

fasteners

Clips & fastener for ASHRAE Filters



Camfil Farr fastener ensure that your system efficiency will be equivalent to your filter efficiency.



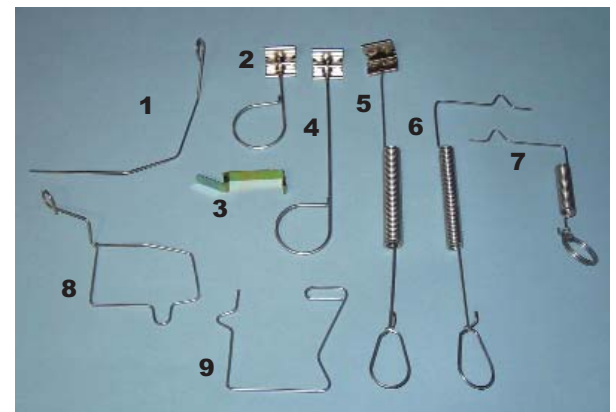
Top: Camfil Farr frames are prepunched to accept a variety of fastener. fastener are also available for other manufacturers frames. Three of the most common are shown here, C-80, C-71 and C-70.

Bottom: Using a combination of fastener, users may apply up to four stages of filtration in one built-up filter bank. In this photo, a 4" deep 30/30 is secured to a 12" Riga-Flo.

Camfil Farr fastener are available for built-up bank holding frames or housings that incorporate frames to ensure that air filters fit securely in the holding mechanism. A gap around a 24" by 24" filter may result in as much as 18% air bypass, or the equivalent of a 3" hole in the middle of the filter. The use of the correct fastener, and the proper number of fastener, ensures that the air moving through the system will be wholly treated by the air filters ensuring improved indoor air quality for the facility.

Camfil Farr fastener are:

- available in many different variations
- configurations available for Camfil Farr holding frames or holding frames by other manufacturers
- standard construction of high tensile strength steel or cad-plated in many configurations
- available in stainless steel
- may be combined to apply up to four stages of filtration.



Some of the fastener available.

- | | | |
|-----------|----------|----------------|
| 1: C-70 | 2: C78-1 | 3: C-79 |
| 4: C-78-6 | 5: C-83 | 6: C-80 |
| 7: C-71 | 8: C-77 | 9: C-86 (C-89) |



Camfil Farr	Product sheet
Camfil Farr Fasteners	2902 - 0705
Camfil Farr - clean air solutions	

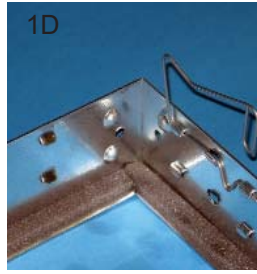
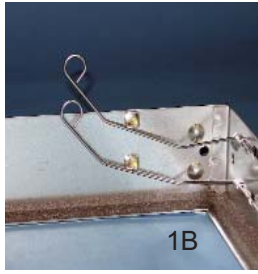
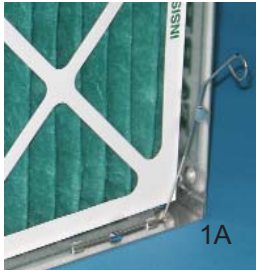


Photo 1A: 2" pleated filter with C-70 fastener.

Photo 1B: C-70 fastener positioning, lower for 1" deep filter, upper for 2" deep filter.

Photo 1C: C-86 fastener for 4" deep filter in Type 8 frame.

Photo 1D: C-86 fastener positioning.

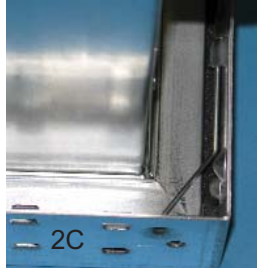
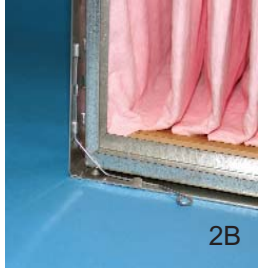
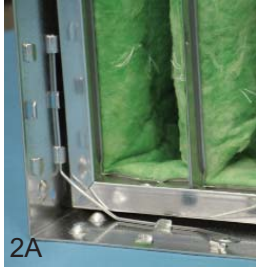


Photo 2A: C-70 positioning for Hi-Flo or other pocket style filters

Photo 2B: C-70 positioning for HP frame assembly

Photo 2C: C-70 positioning for header-type box filters

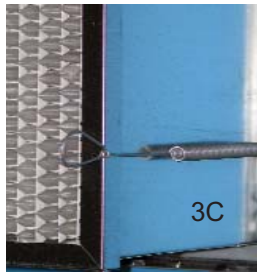


Photo 3A: C-80 positioning in Type 8 frame.

