

# Operating Instructions

## REOVIB Vibratory Magnets

## Table of Contents

<b>Safety Instructions for the User .....</b>	<b>3</b>
<b>Applied directives and harmonized standards .....</b>	<b>11</b>
<b>Changes and Copyright .....</b>	<b>12</b>
<b>1.0 General .....</b>	<b>12</b>
1.1 Product applicability and scope of this document .....	12
<b>2.0 Functional Description .....</b>	<b>13</b>
2.1 Intended use .....	13
2.2 Improper use .....	13
<b>3.0 Technical Data .....</b>	<b>14</b>
3.1 Climate category (IEC 60068-1) .....	14
<b>4.0 Transport and storage .....</b>	<b>15</b>
4.1 Transport .....	15
4.2 Storage / storage conditions .....	15
<b>5.0 Assembly / Installation / Commissioning .....</b>	<b>16</b>
5.1 General information .....	16
5.2 Assembly .....	16
5.2.1 Safety rules .....	16
5.2.2 Electrical connection .....	16
5.2.3 Mechanical installation .....	17
5.2.4 Cable routing .....	17
5.2.5 Grounding .....	17
<b>6.0 Operation .....</b>	<b>17</b>
<b>7.0 Cleaning / Maintenance / Servicing .....</b>	<b>17</b>
<b>8.0 Malfunctions and Troubleshooting .....</b>	<b>18</b>
8.1 Possible malfunctions .....	18
8.2 Behavior in case of malfunctions .....	18
<b>9.0 Disassembly and Disposal .....</b>	<b>19</b>
9.1 Safety during disposal .....	19
9.2 Disposal .....	19

### Important Note!

#### READ CAREFULLY BEFORE USE AND KEEP FOR FUTURE REFERENCE

These instructions contain all the information required for the proper use of the products described. They are intended exclusively for qualified personnel.

Qualified personnel are persons who, due to their professional training, experience, and instruction in the specific field of drive and electrical engineering, as well as their knowledge of relevant standards, regulations, accident prevention regulations, and operational procedures, have been commissioned by the operator to perform the necessary tasks. These persons must be able to recognize potential dangers and implement appropriate protective measures. Definition of qualified personnel is contained in VDE 1000-10; DIN EN 50110-1 (VDE 0105-1).

It must be ensured that all basic planning work on the machine or system, as well as all activities related to transport, assembly, installation, commissioning, maintenance, and repair, are carried out by qualified personnel or supervised by appropriately responsible specialists.

The following points in particular must be observed:

### Safety Instructions for Assembly and Commissioning

The following instructions must be observed during all work related to assembly, installation, commissioning, maintenance, and repair:

- **Compliance with technical data and permissible areas of application**, as specified in catalogs, order documents, type plates, and product labels, for example.
- **Observe general installation and safety regulations**, in particular the applicable standards (e.g., VDE regulations, DIN standards) and legal requirements.
- **Take local and system-specific requirements into account**, in particular with regard to electrical protective measures, ambient conditions, and access regulations.
- **Professional use of suitable tools and lifting and transport equipment** to prevent damage and dangers.
- **Use of personal protective equipment (PPE)** in accordance with the applicable occupational safety regulations.
- **Compliance with the specified installation conditions**, in particular:
  - Ensuring the necessary protection against contact during operation,
  - Protection against electric shock caused by unintentional touch (e.g., covers).

## General Safety Instructions

The following instructions are intended to protect operating personnel and ensure the safety of the products described and all connected equipment.

Compliance with these safety instructions is essential to prevent personal injury and property damage and to ensure safe, standards-compliant operation.



**DANGER!** — Risk of death, highest level of hazard.



**WARNING!** — Medium hazard, risk of serious injury or damage.



**CAUTION!** — Lower hazard, minor injury, property damage, or malfunctions.



**ATTENTION!** — Hot surface.

### Warning:

Improper handling of electrical energy can result in property damage, serious personal injury, or fatal accidents.



### DANGER!


#### Dangerous voltage - risk of fatal electric shock!

Improper contact with the connection terminals or supply conductors may result in electric shock. Improper use may cause short circuit, fire, or other serious damage.

#### Safety measures:

- The REOVIB vibration magnet must not be opened, disassembled, or modified.
- Any use deviating from the intended use specified in this document is prohibited.






