

DL12 / DL14 / DB14 / DL17

User Manual



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Preface

Dear User,

We are delighted that you have chosen a LINAK® product.

LINAK systems are high-tech products based on many years of experience in the manufacture and development of actuators, lifting columns, desk frames, electric control boxes, controls, batteries, accessories and chargers.

This User Manual does not address the end user. It is intended as a source of information for the equipment or system manufacturer only, and it will tell you how to install, use and maintain your LINAK electronics. The manufacturer of the end product has the responsibility to provide a User Manual, where relevant safety information from this manual is passed on to the end user.

We are convinced that your LINAK product/system will give you many years of problem-free operation.

Before our products leave the factory, they undergo both function and quality testing. Should you, nevertheless, experience problems with your product/system, you are always welcome to contact your supplier.

LINAK subsidiaries and some distributors situated all over the world have authorised service centres, which are always ready to help you. Locate your local contact information on the back page.

LINAK provides a warranty on all products, see [Warranty](#).

This warranty, however, is subject to correct use in accordance with the specifications, maintenance being done correctly, and any repairs being carried out at a service centre, which is authorised to repair LINAK products.

Changes in installation and use of LINAK systems can affect their operation and durability. The products may only be opened by authorised personnel.

This User Manual has been written based on the present technical knowledge. LINAK reserves the right to carry out technical modifications and keeps the associated information updated.

LINAK A/S

Important safety information

Safe use of the system is possible only when this document is read completely and the instructions contained are strictly observed.

Failure to comply with instructions marked with the "NOTICE" symbol may result in serious damage to the system or one of its components.

Read all instructions before using this product.

Important safety information on LINAK® products can be found under the following heading(s):



DANGER

Failure to comply with these instructions will result in severe personal injury.



WARNING

Failure to comply with these instructions may result in severe personal injury.



CAUTION

Failure to comply with these instructions can result in minor personal injury.



NOTICE

Failure to comply with these instructions can result in property damage.

READ AND SAVE THESE INSTRUCTIONS

Informations importantes en matière de sécurité

Une utilisation sûre du système n'est possible que lorsque ce document est lu dans son intégralité et que les instructions qu'il contient sont strictement respectées.

Le non-respect des instructions marquées du symbole "AVIS" peut entraîner de graves dommages au système ou à l'un de ses composants.

Lisez toutes les instructions avant d'utiliser ce produit.

Des informations de sécurité importantes sur les produits LINAK® sont disponibles dans la ou les rubriques suivantes :



DANGER

Le non-respect de ces instructions entraînera des blessures graves.



AVERTISSEMENT

Le non-respect de ces instructions peut entraîner des blessures graves.



ATTENTION

Le non-respect de ces instructions peut entraîner des blessures corporelles légères.



AVIS

Le non-respect de ces instructions peut entraîner des dommages matériels.

LIRE ET CONSERVER CES INSTRUCTIONS

The DESKLINE® system

This system is a DESKLINE system developed for desks

Intended use

This product is intended for use indoors in household and commercial usage areas.

Parameter	Operation	Storage and transportation
Temperature	10 to 40 °C	-10 to +50 °C
Relative humidity	20% to 80% - non-condensing	20% to 80% - non-condensing
Atmospheric pressure	800 to 1060 hPa	700 to 1060 hPa
Altitude	Max. 2000 m	N/A



Do not use outdoors or in wet areas.



Do not use it in environments that have to be cleaned with aggressive detergents.

Warranty

The warranty terms for DESKLINE products are described in this warranty paper:

<https://cdn.linak.com/-/media/files/warranty/warranty-paper-deskline-eng.pdf>

Products

DESKLIFT™ columns

DL12



- 3-part inline column

DL14



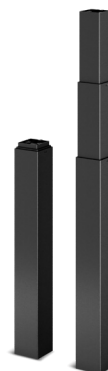
- 3-part inline column
- PLUS™ (option)

DB14



- 3-part inline actuator

DL17



- 3-part inline column

Control Box CBD6S

200 W



- 230 V AC, 50 Hz
- 120 V AC, 60 Hz

300 W



- 100-240 V AC, 50-60 Hz (universal)

Desk panels

With up/down drive	<ul style="list-style-type: none">• DPA• DPB• DPH	<ul style="list-style-type: none">• DP1K• DPF1K• DPG1K• DPI1K
With display	<ul style="list-style-type: none">• DPF1D	
With memory	<ul style="list-style-type: none">• DPF1M	<ul style="list-style-type: none">• DPG1M
With display and memory	<ul style="list-style-type: none">• DP1CS• DPT	<ul style="list-style-type: none">• DPF1C• DPG1C• DPI1C

Safety instructions

Important safety instructions

General



DANGER

Plugged-in products

Risk of electric shock

- Always unplug this product from the electrical outlet before assembling, disassembling, cleaning, or servicing.
- Only use the product indoors in dry locations.



WARNING

General precautions

Risk of burns, fire, electric shock, or injury to persons

- Unplug from outlet before putting on or taking off parts.
- It is important that everyone who is to connect, install, or use the systems has the necessary information and access to this User Manual. Follow the instructions for mounting - there is a risk of injury if these instructions are not followed.
- Close supervision is necessary when this product is used by or near children, invalids, or disabled persons.
- If there is visible damage to the product, do not install or use the product.
- Ensure that the cable and the plug are not damaged, and keep the cable away from heated surfaces.
- Use this product only for its intended use as described in this User Manual. Do not use attachments not recommended by the manufacturer.
- Never insert any object into any opening.
- During construction of applications in which the system is to be fitted, there must be no risk of personal injury, for example squeezing of fingers or arms.
- Do not open the product.



CAUTION

Objects above and below the application

Risk of personal injury and material damage

- Ensure free space above and below the application to avoid entrapment and blocking the movement in either direction.

Before installation, re-installation, cleaning, or troubleshooting

- Stop the system.
- Unplug the power cable.
- Relieve the system of any loads, which may be released during the work.
- Review the assembly instructions to confirm that the appropriate critical components and accessories are being used with this product.

Before start-up

- Make sure that the system has been installed as instructed in this User Manual.
- Make sure that the voltage of the system matches the mains voltage before connecting the system to the mains.
- Always use the supplied power cable.

During operation

- If the system makes unusual noise or smells, unplug the mains cable immediately.
- Observe the maximum load/self-lock (per column)

Column/actuator	Max. load (N)	Self-lock (N)
DL12 / DL14 / DB14 / DI17	700	700

- Duty cycle: 10%, max. 1 minutes continuous use at full load followed by 9 minutes pause.
- Take care that the cables are not damaged.



CAUTION

Load on the desk

Risk of injury to persons and of malfunction

- Do not overload the frame.
- Place heavy load centrally on the desk.
- Do not use the desk as a work bench.
- Do not use the frame for lifting persons.
- Do not stand on the desk while it is driving up or down.



NOTICE

Duty cycle

Risk of malfunction

- Do not exceed the duty cycle.

Repairs



WARNING

Opening the product

Risk of injury to persons

- Do not open the DESKLINE® product.

In order to avoid the risk of malfunction, all DESKLINE® repairs must only be carried out by authorised LINAK workshops or repairers, as special tools must be used and special gaskets must be fitted. Lifting units under warranty must also be returned to authorised LINAK workshops.



WARNING

- This appliance can be used by children aged from 8 years, and by persons with reduced physical, sensory or mental capabilities, or lack of experience and knowledge, if they have been given supervision or instruction concerning use of the appliance in a safe way and understand the hazards involved.
- Children shall not play with the appliance. Cleaning and user maintenance shall not be made by children without supervision.

