

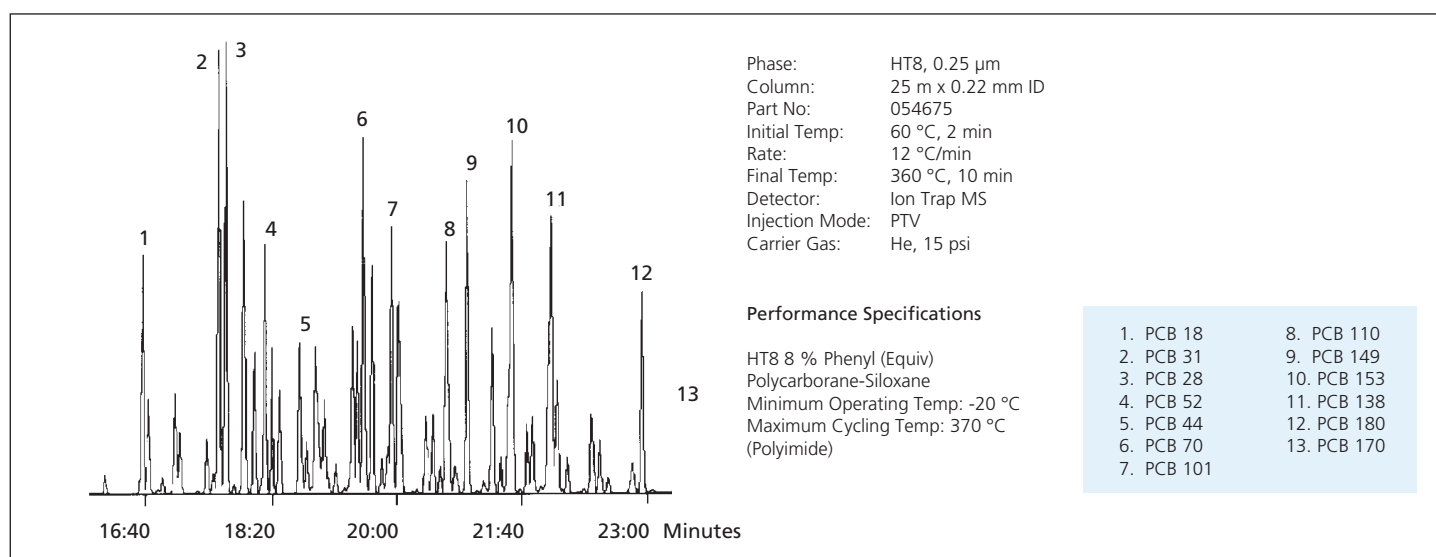
# Polychlorinated Biphenyls PCB Analysis

- Unique selectivity characteristics
- Maximum operating temperature of 370 °C
- Ideal for ECD and GC-MS systems

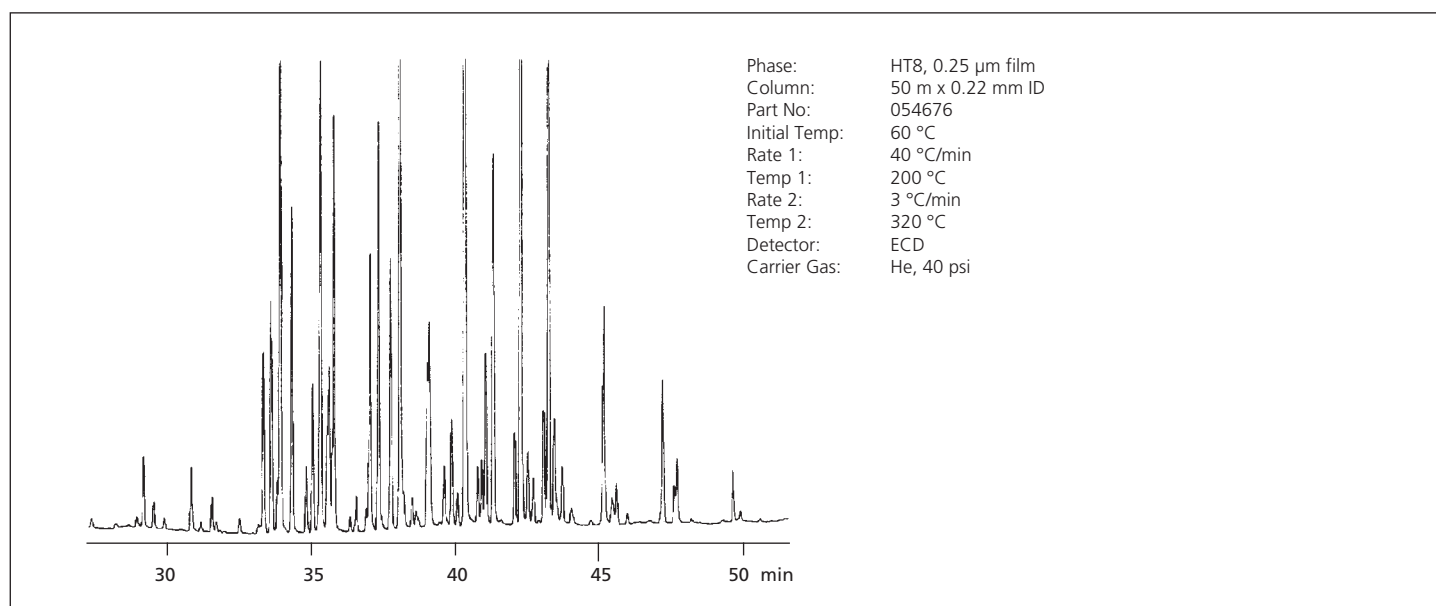
Carborane modified stationary phases have been shown to demonstrate unique selectivity characteristics towards complex mixtures of isomers. SGE has utilized these unique