**⚠ DANGER!**

**Risk of fatal electric shock caused by interrupted protective conductor**

During operation of REOVIB vibration magnets, increased leakage currents to earth may occur. If the protective conductor (PE) is interrupted, safe discharge cannot be ensured. This may result in hazardous touch voltages on metallic parts.

**Safety measures:**

- The protective conductor (PE) must always be connected first and must not be interrupted during operation.
- During deinstallation, the PE connection must be disconnected last.
- Installation and maintenance may only be carried out by qualified personnel.




**⚠ DANGER!**

**Risk of fatal electric shock during installation and connection**

Electric shock resulting in severe injury or death, as well as destruction of the device or damage to adjacent systems, may occur if the device is installed or connected while energized or without proper grounding.

**Safety measures:**

- Install or connect the device only when it is de-energized and properly grounded.
- Before starting work, verify absence of voltage and secure the system against re-energization.
- During electrical connection, always connect the protective conductor (PE) first and disconnect it last.
- Installation and maintenance may only be carried out by qualified personnel.




**WARNING!**

**Device overload**

The overload capacity of REOVIB vibration magnets is limited. Overloads exceeding the specified limits are not permitted. Non-permissible overload conditions may result in serious injury or property damage.

**Safety measures:**

- Maximum **1.5 × rated current** for one minute per hour.
- REOVIB vibration magnets must be protected against short circuits and overload by suitable devices.




**WARNING!**

**Risk of injury from hot surfaces**

Surfaces and terminals of REOVIB vibration magnets may become hot due to internal power losses. Contact may result in burns.

**Safety measures:**

- Touch the device only after it has cooled down or wear appropriate personal protective equipment.




**WARNING!**

**Danger to persons with active implants caused by electromagnetic fields**

REOVIB vibration magnets generate electric and magnetic fields during operation and may influence active medical implants, such as pacemakers. Persons with active implants may be at risk when in close proximity to a converter or other EMF-emitting equipment.

**Safety measures:**

- As the operator of an EMF-emitting installation, assess the individual risk to persons with active implants and take appropriate protective measures.




**WARNING!**

**Damage caused by mechanical impact**

Blunt impacts, shocks, or unspecified mechanical forces can damage the REOVIB vibration magnet. This may impair or destroy its function, IP protection rating, or electrical insulation. In such cases, there is a risk of electric shock and potential damage to adjacent systems.

**Safety measures:**

- Do not install, operate, or energize devices that are deformed or visibly damaged.
- Observe the permissible torque values for terminals as specified in Chapter 5.0 “Assembly / Installation / Commissioning”.




**WARNING!**

**Operation in unsuitable environments**

Storage, transport, installation, or operation in an unsuitable environment may damage the device; this also applies to open cable ends.

**Safety measures:**

- The maximum permissible IP protection rating is specified on the type plate of the REOVIB vibration magnet and in the product data sheet (DIN EN 60529).
- Failure to observe this may result in electric shock or damage to the device.



**WARNING!**

**Risk of electric shock caused by device manipulation**

Improper intervention can lead to damage, malfunction, loss of IP protection, and impairment of electrical insulation. This can result in electric shock or further damage to the device.

**Safety measures:**

- Screw connections, rivet connections, cable glands, clamp connections, cable guides, or attachments on the REOVIB vibration magnet must not be loosened, modified, manipulated, or replaced.

 **WARNING!**



**Risk of injury during transport and installation**

Transport, lifting, or installation using attachment points not intended for this purpose is not permitted. Failure to comply may result in personal injury, damage to the device, or damage to adjacent systems.

**Safety measures:**

- Existing lifting eyes, attachment points, or specified lifting points (e.g., threads or holes for lifting eyes) must be used.

 **WARNING!**




**Operation in an Unsuitable Power Network or Application**

Installation, wiring, or operation of REOVIB vibration magnets in unsuitable power network types or applications is not permitted. Failure to comply may result in electric shock and severe injury. In addition, there is a risk of destruction of the device or damage to adjacent systems.

**Safety measures:**

- Connect the device only to the specified power network types according to the data sheet and manual.
- Carry out installation and wiring strictly in accordance with the manufacturer's specifications.
- Before commissioning, verify that the application is approved for the use of the REOVIB vibration magnets.
- Installation and maintenance may only be performed by qualified personnel.




**WARNING!**

**Danger caused by reduced insulation**

If connection cables come into contact with sharp edges or pointed components, damage to the cable insulation, loss of electrical safety, and the risk of electric shock may occur.

