

CC: J. K. Addison
I. Zeise

December 19, 1984

R. S. KRZYWICKI - BEAUMONT CONSTRUCTION
T. L. PRITCHETT - CAPE FEAR CONSTRUCTION
B. C. COLE - CORPUS CHRISTI CONSTRUCTION
R. K. HOFFMAN - MAY PLANT CONSTRUCTION
M. JAMISON - MEMPHIS CONSTRUCTION
A. D. COBB - (NIAGARA FALLS) LOUVIERS 4001
N. J. DERRICK - SABINE RIVER CONSTRUCTION
J. C. JENKINS, JR. - SAVANNAH RIVER CONSTRUCTION
R. H. PAULEY - SAVANNAH RIVER CONSTRUCTION
G. F. STALNAKER - SAVANNAH RIVER CONSTRUCTION
L. BLASKI - SAVANNAH RIVER CONSTRUCTION
R. L. CLARK - SAVANNAH RIVER CONSTRUCTION
L. R. JONES - SAVANNAH RIVER CONSTRUCTION
W. S. PADGETT - SAVANNAH RIVER CONSTRUCTION
R. PROBASCO - SAVANNAH RIVER CONSTRUCTION
A. R. SCHOEN - SAVANNAH RIVER CONSTRUCTION
S. K. SMITH - SAVANNAH RIVER CONSTRUCTION
F. H. STEPHENS - SAVANNAH RIVER CONSTRUCTION
R. H. OLIVER - SPRUANCE CONSTRUCTION
D. A. GADDY - VICTORIA CONSTRUCTION
H. C. DEFFENBAUGH - WASHINGTON WORKS CONSTRUCTION
L. W. FERGUSON - WILMINGTON AREA CONSTRUCTION
B. VISSER - DORDRECHT CONSTRUCTION
T. TZIOVAS - LUXEMBOURG CONSTRUCTION
C. S. BLACKBURN - MAYDOWN CONSTRUCTION
R. I. MANNING - WILMINGTON SHOPS
S. A. WOOD - GAE - RED HILL

REVISED INCIDENT AND INJURY REPORTING SYSTEM

Beginning January 1, 1985, the EASI (Easy Access to Safety Information) system for reporting incidents and injuries will be put into effect. Please review and begin familiarizing yourselves with the attached information from the S&OH Division. Brown Book Procedures C-6 and F-2 are being revised to reflect changes and will be sent to you soon. Bottom line - all OSHA recordables for Du Pont and non-Du Pont personnel will be reported to S&OH.

DUP 0918725

DU 032303

2
December 19, 1984
R. S. Kryzwicki, et al

For those of you with regional assignments, a system of form completion and submittal should be worked out between you and regional sites.

Initially, as with most change, some degree of confusion and misunderstanding may develop. Feel free to contact the Division Safety office for help.

