


















Split Liners for Thermo Scientific 4000-5000-6000 Series GCs		Benefits/Uses:	ID*/OD & Length (mm)	Similar to TS part #	ea.	cat.# 5-pk.	25-pk.
	Laminar Cup Splitter	high MW compounds	4.0 ID 5.4 OD x 79.5	—	20809	20810	—
	Cycloplitter*	dirty samples, many injections before cleaning required	4.0 ID 5.4 OD x 79.5	—	20817	20818	—
	Cup Splitter Gooseneck	high & low MW compounds	4.0 ID 5.4 OD x 79.5	—	20885	20886	—
Splitless Liners for Thermo Scientific 4000-5000-6000 Series GCs		Benefits/Uses:	ID*/OD & Length (mm)	Similar to TS part #	ea.	cat.# 5-pk.	25-pk.
	Splitless (2mm ID)	trace samples	2.0 ID 5.4 OD x 79.5	—	20811	20812	20813
	Splitless (4mm ID)	trace samples	4.0 ID 5.4 OD x 79.5	—	20814	20815	20816
DI Liners for Thermo Scientific 4000-5000-6000 Series GCs (0.32/0.53 ID)		Benefits/Uses:	ID*/OD & Length (mm)	Similar to TS part #	ea.	cat.# 5-pk.	25-pk.
	Open-top Uniliner* w/ Wool	trace, dirty, active samples, high recovery & linearity	4.0 ID 5.4 OD x 79.5	—	20841	20842	—
Split Liners for Thermo Scientific TRACE™ & Focus SSL		Benefits/Uses:	ID*/OD & Length (mm)	Similar to TS part #	ea.	cat.# 5-pk.	25-pk.
	1mm Split	purge & trap & fast GC	1.0 ID 8.0 OD x 105	453 20075	20916	20917	—
	3mm Split	universal	3.0 ID 8.0 OD x 105	453 20030	20936	20937	20938
	5mm Split	universal	5.0 ID 8.0 OD x 105	453 20031	20939	20940	20941
	Laminar Cup Splitter	high MW compounds	4.0 ID 8.0 OD x 105	—	20948	20949	—
	Cup Splitter	high & low MW compounds	4.0 ID 8.0 OD x 105	—	20950	20951	—
	5mm Split Precision™ Liner w/ Wool	dirty samples, trace samples	5.0 ID 8.0 OD x 105	—	22288	22289	—
Splitless Liners for Thermo Scientific TRACE™ & Focus SSL		Benefits/Uses:	ID*/OD & Length (mm)	Similar to TS part #	ea.	cat.# 5-pk.	25-pk.
	Splitless (3mm ID)	trace samples	3.0 ID 8.0 OD x 105	453 20032	20942	20943	20944
	Siltek® Splitless (3mm ID)	trace samples	3.0 ID 8.0 OD x 105	—	20942-214.1	20943-214.5	20944-214.25
	Splitless (5mm ID)	trace samples	5.0 ID 8.0 OD x 105	453 20033	20945	20946	20947
	Double Gooseneck	trace, active samples up to 4µL	4.0 ID 8.0 OD x 105	—	20952	20953	—
	5mm Splitless Precision™ Liner w/ Wool	dirty samples, trace samples	5.0 ID 8.0 OD x 105	—	21028	21029	—

*Nominal ID at syringe needle expulsion point.








ordering note

For descriptions of liner deactivations, packings, and tools, see pages 141-143.

All liners are
100%
deactivated

All liners are shipped intermediate polarity (IP) deactivated unless otherwise requested.

