Taylor <i>et al.</i> 2003; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Leccinum scabrum</i>	-27.5	Taylor <i>et al.</i> 2003; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Leccinum variicolor</i>	-27.6	Taylor <i>et al.</i> 2003; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Leccinum versipelle</i>	-27.5	Taylor <i>et al.</i> 2003; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Chroogomphus rutilus</i>	-26	Taylor <i>et al.</i> 2003; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Suillus variegatus</i>	-25	Taylor <i>et al.</i> 2003; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tricholoma flavovirens</i>	-25.4	Taylor <i>et al.</i> 2003; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tricholoma virgatum</i>	-25.2	Taylor <i>et al.</i> 2003; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Laccaria bicolor</i>	-25.3	Taylor <i>et al.</i> 2003; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Amanita muscaria</i>	-26.6	Taylor <i>et al.</i> 2003; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius armeniacus</i>	-24.5	Taylor <i>et al.</i> 2003; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius armillatus</i>	-26.9	Taylor <i>et al.</i> 2003; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius bataillei</i>	-25.3	Taylor <i>et al.</i> 2003; Mayor <i>et al.</i> , 2009

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living fungus	0	<i>Cortinarius biformis</i>	-25.2	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius camphoratus</i>	-25.6	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius evernui</i>	-24.8	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius hemitrichus</i>	-27.8	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius laniger</i>	-26.4	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius malachius</i>	-24.8	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius pholideus</i>	-27.6	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius scaurus</i>	-25.2	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius semisanguineus</i>	-24.9	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius strobilaceus</i>	-27	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius traganus</i>	-25.2	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Rozites caperata</i>	-25.8	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Lactarius rufus</i>	-24.9	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Russula paludosa</i>	-25	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Phellodon tomentosa</i>	-24.1	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Armillaria borealis</i>	-23.8	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Stropharia hornemanii</i>	-23.1	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Gymnopilus penetrans</i>	-22.4	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Trametes hirsuta</i>	-24	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Chalciporus piperatus</i>	-22	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Boletus edulis</i>	-24.6	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Boletus pinophilus</i>	-24.7	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Leccinum aurantiacum</i>	-27.3	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Leccinum holopus</i>	-29.2	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Leccinum scabrum</i>	-26.4	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Leccinum variicolor</i>	-26.1	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Leccinum versipelle</i>	-27.1	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Leccinum vulpinum</i>	-25	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Xerocomus badius</i>	-25.3	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Xerocomus subtomentosus</i>	-25.9	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Chroogomphus rutilus</i>	-25.3	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Gomphidius glutinosus</i>	-26.4	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Gomphidius roseus</i>	-24.9	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Suillus bovinus</i>	-25.2	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Suillus luteus</i>	-24.6	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Suillus variegatus</i>	-24.3	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Paxillus involutus</i>	-26.6	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Rhizopogon obtextus</i>	-25	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Tylophilus felleus</i>	-25	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Hygrophorus agathosmus</i>	-28.1	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Hygrophorus camarophyllus</i>	-24.6	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Hygrophorus olivaceoalbus</i>	-26	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Laccaria laccata</i>	-25.3	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Tricholoma flavovirens</i>	-26.1	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Tricholoma fracticum</i>	-24.3	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Tricholoma fucatum</i>	-25.8	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Tricholoma fulvum</i>	-26.6	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Tricholoma vaccinum</i>	-26.9	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Tricholoma virgatum</i>	-24.3	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Amanita fulva</i>	-26.3	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Amanita muscaria</i>	-26.3	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Amanita porphyria</i>	-24.8	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Amanita rubescens</i>	-25.3	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Amanita virosa</i>	-25.1	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius albo-violaceus</i>	-28.4	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius armeniacus</i>	-25.1	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius armillatus</i>	-27.5	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius bolaris</i>	-27	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius brunneus</i>	-26.1	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius camphoratus</i>	-23.7	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius crocea</i>	-29.2	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius gentilis</i>	-25.6	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius laniger</i>	-25.9	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius limonium</i>	-25.9	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius malachius</i>	-25.5	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius muscigenus</i>	-26.1	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius paleaceus</i>	-25.7	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius pholideus</i>	-26.3	Taylor et al. 2003; Mayor et al., 2009

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living fungus	0	<i>Cortinarius semisanguineus</i>	-25.2	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius speciosissimus</i>	-25.8	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius stillatitius</i>	-24.2	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius strobilaceus</i>	-25.5	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius traganus</i>	-25.6	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius uliginosus</i>	-28	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cortinarius vibratilis</i>	-25.1	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Hebeloma crustuliniforme</i>	-27.1	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Hebeloma mesophaeum</i>	-26.8	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Inocybe acuta</i>	-26.2	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Inocybe cincinnata</i>	-26.5	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Inocybe friesii</i>	-27	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Inocybe geophylla</i>	-25	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Inocybe pseudodestructa</i>	-26.5	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Inocybe tigrina</i>	-26.9	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Rozites caperata</i>	-24.7	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Lactarius badiusanguinea</i>	-26.2	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Lactarius camphoratus</i>	-26.8	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Lactarius deliciosus</i>	-24.9	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Lactarius deterrimus</i>	-26.6	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Lactarius fuliginosus</i>	-24.9	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Lactarius glycosmus</i>	-27	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Lactarius helvus</i>	-23.8	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Lactarius mitissimus</i>	-25.1	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Lactarius musteus</i>	-24.9	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Lactarius necator</i>	-26	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Lactarius obscuratus</i>	-27.1	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Lactarius repraesentaneus</i>	-26.5	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Lactarius rufus</i>	-25.3	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Lactarius scrobiculatus</i>	-27.3	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Lactarius theiogalus</i>	-27.1	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Lactarius torminosus</i>	-25.8	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Lactarius trivialis</i>	-23.5	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Lactarius uvidus</i>	-26	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Lactarius vietus</i>	-26.2	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Russula atrorubens</i>	-25.5	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Russula betularum</i>	-25.1	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Russula coerulea</i>	-24.1	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Russula decolorans</i>	-25.4	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Russula emetica</i>	-24.9	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Russula foetens</i>	-24.8	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Russula gracillima</i>	-27.7	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Russula griseascens</i>	-26.4	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Russula integra</i>	-25.4	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Russula paludosa</i>	-25.2	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Russula puellaris</i>	-25.5	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Russula queletii</i>	-27.5	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Russula rhodopoda</i>	-26	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Russula sanguinea</i>	-24.5	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Russula sardonica</i>	-26.3	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Russula vinosa</i>	-25.3	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Russula xerampelina</i>	-26.3	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Albatrellus ovinus</i>	-25.9	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Hydnum repandum</i>	-25.4	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Hydnum rufescens</i>	-25.4	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cantharellus cibarius</i>	-26.3	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cantharellus lutescens</i>	-25	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Cantharellus tubaeformis</i>	-25.2	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Hydnellum ferrugineum</i>	-22.5	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Hydnellum peckii</i>	-23.3	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Phellodon niger</i>	-22.7	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Hygrophoropsis aurantiaca</i>	-21.6	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Paxillus atromentarius</i>	-23	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Clitocybe clavipes</i>	-25.6	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Mycena pura</i>	-22.9	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Mycena rosella</i>	-23.3	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Clitopilus prunulus</i>	-22.9	Taylor et al. 2003; Mayor et al., 2009
living fungus	0	<i>Entoloma nitidum</i>	-23.5	Taylor et al. 2003; Mayor et al., 2009

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living fungus	0	<i>Rhodocybe nitellina</i>	-20.8	Taylor <i>et al.</i> 2003; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Agaricus silvaticus</i>	-22	Taylor <i>et al.</i> 2003; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cystoderma caracharias</i>	-23.8	Taylor <i>et al.</i> 2003; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Gymnopilus junonius</i>	-24	Taylor <i>et al.</i> 2003; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Auriscalpium vulgare</i>	-22.2	Taylor <i>et al.</i> 2003; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Lycoperdon foetidum</i>	-24.5	Taylor <i>et al.</i> 2003; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Boletopsis leucomelaena</i>	-25.5	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Boletus mirabilis</i>	-26.4	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cantharellus formosus</i>	-26.5	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Chroogomphus tomentosus</i>	-26.1	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius acutus</i>	-25.5	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius brunneus</i>	-25.3	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius cacao-color</i>	-25	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius calochrous</i>	-24.8	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius calopus</i>	-25	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius clandestinus</i>	-24.6	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius gentilis</i>	-26.6	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius laniger</i>	-25.4	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius montanus</i>	-26.5	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius muscigenus</i>	-26.6	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius obtusus</i>	-26.5	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius olympianus</i>	-24.7	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius saturninus</i>	-25.4	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius semisanguineus</i>	-26.3	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius talus</i>	-25.9	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius variosimilis</i>	-23.1	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius vibratilis</i>	-26.1	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Craterellus tubaeformis</i>	-25.7	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Gomphidius subroseus</i>	-26.7	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Gomphus clavatus</i>	-24.1	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hebeloma mesophaeum</i>	-24.6	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hebeloma incarnatum</i>	-24.6	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hydnellum aurantiacum</i>	-25.1	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hydnellum caeruleum</i>	-25.3	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hydnellum peckii</i>	-25.5	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hygrophorus bakerensis</i>	-25.5	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hygrophorus camarophyllus</i>	-25.5	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hygrophorus chrysodon</i>	-25.7	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hygrophorus eburneus</i>	-25.7	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hygrophorus purpurascens</i>	-24.9	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Inocybe geophylla</i>	-24.5	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Inocybe vaccina</i>	-24.6	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Laccaria bicolor</i>	-25.1	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Lactarius kauffmanii</i> var. <i>kauffmanii</i>	-25.6	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Lactarius olympianus</i>	-24.8	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Lactarius pallescens</i> var. <i>pallescens</i>	-25.1	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Lactarius pseudomucidus</i>	-25.5	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Lactarius rubrilacteus</i>	-24.3	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Lyophyllum semitale</i>	-25	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Ramaria testaceoflava</i>	-25.4	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula adusta</i>	-26.8	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula aeruginea</i>	-26	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula brevipes</i>	-24.8	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula fragilis</i>	-26	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula occidentalis</i>	-25.3	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula xerampelina</i>	-24.8	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Sarcodon fuscoindicum</i>	-25.3	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Sarcodon scabrosum</i>	-24.9	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Suillus lakei</i>	-24.5	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Suillus punctatipes</i>	-25	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tricholoma atroviolaceum</i>	-27.3	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tricholoma flavovirens</i>	-25.3	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tricholoma focale</i>	-26	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tricholoma inamoenum</i>	-25.3	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tricholoma magnivelare</i>	-25.7	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tricholoma myomyces</i>	-25.5	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tricholoma nigrum</i>	-26.3	Trudell <i>et al.</i> 2004; Mayor <i>et al.</i> , 2009

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living fungus	0	<i>Tricholoma pardinum</i>	-24.9	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Tricholoma saponaceum</i>	-24.2	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Tricholoma virgatum</i>	-25.7	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Cystoderma amianthinum</i>	-26.2	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Cystoderma granulosum</i>	-25.2	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Gymnopus acervatus</i>	-22.8	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Heterobasidion annosum</i>	-24.5	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Hypholoma capnoides</i>	-24.1	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Hypholoma fasciculare</i>	-21.4	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Inonotus tomentosus</i>	-23.5	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Lepiota magnispora</i>	-23.4	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Lyophyllum connatum</i>	-20.9	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Mycena aurantiidisca</i>	-25.4	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Mycena clavicularis</i>	-24.5	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Mycena maculata</i>	-22.1	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Mycena strobilinoidea</i>	-23.2	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Paxillus atrotomentosus</i>	-22.4	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Phaeolus schweinitzii</i>	-23	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Pholiota decorata</i>	-23.7	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Pluteus cervinus</i>	-22.6	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Polyporus melanopus</i>	-23.8	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Pseudoplectania melaena</i>	-24.9	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Rhodocollybia extuberans</i>	-21.8	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Rhodocollybia maculata</i>	-21	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Tricholomopsis decora</i>	-22.7	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Xeromphalina cornui</i>	-23.5	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Phylloporus rhodoxanthus</i>	-26	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Tricholoma vaccinum</i>	-25.3	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Albatrellus avellaneus</i>	-25.1	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Amanita constricta</i>	-25.5	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Amanita franchetii</i>	-25.4	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Amanita fulva</i>	-25.6	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Amanita pachycolea</i>	-25.8	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Boletus chrysenteron</i>	-25.6	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Boletus coniferarum</i>	-25.3	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Boletus edulis</i>	-25.9	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Boletus truncatus</i>	-25	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Boletus zelleri</i> Murrill	-24.6	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Cantharellus formosus</i>	-25.8	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Chroogomphus tomentosus</i>	-26	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Clavulina cristata</i>	-25.5	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Cortinarius cacao-color</i>	-25	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Cortinarius gentilis</i>	-25.1	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Cortinarius malachius</i>	-25.5	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Cortinarius montanus</i>	-26.2	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Cortinarius obtusus</i>	-25.9	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Cortinarius spadiceus</i>	-24.5	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Cortinarius vanduzerensis</i>	-24.7	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Hydnum umbilicatum</i>	-25	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Hygrophorus olivaceoalbus</i>	-24.9	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Inocybe assimilata</i>	-24.7	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Inocybe hirsuta</i> var. <i>maxima</i>	-24.6	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Inocybe olympiana</i>	-24.9	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Inocybe rimosa</i>	-24.7	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Inocybe xanthomelas</i>	-26.2	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Laccaria bicolor</i>	-25.3	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Lactarius fallax</i> var. <i>concolor</i>	-24.4	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Lactarius olivaceo-umbrinus</i>	-25.1	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Lactarius olympianus</i>	-24.9	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Lactarius pseudomucidus</i>	-25.1	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Lactarius subflammeus</i>	-25.8	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Naucoria escharoides</i>	-25.7	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Phaeocollybia attenuata</i>	-24.3	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Phaeocollybia benzokauffmanii</i>	-23.5	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Phaeocollybia fallax</i>	-24.3	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Phaeocollybia gregaria</i>	-23.8	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Phaeocollybia kauffmanii</i>	-25.4	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Phaeocollybia lilacifolia</i>	-26	Trudell et al. 2004; Mayor et al., 2009

