

Berghaus-News

Traffic Technology · Mobile Crash Barriers

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New leaflet



The current leaflet for the new TL screw-type ground anchor can now be downloaded from our homepage:

berghaus-verkehrstechnik.de

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NEW: demarking with the AVS PeelJet



En route to its next job: the new AVS PeelJet for gentle yet thorough professional demarking of all kinds of road markings

Demarking today is professional, fast and costs little with the new PeelJet, a first rate German product from AVS Traffic Safety.

With immediate effect, a new special vehicle is available for the AVS Group. The AVS PeelJet is a very special state-of-the-art demarking machine. AVS has set up a new service division especially for this sector, with staff trained in the corresponding techniques.

The Mercedes Benz AXOR truck is equipped with the special high-powered PeelJet system. The AVS specialists can now treat road surfaces gently and remove markings at pressure of 2,500 bar in a computer-controlled CCTV-monitored process. The jet water with the dissolved solid particles is taken up straightaway by the integrated suction unit.

High demarking rates can be achieved thanks to the 8,000 litre fresh water tank and 5,000 litre used water tank. The solid

particles separated out of the marking are automatically collected in big bags for easy disposal at a waste dump. The use of water jets to remove road marking is not new. However, the AVS PeelJet works with vertical nozzles and CCTV monitoring for much finer, more precise control of the demarking process, practically ruling out damage to the road surface. "Jet Peeling" is how our Group refers to this method which is kind to the



Before
Manual tedious demarking
with a burner



Now
Automatic demarking,
kind to the surface

road surface while being very thorough at the same time. The AVS PeelJet removes all kinds of marking materials, e.g. agglomerates, cold spray plastic, high solid paints, cold plastic or films in all adhesion classes. Demarking leaves no residues on any road coverings in a gentle process that causes no notable damage to the surface. The AVS PeelJet can also be used to remove concrete sludge from new concrete carriageways in preparation for application of marking materials.

The **advantages** of the AVS PeelJet at a glance:

- Gentle removal of markings from all road surfaces without leaving any residues
- Fast removal of all kinds and types of marking materials
- The demarked surface is left well prepared for subsequent marking
- Better road grip after treatment of the surface
- Suction intake of the demarked materials
- Low water consumption
- Demarking in one step from 12 cm to 30 cm wide
- Automatic process control from the vehicle cab

The AVS PeelJet is already being used successfully for fast, thorough demarking of temporary road layouts at roadworks.

Another argument in favour of the AVS PeelJet is that it reduces the time for dismantling temporary road layouts, causing less traffic congestion.

Interested?
Our specialists will gladly provide you with more information and show you the gentle demarking procedure with its outstanding results in a short demonstration video on your premises (this can only be given in German).

Your "Number 1" for 20 years

In this day and age, little thought is given when purchasing technical devices such as mobile traffic light systems as to how long service and spare parts will be available for this model from the manufacturer – or whether the system reliably goes with the times and can possibly even be adapted to changing regulations and statutory legislation.

Happy birthday to a traffic light genius: it is now 20 years since we developed the universal mobile traffic light MPB 4000 which, meanwhile as MPB 4400, controls the traffic at roadworks in many countries.



Picture from 1991

Hundreds of satisfied users of the mobile traffic light MPB 4000 or its successor MPB 4400 will smile on reading these lines and say "But it's so easy". For more than 20 years now, we at Berghaus ensure that this universal traffic light system does not age and remains always up to date, while also remaining compatible with already existing signal heads – almost as if it had only just been purchased.

Read on to find out more about the traffic control possibilities offered by MPB 4400 – going over and beyond red, amber and green.

Hot topic for more than 20 years: universal traffic light MPB 4400



Picture: Stadt Wolfsburg

Mobile traffic light MPB 4400 at roadworks on a bridge. The city of Wolfsburg opted for our solution with low-maintenance 42V operation, given the long operating period and because the power supply was to be provided via the crash barrier over a long distance, with data bus and power supply in only one cable.

cont. from page 1

The continuity of traffic light systems is of huge importance, particularly for traffic safety companies that hire mobile traffic light systems among others on a professional scale. The signal heads must operate under any required conditions in universal fashion in a wide range of traffic control situations, e.g. alternating one-way traffic, T-junctions and crossroads together with pedestrian crossings and roadworks exits, while also being capable of dealing with many special cases. This is exactly the kind of universal use for which the mobile traffic light system MPB 4000 / MPB 4400 was developed in close consultation with our service companies.

A traffic light system consisting of two or more MPB 4400 signal heads can be used for controlling alternating one-way traffic through to crossroads situations, ideally as a vehicle-actuated solution. The interesting thing about our system is that all traffic lights are 100% identical: the user can therefore put them to any necessary use and keep combining them in different ways according to the specific traffic situation.