Supplies for Thermo Scientific Instruments: Inlet Liners, Seals

Split Liners for Thermo Scientific TRACE™ PTV	Benefits/Uses:	ID*/OD & Length (mm)	Similar to TS part #	ea.	cat.# 5-pk.	25-pk.
 1mm ID Glass Liner	trace samples, high recovery & linearity	1.0 ID 2.75 OD x 120	453 22054	21114	21115	—
 2mm ID Glass Liner	universal	2.0 ID 2.75 OD x 120	453 22045	21116	21117	—
 Baffle Liner	trace samples	2.0 ID 2.75 OD x 120	—	22074	22075	—
 Siltek® Baffle Liner	trace samples	2.0 ID 2.75 OD x 120	—	22074-214.1	22075-214.5	—
DI Liners for Thermo Scientific TRACE™ and Focus SSL (0.32 & 0.53mm ID columns)	Benefits/Uses:	ID*/OD & Length (mm)	Similar to TS part #	ea.	cat.# 5-pk.	25-pk.
 Uniliner® w/ Wool	trace, active samples, high recovery, & linearity	5.0 ID 8.0 OD x 105	—	21005	21006	—
 Drilled Uniliner® (hole near top)	trace, active samples, high recovery, & linearity	5.0 ID 8.0 OD x 105	—	22411	22412	—
 Drilled Uniliner® (hole near bottom)	trace, active samples, high recovery, & linearity	5.0 ID 8.0 OD x 105	—	22413	22414	—

*Nominal ID at syringe needle expulsion point.

tech tip

Drilled Uniliner® Liners

Use the Drilled Uniliner® liner with the hole near the bottom for semivolatiles analysis or when compounds of interest could be affected by a tailing solvent peak. Use the Drilled Uniliner® liner with the hole near the top for chlorinated pesticides analysis, aqueous injections, as well as for analysis in which the compounds of interest elute away from the solvent peak.



Siltek® Treated Metal Inlet Liners for Thermo Scientific GCs

- Won't crack, chip or break like glass liners.
- Inertness equivalent to glass liners.
- Excellent response for pesticides, phenols, and other active compounds.

Liner Type (5.0mm ID x 8.0mm OD x 105mm)	ea.	5-pk.
5mm ID Split/Splitless Siltek® Treated Metal Inlet Liners w/Wool	—	21004
Liner Type (2.75mm OD x 120mm)	ea.	5-pk.
1mm ID Split/Splitless Siltek® Treated Metal Inlet Liners*	21080	21081
2mm ID Split/Splitless Siltek® Treated Metal Inlet Liners*	21082	21083
Liner Type (0.8mm ID x 2.75mm OD x 120mm)	ea.	5-pk.
SPME Siltek® Treated Metal Inlet Liner for TRACE™ 2000 GCs & PTV Inlets	22598	22599

*Works with PTV injectors.



Inlet Liner Seals for Thermo Scientific TRACE™ PTV

Description	Max. temp.	Similar to TS part #	qty.	cat.#
Inlet Liner Seals for Thermo Scientific TRACE™ PTV	450°C	29013417	2-pk.	21392



Graphite Sealing Ring for Thermo Scientific TRACE™ and Focus SSL Instruments

Description	Max. temp.	Similar to TS part #	qty.	cat.#
Graphite Sealing Ring for TRACE™ and Focus SSL Instruments	450°C	290-334-06	ea.	21898
Graphite Sealing Rings for TRACE™ and Focus SSL Instruments	450°C	290-334-06	2-pk.	21899

Septa for Thermo Scientific GCs

- Preconditioned and ready to use.
- Packaged in precleaned glass jars.

Now precision
molded!

Septum Diameter	25-pk.	50-pk.	100-pk.
Thermolite® Septa (usable to 340°C inlet temp.)			
9mm	27132	27133	27134
9.5mm (9/16")	27135	27136	27137
17mm	27150	27151	27152



Thermolite® Septa

IceBlue™ Septa (usable to 250°C inlet temp.)			
9mm	—	27156	27157
9.5mm (9/16")	—	27158	27159
17mm	—	27168	27169



IceBlue® Septa

BTO® Septa (usable to 400°C inlet temp.)			
9mm CenterGuide™	—	27104	27105
9.5mm (9/16")	—	27106	27107
17mm CenterGuide™	—	27116	27117



BTO® Septa

HANDY septum size chart

Instrument	Septum Diameter (mm)
Thermo Scientific	
TRACE™ GC, GCQ w/TRACE™, PTV, 8000 series	17
Finnigan (TMQ)	
GC 9001, GCQ, QCC™, TRACE™ 2000	9.5

Septa Holder Kits for Thermo Scientific TRACE™ and Focus SSL

- Includes septum support and holder.
- Made from high-quality stainless steel.