CONSTRUCTION DIVISION

S. C. Weatherly
S. C. Weatherly
Division Safety Specialist

SCW:crl
Atch
corres.af9

DUP 0918726

DU 032304

J K L M

24

REV. 1957 SUP. BY

MATERIALS		THERMAL INSULATION	
MATERIAL SPECIFICATION		STANDARD ENGINEERING SPECIFICATION	
SERIES 100		ISSUED OCT 1954	SN 100 M
PREFORMED BLOCK AND PIPE		REVISED JULY 1956	Page 1 of 12
Code	101°	102°	103
Material	85% Magnesite	Calcium silicate	Diatomaceous earth
Material Description	Hydrated basic magnesium carbonate 80% by weight minimum	Staple, cellular, calcined fire clay base	Diatomaceous earth, asbestos fiber, with bonding clay and cementing materials
Filler	Asbestos or glass fiber		
Binder	Clay or other cementing materials 5% by weight		
Temp. Range	100°F to 500°F	100°F to 1200°F	500°F to 1800°F
K Factor	500°F - 0.55 max.	500°F - 0.54 max.	500°F - 0.77 max.
Density	11-14 lb. per cu. ft.	11 lb. per cu. ft.	24-27 lb. per cu. ft.
Compressive Strength			
Manufacturing Process	Machine molded or extru. Pipe mach. cut on diameter.	Machine extruded. Pipe mach. cut on diameter.	Machine molded. Pipe mach. cut on diameter.
Resistance to Breakage in Handling	Good	Good	Good
Dimensions	ASTM **	ASTM **	To Specification
Other Qualifications		Good mechanical strength with low shrinkage.	
The following materials have proven satisfactory in field tests and proof has been furnished by the manufacturers that their product meets the above specifications.			
* Bands are supplied at extra cost. Order must state "without bands" if not required. For 11" IPS and larger there is an additional charge for 2-oz. canvas cover. Material should be specified "without 2-oz. canvas" to avoid extra charge. ** New Simplified Dimensional System sponsored by ASTM	85% Mag. Philip Carey Mfg. Co.	Calcisite The Ruberoid Co.	High Temp. No. 19 Philip Carey Mfg. Co.
	Thermalite 85% Ehrer Mag. Mfg. Co., Inc.	Kaylo Owens-Illinois Glass Co.	Endura H-Temp. Ehrer Mag. Mfg. Co., Inc.
	85% Mag. Johns-Manville Sales Corp.	Caltherm Pabco Products, Inc.	J/M Superes Johns-Manville Sales Corp.
		Thermobestos Johns-Manville Sales Corp.	High Temp. Keasby & Mattison Co.
	Featherweight Keasby & Mattison Co.	Kaytherm Keasby & Mattison Co.	
	85% Mag. Mundet Cork Corp.	Tricalite Mundet Cork Corp.	
	Precision-molded Pabco Products, Inc.		
250		Vendors and merchandise designations are given to describe materials and may not include all acceptable products. Substitutions are to be made only on approval of the authority initiating the use of this Specification.	
SUBCOMMITTEE NO 15		DUP 0990688	

090274

DU 046508

SN 100 M		MATERIAL SPECIFICATION - SERIES 100		OCTOBER 1954	126
Page 2				Rev. July 1954	
Code		105	106		
Material		Asbestos molded	Asbestos and diatomaceous earth molded		
Material Description		Compressed fluffy asbestos sprayed with sodium silicate	Compressed fluffy asbestos sprayed with sodium silicate and diatomaceous earth sprinkled on the asbestos mat		
Filler					
Binder					
Temperature Range		100°F to 700°F	700°F to 1000°F		
K Factor		500°F - 0.56 max.	500°F - 0.58 max.		
Density		14 lbs. per cu. ft.	14 lbs. per cu. ft.		
Compressive Strength					
Manufacturing Process		Formed and comp. on man-drill. Pipe mach. cut on die.	Formed and comp. on man-drill. Pipe mach. cut on die.		
Resistance to Breakage in Handling		Good	Good		
Dimensions					
Other Qualifications		Formed on a mandril to a predetermined wt. Pressed to obtain the desired density, and baked.	Formed on a mandril to a predetermined wt. Pressed to obtain the desired density, and baked.		
The following materials have proven satisfactory in field tests and proof has been furnished by the manufacturers that their product meets the above specifications.					
		Unibestos 750	Unibestos 1200		
		Union Asbestos & Rubber Co.	Union Asbestos & Rubber Co.		
		Armabestos A7	Armabestos A12		
		Armstrong Cork Co.	Armstrong Cork Co.		
251					
					

