



ADP CLASS N-610 Fall Arrestor INSTRUCTIONS AND WARNING INFORMATION

USER MUST READ AND UNDERSTAND MANUFACTURER S INSTRUCTIONS FOR THIS PRODUCT AND PERSONAL FALL ARREST SYSTEMS. FAILURE TO DO SO COULD RESULT IN SERIOUS INJURY OR DEATH.

This instruction manual meets the manufacturer s instructions requirements of STANDARD CAN/CSA-Z259.2.1, and ANSI Z359.1(07)

! LIRE D'ABORD CET AVERTISSEMENT

Il est essentiel pour sa sécurité que l'utilisateur comprenne intégralement le présent guide avant d'utiliser le dispositif. Une mauvaise compréhension de ce guide peut entraîner un risque mortel. L'utilisateur qui ne comprend pas couramment l'anglais doit recevoir l'information équivalente d'un spécialiste de la sécurité ou de son superviseur.

! LEER ESTA ADVERTENCIA PRIMERO

Es necesario, para su propia seguridad, que el usuario lea y comprenda íntegramente este manual antes de utilizar el dispositivo. Si no se asimila bien este manual, puede tener como consecuencia riesgo mortal. Si el usuario no comprende suficientemente el inglés, es necesario que tenga la información equivalente por parte de un especialista en seguridad o de su responsable superior.

The N-610 rope grab is only part of a total fall protection system and the use of compatible hardware and components is mandatory. The system components must meet local, state, federal and provincial regulations before being incorporated in a personal fall protection system. It is imperative for the safety and efficiency of operations that this manual be read and fully understood by the worker before using any fall arrest system. ALL instructions contained herein must be carefully read and strictly followed for proper use and maintenance of the equipment. Alterations or misuse of this product, or failure to follow instructions can result in serious injury or death. If you have any concerns or questions, please contact YOKE.

**IN AN ENVIRONMENT WHERE A FALL HAZARD EXISTS,
SAFETY IS A MATTER OF LIFE OR DEATH FOR WORKERS AND BYSTANDERS.**

This instruction manual is intended to meet the Manufacturer s Instructions as required by ANSI and CSA and should be used as part of an employee training program as required by OSHA.

It is neither a regulations compliance guide nor a general training guide for fall arrest, work positioning or travel restraint systems. You must refer to instructions delivered by manufacturers of the pieces of equipment included in your system. Whenever calculations and specific installations are required, the worker should be professionally trained to that end and should secure relevant information prior to commencing such work.

FIRST READ THE FOLLOWING WARNINGS

PRIOR INFORMATION

I. It is the operator's responsibility, and their employer's responsibility, if they operate under an employer's control, to strictly conform to the following warnings and to the instructions in this manual.

II. It is imperative for safety and efficiency, that this manual be read and fully understood by the operator before using the N-610, and that all the instructions contained herein be followed accordingly.

III. This manual should be available at all times to all users. Keep these instructions handy for easy reference whenever required. Extra copies are available from YOKE.

IV. This fall arrest equipment must be placed under the authority of a competent person being fully aware of the applicable safety regulations for use, maintenance and control of the equipment.

V. Equipment associated with the use of the N-610 (constituting the complete fall arrest system), especially the harness, lanyard, lifeline and connecting equipment, must comply with applicable safety regulations, either local, state, federal and regional, and be compatible with one another and with the N-610 rope grab as described in this manual. YOKE denies liability for any incident due to non-compliance of components not sold or not recommended by YOKE.

VI. The lifeline rope to be associated with the N-610 must comply with requirements explained in this manual. Fatal hazard may result from using inadequate lifeline rope with the N-610. Proper measures for identification of rope must be permanently taken in the management of rope inventory in order to avoid using improper rope with the N-610.

TRAINING AND QUALIFICATION

VII. Do not use the N-610 unless properly trained. A fall could result in serious injury or death.

VIII. Health condition of the operator must be compatible with a possible fall arrest operation of the system used.

IX. Before operating, a worker should be :

- a) mentally and physically fit for the purpose, especially at heights or in confined spaces
- b) free from the influence of alcohol or drugs
- c) competent for the job to be performed
- d) familiar with the equipment and all applicable safety rules, regulations and requirements
- e) trained under safe conditions, for working under the above requirements

X. Training must be extended to maintenance and control. It must be carried out under safe conditions excluding risk of fall. The training of the operator must be extended to a proper rescue procedure which must be set up in writing under the authority in charge of the equipment by a competent person or technical consultant.

