ENGLISH – USER INSTRUCTIONS

MOLDEX — Ideas that wear well.

PPE FREE ZERO DEFECT

9000 Series Respirator User Instruction Manual

IMPORTANT NOTICE TO USERS

You are responsible to understand and follow all warnings, restrictions and other information contained in this instruction manual before you enter a contaminated work area. Failure to do so may result in sickness or death.

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9000-710 REV I 07/11

LIST OF PARTS FOR 9000
9001 – Small 9002 – Medium 9003 – Large

Part #	Description
0073-1	Inhale Diaphragm
0073-2	Exhale Diaphragm
0074	Cartridge Retainer Gasket
0092	Head Harness
0094	Nose Cup M/L
0095	Nose Cup S

LISTE DES PIÈCES POUR LE 9000
9001-Petit 9002-Moyen 9003-Grand

Pièce#	Description
0073-1	Diaphragme inhalation
0073-2	Diaphragme expiration
0074	Joint d'Étanchéité
0092	Harnais de Tête
0094	Demi-masque intérieur M/L
0095	Demi-masque intérieur S

LISTA DE PARTES PARA MODELO 9000
9001-Pequeño 9002-Mediano 9003-Grande

Parte#	Descripción
0073-1	Diafragma de inhalación
0073-2	Diafragma de exhalación
0074	Cartucho Retenedor de Junta
0092	Arnés de la Cabeza
0094	Copa Nasal M/G
0095	Copa Nasal S

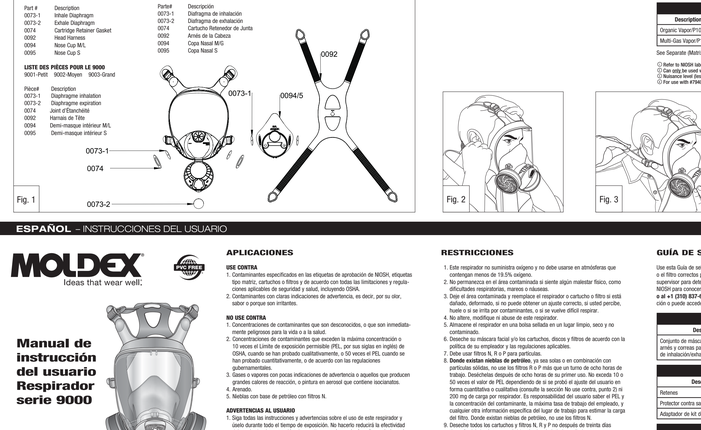

Fig. 1 Fig. 2 Fig. 3 Fig. 4 Fig. 5 Fig. 6 Fig. 7 Fig. 8 Fig. 9 Fig. 10 Fig. 11 Fig. 12 Fig. 13 Fig. 14

APPLICATIONS

USE AGAINST

1. Contaminants specified on NIOSH approval label, matrix, cartridges or filters and in accordance with all limitations and applicable safety and health regulations, including OSHA.
2. Contaminants with good warning properties, i.e., smell, taste or irritation.

DO NOT USE AGAINST

1. Concentrations of contaminants which are unknown, or are immediately dangerous to life or health.
2. Concentrations of contaminants which exceed the maximum use concentration or 10X the OSHA Permissible Exposure Limit, (PEL), when qualitatively fit tested, or 50X the PEL when quantitatively fit tested, or according to applicable government regulations.
3. Gases or vapors with poor warning properties or those which generate high heats of reaction, or paint sprays containing isocyanates.
4. Sandblasting.
5. Oil-based mists with N filters.

WARNINGS TO USER

1. Follow all instructions and warnings on the use of this respirator and wear during all times of exposure. Failure to do so will reduce respirator effectiveness, wearer protection, and **may result in sickness or death**.
2. For proper use, ask your supervisor or call **+ (310) 837-6500 ext. 512/550 or + (800) 421-0668 or + (310) 837-6500, ext. 512/550.**
3. The user must first be trained by the employer in proper respirator use, in accordance with applicable safety and health standards, for the contaminant and exposure level in the assigned work area. Respirator Fit Testing Program must be in place and followed by each user before first use. It must meet all requirements of all applicable standards, including OSHA 29 CFR 1910.134, and in Canada CSA Z 94.4, e.g. training, fit testing, medical evaluation, and applicable OSHA standards, etc.
4. The vapors, gases, dusts, mists, fumes, and other contaminants which can be dangerous to your health include those which are cancer causing, toxic, or smell, taste, or irritate.
5. Check with your supervisor for the appropriate cartridges and/or filters for the contaminants in your work area.
6. A qualitative fit test for up to 10X PEL, or quantitative fit test, for up to 50X PEL, must be performed before a respirator is assigned. Refer to current OSHA 29 CFR 1910.134 (f).

RESTRICTIONS

1. This respirator does not supply oxygen and must not be used in atmospheres containing less than 19.5% oxygen.
2. Do not remain in contaminated area if any physical distress occurs, for example, dizziness or nausea.
3. Leave contaminated area and replace respirator and/or cartridge or filter if it is damaged, distorted, a proper fit cannot be obtained, you taste, smell or become irritated by contaminants, or breathing becomes difficult.
4. Do not alter, modify, or abuse this respirator.
5. Store respirator in sealed bag in a clean, dry, non-contaminated area.
6. Dispose of facepiece, and/or cartridges and disks/filters according to your employer's policy and applicable regulations.
7. N, R or P filters are required for oil aerosols.
8. **Where oil mists are present**, either alone or in combination with solid particulates, do not use the R or P filters for longer than one eight-hour work shift. Dispose no later than eight hours after first use. Do not exceed 10X or 50X PEL depending on whether the user is qualitatively or quantitatively fit tested (see Do Not Use Against, Item 2) or 200 mg loading per respirator. It is the user's responsibility to know the PEL and concentration of the contaminant, the maximum work rate of the employee, and any other work site-specific information to calculate the loading of the filter. Where oil mists are present do not use N filters.
9. Dispose of all cartridges and N, R and P filters no later than thirty days after so first use, and/or its removing from sealed bag.
10. Use cartridges, filters, and facepieces before the "use by" expiration date printed on box or bag.

NIOSH CAUTIONS AND LIMITATIONS

The following restrictions may apply. See NIOSH Approval Label.

A. Not for use in atmospheres containing less than 19.5% oxygen.
B. Not for use in atmospheres immediately dangerous to life or health (IDLH).
C. Do not exceed maximum use concentrations established by regulatory standards.
H. Follow established cartridge change schedules to ensure that cartridges are replaced before breakthrough occurs.
J. Failure to properly use and maintain this product could result in injury or death.
L. Follow the manufacturer's instructions for the proper use of cartridges and/or filters.
M. All approved respirators shall be selected, fitted, used, and maintained in accordance with MSHA, OSHA, and other applicable regulations.
N. Never substitute, modify, add, or omit parts or components of respirator parts in the configuration as specified by the manufacturer.
O. Read all instructions, and/or maintenance manuals for information on use and maintenance of these respirators.
P. NIOSH does not evaluate respirators for use as surgical masks.
S. Special or critical User's Instructions and/or specific use limitations apply. Refer to User's Instructions before donning.

TECHNICAL SERVICE LINE

Moldex maintains a toll-free Technical Service Line to answer questions about the use of Moldex respirators, contaminants and regulations. If you have any questions please call Technical Service at **+1 (800) 421-0668 or +1 (310) 837-6500, ext. 512/550** FAX: **+1 (310) 837-9563** or **e-mail: tech@moldex.com.**

SELECTION GUIDE

Use this Selection Guide to help you select the correct respirator and/or cartridges or filters for the contaminant in your work area. Check with your supervisor to determine if you have the correct protection. Refer to the NIOSH label for approval limitations. Call **+1 (800) 421-0668 or +1 (310) 837-6500, ext. 512/550** for a copy of the selection guide or you may access via website at www.moldex.com.