**Safety measures:**

- Route connection cables so that they do not come into contact with sharp edges or pointed components.
- Provide suitable protective measures such as edge protection, protective hoses, or suitable cable routing.
- Before commissioning, check whether the application is approved for use with the REOVIB vibration magnet.
- Check the cable routing regularly for damage.



**WARNING!**

**Damage caused by improper cable routing**

Improper routing of connection cables may lead to cable damage, impairment of the sealing function, loss of the IP protection rating, and risk of electric shock due to insufficient observance of the minimum bending radii or excessively tight bending of the connection cables.

**Safety measures:**

- Route connection cables in accordance with the specifications of the cable manufacturer.
- Observe the minimum bending radii specified by the manufacturer.
- If no specifications are available, a minimum bending radius of **RB = 10 × outer diameter of the cable** must be maintained.
- Do not bend cables directly at cable glands or cable entries.
- Maintain a minimum distance of **10 mm** between the bend and the device housing or cable entry.

 **WARNING!**

**Damage caused by mechanical stress on the cables**

Mechanical stress on the device can cause damage, loss of function, reduction of the IP protection class, and compromise of electrical insulation. Using connection cables to lift or move the device may also create a risk of electric shock.

**Safety measures:**

- Do **not** use connection cables to lift, carry, or move the device.
- Handle the device **only** at the designated mounting or transport points.
- Protect cables from mechanical stress and ensure they are routed without tension.



 **CAUTION!**

**Risk of injury from sharp edges**

REOVIB vibration magnets are industrial products. Despite design measures to minimize sharp edges and pointed corners, there is a risk of injury during unpacking, installation, or at the mounting location.

**Safety measures:**

- Exercise **extra caution** when handling the device to avoid cuts or puncture injuries.



## Intended use

The devices described in this manual are electrical equipment for use in industrial plants. They are not intended for use in private households.

REO products may only be used for their intended purpose within the specified values, in compliance with the information provided in the REO data sheets, in low-voltage networks. The conditions at the place of use must correspond to all specifications for the device used.

## Applied directives and harmonized standards

When using products of **REO AG**, the following standards, directives, and legal regulations must be observed in their currently applicable versions:

- **DIN EN 61558**
- **DIN EN 61800**
- **German Product Safety Act (ProdSG)**
- **German Ordinance on Industrial Safety and Health (BetrSichV)**
- **DGUV regulations** of the German Social Accident Insurance
- **General VDE, DIN, EN, and IEC provisions**

To ensure proper function and avoid interference, the principles of **EMC-compliant installation** (electromagnetic compatibility) must also be followed.

### Technical standards (excerpt)

The following standards are relevant for the use and installation of the products. Depending on product type and application, additional specific standards may apply.

Norm	Title / Scope of Application
DIN EN 60204-1 / VDE 0113-1	Safety of machinery - Electrical equipment of machines
DIN EN 60529 / VDE 0470-1	Degrees of protection provided by enclosures (IP Code)
DIN VDE 0580 VDE 0580:2011-11	Electromagnetic devices and components
DIN EN ISO 12100	Safety of machinery - General principles for design - Risk assessment and risk reduction
DIN EN 50178	Electronic equipment for use in electrical installations

### Note:

The selection, application, and compliance with the applicable standards lie with the user/operator. Depending on the intended use, industry, and system context, additional technical standards, directives, and legal requirements may apply and must be considered.

The directives and harmonized standards listed below were considered during the design and manufacture of the referenced products:

Directive	Title	Applied harmonized standards
2014/30/EU	Electromagnetic Compatibility (EMC)	EN IEC 61000-6-4:2019 EN IEC 61000-6-2:2019
2014/35/EU	Low Voltage Directive (LVD)	EN IEC 62477-1:2023 + AC:2024
2011/65/EU	Restriction of Hazardous Substances (RoHS)	–



## Changes and Copyright

We reserve the right to make technical changes and to modify the content and structure of this documentation without prior notice.

The contents of this manual are protected by copyright. All rights, including reproduction, distribution, translation, microfilming, and storage and processing in electronic systems, are reserved by REO AG. Any use, including excerpts, requires the prior written consent of REO AG.

## 1.0 General

### 1.1 Product applicability and scope of this document

This operating manual applies generally to all **REOVIB vibration magnets** from **REO AG**. They cover a wide range of designs, power ratings, and electrical connection types.

