

INCH-POUND

A-A-59436
17 SEPTEMBER 1999
SUPERSEDING
MIL-S-12928H
30 APRIL 1993

COMMERCIAL ITEM DESCRIPTION

SEPARATORS, OIL AND WATER, COMPRESSED AIR

The General Services Administration has authorized the use of this Commercial Item Description (CID) for all federal agencies.

1. **SCOPE.** This CID covers the general requirements for the wall mounted separators designed to remove oil, water, and foreign particles from compressed air and to regulate the delivery pressure of the filtered air. The treated compressed air is commonly used to power spray paint guns, spray applicators and/or pneumatic equipment.
2. **CLASSIFICATION.** This CID covers two classes of separators. This CID uses a classification system which includes the Part Identification Number (PIN) as shown in section 6 to identify the following classes.
 - a. Class I - this class of separator contains one regulator and two air outlets.
 - b. Class II - this class of separator contains two regulators and four air outlets.

The separator shall, as a minimum, be in accordance with the requirements of this CID, and shall be the manufacturer's standard commercial product. Any additional or better features, not prohibited by the contract or order, that are a part of the manufacturer's standard product may be included in the separator being offered. A standard product is a product that has been sold or is being currently offered for sale in the commercial market through advertisements or manufacturer's catalogs or brochures, and represents the latest production model.

3. SALIENT CHARACTERISTICS

3.1 **Components.** The principal components of the class I separator shall be a head, a filtering unit, a reservoir, a drain valve, a pressure regulator, a regulated air pressure gauge, at least one regulated filtered air outlet valve, an unregulated air pressure gauge, and one supply line pressure filtered air outlet valve with necessary fittings. The class II separator shall have two pressure regulators, two regulated air pressure gauges, one unregulated air pressure gauge, a minimum of four air outlet valves (at least two of which will be for regulated filtered air and at least one of which will be for supply line pressure, filtered air), and the necessary fittings.

Beneficial comments, recommendations, additions, deletions clarifications, etc. and any other data which may improve this document should be sent by letter to: Defense Supply Center Columbus, Attn: DSCC-VAI, 3990 E Broad Street, Columbus, OH 43216-5000.

FSC 4940

A-A-59436

3.1.1 Filtering Unit. The filtering unit shall be made of corrosion-resistant material. The filter shall be the cleanable or replaceable type capable of removing 10 micron or finer particle contamination.

3.1.2 Separator Reservoir. The reservoir shall be made of corrosion-resistant material, shall have at least a one third (1/3) pint capacity, and shall have a valve for removing collected oil and/or water.

3.1.3 Pressure Gauges. The pressure gauges shall be in accordance with American National Standards Institute (ANSI) B40.1, accuracy grade B.

3.1.4 Inlet and Outlet Fittings. The separator shall be provided with a female air inlet with ½ inch NPT thread. All outlet valves shall have ¼-18 NPSH thread, with a tapered seat having a 60° angle included for a female connection.

3.2 Capacity and Performance. The capacity and performance requirements stated herein apply to both class I and class II separators unless otherwise indicated. These requirements are summarized in table I.

3.2.1 Class I Separator. With an inlet pressure of 100 pound-force per square inch gauge (psig) and regulated pressure of 60 psig, the regulated air pressure gauge shall record a drop of not more than 11 psig when the regulated air outlet valve is opened to permit air passage at a rate of 20 cubic feet per minute (CFM) free air, for a period of 30 seconds. With the inlet and regulated pressures as stated above, the regulated air pressure gauge shall record a drop of not more than 6 psig when the regulated air outlet valve is opened to permit air passage at the rate of 11 CFM free air for a period of 30 seconds.

3.2.2 Class II Separator. The performance requirements for the class II separator shall be the same as the requirements for the class I separator (3.2.1 above) except that the requirements shall apply to the two regulators, individually, while being operated simultaneously.

3.2.3 Working Pressures. The separator assembly and its component parts shall be suitable for use with a maximum working pressure of 200 psig, at a maximum operating temperature of +160°F. Each pressure regulator shall be adjustable for delivery of air at any pressure from not less than 20 to 100 psig. The differential pressure shall not be more than 5 psig from inlet to outlet over the range of regulation.

3.2.4 Safety and Health Requirements. The separators shall comply with the general safety and health requirements promulgated under Title 29, Code for Federal Regulations (CFR) Chapter XVII, Part 1910, which are applicable to the separators themselves.

Table I. Components, capacity and performance requirements.

