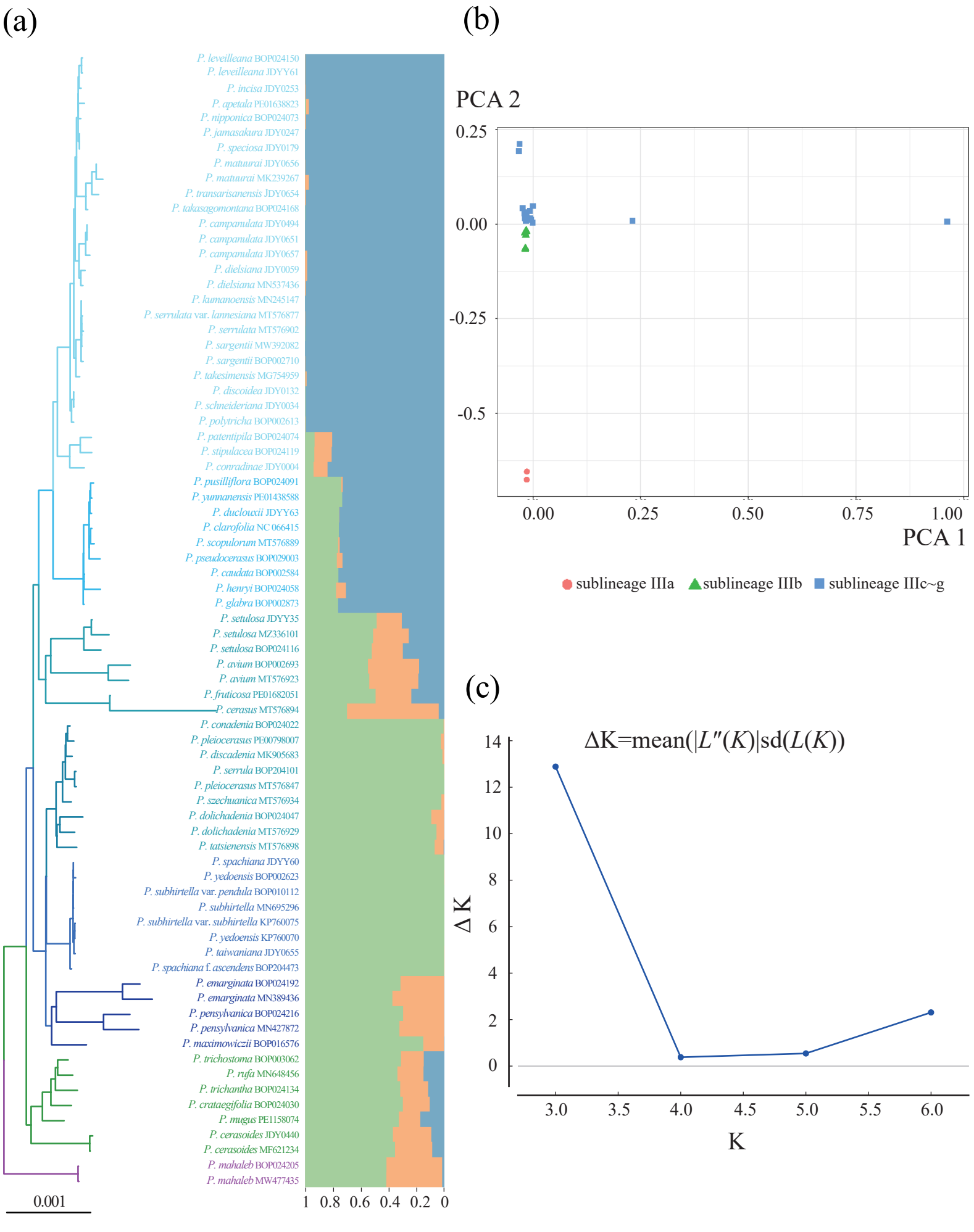

(a)
P. leveilleana BOP024150
P. leveilleana JDYY61
P. incisa JDY0253
P. apetala PE01638823
P. nipponica BOP024073
P. jamasakura JDY0247
P. speciosa JDY0179
P. matuurai JDY0656
P. matuurai MK239267
P. transarisanensis JDY0654
P. takasagomontana BOP024168
P. campanulata JDY0494
P. campanulata JDY0651
P. campanulata JDY0657
P. dielsiana JDY0059
P. dielsiana MN537436
P. kumanoensis MN245147
P. serrulata var. lannesiana MT576877
P. serrulata MT576902
P. sargentii MW392082
P. sargentii BOP002710
P. takesimensis MG754959
P. discoidea JDY0132
P. schneideriana JDY0034
P. polytricha BOP002613
P. patentipila BOP024074
P. stipulacea BOP024119
P. conradinae JDY0004
P. pusilliflora BOP024091
P. yunnanensis PE01438588
P. duclouxii JDYY63
P. clarofolia NC 066415
P. scopulorum MT576889
P. pseudocerasus BOP029003
P. caudata BOP002584
P. henryi BOP024058
P. glabra BOP002873
P. setulosa JDYY35
P. setulosa MZ336101
P. setulosa BOP024116
P. avium BOP002693
P. avium MT576923
P. fruticosa PE01682051
P. cerasus MT576894
P. conadenia BOP024022
P. pleiocerasus PE00798007
P. discadenia MK905683
P. serrula BOP204101
P. pleiocerasus MT576847
P. szechuanica MT576934
P. dolichadenia BOP024047
P. dolichadenia MT576929
P. tatsienensis MT576898
P. spachiana JDYY60
P. yedoensis BOP002623
P. subhirtella var. pendula BOP010112
P. subhirtella MN695296
P. subhirtella var. subhirtella KP760075
P. yedoensis KP760070
P. taiwaniana JDY0655
P. spachiana f. ascendens BOP204473
P. emarginata BOP024192
P. emarginata MN389436
P. pensylvanica BOP024216
P. pensylvanica MN427872
P. maximowiczii BOP016576
P. trichostoma BOP003062
P. rufa MN648456
P. trichantha BOP024134
P. crataegifolia BOP024030
P. mugus PE1158074
P. cerasoides JDY0440
P. cerasoides MF621234
P. mahaleb BOP024205
P. mahaleb MW477435
0.001
1 0.8 0.6 0.4 0.2 0
(b)
PCA 2
0.25
0.00
-0.25
-0.5
0.00 0.25 0.50 0.75 1.00
PCA 1
sublineage IIIa
sublineage IIIb
sublineage IIIc~g
(c)
ΔK=mean(|L″(K)|sd(L(K))
14
12
10
8
6
4
2
0
ΔK
3.0 3.5 4.0 4.5 5.0 5.5 6.0
K