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living fungus	0	<i>Phaeocollybia piceae</i>	-25.3	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Russula bicolor</i>	-26.7	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Russula brevipes</i>	-24.4	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Russula crassotunicata</i>	-26.4	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Russula fragilis</i>	-25.5	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Russula laurocerasi</i>	-24.9	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Russula nigricans</i>	-25.2	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Russula queletii</i>	-24.8	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Russula raoultii</i>	-27.3	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Tricholoma atroviolaceum</i>	-25.7	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Tricholoma saponaceum</i>	-25.3	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Tricholoma sejunctum</i>	-25.5	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Tricholoma virgatum</i>	-23.9	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Tylophilus porphyrosporus</i>	-24.4	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Armillaria nabsnona</i>	-23.2	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Armillaria ostoyae</i>	-22.2	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Chrysomphalina aurantiaca</i>	-23.7	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Clitocybe subditopoda</i>	-23.5	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Cystoderma amianthinum</i>	-24.3	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Cystoderma granulorum</i>	-24.2	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Fomitopsis pinicola</i>	-22.8	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Ganoderma applanatum</i>	-22.8	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Ganoderma oregonense</i>	-21.2	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Gymnopilus penetrans</i>	-23.6	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Gymnopilus acervatus</i>	-22.2	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Heterobasidion annosum</i>	-25.1	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Hygrophoropsis aurantiaca</i>	-22	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Hypholoma capnoides</i>	-21.9	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Hypholoma fasciculare</i>	-22.2	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Hypholoma marginatum</i>	-22.5	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Inonotus tomentosus</i>	-21.3	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Laetiporus conferticola</i>	-21.8	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Mycena amicta</i>	-22.8	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Mycena aurantiidisca</i>	-24.9	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Mycena clavicularis</i>	-25.2	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Mycena epipterygia</i>	-22.8	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Mycena haematopus</i>	-22.7	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Oligoporus perdelicatus</i>	-20.4	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Phaeolus schweinitzii</i>	-22.9	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Pholiota astragalina</i>	-22.6	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Pholiota decorata</i>	-23.1	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Pholiota flammans</i>	-22.7	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Pholiota flavida</i>	-22	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Pholiota spumosa</i>	-21.4	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Pleurocybella porrigens</i>	-21.5	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Pluteus cervinus</i>	-23.8	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Polyporus melanopus</i>	-25.1	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Pseudoplectania melaena</i>	-25.4	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Rhodocollybia extuberans</i>	-23.6	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Tricholomopsis decora</i>	-22.9	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Xeromphalina campanella</i>	-21.7	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Xeromphalina cornui</i>	-23	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Bondarzewia mesenterica</i>	-22.3	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Entoloma nitidum</i>	-24.6	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Phylloporus rhodoxanthus</i>	-25.7	Trudell et al. 2004; Mayor et al., 2009
living fungus	0	<i>Inocybe fastigiata</i>	-25	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Inocybe geophylla</i>	-22.7	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Laccaria bicolor</i>	-24	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Russula claroflava</i>	-24.1	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Russula decolorans</i>	-23.3	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Russula emetica</i>	-24.9	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Russula integra</i>	-24.9	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Russula rosacea</i>	-23.7	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Russula sororia</i>	-23	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Suillus pseudobrevipes</i>	-24.3	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Suillus lakei</i>	-23.9	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Suillus sibiricus</i>	-24.1	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Agaricus praeclaresquamous</i>	-19.6	Hart et al. 2006; Mayor et al., 2009

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living fungus	0	<i>Agaricus silvicola</i>	-23.6	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Armillaria albolanaripes</i>	-21.5	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Armillaria straminea</i> var. <i>americana</i>	-22.1	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Claviocorona pyxidata</i>	-22	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Clitocybe subconnexa</i>	-21.8	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Crucibulum leave</i>	-21.3	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Cyptotrama chrysopleplum</i>	-19.3	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Gymnopilus bellulus</i>	-23.3	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Lepiota cristata</i>	-22.6	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Leucopaxillus amarus</i>	-20.1	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Pholiota squarrosa</i>	-23.6	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Pluteus lutescens</i>	-24	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Lycoperdon perlatum</i>	-21.1	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Amanita pantherina</i>	-24.4	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Gomphidius smithii</i>	-23.6	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Hygrophorus camarophyllus</i>	-23.6	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Inocybe fastigiata</i>	-25	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Inocybe geophylla</i>	-24.6	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Inocybe lacera</i>	-22.5	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Russula integra</i>	-24.9	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Russula sororia</i>	-25.2	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Suillus lakei</i>	-22.6	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Agaricus silvicola</i>	-20.4	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Clavicornona pyxidata</i>	-21.3	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Clitocybe dealbata</i>	-22.2	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Coprinus atramentarius</i>	-22.6	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Coprinus comatus</i>	-23.6	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Cyptotrma chrysopleplum</i>	-23.1	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Lepiota cristata</i>	-21.7	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Leucopaxillus amarus</i>	-19.3	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Omphalotus olearis</i>	-22.9	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Peziza badoconfusa</i>	-22.1	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Pholiota squarrosa</i>	-23.1	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Tricholomopsis platyphylla</i>	-22.1	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Xeromphalina campanella</i>	-22	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Bovista</i> spp.	-23.2	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Lycoperdon perlatum</i>	-22.3	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Lycoperdon pyriforme</i>	-20.5	Hart et al. 2006; Mayor et al., 2009
living fungus	0	<i>Clitocybe gibba</i>	-23.8	Clemmensen et al. 2006; Mayor et al., 2009
living fungus	0	<i>Coliata</i> sp.	-24	Clemmensen et al. 2006; Mayor et al., 2009
living fungus	0	<i>Lycoperdon perlatum</i>	-22.9	Clemmensen et al. 2006; Mayor et al., 2009
living fungus	0	<i>Mycena pura</i>	-23.9	Clemmensen et al. 2006; Mayor et al., 2009
living fungus	0	<i>Cortinarius fennoscandicus</i>	-27.6	Clemmensen et al. 2006; Mayor et al., 2009
living fungus	0	<i>Cortinarius septentrionalis</i>	-27.3	Clemmensen et al. 2006; Mayor et al., 2009
living fungus	0	<i>Cortinarius</i> sp. 1	-26.9	Clemmensen et al. 2006; Mayor et al., 2009
living fungus	0	<i>Cortinarius</i> sp.2	-26.6	Clemmensen et al. 2006; Mayor et al., 2009
living fungus	0	<i>Cortinarius</i> sp. 3	-28.4	Clemmensen et al. 2006; Mayor et al., 2009
living fungus	0	<i>Hebeloma velutipes</i>	-26.6	Clemmensen et al. 2006; Mayor et al., 2009
living fungus	0	<i>Inocybe</i> sp.	-26.3	Clemmensen et al. 2006; Mayor et al., 2009
living fungus	0	<i>Lactarius subcircellatus</i>	-26.7	Clemmensen et al. 2006; Mayor et al., 2009
living fungus	0	<i>Leccinum scabrum</i>	-27.4	Clemmensen et al. 2006; Mayor et al., 2009
living fungus	0	<i>Rozites caperatus</i>	-26.6	Clemmensen et al. 2006; Mayor et al., 2009
living fungus	0	<i>Omphalina alpina</i>	-24.1	Clemmensen et al. 2006; Mayor et al., 2009
living fungus	0	<i>Cantharellopsis prescottii</i>	-25.7	Clemmensen et al. 2006; Mayor et al., 2009
living fungus	0	<i>Hypholoma udum</i>	-25.3	Clemmensen et al. 2006; Mayor et al., 2009
living fungus	0	<i>Marasmius androsaceus</i>	-25.7	Clemmensen et al. 2006; Mayor et al., 2009
living fungus	0	<i>Mycena simia</i>	-23.7	Clemmensen et al. 2006; Mayor et al., 2009
living fungus	0	<i>Mycena</i> sp. 1	-23.5	Clemmensen et al. 2006; Mayor et al., 2009
living fungus	0	<i>Mycena</i> sp. 2	-25.1	Clemmensen et al. 2006; Mayor et al., 2009
living fungus	0	<i>Cortinarius paragaudis</i> ssp. <i>Paragaudis</i>	-25.8	Clemmensen et al. 2006; Mayor et al., 2009
living fungus	0	<i>Cortinarius</i> sp. 4	-26.8	Clemmensen et al. 2006; Mayor et al., 2009
living fungus	0	<i>Leccinum rotundifoliae</i>	-26.7	Clemmensen et al. 2006; Mayor et al., 2009
living fungus	0	<i>Bryoglossum gracile</i>	-29.1	Clemmensen et al. 2006; Mayor et al., 2009
living fungus	0	<i>Fayodia bishaerigerella</i>	-27.3	Clemmensen et al. 2006; Mayor et al., 2009
living fungus	0	<i>Boletellus exiguus</i>	-25.3	Mayor et al., 2009
living fungus	0	<i>Cantharellus atratus</i>	-26.3	Mayor et al., 2009
living fungus	0	<i>Cantherellus guianensis</i>	-26	Mayor et al., 2009

living fungus	0	<i>Cantherellus pleurotoides</i>	-25	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cantherellus pleurotoides</i>	-25.24	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cantherellus pleurotoides</i>	-25.919	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Clavulina caespitosa</i>	-25.9	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Clavulina</i> "coral tiny wood"	-24.7	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Clavulina</i> "kunmudlutse grey"	-24.9	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Clavulina humicola</i>	-25.1	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Clavulina caespitosa</i>	-26.2	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Clavulina caespitosa</i>	-24.8	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius aff. Violaceus</i>	-27	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Craterellus</i> sp.	-25.6	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hygrocybe</i> "toe-head"	-28.7	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Inocybe ayangannae</i>	-25.5	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Lactarius</i> sp.	-25.5	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Lactarius</i> sp.	-26.6	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Pseudotulostoma volvata</i>	-27.4	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Pseudotulostoma volvata</i>	-26.6	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Pseudotulostoma volvata</i>	-26.42	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula</i> sp.	-24.3	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Thelephora</i> sp.	-27.4	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tomentella</i> sp.	-28.5	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tricholoma</i> "hygrophorous lg. orange"	-26.6	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tylopilus exiguus</i>	-27.1	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tylopilus exiguus</i>	-25.6	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tylopilus exiguus</i>	-25.3	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tylopilus potamogeton</i> var. <i>irengensis</i>	-24.8	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Amauroderma gusmanianum</i>	-24.5	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Amauroderma gusmanianum</i>	-24.4	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Amauroderma gusmanianum</i>	-23.9	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Collybia</i> sp.	-24.2	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cookiena</i>	-24.9	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Favolaschia</i> sp. "bubble-wrap"	-23.9	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Ganoderma stipitatum</i>	-24.6	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Marasmius</i> sp.	-21.8	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Perriniporia inflexibilis</i>	-26.3	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Perriniporia inflexibilis</i>	-25.823	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Perriniporia inflexibilis</i>	-	Mayor <i>et al.</i> , 2009
			25.7969	
living fungus	0	<i>Phellinus robustus</i>	-24	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Podocypha nitidula</i>	-23.9	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Stiptochaete damaeochormis</i>	-26.8	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Stiptochaete damaeochormis</i>	-24.9	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Stiptochaete damaeochormis</i>	-23	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Xylaria</i> sp.	-26.3	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Xylaria</i> sp.	-26.3	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Xylaria</i> sp.	-25.1	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Collybia laccata</i>	-26.9	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Agaricus</i> sp.	-27.1	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Coltriciella navispora</i>	-25.9	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Coltriciella navispora</i>	-	Mayor <i>et al.</i> , 2009
			25.9062	
living fungus	0	<i>Coltriciella navispora</i>	-	Mayor <i>et al.</i> , 2009
			25.4259	
living fungus	0	<i>Coltriciella oblectabilis</i>	-25.8	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Gymnopilus</i> sp.	-26.1	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tremellodendron</i> sp.	-25.9	Mayor <i>et al.</i> , 2009
living fungus	0	<i>Amanita citrina</i>	-26.7	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Amanita muscaria</i>	-25.5	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Amanita rubescens</i>	-26.2	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Boletus edulis</i>	-27	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cantharellus cibarius</i>	-26.6	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cantharellus tubiformis</i>	-25.9	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius alboviolaceus</i>	-28.1	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius anomalus</i>	-26.8	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius bolaris</i>	-25.9	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius delibutus</i>	-26.2	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius malicorius</i>	-26	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009

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living fungus	0	<i>Cortinarius paleaceus</i>	-25	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius sanguineus</i>	-26.3	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius subtortus</i>	-25.7	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hydnum rufescens</i>	-26	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hygrophorus lindtneri</i>	-28.6	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Laccaria amethystina</i>	-26.3	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Laccaria laccata</i>	-25.4	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Lactarius chrysorrheus</i>	-24.3	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Lactarius quietus</i>	-24.3	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Lactarius subdulcis</i>	-26.7	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Lactarius theiogalus</i>	-25	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula fellea</i>	-26.2	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula fragilis</i>	-25.7	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula mairei</i>	-27.4	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula ochroleuca</i>	-26.7	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula puellaris</i>	-26.7	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Scleroderma citrinum</i>	-25.4	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tricholoma columbetta</i>	-27.1	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tricholoma sciodes</i>	-26.9	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Tricholoma ustale</i>	-27.1	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Xerocomus badius</i>	-25.8	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Xerocomus chrysenteron</i>	-26.4	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Armillaria gallica</i>	-20.2	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Ascocoryne sarcoides</i>	-22.8	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Crepidotus cesatii</i> var. <i>cesatii</i>	-22.7	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Fomitopsis pinicola</i>	-21.6	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hypholoma fasciculare</i>	-23.4	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Leotia lubrica</i>	-25.7	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Mycena galericulata</i>	-22.1	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Mycena galopus</i>	-22.7	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Mycena inclinata</i>	-22.3	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Oudemansiella mucida</i>	-22.1	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Phallus impudicus</i>	-22.7	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Pholiota lenta</i>	-23.5	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Piptoporus betulinus</i>	-23.1	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Psathyrella piluliformis</i>	-23.7	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Amanita citrina</i>	-23.1	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Amanita muscaria</i>	-24.6	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Amanita porphyria</i>	-23.3	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Amanita rubescens</i>	-22.9	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Boletus aestivalis</i>	-23.9	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Boletus edulis</i>	-23.8	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Chalciporus piperatus</i>	-22.2	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Clavulina cristata</i>	-24.3	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cortinarius torvus</i>	-24.3	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Gomphidius glutinosus</i>	-24.6	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Laccaria amethystina</i>	-24.1	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Lactarius theiogalus</i>	-24.6	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Paxillus involutus</i>	-24.6	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula betularum</i>	-25.5	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula fellea</i>	-24.6	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula ochroleuca</i>	-24.2	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Russula puellaris</i>	-24.1	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Scleroderma citrinum</i>	-24.7	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Xerocomus badius</i>	-23.7	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Xerocomus subtomentosus</i>	-24.1	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Armillaria gallica</i>	-20.9	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Baeospora myosura</i>	-21	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Calocera viscosa</i>	-21.5	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Clitopilus prunulus</i>	-22.4	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Clytocibe clavipes</i>	-23	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Clytocibe vibecina</i>	-23.1	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Collybia butyracea</i>	-22.9	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Cystoderma amiantinum</i>	-22.2	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hygrophoropsis aurantiaca</i>	-20.3	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Hypholoma fasciculare</i>	-23.8	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Megacollybia platyphylla</i>	-23	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Micromphale perforans</i>	-25	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009