The specific characteristics, operational limits, and connection or integration requirements of the delivered unit are determined by the corresponding nameplate, the product-specific datasheet, and the technical project planning carried out by REO or the system manufacturer.

The products are intended for industrial use. They may be employed in various systems and applications provided that intended use, technical limits, and installation and environmental conditions are observed.

**All REOVIB vibration magnets from REO AG described in this manual have been designed and manufactured in accordance with the applicable European directives and, when used as intended, meet the requirements of the CE marking.**

The CE marking is affixed to the nameplate. The complete EU Declaration of Conformity is available upon request.

## 2.0 Functional Description

### 2.1 Intended use

The complete vibrating magnet consists of the core carrying the winding and the associated armature (yoke). Together with the leaf springs, the vibrating magnet and the armature form the actual drive of the vibrating feeder. The weight proportions of the stationary and vibrating masses, together with the spring force, result in a resonant vibration system.

Vibrating feeders can therefore only be operated within a limited frequency range around the resonance point. All components of the entire drive must be tuned to this frequency. It is therefore important that the vibrating magnet is also designed for the correct electrical frequency, as otherwise the magnet's power will not be utilized or the magnet will overheat due to excessive current.

Due to the control devices used, most vibrating feeders operate at the same or double the vibration frequency of the connection voltage. Common frequencies are 50 Hz or 100 Hz in Europe and Asia, and 60 Hz or 120 Hz in America.

REOVIB vibrating magnets may only be used within the operating limits specified by REO. These are specified in the respective data sheets, catalogs, and operating instructions. The devices are intended exclusively for installation in technical systems and equipment. The permissible operating limits with regard to electrical, thermal, and mechanical loads as well as the degree of protection (e.g., IP protection class) are specified in the respective product-specific data sheet and must be observed.

Intended use includes use within the operating limits defined in the technical documentation (voltage, current, temperature, environmental influences). Operation is only permitted in environments corresponding to the specified protection class and only in suitable locations. Use is restricted to qualified personnel.

### 2.2 Improper use

**Improper use** is considered, in particular, in the following cases:

- Operation outside the limits specified in the product datasheet
- Use in explosive or hazardous environments without the corresponding certification
- Application in industries or environmental conditions for which the product is not intended
- Improper modification or mechanical damage
- Use for purposes other than intended, e.g., as a heating element

#### **Warning:**

Failure to observe the intended use may result in overheating, damage, fire hazard, and danger to persons. REO accepts no liability for damage resulting from improper use.

### 3.0 Technical Data

The technical specifications of REOVIB vibration magnets varies depending on the series, size, power rating, and intended application. These specifications must be considered during planning, selection, installation, and operation.

REOVIB vibrating magnets may only be operated within the values specified by the manufacturer. These are specified in the respective data sheets, catalogs, or operating instructions and must be observed during planning, selection, installation, and operation.

They may only be used in low-voltage networks. The conditions at the place of use must correspond to the specifications of the REOVIB vibrating magnet (e.g., voltage, current, ambient temperature).

Only the respective product-specific data sheet is authoritative for safe use. In case of uncertainty or special applications, consultation with the technical support department of REO AG is required. Project-related approvals must be obtained.

Intended use includes use exclusively within the technical parameters specified by REO and compliance with all safety and installation regulations by qualified personnel. Any deviation constitutes improper use and may result in personal injury or property damage.

REOVIB vibrating magnets can be designed for mechanical frequencies from 8 Hz to 150 Hz. The respective frequency is specified in the data sheet and on the type plate.

Unless otherwise specified, the permissible installation altitude is 0 to 4000 m above sea level. For installation altitudes above 2000 m above sea level, a current reduction of 1% per 100 m must be taken into account.

All products are tested and developed in accordance with the DIN VDE 0580 standard for electromagnetic devices and components or in accordance with our customers' industry-specific standards.

#### 3.1 Climate category (IEC 60068-1)

Unless otherwise specified, REOVIB vibration magnets comply with the following climate categories according to **IEC 60068-1**:

<b>Upper temperature limit: + 85 °C</b>		
<b>Lower Limit temperature: - 25 °C</b>	<b>25/85/21</b>	<b>Relative humidity: 95% 21days/year</b>

## 4.0 Transport and storage

REOVIB vibration magnets from REO AG are precision-manufactured electrical components that are assembled and tested under controlled conditions. Special precautions must be taken during transport and storage to ensure electrical and mechanical functionality.