The simple addition of a third identical signal head already permits control of a T-junction. And with just four individual signal heads, i.e. two complete signal systems, you can control crossroads traffic or a pedestrian crossing. In other words, just two available MPB 4400 signal systems can do a different task every day: control alternating one-way traffic at two different sites on Monday, a T-junction on Tuesday, a crossroads on

Wednesday, a pedestrian crossing on Thursday and on Friday, they can be used for controlling local bus traffic with special signal patterns.

Our modular traffic light system is also ideal for example for road maintenance depots or local council depots that each have their own MPB 4400 system and can simply borrow any additional signal heads from another branch and put them together as needed.

The MPB 4400 is adjusted conveniently in a very simple dialogue procedure using a hand-held unit.



Reliable hired traffic light in operation: radio-controlled vehicle-actuated MPB 4400 with directional radar detectors and LED technology

The traffic light system can be set up for operation in just a few steps that demand no great prior knowledge. For example, to control vehicle-actuated alternating one-way traffic, the hand-held unit asks you in plain text about the length of the road works, the thoroughfare speed and how long the minimum and maximum green phase should be. That's all the programming necessary for vehicle-actuated

alternating one-way traffic. You don't have to do any calculations or take values out of tables. It doesn't get much easier! But the great thing about the MPB 4400 traffic light system is that it can be used to control countless traffic situations. Just take a look at all the pictures on this page – can your mobile traffic lights do the same ...?

MPB is always the first choice - as simple alternating one-way traffic system with vehicle-actuated radar detectors, push-

button pedestrian system, road works exit control for trucks, with central 42V power supply, innovative LED technology, active radio remote control, or controlled by data call from the local public transport or fire brigade central control. Even if the traffic light doesn't change much in its actual appearance, we are constantly adapting the firmware and electronic components to state-of-the-art technology while ensuring everything remains compatible. For a long time now, the constant advancement of the MPB 4400 for a good 20 years has paid off for Berghaus customers and service partners.



And we will continue to remain true to the traffic light genius!

Baden-Baden fire service control centre influences the MPB 4400 traffic light systems in its response area either from the central command computer or from a separate control panel as fall-back level. A reliable data call (not SMS!) with feedback function then changes the traffic light to "green" for the specific direction by remote control.

This ensures that individual vehicles have already left the single-track roadworks when the fire engines need to get through the bottleneck. As a result, the emergency vehicles don't have to struggle through traffic congestion, particularly as there are no passing possibilities in the single-track roadworks.



Pictures: Wolfgang Ziegler GmbH

Trade-fair: ProTec mobile crash barrier in Bern

SUISSE PUBLIC – From 21 to 24 June 2011 in Bern, the Swiss trade-fair for the public services and administration sector showed current developments for municipal enterprises, looking among others at issues such as occupational safety, IT, road signalling, energy and the environment.

613 exhibitors provided a comprehensive show covering 87,000 m² including machinery, equipment, vehicles, systems, material and services (IT, communicate and administration).

Many trade visitors from authorities and local administrations visited the exhibition stand of our Swiss partner Dähler Verkehrstechnik AG to find out at close quarters about the narrow, easily handled ProTec mobile crash barrier system for professional traffic separation at roadworks.

The 20th SUISSE PUBLIC was a great success with more than 20,000 trade visitors. It is Switzerland's largest exhibition in the branch.



Schweizer Fachmesse für öffentliche Betriebe + Verwaltungen



Picture: Traffics A/S, Danmark

MPB 4400 at single-track roadworks for several kilometres over a bridge in Denmark. The Berghaus SMS system with active feedback function clears the road of on-coming traffic for the emergency services.



Picture: Triopan AG

The ProTec mobile crash barrier system (on the left) and the new LED illuminated arrow at the Suisse Public stand of our Swiss partner Dähler Verkehrstechnik AG.

Active climate protection by Berghaus and AVS



Visible in the foreground: part of the 50 kW photovoltaic system on the buildings of AVS Overath GmbH, in front of the firm's hire pool of mobile crash barrier systems, traffic signs and TL safety beacons on more than 20,000 m² of outside premises.

Berghaus and AVS Traffic Safety are on the way to an environment-friendly future, not just in the production and use of LED traffic lights and solar pre-

warning lights. The photovoltaic (PV) systems mounted on the roofs of Berghaus in Kürten and AVS in Overath are visible evidence of

active climate protection. The results of this extensive investment in renewable energy is well worth while: after all, the 50 kW photovoltaic system in Overath generates about 46,000 kWh carbon-neutral solar power each year. The headquarters of Peter Berghaus GmbH also advocate eco-power from solar energy for the production of mobile traffic light systems and portable erection devices. In future, the new 65 kW photovoltaic system installed in June on the company roof in Kürten-Herweg is expected to generate about 60,000 kWh each year. By comparison, a four-person household consumes about 4,000 kWh power each year.