CONTROL AND MAINTENANCE

XI. The installation of the lifeline rope, and the fitting of the N-610 on it must be carried out under safe conditions according to the applicable local, state, federal and regional regulations.

XII. The installation of the lifeline must be completed by a competent person to check that the anchorage is adequate, according to the applicable safety regulations, and that it can safely bear the dynamic loads applied in case of fall arrest.

XIII. Every time the operator is to be connected on to the vertical

lifeline, inspect the rope grab and the associated equipment, specifically ensure the lifeline is in good condition, as explained in this manual. Never operate the equipment if damage is noted. Check that the anchoring of the lifeline is safe and adequate for the load and the type of operation, according to applicable regulations.

XIV. operator must be located in the vertical alignment of the vertical lifeline, in a safe and stable place for getting connected to the N-610, according to the applicable safety regulations.

XV. A careful and regular inspection of the N-610 and of the associated fall arrest equipment is part of the maintenance requirements for safe operation, especially under site conditions. Keep the N-610 and the lifeline clean and free from dirt. Check that the rope grab mechanism move properly and efficiently before each operating session.

XVI. YOKE. declines any responsibility for the consequences of dismantling or altering the N-610, or for altering the lifeline rope beyond description in this manual by anyone who is not authorised by YOKE. declines any responsibility for the consequence of repair having been carried out beyond its control.

XVII. Except for the operations described in this manual, the maintenance of YOKE equipment as well as repair, must be exclusively done by YOKE.

XVIII. Should the responsible authority decide that a fall arrest piece of equipment is no longer suitable for use, take precautions in disposing of it so that it cannot be re-used.

1. DESCRIPTION

This manual applies to the following Fall Arrestor Rope Grab, Class ADP

MODEL	DESCRIPTION
N-610 ADP	Rope Grab (Fall Arrestor)
Fall Arrestors is certified to CAN/CSA-Z259.2.1 class ADP when used with the following rope	
MCM Ropes & Rigging Ltd.	
Part# SLVLL58	
MCM Superline 16 mm	

They also meet the requirements of ANSI Z359.1(07)

These fall arresters are for use as part of a complete fall arrest system that must also include a CSA and/or ANSI approved full body harness, **MCM Superline Vertical Lifeline**, and a suitable anchorage and/or anchorage connector.

WARNING: Alteration or misuse of these rope grabs is forbidden and may result in serious injury or death.

If you have any questions on the operation, maintenance, or suitability of these rope grabs for your application, contact YOKE for Further instructions

2. CAPACITY

Each Fall Arrestor is limited to one person only with a maximum total combined weight of 310 lbs including tools and equipment.

3. MAXIMUM FREE FALL

When using the Fall Arrestor the maximum free fall distance must be no greater than 3ft., however, local regulations may limit the MFF to a lower value. Consult your local regulatory requirements. Always position the rope grab as high on the vertical lifeline as possible in order to minimize free fall distance.

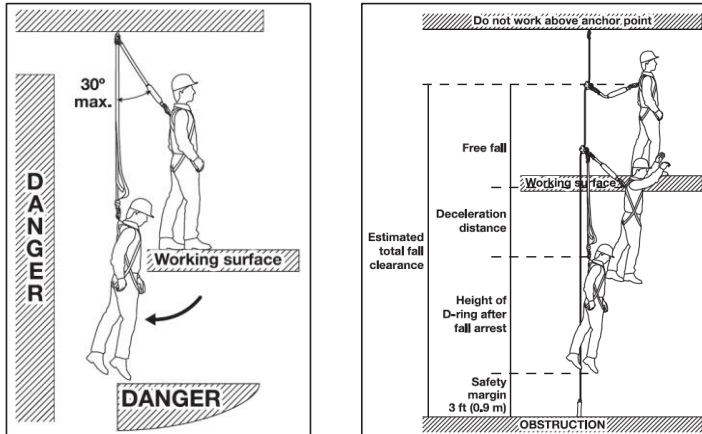
4. MAXIMUM ARREST DISTANCE

The maximum arrest distance of fall arresters is less than 1m (3.28ft) when tested in accordance with CAN/CSA-Z259.2.1

5. ANCHORAGE

5.1 Strength

Each Fall Arrestor must be connected to a vertical lifeline that is anchored to a suitable structure capable of resisting a static load of 3600 lbs (16 kN) if certified, or 5000 lbs (22.2 kN) if not certified. If more than one vertical lifeline is anchored to the structure, the structure must be capable of resisting static loads equal to the above values multiplied by the number of vertical lifelines attached to it.