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living fungus	0	<i>Mycena leptophylla</i>	-23.3	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Mycena rosella</i>	-23.9	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Oudemansiella radicata</i>	-23.2	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Ramaria abietina</i>	-23	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living fungus	0	<i>Strobilurus esculentus</i>	-21.9	Zeller <i>et al</i> 2007; Mayor <i>et al.</i> , 2009
living hornwort	0	<i>Anthoceros agrestis</i>	-23.21	Fletcher <i>et al.</i> 2004
living hornwort	0	<i>Anthoceros agrestis</i>	-17.82	Smith & Griffiths 1996b; Fletcher <i>et al.</i> 2004
living hornwort	0	<i>Anthoceros crispulus</i>	-15.09	Smith & Griffiths 1996b; Fletcher <i>et al.</i> 2004
living hornwort	0	<i>Anthoceros laevis</i>	-17.82	Smith & Griffiths 1996b; Fletcher <i>et al.</i> 2004
living hornwort	0	<i>Anthoceros punctatus</i>	-14.9	Smith & Griffiths 1996b; Fletcher <i>et al.</i> 2004
living hornwort	0	<i>Anthoceros punctatus</i> (sporophyte)	-17.53	Smith & Griffiths 1996b; Fletcher <i>et al.</i> 2004
living hornwort	0	<i>Megaceros endivifolius</i>	-25.06	Smith & Griffiths 1996b; Fletcher <i>et al.</i> 2004
living hornwort	0	<i>Megaceros monardreus</i>	-27.16	Smith & Griffiths 1996b; Fletcher <i>et al.</i> 2004
living hornwort	0	<i>Phaeoceros</i> sp.	-18.79	Smith & Griffiths 1996b; Fletcher <i>et al.</i> 2004
living hornwort	0	<i>Phaeoceros laevis</i>	-18.11	Smith & Griffiths 1996b; Fletcher <i>et al.</i> 2004
living intertidal alga	0	<i>Asparagopsis armata</i>	-29.61	Raven <i>et al.</i> 1995a; Fletcher <i>et al.</i> 2004
living intertidal alga	0	<i>Bostrychia flagellifera</i>	-27.97	Raven <i>et al.</i> 1995a; Fletcher <i>et al.</i> 2004
living intertidal alga	0	<i>Bostrychia flagellifera</i>	-27.06	Raven <i>et al.</i> 1995a; Fletcher <i>et al.</i> 2004
living intertidal alga	0	<i>Bostrychia mortitziana</i>	-30.01	Raven <i>et al.</i> 1995a; Fletcher <i>et al.</i> 2004
living intertidal alga	0	<i>Bostrychia scorpiodes</i>	-31.2	Raven <i>et al.</i> 1995a; Fletcher <i>et al.</i> 2004
living intertidal alga	0	<i>Caloglossa lepreurii</i>	-28.84	Raven <i>et al.</i> 1995a; Fletcher <i>et al.</i> 2004
living intertidal alga	0	<i>Catanella nipae</i>	-29.31	Raven <i>et al.</i> 1995a; Fletcher <i>et al.</i> 2004
living intertidal alga	0	<i>Stictosiphonia arbuscula</i>	-29.77	Raven <i>et al.</i> 1995a; Fletcher <i>et al.</i> 2004
living intertidal alga	0	<i>Stictosiphonia hookeri</i>	-27.87	Raven <i>et al.</i> 1995a; Fletcher <i>et al.</i> 2004
living intertidal alga	0	<i>Caulocystis cephalomithus</i>	-13.82	Raven <i>et al.</i> 1995b; Fletcher <i>et al.</i> 2004
living intertidal alga	0	<i>Cystophora siliquosa</i>	-14.12	Raven <i>et al.</i> 1995b; Fletcher <i>et al.</i> 2004
living intertidal alga	0	<i>Cystophora subfarcinata</i>	-14.69	Raven <i>et al.</i> 1995b; Fletcher <i>et al.</i> 2004
living intertidal alga	0	<i>Hormosira banksii</i>	-11.98	Raven <i>et al.</i> 1995b; Fletcher <i>et al.</i> 2004
living intertidal alga	0	<i>Codium pomoides</i>	-2.47	Raven <i>et al.</i> 2002; Fletcher <i>et al.</i> 2004
living intertidal alga	0	<i>Lomentaria articulata</i>	-31.87	Raven <i>et al.</i> 2002; Fletcher <i>et al.</i> 2004
living intertidal alga	0	<i>Stictosiphonia arbuscula</i>	-30.09	Raven <i>et al.</i> 2002; Fletcher <i>et al.</i> 2004
living intertidal alga	0	<i>Alaria esculenta</i>	-15.6	Surif & Raven 1990; Fletcher <i>et al.</i> 2004
living intertidal alga	0	<i>Ascophyllum nodosum</i>	-17.6	Surif & Raven 1990; Fletcher <i>et al.</i> 2004
living intertidal alga	0	<i>Fucus serratus</i>	-17.6	Surif & Raven 1990; Fletcher <i>et al.</i> 2004
living intertidal alga	0	<i>Fucus spiralis</i>	-18.4	Surif & Raven 1990; Fletcher <i>et al.</i> 2004
living intertidal alga	0	<i>Fucus vesiculosus</i>	-19.5	Surif & Raven 1990; Fletcher <i>et al.</i> 2004
living intertidal alga	0	<i>Pelvetia canaliculata</i>	-20.8	Surif & Raven 1990; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Alectoria nidulifera</i>	-22.15	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Anaptychia palmatula</i>	-23.56	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Baeomyces rufescens</i>	-28.12	Smith & Griffiths 1996b; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Caloplaca cerina</i>	-23.3	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Cetraria islandica</i>	-23.96	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Cetrelia chictae</i>	-23.67	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Chaenotheca ferruginea</i>	-24.58	Smith & Griffiths 1996a; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Chaenotheca furfuracea</i>	-34.08	Smith & Griffiths 1996a; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Chaenotheca stemonaea</i>	-32.2	Smith & Griffiths 1996a; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Chaenotheca trichalis</i>	-29.83	Smith & Griffiths 1996a; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Cladina rangifera</i>	-23.8	Teeri 1981; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Cladonia capitata</i>	-24.11	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Cladonia coniocraea</i>	-26.22	Fletcher <i>et al.</i> 2004
living lichen	0	<i>Cladonia cristatella</i>	-23.8	Teeri 1981; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Cladonia gracilis</i>	-24.6	Teeri 1981; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Cladonia uncialis</i>	-21.8	Teeri 1981; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Cladonia verticillata</i>	-24.3	Teeri 1981; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Coelocaulon aculeatum</i>	-23.43	Smith & Griffiths 1998; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Dendriscoaulon umhausense</i>	-24.78	Smith & Griffiths 1996a; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Dermatocarpon intestiniforme</i>	-22.66	Smith & Griffiths 1996a; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Dermatocarpon luridum</i>	-20.73	Smith & Griffiths 1996a; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Dermatocarpon luridum</i>	-21.5	Smith & Griffiths 1996a; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Dermatocarpon meizophyllum</i>	-18.79	Smith & Griffiths 1996a; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Dermatocarpon minutum</i>	-23.14	Smith & Griffiths 1996a; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Dermatocarpon minutum</i>	-23.81	Smith & Griffiths 1996a; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Dermatocarpon rivulorum</i>	-18.79	Smith & Griffiths 1996a; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Dictyonema montanum</i>	-17.5	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Endocarpon pusillum</i>	-18.79	Smith & Griffiths 1996a; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Evernia mesomorpha</i>	-23.52	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Evernia prunastri</i>	-24.29	Máguas <i>et al.</i> 1995; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Evernia prunastri</i>	-24.29	Máguas <i>et al.</i> 1995; Fletcher <i>et al.</i> 2004

living lichen	0	<i>Evernia prunastri</i>	-24.68	Smith & Griffiths 1996a; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Evernia prunastri</i>	-25.54	Smith & Griffiths 1998; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Evernia prunastri</i>	-21.5	Máguas & Brugnoli 1996; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Heterodermia hypoleuca</i>	-23.38	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Hypogymnia enteromorpha</i>	-22.94	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Hypogymnia physodes</i>	-21.07	Máguas & Brugnoli 1996; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Hypogymnia physodes</i>	-25.35	Smith & Griffiths 1996a; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Hypogymnia physodes</i>	-25.11	Smith & Griffiths 1998; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Lasallia pustulata</i>	-20.89	Máguas & Brugnoli 1996; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Lasallia pustulata</i>	-20.34	Máguas <i>et al.</i> 1995; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Leptogium azureum</i>	-20.14	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Lobaria amplissima</i>	-29.92	Máguas & Brugnoli 1996; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Lobaria amplissima</i>	-31.16	Máguas <i>et al.</i> 1995; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Lobaria amplissima</i>	-30.78	Máguas <i>et al.</i> 1995; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Lobaria amplissima</i>	-31.15	Smith & Griffiths 1996a; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Lobaria amplissima</i>	-31.25	Smith & Griffiths 1996b; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Lobaria pulmonaria</i>	-29.77	Máguas & Brugnoli 1996; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Lobaria pulmonaria</i>	-31.53	Máguas <i>et al.</i> 1995; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Lobaria pulmonaria</i>	-31.25	Máguas <i>et al.</i> 1993; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Lobaria pulmonaria</i>	-30.49	Smith & Griffiths 1996b; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Lobaria scrobiculata</i>	-22.72	Máguas & Brugnoli 1996; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Lobaria scrobiculata</i>	-24.01	Máguas <i>et al.</i> 1995; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Lobaria scrobiculata</i>	-24.29	Máguas <i>et al.</i> 1993; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Nephroma arctium</i>	-27.36	Smith & Griffiths 1996b; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Nephroma laevigatum</i>	-22.85	Máguas <i>et al.</i> 1995; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Parmelia aurulenta</i>	-23.88	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Parmelia caperata</i>	-21.99	Máguas & Brugnoli 1996; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Parmelia reticulata</i>	-23.72	Máguas <i>et al.</i> 1995; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Parmelia reticulata</i>	-23.91	Máguas <i>et al.</i> 1995; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Parmelia saxatilis</i>	-22.92	Fletcher <i>et al.</i> 2004
living lichen	0	<i>Parmelia subrudecta</i>	-22.47	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Parmelia sulcata</i>	-21.7	Máguas & Brugnoli 1996; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Parmelia tilliacea</i>	-21.21	Máguas & Brugnoli 1996; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Peltigera aphthosa</i>	-36.43	Máguas <i>et al.</i> 1995; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Peltigera canina</i>	-22.89	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Peltigera canina</i>	-22.08	Máguas & Brugnoli 1996; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Peltigera canina</i>	-23.53	Máguas <i>et al.</i> 1995; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Peltigera canina</i>	-23.53	Máguas <i>et al.</i> 1995; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Peltigera leucophlebia</i>	-29.73	Smith <i>et al.</i> 1998; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Peltigera membranacea</i>	-22.37	Smith <i>et al.</i> 1998; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Peltigera praetextata</i>	-22.55	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Peltigera praetextata</i>	-22.47	Smith <i>et al.</i> 1998; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Plastimatia glauca</i>	-23.43	Smith & Griffiths 1996b; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Plastimatia glauca</i>	-22.47	Smith & Griffiths 1998; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Plastimatia tuckermanii</i>	-24.02	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Pseudocyphellaria aurata</i>	-33.8	Máguas <i>et al.</i> 1995; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Pseudovernia furfuracea</i>	-23.96	Smith & Griffiths 1998; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Pycnothelia papillaria</i>	-25.35	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Racodium rupestre</i>	-27.83	Smith & Griffiths 1996b; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Ramalina farinacea</i>	-20.49	Máguas & Brugnoli 1996; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Ramalina fastigiata</i>	-21.21	Máguas & Brugnoli 1996; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Ramalina fastigiata</i>	-19.86	Máguas <i>et al.</i> 1993; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Ramalina fastigiata</i>	-19.76	Máguas <i>et al.</i> 1995; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Ramalina fraxinea</i>	-20.18	Máguas & Brugnoli 1996; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Rocella phycodes</i>	-29.07	Smith & Griffiths 1996b; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Solorina crocea</i>	-29.85	Smith & Griffiths 1996a; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Solorina saccata</i>	-28.88	Smith & Griffiths 1996b; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Solorina spongiosa</i>	-21.71	Smith & Griffiths 1996a; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Sphaerophorus globosus</i>	-17.63	Smith & Griffiths 1998; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Stereocaulon sp.</i>	-22.06	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Stereocaulon tomentosum</i>	-23.8	Teeri 1981; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Sticta aurata</i>	-33.61	Máguas <i>et al.</i> 1995; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Sticta canariensis</i>	-34.74	Máguas <i>et al.</i> 1995; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Sticta canariensis</i>	-33.62	Smith & Griffiths 1996a; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Sticta duforii</i>	-24.4	Smith & Griffiths 1996a; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Umbilicaria caroliniana</i>	-19.86	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Umbilicaria papulosa</i>	-22.61	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Usnea sp.</i>	-24.95	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004

