Air Cleaner Elements —SAE J1141

SAE Information Report
Approved June 1977

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AIR CLEANER ELEMENTS—SAE J1141

SAE Information Report

Report of Engine Committee approved June 1977.

Over the past 15 years many differently sized dry-type air cleaner elements have been manufactured to service the numerous makes and models ϕ of United States domestic passenger cars and light trucks. This has led to inventory and stock control inefficiencies that affect the motoring public, the automobile manufacturers, and the air cleaner producers. Currently, there are over 50 different air cleaner elements required to service these vehicles.

The SAE Air Filter Test Code Subcommittee, recognizing the need for standardization of air cleaners, has compiled a list of the 20 most-used elements. Automotive engineers responsible for the design of engine air induction systems on new applications, are encouraged to select a dry-type air cleaner element from this list. It is expected that by adhering to this recommendation, the total number of elements will gradually decline to a much lower level than that which currently exists.

A periodic review will be made by the Air Cleaner Test Code Subcommittee to revise this listing, based on changes in sales volume rating for these and other models used on United States domestic production vehicles.

1. Selection Procedure—The air cleaner elements have been arranged in order of descending sales volume popularity in the following listing. The Table also includes the information on nominal height, inside diameter, and outside diameter. The exact dimensions, tolerances, seal configurations, and general construction and filtration characteristics information on these elements, may be obtained from the air cleaner manufacturers.

Under hood space limitations, available air cleaner housings and engine induction air requirements dictate the choice of the proper element to the automotive engineer. After these general parameters are established one should proceed in the following manner:

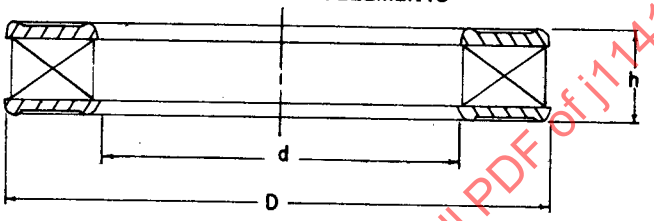
1) By referring to the listing, choose an appropriate size element for the application.

2) If more than one element appears to fulfill the requirements, then choose the most popular.

3) Get all necessary information and assistance to complete the necessary design details by contacting the air-cleaner element manufacturers.

ϕ Note: The higher popularity ratings are based on physical dimensions and should take precedence only after the engineer has determined that construction, materials, and functional characteristics are interchangeable.

AIR CLEANER ELEMENTS



Vol Popularity Rating	Height h		Inside Dia d		Outside Dia D	
	in	mm	in	mm	in	mm
1	3.46	87.9	9.82	249.4	12.00	304.8
2	2.79	70.9	11.20	284.5	13.00	330.2
3	2.03	51.6	8.09	205.5	9.75	247.7
4	2.46	62.5	9.82	249.4	12.00	304.8
5	3.04	77.2	11.62	295.2	13.94	354.1
6	2.77	70.4	7.40	188.0	10.30	261.6
7	2.61	66.3	9.03	229.4	11.23	285.2
8	2.54	64.5	8.62	219.0	10.80	274.3
9	3.00	76.2	6.42	163.1	8.30	210.8
10	2.13	54.1	8.94	227.1	10.89	276.6
11	2.75	69.9	11.04	280.4	12.80	325.1
12	2.49	63.3	11.20	284.5	13.00	330.2
13	2.26	57.4	7.94	201.7	9.70	246.4
14	2.35	59.7	7.73	196.3	10.00	254.0
15	2.62	66.6	10.84	275.3	12.34	313.4
16	3.50	88.9	8.15	207.0	9.74	247.4
17	3.22	81.8	6.63	168.4	8.40	213.4
18	3.00	76.2	8.62	219.0	11.39	289.3
19	2.10	53.3	9.56	242.8	11.72	297.7
20	3.50	88.9	11.04	280.4	12.80	325.1

The ϕ symbol is for the convenience of the user in locating areas where technical revisions have been made to the previous issue of the report. If the symbol is next to the report title, it indicates a complete revision of the report.