Only for US and Canadian markets

- Persons who do not have the necessary experience or knowledge of the product/products must not use the product/products. Besides, persons with reduced physical, sensory, or mental abilities must not use the product/products, unless they are under surveillance or they have been thoroughly instructed in the use of the apparatus by a person who is responsible for the safety of these persons.
- Moreover, children must be under surveillance to ensure that they do not play with the product.
- It is the operator's responsibility to ensure that there is free space for the application to move without risk for the operator or bystanders before operating the application.

Consignes importantes de sécurité

Consignes importantes de sécurité

Général



DANGER

Produits enfichés

Risque de choc électrique

- Débranchez toujours ce produit de la prise électrique avant de l'assembler, de le démonter, de le nettoyer ou de l'entretenir.
- N'utilisez le produit qu'à l'intérieur, dans des endroits secs.



AVERTISSEMENT

Précautions générales

Risque de brûlures, d'incendie, d'électrocution ou de blessure des personnes

- Débrancher la prise de courant avant de mettre ou de retirer des pièces.
- Il est important que toutes les personnes chargées de connecter, d'installer ou d'utiliser les systèmes disposent des informations nécessaires et aient accès à ce manuel de l'utilisateur. Suivez les instructions de montage - risque de blessure en cas de non-respect de ces instructions.
- L'appareil n'est pas destiné à être utilisé par de jeunes enfants ou des personnes infirmes sans surveillance.
- Si le produit présente des dommages visibles, il ne doit pas être installé.
- Veillez à ce que le câble et la fiche ne soient pas endommagés et tenez le câble éloigné des surfaces chauffées.
- N'utilisez ce produit que pour l'usage auquel il est destiné, tel qu'il est décrit dans ce manuel de l'utilisateur.
N'utilisez pas d'accessoires non recommandés par le fabricant.
- N'insérez jamais d'objet dans une ouverture.
- Il convient de noter que lors de la construction des applications dans lesquelles l'actionneur doit être monté, il ne doit pas y avoir de risque de blessure, par exemple en cas d'écrasement des doigts ou des bras.
- N'ouvrez pas le produit.



ATTENTION

Objets au-dessus et au-dessous de l'application

Risque de blessures et de dommages matériels

- Veillez à ce qu'il y ait un espace libre au-dessus et au-dessous de l'application afin d'éviter tout risque de coincement et de blocage du mouvement dans l'une ou l'autre direction.

Avant l'installation, la réinstallation, le nettoyage ou le dépannage

- Arrêter le système.
- Débrancher le câble d'alimentation.
- Libérer le cadre de toute charge susceptible d'être libérée pendant les travaux.
- Examinez les instructions d'assemblage pour vous assurer que les composants et accessoires critiques appropriés sont utilisés avec ce produit.

Avant le démarrage

- Assurez-vous que le système a été installé conformément aux instructions du présent manuel de l'utilisateur.
- Assurez-vous que la tension du système correspond à la tension du réseau avant de raccorder le système au réseau.
- Utilisez toujours le câble d'alimentation fourni.

Pendant le fonctionnement

- Si le système émet des bruits ou des odeurs inhabituels, débranchez immédiatement le câble d'alimentation.
- Respecter la force de levage/autoblocage maximale (par colonne)

Colonne/ actionneur	Force de levage max. (N)	Autobloquant (N)	Moment de flexion
DL12 / DL14 / DB14 / DL17	800	800	Max. 100 Nm dynamique

- Cycle d'utilisation : 10 %, max. 2 minutes d'utilisation continue à pleine charge suivie de 18 minutes de pause.
- Veillez à ce que les câbles ne soient pas endommagés.



ATTENTION

Charge sur le bureau

Risque de dommages corporels et de dysfonctionnement

- Ne pas surcharger le cadre.
- Placer la charge lourde au centre du bureau.
- Ne pas utiliser le bureau comme table de travail.
- Ne pas utiliser le cadre pour soulever des personnes.
- Ne vous tenez pas debout sur le bureau pendant qu'il monte ou descend.



NOTICE

Cycle d'utilisation

Risque de dysfonctionnement

- Ne dépassez pas le cycle d'utilisation.

Réparations



AVERTISSEMENT

Ouverture du produit

Risque de blessure

- N'ouvrez pas le produit DESKLINE®.

Afin d'éviter tout risque de dysfonctionnement, toutes les réparations DESKLINE® doivent être effectuées exclusivement par des ateliers ou réparateurs agréés LINAK, car des outils spécifiques et des joints spéciaux doivent être installés. Les unités de levage sous garantie doivent également être retournées aux ateliers agréés LINAK.



AVERTISSEMENT

- Cet appareil peut-être utilisé par des enfants âgés de 8 ans et plus, ainsi que les personnes dont les capacités physiques, sensorielles ou mentales sont réduites ou ayant un manque d'expérience et de connaissance si elles ont bénéficié d'une surveillance ou d'instructions concernant l'utilisation de l'appareil en toute sécurité et compris les risques encourus.
- Les enfants ne doivent pas jouer avec l'appareil. Le nettoyage et l'entretien ne doivent pas être réalisés par des enfants sans surveillance

Seulement pour les marchés américains et canadiens

- Les personnes qui n'ont pas l'expérience ou les connaissances nécessaires sur le ou les produit(s) ne doivent pas le ou les utiliser. Par ailleurs, les personnes ayant des capacités physiques, sensorielles ou mentales réduites ne doivent pas utiliser le ou les produit(s), sauf si elles sont sous surveillance ou ont suivi une formation approfondie de l'utilisation de l'appareil par l'individu responsable de la sécurité de ces personnes.
- De plus, les enfants doivent-être sous surveillance afin de s'assurer qu'ils ne jouent pas avec le produit.
- Il est de la responsabilité de l'opérateur de s'assurer qu'il y a de l'espace libre pour que l'application puisse se déplacer sans risque pour l'opérateur ou les passants avant d'utiliser l'application.

Declaration of Conformity

LINAK A/S
Smedevænget 8
DK - 6430 Nordborg

hereby declares under our sole responsibility that LINAK DESKLINE® Actuator System, model: **CBD6S**, for use in elevation tables, composed of:

Control Box(s) CBD6Sa000b0A-c09,
(Where -a: can be P, C or H, -b: can be 2, 3 or 4 and -c: can be 0 or 7)

together with an optional combination of:

Linear Actuator(s) **LA31:** 31abcH-defff50S, (Where -a: can be 1, 3, 6 or 7; - b can be from 1 to 8, or A or B; - c can be from 0 to 4; - d can be 0 or 1; - e can be 0 or 1; - fff can be max 500)

Built in actuator(s) **DB5, DB6, DB14:** DBabbccdefghhhiii, (Where: - a: can be 5, 6 or 14;; - b: can be 0, 1, 3, 4 or 9; - c: can be 0, 1, B, L or S; - d: can be 0, 1 or 2; - e: can be 0, A, B or X; - f: can be 0, or A; - g: can be from 0, M, S, E, T or V; - hhh: can be from 000 to 675; - iii: can be from 000 to 630);