living lichen	0	<i>Usnea</i> sp.	-23.05	Máguas <i>et al.</i> 1995; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Usnea filipendula</i>	-22.95	Smith & Griffiths 1998; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Usnea subfloridana</i>	-23.72	Smith & Griffiths 1998; Fletcher <i>et al.</i> 2004
living lichen	0	<i>Xanthoria parietina</i>	-19.47	Máguas & Brugnoli 1996; Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Aneura pinguis</i>	-28.65	Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Aneura pinguis</i>	-30.29	Proctor <i>et al.</i> 1992; Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Bazzania fauriana</i>	-27.96	Kao <i>et al.</i> 2000; Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Bazzania trilobata</i>	-29.31	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Blasia pusilla</i>	-29.83	Smith & Griffiths 1996a; Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Blasia pusilla</i>	-29.83	Smith & Griffiths 1996b; Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Bryopteris fruticulosa</i>	-26.59	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Conocephalum conicum</i>	-30.67	Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Conocephalum conicum</i>	-29.34	Proctor <i>et al.</i> 1992; Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Conocephalum conicum</i>	-27.45	Smith & Griffiths 1996a; Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Conocephalum conicum</i>	-27.45	Smith & Griffiths 1996b; Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Gymnomitrium obtusum</i>	-24.04	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Harpanthus flotovianus</i>	-23.1	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Lophocolea bidentata</i>	-27.26	Smith & Griffiths 1996b; Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Lophocolea heterophylla</i>	-30.93	Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Lunularia cruciata</i>	-31.47	Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Marchantia</i> sp.	-28.4	Smith & Griffiths 1996b; Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Marchantia polymorpha</i>	-27.87	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Nardia scalaris</i>	-24.27	Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Pellia</i> sp.	-29.35	Smith & Griffiths 1996a; Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Pellia endivifolia</i>	-27.36	Smith & Griffiths 1996b; Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Pellia epiphylla</i>	-26.45	Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Pellia epiphylla</i>	-30.23	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Pellia epiphylla</i>	-28.06	Proctor <i>et al.</i> 1992; Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Preissia quadrata</i>	-22.66	Smith & Griffiths 1996a; Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Preissia quadrata</i>	-24.01	Smith & Griffiths 1996b; Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Riccardia fucoides</i>	-30.72	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Saccobasis polita</i>	-22.69	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Scapania nemorosa</i>	-40.25	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Scapania undulata</i>	-37.26	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Targonia hypophylla</i>	-28.81	Proctor <i>et al.</i> 1992; Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Trichocolea tomentosa</i>	-26.17	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living liverwort	0	<i>Marchantia polymorpha</i>	-20.6	Graham <i>et al.</i> , 2010
living liverwort	0	<i>Marchantia polymorpha</i>	-17.3	Graham <i>et al.</i> , 2010
living liverwort	0	<i>Marchantia polymorpha</i>	-21.7	Graham <i>et al.</i> , 2010
living liverwort	0	<i>Marchantia polymorpha</i>	-23.4	Graham <i>et al.</i> , 2010
living liverwort	0	<i>Marchantia polymorpha</i>	-25.5	Graham <i>et al.</i> , 2010
living marine lichen	0	<i>Lecanora atra</i>	-17.32	Raven & Johnston 1991; Fletcher <i>et al.</i> 2004
living marine lichen	0	<i>Lecanora atra</i>	-17.21	Raven & Johnston 1991; Fletcher <i>et al.</i> 2004
living marine lichen	0	<i>Lichina pygmaea</i>	-11.53	Raven <i>et al.</i> 1990; Fletcher <i>et al.</i> 2004
living marine lichen	0	<i>Lichina pygmaea</i>	-11.38	Raven <i>et al.</i> 1990; Fletcher <i>et al.</i> 2004
living marine lichen	0	<i>Lichina pygmaea</i>	-15.47	Raven <i>et al.</i> 1990; Fletcher <i>et al.</i> 2004
living marine lichen	0	<i>Lichina pygmaea</i>	-9.81	Raven <i>et al.</i> 1990; Fletcher <i>et al.</i> 2004
living marine lichen	0	<i>Lichina pygmaea</i>	-9.72	Raven <i>et al.</i> 1990; Fletcher <i>et al.</i> 2004
living marine lichen	0	' <i>Oscillatoria-like</i> '	-17.34	Raven <i>et al.</i> 1990; Fletcher <i>et al.</i> 2004
living marine lichen	0	<i>Ramalina siliquosa</i>	-18.51	Raven & Johnston 1991; Fletcher <i>et al.</i> 2004
living marine lichen	0	<i>Ramalina siliquosa</i>	-18.37	Raven & Johnston 1991; Fletcher <i>et al.</i> 2004
living marine lichen	0	<i>Xanthoria aureola</i>	-18.27	Raven & Johnston 1991; Fletcher <i>et al.</i> 2004
living marine lichen	0	<i>Xanthoria aureola</i>	-18.26	Raven & Johnston 1991; Fletcher <i>et al.</i> 2004
living moss	0	<i>Acrocladium cuspidatum</i>	-28.78	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Acrocladium cuspidatum</i>	-35.02	Smith & Griffiths 1996a; Fletcher <i>et al.</i> 2004
living moss	0	<i>Acrocladium cuspidatum</i>	-35.49	Smith & Griffiths 1996b; Fletcher <i>et al.</i> 2004
living moss	0	<i>Andreaea rupestris</i>	-22.54	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Andreaea rupestris</i>	-22.34	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Aulacomnium palustre</i>	-28.73	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Aulacomnium palustre</i>	-26	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Aulacomnium palustre</i>	-26.9	Teeri 1981; Fletcher <i>et al.</i> 2004
living moss	0	<i>Brachythecium</i> sp.	-30.97	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living moss	0	<i>Brachythecium laetum</i>	-28.84	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living moss	0	<i>Bryum pseudotriquetrum</i>	-28.62	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Calliargon cordifolium</i>	-25.47	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Campylum protensum</i>	-23.61	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Ceratodon purpureus</i>	-25.3	Teeri 1981; Fletcher <i>et al.</i> 2004
living moss	0	<i>Climacium dendroides</i>	-28.08	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004

living moss	0	<i>Climacium dendroides</i>	-29.82	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Cratoneurone commutatum</i>	-26.45	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Dawsonia pullei</i>	-30.7	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living moss	0	<i>Desmatodon convolutus</i>	-26.02	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Dicranella cerviculata</i>	-26.43	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Dicranum scoparium</i>	-27.27	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living moss	0	<i>Dicranum scoparium</i>	-29.35	Smith & Griffiths 1996a; Fletcher <i>et al.</i> 2004
living moss	0	<i>Dicranum scoparium</i>	-29.07	Smith & Griffiths 1996b; Fletcher <i>et al.</i> 2004
living moss	0	<i>Drepanocladus intermedius</i>	-30.3	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Drepanocladus ucinatus</i>	-26.74	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living moss	0	<i>Fontinalis antipyretica</i>	-37.24	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living moss	0	<i>Fontinalis antipyretica</i>	-36.94	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Fontinalis antipyretica</i>	-26.5	Smith & Griffiths 1996a; Fletcher <i>et al.</i> 2004
living moss	0	<i>Grimmia pilifera</i>	-26.19	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living moss	0	<i>Homalia trichomanoides</i>	-27.46	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Hymenostylium recurvirostrum</i>	-29.03	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Hypnum cupressiforme</i>	-27.45	Smith & Griffiths 1996a; Fletcher <i>et al.</i> 2004
living moss	0	<i>Hypnum cupressiforme</i>	-26.11	Smith & Griffiths 1996b; Fletcher <i>et al.</i> 2004
living moss	0	<i>Hypnum imponena</i>	-29.41	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living moss	0	<i>Leptodontium flexifolium</i>	-21.26	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Leptodontium viticulosoides</i>	-25.67	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Leucobryum glaucum</i>	-26.71	Proctor <i>et al.</i> 1992; Fletcher <i>et al.</i> 2004
living moss	0	<i>Micromitrium cirrosium</i>	-26.86	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living moss	0	<i>Mnium sp.</i>	-30.11	Smith & Griffiths 1996b; Fletcher <i>et al.</i> 2004
living moss	0	<i>Mnium pseudopunctatum</i>	-22.4	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Mnium hornum</i>	-27.21	Fletcher <i>et al.</i> 2004
living moss	0	<i>Paraleucobryum longifolium</i>	-26.83	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Pleurochaete luteola</i>	-27.68	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Pleurozium schreberi</i>	-30.97	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living moss	0	<i>Polytrichum commune</i>	-24.76	Fletcher <i>et al.</i> 2004
living moss	0	<i>Polytrichum commune</i>	-26.13	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living moss	0	<i>Polytrichum commune</i>	-24.2	Teeri 1981; Fletcher <i>et al.</i> 2004
living moss	0	<i>Polytrichum piliferum</i>	-27.1	Teeri 1981; Fletcher <i>et al.</i> 2004
living moss	0	<i>Polytrichum strictum</i>	-27.1	Teeri 1981; Fletcher <i>et al.</i> 2004
living moss	0	<i>Prionodon densus</i>	-26.91	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living moss	0	<i>Racomitrium canescens</i>	-27.62	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Racomitrium heterostichum</i>	-24.02	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Racomitrium lanuginosum</i>	-23.28	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Racomitrium ramulosum</i>	-24.88	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Scorpidium scorpiodes</i>	-34.77	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Sphagnum capillifolium</i>	-27.5	Price <i>et al.</i> 1997; Fletcher <i>et al.</i> 2004
living moss	0	<i>Sphagnum capillifolium</i> var. <i>rubellum</i>	-28.59	Proctor <i>et al.</i> 1992; Fletcher <i>et al.</i> 2004
living moss	0	<i>Sphagnum compactum</i>	-27.14	Proctor <i>et al.</i> 1992; Fletcher <i>et al.</i> 2004
living moss	0	<i>Sphagnum cuspidatum</i>	-27.98	Price <i>et al.</i> 1997; Fletcher <i>et al.</i> 2004
living moss	0	<i>Sphagnum flexuosum</i>	-30.81	Proctor <i>et al.</i> 1992; Fletcher <i>et al.</i> 2004
living moss	0	<i>Sphagnum imbricatum</i>	-27.5	Price <i>et al.</i> 1997; Fletcher <i>et al.</i> 2004
living moss	0	<i>Sphagnum magellanicum</i>	-27.3	Price <i>et al.</i> 1997; Fletcher <i>et al.</i> 2004
living moss	0	<i>Sphagnum magellanicum</i>	-26.2	Price <i>et al.</i> 1997; Fletcher <i>et al.</i> 2004
living moss	0	<i>Sphagnum magellanicum</i>	-27.88	Proctor <i>et al.</i> 1992; Fletcher <i>et al.</i> 2004
living moss	0	<i>Sphagnum magellanicum</i>	-23.72	Rice & Giles 1996; Fletcher <i>et al.</i> 2004
living moss	0	<i>Sphagnum magellanicum</i>	-26	Teeri 1981; Fletcher <i>et al.</i> 2004
living moss	0	<i>Sphagnum offline</i>	-23.1	Rice & Giles 1996; Fletcher <i>et al.</i> 2004
living moss	0	<i>Sphagnum palustre</i>	-28.34	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Sphagnum papillosum</i>	-26.96	Price <i>et al.</i> 1997; Fletcher <i>et al.</i> 2004
living moss	0	<i>Sphagnum recurvum</i>	-25.8	Teeri 1981; Fletcher <i>et al.</i> 2004
living moss	0	<i>Sphagnum squarrosum</i>	-26.06	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living moss	0	<i>Sphagnum squarrosum</i>	-29.5	Proctor <i>et al.</i> 1992; Fletcher <i>et al.</i> 2004
living moss	0	<i>Sphagnum subnitens</i>	-27.53	Price <i>et al.</i> 1997; Fletcher <i>et al.</i> 2004
living moss	0	<i>Sphagnum subsecundum</i>	-32.72	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living moss	0	<i>Sphagnum tenellum</i>	-28.35	Proctor <i>et al.</i> 1992; Fletcher <i>et al.</i> 2004
living moss	0	<i>Sphagnum trinitense</i>	-25.57	Proctor <i>et al.</i> 1992; Fletcher <i>et al.</i> 2004
living moss	0	<i>Tetraphis pellucida</i>	-28.55	Jahren <i>et al.</i> 2003; Fletcher <i>et al.</i> 2004
living moss	0	<i>Thuidium tamarascinum</i>	-31.06	Smith & Griffiths 1996b; Fletcher <i>et al.</i> 2004
living moss	0	<i>Tortula bartramii</i>	-23.59	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Tortula ruralis</i>	-26.4	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Trichostomopsis australasiae</i>	-24.44	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living moss	0	<i>Weissia controversa</i>	-29.56	Rundel <i>et al.</i> 1979; Fletcher <i>et al.</i> 2004
living vascular land plant	0	<i>Abarema curvicaipa</i>	-29.2	Dieffendorf <i>et al.</i> , 2010

living vascular land plant	0	<i>Abarema jupunba</i>	-29.4	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Abarema jupunba</i>	-29.4	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Abarema jupunba</i>	-29.1	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Abies alba</i>	-27.66	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Abies alba</i>	-26.91	Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Abies lasiocarpa</i>	-24.50	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Abies lasiocarpa</i>	-27.3	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Abies lasiocarpa</i>	-26.4	Hobbie & Boyce, 2010
living vascular land plant	0	<i>Abies lasiocarpa</i>	-28.2	Hobbie & Boyce, 2010
living vascular land plant	0	<i>Abies lasiocarpa</i>	-25.1	Hobbie & Boyce, 2010
living vascular land plant	0	<i>Abies lasiocarpa</i>	-26.6	Hobbie & Boyce, 2010
living vascular land plant	0	<i>Abies lasiocarpa</i>	-25.6	Hobbie & Boyce, 2010
living vascular land plant	0	<i>Acacia angustissima</i>	-26.9	Mooney <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Acacia koa</i>	-27.16	Hansen & Steig, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Acacia koa</i>	-25.44	Hansen & Steig, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Acamptopappus sphaerocephalus</i>	-27.45	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Acamptopappus sphaerocephalus</i>	-26.97	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Acer campestre</i>	-27.76	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Acer campestre</i>	-30.4	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Acer campestre</i>	-27.50	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Acer grandidentatum</i>	-26.03	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Acer monspessulanum</i>	-26.68	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Acer monspessulanum</i>	-26.72	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Acer negundo</i>	-27.35	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Acer negundo</i>	-26.05	Dawson & Ehleringer, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Acer negundo</i>	-27.94	Dawson & Ehleringer, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Acer negundo</i>	-25.34	Dawson & Ehleringer, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Acer negundo</i>	-28.65	Dawson & Ehleringer, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Acer negundo</i>	-24.63	Dawson & Ehleringer, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Acer negundo</i>	-27.23	Dawson & Ehleringer, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Acer negundo</i>	-24.63	Dawson & Ehleringer, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Acer negundo</i>	-28.89	Dawson & Ehleringer, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Acer rubrum</i>	-28.80	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Acer rubrum</i>	-30.20	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Acer rubrum</i>	-31.30	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Acrocomia aculeata</i>	-27.00	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Agropyron desertorum</i>	-26.16	Johnson & Tieszen, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Agropyron desertorum</i>	-26.83	Mayland <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Agropyron desertorum</i>	-23.95	Mayland <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Agropyron desertorum</i>	-26.83	Mayland <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Agropyron intermedium</i>	-28.8	Smith & Brown 1973
living vascular land plant	0	<i>Agropyron repens</i>	-25.7	Smith & Brown 1973
living vascular land plant	0	<i>Agropyron smithii</i>	-26.5	Mole <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Agropyron spicatum</i>	-26.78	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Agropyron spicatum</i>	-27.1	Smith & Brown 1973
living vascular land plant	0	<i>Agrostis capillaris</i>	-29.58	Beerling & Woodward, 1995; Arens <i>et al.</i> 2000
living vascular land plant	0	<i>Agrostis hiemalis</i>	-27.8	Smith & Brown 1973
living vascular land plant	0	<i>Agrostis tenuis</i>	-28.4	Smith & Brown 1973
living vascular land plant	0	<i>Albizia adinocephala</i>	-28.60	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Alloteropsis semialata</i>	-26.7	Vogel <i>et al.</i> 1978
living vascular land plant	0	<i>Alnus crispa</i>	-28.4	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Alnus crispa</i>	-28.3	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Alnus glutinosa</i>	-26.06	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Alnus glutinosa</i>	-26.56	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Alnus glutinosa</i>	-27.21	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Alnus glutinosa</i>	-28.82	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Alyssum minus</i>	-26.97	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Amanoa congesta</i>	-28.4	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Ambrosia dumosa</i>	-26.59	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Ambrosia dumosa</i>	-24.39	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Ambrosia eriocentra</i>	-27.07	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Ambrosia eriocentra</i>	-25.73	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Ambrosia psilostachya</i>	-26.21	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Amelanchier alnifolia</i>	-25.74	Diefendorf <i>et al.</i> , 2010

