

HIGHLIGHT OF THIS ISSUE

STYLE-CASE HIGHLY POLISHED AND ERGONOMIC HANDHELD ENCLOSURE





"IDEAL FOR DESIGN-ORIENTED HAND-CONTROL UNITS."

START

Ok

STOP

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EDITORIAL

DEAR READERS,

In the new issue of our customer magazine INSIDE we are dealing with the topics of ergonomics and design.

The term design refers to the forming of all kinds of objects according to the criteria of functionality and aesthetics. Ergonomics is an essential criterion of industrial design. Particularly when at work, it is important that the equipment should be designed to provide safe and effective operation. In the development of new plastic enclosures, for example, our goal is to make them people-friendly.

In our product portfolio we have some ranges of enclosures that make work much easier thanks to their ergonomic design. The new STYLE-CASE is ideal for such applications. This hand-held enclosure with its highly polished surfaces combines top-level ergonomics with modern design. A pleasant touch sensation





makes work easier in all applications. Thanks to a sealing kit for the enclosure and the battery compartment, it is highly versatile. You can read more about this on the following pages.

We hope you enjoy reading our magazine

Dipl.-Vw. Martin Knörzer Managing Director



"STYLE-CASE – EYE-CATCHER THAT FITS SNUGLY IN THE HAND."

JOSEF BOTH, RESEARCH & DEVELOPMENT, OKW GEHÄUSESYSTEME GMBH

THE NEW STYLE-CASE

Working equipment has to be designed according to ergonomic points of view, so that safe and effective operation and use are guaranteed under all conditions. The important factors here are the health and the efficiency of the workers. The interplay between ergonomics and design play a big part here, for both have a common goal: designing everyday objects for people. In the development of plastic enclosures, these aspects must also be taken into consideration in order to make the use of the equipment more efficient. The new STYLE-CASE range of hand-held enclosures combines toplevel ergonomics with modern design.

Ergonomic and at the same time elegant

With the new STYLE-CASE, great importance was attached to design and a favourable form for the subsequent end device – as is usual with OKW. Enclosures must be designed to meet the needs of their function. The new mobile enclosure was developed on the basis of these points of view.

The STYLE-CASE consists of a top part as well as a bottom part including a battery compartment cover. In addition, each enclosure has an integrated battery compartment for 2 x AA round cells. A recessed operating area is integrated in the top part for the use and optimum protection of decor foils and membrane keypads. There is also sufficient space for operating elements.

The STYLE-CASE L is available in the size 166 x 64 x 31 mm (length x width x height). To improve its protection class, a sealing kit is available for the enclosure and the battery compartment (as an optional accessory). This offers the electronics ideal protection from dust and splash water. The enclosure is optionally available in two versions: in high-quality ASA+PC-FR material in traffic white (RAL 9016) and in infrared-permeable PMMA Plexiglas in jet black (RAL 9005). Highly polished surfaces guarantee a particularly elegant appearance.





Your individual enclosure – thanks to a wide variety of production techniques, the new STYLE-CASE can be modified according to your wishes.

Optional protection – With a sealing kit for the enclosure and the battery compartment.

617 THE NEW STYLE CASE

The enclosure includes the assembly kit required for the screw connections and components. All of the screws are made of rustproof stainless steel and have Torx drive. Inside the enclosure there are fastening pillars in the top and bottom parts for PCBs. The fastening screws for the PCBs are available individually as accessories. A mounting plate for display elements could be installed in the top part, while the installation of a control board with angled sockets and the power connection in the bottom part would make sense.

Special design

A special feature of the enclosure is the sweeping design when viewed from the side. Many other plastic enclosures are characterised by hard edges and corners. This mobile enclosure was designed in such a way that operation is also easily possible with just one hand. Viewing the top part with operating panel from the front, the lines of the STYLE-CASE run gently downwards in the form of an ellipse. This is a credit to the name of the housing, and its design makes it extremely "stylish". The pleasant design of the handle allows it to be held securely and without fatigue. It thus facilitates sequences of hand movements. To ensure that the visual appearance of the enclosure is not impaired, assembly is effected from below using stainless steel screws. The high-gloss appearance makes an even higherquality impression and is not spoiled by the heads of screws.

