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LIST OF ILLUSTRATIONS

ABBREVIATIONS AND SYMBOLS

A	peak area
Al	alumina
A_m	the concentration of A in a unit volume of the mobile phase
AR	analytical reagent
A_s	the concentration of A in a unit volume of the stationary phase
2A	2-acetylpyrrole
2-AP	2-acetyl-1-pyrroline
a	intercept
B	butt connector
b	slope of the straight line
C	concentration
CC	capillary column
CG	carrier gas
C_G	the concentration of analyte in gas phase
C_M	the concentration of a component in mobile phase
C_O	original concentration
Conc.	concentration
C_S	the concentration of analyte in sample phase
C'_S	the concentration of a component in stationary phase
D	density
DF	detection frequency

FID	flame ionisation detector
GC	gas chromatography
GC-O	gas chromatography olfactometry
GLC	gas-liquid chromatography
GSC	gas-solid chromatography
g	gram
H	plate height
HAS	headspace analysis
HETP	height equivalent to a theoretical plate
HG	headspace gas
HP	high purity
HS	headspace sample
HS-GC	headspace gas chromatography
HV	headspace vial
hr	hour
I.D.	internal diameter
K	distribution constant
KDML	Khao Dawk Mali
k′	capacity factor
k_A	the capacity factor for A
k_B	the capacity factor for B
L	column length
M	molarity
MW	molecular weight

m	meter
mg	milligram
min	minute
mm	millimeter
N	number of theoretical plate
N	noise
n	number of points on the calibration line
n	number of measurement
P_A	peak area
ppm	part per million
PTFE	polytetrafluoroethylene
PLOT	porous layer open tubular
Rh	rhodium
Rs	resolution
RSD	relative standard deviation
S	signal
S_B	blank signal standard deviation
SCOT	support-coated open tubular
SDE	steam distillation / solvent extraction
SHS-GC	static headspace gas chromatography
SHA/GC/MS	static headspace analysis / gas chromatography / mass spectrometry
SN	sampling needle
SPME	solid phase microextraction
s	standard deviation

T	temperature
TMP	2,4,6-trimethylpyridine
t_M	hold-up time
t_R	retention time
t'_R	adjusted retention time
t_{RA}	retention time of component A
t_{RB}	retention time of component B
V	volume
V	solenoid valve
V_G	volume of gas phase
V_M	void volume
V_M	volume of mobile phase
V_O	volume of original sample
V_R	retention volume
V'_R	adjusted retention volume
V_S	volume of sample phase
V'_S	volume of stationary phase
V_V	total volume of vial
W_{BA}	peak width at baseline of component A
W_{BB}	peak width at baseline of component B
W_b	peak width at baseline
WCOT	wall coated open tubular
W_O	the analyte in sample
wt	weight

$\bar{X}$	mean measured value
x	normally are concentrations
x_i	individual measured value
y	instrument signals
Y_L	lowest detectable instrument signals
Y_B	blank signal
Y_i	response value from the instrument corresponding to the individual x – values
$\hat{Y}_i$	value of y on the calculated regression line corresponding to the individual x – values
% R.S.D.	percent of relative standard deviation
%	percent
α	selectivity factor
β	phase ratio
^{o}C	degree Celsius
µl	microliter
µm	micrometer