Always work directly under the anchorage point to avoid a swing fall injury.

Every anchorage point must be selected with care. The anchorage point location, in combination with the lanyard, should never permit a free fall of more than 6 ft. (1.8 m). Always check for obstructions below the work area to make sure that the potential fall path is clear. When selecting an anchorage point, take into consideration that a deceleration device, such as a shock absorber, can elongate up to 42 in. (1.1 m) and the deceleration of the rope grab along the lifeline could be up to 39 in. (1 m).

5.2 Location

Select an anchorage that is located above the user. Do not work above the anchorage level as this increases free fall. Work as directly below the anchorage as possible to minimize swing fall hazards. Do not work more than 30 degree from the anchorage.

WARNING: The force of striking an object while swinging can be severe and may result in serious injury or death.

5.3 Stability

Anchorage must be solid, rigid and stable. Do not anchor to flexible structures or to mobile structures that could overturn when subjected to fall arrest forces. It is recommended that a professional engineer certify any anchorage on a mobile structure, and a strict lockout procedure must be in place to prevent unintentional operation/movement of the mobile structure.

6 CONNECTORS

It is recommended that only CAN/CSA-Z259.12 and/or ANSI Z359.12 approved connectors (double locking snap hooks, carabiners, etc) be used to connect the vertical lifeline to the anchorage or anchorage connector. Connectors must be compatible with the vertical lifeline, the anchorage, or anchorage connector in terms of size, shape, and strength. Non-compatible connectors may unintentionally disengage (roll-out).

7 INSPECTION AND MAINTENANCE

7.1 Before Each Use

The user of the rope grab must visually inspect the entire rope grab for any obvious signs of damage, deterioration or distress.

- Open unit and inspect all components. All components must be free of dirt or debris.
- Check components for damage or wear that may affect the free movement and/or operation of the mechanism. If in doubt of condition, do not use. Units with signs of any of the following check items should be removed from service and properly discarded.
- The upper tension roller should rotate and move freely in its slot under spring tension.
- Inspect gripping mechanism for proper operation by pivoting ring and gripper back and forth. Movement should be free and easy without binding. The spring resistance should be noticeable.
- The locking screw should thread easily and tighten against the body with body parts touching.
- The locking clip should rotate easily and pass over the detent and into the notch of the body with sufficient resistance to hold it in the locked position.
- The locking lever should have noticeable spring resistance to open and should easily spring back into the slot of the locking screw.
- Do not attempt to alter or repair any rope grab.
- All other components of the fall protection system attached to and used in conjunction with this rope grab should be inspected as per manufacturer's instruction, and be compatible.
- Record inspection results and keep on file. If in doubt about safety or condition of the unit, immediately have it inspected by a trained competent/qualified person or return it to YOKE or authorized agent for a detailed inspection.

7.2 Annual Inspection

An annual or more frequent inspection depending on usage must be performed by a trained and competent person other than the user. A written record of this inspection and approval for continued use should be kept in company records.

7.3 Maintenance

- Clean fall arrestor with water and mild soap. Wipe off with clean dry cloth. Low pressure compressed air may be used.
- Lubricate with light oil such as WD-40. Use a small amount of oil on pivot and roller bearing points. Wipe off excess oil from body and surfaces of the rollers so that oil is not transferred to the rope.

8. INSTALLATION AND USE

8.1 Installation N-610 Model Rope Grabs

- To open the fall arrestor, pivot the locking clip away from the body then turn locking screw counter-clockwise till disengaged then pivot open. Inspect as outlined in section 7.
- Position rope grab with arrow pointing up. On N-610 models the roller attached to hinge pin will be pointed down.
- Insert the lifeline. Only 5/8" (16mm) diameter **MCM** Superline rope (SLVLL58) should be used. (See lifeline section following.)
- Pivot the ring so that the gripper does not press against the rope then close the unit around the rope.
- Tighten the locking screw. It should thread easily and tighten against the rope grab body with body parts touching. Rotate the locking clip over the detent (dimple) into the notch in the body. It should move easily and be held in the locked position by a combination of the detent and bronze thrust washer. Be sure the screw is tight and clip is fully in the locked position.

DANGER: User only 5/8" rope specified in this manual. Use of any other rope or diameter is prohibited and would result in serious injury or death.