FACEPIECE ONLY		
Description	Model#	Size
Facepiece Assembly Including Head Strap Harness and Inhale/Exhale Diaphragms and Nosecup	9001	S
	9002	M
	9003	L

RETAINERS/ADAPTERS	
Description	Model #
Retainer	7020
Splash/Sparks Protector②	7999
Piggyback Adaptor	7920

REPLACEMENT CARTRIDGES		
Description①	Model #	Approval
Organic Vapor	7100	TC-23C-2514
Acid Gases	7200	TC-23C-2515
Organic Vapors/Acid Gases	7300	TC-23C-2516
Ammonia/Methylamine	7400	TC-23C-2517
Formaldehyde	7500	TC-23C-2518
Multi-Gas/Vapor Smart® Cartridge	7600	TC-23C-2513
P100 Particulates	7990	TC-84A-5197

DISK/FILTER SERIES		
Description②	Model #	Approval
N95 Particulates	8910③	Multiple
Particules R95	8970③	Multiple
Particules P100	7940	TC-84A-5251
Particules P100 Max Molestop O.V.(A.C)③	7950③	TC-84A-6814
Particules P100 mâle Molestop O.V.(A.C)③	7960③	TC-84A-5198

PARTES DE REEMPLAZO DEL MODELO SERIE 9000	
Descripción	Modelo #
Conjunto de correas para la cabeza	0092
Juego de diafragma de reemplazo	0073
Juntas de reemplazo	0074
Protectores de cartela facial	0093
Copa nasal M/G	0094
Copa nasal P	0095
Juego para arnejos	0098

COMBO APILADOS CARTUCHOS		
Descripción①	Modelo #	Aprobación
Vapor Orgánico/P100	7140	TC-84A-5237
Multi Gas Vapor/P100	7640	TC-84A-5233

Consulte las aprobaciones 42 CFR 84 de NIOSH en la etiqueta separada (tipo matriz)

① Consulte la etiqueta NIOSH para conocer las limitaciones de la aprobación.
② Protector contra salpicaduras/chispas únicamente.
③ Nuevaso O.A. (menos que PEL de OSHA)
① Para uso con los modelos #7040, #7050 y #7060 solamente, contra salpicaduras y chispas.

PRE-INSPECTION

Inspect your respirator before and after each wearing. Do not wear, and return to your supervisor if:

1. Head harness is torn, cut, or damaged in any way.
2. Buckles or flanged tabs are broken, missing or bent beyond repair or comfort.
3. Facepiece is cracked, torn, distorted, dirty, or has holes.
4. Inhalation/Exhalation diaphragms and/or gaskets are missing, torn, damaged, or not properly seated.
5. Cartridges are at the end of their service life, cracked, damaged, or not properly seated.
6. Any other plastic or rubber part is cracked, distorted, or damaged.

FITTING INSTRUCTIONS

1. Users must follow instructions each time respirator is worn.
2. OSHA regulation 29 CFR 1910.134 (f) requires that the user be fit tested.
3. Do not wear with any facial hair, such as beards, or any other facial features that will prevent a proper fit.
4. If you cannot obtain a proper fit, do not enter the contaminated area and see your supervisor.

DONNING – PUTTING ON

1. Grab lower lengths of head harness with each hand, just above each adjustment buckle, and while positioning chin in flange, pull harness over the head. **(Fig. 2)**
2. Push facepiece onto face and chin with one hand and position for most comfortable and secure seal while pulling and tightening neck tab of harness with other hand. Repeat for other neck tab. For easiest, most secure and best fit always adjust neck harness tabs first before tightening top harness tabs. **(Fig. 3)**
3. All four harness tabs must be adjusted so that the pressure of the face seal on the face is distributed evenly. Head harness must lay flat on head. Adjust both lower and top harness tabs evenly for most comfortable and leak-tight fit of the face flange.

DOFFING – TAKING OFF

To take off, first pull lower/neck harness tabs away from face to loosen harness straps, then pull chin area away and upwards from face. **(Fig. 4)**

FIT TESTS

A qualitative fit test for up to 10x PEL, or quantitative, for up to 50x PEL must be performed before a respirator is assigned. Refer to current OSHA 29 CFR 1910.134 (f). Qualitative fit testing can be performed using the Moldex BITREX® fit test kit with appropriate cartridges or filters. Quantitative fit testing can be performed with probed cartridge kit. **Call + (800) 421-0668 or +1 (310) 837-6500, ext. 512/550 for a copy of the selection guide or you may access via website at www.moldex.com.**

USER SEAL CHECK

Perform both negative and positive seal checks each time you enter a contaminated area.

NOTE: Do not perform user seal check with the #7990 Splash/Spark Protector in place.

Negative Pressure Seal Check: Cover both cartridges and gently inhale and hold your breath. The facepiece should slightly collapse. If air leakage is detected, re-adjust the position of the facepiece and increase tension of head harness and repeat the seal check until a leak-tight seal is eliminated. **(Fig. 5)**

Positive Pressure Seal Check: Cover the exhalation valve vent and exhale gently to create a slight positive pressure. If air leakage is detected, re-adjust the position of the facepiece and increase tension of head harness and repeat the seal check until leakage is eliminated. **(Fig. 6)**

WARNINGS: If you cannot obtain a proper fit, do not enter the contaminated area and see your supervisor.

Said check your respirator each time you enter and periodically while wearing the respirator in the contaminated area.

It is the responsibility of the Safety Director or your supervisor to assist you in determining how tight the 9000 Series respirator should be on the users face. Prior to and during use the user is the best responsibility to determine how tight the respirator should be and when it needs to be adjusted to always maintain a proper seal. Do not over or under tighten as either may cause leakage and reduce protection.

CARTRIDGES

CHEMICAL CARTRIDGE SERVICE LIFE

Leave contaminated area, and replace cartridges, if you smell, taste, or feel any irritation, in your mouth or nose, or if you feel dizzy or nauseous. Consult your supervisor for change out schedule per OSHA 1910.134, or on more than eight hours after first use, or sooner if breakthrough occurs.

CARTRIDGE/FILTER DISK ASSEMBLY

First inspect the facepiece, cartridge or filter disk sealing surfaces to make sure it is clean and undamaged. Check to see that cartridge retainer gasket is in place and is clean and undamaged. **(FIG. 7) DO NOT ATTACH CARTRIDGE OR FILTER DISK WITHOUT A GASKET. SEE YOUR SUPERVISOR.** Only use cartridges or filter disks from sealed bags. To attach the cartridge or filter disk to the facepiece, align the three cartridge or filter disk notches with the three bayonets protruding from the facepiece and firmly turn clockwise until the cartridge or filter disk is locked into position and is unable to turn any further. **(Fig. 8)** Check to see that it is sealed and flush against the facepiece gasket. Then check the inhalation diaphragms for dirt and/or damage and see that they are seated properly.

CHANGE OUT SCHEDULES

OSHA 1910.134 (d) requires that the employer implement a change out schedule for cartridges based on objective data that ensures that they will ensure cartridges are changed before the end of their service life (see OSHA 1910.134 for complete details). A, cartridge change out schedule is how long it provides adequate protection from harmful chemicals in the air. The service life of a cartridge depends on many factors, including environmental conditions, breathing rate, cartridge filtering capacity and the amount of contaminants in the air.

If you know what the chemical is and how much of it you are exposed to, then you are ready to estimate how long your respirator cartridges will work and apply the safety factor.

You must use some type of objective data to develop a change out schedule. Options for determining a cartridge's service life include:

1. Conducting experiments tests.
2. Using a mathematical model **https://www.osha.gov/SLTC/etools/respirators/index.html**

OSHA has on its website other means of calculating breakthrough times for various chemicals. You may also wish to consider use of this website in developing your change out schedules. Be advised that actual service life can vary considerably from those calculated using these models. These models provide rough estimates. Some of the data you will need specific to the Moldex cartridges in order to use the models on the OSHA website are:

- #7100 has an adsorbing equivalent of 42.5 grams Organic Vapor Carbon, its height is 2.06 cm, inside diameter is 7.81 cm.
- #7600 has an adsorbing equivalent of 36.0 grams Organic Vapor Carbon, it's height is 2.06 cm, inside diameter is 7.81 cm.
- A change out schedule worksheet is provided.

CARTRIDGE DETAILS

READ THIS WARNING

These weights were estimated by Miller-Nelson using methods based on their tests. It is suggested that you use similar methods provided by OSHA for the other cartridge specific weights. Call Moldex, if you need help. For OSHA models to be used you may have to provide other pertinent data on the challenge agent which may be found on the MSDS or from the chemical manufacturer. These models can be found at **https://www.osha.gov/SLTC/etools/respirators/index.html**.