REQUIREMENTS	Class I	Class II
Inlet air pressure - 200 psig maximum	X	X
Working temperature - 160°F maximum	X	X
Filter element @ 10 microns	X	X
Cleanable/replaceable filter	X	X
Regulator(s)	1	2
Gauges	2	3
1/3 pint reservoir	X	X
Drain Valve	X	X
Air passage 20 CFM @ 60 psig	X	X
Regulated filtered air outlets	1	2
Total number of air outlets	2	4
Inlet fitting ½ inch NPT thread	X	X
Outlet fitting ¼ -18NPSH thread	X	X
Corrosion resistant materials	X	X

4. REGULATORY REQUIREMENTS

4.1 Recycled/Recovered Materials. The offeror/contractor is encouraged to use recovered materials to the maximum extent practicable, in accordance with paragraph 23.403 of the Federal Acquisition Regulation (FAR).

5. QUALITY ASSURANCE PROVISIONS

5.1 Product Conformance. The products shall meet the salient characteristics of this CID, conform to the producer's own drawings, specifications, standards, and quality assurance practices, and be the same product offered for sale in the commercial market. The Government reserves the right to require proof of such conformance.

5.2 Market Acceptance. The following market acceptance criteria are necessary to document the quality of the product to be provided under this CID. All manufactures contained in this CID, meet these criteria.

- a. The manufacturer producing the item must have been producing a product meeting the requirements of this CID for at least 4 years.
- b. The provider must have sold 500 units meeting this CID to the Government or in the commercial marketplace over the past 4 years.

6. PACKAGING

6.1 Preservation, Packing, and Marking. Preservation, packing, and marking shall be as specified below and as supplemented in the contract or order.

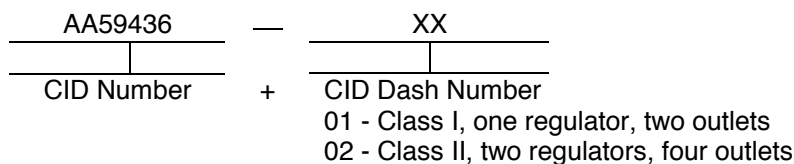
6.2 Packing Instructions. Safety caps shall be installed over the threaded connections to prevent damage.

6.3 Marking. The manufacturer will mark each unit with the standard commercial part number and the manufacturer's name.

7. NOTES

7.1 Part Identification Number (PIN). The PIN shall be used for Government purposes to buy commercial products described by this CID. The following part identification numbering procedure is for government purposes and does not constitute a requirement for the contractor.

PIN Construction



7.2 Ordering Data. The contract or order should specify the following:

- a. CID document number, revision, and CID PIN
- b. Quality assurance provisions
- c. Packaging requirements

A-A-59436

7.3 National Stock Numbers (NSNs). The following is a list of identified NSNs assigned that correspond to this CID.

<u>NSN</u>	<u>Class</u>	<u>CID PIN</u>
4940-00-215-8496*	I and II	AA59436-01 and -02
4940-00-242-4101	I	AA59436-01
4940-00-242-4100	II	AA59436-02

* Note: This NSN was used to procure both classes of separators. Additional descriptive data was provided with those requisitions to distinguish between the different separators.

7.4 Commercial Products. At the time of CID preparation and coordination, these manufacturers were known to have commercial products that would meet the requirements of this CID. This information should not be considered as a list of approved manufacturers or be used to restrict procurement to only the manufacturers shown.

<u>Manufacturer's name and address</u>	<u>Manufacturer's CAGE</u>
Fluid-Air Products Inc. 719 Rudder Road Fenton, MO 63026 (314) 729-7000	5S985
ITW Finishing LLC 1724 Indian Wood Circle Maumee, OH 43537-4048 (419) 891-8191	17431
Sharpe Manufacturing Co 8750 Pioneer Blvd. Santa Fe Springs, CA 90670 (310) 908-6800	54360

7.5 Government Users. To acquire information on obtaining the separators from the Government inventory system, contact Defense Supply Center, Columbus, ATTN: DSCC-VSS, 3990 East Broad Street, Columbus, OH 43216-5000, or telephone (614) 692-4249.

8. SOURCE OF DOCUMENTS

8.1 Federal regulations may be obtained from the Superintendent of Documents, US Government Printing Office, Washington, DC 20402.

8.2 ANSI documents are available from the American National Standards Institute, Inc., 1430 Broadway, New York, NY 10018.

MILITARY INTERESTS:

Custodians:

Army - AL
Navy - YD2
Air Force - 99

Review activities:

Navy - MC
Air Force - 82

CIVIL AGENCY COORDINATING ACTIVITY:

Preparing activity:

DLA - CC

(Project 4940-0727-01)