REV. 11-1954
SUP. 11-1954

DUP 0990689

090275

DU 046509

HICKLIN

115

OCTOBER 1954

Rev. April 1956

MATERIAL SPECIFICATION - SERIES 100

SM 100 M

Page 3

Code	107	108	109
Material	Asbestos sponge		Corrugated asbestos preshrunk
Material Description	Asbestos sheets separated by finely ground sponged material bonded with adhesive strips.		Alternate layers of plain and corrugated asbestos sheets. Outer covering asbestos felt.
Filler			
Binder			
Temperature Range	100°F to 700°F		100°F to 400°F
K Factor	30°F - 0.60 max.		200°F - 0.58 max.
Density	10 lb. max.		
Compressive Strength			
Manufacturing Process	Laminated - 38 to 42 layers per in. of thick.		3-ply laminate
Resistance to Breakage in Handling	Very good		Good
Dimensions	To Specification		
Other Qualifications	Must be a flexible product		Preshrunk
The following materials have proven satisfactory in field tests and proof has been furnished by the manufacturers that their product meets the above specifications.			
* Aircell - 4-ply Excel - 6-ply Covocel - 8-ply	Asbestos Sponge Johns-Manville Sales Corp.		Preshrunk Asbestoscel Johns-Manville Sales Corp.
	Asbestos Sponge Philip Carey Mfg. Co.		Aircell * Philip Carey Mfg. Co.
	Sponge Felt The Ruberoid Co.		K & M - Aircell Keesby & Mattison Co.
	Sponge Felt Ehrer Mfg. Mfg. Co., Inc.		B-H Aircell Baldwin Mill Co.
	Sponge Felt Std. Asbestos Mfg. Co.		

252



DUP 0090690

090276

DU 046510

RFV DEC 1957 SUP. IV

H I 3 K L M N O F

SN 100 M		OCTOBER 1954	
Page 4		Rev. April 1954	
MATERIAL SPECIFICATION - SERIES 100			
Code	110	111	112
Material	Vegetable cork	Cellular glass	Glass fiber
Material Description	Vegetable cork, granulated and compressed into cork-board or molded forms, from material of vegetable origin for low and medium temperature insulation.	Cellular glass foamed and fused into unicellular form.	See codes 112.01 through 112.81
Filler			
Binder	Natural resin in cork		
Temperature Range	-200°F to 100°F	-200°F to 100°F (+300°F for dual temp.)	
K Factor	100°F - 0.29 max.	100°F - 0.43 max.	
Density		10 - 11 lb. per cu. ft.	
Compressive Strength	15 lb. per sq. in. min.	35 lb. per sq. in. min.	
Manufacturing Process	Machine comp. or molded. Baked at moderate temp.		
Resistance to Breakage in Handling	Good		
Dimensions			
Other Qualifications	Pipe covering shall be coated on the outside with heavy mastic		
The following materials have proven satisfactory in field tests and proof has been furnished by the manufacturers that their product meets the above specifications.			
	Cork Armstrong Cork Co.	Foamglas Pittsburgh Corning Corp.	
	Cork Mundet Cork Co.		

253



120

DUP 0990691

090277

DU 046511

219

OCTOBER 1954

MATERIAL SPECIFICATION - SERIES 100

SM 100 M

Rev. Sept. 1956

Page 5

Code	112.01	112.02	
Material	Glass fiber	Glass fiber	
Material Description	Textile type fine glass fiber pipe insulation, plain, with medium-temperature binder.	Textile type fine glass fiber pipe insulation, plain, with high-temperature binder.	
Filler			
Binder	*Phenol-formaldehyde or **Di-Cy	Di-Cy	
Temperature Range	80°F to 350°F	80°F to 350°F	
K Factor	100°F - 0.25	100°F - 0.25	
Density	3" and 6" lb. per cu. ft.	6 lb. per cu. ft.	
Compressive Strength			
Manufacturing Process	Machine molded	Machine molded	
Resistance to Breakage in Handling	Very good	Very good	
Dimensions			
Other Qualifications	Specify whether for iron pipe or copper tubing	Specify whether for iron pipe or copper tubing	

The following materials have proven satisfactory in field tests and proof has been furnished by the manufacturers that their product meets the above specifications.

	*Ultrafine Snap-on Gustin-Bacon Mfg. Co.	Fiberglas PF Pipe Insu. Owens-Corning Corp.	
	*Monocover Baldwin-Hill	Armoglas PF Pipe Insu. Armstrong Cork Co.	
	*Thermoglas Philip Cary Mfg. Co.		
	**Fiberglas PF Pipe Insu. Owens-Corning Corp.		
	**Armoglas PF Pipe Insu. Armstrong Cork Co.		