Lifting Column(s) **Standard columns:** DLabcdeffghhhiii, (Where: - a: can be 1A, 4S, 5, 6, from 8 to 12, from 14 to 21; - b: can be 0,1, 2, 3, 4 or 5; - c: can be 0, A, B, D, W or x; - d: can be 0, 1, L, R or X; - e: can be A, B, D or X; - f: can be 0, N, M, P or x; - g: can be 0, E, T or V; - hhh: can be from 600 to 1100; - iii: can be from 000 to 785);
DL12: DL12abcdeffggghhh (where - a can be A or B; - b can be 0 or E; -c can be 0, L, R or X; - d can be A, B, D or X; - e can be 0 or M; - f can be 0 or E; - ggg can be max 1100; - hhh can be max 785)
DL7: DL73a0b00470645 (where – a can be 0 or R; - b can be A, B, C or D)
DL2: DL2abCcdeffggg (where - a can be 3, 6 or 7; - b can be from 0 to 3; - c can be A or B; - d can be 0, F or G; -e can be from 0 to 7; -fff can be from 300 to 500; -ggg can be from 445 to 655)
DF2L: DF2La0000bcP0dddeee (Where -a: can be 05, 06, 18, 19; -b can be 0, V, H; -c can be A, B, D; -ddd can be from 500 to 665; eee can be from 475 to 602)
BASELIFT: BASE1000A0F100100
LC1: LC1aaaxxbbbb0cd0eee0Gf4+g (where -a can be 060 or 100; -xxx can be 200 to 665; -bbbb can be numbers or letters; -c can be 0, H or M; -d can be A, B or C; -eee can be from 275 to 560; -f can be 0, 1 or 2; and -g can be A or E.
EXPERIENCE™ columns: DLaaabccdeffghijklmnopppqqq, (Where: - aa: can be 05, 06,10,11,18,19, 20, 21; - b: can be F; - cc: can be 30; - d: can be 0; - e: can be 0; - ffff: can be any number or letter; - g: can be 0 or X; - h: can be 0 or X; - i: can be P; -j: can be 0; -k: can be 0 or 1; -l: can be 0 or Z; -m: can be 0; -n: can be 0; -o: can be 0 or E; -pppp: can be from 0278 to 1100; and -qqq: can be from 200 to 785.
DL14T: DL14T00X0E500630, where X can be B or D.

Desk Panel(s) DPA, DPB, DPH, DPF1K, DPF1M, DPF2K, DPF3K, DPF1C, DPF1D, DPF1U, DPF1W, DPF4T, DPG1K, DPG1M, DPG1B, DPG1C, DPT, DP1V01, DP1CS, DP1K, DP1U, DP2K, DP3K, DPN, DPWA, DPI-K, DPI-C

Accessories BLE2LIN (BLE2LIN002, BLE2LIN003), DESK SENSOR 1, USB2LIN, DCconnector, CHUSB, BA001, BP10BL

Complies with EMC Directive: **2014/30/EU** (*OJ L 96, 29.3.2014, p. 79–106*) according to following standards:
EN 61000-6-2:2005/AC:2005, EN 61000-6-3:2007/A1:2011/AC:2012
(and subsequent EN 61000-3-2:2014 and EN 61000-3-3:2013)

Complies with Low Voltage Directive **2014/35/EU** (*OJ L 96, 29.3.2014, p. 357–374*) according to the standard:
EN 60335-1:2012+AC:2014+A11:2014+A13:2017+A1:2019+A14:2019+A2:2019+A15:2021+A16:2023
EN 62233:2008 + AC:2008

Complies with Directive **2011/65/EU** of the European Parliament and of the Council of 8 June 2011 on the restriction of the use of certain hazardous substances in electrical and electronic equipment (*OJ L 174, 1.7.2011, p. 88–110*) and Directive **2015/863** (*OJ L 137, 4.6.2015, p. 10–12*) (amending Annex II to Directive 2011/65/EU) according to the standard:
EN IEC 63000:2018

Additionally, BA001 complies with Battery Regulation (EU) 2023/1542 Article 6.
And the applicable Desk Panels and Accessories complies with the Radio Equipment Directive **2014/53/EU** (*OJ L 153, 22.5.2014, p. 62–106*) according to the standards listed in the RED DoC for the individual radio products.

Where this product or system includes or is supplied with batteries, those batteries comply with the requirements of Regulation (EU) 2023/1542.

Other specification:

The system does also comply with the standard: EN 61000-6-2:2019 and EN 13849-1:2015 SRP/CS Cat. B, PL = b and SRESW PL = b, Note 1: Exempted CBD6S with SW03003007 printed on the label.

Nordborg, 2026-02-17

LINAK A/S

Dragan Macura

Regulatory Compliance Manager

Deskline and Homeline Segments

Authorized to compile the relevant technical documentation

Original Declaration 

Manufacturer's declaration

DECLARATION OF INCORPORATION OF PARTLY COMPLETED MACHINERY

LINAK A/S
Smedevænget 8
DK - 6430 Nordborg

Herewith declares that LINAK DESKLINE® products as characterized by the following models and types:

Control Boxes: CBD6Sa000b0A-c09 (Where -a: can be P, C or H, -b: can be 2, 3 or 4 and -c: can be 0 or 7)

Linear Actuators: LA31

Built in actuator(s): DB5, DB6, DB14,

Lifting Columns: DL1A, DL4S, DL2, DL5, DL6, DL7, DL8, DL9, DL10, DL11, DL12, DL14, DL15, DL16, DL17, DL18, DL19, DL20, DL21, LC1

Desk Panels: DPA, DPB, DPH, DPF1K, DPF1M, DPF2K, DPF3K, DPF1C, DPF1D, DPF1U, DPF1W, DPF4T, DPG1K, DPG1M, DPG1B, DPG1C, DPT, DP1V01, DP1CS, DP1K, DP1U, DP2K, DP3K, DPN, DPWA, DPI-K, DPI-C

Accessories: BLE2LIN002, BLE2LIN003, DESK SENSOR 1, USB2LIN, DCConnector, BA001

complies with the following parts of the Machinery Directive 2006/42/EC, ANNEX I, *Essential health and safety requirements relating to the design and construction of machinery*:

- 1.1.2 a) Special use*
- 1.1.2 b) Selection of the most appropriate methods*
- 1.1.2 c) Foreseeable misuse*
- 1.1.2 d) Operator constraints due to the use of personal protective equipment*

1.1.3 Materials and products*

- 1.2.1 Safety and reliability of control systems
- 1.2.2 Control devices. Shape, readability, overview*
- 1.2.3 Starting*
- 1.2.4 Stopping*

- 1.5.1 Electricity supply
- 1.5.10 Radiation. EMC. Emission of electromagnetic radiation, X-rays, γ -rays*
- 1.5.11 External radiation*

*need to be further evaluated in the end product

We confirm that prior to market introduction the relevant technical documentation is compiled in accordance with part B of Annex VII and the assembly instruction pursuant to Annex VI.

This documentation or part hereof will be transmitted by post or electronically to a reasoned request by the national authorities.

The products mentioned in this document are to be combined for use in height adjustable furniture.

This partly completed machinery must not be put into service until the final machinery into which it is to be incorporated has been declared in conformity with the provisions of the Machinery Directive 2006/42/EC where appropriate.

Nordborg, 2024-02-21

LINAK A/S
Dragan Macura
Regulatory Compliance Manager
Deskline and Homeline Segments
Authorized to compile the relevant technical documentation

Original Declaration

Installation



WARNING

Plastic bags

Risk of suffocation

- Keep the plastic bags away from babies and children.



Do not bolt the columns to the floor so that free movement is obstructed. This could cause serious damage to the columns in fault situations.