But our company's energy and environmental awareness is not just restricted to solar technology. The AVS sites in Overath and Eichhof are equipped with mini cogeneration units (so-called "Dachs") each with an output of 5.5 kWh

to generate heat and electricity. AVS in Overath also has a 12,000 litre rainwater storage tank that helps to protect our environment's resources.

AVS Traffic Safety in Mellingen/Thuringia also uses regenerative energy sources, with a biogas system covering demand for hot water and heat.

The twice-daily compulsory inspection and maintenance tours of roadwork installations and temporary traffic safety measures are conducted at the new AVS branch in Wetzlar with an environment-friendly gas-operated VW Caddy.

So you see, environmental awareness, climate protection and energy saving are not just hollow phrases at AVS and Berghaus but are part of a philosophy that is lived in many ways, as reflected in building management as well as the services and products.

MPB 1400 red countdown display in Istanbul



Mobile traffic light MPB 1400 with red-phase seconds display – to make every wait bearable.

ISTANBUL: At the end of May, we presented our current products to the international trade public at the "Intertraffic", including the mobile crash barrier systems in the ProTec family together with the portable traffic light MPB 1400 with red countdown display. The low-cost traffic signal system has been specially rated to suit the needs of our export customers, with a choice of many languages to guide the user through the menu, naturally also including Turkish. As quartz-controlled traffic light system, it can be used to control alternating one-way traffic systems or can even be extended to a crossroads system by adding any number of identical signal heads.

The optional red countdown display automatically ascertains the red phase in seconds, thus telling road users how long they have to wait. Particularly where longer roadworks are concerned, this considerably improves the necessary acceptance of mobile traffic light systems.

Erection devices with space for batteries

The frequent need for sturdy erection of mobile traffic lights at roadworks is also accompanied by the wish to manage without the standard mobile battery stands, particularly when these entail the use of overhead cables. Needless to say, here at Berghaus we have several solutions for such situations! The following pictures show just some of the versions we offer of aluminium sign

stands with additional battery compartment to supply power and act as additional ballast. For example, a 170 Ah battery saves the weight of about two paving slabs.

Depending on the specific requirement and site, combinations are also possible with the battery compartment loaded from the front or rear. Secure versions are also available that are equipped with an anti-

theft device for the padlock to prevent unauthorised interference.

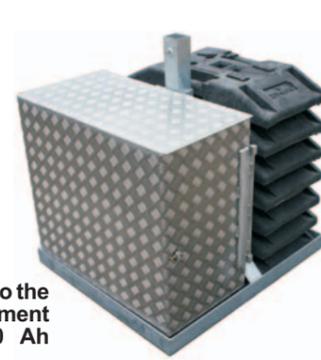
Our erection devices with battery compartment are a successful alternative to battery trailers for many applications, including mobile traffic light systems, illuminated arrows or prewarning lights on the motorway.



Battery compartment with front access for fast battery changes.



Battery compartment with top access. Special anti-theft lock.



Large front door to the battery compartment for two 12V/170 Ah batteries.

Mobile LED illumination for many areas



On the left:
The cranked mast brings the mobile lighting system conveniently to a fully variable height of up to max. 6 metres.
The hand trailer with braked drawbar and levelling supports has pneumatic tyres, with space for two 12V/170 Ah batteries.

Take a look at these three low-cost versions for provisional erection of battery-operated mobile 12V LED lighting. They are ideal in areas where no 230V mains voltage is available or where the disturbing noise of a generator is not wanted but light is still needed. The power LED lights are available in differing strengths and can be operated for several

weeks without having to change the batteries, thanks to low power consumption despite their great brightness (50W LED corresponds to about 500 W halogen spot).

Simply ask us for an offer for your specific application.



On the right:
The socket mast brings the LED spotlight quickly up to a height of 6 m.
The mobile aluminium battery casing can take four 12V batteries up to 170 Ah.
In the middle:
The three casings in the LED lighting system for 12V battery operation



AVS sets up large motorway roadworks in Lower Saxony

The team from AVS Traffic Safety Lehrte has once again punctually set up large motorway roadworks in Lower Saxony. On 20 June, the 11 kilometre roadworks on the A7 motorway from Bockenem junction to Salzgitter interchange were commissioned. The construction period will last for about two years, after which the approx. 58,000 daily road users will have the comfort of three lanes in each direction. The Road Construction Authority Gandersheim already paid special attention to traffic safety during the planning for this large site on the heavily used motorway, with big mobile congestion warning signs giving traffic an early warning of possible congestion ahead.