Moldex suggests that you use the OSHA models, or other means provided by Moldex. Moldex always recommends that you utilize the most conservative (shortest) breakthrough times. For more detailed information on these methods, refer to OSHA's website at: **https://www.osha.gov/SLTC/etools/respirators/index.html**

If you have any questions please call + (800) 421-0668 or +1 (310) 837-6500, ext. 512/550 or +1 (800) 421-0668 or +1 (310) 837-6500, ext. 512/550.

FILTER DISKS

FILTER DISK/PIGGYBACK ADAPTER/CARTRIDGE ASSEMBLY (Fig. 10)

Before assembling filter disk to the piggyback adapter (#7920), inspect the sealing surface, to make sure it is clean and undamaged and the gasket is in place. **(Fig. 9)** Push the piggyback adapter onto the cartridge until it snaps into place all around the cartridge. First check that the cartridge retainer gasket is in place and undamaged, then attach the cartridge to the facepiece, align the three cartridge notches with the three bayonets protruding from the facepiece and firmly turn clockwise until the cartridge is locked into position and is unable to turn any further. Check to see that it is sealed properly, both on the inside and outside and flush against the facepiece. Insert filter into the inside and outside dish flush against the gasket and press the filter disk into place. **(Fig. 11)** Check to see that filters are properly seated then push the retainer onto the cartridge until it snaps into place. Check the inhalation and exhalation diaphragms for dirt or damage and see that they are properly seated.

FILTER REPLACEMENT

To remove the old filter, gently pull off the filter retainer. Remove the old filter and place a new filter inside the retainer so that the side indicated is away from face. Inspect cartridge lid to be sure it is clean and undamaged. Replace the retainer.

Warning: Use the #7020 filter retainer with the #8910 or #8970 filters only.
Failure to do so may result in sickness or death.

MAINTENANCE

FACEPIECE SERVICE LIFE

The effective life of the facepiece will be influenced by the use conditions and contaminants to which it is exposed. This includes concentration of the contaminants (e.g. ketones and aromatic solvents will increase the rate of deterioration), duration of exposure, ambient temperature, etc. Do not use solvents to wipe or clean the facepiece as these will reduce the life of the respirator and pose a health hazard to the user. If the material shows any signs of cracking, wrinkling, or aging, then discard the facepiece immediately. Do not expose to high ambient temperatures (above 160° F) as this will distort the facepiece, and may affect fit.

CLEANING FACEPIECE ASSEMBLY

Cleaning is recommended after each day's use or more frequently if necessary. Remove all filters, cartridges, gaskets, inhalation & exhalation diaphragms, and head harness and nose cup from the facepiece. Gently scrub the facepiece with a soft brush in a mild germicidal detergent solution, rinse with clean water and air dry. **DO NOT CLEAN WITH SOLVENTS OR EXPOSE TO HIGH TEMPERATURES.** Inspect components and reassemble. Replace if worn, damaged or deformed.

INHALATION & EXHALATION DIAPHRAGMS INSPECTION/CLEANING

Two inhale diaphragms are located inside the nose cup and two for each of the cartridge retainers. The exhale diaphragm is located under the valve cover. Open the valve cover by pulling on the latch then remove the diaphragm. Clean and check the diaphragms for dirt, leaks, distortion, or any other damage. After washing and/or inspection, replace all five diaphragms and check to see that they are properly seated.

Caution: Do not twist the exhale cover. Twisting may result in separation from the exhale assembly. Do not use this facepiece without the exhale cover in place.

REPLACEMENT PARTS

Use only Moldex replacement parts for Moldex respirators.

WARNING

When cleaning or sanitizing a respirator that has accumulated hazardous contaminants, the person doing the cleaning must wear the respiratory protection required to assure they will be protected from inhaling any hazardous contaminants on masks being cleaned. Caution should be exercised to assure such contaminants are not spread into respirator, and that hazardous contaminants, when removed from the respirator, are properly disposed of. Failure to take these precautions could result in sickness or death, depending upon the contaminant. Check with your safety supervisor for the proper and approved procedure and comply with all applicable workplace safety regulations including any substance specific standards.

STORAGE

CAUTION: When not in use or during storage, do not expose respirator to excessive heat (above 135° F/57° C) or sunlight. Do not place respirator in trunk of a car or in any other manner that may also distort the facepiece, may prevent a proper fit and expose you to the risk of sickness or death.

REPLACEMENT PARTS & INSTRUCTIONS

USE ONLY MOLDEX REPLACEMENT PARTS FOR MOLDEX RESPIRATORS.

Nose Cup #0094/0095 – (Fig. 14)

- Remove by pulling away from center and over the two locating stud heads, inside facepiece.
- Replace by pushing over two locating stud heads in center and ensuring perimeter of cup fits over outer locating ring. Nose cup inhale diaphragms must be present and properly in place.

Inhale Diaphragms #0073-1

- Pull off, or push onto center and under three lug retainer head and seat properly. There are two located on nose cup and two on cartridge retainers.

Exhale Diaphragm #0073-2 – (Fig. 13)

- Open the exhale cover, pull out old diaphragm and discard.
- Insert new diaphragm by pushing locator pin into center hole.
- Ensure locator pin is fully inserted into diaphragm holder and seat properly.

Order Inhale/Exhale Diaphragm Kit #0073

Gasket Kit #0074 – (Figs. 7 and 9)

- #9000 - Pull off old gasket over three bayonet prongs on cartridge retainer and discard. Push new gasket onto retainer and check that it is seated properly.
- #7920 Piggyback Adapter - Pull off and discard. Push new gasket onto retainer and check that it is seated properly.

- Use other personal protective equipment, as directed by your employer. Where appropriate or when required by regulation, wear protective gloves when handling or removing respirator and dispose of respirator and them gloves in accordance with your employer's directions.
- CDC or other Local, State or Federal agency issued new or revised guidelines for respirator use against specific hazards, users must strictly comply.

WARNINGS FOR USE OF PARTICULATE RESPIRATORS AGAINST TB

OSHA and CDC have recommended the use of any of the particulate respirators approved under 42CFR84 as a means of providing help in complying with a program designed to reduce occupational exposure to tuberculosis.

The level of effectiveness of respiratory protection from tuberculosis cannot be measured and not currently available data. Moldex does not recommend use of appropriate Moldex respirators in conjunction with a comprehensive respiratory protection program may reduce, but will not eliminate, risk of infection.

- Be sure to read the Limitations outlined below and strictly follow all Warnings set forth under the **WARNINGS FOR ALL USERS.**
- When using the Moldex respirator, filter replacement and/or disposal must be handled in accordance with your Healthcare Facility's comprehensive respiratory protection program.
- If disinfectants are used to sanitize reusable facepieces, you must consult with your Healthcare Facility and run tests to ensure the compatibility of any disinfectant with Moldex reusable facepiece materials. Use of disinfectants could impair the efficiency of the respirator and result in a loss of protection.

LIMITATIONS

- ***Respirators may reduce but do not eliminate wearer exposure to airborne hazards or the risk of contracting any disease or infection. Do not use this respirator as part of a comprehensive respiratory protection program. You will receive no respiratory protection if this respirator is not properly fitted and worn. Additionally, potentially hazardous particles, including infectious agents, smaller than the particle sizes used in NIOSH certifications are likely to exist in certain environments. Using particulate respirators that these smaller particles may not be filtered out as effectively as the particle sizes used by NIOSH 29 Series Count Median Diameter (CMD) 0.075 ±. .02µm Generic Aerosol Penetration Test 1.86 (GSD), and R & P Series CMD 0.185 ±. .02µm 1.6 (GSD) when certifying respirators. It is imperative that you determine the size and potential hazards of the particles that may be present in the environment before selecting appropriate respiratory protection, and that you refer to CDC guidelines for recommendations when using any respirator, particularly in environments where smaller types of particles, such as tuberculosis, are known or suspected.***
- **Use only approved respirators. Use of non-approved respirators or respirators not certifying respirators for protection against hazardous industrial contaminants. Procedures for selecting and using proper respiratory protection are established by various governmental agencies, such as the Occupational Safety and Health Administration (OSHA).**

NIOSH tests and certifies certain respirators for use against chemical warfare agents, biological warfare agents or biohazards and provides advisory information for some biohazards, but OSHA and other government agencies have not set any exposure standards for these agents or biohazards, in general.