DL12

Mounting the column

Motor housing adapter, mounted (optional)

The DL12 column can be ordered with a motor-housing adapter, either pre-mounted or as a separate part.

The motor housing adapter has six M6 threaded holes for mounting on the top frame and four M6 threaded holes for mounting on the column top – if not pre-mounted.



Mounting the motor-housing adapter on the column top

1. Mount the motor-housing adapter on the column top using four M6 x 16 mm screws (min. grade 8.8).
2. Fasten the screws thoroughly (torque: max. 10 Nm).

Mounting the motor-housing adapter on the top frame

1. Mount the motor-housing adapter on the top frame using six M6 screws with the following specifications:
 Quality: Min. grade 8.8
 Length: Min. 12 mm (plus top frame thickness)
 Max. 16 mm (plus top frame thickness)
2. Fasten the screws thoroughly (torque: max. 7.5 Nm).

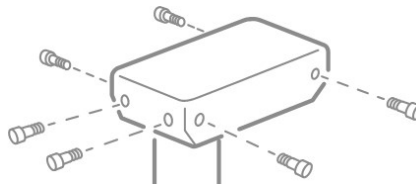


Figure 1 Always use six M6 screws for mounting the motor housing on the top frame



Sufficient stability of the desk is only obtained if all six M6 bolts are used for mounting the motor housing on the top frame. Tests with fixing the motor housing using only four M6 screws have proved that the torsional stability of the desk this is insufficient.

Mounting the top

The DL12 top has four M6 threaded holes for mounting onto the top frame.

1. Mount the column top on the top frame using four M6 screws with the following specifications:
Quality: Min. grade 8.8
Length: Min. 12 mm (plus top frame thickness)
Max. 16 mm (plus top frame thickness)
2. Fasten the screws thoroughly (torque: max. 10 Nm).

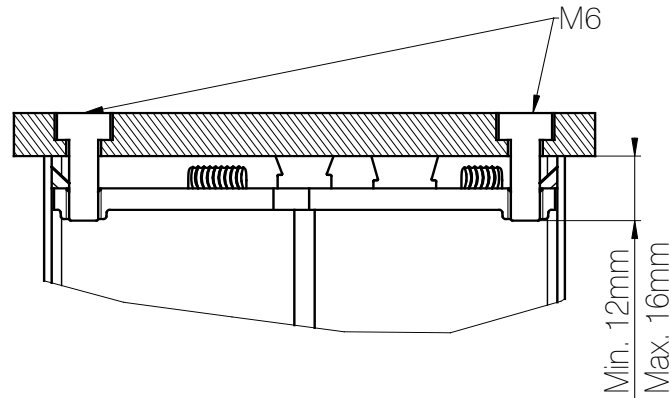


Figure 2 Column top mounted on desk frame

Mounting the foot

The DL12 bottom plate has four M6 threaded holes.

1. Mount the column bottom on the desk feet using four M6 screws with the following specifications:
Quality: Min. grade 8.8
Length: Min. 12 mm (plus foot thickness)
Max. 16 mm (plus foot thickness)
2. Fasten the screws thoroughly (torque: max. 10 Nm).

The holes in the foot must be sufficiently larger than $\varnothing 6$ to ensure space for the screw heads to be screwed fully into the foot.

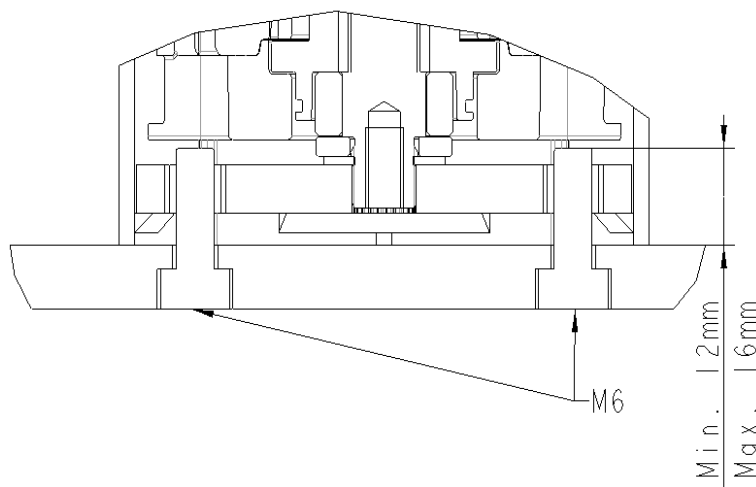


Figure 3 Column bottom mounted on foot

DL14

Mounting the top

The column top has four M6 threaded holes for mounting onto the top frame.

1. Mount the column top on the top frame using four M6 screws or two M8 screws with the following specifications:
Quality: Min. grade 8.8
Length: Min. 9 mm (plus top frame thickness)
Max. 14 mm (plus top frame thickness)
2. Fasten the screws thoroughly (torque: max. 10 Nm).

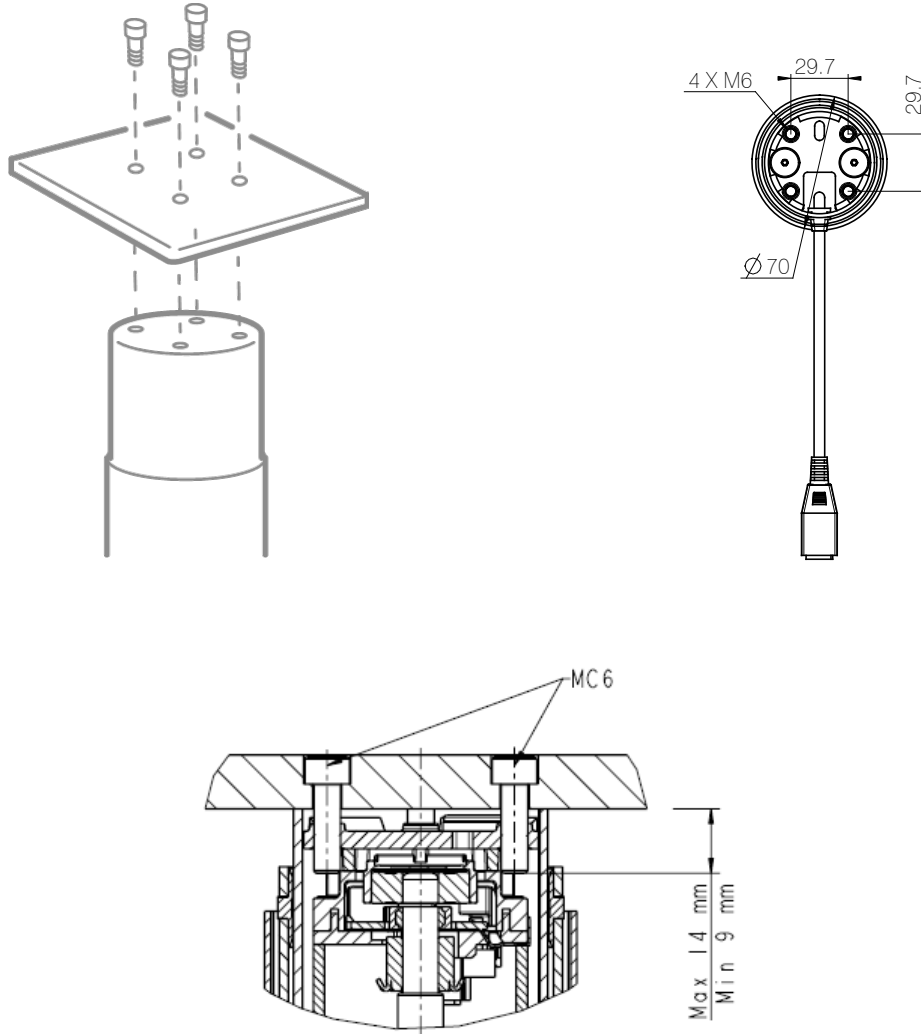


Figure 4 Column top mounted on top frame

Mounting the foot

The DL14 bottom plate has four M6 and two M8 threaded holes.