features and added 8 % Phenyl to produce a stationary phase HT8, ideally suited to the analysis of PCBs.

The low bleed nature of the HT8 column also guarantees a low level of detection and compatibility with a variety of detector systems.



GC-MS Analysis of PCB mixture



Arocolor 1254

# APPLICATION NOTE

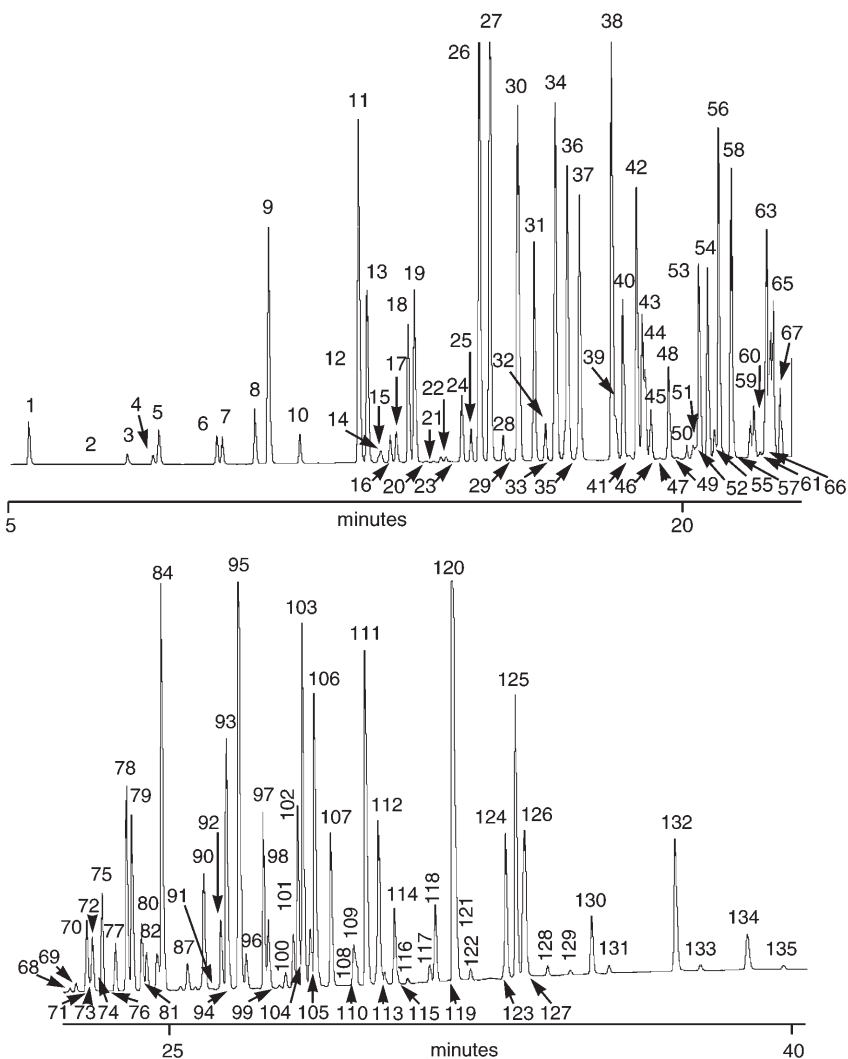
## PCB ANALYSIS

Phase: HT8, 0.25 µm film  
 Column: 50 m x 0.22 mm ID  
 Part No: 054676

Initial Temp: 90 °C, 1 min  
 Rate 1: 20 °C/min  
 Temp 1: 170 °C, 7.5 min

Rate 2: 3.5 °C/min  
 Temp 2: 285 °C  
 Rate 3: 20 °C/min

Temp 3: 320 °C  
 Carrier Gas: H<sub>2</sub>, 43 cm/sec  
 Detector: ECD



PCB Congeners	49. PCB57	98. PCB105
1. PCB1	50. PCB67	99. PCB137
2. PCB2	51. PCB63	100. PCB130
3. PCB3	52. PCB102	101. PCB178
4. PCB10	53. PCB95	102. PCB163
5. PCB4	54. PCB74	103. PCB138
6. PCB9	55. PCB121/155/91	104. PCB160
7. PCB7	56. PCB70	105. PCB158/175
8. PCB6	57. PCB80	106. PCB187/182
9. PCB8/5	58. PCB66	107. PCB183/129
10. PCB19	59. PCB96/55	108. PCB126
11. PCB18	60. PCB84/92	109. PCB185
12. PCB11	61. PCB125	110. PCB159/202
13. PCB17	62. PCB90	111. PCB174/128
14. PCB13	63. PCB101	112. PCB177/201
15. PCB24	64. PCB10	113. PCB167
16. PCB27	65. PCB60	114. PCB171
17. PCB15	66. PCB56	115. PCB197
18. PCB32	67. PCB152	116. PCB173
19. PCB16	68. PCB99	117. PCB200
20. PCB54	69. PCB119	118. PCB156/172
21. PCB23	70. PCB83	119. PCB157
22. PCB34	71. PCB136	120. PCB180
23. PCB29	72. PCB86	121. PCB193