Photo 3B: C-80 positioning on Riga-Flo.

Photo 3C: C-80 positioning on Aeropac.

Photo 3D: Riga-Flo and Aeropac filters have pilot holes for C-80 attachment.

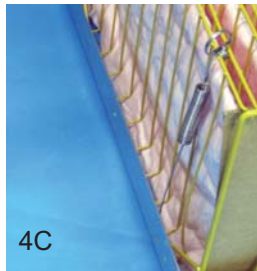
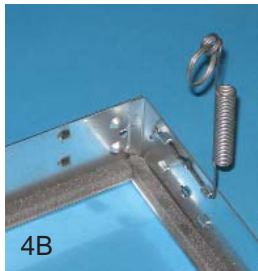
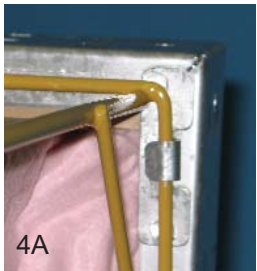


Photo 4A: Externally supported retainer for front access HP. Built-in tab at each corner of the holding frame locks retainer in position (optional).

Photo 4B: C-71-12 fastener positioning.

Photo 4C: C-71-12 fastener with retainer in position. Small loop is positioned over between outside double bar of frame.

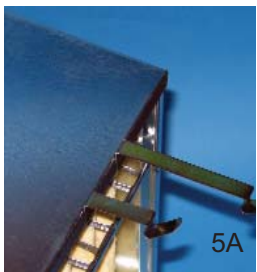
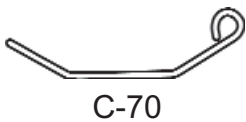
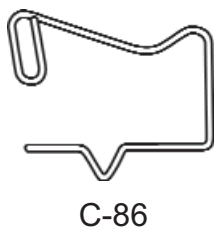


Photo 5A: C-79-1 and C-79-2 fastener positioning for 2" deep and 4" deep pleated filters (respectively).

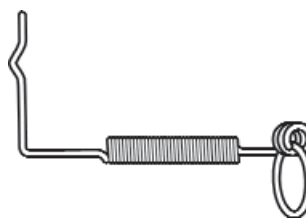
Photo 5B: C-79-2 fastener with Riga-Flo and 4" deep 30/30.



C-70



C-86



C-71-12



C-77



C-80



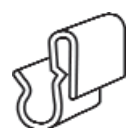
C-79



C-78-1



C-91



C-30-2

fastener shown on this page are not drawn to scale. Items are shown for relative fastener identification.

APPLICATION DATA

FASTENERS

Applications (four fastener required per filter, see sales drawing 050202)		Access	Model Number	Part Number
30/30® Aeropleat® or Ultrasolve® in Type 8 holding frame	1" or 2" deep filter	U or D	C-70	050025-000
	4" deep filter (use C-77 for Ultrasolve)	U	C-86	074437-000
		U or D	C-77 ¹	059615-001
	2" deep filter as a prefilter to a Riga-Flo, or Aeropac (no header)	U or D	C-79-1	061179-001
	4" deep filter as a prefilter to a Riga-Flo, or Aeropac (no header)	U	C-79-2	061179-002
	4" deep Ultrasolve with 2" deep prefilter		C-79-5	061179-005
	4" deep Ultrasolve with 4" deep prefilter		C-79-6	061179-006
	2" deep filter as a prefilter to a Riga-Flo E-Series (no header)		C-102-1	124298-001
	4" deep filter as a prefilter to a Riga-Flo E-Series (no header)		C-102-2	124298-002
	1" deep filter as a prefilter in the same frame with Hi-Flo, Riga-Flo PH-A or Aeropac (single header)		C-70 ⁴	050025-000
	2" deep filter as prefilter in the same frame with Hi-Flo, Riga-Flo PH-A or Aeropac (single header) (Two C-70 should be used to hold headered filter in place, and two C-86 fastener (or C-77) should be used to hold prefilter in place. fastener would be on opposite corners)		C-86 or C-77 ¹ & C-70	074437-000 or 059615-001 & 050025-000
	4" deep filter as a prefilter in the same frame with Hi-Flo, Riga-Flo PH-A or Aeropac (single header)		C-89 ⁴ & C-70	078865-000
	2" deep filter as a prefilter in the same frame with Aeropac (double header)		C-103-1	403229-001
4" deep filter as a prefilter in the same frame with Aeropac (double header)	C-103-2		403229-002	
30/30® Aeropleat® or Ultrasolve® in holding frames by other manufacturers	1" deep filter	U or D	C-78-1	059920-001
	2" deep filter		C-78-2	059920-002
	4" deep filter		C-78-4	059920-003
	1" deep filter as a prefilter to a Hi-Flo or Riga-Flo PH-A	U	C-78-2 ⁴	059920-002
	2" deep filter as a prefilter to a Hi-Flo or Riga-Flo PH-A		C-78-3 ⁴	059920-004
	4" deep filter as a prefilter to a Hi-Flo or Riga-Flo PH-A		C-78-5 ⁴	059920-006
	2" deep filter as a prefilter to a Ultrasolve		C-78-7	059920-008