The right power supply

To be able to use the end device for different purposes, different kinds of power supply can be implemented. For example, the



There is enough installation volume for PCBs. Inside the enclosure there are fastening pillars in the top and bottom parts.

Power supply – Each enclosure has an integrated battery compartment for 2 x AA round cells.

enclosures are ideal for all kinds of remote control systems, whether cordless or wired. For mobile use, the integrated battery compartments for 2 x AA batteries are ideal. The matching set of battery clips for the battery compartment is available as an accessory and can be added. However, there are no restrictions for anyone who prefers to use rechargeable batteries. To allow the batteries to be replaced at any time, the battery compartment cover was fixed at the lower end with a screw.

For all applications

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The special design makes it easier to work in all applications. For example, in the light colour, the STYLE-CASE is ideal for medical equipment. The subsequent end device can serve as a remote control for any purpose, for example for doctors and nurses, or for the patients themselves. Use in the social sector is also conceivable. The STYLE-CASE in jet black is suitable for applications in industry. The infrared-permeable material allows it to be used as a laser distance measuring device, for example, or for temperature measurement.

Customised modifications

Besides the standard enclosures, several processing and finishing options are possible in our own Service Center. The STYLE-CASE can thus also be modified according to customers' requirements, e.g. with mechanical processing for interfaces, printing or a functional EMC aluminium coating on the inside of the enclosure. It is also possible to design your own membrane keypads or decor foils.



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More hand-held enclosures for your application you can find under www.okw.com

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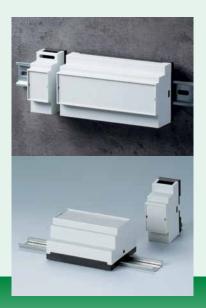
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DIN RAIL ENCLOSURES RAILTEC B low/high connection levels

The RAILTEC B enclosure range by OKW has now been extended by new variants for applications requiring larger installation compartments. Different connection levels, high and low, allow the highly individual assembly of components in the plastic enclosures. The 3 new versions in the widths of 2, 4, 6 and 9 modules integrate seamlessly into the comprehensive range of enclosures.

> Terminal blocks, plug headers and transparent covers are available as accessories to allow the enclosures to be equipped individually.



NEW PRODUCTS/PRODUCT ENHANCEMENTS

NEW TABLE TOP ENCLOSURE EVOTEC

The new EVOTEC enclosures expand the range of robust table top enclosures by OKW. Soft contours guarantee an elegant appearance and ensure high-quality packaging for your electronics. The enclosures are made of UV-resistant ASA+PC-FR plastic material, and can be fitted with a seal (accessory) for protection class IP 65. Your equipment is thus fully prepared for rough conditions and outdoor use.

Different top parts offer you many comfortable options for packaging your electronics to meet the needs of your specific application! Depending on the model: classic form with flat top part and large interior, or ergonomically practical with a front panel inclined by 12° – ideal for desktop applications with perfect user comfort. The desktop version is also available with or without a recessed control panel to protect the membrane keypad / decor foil. More information in the next issue of this customer magazine.



MINITEC EM New intermediate ring

There is a choice of two versions for different USB types. The existing intermediate ring is intended for a Type A USB plug in accordance with DIN IEC 61076-3-107. A further version for the use of "Micro USB 5P, B Type SMT" is now also available. Both TPE intermediate rings are in the colour volcano and have an eyelet for attachment purposes. Matching enclosures are available in ABS (UL 94 HB) off-white and lava as well as in PMMA Plexiglas[®] black.