254



DUP 0990692

090278

DU 046512

SN 100 M		OCTOBER 1954	
Page 6		Rev. Sept. 1954	
MATERIAL SPECIFICATION - SERIES 100			
Code	112.11	112.12	
Material	Glass fiber	Glass fiber	
Material Description	Textile type fine glass fiber banded pipe insulation with 30-lb. factory-applied roofing felt finish. Sizes 6" OD insulation and below.	Textile type fine glass fiber banded pipe insulation with 45-lb. factory-applied roofing felt finish. Sizes over 6" OD insulation.	
Filler			
Binder	*Phenol-formaldehyde or **Di-Cy	*Phenol-formaldehyde or **Di-Cy	
Temperature Range	80°F to 350°F	80°F to 350°F	
K Factor	100°F - 0.25	100°F - 0.25	
Density	3" and 6" lb. per cu. ft.	3" and 6" lb. per cu. ft.	
Compressive Strength			
Manufacturing Process	Machine molded	Machine molded	
Resistance to Breakage in Handling	Very good	Very good	
Dimensions			
Other Qualifications	Specify whether for iron pipe or copper tubing 30 lb. felt used up to 6" OD of insulation	Specify whether for iron pipe or copper tubing 45 lb. felt used where OD of insulation is 6" or greater	
The following materials have proven satisfactory in field tests and proof has been furnished by the manufacturers that their product meets the above specifications.			
	*Ultrafine Snap-on Gustin-Bacon Mfg. Co.	*Ultrafine Snap-on Gustin-Bacon Mfg. Co.	
	*Monocover Baldwin-Hill	*Monocover Baldwin-Hill	
	*Thermoglas Philip Carey Mfg. Co.	*Thermoglas Philip Carey Mfg. Co.	
	**Fiberglas PF Pipe Insu. Owens-Corning Corp.	**Fiberglas PF Pipe Insu. Owens-Corning Corp.	
	**Armoglas PF Pipe Insu. Armstrong Cork Co.	**Armoglas PF Pipe Insu. Armstrong Cork Co.	
255			

220

REV. NOV. 1954 SUP. BY

DUP 0990693

090279

DU 046513

119

OCTOBER 1954

MATERIAL SPECIFICATION - SERIES 100

SN 100 M

Rev. April 1954

Page 7

Code	112.16	112.17	
Material	Glass fiber	Glass fiber	
Material Description	Textile type fine glass fiber banded pipe insulation with 4-oz. factory-applied canvas finish.	Textile type fine glass fiber banded pipe insulation with 8-oz. factory-applied canvas finish.	
Filler			
Binder	*Phenol-formaldehyde or **Di-Cy	*Phenol-formaldehyde or **Di-Cy	
Temperature Range	80°F to 300°F	80°F to 300°F	
K Factor	100°F - 0.25	100°F - 0.25	
Density	3" and 6" lb. per cu. ft.	3" and 6" lb. per cu. ft.	
Compressive Strength			
Manufacturing Process	Machine molded	Machine molded	
Resistance to Breakage in Handling	Very good	Very good	
Dimensions			
Other Qualifications	Specify whether for iron pipe or copper tubing	Specify whether for iron pipe or copper tubing	
The following materials have proven satisfactory in field tests and proof has been furnished by the manufacturers that their product meets the above specifications.			
	*Ultrafine Snap-on Gustin-Bacon Mfg. Co.	*Ultrafine Snap-on Gustin-Bacon Mfg. Co.	
	*Monocover Baldwin-Hill	*Monocover Baldwin-Hill	
	*Thermoglas Philip Carey Mfg. Co.	*Thermoglas Philip Carey Mfg. Co.	
	**Fiberglas PF Pipe Insu. Owens-Corning Corp.	**Fiberglas PF Pipe Insu. Owens-Corning Corp.	
	**Armoglas PF Pipe Insu. Armstrong Cork Co.	**Armoglas PF Pipe Insu. Armstrong Cork Co.	
256			