### 4.1 Transport

- REOVIB vibration magnets must be transported with protection against shocks and vibrations.
- Mechanical impacts such as shocks, housing deformations, or tensile and compressive forces on the terminals must be strictly avoided.
- The products must not be thrown or stacked unless this has been expressly approved.
- The original packaging provides optimal protection and should be used until installation.
- Permissible transport temperature range:  $-15\text{ °C}$  to  $+70\text{ °C}$  (short-term), in accordance with IEC 60068-2-1/-2, unless otherwise specified by REO.
- Transport is permitted only at relative humidity up to 85%, non-condensing, according to IEC 60068-2-30, unless otherwise specified by REO.

### 4.2 Storage / storage conditions

#### General Requirements:

- REOVIB vibration magnets should be stored in their original packaging to preserve product properties.
- Typical storage life is at least 3 years from the date of manufacture, provided the specified conditions are observed.

#### Temperature Range:

- Recommended temperature range for storage and transport:  $-15\text{ °C}$  to  $+55\text{ °C}$ .
- Temperature gradients should not exceed 20 K/h.

#### Relative Humidity:

- Annual average  $\leq 75\%$ .
- Maximum 95% on up to 21 days per year.
- Condensation must be avoided at all times; generally below 95%.

#### Additional Conditions:

- Aggressive atmospheres (e.g., corrosive gases) or condensation are not permitted.
- Storage should be in an environment protected against mechanical impacts, dust, and moisture.

**Note:** See also Section 5.0 “Assembly / Installation / Commissioning”.

## 5.0 Assembly / Installation / Commissioning

### 5.1 General information

- Assembly and electrical installation may only be carried out by qualified personnel in accordance with applicable regulations and standards.
- Before installation, check that the REOVIB vibration magnet is free from mechanical damage and that the nameplate is fully legible. Damaged or deformed devices must not be used.
- The conditions at the installation site must comply with the protection ratings and operating limits specified in the product data sheet. Before installation, the product data sheet and this document must be carefully reviewed.

### Warning!



If the protective conductor is interrupted, safe discharge cannot take place, which can lead to dangerous contact voltages on metal parts. The protective conductor (PE) must always be connected first and disconnected last during uninstallation.

**Installation and maintenance may only be carried out by qualified electricians.**

### 5.2 Assembly

#### 5.2.1 Safety rules

When working on electrical equipment, the **“Five Safety Rules” according to EN 50110** must always be observed:

1. Disconnect the installation from the power supply.
2. Secure the installation against reconnection.
3. Verify that the installation is de-energized.
4. Ground and short-circuit the installation.
5. Cover or isolate adjacent live parts

#### 5.2.2 Electrical connection

- Connection is made via customer-supplied terminals, terminal strips, or rails – professionally in accordance with applicable regulations.
- Strain relief and mechanical protection of the cable routing shall be ensured by the customer.
- Protection against accidental contact must be provided by the customer if the connection cables are freely accessible.
- Moisture protection of cable entries (e.g. by IP-rated cable glands) must be ensured.
- The wires must not be subjected to mechanical stress. Strain-free cable routing must be ensured.

#### Protective conductor (PE):

- The PE conductor must always be connected first and disconnected last during deinstallation.
- REOVIB vibration magnets must have a fixed and secure protective conductor connection in accordance with EN 50178 to ensure electrical safety and the dissipation of fault currents.

### 5.2.3 Mechanical installation

- Installation shall only be carried out using the designated mounting points.
- **Tightening torques, bolt strength classes and fastening elements (e.g. washers) must be selected in accordance with VDI 2230 and, where applicable, the manufacturer-specific specifications. Responsibility for the correct selection and installation lies with the customer.**

### 5.2.4 Cable routing

- Power and signal cables shall be routed separately. The following minimum distances must be maintained:
  - $\geq 100$  mm to mains cables
  - $\geq 300$  mm to signal cables
- Cables from different EMC zones shall not be routed together in the same cable ducts. Crossing of cables is permitted; parallel routing should be avoided wherever possible.
- The minimum bending radii specified by the cable manufacturer must be observed.
- If no manufacturer specifications are available, a minimum bending radius of **RB = 10 × cable outer diameter** shall be applied.