WARNINGS FOR ALL USERS

- This respirator must only be used for substances having Permissible Exposure Limits (PELs) and only where deemed appropriate by competent persons.
- This respirator must not be fitted. If you cannot obtain a proper fit, do not use the respirator and do not enter the risk area.
- This respirator is not for use with beards or other facial hair that prevents direct contact between the face and sealing surface of the respirator.
- Moldex respirators, when properly fitted and used as part of a comprehensive respiratory protection program, may reduce wearer exposure to some airborne hazards, but not all.
- In the event of a sudden or unexpected CBRN hazard release, you may use this respirator for escape only if you have not been provided with a more appropriate respirator for this type of situation. Do not remove the mask from the face until you have left the contaminated area.
- Do not reuse or store for reuse or hang around neck unless your employer specifically authorizes reuse. Dispose of respirator as a hazardous waste in accordance with your employer's directions.

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- **Use only approved respirators. Use of non-approved respirators or respirators not certifying respirators for protection against specific hazards, users must strictly comply.**

ADVERTENCIAS PARA EL USO DE RESPIRADORES PARA PARTÍCULAS CONTRA TBC

OSHA y CDC han recomendado el uso de cualquiera de los respiradores para partículas aprobados según 42CFR84 como un medio de proporcionar ayuda en el cumplimiento de un programa diseñado para reducir la exposición ocupacional a la tuberculosis.

El nivel de efectividad de la protección respiratoria contra la tuberculosis no puede determinarse con la información disponible actualmente. Sin embargo, el uso adecuado de los respiradores Moldex apropiados, junto con un programa integral de protección respiratoria puede reducir, pero no eliminar, el riesgo de infección.

- Asegúrese de leer las Limitaciones indicadas más abajo y siga estrictamente todas las Advertencias establecidas en la sección **ADVERTENCIAS PARA TODOS LOS USUARIOS.**
- Cuando se usa un respirador Moldex, el reemplazo de filtro y/o su desecho debe manejarse de acuerdo con el programa integral de protección respiratoria de su centro médico.
- Si se usan desinfectantes para esterilizar máscaras faciales reusables, debe consultar con su centro médico y efectuar pruebas para asegurase de la compatibilidad de cualquier desinfectante con los materiales de las máscaras faciales Moldex reusables. El uso de desinfectantes podría afectar la eficien-cia del respirador y causar una pérdida de protección.

LIMITACIONES

- ***Los respiradores pueden reducir pero no eliminar la exposición del portador a riesgos que se encuentran en el aire o el riesgo de contraer cualquier enfermedad o infección. Solo use este res-pirador como parte de un programa integral de protección respiratoria. Usted no recibirá ninguna protección respiratoria si el respirador no está ajustado y usado correctamente. Además, es probable que existan partículas potencialmente peligrosas, incluyendo agentes infecciosos, más pequeñas que los tamaños de partículas usados en certificaciones NIOSH, en ciertos ambientes. Usando respiradores para partículas que estas partículas más pequeñas podrían no ser filtradas en forma tan eficaz como los tamaños de partícula usados por NIOSH 29 series Recuento medio del centro (CMD) de la serie N 0.075 ± 0.02µm Desviación estándar geométrica 1.86 (GSD), y CMD de las series R y P 0.185 ± 0.02µm 1.6 (GSD) al certificar respiradores. Es imperativo que usted determine el tamaño y los peligros potenciales de las partículas que pueden estar presentes en el ambiente antes de seleccionar la protección respiratoria adecuada, y que consulte las pautas CDC al seleccionar un respirador para cualquier aplicación, en particular en ambientes donde los tipos más pequeños de partículas, como los mencionados anteriormente, puedan estar presentes.***
- **Si el respirador entra en contacto con sangre o fluidos, incluyendo fluidos corporales, deje el área contaminada lo antes posible y deseche y reemplace el respirador.**
- **Los respiradores Moldex no deben usarse en niños.**

Para mayor información sobre el uso de respiradores, contacte a Moldex al **+(310) 421-0668 o al +(310) 837-6500, ext. 512/550, a su empleador, o al CDC al www.cdc.gov o +1 (800) 311-3435 o +1 (404) 498-6500.**

GARANTÍA LIMITADA

AVISO IMPORTANTE PARA EL COMPRADOR

Esta garantía limitada se establece en lugar de las garantías de comerciabilidad, idoneidad para un propósito particular y todas las otras garantías, expresas o implícitas. No hay otras garantías que se extiendan más allá de la descripción en el texto del presente documento. Las normas y reclamaciones fiscales de Moldex serán compatibles por los productos vendidos. **Únicas medidas:** Los daños por la violación de esta garantía limitada se limitan al reemplazo de los productos Moldex en la cantidad que se comprueba estar defectuosos de fábrica. Excepto por lo establecido anteriormente, Moldex no será responsable de ningún daño, directo, especial, directos, indirectos, imprevistos, especiales, o derivados, productos de la venta, uso, uso inadecuado, o incapacidad de uso.

ESPAÑOL – INSTRUCCIONES DEL USUARIO

MOLDEX — Ideas that wear well.

PPE FREE ZERO DEFECT

Manual de instrucción del usuario Respirador serie 9000

AVISO IMPORTANTE PARA LOS USUARIOS

Usted es responsable de comprender y seguir todas las advertencias, restricciones y cualquier otra información contenida en este manual de instrucciones antes de ingresar a un área de trabajo contaminada. No hacerlo puede producir enfermedades o la muerte.

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APPLICATIONS

USE CONTRA

1. Contaminantes especificados en las etiquetas de aprobación de NIOSH, etiquetas tipo matriz, cartuchos o filtros y de acuerdo con todas las limitaciones y regulaciones aplicables de seguridad y salud, incluyendo OSHA.
2. Contaminantes con claras indicaciones de advertencia, es decir, por su olor, sabor o porque son irritantes.

NO USE CONTRA

1. Concentraciones de contaminantes que son desconocidos, o que son inmediatamente peligrosos para la vida o la salud.
2. Concentraciones de contaminantes que exceden la máxima concentración o 10 veces el Límite de exposición permisible (PEL, por sus siglas en inglés) de OSHA, cuando se han probado cualitativamente, o 50 veces el PEL cuando se han probado cuantitativamente, o de acuerdo con las regulaciones gubernamentales.
3. Gases o vapores con pocas indicaciones de advertencia o aquellos que producen grandes calores de reacción, o pintura en aerosol que contiene isocianatos.
4. Arenado.
5. Nieblas con base de petróleo con filtros N.

ADVERTENCIAS AL USUARIO

1. Siga todas las instrucciones y advertencias sobre el uso de este respirador y úselo durante todo el tiempo de exposición. No hacerlo reducirá la efectividad del respirador, la protección al portador y **puede producir enfermedades o la muerte.**
2. Para conocer el uso adecuado, pregunte a su supervisor o llame al **+ (800) 421-0668 o al + (310) 837-6500, ext. 512/550.**
3. El usuario primero debe ser entrenado por el empleador acerca del uso correcto del respirador, de acuerdo con las normas aplicables de seguridad y salud, según el contaminante y el nivel de exposición en el área de trabajo asignada. Debe haber un Programa de capacitación en protección respiratoria que el usuario por cada usuario antes de usarlo por primera vez. Debe cumplir todos los requisitos de todas las normas aplicables, incluyendo OSHA 29 CFR 1910.134, y en Canadá CSA Z 94.4, como por ejemplo, pruebas de ajuste, evaluación médica, y normas OSHA de aplicación específica aplicables, etc.
4. Los vapores, gases, polvos, nieblas, humos y otros contaminantes que pueden ser peligrosos para su salud incluyen algunos que no pueden ver, oler o percibir.
5. Consulte con su supervisor sobre los cartuchos apropiados y/o filtros para los contaminantes en su área de trabajo.
6. Debe realizarse una prueba de ajuste cualitativa para hasta 10X PEL, o una prueba de ajuste cuantitativo, por hasta 50X PEL, antes de asignar un respirador. Consulte la norma OSHA 29 CFR 1910.134(f).