NOTES:

- ¹ When using the Farr 30/30 Class 1 filter in this application, a C-77 fastener should be used.
- ² Two fastener can be used for upstream application, however it is not recommended.
- ³ C-99 is also available in place of the C-80 to allow for more clearance downstream.
- ⁴ Hi-Flo filters can be accessed from either upstream or downstream.
- ⁵ To secure a Riga-Flo PH or Durafil using upstream access only, use a C-70 fastener, part number 050025-000. For the Durafil only, the C-70 fastener may be used on the downstream as well.
- ⁶ The terms upstream (U) and front access are synonymous, as are downstream (D) and rear access.
- ⁷ For upstream access & downstream access (Durafil and Aeropac only) where the filter goes through frame opening a C-70 fastener should be used. When the filter does not go through the frame opening then a C-80 or a C-100 (Aeropac only).

Continued on next page.

APPLICATION DATA

FASTENERS (continued)

Applications (four fastener required per filter, see sales drawing 050202)		Access	Model Number	Part Number
Riga-Flo® in Type 8 holding frame	To secure 12" deep filter — 24" x 24"	U or D	C-80 ⁵ or C-99	061180-000 or 114353-000
	To secure 12" deep filter — 24" x 12"			
	To secure 6" deep filter — 24" x 24"		C-90 ² or C-99 ²	078948-000 or 078948-000
	To secure 6" deep filter — 24" x 12"			
	To secure 6" deep filter as a prefilter to a 12" deep filter—24" x 24"		C-91	079445-000
	To secure 6" deep filter as a prefilter to a 12" deep filter—24" x 12"			
E-Series Riga-Flo® in Type 8 holding frame	To secure 12" deep filter — 24" x 24"	U or D	C-80 or C-99	061180-000 or 114353-000
	To secure 12" deep filter — 24" x 12"			
Riga-Flo® in holding frames by other manufacturers	To secure 12" deep filter — 24" x 24"	U or D	C-83	062529-000
	To secure 12" deep filter — 24" x 12"		C-83 ²	
	To secure 6" deep filter — 24" x 24"		C-83-6	079618-000
	To secure 6" deep filter — 24" x 12"		C-83-6 ²	
Aeropac® Durafil® Riga-Flo® PH Hi-Flo® in Type 8 holding frame	To secure 12" deep Aeropac (no header) — 24" x 24", 24" x 12"	U or D	C-80 ³ or C-99 ²	061180-000 or 114353-000
	To secure a single header pocket style filter (Hi-Flo)	U or D	C-70	050025-000
	To secure a 12" deep single header style filter (Riga-Flo PH, Durafil, Aeropac)	U or D	C-70	050025-000
	To secure a 12" deep single header Aeropac style filter	D	C-100	114646-000
	To secure a 12" deep double header style filter	U	C-80 or C-100	061180-000
	To secure 6" deep single header style filter	U U or D	C-70 C-90	050025-000 078948-000

NOTES:

- ¹ When using the Farr 30/30 Class 1 filter in this application, a C-77 fastener should be used.
- ² Two fastener can be used for upstream application, however it is not recommended.
- ³ C-99 is also available in place of the C-80 to allow for more clearance downstream.
- ⁴ Hi-Flo filters can be accessed from either upstream or downstream.
- ⁵ To secure a Riga-Flo PH or Durafil using upstream access only, use a C-70 fastener, part number 050025-000. For the Durafil only, the C-70 fastener may be used on the downstream as well.
- ⁶ The terms upstream (U) and front access are synonymous, as are downstream (D) and rear access.
- ⁷ For upstream access & downstream access (Durafil and Aeropac only) where the filter goes through frame opening a C-70 fastener should be used. When the filter does not go through the frame opening then a C-80 or a C-100 (Aeropac only).

Camfil Farr has a policy of uninterrupted research, development and product improvement. We reserve the right to change designs and specifications without notice.

Camfil Farr, Inc.

United States Tel: (973) 616-7300 Fax: (973) 616-7771
 Canada Tel: (450) 629-3030 Fax: (450) 662-6035
 E-mail: camfilfarr@camfilfarr.com