### 5.2.5 Grounding

- The control cabinet / electrical enclosure must be grounded in accordance with EMC requirements.
- In case of doubt, additional large-surface grounding connections should be established using copper braided straps in addition to the protective earth (PE).

## 6.0 Operation

No separate switching on or activation of the **REOVIB vibratory magnet** is required.

Operation is only permitted within the parameters specified in the product-specific data sheet. This applies in particular to operating voltage, rated current, air gap, and frequency.

At elevated ambient temperatures or high installation altitudes, operation is only permitted with a reduced rated current (**current derating**).

The applicable derating values are specified in the respective product data sheet and must be observed.

## 7.0 Cleaning / Maintenance / Servicing

REOVIB vibration magnets are generally maintenance-free.

Cleaning should be carried out depending on the degree of contamination. It is recommended that the devices be checked at least once a year. In particular, screw connections must be checked for tightness during this inspection.

**Shorter maintenance and inspection intervals should be specified by the operator in accordance with the respective operating conditions.**

## 8.0 Malfunctions and Troubleshooting

REOVIB vibration magnets are maintenance-free and designed for long-term operation within the specified environmental conditions.

If faults or irregularities nevertheless occur, operations must be stopped immediately, and the cause must be identified.

### 8.1 Possible malfunctions

Symptom	Possible Cause	Corrective Action
Noise during operation	<ul style="list-style-type: none"> <li>Mounting of the REOVIB vibratory magnet loosened</li> <li>Pole faces are touching</li> </ul>	<ul style="list-style-type: none"> <li>Switch off the device immediately</li> <li>Check the mounting of the magnet and armature</li> <li>Check the air gap</li> </ul>
Increased temperature	<ul style="list-style-type: none"> <li>Overload</li> <li>Unsuitable environment conditions (e.g. frequency, air gap)</li> </ul>	<ul style="list-style-type: none"> <li>Switch off immediately</li> <li>Check current load</li> <li>Check environmental conditions</li> </ul>
Smoke generation or unusual smell	<ul style="list-style-type: none"> <li>Overload</li> <li>Thermal overstress</li> <li>Short circuit</li> </ul>	<ul style="list-style-type: none"> <li>Switch off immediately</li> <li>Inspect magnets for visible damage</li> <li>Check the winding resistance</li> </ul>

### 8.2 Behavior in case of malfunctions

- In case of a fault, the REOVIB vibration magnet must be disconnected from the mains immediately.
- An external visual inspection for damage, discoloration, breaks, or leaks must be carried out.
- Electrical measurements may only be carried out by qualified personnel.
- Check whether the operating limits defined in the product data sheet (e.g., temperature, power, environmental influences, IP protection, forced cooling) have been observed.
- Restarting the device is only permitted after the cause has been clearly identified and resolved.

**Verification of electrical safety and full functionality may only be performed by REO.**

#### Warning!



A damaged or thermally overloaded REOVIB vibration magnet must not be operated further. There is a risk of fire and electric shock.

**For fault analysis or return shipment, contact REO AG in advance.**

## 9.0 Disassembly and Disposal

### 9.1 Safety during disposal

#### Hazard!



#### Electrical voltage

Before starting any disassembly work, the device must be completely disconnected from the power supply and secured against being switched on again.

Electrical and mechanical disassembly work may only be carried out by **qualified personnel**.

### 9.2 Disposal

Disposal must comply with applicable legal regulations.

The device is subject to the requirements of the WEEE Directive 2012/19/EU and the German ElektroG (Electrical and Electronic Equipment Act). WEEE Registration Number: DE 32383152.

Disposal via household waste is not permitted. Devices must be processed through certified recycling companies or municipal collection points.

Where possible, the following materials should be separated and recycled:

- Aluminum profiles and heat sinks
- Connection terminals
- Insulating materials and silicone gaskets
- Copper wires and leads

**Packaging materials are recyclable and must be disposed of in accordance with local regulations.**

	Name	Signature	Date	Department	Function
<b>Created by</b>	S. Reimann		07.05.2025	EW	Development
<b>Reviewed by</b>	C. Wrzesinski		25.06.2025	KO	Design / Engineering
<b>Approved by</b>	I.Przybilla		04.07.2025	QM	Quality / Management

Rev.	Modified by	Date:	Additions / Revisions	Checked by	Date:



## ■ REO AG

Brühler Straße 100 · D-42657 Solingen  
Tel.: +49 (0)212 8804 0 · Fax: +49 (0)212 8804 188