RESTRICCIONES

1. Este respirador no suministra oxígeno y no debe usarse en atmósferas que contengan menos de 19.5% oxígeno.
2. No permanezca en el área contaminada si siente algún malestar físico, como dificultades respiratorias, mareo o náuseas.
3. Deje el área contaminada y reemplace el respirador o cartucho o filtro si está dañado, deformado, si no puede obtener un ajuste correcto, si usted percibe, huele o se ve irritado por contaminantes, o si se vuelve difícil respirar.
4. No altere, modifique ni abuse de este respirador.
5. Almacene el respirador en una bolsa sellada en un lugar limpio, seco y no contaminado.
6. Deseche su máscara facial y/o los cartuchos, discos y filtros de acuerdo con la política de su empleador y las regulaciones aplicables.
7. Debe usar filtros N, R o P para partículas.
8. **Donde existan nieblas de petróleo**, ya sea solas o en combinación con partículas sólidas, no use los filtros R o P por más de un turno de ocho horas de trabajo. Deséchelos después de ocho horas de su primer uso. No exceda 10 o 50 veces el valor de PEL dependiendo de si se probó el ajuste del usuario en forma cuantitativa o cualitativa (consulte la sección No use contra, punto 2) o 200 mg de carga por respirador. Es responsabilidad del usuario saber el PEL y la concentración del contaminante, la máxima tasa de trabajo del empleado, y cualquier otra información específica del lugar de trabajo para estimar la carga del filtro. Donde existan nieblas de petróleo, no use los filtros N.
9. Deseche todos los cartuchos y filtros N, R y P no después de treinta días después de primer uso y/o lo retiradas de la bolsa sellada.
10. Use cartuchos, filtros y máscaras faciales antes de la fecha de expiración impresa en la caja o en la bolsa.

PRECAUCIONES Y LIMITACIONES DE NIOSH

Pueden aplicarse las siguientes restricciones. Consulte la etiqueta de aprobación de NIOSH.

A. No apropiado para uso en atmósferas que contienen menos de 19.5% de oxígeno.
B. No para uso en atmósferas inmediatamente peligrosas para la vida o la salud.
C. No exceda las máximas concentraciones de uso establecidas por las normas regulatorias.
H. Siga los programas de sustitución de cartuchos establecidos para asegurar que los cartuchos se reemplacen antes de que se produzca una penetración.
J. No usar y mantener adecuadamente este producto puede ocasionar lesiones o la muerte.
L. Siga las instrucciones para el usuario del fabricante para cambiar cartuchos o filtros.
M. Los respiradores con aprobación M.A.R debenser seleccionados, instalados, usados y mantenidos de acuerdo con MSHA, OSHA y otras regulaciones aplicables.
N. Jamás substituya, modifique, agregue ni omita componentes. Solo use partes de respirador exactas

PORTUGUÊS – INSTRUÇÕES DO USUÁRIO

MOLDEX
Ideas that wear well.

PVC FREE

INSTRUÇÕES DE USO DA PEÇA FACIAL INTEIRA SÉRIE 9000

AVISO IMPORTANTE AOS USUÁRIOS

Você é responsável pela compreensão e o seguimento de todas as advertências, restrições e outras informações contidas neste manual de instruções antes de entrar em áreas de trabalho contaminadas. O não seguimento deste aviso pode resultar em doenças ou morte.

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LISTA DE PEÇAS PARA O MODELO 9000
9001-Pequeno 9002-Medio 9003-Grande

Nº de Peça	Descrição
0072-1	Arnês para Instação
0073-2	Estabe Diaphragm
0074	Junta do cartucho
0092	Equipamento do tira da cabeça
0094	Cobertura para o Nariz M/L
0095	Cobertura para o Nariz S

Part #	Description
0073-1	Inhale Diaphragm
0073-2	Exhale Diaphragm
0074	Cartridge Retainer Gasket
0092	Head Harness
0094	Nose Cup M/L
0095	Nose Cup S

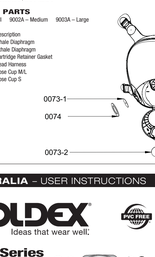

Fig. 1

FINALIDADES

USAR CONTRA
1. Substâncias contaminantes especificadas nos rótulos das embalagens dos cartuchos e filtros, conforme normas vigentes.
2. Substâncias contaminantes com altas propriedades de advertência, tais como cheiro, sabor ou irritação.

NÃO USAR CONTRA
1. Concentrações de substâncias contaminantes desconhecidas ou consideradas Imediatamente Perigosas à Vida e a Saúde (IPVS).
2. Concentrações de substâncias contaminantes que excedem a máxima concentração de uso no Fator de Proteção do Usuário (quando aplicável) especificado, ou 50 vezes o Limite de Tolerância (quando testados quantitativamente, não importando qual é o mais baixo, de acordo com os regulamentos aplicáveis pelo governo. (100 vezes o Limite de Tolerância no Brasil)
3. Gases ou vapores com baixas propriedades de advertência ou aqueles que geram altas temperaturas de reação, ou sprays de pintura que contenham isocianatos.
4. Jateamento.
5. Níveis à base de óleo com filtros S.

ADVERT NOUAS AO USUÁRIO
1. Siga todas as instruções e advertências para o uso deste respirador e use-o durante todo o tempo das exposições. O não seguimento deste aviso reduzirá a eficácia do respirador, a proteção oferecida **pode causar doenças ou morte.**
2. Para o uso adequado, consulte o seu supervisor ou ligue para **+55 (11) 2609-2108.**
3. O usuário deverá ser treinado pelo empregador para o uso adequado do respirador, de acordo com as normas de segurança e saúde aplicáveis, o nível de exposição e de substâncias contaminantes específicas no seu local de trabalho. Deve existir no local um Programa de Proteção Respiratória, o qual deve ser seguido pelo usuário. Este deve seguir todos os requisitos e procedimentos, incluindo a IN-01 da Fundacentro e do Ministério do Trabalho, tais como treinamentos, avaliação física, avaliação clínica, testes de normas aplicáveis substâncias específicas.
4. Os vapores, gases, poeiras, névoas, fumos e outras substâncias contaminantes que podem ser nocivas à sua saúde incluem aqueles que não são vistas e aqueles que não têm sabor ou cheiro.
5. Consulte o seu supervisor sobre os cartuchos adequados e/ou filtros para as substâncias contaminantes existentes na sua área de trabalho.
6. Uma avaliação física qualitativa ou quantitativa deve ser aplicada antes da atribuição de um respirador.

RESTRIÇÕES

1. Este respirador não fornece oxigênio e não deve ser usado em atmosferas que contenham menos de 19.5% de oxigênio.
2. Não permanença em áreas contaminadas com acroína qualquer dano físico, como dificuldade para respirar, tontura ou náuseas.
3. Abandone à área contaminada e substitua o respirador e/ou cartuchos ou filtros caso os mesmos estejam danificados, alterados, não seja possível obter um ajuste adequado, você sinta gosto/cheiro ou alguma irritação proveniente de substâncias contaminantes ou sua respiração se torne difícil.
4. Não Altere, modifique ou use indevidamente este respirador.
5. Guarde o respirador em embalagem fechada e mantenha-o em ambiente limpo, seco e não contaminado.
6. Descarte a peça facial e/ou cartuchos e filtros de acordo com as instruções do seu empregador e legislação vigente.
7. Os filtros S ou SL são necessários na existência de particulas.
8. **Onde houver níveis de óleos**, na atmosfera, tanto isolados como combinados partículas sólidas, não use os filtros SL por tempo superior a uma jornada de trabalho de 8 horas. Elimine-o no máximo depois de oito horas do primeiro uso e exceda 50 vezes o Limite de Tolerância (100 vezes para Brasil) ou total de uma carga sendo este valor dependente do teste de ajuste do usuário (o seu quantitativo ou qualitativo (veja Não Utilizar Contra, item 2) de 200 mg por respirador, o qual for inferior. É responsabilidade do usuário saber o Limite de Tolerância e a concentração da substância contaminante, a fase de trabalho máxima do trabalhador e qualquer outra informação específica do ambiente de trabalho para calcular a carga do filtro. Onde houver níveis oleosos, não use os filtros S.
9. Elimine todos os cartuchos ou filtros S no máximo depois de 30 dias ao primeiro uso e/ou 8 da sua remoção da embalagem fechada.
10. Utilize cartuchos, filtros e peças faciais antes da data de vencimento impressa na caixa ou embalagem.