24. PCB26	73. PCB97	122. PCB191
25. PCB25	74. PCB89	123. PCB198
26. PCB31	75. PCB115	124. PCB199
27. PCB28/53	76. PCB87	125. PCB170
28. PCB51	77. PCB154	126. PCB190/196/203
29. PCB21	78. PCB85	127. PCB169
30. PCB33/45/20	79. PCB10/81	128. PCB208
31. PCB22	80. PCB151	129. PCB207
32. PCB46	81. PCB144	130. PCB195
33. PCB36	82. PCB147	131. PCB189
34. PCB52/69	83. PCB135	132. PCB194
35. PCB43	84. PCB77/82	133. PCB194
36. PCB49	85. PCB149	133. PCB205
37. PCB47/48/75	86. PCB124	134. PCB206
38. PCB44	87. PCB143	135. PCB209
39. PCB59	88. PCB134/107/131	
40. PCB42	89. PCB123	
41. PCB35	90. PCB133	
42. PCB64	91. PCB118	
43. PCB71/103	92. PCB165	
44. PCB41	93. PCB146/114	
45. PCB37	94. PCB132/179	
46. PCB68	95. PCB122	
47. PCB100	96. PCB153	
48. PCB40	97. PCB176	
	98. PCB141	

Chromatogram courtesy of Environmental Institute, EC Joint Research Center, Ispra, Italy

## ORDERING INFORMATION - HT8 8% Phenyl (equiv.) Polycarborane-siloxane

ID (mm)	Film Thickness (µm)	10 Meter Part No.	12 Meter Part No.	25 Meter Part No.	30 Meter Part No.	40 Meter Part No.	50 Meter Part No.	60 Meter Part No.
01	0.1	054690	-	-	-	-	-	-
0.18	Proprietary	-	-	-	-	054686	-	-
0.22	0.25	-	054674	054675	-	-	054676	-
0.25	0.25	-	-	-	054677	-	-	054683
0.32	0.25	-	054679	054680	-	-	054681	054682
0.53	0.5	-	054684	054685	-	-	-	-

For more information contact our technical customer support team at: [techsupport@sge.com](mailto:techsupport@sge.com)

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