Supporting information

Total Synthesis of Pinelllic acid
$^{1}H$ NMR spectrum of 4

$^{13}C$ NMR spectrum of 4
$^1$H NMR spectrum of 6

$^{13}$C NMR spectrum of 6
$^1$H NMR spectrum of 7

$^{13}$C NMR spectrum of 7
$^1$H NMR spectrum of 8

$^{13}$C NMR spectrum of 8
$^1$H NMR spectrum of 2

$^{13}$C NMR spectrum of 2
$^1$H NMR spectrum of 10

$^{13}$C NMR spectrum of 10
$^1$H NMR spectrum of 11

$^{13}$C NMR spectrum of 11
$^1$H NMR spectrum of 12

$^{13}$C NMR spectrum of 12
\[ ^1H \text{ NMR spectrum of 13} \]

\[ ^{13}C \text{ NMR spectrum of 13} \]
$^1$H NMR spectrum of 14

$^{13}$C NMR spectrum of 14
$^1$H NMR spectrum of (+)-pinelllic acid *ent*-I

$^{13}$C NMR spectrum of (+)-pinelllic acid *ent*-I