

PAHs in Foods Analysis

Rxi®-17Sil MS Columns (fused silica)

(midpolarity Crossbond® silarylene phase; equivalent to 50% phenyl/50% dimethyl arylene polysiloxane)

- 340/360 °C upper temperature limits.
- Excellent inertness for active compounds.
- Equivalent to USP phase G3.
- Low-bleed for use with sensitive detectors, such as GC/MS.
- Excellent separation of EU-PAHs, including fluoranthenes.

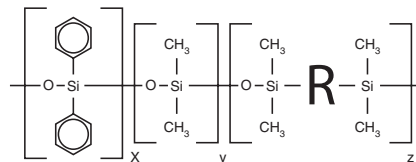
ID	df	temp. limits*	15-Meter	30-Meter	60-Meter
0.25mm	0.25µm	40 to 340/360°C	14120	14123	14126
0.32mm	0.25µm	40 to 340/360°C	14121	14124	

ID	df	temp. limits	20-Meter
0.18mm	0.18µm	40 to 340/360°C	14102
	0.36µm	40 to 340/360°C	14111

*Maximum temperatures listed are for 15- and 30-meter lengths. Longer lengths may have a slightly reduced maximum temperature.



Rxi®-17Sil MS Structure

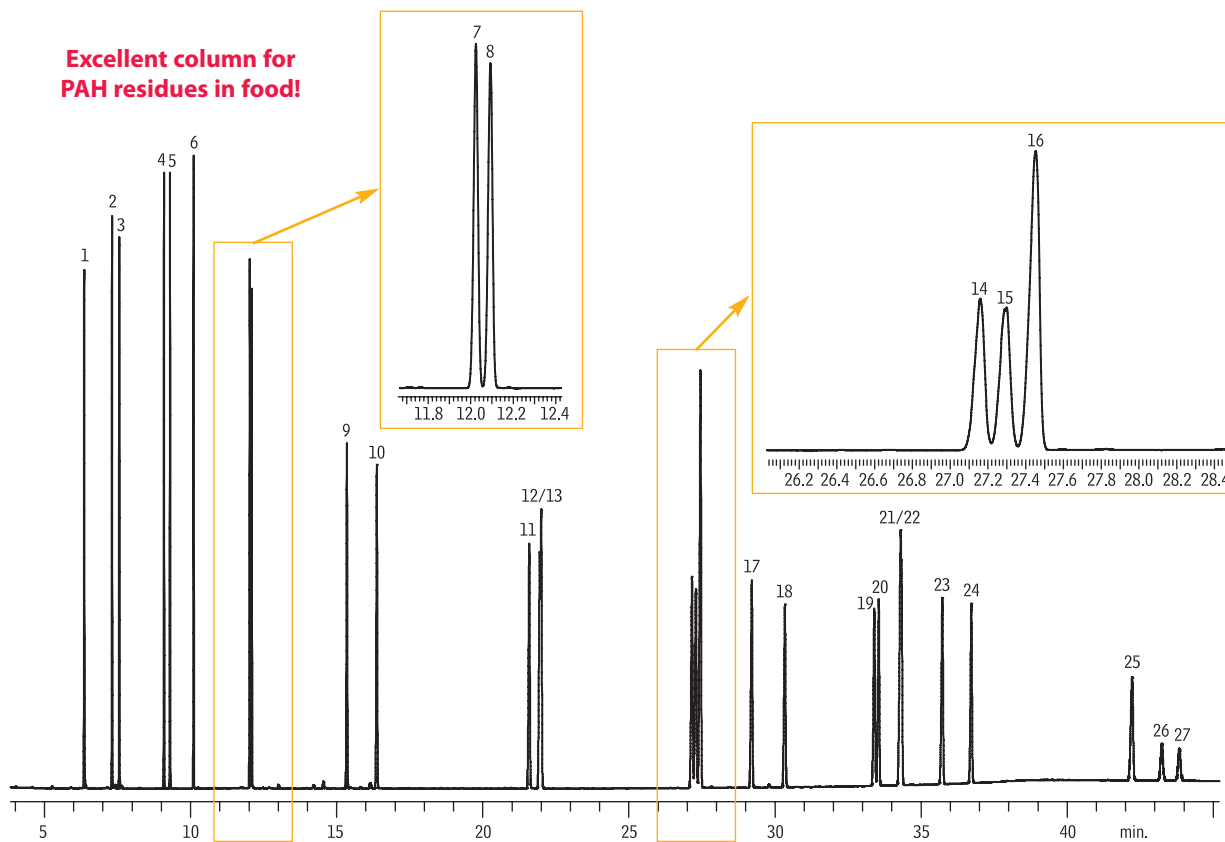


similar phases

DB-17ms, VF-17ms, BPX-50

Polycyclic Aromatic Hydrocarbons on an Rxi®-17Sil MS column.

Excellent column for PAH residues in food!



GC_EV1160

1. Naphthalene
2. 2-Methylnaphthalene
3. 1-Methylnaphthalene
4. Acenaphthylene
5. Acenaphthene
6. Fluorene
7. Phenanthrene
8. Anthracene
9. Fluoranthene
10. Pyrene
11. Benz[a]anthracene
12. Chrysene
13. Triphenylene
14. Benzo[b]fluoranthene

15. Benzo[k]fluoranthene
16. Benzo[j]fluoranthene
17. Benzo[a]pyrene
18. 3-Methylcholanthrene
19. Dibenzo[a,h]acridine
20. Dibenzo[a,j]acridine
21. Indeno[1,2,3-cd]pyrene
22. Dibenzo[a,h]anthracene
23. Benzo[ghi]perylene
24. 7H-Dibenzo[c,g]carbazole
25. Dibenzo[a,e]pyrene
26. Dibenzo[a,i]pyrene
27. Dibenzo[a,h]pyrene

Column Sample

Diluent:
Conc.:
Injection
Inj. Vol.:
Liner:
Inj. Temp.:
Purge Flow:
Oven
Oven Temp:
Carrier Gas
Flow Rate:
Detector
Instrument
Acknowledgement

Rxi®-17Sil MS, 30 m, 0.25 mm ID, 0.25 µm (cat.# 14123)
SV Calibration Mix #5 / 610 PAH Mix (cat.# 31011)
EPA Method 8310 PAH Mixture (cat.# 31841)
dichloromethane
10 ppm

0.5 µL splitless (hold 1.75 min.)
Auto SYS XL PSS Split/Splitless w/Wool (cat.# 21718)
320 °C
75 mL/min.

65 °C (hold 0.5 min.) to 220 °C at 15 °C/min. to 330 °C at 4 °C/min. (hold 15 min.)
He, constant flow
2.0 mL/min.
FID @ 320 °C
PE Clarus 600 GC
Instrument provided by PerkinElmer