living vascular land plant	0	<i>Amelanchier utahensis</i>	-25	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Amphicarpum purshii</i>	-26.7	Smith & Brown 1973
living vascular land plant	0	<i>Anacardium excelsum</i>	-26.03	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Andira coriacea</i>	-30.8	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Anthoxanthum odoratum</i>	-27.58	Beerling & Woodward, 1995; Arens <i>et al.</i> 2000
living vascular land plant	0	<i>Anthoxanthum odoratum</i>	-27.8	Smith & Brown 1973
living vascular land plant	0	<i>Antirrhoea trichantha</i>	-28.70	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Apeiba membranacea</i>	-30.3	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Apeiba membranacea</i>	-30.5	Terwilliger, 1997; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Apeiba membranacea</i>	-31.1	Terwilliger, 1997; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Apeiba membranacea</i>	-32	Terwilliger, 1997; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Apeiba tibourbou</i>	-30.5	Terwilliger, 1997; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Apeiba tibourbou</i>	-29.5	Terwilliger, 1997; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Aphelandra pulcherrima</i>	-31.1	Broadmeadow <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Aphelandra pulcherrima</i>	-32.4	Broadmeadow <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Apoplanesia paniculata</i>	-27.3	Mooney <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Aporosa yumanensis</i>	-30.82	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Arachis hypogaea</i>	-28.35	Wright <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Arachis hypogaea</i>	-28.16	Wright <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Arachis hypogaea</i>	-27.97	Wright <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Arachis hypogaea</i>	-27.21	Wright <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Arachis hypogaea</i>	-26.73	Wright <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Arachis hypogaea</i>	-26.73	Wright <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Arachis hypogaea</i>	-26.53	Nageswara Rao <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Arachis hypogaea</i>	-26.44	Nageswara Rao <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Arachis hypogaea</i>	-26.39	Nageswara Rao <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Arachis hypogaea</i>	-26.34	Nageswara Rao <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Arachis hypogaea</i>	-26.32	Nageswara Rao <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Arachis hypogaea</i>	-26.23	Nageswara Rao <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Arachis hypogaea</i>	-26.21	Nageswara Rao <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Arachis hypogaea</i>	-26.19	Nageswara Rao <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Arachis hypogaea</i>	-26.16	Wright <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Arachis hypogaea</i>	-26.05	Nageswara Rao <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Arachis hypogaea</i>	-26.01	Nageswara Rao <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Arachis hypogaea</i>	-25.97	Wright <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Arbutus menziesii</i>	-27.05	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Arctostaphylos patula</i>	-26.50	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Arrhenatherium elatius</i>	-28.44	Beerling & Woodward, 1995; Arens <i>et al.</i> 2000
living vascular land plant	0	<i>Artemisia tridentata</i>	-25.40	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Artemisia ludoviciana</i>	-26.69	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Artemisia tridentata</i>	-24.05	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Artemisia tridentata</i>	-24.81	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Artemisia tridentata</i>	-25.90	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Artemisia tridentata</i>	-27.87	Donovan & Ehleringer, 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Artemisia tridentata</i>	-27.61	Donovan & Ehleringer, 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Artemisia tridentata</i>	-25.8	Toft <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Artemisia tridentata</i>	-25.9	Toft <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Artemisia tridentata</i>	-26	Toft <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Artemisia tridentata</i>	-26.3	Toft <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Arundinaria tecta</i>	-25.8	Smith & Brown 1973
living vascular land plant	0	<i>Arundo donax</i>	-27.3	Smith & Brown 1973
living vascular land plant	0	<i>Aster chilensis</i>	-26.59	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Astragalus cibaricus</i>	-26.21	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Astragalus utahensis</i>	-27.16	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Astronium graveolens</i>	-30.30	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Ateleia herbert-smithii</i>	-31.10	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Avena sativa</i>	-24.3	Smith & Brown 1973
living vascular land plant	0	<i>Bactris cusea</i>	-31.9	Broadmeadow <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Balizia pedicellaris</i>	-29.5	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Balizia pedicellaris</i>	-28.3	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Balizia pedicellaris</i>	-27.5	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Balsamorhiza macrophylla</i>	-25.54	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Balsamorhiza sagittaria</i>	-26.4	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Bambusa vulgaris</i>	-29.5	Smith & Brown 1973
living vascular land plant	0	<i>Bebbia juncea</i>	-26.02	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Bebbia juncea</i>	-23.91	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Beckmannia syzigachne</i>	-25.1	Smith & Brown 1973

living vascular land plant	0	<i>Betula grossa</i>	-27.23	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Betula pendula</i>	-25.08	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000, Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Betula pendula</i>	-26.95	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000, Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Betula pendula</i>	-25.22	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000, Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Betula pendula</i>	-25.96	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000, Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Betula pubescens</i>	-28.86	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Bocoo prouacensis</i>	-31.8	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Bocoo prouacensis</i>	-29.7	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Bocoo prouacensis</i>	-30.7	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Brachelytrum erectum</i>	-26.8	Smith & Brown 1973
living vascular land plant	0	<i>Brachypodium pinnatum</i>	-27.3	Beerling & Woodward, 1995; Arens <i>et al.</i> 2000
living vascular land plant	0	<i>Brassica oleracea</i>	-28.97	Martin <i>et al.</i> , 1988; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Briza rotundata</i>	-26.6	Smith & Brown 1973
living vascular land plant	0	<i>Bromus catharticus</i>	-24.2	Vogel <i>et al.</i> 1978
living vascular land plant	0	<i>Bromus catharticus</i>	-27	Smith & Brown 1973
living vascular land plant	0	<i>Bromus commutatus</i>	-28.2	Smith & Brown 1973
living vascular land plant	0	<i>Bromus erectus</i>	-26.53	Beerling & Woodward, 1995; Arens <i>et al.</i> 2000
living vascular land plant	0	<i>Bromus inermis</i>	-26.6	Smith & Brown 1973
living vascular land plant	0	<i>Bromus purgans</i>	-24.7	Smith & Brown 1973
living vascular land plant	0	<i>Bromus sterilis</i>	-27.11	Beerling & Woodward, 1995; Arens <i>et al.</i> 2000
living vascular land plant	0	<i>Bromus tectorum</i>	-23	Polley <i>et al.</i> , 1995; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Bromus tectorum</i>	-23	Polley <i>et al.</i> , 1995; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Bromus tectorum</i>	-28	Polley <i>et al.</i> , 1995; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Bromus tectorum</i>	-28	Polley <i>et al.</i> , 1995; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Bromus tectorum</i>	-26.97	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Brosimum acutifolium</i>	-31.6	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Brosimum alicastrum</i>	-30.50	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Brosimum alicastrum</i>	-26.5	Broadmeadow <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Brosimum alicastrum</i>	-27.2	Broadmeadow <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Brosimum guianense</i>	-29.6	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Brosimum rubescens</i>	-31.1	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Bunchosia biocellata</i>	-30.00	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Bursera instabilis</i>	-26.8	Mooney <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Buxus sempervirens</i>	-25.9	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Buxus sempervirens</i>	-25.9	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Buxus sempervirens</i>	-24.34	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Buxus sempervirens</i>	-23.67	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Buxus sempervirens</i>	-23.29	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Caesalpinia coriaria</i>	-26.9	Mooney <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Caesalpinia sclerocarpa</i>	-26.5	Mooney <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Calamagrostis canadensis</i>	-27.5	Smith & Brown 1973
living vascular land plant	0	<i>Calliandra guildingii</i>	-29.7	Broadmeadow <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Calliandra guildingii</i>	-31	Broadmeadow <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Calycophyllum candidissimum</i>	-30.70	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Camelina microcarpa</i>	-27.93	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Canarium album</i>	-28.31	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Capparis indica</i>	-29.30	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Capparis indica</i>	-27.5	Mooney <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Capsicum annuum</i>	-28.7	Mooney <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Carapa guianensis</i>	-30.49	Huc <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Carapa procera</i>	-29.2	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Carapa procera</i>	-31.1	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Carapa procera</i>	-29.3	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Carex heliophila</i>	-25.7	Mole <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Carpinus betulus</i>	-26.67	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Carpinus caroliniana</i>	-31.10	Diefendorf <i>et al.</i> , 2010

living vascular land plant	0	<i>Carpinus caroliniana</i>	-30.50	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Caryocar glabrum</i>	-29.4	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Caryocar glabrum</i>	-29.4	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Casearia corymbosa</i>	-28.1	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Casearia corymbosa</i>	-26.7	Mooney <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Casearia gujanensis</i>	-28.3	Broadmeadow <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Casearia gujanensis</i>	-29.6	Broadmeadow <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Casearia sylvestris</i>	-30.00	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Castanopsis chinensis</i>	-29.80	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Castilla elastica</i>	-28.10	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Catostemma fragrans</i>	-30.4	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Catostemma fragrans</i>	-31.4	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Cecropia insignis</i>	-30.5	Terwilliger, 1997; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Cecropia insignis</i>	-30.5	Terwilliger, 1997; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Cecropia insignis</i>	-31.4	Terwilliger, 1997; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Cecropia insignis</i>	-32.4	Terwilliger, 1997; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Cecropia longipes</i>	-26.60	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Cecropia peltata</i>	-27.70	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Cecropia peltata</i>	-29.2	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Cecropia peltata</i>	-29.9	Terwilliger, 1997; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Cecropia peltata</i>	-29.2	Terwilliger, 1997; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Centotheca lappacea</i>	-30.9	Smith & Brown 1973
living vascular land plant	0	<i>Ceratoides lanata</i>	-27.6	Toft <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Ceratoides lanata</i>	-28.8	Toft <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Ceratoides lanata</i>	-28.9	Toft <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Ceratoides lanata</i>	-28.9	Toft <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Ceratonia siliqua</i>	-26.18	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Ceratonia siliqua</i>	-24.41	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Ceratonia siliqua</i>	-26.05	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Ceratonia siliqua</i>	-26.84	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Cercocarpus montanus</i>	-25.3	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Cercocarpus montanus</i>	-24.9	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Chaetocarpus schomburg</i>	-31.3	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Chaetocarpus schomburg</i>	-33.8	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Chaetocarpus schomburg</i>	-31.9	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Chamaenerion angustifolium</i>	-28.25	Beerling & Woodward, 1995; Arens <i>et al.</i> 2000
living vascular land plant	0	<i>Chlorophora tinctoria</i>	-26.7	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Chlorophora tinctoria</i>	-28.1	Mooney <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Chrysophyllum brenessii</i> Pittier	-31.10	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Chrysophyllum cainito</i>	-29.70	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Chrysophyllum prieurii</i>	-29.7	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Chrysophyllum prieurii</i>	-30	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Chrysophyllum sanguino</i>	-30.3	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Chrysophyllum sanguino</i>	-29.4	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Chrysothamnus nauseosus</i>	-28.01	Donovan & Ehleringer, 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Chrysothamnus nauseosus</i>	-27.46	Donovan & Ehleringer, 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Chrysothamnus nauseosus</i>	-26.02	Donovan & Ehleringer, 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Chrysothamnus nauseosus</i>	-27.36	Donovan & Ehleringer, 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Chrysothamnus nauseosus</i>	-29.3	Donovan & Ehleringer, 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Chrysothamnus nauseosus</i>	-27.74	Donovan & Ehleringer, 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Chrysothamnus paniculatus</i>	-27.93	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Chrysothamnus paniculatus</i>	-24.68	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Cinna latifolia</i>	-25.1	Smith & Brown 1973
living vascular land plant	0	<i>Cirsium undulatum</i>	-25.92	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Citharexylum sp.</i>	-24.8	Mooney <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Clathrotropis brachypetala</i>	-28.2	Broadmeadow <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Clathrotropis brachypetala</i>	-31.8	Broadmeadow <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Coccoloba liebmannii</i>	-26.8	Mooney <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Coelachne africana</i>	-27.2	Smith & Brown 1973
living vascular land plant	0	<i>Coffea arabica</i>	-27.11	Gutiérrez & Meinzer; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Coffea arabica</i>	-27.4	Gutiérrez & Meinzer; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Coffea arabica</i>	-27.4	Gutiérrez & Meinzer; Arens <i>et al.</i> , 2000



living vascular land plant	0	<i>Coffea arabica</i>	-27.49	Gutiérrez & Meinzer; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Coffea arabica</i>	-27.49	Gutiérrez & Meinzer; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Coffea arabica</i>	-27.59	Gutiérrez & Meinzer; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Coffea arabica</i>	-27.88	Gutiérrez & Meinzer; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Coffea arabica</i>	-28.26	Gutiérrez & Meinzer; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Colubrina oppositifolia</i>	-25.14	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Colubrina triflora</i>	-27.6	Mooney <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Comandra umbellata</i>	-29.64	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Condalia hookeri</i>	-27.80	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Conifers</i>	-25.38	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Cordia alliodora</i>	-28.60	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Cordia alliodora</i>	-28.5	Mooney <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Cordia sp.</i>	-33.1	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Cortaderia selloana</i>	-24.4	Vogel <i>et al.</i> 1978
living vascular land plant	0	<i>Cortaderia selloana</i>	-28.9	Smith & Brown 1973
living vascular land plant	0	<i>Corylus californica</i>	-29.84	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Cotylelobium burckii</i>	-31.33	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Cotylelobium melanoxyton</i>	-30.84	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Cotylelobium melanoxyton</i>	-30.25	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Couepia caryophylloides</i>	-30.7	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Couepia caryophylloides</i>	-29.6	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Couepia guianensis</i>	-31.7	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Couma guianensis</i>	-28.9	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Couratari guianensis</i>	-30.9	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Cowania mexicana</i>	-25.1	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Crataegus monogyna</i>	-28.14	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Crataegus monogyna</i>	-28.94	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Cratogeomys glaucum</i>	-31.29	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Crepis occidentalis</i>	-27.16	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Croton pseudonivens</i>	-28.1	Mooney <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Croton tiglium</i>	-29.50	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Cryptantha torreyana</i>	-28.4	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Cryptocarya chinensis</i>	-33.62	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Cryptocarya concinna</i>	-34.86	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Cryptochloa lappacea</i>	-30.9	Smith & Brown 1973
living vascular land plant	0	<i>Cryptochloa varians</i>	-31.1	Smith & Brown 1973
living vascular land plant	0	<i>Cunninghamia lanceolata</i>	-29.16	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Cupania guatemalensis</i>	-30.30	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Cymopterus longipes</i>	-26.78	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Dacryodes nitens</i>	-31.7	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Dactylis glomerata</i>	-28.44	Beerling & Woodward, 1995; Arens <i>et al.</i> 2000
living vascular land plant	0	<i>Dactylis glomerata</i>	-24.53	Johnson & Tieszen, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Dactylis glomerata</i>	-27.5	Smith & Brown 1973
living vascular land plant	0	<i>Danthonia spicata</i>	-26.4	Smith & Brown 1973
living vascular land plant	0	<i>Deciduous broadleaf</i>	-28.47	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Dendrobanxia boliviana</i>	-31.1	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Dendrobanxia boliviana</i>	-31.5	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Dendrobanxia boliviana</i>	-31.1	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Deschampsia flexuosa</i>	-24.4	Smith & Brown 1973
living vascular land plant	0	<i>Diarrhena americana</i>	-29.5	Smith & Brown 1973
living vascular land plant	0	<i>Dicorynia guianensis</i>	-29	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Dicorynia guianensis</i>	-28.6	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Dicorynia guianensis</i>	-28	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Dicorynia guianensis</i>	-27.82	Huc <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Didymopanax morototoni</i>	-28.50	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Digitalis purpurea</i>	-26.72	Beerling & Woodward, 1995; Arens <i>et al.</i> 2000
living vascular land plant	0	<i>Diospyros nicaraguensis</i>	-30.40	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Diospyros sandwicensis</i>	-27.135	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Diploptropis purpurea</i>	-30.7	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Diploptropis purpurea</i>	-31.2	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Dipterocarpus cf. Eurynchus</i>	-30.39	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Dregechloa calviniensis</i>	-26.3	Vogel <i>et al.</i> 1978
living vascular land plant	0	<i>Dregechloa pumila</i>	-25.9	Vogel <i>et al.</i> 1978
living vascular land plant	0	<i>Dryas octopetala</i>	-28.26	Welker <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Dryas octopetala</i>	-29.21	Welker <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Dryas octopetala</i>	-29.11	Welker <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000