DUP 0990694

090280

DU 046514

SN 100 M

Page 8

MATERIAL SPECIFICATION - SERIES 100

OCTOBER 1954

Rev. April 1954

Code	112.21	112.22	
Material	Glass fiber	Glass fiber	
Material Description	Textile type fine glass fiber bonded pipe insulation with black factory-applied aluminum laminate vapor-barrier finish.	Textile type fine glass fiber bonded pipe insulation with white factory-applied aluminum laminate vapor-barrier finish.	
Filler			
Binder	*Phenol-formaldehyde or **Di-Cy	*Phenol-formaldehyde or **Di-Cy	
Temperature Range	40°F to 200°F	40°F to 200°F	
K Factor	100°F - 0.25	100°F - 0.25	
Density	3" and 6" lb. per cu. ft.	3" and 6" lb. per cu. ft.	
Compressive Strength			
Manufacturing Process	Machine molded	Machine molded	
Resistance to Breakage in Handling	Very good	Very good	
Dimensions			
Other Qualifications	Specify whether for iron pipe or copper tubing	Specify whether for iron pipe or copper tubing	
The following materials have proven satisfactory in field tests and proof has been furnished by the manufacturers that their product meets the above specifications.			
	*Ultrafine Snap-on Gustin-Bacon Mfg. Co.	*Ultrafine Snap-on Gustin-Bacon Mfg. Co.	
	*Monocover Baldwin-Hill	*Monocover Baldwin-Hill	
	*Thermoglas Philip Carey Mfg. Co.	*Thermoglas Philip Carey Mfg. Co.	
	**Fiberglas PF Pipe Insu. Owens-Corning Corp.	**Fiberglas PF Pipe Insu. Owens-Corning Corp.	
	**Armoglas PF Pipe Insu. Armstrong Cork Co.	**Armoglas PF Pipe Insu. Armstrong Cork Co.	

257

120

REV. NOV 1956 SUP. BY

DUP 0990695

090281

DU 046515

OCTOBER 1954

MATERIAL SPECIFICATION - SERIES 100

SM 100 M

Rev. April 1956

Page 9

Code	112.61		112.66
Material	Glass fiber		Glass fiber
Material Description	Textile type fine glass fiber bonded board insulation.		Textile type fine glass fiber insulation cut to logging sizes and sanded on one side to form insulation blocks.
Filler			
Binder	Phenol-formaldehyde		Phenol-formaldehyde
Temperature Range	40°F to 350°F		40°F to 350°F
K Factor	100°F - 0.25 to 0.30		100°F - 0.25
Density	2 1/2 to 9 lb. per cu. ft.*		9 lb. per cu. ft.
Compressive Strength			
Manufacturing Process	Machine molded		Machine molded
Resistance to Breakage in Handling	Very good		Very good
Dimensions	Std. 24" x 48"		Length - 36" Width - 6" or 12"
Other Qualifications			

The following materials have proven satisfactory in field tests and proof has been furnished by the manufacturers that their product meets the above specifications.

*Density must be specified.	Fiberglas PF Insulation Owens-Corning Corp.		Fiberglas PF 600 Insulation Owens-Corning Corp.
	Armoglas PF Insulation Armstrong Cork Co.		Armoglas PF 600 Insulation Armstrong Cork Co.

DUP 0990696

258



090282

DU 046516

H I J K L M N O P Q

SN 100 M		OCTOBER 1954	
Page 10		Rev. April 1956	
MATERIAL SPECIFICATION - SERIES 100			
Code	112.71		112.81
Material	Glass fiber		Glass fiber
Material Description	Textile type fine glass fiber bonded board insulation with asphalt and kraft paper vapor-barrier finish.		Textile type fine glass fiber bonded acoustical board with fire-resistant coating.
Filler			
Binder	Phenol-formaldehyde		Phenol-formaldehyde
Temperature Range	40°F to 150°F		40°F to 150°F
K Factor	100°F - 0.26		100°F - 0.26
Density	6 lb. per cu. ft.		6 lb. per cu. ft.
Compressive Strength			
Manufacturing Process	Machine molded		Machine molded
Resistance to Breakage in Handling	Very good		Very good
Dimensions	24" x 48" boards 3/4" to 2" thickness		24" x 48" boards 3/8" to 2" thickness
Other Qualifications			Neoprene coating on side of board exposed to air flow
The following materials have proven satisfactory in field tests and proof has been furnished by the manufacturers that their product meets the above specifications.			
	Fiberglas Vapor Seal Duct Insu. Owens-Corning Corp.		Fiberglas Coated Duct Insu. Owens-Corning Corp.
	Armoglas Vapor Seal Duct Insu. Armstrong Cork Co.		Armoglas Coated Duct Insu. Armstrong Cork Co.