1. Mount the column bottom on the desk feet using four M6 screws with the following specifications:
Quality: Min. grade 8.8
Length: Min. 10 mm (plus foot thickness)
Max. 16 mm (plus foot thickness)
2. Fasten the screws thoroughly (torque: max. 10 Nm).

The holes in the foot must be sufficiently larger than $\varnothing 6/\varnothing 8$ ensure space for the screw heads to be screwed fully into the foot.

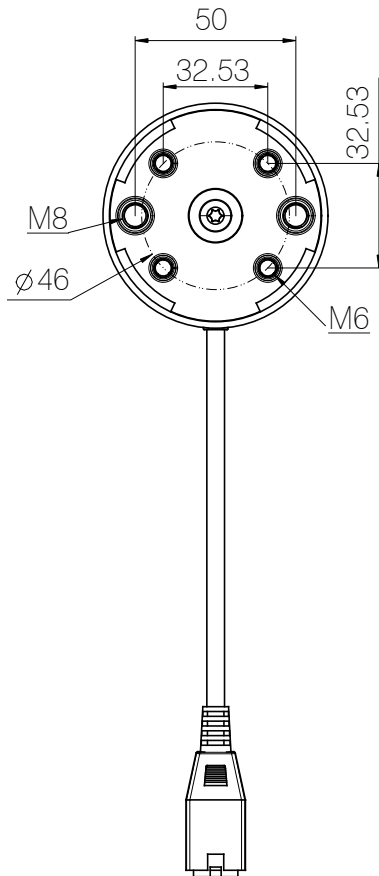


Figure 5 Bottom plate

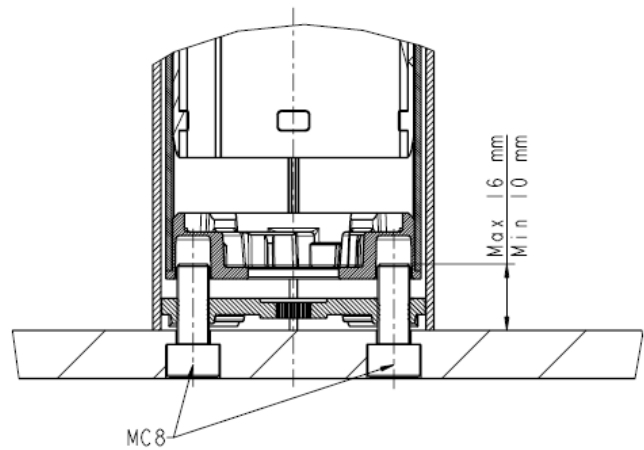


Figure 6 Mounted with two M8 screws

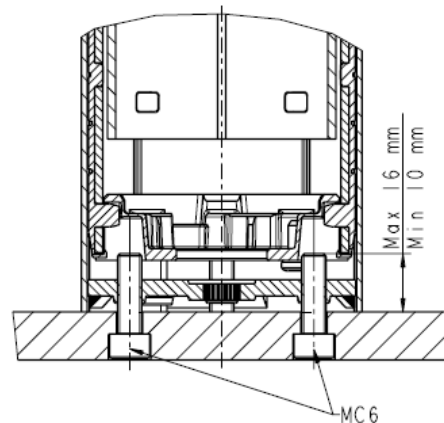
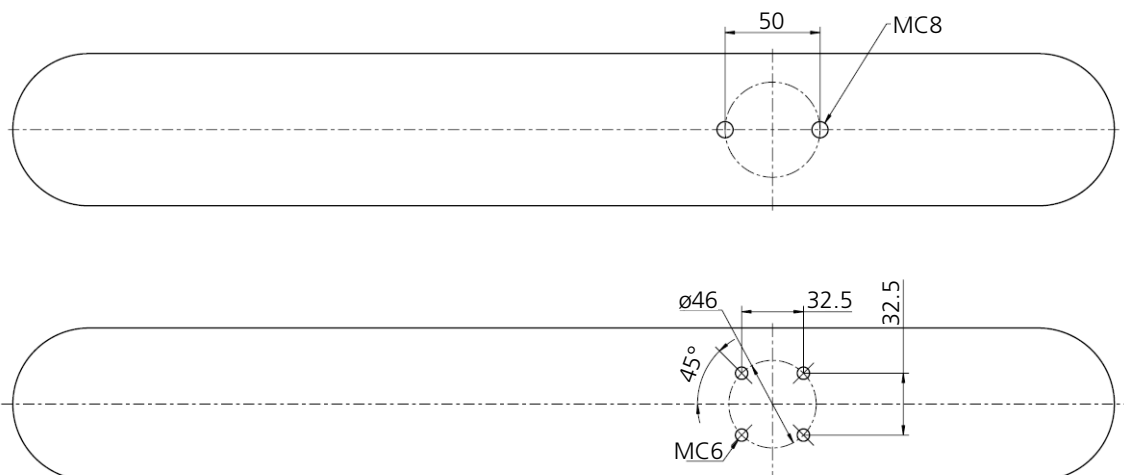


Figure 7 Mounted with four M6 screws



DB14

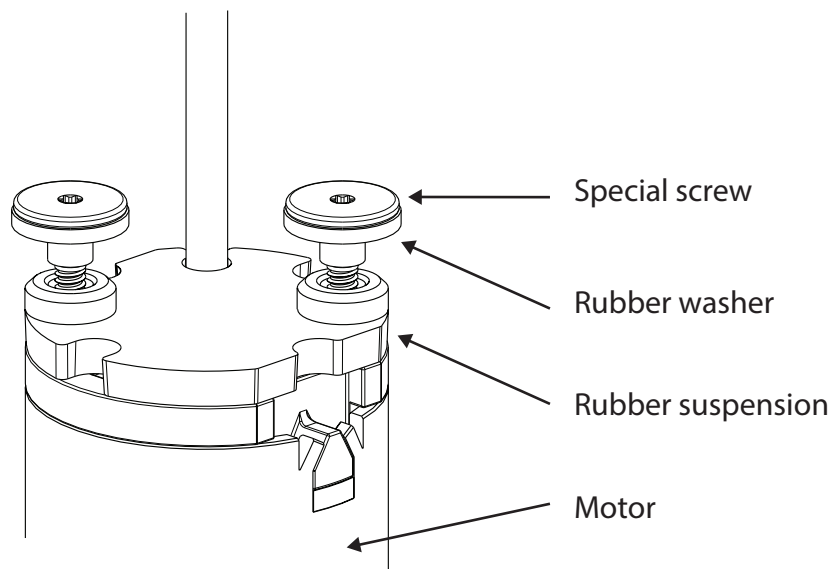
For detailed information on how to mount the DB14, please contact your local LINAK® office.

Example of an assembled DESKLINE® system

**Mounting the top**

The top of the motor is supplied with holes for the self-tapping special screws.