Description	Similar to TS part #	qty.	cat.#
A) Septa Holder for Thermo Scientific TRACE™ and Focus SSL	233 030 15		
B) Silcosteel®-AC Treated Septa Holder for Thermo Scientific TRACE™ and Focus SSL	350 054 335	kit	21299
	233 030 15		
	350 054 33	kit	24972

new!



Septum Cap for Split/Splitless Injector on Thermo Scientific TRACE™ and Focus SSL

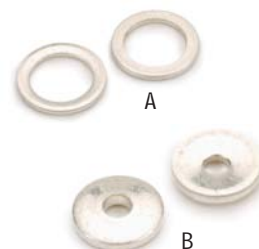
Description	Similar to TS part #	qty.	cat.#
Septum Cap for Split/Splitless Injector on Thermo Scientific TRACE™ and Focus SSL	350 01 050	ea.	24971

new!



Silver Seals for Thermo Scientific TRACE™ and Focus SSL

Description	Similar to TS part #	qty.	cat.#
A) Silver Seal for Split/Splitless Injector	29033629	10-pk.	23057
A) Silver Seal for Split/Splitless Injector	29033629	20-pk.	23058
B) Silver Seal for Capillary Detector Base Body	29037100	10-pk.	23059
B) Silver Seal for Capillary Detector Base Body	29037100	20-pk.	23060



Supplies for Thermo Scientific Instruments: Replacement Parts



A



B



C



D



Adapters for Capillary Columns on Thermo Scientific TRACE™ and Focus SSL

- Use same installation distance as manufacturer's adapters.
- Made of high-quality stainless steel.

Description	Similar to TS part #	qty.	cat.#
For use with standard 1/16" ferrules.			
A) Adapter for Capillary Column on Detector Base	—	ea.	24916
B) Adapter for Capillary Column on Split/Splitless Injector	—	ea.	24917
For use with M4 ferrules. new!			
C) Adapter for Capillary Column on Detector Base	347 25 436	2-pk.	24969
D) Adapter for Capillary Column on Split/Splitless Injector	347 05 451	ea.	24970

Graphite Ferrules—For M4 Fittings for Thermo Scientific TRACE™ and Focus SSL

Ferrule ID	Fits Column ID	Similar to TS part #	Graphite	
			2-pk.	10-pk.
0.3mm	0.10/0.15mm	—	22221	22222
0.4mm	0.18/0.28mm	290-13488	20280	20281
0.5mm	0.32mm	290-13487	20282	20283
0.8mm	0.45/0.53mm	290-13486	20284	20285

new!

Fixing Nut for Capillary Column for Split/Splitless Injector on Thermo Scientific TRACE™ and Focus SSL

- Made of high-quality stainless steel.

Description	Similar to TS part #	qty.	cat.#
Fixing Nut for Capillary Column for Split/Splitless Injector on Thermo Scientific TRACE™ and Focus SSL	350 32 423	5-pk.	24973

new!

Nut for Terminal Fitting for Thermo Scientific TRACE™ GCs



Description	Similar to TS part #	qty.	cat.#
Nut for Terminal Fitting for Thermo Scientific TRACE™ GCs	350 221 25	2-pk.	24896

Capillary Installation Gauge for Thermo Scientific TRACE™ and Focus SSL (M4 Ferrules)

- Seats ferrule onto column for consistent installations.
- Prevents crushed column ends.
- Made from high-quality stainless steel.



Install nut and ferrule onto column. Cut column end squarely. Slide column into installation gauge to recommended insertion distance. Finger-tighten column nut.



Tighten assembly to ensure a properly seated ferrule. Loosen assembly and remove column and column nut.