WARNING: These instructions must be provided to the user of the rope grab. It is the responsibility of the user to read and understand these instructions before using this equipment. Failure to do so could result in serious injury or death. Certified fall protection and product training is required before using this equipment and maybe also required by local Occupational Health and Safety.

8.2 Mobility Test

This rope grab was designed to function with a minimum of effort on a weighted co-polymer vertical lifeline. With the vertical lifeline held taught with a 6-10 lbs weight or by securing the lifeline at the bottom, move the rope grab upward by pulling up on the rope grab lanyard or shock absorber. The rope grab should move easily upwards. Move downward by lifting up on the lanyard or shock absorber enough to release the gripper and allow the weight of the unit to move the rope grab downwards. Repeat to ensure the freedom of movement.

If the rope grab does not move easily on the vertical lifeline, it may be due to the use of an unapproved or improper vertical lifeline, an aged or swollen lifeline, and/or a damaged rope grab. Re-inspect both components and replace any damaged or unapproved components.

WARNING: Do not use a fall arrestor on a vertical lifeline if the rope grab exhibits poor mobility as serious injury or death could result.

8.3 Lock Off Test

Test the fall arrestor installation by pulling down sharply on the lanyard or continuous energy absorbing lanyard to ensure that the mechanism locks onto the rope.

WARNING: When in use, do not reposition/move the unit by holding on to the body of the rope grab. If a worker should fall while holding the body of the rope grab, they may be restraining the locking mechanism, rendering it unable to arrest the fall. Serious injury or death could result. See diagrams 1 and 2.

8.5 VERTICAL LIFELINES

Fall arrestor have been tested and CSA approved for use with **MCM** Superline Vertical Lifelines, Part #SLVLL58

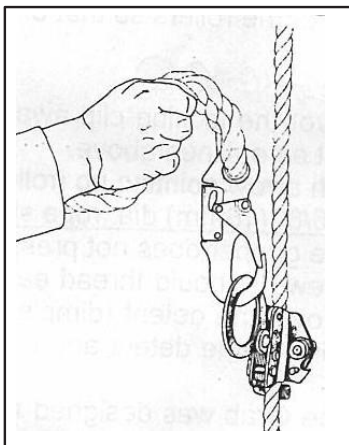


DIAGRAM 1
Correct repositioning of rope grab.

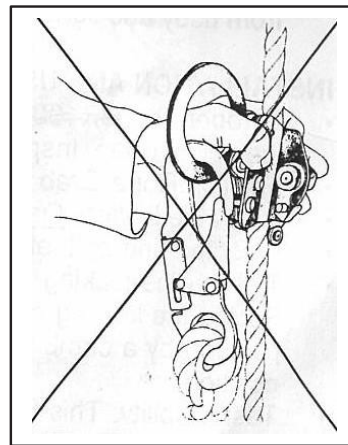


DIAGRAM 2
Incorrect repositioning of rope grab.

These vertical lifelines consist of 16 mm diameter, 3 strand co-polymer rope with a minimum breaking strength of 9425 Lbs. Refer rope instruction manuals for more details. Always inspect the vertical lifeline before each use in accordance with the instructions supplied with the rope. The bottom end of the lifeline must be terminated with a back splice or a figure eight knot, such that the rope grab cannot slide off.

9. ENVIRONMENTAL HAZARDS

Avoid use near sharp edges, abrasive surfaces, moving machinery and electrical hazards. Avoid exposure to harmful chemicals, heat and direct sunlight (UV rays).

WARNING: Fall Arrestor may not be suitable for use when the user is positioned on unstable surfaces that can flow such as fine grain or particulate material since the slow movement of the user in the flowing material may not be sufficient to lock off the rope grab.

10. AFTER A FALL

After a fall, the rope grab must be immediately removed from service and destroyed.

11. RESCUE

It is the responsibility of the user and purchaser of this equipment to ensure that a rescue plan is in place to immediately detect and safely retrieve a fallen worker

12. MANUFACTURER

For additional information, maintenance, inspection, and servicing contact:

YOKE®

YOKE INDUSTRIAL CORP.

#39, 33rd Road, Taichung Industrial Park,

Taichung 407, TAIWAN

Tel:+886-4-2350-8088

Fax:+886-4-2350-1001

E-mail: yoke777@ms74.hinet.net

<http://www.yoke.net>

An ISO 9001 Certified Company