CUIDADOS E LIMITAÇÕES

As seguintes restrições devem ser aplicadas.
A. Não deve ser usado em atmosferas que contenham menos de 19.5% de oxigênio.
B. Não deve ser usado em atmosferas Imediatamente Perigosas à Vida e a Saúde (IPVS).
C. Não exceda as concentrações máximas de uso estabelecidas pelas normas governamentais.
H. Siga o programa estabelecido para a troca de cartuchos para garantir que os cartuchos sejam trocados antes do final de seu tempo útil.
J. O uso e a manutenção não adequada deste produto podem resultar em doenças ou morte.
L. Siga o Manual de Instruções do Fabricante para a troca dos cartuchos e/ou filtros.
M. Todos os respiradores aprovados serão selecionados, adequados, utilizados e mantidos de acordo com as regulamentos aplicáveis.
N. Nunca substitua, modifique, adicione ou subtraia nenhuma peça. Utilize somente as peças exatas de reposição para a sua configuração específica especificado pelo fabricante.
O. Consulte as Instruções do Usuário e/ou manuais de manutenção para informações sobre o uso e manutenção destes respiradores.
P. Este respirador não foi avaliado para o seu uso com substâncias cirúrgicas.
S. As instruções ao Usuário especiais ou críticas e/ou limitações de uso especificas são aplicadas.
T. Não use em atmosferas ricas em oxigênio, por exemplo, acima do volume de 23.5%.
U. Não use em atmosferas explosivas.

LINHA DE SERVIÇO TÉCNICO

A Moldex conta com uma linha de Serviço Técnico para responder às questões relacionadas com o uso dos respiradores Moldex, substâncias contaminantes e regulamentos. Se você tiver alguma dúvida, ligue para **+55 (11) 2609-2108 ou envie um e-mail para tech@moldex.com.**

INSTRUÇÕES PARA O AJUSTE

1. Os usuários devem seguir as instruções sempre que o respirador for utilizado.
2. O Usuário deverá passar por uma avaliação de ajuste.
3. Não utilize com qualquer tipo de pelo facial, como barbas, que possam vir a comprometer a qualidade do ajuste.
4. Caso não consiga obter um ajuste adequado, não entre na área contaminada e procure o seu supervisor.

COLOCAÇÃO DO RESPIRADOR

1. Segure as extremidades inferiores do suporte para cabeça com cada uma das mãos, logo acima da cada fivela de ajuste, e empurrando posiciona-o quase no flange, puxe o suporte por cima da cabeça. **(Fig. 2)**
2. Empurre a peça facial na face e no queixo com uma das mãos e posicione ahi atingir o nosso conforto. Ajuste inicialmente a vedação enquanto empurra e aperta a peça do pescoço do suporte com a outra mão. Repita o procedimento para a outra placa do pescoço. Para um encaixe mais fácil, seguro e melhor, sempre ajuste as placas do suporte do pescoço primeiro, antes de apertar as placas do suporte para cabeça. **(Fig. 3)**
3. Todas as quatro placas do suporte devem ser ajustadas de forma que a pressão da vedação na face seja distribuída igualmente. O suporte para cabeça deve estar totalmente acomodado na cabeça. Ajuste as placas superiores e inferiores igualmente para um ajuste mais confortável e livre de vazamentos.

REMOÇÃO DO RESPIRADOR

Para retirar, primeiro empurre as placas inferiores para longe do rosto a fim de afrouxar as correias do suporte, então empurre a área do queixo para cima e na direção oposta à face. **(Fig. 4)**

ENSAIOS DE VEDAÇÃO

O ensaio de vedação deve ser executado antes que um respirador seja designado. O ensaio de vedação qualitativo pode ser executado com apoio do KIT de ensaio Moldex BITREX com cartuchos ou filtros apropriados. O ensaio de vedação quantitativo pode ser executado com o kit de cartuchos descartáveis Ligue para **+55 (11) 2609-2108** para detalhes ou acesse a nossa página www.moldex.com

VERIFICAÇÃO DE VEDAÇÃO DO USUÁRIO

Execute verificações de vedação tanto positivas quanto negativas sempre que você entrar em uma área contaminada.

Verificação de Vedação com Pressão Negativa: Cubra os dois cartuchos e, lentamente, inale e segure sua respiração. A peça facial deve colar-se levemente. Se caso de vazamento de ar, inaspire a posição da peça facial e aumente a tensão das correias e refaça repita a verificação de vedação até que o vazamento seja eliminado. **(Fig. 5)**

Verificação de Vedação com Pressão Positiva: Cubra a abertura da válvula de exalação e exale cuidadosamente para criar uma pressão levemente positiva. Se caso de vazamento de ar, inaspire a posição da peça facial e a tensão das correias e refaça repita a verificação de vedação até que o vazamento seja eliminado. **(Fig. 6)**

AVISOS: Caso não consiga obter um ajuste adequado, não entre na área contaminada e procure o seu supervisor.

Faça a verificação de vedação em seu respirador sempre que você entrar e periodicamente enquanto estiver usando o respirador em uma área contaminada.

É responsabilidade do Diretor de Segurança ou do seu supervisor ajustá-lo e determinar com que nível de aperto o respirador da Série 9000 deve estar na face do usuário. Antes e durante a utilização, o usuário tem a responsabilidade final de determinar com que nível de aperto o respirador deve estar e avaliar a necessidade de ajuste do mesmo a fim de manter uma vedação adequada. Não deixe o equipamento muito apertado nem muito frouxo, já que ambas configurações podem causar vazamento e reduzir a proteção.

GUIA DE SELEÇÃO

Utilize este guia de seleção para ajudá-lo a escolher o respirador e/ou cartuchos e/ou filtros corretos para as condições no seu local de trabalho. Verifique ainda se seu supervisor para determinar se você possui a proteção correta. Ligue para **+55 (11) 2609-2108** para obter uma cópia do guia de seleção, ou você poderá acessar e obtê-la através da página www.moldex.com

ANTENAS PEÇA FACIAL

Referência	Descrição	Tamanho
9001	Unidade da peça facial incluindo a armação da cabeça, o suporte do nariz e almofada de manga/borracha	M - Médio
9003		G - Grande

FILTROS QUÍMICOS

Referência	Classe	Utilização	Descrição
7105R	1	Vapores Orgânicos	Cartuchos Vapores Orgânicos
7107R	1	Gases Ácidos	Cloro, ácido clorídrico e dióxido de enxofre ou dióxido de enxofre e vapores orgânicos
7200R	1	Vapores Orgânicos/ Gases Ácidos	Cartuchos Vapores Orgânicos, cloro, ácido clorídrico e dióxido de enxofre ou dióxido de enxofre e vapores orgânicos (combinação aceitável)
7400R	1	Amônia/ Metilamina	Amônia e Metilamina
7500R	1	Formaldeído	Formaldeído
7600R	1	Multigases/ vapores	Cartuchos Vapores Orgânicos, cloro, ácido clorídrico e dióxido de enxofre ou dióxido de cloro, ácido sulfídrico, sulfeto de hidrogênio (combinação aceitável), amônia, metilamina e formaldeído

FILTROS DE ONDA Z FILTROS PARA partículas

Referência	Classe	Utilização	Descrição
9744P ⓘ,ⓙ	P3 S.		Poeiras e Níveis
7940P	P3 S.		Poeiras, Níveis e Fumos
7945P	P3 S.		Poeiras, Níveis, Fumos e Radionuclídeos
7955P	P3 S.		Poeiras, Níveis, Fumos e Radionuclídeos
7600P	P3 S.		Poeiras, Níveis, Fumos e Radionuclídeos + Vapores Orgânicos para Serviço de Vapores Orgânicos

RETENTORES E ADAPTADORES

Referência	Descrição
2091	Retentor para um do cartucho quimico conforme NIOSH (Não necessita RT40 ou 9501)
4010	Protetor contra respingos e fagulhas. Pode ser usado com os filtros 7940 ou 7945
2097	Adaptador para use do cartucho quimico conforme com filtro mecânico 7940 ou 7945

PEÇAS DE REPOSIÇÃO DA SÉRIE 9000 - Fig. 1

Referência	Descrição
0072-1	Kit de diaphragm - Inalação e exalação
0072-2	Anéis de Retenção para a Retenção de Cartucho e Adaptador 7930
0092	Unidade Da Correia de cabeça
0094	Cover Nose Cup Nariz M/L
0095	Copo Nariz Cover S

ⓘ Somente pode ser utilizado com todos os cartuchos são/vapor.