On the top of the motor there is the special rubber suspension, which should always be used when the DB14 is mounted in a column. The rubber suspension is grey; a grey rubber suspension means no PIEZO. The top flange onto which the motor is mounted must be 4 mm thick ± 0.1 mm, and the two mounting holes should be $\varnothing 12$ mm with a centre distance of 36 mm. The torque is 2 Nm ± 0.1 Nm.



Mounting the middle tube



The DB14 gives the possibility of synchronous drive of the middle profile. To make sure that the profiles are in the right place, you have to ensure that both the hollow and the solid spindle are driven into end position. For detailed information on how to mount the middle tube of your column, please contact DESKLINE Technical Support at LINAK A/S.

Mounting the bottom

At the bottom of the DB14 the inner spindle should be mounted by means of a 22 teeth spline profile and an M5 screw in the bottom of the spindle. Max. torque: 2.3 Nm.

The bottom plate should have a groove for the locking ring.

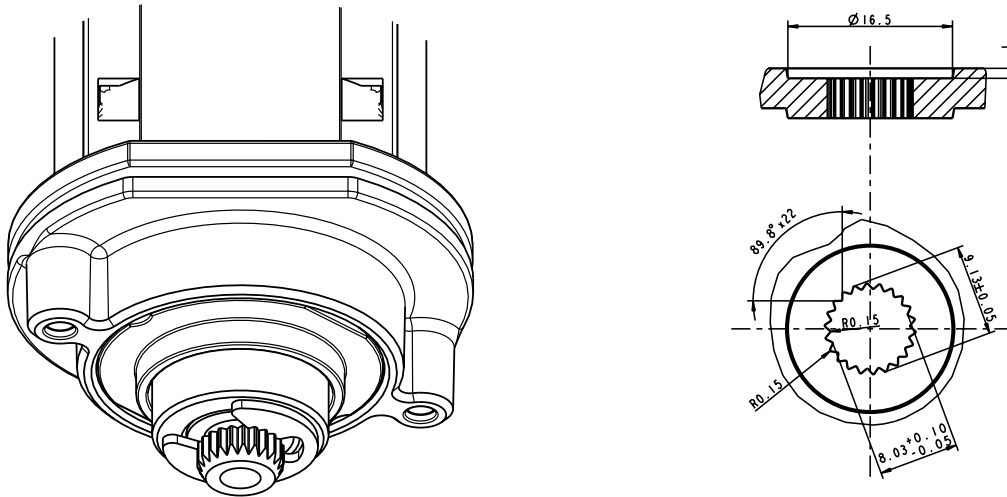


Figure 8 Bottom plate with groove and spline

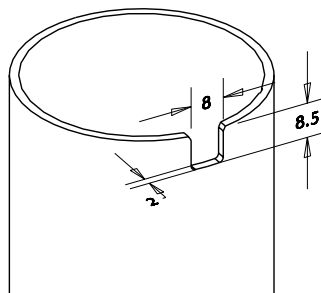


Figure 9 A cut-out in the inner profile is required for cable relief.



From the factory, the DB14 is delivered with the hollow spindle driven into end position. Please observe that the solid spindle may roll out during transportation/handling, but it must be rolled back to end position before being mounted in the profile.



Do not drive the DB14 to the outer end position before mounting. This will damage the DB.

DL17

Mounting the column

The column top is supplied with four M6 threaded holes for mounting onto the top frame.

1. Mount the column top on the top frame using four M6 screws with the following specifications:
Quality: Min. grade 8.8
Length: Min. 10 mm (plus top frame thickness)
Max. 14 mm (plus top frame thickness)
2. Fasten the screws thoroughly (torque: max. 10 Nm).

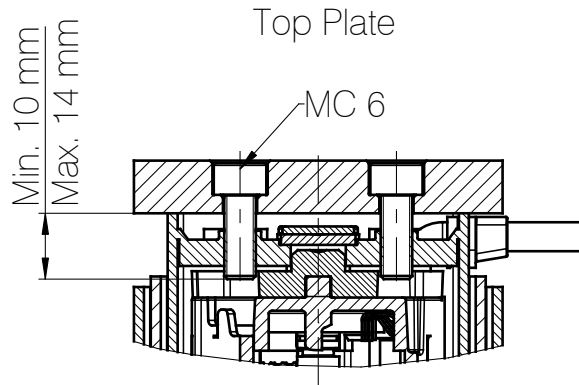


Figure 10 Column top mounted on desk frame

Mounting the feet

The bottom plate is supplied with four M6 and two M8 threaded holes.

1. Mount the column bottom on the desk feet using four M6 screws or two M8 screws with the following specifications:
Quality: Min. grade 8.8
Length: Min. 10 mm (plus desk feet thickness)
Max. 16 mm (plus desk feet thickness)
2. Fasten the screws thoroughly (torque: max. 10 Nm).

The holes in the foot must be sufficiently larger than $\varnothing 6/\varnothing 8$ to enable levelling of the assembled desk.

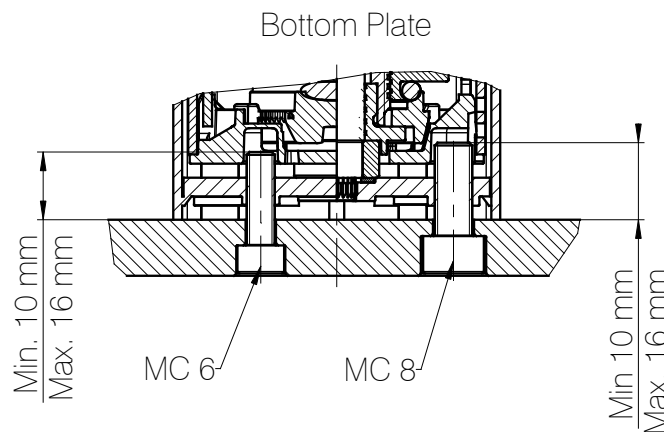


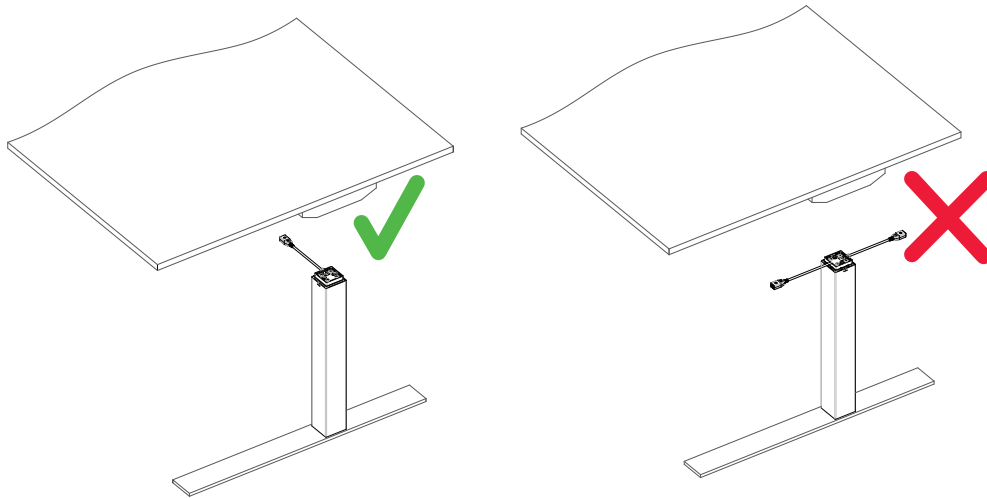
Figure 11 Column bottom mounted on desk feet

Column orientation

DL17



We recommend orienting the column so that the cable is pointing towards the centre of the desk. Please ensure to mount the feet correspondingly.