Outside dimensions of the enclosure with intermediate ring: $68 \times 42 \times 24$ mm

NET-BOX

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New sealing kits

In addition to the existing sealing kit, a new silicone seal with a preformed contour is now available for the NET-BOX range. Thanks to their shape, the seals can now be inserted more easily into the enclosure.

The NET-BOX is available in 3 different sizes :

- NET-BOX 140: 140 x 140 x 46,5 mm
- NET-BOX 180: 180 x 180 x 48,5 mm
- NET-BOX 220: 220 x 220 x 50,5 mm

With the silicone seal fitted, all sizes of the NET-BOX meet the requirements of protection class IP 65.

HAND STRAP, LANYARD New versions

The new carrying strap and the lanyard ensure simple and comfortable use, on your arm or round your neck. The components can be carried easily and comfortably on your body. Material black textile.

Length of carrying strap: 200 mm Length of lanyard: 860 mm



"ELEKTROMAGNETIC IMPULSE THERAPY WITH INFRARED LIGHT."

DEUTSCHE AKADEMIE FÜR VERKAUF, VERTRIEB & MARKETING GMBH, SOPHIENSTRASSE 15-17, D-76133 KARLSRUHE, GERMANY

Its newly developed product, the Local Applicator, combines targeted and effective impulses with infrared deep warmth. This permits effective treatment of diseases caused by impaired cell function and the connected inflammatory processes.

CUSTOMER APPLICATION

Electromagnetic impulse therapy is a treatment method to reduce or improve many different symptoms without adverse effects. The positive effect is explained as follows: electromagnetic fields and molecular surface structures of cell membranes influence each other. This causes activation or dampening of signal paths within the cells. As a consequence, there are pervasive changes to cell function. The electromagnetic impulse therapy is recommended in those symptoms that are due to impairment of cell function and the connected inflammatory processes.

Frank Meier, managing director of DAVVM GmbH, explains electromagnetic impulse therapy with infrared light: The innovative therapy method of the Local Applicator generates a strong electromagnetic field that acts on a deep cellular level. It can be used to treat several centimetres of tissue and bone at depth. This way, cell function can be preserved, regenerated and restored. The generated frequencies also have a dampening effect on the pain-transmitting nerve fibres, which can effectively reduce pain from inflammatory processes. The additional effects include sustainable promotion of the metabolism and improved circulation in the treated tissues.

The concurrent application of infrared deep warmth increases the positive therapeutic effects of the strong electromagnetic impulses. The warmth produced by red and infrared light (infrared A) will also reach the deeper structures in tissues and bones and can take its effect there. The deep warmth also has a direct influence on the collagen proteins in the connective tissues. These have a documented effect on the growth and renewal of bone tissue, muscles, tendons,

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The Local Applicator uses electromagnetic impulse therapy for efficient and mobile treatment of symptoms with deep effect. Users are able to visually and acoustically monitor the treatment during applications. The application range of impulse therapy includes, among others, the following symptoms: Arthritis, arthrosis, diabetic foot syndrome, fibromyalgia (pain with changing localisation in the muscles), fractures, joint pain, migraine, rheumatic complaints, tinnitus.



Inductive charging – The energy is transmitted by inductive coupling via an alternating magnetic field.

Operation – a starting button and a button for infrared light are used to control the unit.

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ligaments and joint capsules. While tablets need to pass through the stomach, the Local Applicator will help right on site without any adverse effects at all.

Power supply through inductive charger

The Local Applicator contains a customer-specific lithium polymer battery pack for mobile operation independent of cables. It is charged inductively using the Local Applicator Charger. It was possible to implement the power supply optimally based on our cooperation with ANSMANN AG. The specialist for customer-specific energy solutions covers all areas of individual and mobile power supplies such as rechargeable batteries, battery packs, chargers, mains units and many others. The Local Applicator is therefore only placed on the inductive charging station, which recognises it automatically. The benefit of this wireless power transmission is, among others, that there cannot be any contact problems from contamination or oxidation.