259



DUP 0990697

090283

DU 046517

DUP 0990698

15 K L M N =

SN 100 M		OCTOBER 1954	
Page 12		Rev. June 1956	
MATERIAL SPECIFICATION - SERIES 100			
Code			116
Material			Flexible foamed plastic
Material Description			Flexible aerated resin with a closed cellular structure. Pipe and tubing only.
Filler			
Binder			
Temperature Range			32°F to 200°F
K Factor			0.28 at 75°F
Density			
Compressive Strength			
Manufacturing Process			Medium molded
Resistance to breakage in handling			Nonbreakable
Dimensions			
Other Qualifications			Chemically inert and nontoxic
The following materials have proven satisfactory in field tests and proof has been furnished by the manufacturers that their product meets the above specifications.			
			Armaflex Armstrong Cork Co.

B8

DUP 0990699

261



090285

DU 046519



E. I. DU PONT DE NEMOURS & COMPANY
INCORPORATED

WILMINGTON, DELAWARE 19898
CENTRAL RESEARCH & DEVELOPMENT DEPARTMENT

HASKELL LABORATORY
FOR
TOXICOLOGY AND INDUSTRIAL MEDICINE

cc: C. F. Reinhardt/B. C. McKusick
P. G. Gilby - C&P - B-16235
L. F. Percival - PPD - Montchanin
J. R. Martin - ER - BOD 1442

RECEIVED

MAR 13 1981

ENVIRONMENTAL AFFAIRS
PEPPER CHEMICALS UNIT

March 12, 1981

DEPARTMENTAL OSH COORDINATORS

FIT TESTING OF DISPOSABLE/SINGLE-USE RESPIRATORS

OSHA's recent Directive CPL-2-2.29 provided guidelines for enforcing the fit testing requirements of OSHA's Respiratory Standard 29 CFR 1910.134(e)(5). The directive particularly emphasized the need for enforcement of the fit testing of single-use/disposable respirators.

Haskell Laboratory has examined several methods, including Zinc Stearate dusts and aerosolized sweeteners, for fit testing single-use respirators. Currently, the 3M test method utilizing aerosolized saccharin is the only effective system. Standard operating procedures for this method are enclosed.

Although controversy exists over the use of saccharin in food, the FDA does allow its use for valid dietary reasons and technological purposes other than calorie reduction. Under the conditions of the fit test, exposure levels are very low compared to normal dietary levels. For example, a single fit test will result in exposure to less than 1-2% of the saccharin in a diet soda or a piece of sugar-free gum. These considerations, along with limited acute human inhalation experiments, indicate that the hazard potential is low for this test.

Haskell is continuing to search for alternative test agents and will keep you informed of progress; however, in the meantime, should an employee object to the use of saccharin he could be given a half-mask respirator and fit tested by the isoamyl acetate semi-quantitative method.

ORRIN T. SKRETVEDT
CONSULTANT - INDUSTRIAL
HYGIENE

DU 1001501

OTS/dar
Enclosure

DU 050253

STANDARD OPERATING PROCEDURE
SACCHARIN FIT TEST
SINGLE USE/DISPOSABLE RESPIRATORS

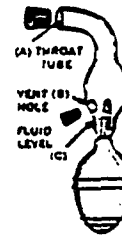
PURPOSE

The following method is recommended for meeting the requirements of 29 CFR 1910.134 (e)(5) concerning the fit testing of single use/disposable dust, mist, or fume respirators. The method has been tested and found to be suitable for assuring an adequate fit for this type of respirator.