living vascular land plant	0	<i>Dryas octopetala</i>	-29.02	Welker <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Drypetes variabilis</i>	-31	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Dudleya blochmanae</i>	-23.2	Troughton <i>et al.</i> 1977
living vascular land plant	0	<i>Dudleya cymosa</i> var. <i>ovatifolia</i>	-24.4	Troughton <i>et al.</i> 1977
living vascular land plant	0	<i>Dudleya parva</i>	-20.9	Troughton <i>et al.</i> 1977
living vascular land plant	0	<i>Ecclinusa guianensis</i>	-29.9	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Ehrharta erecta</i>	-26.5	Smith & Brown 1973
living vascular land plant	0	<i>Ehrharta calycina</i>	-23.9	Vogel <i>et al.</i> 1978
living vascular land plant	0	<i>Elymus canadensis</i>	-27.1	Smith & Brown 1973
living vascular land plant	0	<i>Elymus elymoides</i>	-25	Toft <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Elymus elymoides</i>	-25.4	Toft <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Elymus elymoides</i>	-25.8	Toft <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Elymus elymoides</i>	-26.4	Toft <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Elymus lanceolatus</i>	-24.2	Toft <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Elymus lanceolatus</i>	-25.2	Toft <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Elymus lanceolatus</i>	-26	Toft <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Elymus lanceolatus</i>	-26.6	Toft <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Elymus virginicus</i>	-26.6	Smith & Brown 1973
living vascular land plant	0	<i>Elytrophorus globularis</i>	-25.7	Vogel <i>et al.</i> 1978
living vascular land plant	0	<i>Elytrophorus spicatus</i>	-26.2	Vogel <i>et al.</i> 1978
living vascular land plant	0	<i>Encelia farinosa</i>	-25.35	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Encelia farinosa</i>	-24.29	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Encelia farinosa</i>	-24.43	Ehleringer, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Encelia farinosa</i>	-25.39	Ehleringer, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Encelia farinosa</i>	-26.35	Ehleringer, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Enterolobium cyclocarpum</i>	-28.30	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Eperua falcata</i>	-28.5	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Eperua falcata</i>	-28.6	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Eperua falcata</i>	-28.3	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Eperua falcata</i>	-26.81	Huc <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Eperua grandiflora</i>	-28.9	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Eperua grandiflora</i>	-29.5	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Eperua grandiflora</i>	-28.9	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Epilobium hirsutum</i>	-26.05	Beerling & Woodward, 1995; Arens <i>et al.</i> 2000
living vascular land plant	0	<i>Epilobium laxiflora</i>	-28.1	Hobbie & Boyce, 2010
living vascular land plant	0	<i>Epilobium laxiflora</i>	-28.4	Hobbie & Boyce, 2010
living vascular land plant	0	<i>Epilobium laxiflora</i>	-28.5	Hobbie & Boyce, 2010
living vascular land plant	0	<i>Epilobium laxiflora</i>	-27.5	Hobbie & Boyce, 2010
living vascular land plant	0	<i>Epilobium laxiflora</i>	-26.9	Hobbie & Boyce, 2010
living vascular land plant	0	<i>Erigeron divergens</i>	-26.78	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Erodium cicutarium</i>	-28.97	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Erythroxyllum havanense</i>	-27	Mooney <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Eschweilera coriacea</i>	-31.1	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Eschweilera decolorans</i>	-31.1	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Eschweilera decolorans</i>	-29.8	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Eschweilera micrantha</i>	-31.8	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Eschweilera micrantha</i>	-31.3	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Eschweilera parviflora</i>	-30.7	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Eschweilera parviflora</i>	-33.2	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Eschweilera sagotiana</i>	-32.2	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Eschweilera sagotiana</i>	-31.3	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Eschweilera sp.</i>	-31	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Eucalyptus globulus</i>	-27.4	Osório & Pereira, 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Eucalyptus globulus</i>	-26.8	Osório & Pereira, 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Eucalyptus globulus</i>	-26.8	Osório & Pereira, 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Eucalyptus globulus</i>	-26.8	Osório & Pereira, 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Eucalyptus globulus</i>	-26.8	Osório & Pereira, 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Eucalyptus globulus</i>	-25.7	Osório & Pereira, 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Eucalyptus robusta</i>	-27.40	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Eugenia ecostulata</i>	-31.06	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	Evergreen broadleaf	-26.65	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Fagus crenata</i>	-27.78	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Fagus sylvatica</i>	-29.8	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Fagus japonica</i>	-27.29	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Fagus sylvatica</i>	-27.88	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Fagus sylvatica</i>	-27.43	Martin <i>et al.</i> , 1988; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Fagus sylvatica</i>	-27	Dupouey <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000

living vascular land plant	0	<i>Fagus sylvatica</i>	-26.95	Dupouey <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Fagus sylvatica</i>	-26.9	Dupouey <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Fagus sylvatica</i>	-26.85	Dupouey <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Fagus sylvatica</i>	-26.8	Dupouey <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Fagus sylvatica</i>	-26.7	Dupouey <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Fagus sylvatica</i>	-26.6	Dupouey <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Fagus sylvatica</i>	-26.5	Dupouey <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Fagus sylvatica</i>	-26.4	Dupouey <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Fagus sylvatica</i>	-26.4	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Festuca arundinacea</i>	-24.43	Johnson & Tieszen, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Ficus insipida</i>	-27.05	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Ficus maxima</i>	-26.70	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Forchhammeria pallida</i>	-24.1	Mooney <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Frangula alnus</i>	-29.04	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Fraxinus angustifolia</i>	-25.89	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Galium aparine</i>	-28.78	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Garcinia oblongifolia</i>	-30.02	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Genipa americana</i>	-29.50	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Gentiana alpina</i>	-26.48	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Gentiana alpina</i>	-25.88	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Gentiana alpina</i>	-24.62	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Gentiana alpina</i>	-24.72	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Glyceria grandis</i>	-23.7	Smith & Brown 1973
living vascular land plant	0	<i>Glyceria striata</i>	-24.6	Smith & Brown 1973
living vascular land plant	0	<i>Glycydendron amazoni</i>	-30.8	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Goupia glabra</i>	-29.9	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Goupia glabra</i>	-30	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Goupia glabra</i>	-29.57	Huc <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Grindelia squarrosa</i>	-26.78	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Guarea glabra</i>	-29.50	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Guettarda macrosperma</i>	-30.50	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Gustavia hexapetala</i>	-32	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Gutierrezia sarothrae</i>	-26.78	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Gutierrezia sarothrae</i>	-24.01	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Gutierrezia sarothrae</i>	-26.02	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Hamelia versicolor</i>	-27.4	Mooney <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Hebepetalum humiriifoli</i>	-31.8	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Hedysarum boreale</i>	-26.5	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Helianthus annuus</i>	-29.39	Beerling & Woodward, 1995; Arens <i>et al.</i> 2000
living vascular land plant	0	<i>Helicia reticulata</i>	-28.40	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Helicostylis pedunculata</i>	-30.3	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Helleborus foetidus</i>	-25.39	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Helleborus foetidus</i>	-26.63	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Helleborus foetidus</i>	-37.31	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Helleborus foetidus</i>	-24.5	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Heterochloe odorata</i>	-22.8	Smith & Brown 1973
living vascular land plant	0	<i>Hevea guianensis</i>	-29.2	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Holcus lanatus</i>	-29.96	Beerling & Woodward, 1995; Arens <i>et al.</i> 2000
living vascular land plant	0	<i>Homolepis aturensis</i>	-27.6	Smith & Brown 1973
living vascular land plant	0	<i>Hordeum pusillum</i>	-26.7	Smith & Brown 1973
living vascular land plant	0	<i>Humiriastrum subcrenatum</i>	-34.8	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Humiriastrum subcrenatum</i>	-32.7	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Hydrochloa carolinensis</i>	-26.9	Smith & Brown 1973
living vascular land plant	0	<i>Hymanachne amplexicaulis</i>	-27.2	Smith & Brown 1973
living vascular land plant	0	<i>Hymenaea courbaril</i>	-29.00	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Hymenoclea monogyna</i>	-26.02	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Hymenoclea monogyna</i>	-23.14	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Hymenoclea salsola</i>	-26.59	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Hymenoclea salsola</i>	-23.72	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Ichnanthus pallens</i>	-31	Smith & Brown 1973
living vascular land plant	0	<i>Ilex aquifolium</i>	-26.22	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Ilex opaca</i>	-29.70	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Ilex opaca</i>	-30.00	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Inga alba</i>	-32.4	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Inga paraensis</i>	-28.3	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Inga thibaudiana</i>	-29.7	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Iryanthera hostmanii</i>	-32.4	Diefendorf <i>et al.</i> , 2010

living vascular land plant	0	<i>Iryanthera hostmanii</i>	-32	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Iryanthera sagotiana</i>	-33.2	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Iryanthera sagotiana</i>	-32.6	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Iryanthera sagotiana</i>	-32.2	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Isachne disperma</i>	-27.1	Smith & Brown 1973
living vascular land plant	0	<i>Isachne distichophylla</i>	-25.6	Smith & Brown 1973
living vascular land plant	0	<i>Isachne pubescens</i>	-26	Smith & Brown 1973
living vascular land plant	0	<i>Jacaranda copaia</i>	-31.6	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Jacaranda copaia</i>	-29.52	Huc <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Jacquinia pungens</i>	-25.7	Mooney <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Juniperus coahuilensis</i>	-22.8	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Juniperus communis</i>	-23.28	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Juniperus communis</i>	-23.1	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Juniperus communis</i>	-26.07	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Juniperus communis</i>	-25.77	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Juniperus deppeana</i>	-25	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Juniperus monosperma</i>	-23.9	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Juniperus osteosperma</i>	-23.75	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Juniperus osteosperma</i>	-24.06	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Juniperus osteosperma</i>	-25.24	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Juniperus osteosperma</i>	-25.2	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Juniperus osteosperma</i>	-23.5	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Juniperus osteosperma</i>	-23.85	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Juniperus osteosperma</i>	-23.05	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Juniperus osteosperma</i>	-22.52	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Juniperus osteosperma</i>	-23.3	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Juniperus osteosperma</i>	-23.86	Ehleringer & Cerling, 1995; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Juniperus oxycedrus</i>	-22.90	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Lactuca sativa</i>	-25.91	Martin <i>et al.</i> , 1988; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Lactuca serriola</i>	-26.4	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Laetia procera</i>	-31.3	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Larix decidua</i>	-29.00	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Larix decidua</i>	-28.61	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Larix decidua</i>	-28.30	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Larix decidua</i>	-28.19	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Larix decidua</i>	-28.15	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Larix decidua</i>	-28.00	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Larix decidua</i>	-27.84	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Larix decidua</i>	-27.48	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Larix decidua</i>	-27.07	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Larix decidua</i>	-26.44	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Larix decidua</i>	-26.19	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Larix gmelinii</i>	-27.55	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Larix larcina</i>	-28.77	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Larix larcina</i>	-28.58	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Larix larcina</i>	-28.02	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Larix larcina</i>	-28.47	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Larix lyallii</i>	-26.85	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Larix occidentalis</i>	-26.36	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Larix occidentalis</i>	-27.06	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Larix occidentalis</i>	-27.33	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Larix occidentalis</i>	-26.33	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Larix occidentalis</i>	-26.78	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Larix occidentalis</i>	-27.15	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Larix occidentalis</i>	-27.2	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Larix occidentalis</i>	-28.63	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Larix olgenisis</i>	-27.82	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Larix siberica</i>	-27.81	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Larix siberica</i>	-29.47	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Lasiachis procerrima</i>	-25.8	Smith & Brown 1973
living vascular land plant	0	<i>Lasiachloa longifolia</i>	-27.6	Vogel <i>et al.</i> 1978
living vascular land plant	0	<i>Lecythis hartacea</i>	-30.8	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Lecythis idatimon</i>	-31.5	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Lecythis idatimon</i>	-31.4	Diefendorf <i>et al.</i> , 2010

living vascular land plant	0	<i>Lecythis idatimon</i>	-32	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Lecythis persistens</i>	-30.7	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Lecythis persistens</i>	-32.1	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Lecythis zabucajo</i>	-27.7	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Leeria oryzoides</i>	-27.5	Smith & Brown 1973
living vascular land plant	0	<i>Lepidium perfoliatum</i>	-26.88	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Licania alba</i>	-32.1	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Licania alba</i>	-31.6	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Licania alba</i>	-31.5	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Licania glabriflora</i>	-32.1	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Licania granvillei</i>	-31	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Licania membranacea</i>	-32	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Licania membranacea</i>	-32	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Licania membranacea</i>	-33.4	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Licania ovalifolia</i>	-31.8	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Licania sp. 1</i>	-30.6	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Licania sp. 2</i>	-32.5	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Limnodea arkansana</i>	-28.1	Smith & Brown 1973
living vascular land plant	0	<i>Lindera chunii</i>	-31.42	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Lindera communis</i>	-29.10	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Lindera dalmatia</i>	-26.11	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Liquidambar styraciflua</i>	-31.00	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Liriodendron tulipifera</i>	-29.60	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Lithacne pauciflora</i>	-29.7	Smith & Brown 1973
living vascular land plant	0	<i>Lithospermum arvense</i>	-27.74	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Lolium perenne</i>	-30.53	Beerling & Woodward, 1995; Arens <i>et al.</i> 2000
living vascular land plant	0	<i>Lolium perenne</i>	-24.72	Johnson & Tieszen, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Lomatium triternatum</i>	-27.45	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Luehea seemanii</i>	-27.60	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Lueheopsis rugosa</i>	-32.7	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Luetkia pectinata</i>	-29.8	Hobbie & Boyce, 2010
living vascular land plant	0	<i>Luetkia pectinata</i>	-28.7	Hobbie & Boyce, 2010
living vascular land plant	0	<i>Luetkia pectinata</i>	-27.7	Hobbie & Boyce, 2010
living vascular land plant	0	<i>Luetkia pectinata</i>	-28.8	Hobbie & Boyce, 2010
living vascular land plant	0	<i>Luetkia pectinata</i>	-27.2	Hobbie & Boyce, 2010
living vascular land plant	0	<i>Lundia corymbifolis</i>	-26.3	Broadmeadow <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Lundia corymbifolis</i>	-27.9	Broadmeadow <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Lupinus argenteus</i>	-26.88	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Luziola bahiensis</i>	-27.9	Smith & Brown 1973
living vascular land plant	0	<i>Luzula piperi</i>	-28.3	Hobbie & Boyce, 2010
living vascular land plant	0	<i>Luzula piperi</i>	-26.8	Hobbie & Boyce, 2010
living vascular land plant	0	<i>Luzula piperi</i>	-27.1	Hobbie & Boyce, 2010
living vascular land plant	0	<i>Luzula piperi</i>	-28.9	Hobbie & Boyce, 2010
living vascular land plant	0	<i>Luzula piperi</i>	-27	Hobbie & Boyce, 2010
living vascular land plant	0	<i>Lycopersicon pennellii</i>	-26.1	Martin & Thorstenson, 1988; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Lycopersicon pennellii</i>	-25	Martin & Thorstenson, 1988; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Lycopersicon pennellii</i>	-24.7	Martin & Thorstenson, 1988; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Lycopersicon esculentum</i>	-27.9	Martin & Thorstenson, 1988; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Lycopersicon esculentum</i>	-26.4	Martin & Thorstenson, 1988; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Lycopersicon esculentum</i>	-25.1	Martin & Thorstenson, 1988; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Lycopersicon esculentum x pennellii</i>	-26.6	Martin & Thorstenson, 1988; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Lycopersicon esculentum x pennellii</i>	-25.4	Martin & Thorstenson, 1988; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Lycopersicon esculentum x pennellii</i>	-24.5	Martin & Thorstenson, 1988; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Lygeum spartum</i>	-25.1	Smith & Brown 1973
living vascular land plant	0	<i>Lygodesmia grandiflora</i>	-27.07	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Machilus velutina</i>	-32.24	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Magnolia delavayi</i>	-28.7	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Malus sylvestris</i>	-27.30	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Manilkara chicle</i>	-28.60	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Melica bulbosa</i>	-26.59	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Melica mutica</i>	-25.9	Smith & Brown 1973
living vascular land plant	0	<i>Memecylon ligustrifolium</i>	-29.64	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Metrosideros polymorpha</i>	-28.1	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Miconia affinis</i>	-26.8	Broadmeadow <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Miconia affinis</i>	-31.8	Broadmeadow <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Micraira subulifolia</i>	-25.6	Smith & Brown 1973