SYNERGY - Aluminium and plastic

The pain treatment device uses the standard enclosure SYNERGY by OKW Gehäusesysteme. The harmonious material combination of aluminium and plastic makes the device look particularly refined. DAVVM chose the SYNERGY oval in size ($L \times W \times H$) 180 x 90 x 40 mm for the Local Applicator.

The top and bottom parts of plastic are produced in signal white (similar to RAL 9003) by special spray-painting. The in-house service centre performs several processing steps in the enclosure. The openings for the magnets and the LEDs are cut by mechanical processing. A glass pane is placed on top of them with adhesive foil. There is a decor foil on top of the enclosure. The top of the SYNERGY has a recessed surface by default. The decor foil used is thus optimally protected. The plastic made of ASA+PC-FR is characterised by a high fire-resistance and very good UV-protection. The silver-anodised aluminium body,



Infrared deep warmth – It ensures better microcirculation and enables the nutrients necessary for development or regeneration to reach the treated regions more easily.

glass-bead-blasted on all sides, makes it very easy to discharge the heat emitted by the device. It is also extraordinarily stable. Its non-slip enclosure feet make the Local Applicator stand securely on the table while also covering the enclosure screws in the bottom very elegantly. The SYNERGY oval enclosure was chosen for the Local Applicator Charger as well, though in the dimensions 180 x 90 x 20 mm (L x W x H).

The cooperation of the companies OKW Gehäusesysteme and ANSMANN AG (www.ansmann.de) permitted alignment of the product entirely with the customer requirements. Solutionoriented help could be provided even during the concept phase.

CONTACT

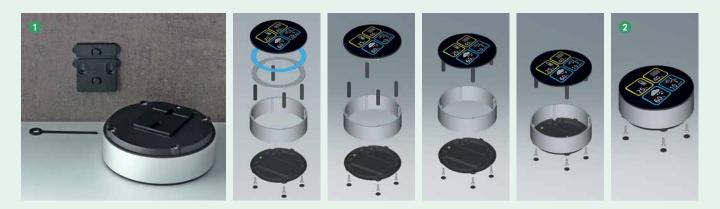
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"SYNERGY – FOR THE MODERN LIVING-AND WORKING WORLD."



MORE APPLICATION POSSIBILITIES

1 Concealed wall mounting for SYNERGY R120 and R140

With small-format enclosure applications, external wall mountings often appear dominant, and are frequently perceived as obtrusive in visually discerning environments. Concealed wall mounting is a much sought-after solution.

With the newly designed wall suspension element set by OKW, special small enclosures with a flat base can be elegantly mounted on the wall, much to the pleasure of the user. For example applications like controllers in building installations can be installed in the: SYNERGY R120 (Ø 120 mm x 40 mm) SYNERGY R140 (Ø 140 mm x 40 mm).

2 SYNERGY enclosure with plexiglas panel assembly

On request we can offer special holding frames for the SYNERGY range of enclosures for using a plexiglas panel with printing on the rear side.

The high-quality appearance of the enclosure with an aluminium frame blends seamlessly into the modern living and working world.



"GPS-TRACKING IN REAL TIME."

((CAPTURS

CAPTURS SAS, FRANCE



CUSTOMER APPLICATION

Trail runners, skiers, hikers, paragliders or also fans of nautical sports are often away for a long time, cover long distances and are exposed to hazardous situations. In difficult and dangerous situations, many of them want to inform the rescue services as soon as possible. During such activities, relatives also want to be sure that everything is in order. Currently, smartphones do not offer satisfactory battery capacities, and satellite-based solutions are very costly.

With "Capturs" you can see the routes of persons in real time, whether on a computer, tablet PC or smartphone. Depending on the end device used, there is either a web user interface or a smartphone app. It is also possible to export the data (route, distance, altitude, duration) to the computer or to publish the data in social networks.

The special feature: in the event of crashes, departure from the predefined route, longer stay at a given location and when the battery is weak, it automatically sends an e-mail or a text message to certain persons. In case of emergency, a button allows you to send an alarm signal so that help can be summoned guickly if things become critical.



