

**Additional file 4 - Accession numbers for AMTP genes from lichen genomes**

<b>Gene</b>	<b>Accession number</b>
<i>Acarospora strigata</i> A	KC810860
<i>Acarospora strigata</i> B	KC810865
<i>Arthonia</i> cf. <i>rubrocincta</i> A	KC810856
<i>Arthonia</i> cf. <i>rubrocincta</i> B	KC810866
<i>Dibaeis baeomyces</i> A	KC810874
<i>Dibaeis baeomyces</i> B	KC810875
<i>Dibaeis baeomyces</i> C	KC810861
<i>Dibaeis baeomyces</i> D	KC810871
<i>Endocarpon pallidulum</i> A	KC810855
<i>Endocarpon pallidulum</i> B	KC810862
<i>Endocarpon pallidulum</i> C	KC810870
<i>Endocarpon pallidulum</i> D	KC810864
<i>Graphis scripta</i> A	KC810876
<i>Graphis scripta</i> B	KC810854
<i>Leptogium</i> sp. A	KC810859
<i>Leptogium</i> sp. B	KC810868
<i>Peltigera membranacea</i>	KC810863
<i>Peltigera malacea</i>	KC810873
<i>Peltula cylindrica</i> A	KC810858
<i>Peltula cylindrica</i> B	KC810872
<i>Physcia</i> cf. <i>stellaris</i> A	KC810857
<i>Physcia</i> cf. <i>stellaris</i> B	KC810867
<i>Physcia</i> cf. <i>stellaris</i> C	KC810869
<i>Nostoc</i> sp. from <i>Leptogium</i>	KC810877
Cyanobacterium from <i>Peltula</i>	KC810878