Mounting the tabletop

The sound from the lifting column spreads as vibrations to the tabletop which amplifies the sound. This can, however, be reduced.

1. Place vibration/shock-absorbing material between tabletop and top frame.

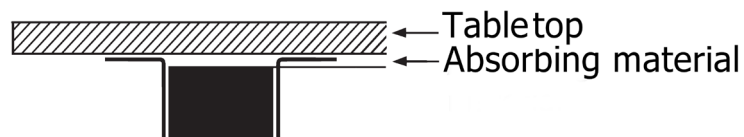


Figure 12 Assembled desk

Placing the monitor

Placement of a monitor directly above the motor housing may cause malfunction of the monitor. Magnets inside the motor may interrupt the picture on the monitor depending on the distance and type of monitor. If this is the case, the problem may be solved by placing an iron plate/tube or another magnetic material, somewhat larger than the motor housing, between the motor and the tabletop.

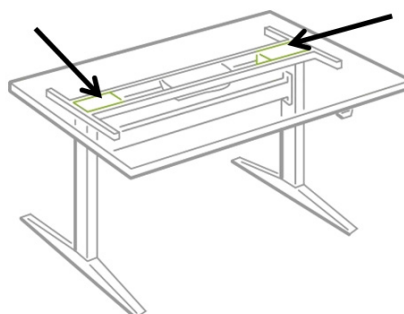


Figure 13 Recommended placement of an iron plate/tube or another magnetic material

Mounting the CBD6S



Do not pack the CBD6S in heat-insulating material.
Place the CBD6S so it can emit heat through its surface to the surroundings.

1. Plug the mains cable into the CBD6S.
2. Place the mains cable in the groove for cable relief.



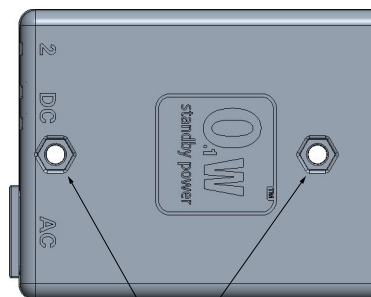
3. If needed, place the other cables in the grooves to optimise the desk design and manage the system cables.



4. Mount the CBD6S using two screws with a head diameter of 10 mm (8 to 10 mm can be used).
5. Fasten the mounting screws (max. torque 1 Nm).

Notes:

- If the control box is mounted in a top frame bar with the width of the motor housing, it can be mounted with only one screw
- The surface on which the control box is mounted should have an evenness better than ± 0.5 mm
- The control box can also be mounted using one or two M6 nuts and screw counterparts



Hexagon (M6 nuts)

- The mains plug must be accessible when the CBD6S is mounted so that the supply to the CBD6S can be disconnected if replacement is required



The builder of the equipment shall ensure that the use of the component complies with relevant standards – such as the Machine Directive. Care must be taken to avoid squeezing of cables as it can cause movement of the system!

Electrical connection



The control box must only be connected to the voltage stated on the label.



It is important to ensure that the motor cables are fixed, but not tightened, near the control box **and** near the columns.

Fix the cable to the tabletop using a clip observing the **30 mm minimum bending radius (R)**.



Connecting the system

1. Connect the first DL/DB to socket 1 next to control port A2 on the control box using the 6-pin plug on the motor cable. Channel 1 is the channel closest to the control port.
2. Connect further DL/DB to sockets 2, 3 and 4 in sequence.
3. Connect the desk panel to control port A1 or control port A2.
4. Check that the voltage stated on the label corresponds to the mains power. If not, do not plug in the mains cable.
5. Plug in the mains cable.
6. Switch on the power.

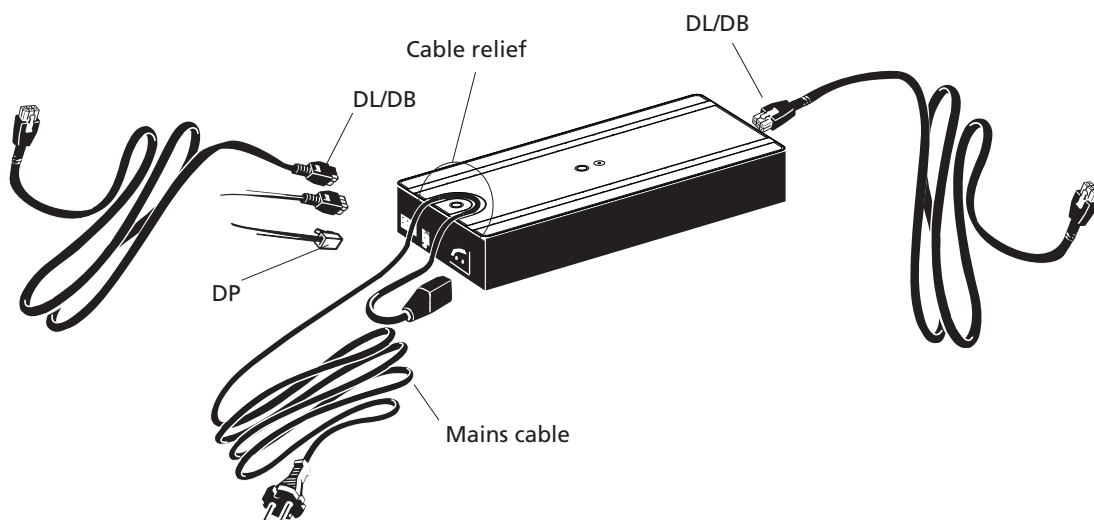


Figure 14 Connection overview

Initialising the system

Downward direction

1. Press the desk panel to drive the desk down. Keep pressing the desk panel. The legs/actuators run down to the “buffer” causing cut-off due to excess current, after which they run approx. 3 mm upwards and thereby free of the “buffer”.
2. Release the desk panel when the movement stops.

The system is now initialised in downward direction.

Upward direction

PIEZO columns (IID):

No initialisation in upward direction required.

Non-PIEZO columns (no IID):

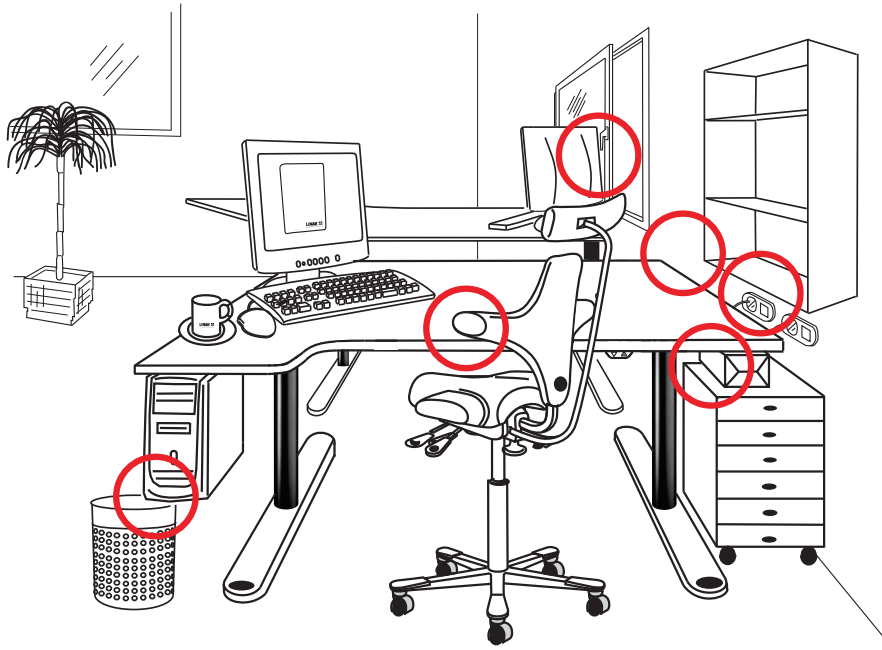
The first two times the system moves into end stop in upward direction, the system runs approximately 5 mm back to initialise in upward direction.