living vascular land plant	0	<i>Micropholis guianensis</i>	-31.4	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Micropholis guianensis</i>	-32.4	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Micropholis guianensis</i>	-29.4	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Micropholis obscura</i>	-30.8	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Micropholis obscura</i>	-31	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Micropholis venulosa</i>	-30.6	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Microseris nutans</i>	-27.55	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Milium effusum</i>	-30.4	Smith & Brown 1973
living vascular land plant	0	<i>Minquartia guianensis</i>	-32.4	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Minquartia guianensis</i>	-29.2	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Molinia caerulea</i>	-27.3	Smith & Brown 1973
living vascular land plant	0	<i>Moronobea coccinea</i>	-30.8	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Moronobea coccinea</i>	-30.3	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Mouriri crassifolia</i>	-30.9	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Mouriri crassifolia</i>	-29.4	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Mouriri crassifolia</i>	-30.9	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Nardus stricta</i>	-24	Friend <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Nardus stricta</i>	-26	Friend <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Nardus stricta</i>	-25.5	Smith & Brown 1973
living vascular land plant	0	<i>Nyssa sylvatica</i>	-30.12	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Nyssa sylvatica</i>	-32.80	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Ocotea rubra</i>	-31.9	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Ocotea rubra</i>	-29.1	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Ocotea veraguensis</i>	-30.70	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Olyra yucatanana</i>	-29.8	Smith & Brown 1973
living vascular land plant	0	<i>Oplismenus burmanni</i>	-27.5	Smith & Brown 1973
living vascular land plant	0	<i>Oplismenus hirtellus</i>	-31	Smith & Brown 1973
living vascular land plant	0	<i>Oryza sativa</i>	-25.6	Smith & Brown 1973
living vascular land plant	0	<i>Panicum ciliatum</i>	-26.3	Smith & Brown 1973
living vascular land plant	0	<i>Panicum clandestinum</i>	-25.3	Smith & Brown 1973
living vascular land plant	0	<i>Panicum commutatum</i>	-26.4	Smith & Brown 1973
living vascular land plant	0	<i>Panicum depauperatum</i>	-25.2	Smith & Brown 1973
living vascular land plant	0	<i>Panicum gymnocarpon</i>	-29.1	Smith & Brown 1973
living vascular land plant	0	<i>Panicum hemitomom</i>	-25.2	Smith & Brown 1973
living vascular land plant	0	<i>Panicum hians</i>	-26	Smith & Brown 1973
living vascular land plant	0	<i>Panicum lancearium</i>	-27.3	Smith & Brown 1973
living vascular land plant	0	<i>Panicum latifolium</i>	-25.3	Smith & Brown 1973
living vascular land plant	0	<i>Panicum linearifolium</i>	-25.9	Smith & Brown 1973
living vascular land plant	0	<i>Panicum meridionale</i>	-23.8	Smith & Brown 1973
living vascular land plant	0	<i>Panicum microcarpon</i>	-26.7	Smith & Brown 1973
living vascular land plant	0	<i>Panicum pacificum</i>	-31.1	Smith & Brown 1973
living vascular land plant	0	<i>Panicum verrucosum</i>	-25.6	Smith & Brown 1973
living vascular land plant	0	<i>Panicum webberianum</i>	-25.6	Smith & Brown 1973
living vascular land plant	0	<i>Panicum xalapense</i>	-26.6	Smith & Brown 1973
living vascular land plant	0	<i>Panicum zizanioides</i>	-29.8	Smith & Brown 1973
living vascular land plant	0	<i>Papaver alpinum</i>	-25.06	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Papaver alpinum</i>	-26.56	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Papaver alpinum</i>	-26.16	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Papaver alpinum</i>	-29.94	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Parapholis incurva</i>	-26.3	Smith & Brown 1973
living vascular land plant	0	<i>Parapholis pannonica</i>	-25.3	Smith & Brown 1973
living vascular land plant	0	<i>Parashorea chinensis</i>	-27.75	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pariana bicolora</i>	-30.3	Smith & Brown 1973
living vascular land plant	0	<i>Pariana sp</i>	-30.7	Smith & Brown 1973
living vascular land plant	0	<i>Parinari excelsa</i>	-30.8	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Parinari montana</i>	-29.8	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Parinari sp.</i>	-31.5	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Parkia nitida</i>	-31.5	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Parkia nitida</i>	-31.3	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Peltogyne venosa</i>	-29.7	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Peltogyne venosa</i>	-27.9	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Phaenosperma globosa</i>	-26.7	Smith & Brown 1973
living vascular land plant	0	<i>Phalaris arundinacea</i>	-24.4	Vogel <i>et al.</i> 1978
living vascular land plant	0	<i>Phalaris arundinacea</i>	-22.9	Smith & Brown 1973
living vascular land plant	0	<i>Phalaris brachystachys</i>	-25.3	Smith & Brown 1973
living vascular land plant	0	<i>Phalaris canariensis</i>	-26.6	Smith & Brown 1973
living vascular land plant	0	<i>Pharus latifolius</i>	-29.6	Smith & Brown 1973
living vascular land plant	0	<i>Phaseolus vulgaris</i>	-21.45	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000

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living vascular land plant	0	<i>Phaseolus vulgaris</i>	-25.39	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Phaseolus vulgaris</i>	-27.3	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Phaseolus vulgaris</i>	-29.97	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Phaseolus vulgaris</i>	-26.24	Martin <i>et al.</i> , 1988; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Phaseolus vulgaris</i>	-27.02	White <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Phaseolus vulgaris</i>	-27.37	White <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Phaseolus vulgaris</i>	-52.74	White <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Phaseolus vulgaris</i>	-26.46	White <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Phaseolus vulgaris</i>	-27.88	White <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Philodendron krugii</i>	-25.4	Broadmeadow <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Philodendron krugii</i>	-27.9	Broadmeadow <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Philodendron lingulatum</i>	-31.6	Broadmeadow <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Philodendron lingulatum</i>	-35.9	Broadmeadow <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Phlox longifolia</i>	-25.54	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Phragmites communis</i>	-25.4	Vogel <i>et al.</i> 1978
living vascular land plant	0	<i>Phragmites communis</i>	-24.6	Smith & Brown 1973
living vascular land plant	0	<i>Phragmites uaustralis</i>	-26.6	Smith & Brown 1973
living vascular land plant	0	<i>Phyllodoce empetriformis</i>	-28.6	Hobbie & Boyce, 2010
living vascular land plant	0	<i>Phyllodoce empetriformis</i>	-28	Hobbie & Boyce, 2010
living vascular land plant	0	<i>Phyllodoce empetriformis</i>	-26.1	Hobbie & Boyce, 2010
living vascular land plant	0	<i>Phyllodoce empetriformis</i>	-26.4	Hobbie & Boyce, 2010
living vascular land plant	0	<i>Phyllodoce empetriformis</i>	-25.8	Hobbie & Boyce, 2010
living vascular land plant	0	<i>Phyllorachis sagittata</i>	-26	Smith & Brown 1973
living vascular land plant	0	<i>Phyllostachys aurea</i>	-28	Smith & Brown 1973
living vascular land plant	0	<i>Phyllyrea angustifolia</i>	-26.49	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Picea abies</i>	-25.65	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Picea abies</i>	-25.81	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Picea abies</i>	-26.14	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Picea abies</i>	-27.52	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Picea abies</i>	-27.11	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Picea abies</i>	-26.47	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Picea abies</i>	-25.73	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Picea abies</i>	-24.48	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Picea abies</i>	-27.10	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Picea abies</i>	-27.80	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Picea abies</i>	-26.59	Martin <i>et al.</i> , 1988; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Picea abies</i>	-26.42	Martin <i>et al.</i> , 1988; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Picea engelmannii</i>	-24.40	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Picea engelmannii</i>	-26.1	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Picea mariana</i>	-26.70	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Picea mariana</i>	-25.53	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Picea mariana</i>	-27.01	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Picea mariana</i>	-27.29	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Picea mariana</i>	-26.5	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Picea mariana</i>	-26.5	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Picea obavata</i>	-24.92	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Picea obavata</i>	-25.39	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Picea sitchensis</i>	-27.62	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Picea sp.</i>	-27.56	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus albicaulis</i>	-25.63	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus banksiana</i>	-26.6	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus banksiana</i>	-24.8	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus cembra</i>	-28.30	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus contorta</i>	-28.18	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus contorta</i>	-26.77	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus contorta</i>	-27.4	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus densiflora</i>	-27.9	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus edulis</i>	-23.84	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus edulis</i>	-24.28	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus edulis</i>	-23.7	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus edulis</i>	-23.54	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus edulis</i>	-23.28	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus edulis</i>	-21	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus edulis</i>	-21.8	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus elliotii</i>	-29.90	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus flexilis</i>	-23.3	Van de Water <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pinus flexilis</i>	-24.45	Van de Water <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pinus flexilis</i>	-25.21	Van de Water <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000

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living vascular land plant	0	<i>Pinus halapensis</i>	-24.04	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus jeffreyi</i>	-22.97	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus jeffreyi</i>	-22.22	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus massoniana</i>	-26.40	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus massoniana</i>	-29.15	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus monophylla</i>	-21.36	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus pinaster</i>	-25.29	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus pinaster</i>	-26.61	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus pinaster</i>	-28.92	Martin <i>et al.</i> , 1988; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pinus pinea</i>	-25.56	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus pinea</i>	-25.22	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus pinea</i>	-25.66	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus pinea</i>	-26.81	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Pinus pinea</i>	-26.92	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Pinus pinea</i>	-26.94	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Pinus pinea</i>	-27.61	P Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Pinus ponderosa</i>	-21.55	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus ponderosa</i>	-22.26	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus ponderosa</i>	-22.23	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus ponderosa</i>	-25.39	Ehleringer & Cerling, 1995; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pinus sp.</i>	-26.96	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus sylvestris</i>	-25.88	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus sylvestris</i>	-27.45	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus sylvestris</i>	-25.90	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus sylvestris</i>	-26.86	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pinus uncinata</i>	-26.91	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Pinus uncinata</i>	-24.02	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Pinus uncinata</i>	-26.9	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Pinus uncinata</i>	-25.43	P Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Piper amalago L.</i>	-31.20	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pistacia lentiscus</i>	-26.24	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pistacia lentiscus</i>	-27	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Pistacia lentiscus</i>	-26.55	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Pistacia lentiscus</i>	-27.05	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Pistacia lentiscus</i>	-27.61	P Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Pithecellobium clypearia</i>	-30.33	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Plantago lanceolata</i>	-27.97	Beerling & Woodward, 1995; Arens <i>et al.</i> 2000
living vascular land plant	0	<i>Platonia insignis</i>	-28	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Platyeladus orientalis L.</i>	-27.77	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Poa annua</i>	-28.35	Beerling & Woodward, 1995; Arens <i>et al.</i> 2000
living vascular land plant	0	<i>Poa binata</i>	-23.3	Vogel <i>et al.</i> 1978
living vascular land plant	0	<i>Poa bulbosa</i>	-26.31	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Poa compressa</i>	-27.4	Smith & Brown 1973
living vascular land plant	0	<i>Poa pratense</i>	-27.6	Smith & Brown 1973
living vascular land plant	0	<i>Poa secunda</i>	-28.2	Smith & Brown 1973
living vascular land plant	0	<i>Poa trivialis</i>	-29.2	Beerling & Woodward, 1995; Arens <i>et al.</i> 2000
living vascular land plant	0	<i>Populus sargentii</i>	-28.46	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Populus tremuloides</i>	-27.2	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Populus tremuloides</i>	-28.65	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Populus tremuloides</i>	-25.58	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Poraqueiba guianensis</i>	-32.9	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Porophyllum gracile</i>	-24.87	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Porophyllum gracile</i>	-27.26	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Posoqueria latifolia</i>	-32.7	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Posoqueria latifolia</i>	-32.7	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Posoqueria latifolia</i>	-28.9	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pouteria eugenifolia</i>	-28.8	Diefendorf <i>et al.</i> , 2010