The ferrule will be properly seated, and should remain in place when light force is applied. If it slides loosely on the column, repeat procedure.

Description	qty.	cat.#
Capillary Installation Gauge for Thermo Scientific TRACE™ & Focus SSL (M4 ferrules)	ea.	22330

Metric Wrench Set

High-quality 6 x 7mm, 8 x 10mm, and 16 x 17mm wrenches for tightening a wide variety of fittings.

Description	qty.	cat.#
Metric Wrench Set	set	22997



Metric 9 Piece Ball-Point Hex Key Set

Includes 9 metric hex keys (Allen wrenches): 1.5, 2, 2.5, 3, 4, 5, 6, 8, 10mm.

Description	qty.	cat.#
Metric 9 Piece Ball-Point Hex Key Set	set	22999



Jet Removing Tool for Thermo Scientific GCs: Focus GC / TRACE™ GC / Ultra/TRACE™ GC x GC

- Unique, ergonomic handle—easy to grip.
- Easily loosens the FID jet.



Remove FID cell assembly.



Slip tool over FID jet.



Turn counterclockwise to loosen jet.



Use tweezers (cat. #20101) to remove jet.



Description	Similar to TS part #	qty.	cat.#
Jet Removing Tool for Thermo Scientific GCs	205 019 00	ea.	24936

Liner Cap Removing Tool for Thermo Scientific GCs:**Focus GC / TRACE™ GC / Ultra/TRACE™ GC x GC**

- Easily loosens the liner cap from the injector.
- Unique, ergonomic handle—easy to grip.



Remove septum cap, septum holder, septum, and septum support.



Place tool on liner cap. Align two pins on bottom of tool with two open slots on liner cap.



Turn counterclockwise to loosen liner cap.



Use tweezers (cat. #20101) to remove liner cap.

Description	Similar to TS part #	qty.	cat.#
Liner Cap Removing Tool for Thermo Scientific GCs	205 070 10	ea.	24937

Make Life Easier (MLE) Capillary Tool Kit for Thermo Scientific GCs**Includes:**

- capillary installation gauge for Thermo Scientific GCs
- liner cap removing tool for Thermo Scientific GCs
- 1/8", 3/16", and 1/4" nylon brushes
- 1/4", 3/8", and 3/16" stainless steel wire tube brushes
- stainless steel surface brush
- 6 stainless steel jet reamers (0.25–0.65mm OD)
- 1/4" x 5/16" open end wrench
- 3/8" x 7/16" open end wrench
- 6mm x 7mm open end wrench
- 8mm x 10mm open end wrench
- 16mm x 17mm open end wrench
- rubber-tipped slide-lock tweezers
- scoring wafers with handles
- inlet liner removal tool
- septum puller
- mini wool puller/insertor tool
- 4-inch tapered needle file
- swivel head flashlight
- mini hand drill set
- 15cm compact steel ruler
- pocket magnifier
- high temperature string (1 meter)
- pipe cleaner (12-inch)
- cotton tip swabs (pk. of 25)

Everything you need in one complete kit!



Description	qty.	cat.#
MLE Capillary Tool Kit for Thermo Scientific GCs	kit	22183

Transfer Line Reducing Kit for Thermo Scientific TRACE™ and Focus DSQ Mass Spectrometers

- Meets or exceeds manufacturer's performance.