PRÉ-INSPEÇÃO

Inspecione o seu respirador antes e depois de cada utilização. Não utilize-o e devolva ao seu supervisor se:
1. A unidade de fixação para a cabeça estiver rasgada, cortada ou danificada de alguma maneira.
2. As fivelas ou placas com flanges estiverem ausentes, danificadas ou quebradas.
3. A peça facial estiver rachada, rasgada, fendida, suja ou com barulos.
4. Os diaflragmas de inalação/exalação e/ou juntas estiverem ausentes, rasgados, danificados ou seu aspecto não seja bom.
5. Os cartuchos estiverem no fim de sua vida útil, rachados, danificados ou seu aspeto não for adequado.
6. Qualquer outra peça de plástico ou borracha estiver rachada, torcida ou danificada.

SELECTION GUIDE

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FACEPIECE ONLY

Description	Model #	Size
Facepiece Assembly including Head Strap Harness and Inhale/Exhale Diaphragms and Nosecup	9001	S
	9002	M
	9003	L

RETAINERS/ADAPTERS

Description	Model #
Retainer	7020
Splash/Sparks Protector ⓘ	8020
Piggyback Adaptor	7920

REPLACEMENT CARTRIDGES

Description ⓘ	Model #	Approval
Organic Vapour	7700A	A1
Multi-Gas/Vapour Smart* Cartridge ⓘ	7600A	A1B1E1K1
P3 Particulates	7990A	P2/P3 ⓘ,ⓙ

DISK/FILTER SERIES

Description ⓘ	Model #	Approval
N95 Particulates	8010A	P2
P100 Particulates	7940A	P2/P3 ⓘ,ⓙ
P100 Particulates Plus Nuisance O.V. ⓘ,ⓚ	7960A	P2/P3 ⓘ,ⓙ,ⓚ

9000 SERIES REPLACEMENT PARTS

Description	Model #
Head Harness Replacement Kit	0092
Replacement Diaphragm Kit	0073
Replacement Gaskets	0074
Face Shield Protectors	0093
Nose Cup M/L	0094
Nose Cup S	0095
Spectacle Kit	0098

ⓘ Refer to label for approval limitations.
ⓙ Not for use with Organic Vapour cartridges.
ⓚ Require gas-proof goggles, when used against Formaldehyde, with 7000 series facepieces.
ⓘ P2 approval when used with 7000 Series half mask.
ⓙ P3 approval when used with 9000 Series full face mask.
ⓘ For use with 8700R and 8700GA only, against splash/sparks.
ⓚ Nuisance Organic Vapour (less than Occupational Exposure Limit).

ENGLISH – USER INSTRUCTIONS

MOLDEX
Ideas that wear well.

PVC FREE

9000 Series Respirator User Instruction Manual

Scannable Product Protocol
SAI Global
AS 1716 Lic 3876

IMPORTANT NOTICE TO USERS

You are responsible to understand and follow all warnings, restrictions and other information contained in this instruction manual, before you enter a contaminated work area. Failure to do so may result in sickness or death.

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APPLICATIONS

USE AGAINST
1. Contaminants specified on approval label, cartridges or filters and in accordance with all limitations and applicable safety and health regulations, and Work Safe.
2. Contaminants with good warning properties, i.e. smell, taste or irritation.

DO NOT USE AGAINST
1. Concentrations of contaminants which are unknown, or are immediately dangerous to life or health.
2. Concentrations of gases, vapours or particulates which exceed the limitations stated in AS/NZS 1715 or according to applicable government or local regulations.

GAS/VAPORS ONLY

Gas/Vapor Filter Class	Maximum Exposure Limitations
Class 1	1000 ppm or 50x Exposure Standard (whichever is lower)

PARTICULATES ONLY

Particulate Filter Class	Maximum Exposure Limitations
P2	50x Exposure Standard
P3	100x Exposure Standard

COMBINATION OF GAS/VAPOR AND PARTICULATES

Gas/Vapor Filter Class	Particulate Filter Class	Maximum Exposure Limitations
Class 1	P2/P3	1000 ppm or 50x Exposure Standard (whichever is lower)

-18° C
Temperature range of storage cartridges

RESTRICTIONS

1. This respirator does not supply oxygen and must not be used in atmospheres containing less than 19.5% oxygen.
2. Do not remain in contaminated area if any physical distress occurs, for example breathing difficulty, dizziness or nausea.
3. Leave contaminated area and replace respirator and/or cartridge or filter if it is damaged, distorted, a proper fit cannot be obtained, you taste, smell or become irritated by contaminants, or breathing becomes difficult.
4. Do not alter, modify, or abuse this respirator.
5. Store respirator in sealed bag in a clean, dry, non-contaminated area.
6. Dispose of facepiece, and/or cartridges and disks/filters according to your employer's policy and applicable regulations.
7. P filters are required for particulates.
8. Dispose of all cartridges and all filters no later than thirty days after so first use, and/or 8 removing from sealed bag.
9. Use cartridges, filters, and facepieces before the "use by" expiration date printed on box or bag.

CAUTIONS AND LIMITATIONS

The following restrictions may apply.
A. Not for use in atmospheres containing less than 19.5% oxygen.
B. Not for use in atmospheres immediately dangerous to life or health.
C. Do not exceed maximum use concentrations specified by regulatory standards.
H. Follow established change schedules to ensure that cartridges are replaced before breakthrough occurs.
J. Failure to properly use and maintain this product could result in injury or death.
L. Follow the manufacturer's User's Instructions for changing cartridges, and/or filters.
M. All approved respirators shall be selected, fitted, used, and maintained in accordance with applicable regulations.
N. Never substitute, modify, add, or omit parts. Use only exact replacement parts in the configuration as specified by the manufacturer.
O. Refer to User's Instructions, and/or maintenance manuals for information on use and maintenance of these respirators.
P. SAI does not evaluate respirators for use as surgical masks.
S. Special or critical User's Instructions and/or specific use limitations apply. Refer to User's Instructions before donning.

TECHNICAL SERVICE LINE

Moldex maintains a Technical Service Line to answer questions about the use of Moldex respirators, contaminants and regulations. If you have any questions call **+1 (310) 837-6500, ext. 512/550** or FAX **+1 (310) 837-9563** or **e-mail at: tech@moldex.com**.

SELECTION GUIDE

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ⓙ Not for use with Organic Vapour cartridges.
ⓚ Require gas-proof goggles, when used against Formaldehyde, with 7000 series facepieces.
ⓘ P2 approval when used with 7000 Series half mask.
ⓙ P3 approval when used with 9000 Series full face mask.
ⓘ For use with 8700R and 8700GA only, against splash/sparks.
ⓚ Nuisance Organic Vapour (less than Occupational Exposure Limit).

PRE-INSPECTION

Inspect your respirator before and after each wearing. Do not wear, and return to your supervisor if:
1. Head harness is torn, cut, or damaged in any way.
2. Buckles or flanged tabs are missing, damaged or broken.
3. Facepiece is cracked, torn, distorted, dirty, or has holes.
4. Inhalation/Exhalation diaphragms and/or gaskets are missing, torn, damaged, or not properly seated.
5. Cartridges are at the end of their service life, cracked, damaged, or not properly seated.
6. Any other plastic or rubber part is cracked, distorted, or damaged.

FITTING INSTRUCTIONS

1. Users must follow instructions each time respirator is worn.
2. Federal or local regulations or your employer may require that the user be fit tested. AS/NZS 1716 recommends fit testing.
3. Do not wear with any facial hair, such as beards, or any other facial features which may prevent a proper fit.
4. If you cannot obtain a proper fit, do not enter the contaminated area and see your supervisor.

DONNING – PUTTING ON

1. Grab lower lengths of head harness with each hand, just above each adjustment buckle, and while positioning chin in flange, pull harness over the head. **(Fig. 2)**
2. Push facepiece onto face and chin with one hand and position for most comfortable and secure seal while pulling sides and tightening neck tab of harness with other hand. Repeat for other neck tab. For easiest, most secure and best fit always adjust neck harness tabs first before tightening top harness tabs. **(Fig. 3)**
3. All four harness tabs must be adjusted so that the pressure of the face seal on the face is distributed evenly. Head harness must lay flat on head. Adjust both lower and top harness tabs evenly for most comfortable and leak-tight fit of the face flange.