MATERIALS

Glass Nebulizer

The DeVilbiss Company manufactures a Glass Nebulizer #40 used for aerosol therapy. The unit costs \$15 and is available at most drug stores.



Saccharin

Sodium saccharin granular, unsized can be ordered from Sherwin-Williams Chemicals, P.O. Box 6506, Cleveland, Ohio, 44101; Attention: Kim Novak, \$4.95/lb.

PREPARATION

1. **Preparing the Test Solution**

Locate an approximate 100 ml bottle with screw cap - eyedropper combination. Dissolve 120 grams of saccharin for each 100 ml of water. This will produce a saturated solution of saccharin. To dissolve the saccharin place the bottle in warm water ($\sim 120^{\circ}\text{F}$) and agitate to bring most of the material into solution. If large amounts of saccharin should ever crystalize out, the solution should be warmed to increase the solubility.

DUP 1001502

DU 050254

2. Preparing the Nebulizer

Remove the large rubber stopper, holding the nebulizer in an upright position, insert the test solution into the nebulizer using the eye dropper. The test solution should be about one half inch above the rubber squeeze bulb. Reinsert rubber stopper until ready to test. The small rubber stopper should be left in place. Additional operating instructions are located on the packaging carton that comes with the nebulizer.

3. The fit test should be conducted in an area having adequate ventilation, preferably about three feet in front of a hood. With the test subject's eyes closed check his sensitivity to saccharin by gently directing an aspirated cloud of the solution towards his open mouth. Keep exposure as low as possible during this pre-test as a light exposure is all that is needed. If the subject is unable to detect the sweet taste of saccharin, a disposable respirator should not be used.
4. Have the test subject don and position the respirator, adjusting the nose bridge if one is present. Follow the manufacturer's donning instructions.

TEST PROCEDURE

1. Instruct the person to close his eyes and breathe through his mouth while taking regular deep breaths. Breathing through the mouth is essential because a leak will be detected by taste not smell.
2. Visually divide the respirator perimeter into quadrants. Holding the nebulizer four inches from the face, check the face seal in each quadrant by squeezing the bulb slowly twice, while moving back and forth along the respirator perimeter. See Figure 1. Be certain the subject takes a deep breath (full inspiration during one second) as you test each quadrant. Test each quadrant sequentially making two full revolutions.
3. With a proper fit the subject will not sense any change in taste. If the face seal is not adequate, a very sweet taste will be noted.

DUP 1001503

4. If the subject has received adequate training on the donning of single use respirators and did not pass this test, another make or model of respirator should be issued.
5. After testing, reinsert the large stopper in the nebulizer to prevent clogging. A visible vapor cloud should be seen when the bulb is squeezed. If not, check the aspiration siphon inside the nebulizer to be certain saccharin crystals have not plugged the siphon.
6. When testing is completed, pour the remaining solution back into the bottle. Rinse the nebulizer thoroughly with warm water, drain, insert stopper, and store in a dry, clean place.

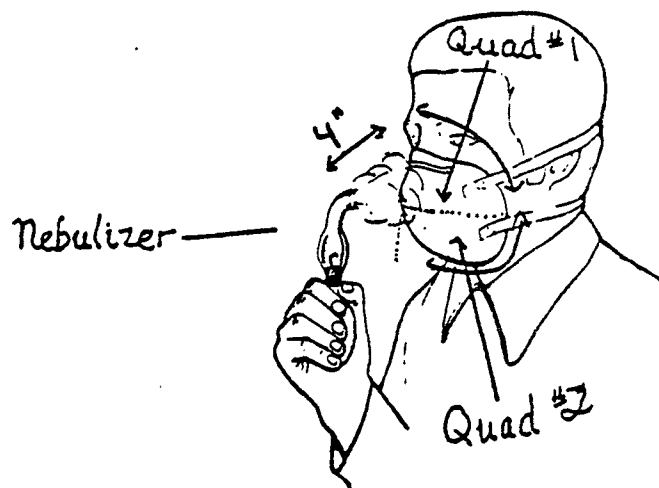


FIGURE 1

OTS/dar
2/18/81