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living vascular land plant	0	<i>Pouteria grandis</i>	-30.4	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pouteria guianensis</i>	-32.8	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pouteria melanopoda</i>	-29.1	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pouteria sandwicensis</i>	-27.095	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pradosia cochlearia</i>	-30.6	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Protium</i> sp.	-31.7	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Protium subserratum</i>	-31.1	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Prunus avium</i>	-26.79	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Prunus spinosa</i>	-27.74	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pseudobombax septenatum</i>	-26.70	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pseudopiptadenia suaveol</i>	-29	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-25.64	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-26.85	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-25.7	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-29.62	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-28.99	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-28.93	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-28.83	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-28.81	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-28.79	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-28.76	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-28.72	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-28.53	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-28.49	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-28.24	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-28.22	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-28.09	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-28	Martin <i>et al.</i> , 1988; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-27.89	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-27.69	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-27.61	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-27.51	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-27.48	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-27.4	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-27.37	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-27.35	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-27.25	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-27.25	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-27.1	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-27.02	Zhang <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Pseudotsuga menziesii</i>	-25	Panek, 1966; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Psilostrophe cooperi</i>	-27.83	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Psilostrophe cooperi</i>	-24.87	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Psydrax odorata</i>	-25.825	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Purshia tridentata</i>	-24.15	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pygeum topengii</i>	-30.23	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pyrus bourgaeana</i>	-27.58	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Pyrus bourgaeana</i>	-27.72	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Quercus agrifolia</i>	-27.46	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Quercus cerris</i>	-27.50	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Quercus coccifera</i>	-25.86	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Quercus gambelii</i>	-27.26	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Quercus gambelii</i>	-26.88	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Quercus gambelii</i>	-27.2	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Quercus gambelii</i>	-26.96	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Quercus gambelii</i>	-26.92	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Quercus gambelii</i>	-27.45	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Quercus ilex</i>	-26.44	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Quercus laurifolia</i>	-30.20	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Quercus nigra</i>	-30.20	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Quercus petraea</i>	-26.77	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Quercus pubescens</i>	-27.19	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Quercus pyrenaica</i>	-26.38	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Quercus pyrenaica</i>	-26.97	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Quercus pyrenaica</i>	-27.47	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Quercus pyrenaica</i>	-27.12	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Quercus rober</i>	-30.5	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Quercus rober</i>	-28.7	Diefendorf <i>et al.</i> , 2010

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living vascular land plant	0	<i>Quercus rotundifolia</i>	-26.79	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Quercus rotundifolia</i>	-27.4	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Quercus rotundifolia</i>	-26.63	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Quercus rotundifolia</i>	-27.62	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Quercus rotundifolia</i>	-27.81	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Quercus</i> sp.	-28.80	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Quercus suber</i>	-27.22	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Quercus suber</i>	-26.45	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Quercus turneri</i>	-28.8	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Ranunculus testiculatus</i>	-27.55	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Recordoxylon venosa</i>	-28	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Rhododendron ferrugineum</i>	-25.87	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Rhododendron ferrugineum</i>	-25.93	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Rhododendron ferrugineum</i>	-28.68	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Rhododendron ferrugineum</i>	-25.54	Peñuelas & Azcón-Bieto, 1992; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Ruizterania albiflora</i>	-28.9	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Ruizterania albiflora</i>	-28.2	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Ryania speciosa</i>	-29.1	Broadmeadow <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Ryania speciosa</i>	-32	Broadmeadow <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Sacciolepis striata</i>	-27.1	Smith & Brown 1973
living vascular land plant	0	<i>Salazaria mexicana</i>	-26.31	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Salazaria mexicana</i>	-23.53	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Salix fragilis</i>	-28.70	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Salix herbacea</i>	-28.36	Beerling 1996a; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Salix herbacea</i>	-27.79	Beerling 1996a; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Salix herbacea</i>	-28.26	Beerling 1996a; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Salix herbacea</i>	-29.21	Beerling 1996a; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Salix herbacea</i>	-28.74	Beerling 1996a; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Salix herbacea</i>	-28.45	Beerling 1996a; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Salix</i> sp	-29.8	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Santalum paniculatum</i>	-26.065	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Sapium discolor</i>	-31.30	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Sarcosperma laurinum</i>	-29.58	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Schefflera decaphylla</i>	-30.2	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Schefflera octophylla</i>	-31.95	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Schima superba</i>	-31.55	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Schima superba</i>	-29.65	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Schizachne purpurascens</i>	-27.5	Smith & Brown 1973
living vascular land plant	0	<i>Schizmus barbatus</i>	-22.7	Smith & Brown 1973
living vascular land plant	0	<i>Sclerolobium albiflorum</i>	-30	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Sclerolobium melinonii</i>	-30	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Sclerolobium melinonii</i>	-28.6	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Sclerolobium melinonii</i>	-30.1	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Semialarium mexicanum</i>	-28.20	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Senecio douglassi</i>	-23.43	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Senecio douglassi</i>	-26.11	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Senecio integerrimus</i>	-27.26	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Shorea amplexicaulis</i>	-31.19	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Shorea cf. Rugosa</i>	-32.34	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Shorea leprosula</i>	-31.60	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Shorea pinanga</i>	-29.54	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Shorea scabrida</i>	-29.89	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Sideroxylon capiri</i>	-28.50	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Simaba cedron</i>	-31.6	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Simmondsia chinensis</i>	-24.8	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Simmondsia chinensis</i>	-29.18	Kohorn <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Simmondsia chinensis</i>	-28.93	Kohorn <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Simmondsia chinensis</i>	-26.87	Kohorn <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Sisymbrium altissimum</i>	-28.12	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Sloanea</i> sp.	-27.9	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Sphaeralcea coccinea</i>	-27.26	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Sphaeralcea parvifolia</i>	-27.64	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Sphaeralcea parvifolia</i>	-24.77	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Sphenopholis obtusata</i>	-28.7	Smith & Brown 1973
living vascular land plant	0	<i>Spondias mombin</i>	-27.40	Diefendorf <i>et al.</i> , 2010

living vascular land plant	0	<i>Stemmadenia</i> sp	-28.8	Mooney <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000; Diefendorf <i>et al.</i> 2010
living vascular land plant	0	<i>Stephanomeria pauciflora</i>	-27.74	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Stephanomeria pauciflora</i>	-25.06	Ehleringer <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Sterculia lanceolata</i>	-29.74	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Sterculia</i> sp.	-30.8	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Stipa columbiana</i>	-24.2	Smith & Brown 1973
living vascular land plant	0	<i>Stipa comata</i>	-25.7	Mole <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Stipa comata</i>	-25.54	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Stipa leucotricha</i>	-27.4	Smith & Brown 1973
living vascular land plant	0	<i>Stipa tenuissima</i>	-24.7	Smith & Brown 1973
living vascular land plant	0	<i>Stipia robusta</i>	-24.6	Smith & Brown 1973
living vascular land plant	0	<i>Streptochaeta sodiroana</i>	-29.5	Smith & Brown 1973
living vascular land plant	0	<i>Streptogyne ameriana</i>	-32.3	Smith & Brown 1973
living vascular land plant	0	<i>Swartzia polyphylla</i>	-29.2	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Swartzia polyphylla</i>	-28.4	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Swietenia macrophylla</i>	-25.8	Broadmeadow <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Swietenia macrophylla</i>	-28.7	Broadmeadow <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Swintonia glauca</i>	-30.28	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Swintonia glauca</i>	-30.41	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Symphonia</i> sp.	-30.1	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Symphonia</i> sp.	-30.2	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Symphonia</i> sp.	-30.4	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Syzgium rehderianum</i>	-29.95	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Tabebuia ochracea</i>	-31.40	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Tabernaemontana attenuata</i>	-28.9	Broadmeadow <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Tabernaemontana attenuata</i>	-30.2	Broadmeadow <i>et al.</i> , 1992; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Taxodium distichum</i>	-28.20	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Taxus baccata</i>	-25.37	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Tetragastris panamensis</i>	-28.7	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Thevetia ovata</i>	-27.6	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Thevetia ovata</i>	-27.6	Mooney <i>et al.</i> , 1989; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Thyrsodium guianense</i>	-30.2	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Tilia platyphyllos</i>	-26.89	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Tovomita</i> sp.	-32.5	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Tragopogon dubius</i>	-26.88	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Trichilia</i> sp.	-30.8	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Triniochloa micrantha</i>	-29.5	Smith & Brown 1973
living vascular land plant	0	<i>Tristaniopsis obovata</i>	-30.19	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Triticum aestivum</i>	-29.27	Martin <i>et al.</i> , 1988; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Triticum aestivum</i>	-26.28	Morgan <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Triticum aestivum</i>	-25.89	Morgan <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Triticum aestivum</i>	-25.87	Araus <i>et al.</i> , 1993; Arens <i>et al.</i> 2000
living vascular land plant	0	<i>Triticum aestivum</i>	-25.86	Morgan <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Triticum aestivum</i>	-25.79	Morgan <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Triticum aestivum</i>	-25.63	Morgan <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Triticum aestivum</i>	-25.49	Araus <i>et al.</i> , 1993; Arens <i>et al.</i> 2000
living vascular land plant	0	<i>Triticum aestivum</i>	-25.35	Morgan <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Triticum aestivum</i>	-25.3	Condon <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Triticum aestivum</i>	-25.2	Araus <i>et al.</i> , 1993; Arens <i>et al.</i> 2000
living vascular land plant	0	<i>Triticum aestivum</i>	-25.2	Araus <i>et al.</i> , 1993; Arens <i>et al.</i> 2000
living vascular land plant	0	<i>Triticum aestivum</i>	-25.15	Morgan <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Triticum aestivum</i>	-25.11	Morgan <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Triticum aestivum</i>	-25.06	Morgan <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Triticum aestivum</i>	-25.04	Morgan <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Triticum aestivum</i>	-25.01	Condon <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Triticum aestivum</i>	-25.01	Morgan <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Triticum aestivum</i>	-25	Morgan <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Triticum aestivum</i>	-24.93	Morgan <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Triticum aestivum</i>	-24.93	Morgan <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Triticum aestivum</i>	-24.92	Morgan <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Triticum aestivum</i>	-24.91	Araus <i>et al.</i> , 1993; Arens <i>et al.</i> 2000
living vascular land plant	0	<i>Triticum aestivum</i>	-24.91	Condon <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Triticum aestivum</i>	-24.85	Morgan <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Triticum aestivum</i>	-24.84	Morgan <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Triticum aestivum</i>	-24.82	Condon <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Triticum aestivum</i>	-24.72	Morgan <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Triticum aestivum</i>	-24.66	Morgan <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Triticum aestivum</i>	-24.63	Condon <i>et al.</i> , 1993; Arens <i>et al.</i> , 2000



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living vascular land plant	0	<i>Vigna unguiculata</i>	-28.54	Hall <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Vigna unguiculata</i>	-28.54	Hall <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Vigna unguiculata</i>	-28.54	Hall <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Vigna unguiculata</i>	-28.54	Hall <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Vigna unguiculata</i>	-28.35	Hall <i>et al.</i> , 1994; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Vigna unguiculata</i>	-27.88	Ismail & Hall, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Vigna unguiculata</i>	-27.59	Ismail & Hall, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Vigna unguiculata</i>	-27.3	Ismail & Hall, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Vigna unguiculata</i>	-27.11	Ismail & Hall, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Vigna unguiculata</i>	-26.92	Ismail & Hall, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Vigna unguiculata</i>	-26.83	Ismail & Hall, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Vigna unguiculata</i>	-26.73	Ismail & Hall, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Vigna unguiculata</i>	-26.73	Ismail & Hall, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Vigna unguiculata</i>	-26.64	Ismail & Hall, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Vigna unguiculata</i>	-26.54	Ismail & Hall, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Vigna unguiculata</i>	-26.44	Ismail & Hall, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Vigna unguiculata</i>	-26.44	Ismail & Hall, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Vigna unguiculata</i>	-25.78	Ismail & Hall, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Vigna unguiculata</i>	-25.58	Ismail & Hall, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Vigna unguiculata</i>	-25.49	Ismail & Hall, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Vigna unguiculata</i>	-25.49	Ismail & Hall, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Vigna unguiculata</i>	-25.01	Ismail & Hall, 1993; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Virola michelii</i>	-31.7	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Virola michelii</i>	-31.2	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Vouacapoua americana</i>	-32.4	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Vouacapoua americana</i>	-30.7	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Vouacapoua americana</i>	-31.1	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Wyethia amplexicaulis</i>	-26.78	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Xylopia</i> sp.	-32.5	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Zanthoxylum fagara</i>	-27.40	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Zanthoxylum setulosum</i>	-27.70	Diefendorf <i>et al.</i> , 2010
living vascular land plant	0	<i>Zeugites pittieri</i>	-23.6	Smith & Brown 1973
living vascular land plant	0	<i>Zigadenus paniculatus</i>	-25.54	Smedley <i>et al.</i> , 1991; Arens <i>et al.</i> , 2000
living vascular land plant	0	<i>Zizania aquatica</i>	-25.5	Smith & Brown 1973
living vascular land plant	0	<i>Zizania texana</i>	-26.6	Smith & Brown 1973
living vascular land plant	0	<i>Zizaniopsis miliacea</i>	-26.1	Smith & Brown 1973
Paleosol	363	bulk rock extract	-27.2	Mora <i>et al.</i> , 1996; Ekart <i>et al.</i> 1999
Paleosol	365	bulk rock extract	-27.2	Mora <i>et al.</i> , 1996; Ekart <i>et al.</i> 1999
Paleosol	380	bulk rock extract	-25.1	Ekart <i>et al.</i> 1999
Paleosol	386	bulk rock extract	-24.8	Maynard 1981
Paleosol	415	bulk rock extract	-27.4	Mora <i>et al.</i> , 1996; Ekart <i>et al.</i> 1999
Paleosol	418	bulk rock extract	-27.17	Tomescu <i>et al.</i> 2009
Paleosol	418	bulk rock extract	-26.59	Tomescu <i>et al.</i> 2009
Paleosol	441	crust fossil	-26.8	Tomescu <i>et al.</i> 2009
Paleosol	441	crust fossil	-26.68	Tomescu <i>et al.</i> 2009
Paleosol	441	crust fossil	-26.65	Tomescu <i>et al.</i> 2009
Paleosol	441	crust fossil	-26.74	Tomescu <i>et al.</i> 2009
Paleosol	441	cyanobacterial fossil	-26.46	Tomescu <i>et al.</i> 2009
Paleosol	441	cyanobacterial fossil	-26.5	Tomescu <i>et al.</i> 2009
Paleosol	441	crust fossil	-26.23	Tomescu <i>et al.</i> 2009
Paleosol	441	bulk rock extract	-26.12	Tomescu <i>et al.</i> 2009
Paleosol	441	bulk rock extract	-25.96	Tomescu <i>et al.</i> 2009
Paleosol	441	crust fossil	-26.51	Tomescu <i>et al.</i> 2009
Paleosol	441	bulk rock extract	-26.19	Tomescu <i>et al.</i> 2009
Paleosol	443	bulk rock extract	-21.5	Retallack 1993
Paleosol	449	bulk rock extract	-28.35	Tomescu <i>et al.</i> 2009
Paleosol	449	bulk rock extract	-28.51	Tomescu <i>et al.</i> 2009
Paleosol	453	bulk rock extract	-28.36	Tomescu <i>et al.</i> 2009
Paleosol	453	bulk rock extract	-28.77	Tomescu <i>et al.</i> 2009
Paleosol	453	bulk rock extract	-28.63	Tomescu <i>et al.</i> 2009
Paleosol	453	bulk rock extract	-28.81	Tomescu <i>et al.</i> 2009
Paleosol	453	bulk rock extract	-28.77	Tomescu <i>et al.</i> 2009
Paleosol	508.6	W207	-23.1	Retallack 2008
Paleosol	509.5	W222	-26.36	Retallack 2008
Paleosol	512.8	W220	-23.99	Retallack 2008
Paleosol	513.8	W216	-26.62	Retallack 2008
Paleosol	517.6	W214	-24.77	Retallack 2008
Paleosol	523.5	W212	-23.71	Retallack 2008

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