DOFFING – TAKING OFF

To take off, first pull lower/neck harness tabs away from face to loosen harness straps, then pull chin area away and upwards from face. **(Fig. 4)**

FIT TESTS

A qualitative or quantitative fit test must be performed before a respirator is assigned. Qualitative fit testing can be performed using the Moldex BITREX® fit test kit with appropriate cartridges or filters. Quantitative fit testing can be performed with probed cartridge kit. Call Moldex at **+1 (310) 837-6500, ext. 512/550 for details or you may access via website at www.moldex.com.**

USER SEAL CHECK

Perform both negative and positive seal checks each time you enter a contaminated area.

Negative Pressure Seal Check: Cover both cartridges, and gently inhale and hold your breath. The facepiece should slightly collapse. If air leakage is detected, re-adjust the position of the facepiece and increase tension of head harness and repeat the seal check until leakage is eliminated. **(Fig. 5)**

Positive Pressure Seal Check: Cover the exhalation valve vent and exhale gently to create a slight positive pressure. If air leakage is detected, re-adjust the position of the facepiece and tension of head harness and repeat the seal check until leakage is eliminated. **(Fig. 6)**

WARNINGS: If you cannot obtain a proper fit, do not enter the contaminated area and see your supervisor.

Seal check your respirator each time you enter and periodically while wearing the respirator in the contaminated area.

It is the responsibility of the Safety Director or your supervisor to assist you in determining how tight the 9000 Series respirator should be on the users face. Prior to and during use the user has the final responsibility to determine how tight the respirator should be and when it needs to be adjusted to always maintain a proper seal. Do not over or under tighten as either may cause leakage and reduce protection.

CARTRIDGES

CHEMICAL CARTRIDGE SERVICE LIFE
Leave contaminated area, and replace cartridges, if you smell, taste, or feel any irritation in your nose or throat. Consult your supervisor. Replace according to your change out schedule, or no more than one month from date of first use, or sooner if breakthrough occurs.

CARTRIDGE/FILTER DISK ASSEMBLY
First inspect the facepiece, cartridge or filter disk sealing surfaces to make sure it's clean and undamaged. Check to see that cartridge retainer gasket is in place and is clean and undamaged. **(Fig. 7) DO NOT ATTACH CARTRIDGE OR FILTER DISK WITHOUT A GASKET. SEE YOUR SUPERVISOR.** Only use cartridges or filter disks from sealed bags. To attach the cartridge or filter disk to the facepiece, align the three cartridge or filter disk notches with the three bayonets protruding from the facepiece and firmly turn clockwise until the cartridge or filter disk is locked into position and is unable to turn any further. **(Fig. 8)** Check to see that it is seated and flush against the facepiece gasket. Then check the inhalation diaphragms for dirt and/or damage and see that they are seated properly.

CHANGE OUT SCHEDULES

Federal or local regulations may require that the employer implement a change out schedule for cartridges and filters based on the information or data that will ensure cartridges are changed before the end of their service life. A cartridge's useful service life is how long it provides adequate protection from harmful chemicals in the air. The service life of a cartridge depends on many factors, including environmental conditions, breathing rate, cartridge filtering capacity and the amount of contaminants in the air.

If you know what the chemical is and how much of it you are exposed to, then you are ready to estimate how long your respirator cartridges will work and apply the safety factor.

You must use some type of objective data to develop a change out schedule. Options for determining a cartridge's service life include:

1. Conducting experimental tests.
2. Using a mathematical model.

Work Safe, or other safety and health organizations, may have other means of calculating breakthrough times for various chemicals. You may also want to consider use of their website in developing your change out schedules. Be advised that actual service life can vary considerably from those calculated using these models. These models only provide rough estimates. Some of the data you will need specific to the Moldex cartridges in order to use the models on these websites are:

- #7100A has an adsorbing equivalent of 42.5 grams Organic Vapor Carbon, its height is 2.06 cm, inside diameter is 7.81 cm.
- #7600A has an adsorbing equivalent of 36.0 grams Organic Vapor Carbon, it's height is 2.06 cm, inside diameter is 7.81 cm.
- A change out schedule worksheet is provided.

CARTRIDGE DETAILS

READ THIS WARNING

These weights were estimated by Miller-Nelson, Inc. using methods based on their tests. It is suggested that you use default values provided by OSHA in the U.S.A. for other cartridge specific parameters. Lastly, in order for other models, such as OSHA, to be used, you may have to provide other pertinent data on the challenge agent which may be found on the MSDS or from the chemical manufacturer. These models can be found at **https://www.osha.gov/SLTC/etools/respiratory/index.html**

Moldex suggests that you use the OSHA models, or other means provided by others and OSHA. Moldex always recommends that you utilize the most conservative (shortest) breakthrough times. For more detailed information on these methods, refer to OSHA's website at: **https://www.osha.gov/SLTC/etools/respiratory/index.html**

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CARTRIDGE CHANGE OUT SCHEDULE WORKSHEET

Duties / Job Classification: _____

Location: _____

CHEMICAL INFORMATION
(FROM MSDS OR MANUFACTURER)

Chemical: _____

Exposure Limit: _____

Maximum Concentration: _____

Boiling Point: _____

Molecular Weight: _____

Liquid Density: _____

Vapor Pressure: _____

Molecular Polarization: _____

Refractive Index: _____

WORKSITE CONDITIONS

Maximum Expected Temperature (°C): _____

Expected Relative Humidity (%)*: _____

Work Rate: _____

Number of Shifts/Week: _____

Hours Cartridge Used/Shift: _____

DATA FOR #7100A AND #7600A CARTRIDGES

# of Cartridges:	2
#7100A Adsorbing Equivalent (grams):	42.5
#7100A & #7600A Cartridge Bed Height (cm):	2.18
#7600A Adsorbing Equivalent (grams):	36.0
#7100A & #7600A Bed Diameter (cm):	7.81

Service Life Estimate: _____

Basis Used: _____

Cartridge Change Out Schedule Every: _____ Hours: _____

After Each Shift: _____

Other: _____

This form may be used to assist you in developing a change out schedule when using #7100A or #7600A cartridges for protection against organic vapours. Be advised, this is simply a tool to help you collect some of the pertinent data in developing a change out schedule. It is your responsibility to ensure the accuracy of the schedules that you develop for each operation and work site.

*Moldex suggests that you use a range and use the lowest predicted breakthrough.

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DISCOS DE FILTRAGEM

DISCO DE FILTRAGEM COM ADAPTADOR DE ENCORAGEM/UNIDADE DO CARTUCHO (Fig. 10)
Antes de instalar o disco de filtragem Nº 7940R ou adaptador de encoragem Nº 7920, inspecione a superfície exterior a fim de garantir que a mesma esteja limpa e livre de danos e que a junta esteja em seu local. **(Fig. 9)** Empurre o adaptador de encoragem em direção ao cartucho até que ele se encaixe ao redor de todo o cartucho. Para conectar o cartucho na peça facial, alinhe os três entalhes do cartucho com as três saliências presentes na peça facial e gire firmemente no sentido horário até que o cartucho esteja travado na posição e não seja possível girá-lo mais. Verifique se a mesma está corretamente assentada, bem dentro quanto fora, e revelada na peça facial. Inspecione o adaptador de encoragem, anel de vedação e junta cada vez que o disco de filtragem for substituído. Caso a junta de vedação esteja quebrada, rachada ou danificada, substitua a junta no lado do adaptador de encoragem. Insira o disco de filtragem no adaptador de encoragem e gire no sentido horário até que o disco de filtragem esteja travado em sua posição e não seja possível girá-lo mais, e as duas superfícies estejam vedadas firmemente em todos os pontos. **(Fig. 9)** Verifique os diaflragmas de inalação em busca de poeira ou danos, e verifique se estão assentados adequadamente.

Aviso: Use somente o adaptador de encoragem Nº 7920 com os discos de filtragem Nº 7940R. **O não cumprimento de tais observações pode resultar em doença ou morte.**

PROTEÇÃO CONTRA RESPINGOS/FAGULHAS NO DISCO DE FILTRAGEM
O retentor Nº 8020R pode ser utilizado com os discos de filtragem Nº 7940R e Nº 7960R. Empurre a peça Nº 8020R contra o disco de filtragem até que ela encaixe corretamente no lugar. **(Fig. 11)**

VIDA ÚTIL DO DISCO DE FILTRAGEM
Deixe a área contaminada e substitua os filtros, discos ou cartuchos, caso eles sejam danificados, fiquem sujos, rasguem ou caso você experimente dificuldade para respirar. **Restrições de Utilização:** Onde for possível haver a presença de poeira ou danos no disco de filtragem, siga as