Clearly visible marking with mobile LED information signs at the roadworks entrance and exit points for heavy construction traffic.



Mobile LED signs visible from afar warn road users of pending congestion in the roadworks on the A7 motorway.

A large number of LED information signs (more than 20 in number) will then draw attention to special hazards such as the entrance to and exit from the roadworks together with early warnings of turning lanes and signs such as "Trucks keep your distance", as well as drawing attention to construction traffic entering and leaving the roadworks.

Correct functioning of the congestion warning system and the LED information boards is monitored by the service technicians at AVS Lehrte via the internet.

The signal patterns and the current battery voltage are constantly monitored to permit early reactions to falling battery voltage. With remote maintenance, the signal patterns of the LED information signs can also be adapted at any time to sudden changes on site.

During this large construction project, special attention is also given to the passive safety of the road users: all areas between on-coming traffic and the traffic to the roadworks are equipped with mobile crash barriers with at least containment level T3 (i.e. also with truck impact test); altogether 30,000 metres of mobile crash barriers have to be erected correctly.

The specialists from AVS Lehrte GmbH apply all markings, made either with thick film or cold spray plastic (KSP). Altogether 90,000 metres of markings will be applied to these roadworks. Subsequent demarking will also be carried out by our specialists, using the new AVS PeelJet.

Safety from a single source – how good to have an efficient, professional partner on hand to deal reliably with the many traffic safety issues!

AVS – Your Traffic Safety Professionals!

Your experts for **safe** roadworks:

Berghaus Traffic Technology and 11 x AVS-Traffic Safety



Safety by Berghaus



Your Traffic Safety Professionals!



Peter Berghaus GmbH as manufacturer for innovative traffic technology and our service provider, AVS Traffic Safety with its 11 sites nationwide are at your service in word and deed with more than 250 well qualified staff.

Temporary street lighting for roadworks



Temporary street lighting at motorway roadworks, as here at the A1 motorway near Bramsche, contribute to road safety and let work continue 24/7.

roadworks can also help to reduce the overall construction period, thus saving on construction costs if the work can be performed in several shifts.

This minimises the inevitable detrimental impact on traffic in the roadworks area.

These findings can also be transferred to motorway roadworks in Germany. And so in cooperation with SOLIS, last year we began with temporary lighting at roadworks. Road users, authorities

and construction workers on site were most receptive to the lighting implemented by SOLIS for the 24/7 roadworks on the A1 motorway in the section between Osnabrück-Nord and Bramsche.

24/7 work on the site had been stipulated by contract and was implemented consistently, with the exception of the 3-month winter break. To avoid distracting light sources while working at night from site spotlights among others, a separate lighting system was installed along the whole length of the roadworks. This provided sufficient lighting for the construction work while at the same time considerably reducing the risk of distraction for road users.

There was an extremely positive overall reaction to the improved clarity and visibility of the roadworks and particularly to the fact that the roadworks lighting made it possible to reduce the construction period by nine months.

Temporary road lighting for roadworks makes the changed road layout clearly visible, plays an active role in reducing the risk of congestion and accidents, and permits continuous work on site with a shorter construction period and fewer traffic disruptions, thus helping to minimise the economic damage.

Temporary road lighting - safety for efficiency.

Many road users fear motorway roadworks: tailgating during braking and slipping-in manoeuvres, the risk of congestion, forced lane changes and lane switching, unusual road layouts, slip roads onto and off the motorway together with entrance and exit points for construction vehicles as well as reduced lane widths – all this coupled with uncertainty and constant fear of the narrow situation forcing the vehicle between the crash barrier and the trucks. The whole traffic situation gets even worse in dusk and at night with increasing stress on road users – one of the largest causes of accidents!

Our neighbours in the Netherlands take a proactive approach to this problem and advocate the use of temporary road lighting to help road users navigate motorway roadworks with greater safety. Berghaus has now started cooperating in Germany with Solis Street Lighting, the market leader for temporary street lighting for roadworks in the Netherlands.

For years now, temporary road lighting has been successfully used at roadworks on motorways and main roads in the Netherlands. The wealth of experience gained by SOLIS reveals extremely positive results: fewer traffic accidents, earlier perception of lanes and signs, far smoother flow of traffic and a general feeling of greater traffic safety for all road users. Providing lighting at motorway

Bright, clear, "friendly" motorway roadworks on the A1 motorway.

Temporary road lighting turns the night into day – without dazzle.



Bilder: SOLIS



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