E-Mail: [info@reo.de](mailto:info@reo.de)  
Internet: [www.reo.de](http://www.reo.de)

### Divisions:

#### REO Vibratory Feeding and Power Electronics Division

REO Vibratory Feeding and Power Electronics Division  
Brühler Straße 100 · D-42657 Solingen  
Tel.: +49 (0)212 8804 0 · Fax: +49 (0)212 8804 188  
E-Mail: [info@reo.de](mailto:info@reo.de)

#### REO Train Technologies Division

REO Train Technologies Division  
Erasmusstraße 14 · D-10553 Berlin  
Tel.: +49 (0)30 3670236 0 · Fax: +49 (0)30 3670236 10  
E-Mail: [zentrale.berlin@reo.de](mailto:zentrale.berlin@reo.de)

#### REO Drives Division

REO Drives Division  
Holzhausener Straße 52  
D-16866 Kyritz  
Tel.: +49 (0)33971 485 0 · Fax: +49 (0)33971 485 90  
E-Mail: [zentrale.kyritz@reo.de](mailto:zentrale.kyritz@reo.de)

#### REO Medical and Current Transformer Division

REO Medical and Current Transformer Division  
Schuldhölzinger Weg 7 · D-84347 Pfarrkirchen  
Tel.: +49 (0)8561 9886 0 · Fax: +49 (0)8561 9886 40  
E-Mail: [zentrale.pfarrkirchen@reo.de](mailto:zentrale.pfarrkirchen@reo.de)

#### REO Test and PowerQuality Division

REO Test and PowerQuality Division  
Brühler Straße 100 · D-42657 Solingen  
Tel.: +49 (0)212 8804 0 · Fax: +49 (0)212 8804 188  
E-Mail: [info@reo.de](mailto:info@reo.de)

### PRODUCTION+SALES:

#### ■ India

REO GPD INDUCTIVE COMPONENTS PVT. LTD  
E-Mail: [info@reogpd.com](mailto:info@reogpd.com) · Internet: [www.reo-ag.in](http://www.reo-ag.in)

#### ■ USA

REO-USA, Inc.  
E-Mail: [info@reo-usa.com](mailto:info@reo-usa.com) · Internet: [www.reo-usa.com](http://www.reo-usa.com)

### SALES:

#### ■ France

REO VARIAC S.A.R.L.  
E-Mail: [reovariac@reo.fr](mailto:reovariac@reo.fr) · Internet: [www.reo.fr](http://www.reo.fr)

#### ■ Great Britain

REO (UK) Ltd.  
E-Mail: [main@reo.co.uk](mailto:main@reo.co.uk) · Internet: [www.reo.co.uk](http://www.reo.co.uk)

#### ■ Italy

REO ITALIA S.r.l.  
E-Mail: [info@reoitalia.it](mailto:info@reoitalia.it) · Internet: [www.reoitalia.it](http://www.reoitalia.it)

#### ■ Poland

REO CROMA Sp.zo.o  
E-Mail: [croma@croma.com.pl](mailto:croma@croma.com.pl) · Internet: [www.croma.com.pl](http://www.croma.com.pl)

#### ■ Spain

REO ESPAÑA 2002 S.A.  
E-Mail: [info@reospain.com](mailto:info@reospain.com) · Internet: [www.reospain.com](http://www.reospain.com)

#### ■ Switzerland

REO ELEKTRONIK AG  
E-Mail: [info@reo.ch](mailto:info@reo.ch) · Internet: [www.reo.ch](http://www.reo.ch)

#### ■ Turkey

REOTURKEY ELEKTRONİK San. ve Tic. Ltd. Şti.  
E-Mail: [info@reo-turkey.com](mailto:info@reo-turkey.com) · Internet: [www.reo-turkey.com](http://www.reo-turkey.com)

#### ■ China

REO Shanghai Inductive Components Co., Ltd  
E-Mail: [info@reo.cn](mailto:info@reo.cn) · Internet: [www.reo.cn](http://www.reo.cn)

#### ■ United Arab Emirates

REO INDUCTIVE COMPONENTS FZCO  
E-Mail: [info@reo-middle-east.com](mailto:info@reo-middle-east.com) · Internet: [www.reo-middle-east.com](http://www.reo-middle-east.com)

If you have any further questions, please visit our website at [WWW.REO.DE](http://WWW.REO.DE)