Operation

For operation of the DESKLINE® system, please refer to the relevant desk panel operating guide which is available on our website: <https://www.linak.com/user-manuals/deskline/>

Anti-collision

When using height-adjustable desks there is always a risk of driving the desk into an object – solid or soft. This could cause damage to the desk or the object or – if the desk tilts – damage to computers, monitors, and other objects placed on or close to the desk.



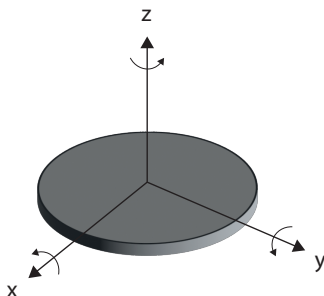
There are various ways to protect the desk from being damaged when driven into such objects. This feature is called an anti-collision system. To a certain extent, this feature also increases the personal safety, but it does not comply with the legislation covering personal safety.

The way to minimise the damage to a desk is fast detection of a collision with an object followed by reverse driving of the desk.

Anti-collision systems

LINAK® offers two types:

- Gyroscopic sensor
- Piezo-electric sensor



Gyroscope

The gyroscopic sensor reacts on even the smallest tilting in any direction with respect to its position at the beginning of the desk drive. When the desk runs into an object, the tabletop will start tilting and the gyroscopic sensor detects a collision.



DPI



DPF



DS1

Troubleshooting

The gyroscopic sensor is very sensitive and may cause false triggering if not mounted correctly.

To achieve the best possible performance of the gyroscopic sensor, please observe the following:

DS1:

Install the DS1 on the tabletop via either a CBD6S or a T-splitter.

Desk panels:

Mount the desk panel on a surface that is flat and without any bulges.

Mount the desk panel on a hard surface.

Do not place soft material between the tabletop surface and the desk panel.

In case of false triggering, please check this list:

- Make sure that the control box or T-splitter is fixed securely to the table (only relevant for DS1).
- Make sure the cables connected next to the DS1 in the control box or T-splitter are fastened thoroughly and **cannot** touch the DS1.
- If the desk is unstable, it may result in false triggering. Make sure the desk is stable and cannot tilt back and forth by adjusting the screws under the feet.
- Make sure that no objects, such as cables or furniture under the desk, can stop the driving up or down of the desk.
- If none of the above helps:
 - unplug the DS1/desk panel
 - wait 10 seconds
 - plug the DS1/desk panel back in

Piezo-electric sensor

The piezo-electric sensor is an integrated electronic sensor, which reacts on load changes. If the desk drives into an obstacle, the load changes. This load change is picked up by the piezo-electric sensor and the signal is sent to the control box.



Do not use the DL column with PIEZO in combination with a crossbar or a foot construction where you place the column in a tube welded on the foot.

Maintenance

Clean dust and dirt from the outside of the system at appropriate intervals and inspect for damage and breaks.

Inspect connections, cables, and plugs without disconnecting, and check functioning as well as fixing points.



CAUTION

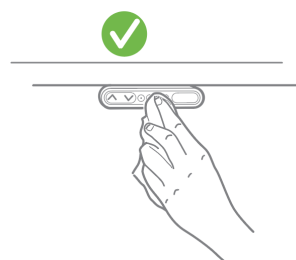
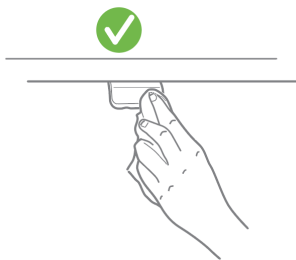
Loose screws

Risk of loss of stability

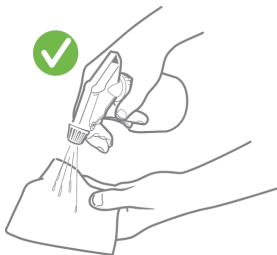
- Check for loose screws on a regular basis. Fasten if necessary.

Cleaning the desk panel

Clean your desk panel with a soft damp cloth. Universal cleaning detergents may be used.



For disinfection of the desk panel, use a 70 percent isopropyl alcohol either as a wipe or add a small amount to a soft cloth.

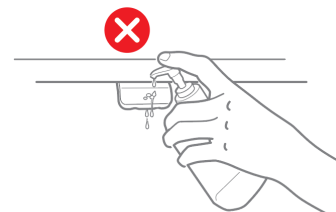
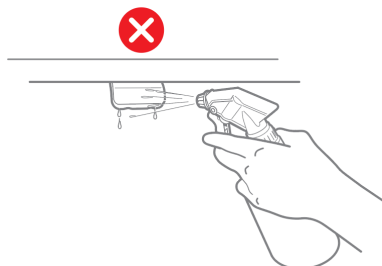


CAUTION

Risk of damaging the desk panel

The desk panel is not a sealed unit and there are electronics inside it.

- Ensure that liquids or moisture does not enter an opening. It may damage the PCB and ruin the desk panel.
- Avoid spraying the cleaning agent or disinfectant directly on the desk panel.



- Cleaning agents and disinfectants must not be highly alkaline or acidic (pH value must be 6 to 8), and they must not contain bleach or chlorine.
- Do not use hand sanitizer gel as a cleaning agent.

Repair and disposal



WARNING

Opening the product

Risk of injury to persons and of malfunction

- Do not open the product unless you are authorised to do so.

Only an authorised LINAK® service centre should repair the LINAK products. Products to be repaired under warranty must be sent to an authorised LINAK service centre.

In order to avoid the risk of malfunction, all product repairs must only be carried out by an authorised LINAK Service shop or repairers, as special tools and parts must be used.


If a product is opened by unauthorised personnel there is a risk that it may malfunction at a later date.

LINAK systems or components may be disposed of, possibly by dividing them into different waste groups for recycling or combustion.

We recommend that our product is disassembled as much as possible at the disposal and that you try to recycle it. LINAK systems or components should be disposed of in accordance with the environmental regulations applicable in the respective country.

Almost all our cast plastic parts are supplied with an interior code for plastic type and fibre contents, if any.

Servicing double-insulated products

In a double-insulated product, two systems of insulation are provided instead of grounding. No grounding means is provided on a double-insulated product, nor is means for grounding to be added to the product. Servicing a double-insulated product requires extreme care and knowledge of the system, and is to be done only by qualified service personnel. Replacement parts for a double-insulated product must be identical to the parts they replace. A double-insulated product is marked with the words "Double insulation" or "Double insulated." The symbol  (square within a square) can also be marked on the product.

Updated manuals and declarations can always be found at:
<https://www.linak.com/user-manuals/deskline/>.

Accessories and spare parts

Accessories

Order from your nearest LINAK® sales office, distributor or subsidiary.

Spare parts

Please contact your nearest LINAK sales office for information on spare parts.

Contacts

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