CAPTURS SAS

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Capturs can be used for all outdoor activities: hiking, skiing, climbing, paragliding and much more.





Marchall.

"PROGRAMME FOR IN-COMPANY HEALTH PROMOTION."

STEPHANIE GLASER, YOUR PERSONAL WELLNESSCOACH, HAUPTSTRAßE 100, D-74912 KIRCHARDT, GERMANY

The team of experts Stephanie and Sven Glaser provides information on the causes and effects of different influences of our everyday lives on our well-being. A tailor-made concept is being developed for workplace health promotion, and a healthier life style can be achieved through various lectures and performance categories.

HEALTH PROMOTION

There are many ways to look after, improve and restore one's health. Awareness of the influences that things like nutrition, stress management, movement and recovery periods have on the body is the key to optimum well-being. Today more than ever, professional life calls for extraordinary commitment and the utilisation of all personal resources of each individual. Many executives and employees are facing the challenge of fulfilling all of the roles of their lives and providing maximum performance. As each of us knows, this is a balancing act that requires maximum attention in order to be happy in all other areas of life as well, for the happier we are, the more successful we will ultimately be in our professional lives.

OKW Gehäusesysteme is also aware of this, and is now starting a wide-ranging programme to promote health within the company. To this end, the company has obtained the services of Stephanie Glaser (graduate nutrition consultant) and Mr Sven Glaser (personal trainer) to provide professional help. The health programme offers one lecture per month as well as exercise units in 3 different performance categories. The first event provides information about "The basis for healthy nutrition and the key to active metabolism". Further topics in the coming months are:

- Improvement of physical and mental efficiency.
- Measures to lead a healthy life when under stress.
- Optimum nutrition and regeneration for bones and joints. How you can protect yourself from arthrosis and osteoporosis.
- The intestine is the gate to health. How to achieve good digestion and optimum utilisation of your nutrition.
- Soothing allergies and intolerances reinforcing your immune system.
- Maintenance and improvement of heart health.



"MOST EFFICIENT ELECTRIC VEHICLE." STUDENT PROJECT SUCCEEDS WORLD RECORD.



SPONSORING

The TUfast Eco team at the Technical University of Munich consists of 26 students from different faculties who have set themselves the goal of developing energy-efficient vehicles. In this project, alternative drive concepts such as solar power, biofuel, hydrogen and electric power are compared with each other to find the best substitute for fossil fuels. For more than 5 years now, the team has designed and produced one new prototype per year. The concept is being further optimised through continuous adaptation. The experience gained from all of the previous vehicles is incorporated in the new vehicle concept. In May 2015, for the first time, they came first in the prototype class of the Shell Eco-marathon Europa with their eLi15, as well as in the EducEco Challenge, which takes place in France.

Driving the car in races means extreme stress on all materials and equipment used. The requirements to be met by our enclosure were: low weight, watertight up to IP66, non-inflammable and robust. The decision was taken in favour of the OKW SMART-BOX made of PC + ASA. The electronics installed there measure the energy consumed, regulate the voltage, monitor the temperature and store the telemetry of the car. As far as energy efficiency is concerned, the vehicle relies on the rigorous application of lightweight construction principles using carbon fibre-reinforced plastic (CFP). This allows a total weight of 26 kg. Power transmission is effected by a chain drive with a freewheel, which significantly reduces losses caused by rolling resistance. On account of rule changes that took effect at the beginning of the 2016 season, solar energy, which had been used up to then, was no longer allowed. Importance was therefore attached to greater efficiency and reliability of the electric motor.

In July 2016, the team set up a new world record with the eLi15 and was awarded the title of "Most efficient electric vehicle" by Guinness World Records. Over a distance of 100 km, the vehicle consumed only 81.16 watt-hours of electricity. For one litre of petrol, that would be around 11,000 km.

Congratulations from OKW!





IMPRESSUM

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