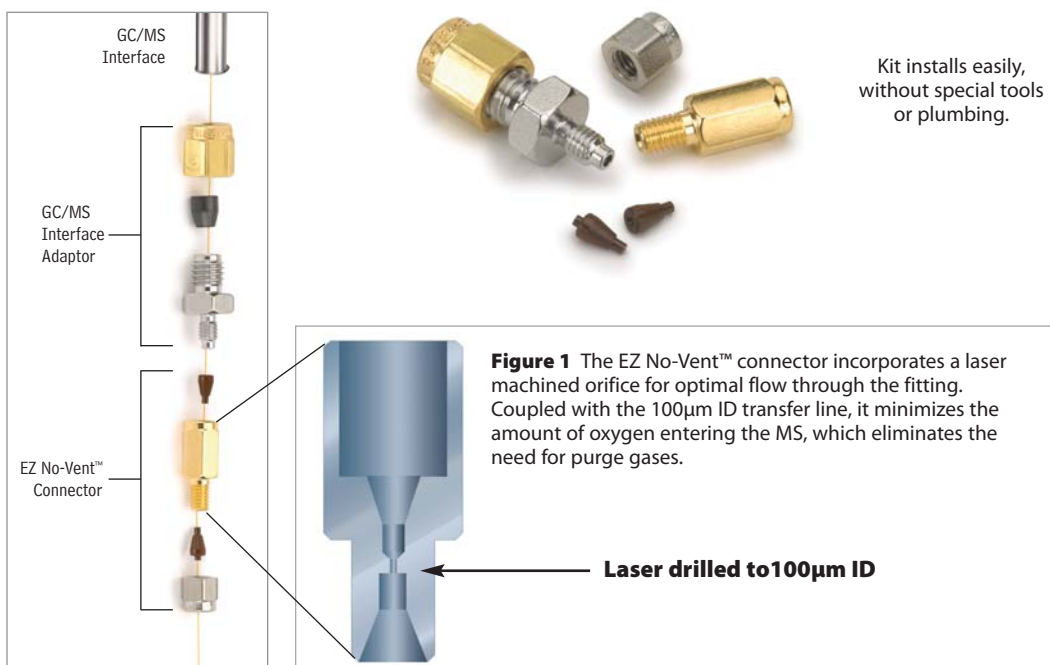
Description	Similar to TS part #	qty.	cat.#
Transfer Line Reducing Kit for Thermo Scientific TRACE™ and Focus DSQ Mass Spectrometers	76458-2014s 76458-2009s A0101-03151	kit	22082

EZ No-Vent™ GC Column-Mass Spectrometer Connector

- Change GC/MS columns in minutes without venting—100µm transfer line throttles vacuum and prevents venting.
- Easy to install and maintain—no special tools or plumbing required.
- Gold-plated body for inertness.
- Deactivated transfer line keeps analytes focused; high-temperature polyimide ferrules eliminate leaks at the problematic transfer line fitting.
- Lower cost than other “no-vent” fittings.
- For Thermo Scientific Focus DSQ GC Mass Spectrometers.

Change columns in minutes—without venting!

We designed the EZ No-Vent™ GC column-mass spectrometer connector to be simple and easy to use. A critical orifice in the EZ No-Vent™ connector minimizes the amount of oxygen allowed into the MS source, eliminating the need for purge gas and enabling you to skip the lengthy vent and pump-down cycle otherwise required when you make a column change. This can save nearly a day of downtime with each column change. The EZ No-Vent™ connector easily attaches to the MS source without special tools or extra plumbing.



Nicole Bartley
Customer Service Representative
2+ years of service!

Description	qty.	cat.#
EZ No-Vent™ Connector Kit for Thermo Scientific Focus DSQ GC Mass Spectrometers Kit includes: EZ No-Vent™ Connector; two 0.4mm ID ferrules for capillary column, two 0.4mm ID ferrules for transfer line, 100µm deactivated transfer line (3 ft.), column plug, column nut.	kit	22454
Replacement ferrules for connecting capillary column to EZ No-Vent™ Connector:		
0.4mm ID (Polyimide)	2-pk.	21015
0.5mm ID (Polyimide)	2-pk.	21016
Replacement ferrules for connecting transfer line to EZ No-Vent™ Connector: 0.4mm ID	2-pk.	21043
Replacement 100µm deactivated transfer line	3 ft.	21018
Replacement EZ No-Vent™ Column Nut	5-pk.	21900
Replacement EZ No-Vent™ Plug	2-pk.	21915
Open-End Wrenches (1/4" x 5/16")	2-pk.	20110
Open-End Wrenches (3/8" x 7/16")	2-pk.	22455