

## FOR SALE

**used Rack Ready HD OB Van Mercedes Sprinter 516 CDI prepared to mount a SNG system on the roof**

with HD cabling for up to 8 camera chains  
in top condition and immediately available

special two room design with working space in the production gallery for five people and  
working space in the audio gallery for two people

huge space in the OB Van due PTO (power take off) and PSM (programmable special module)  
please see detailed explanation on the next pages

rarely used  
only 900km mileage



**Price on request:**

Excl. VAT

excl. transportation and insurance costs

excl. custom fees

## Technical specifications of the OB Van:

### Short facts:

Mercedes Sprinter 516 CDI 2016 Model Mercedes Sprinter 516 CDI Extra Long Frame with PTO\* (Power Take Off), RPM lock options and PSM\*\* (programmable special module) added. Max total weight of the VAN is 5,000 kg inclusive of the vehicle weight. Very reliable vehicle with well established service and support base. Another key factor in choosing Mercedes Sprinter as the VAN is due to several advanced integration options Mercedes incorporates into its product lines. One such combination is PTO and PSM options which enable coupling a high yield alternator to the truck's gearbox providing a huge space saving solution to generator requirement which is fully explained in the Power System Solution section.

\*PTO: Power take off – this is same mechanism that is mostly standard on big trucks that can lift their back. When the vehicle is parked and engine is running it allows the engine power to be diverted to another device rather than the wheels. In this case this is 20 kVA 3 Phase AC alternator.

\*\*PSM: Programmable System Module - This is an additional computer supplied by Mercedes and it integrates with all the on board sensors. Its function is to provide Coach Builders and Upper Builders a safe system to control vehicle computer systems. So in this case when PTO is button is pressed the PSM computer checks if the handbrake is engaged or not and once confirming this increases the RPM to 1600 which is our target RPM for the alternator kit.

### Coach Layout:

This coach design accommodates up to 8 operator seats at the max. As the design requires VAN engine to be always on, additional sound isolation has been implemented in the audio production area. The driver and side seats have been modified so they can turn 180 degrees to switch to production position. Since the equipment racks are pushed back, the interior of the operational area has been designed as the equipment loading area and the wall covering below table line has been chosen from a material that has high durability against scratches and dirt marks as well as anti-static properties. Several fixing hooks and clamping points have been incorporated into the dust line of the operational area to keep loaded equipment fixed in place during transportation.

### Power system – according to the European Health and Safety power regulation rules:

The Power Transfer Option in Mercedes truck series allow the engine power to be diverted to its alternate output when the truck is fully parked (hand-foot brake engaged, gear is set to empty position). The PSM system provides additional programming functions that further fine tune this application where the engine rpm can be set to a fixed value when in PTU mode thus enabling the three phase alternator to generate constant 230 volts at 50 Hz. This design provides several advantages over traditional silencer boxed generator designs. First obvious advantage is recovered space both inside the van as well as on the roof for external radiator of the super silent generator design. Second advantage is increase in power generation as the selected 3 phase alternator generates 20 kVA AC power instead of the target 15 kVA of a super silent generator. Third advantage is removal of sound from inside the operations area.

As the truck engine is positioned outside as well as the alternator the penetration of both sounds into the operations area has been severely eliminated compared to a super silenced generator that would sit behind the racks. Furthermore the target rpm of truck engine is at 1600, which is quite silent state of the truck engine itself. Thus the noise audible from outside is also quite small.

The Vehicle is powered by three phase 230 Volt 50 Hz AC power through truck engine-alternator couple or shore power. The power termination panel at the back of the left side of the vehicle provides the necessary power input terminals to connect shore power when necessary as described above. There are phase indicators in this power termination panel to connect the three phase power in correct sequence as well as power outlets to supply protected power to some external devices. There are also grounding terminal at this point and the vehicle will be grounded either to the incoming three phase power's common ground or separately by the use of a grounding copper stake which will be provided as standard accessory to the vehicle. The power system has Voltage Regulation through 10 kVA Dual Conversion type Online UPS unit to further safeguard the systems inside. The power control panel (PCP) is located inside the vehicle on the left side of the main equipment rack block. All main circuit breakers, surge protection devices, fused circuit breakers, voltage and current meters will be housed in this panel. All power distribution to other equipment will branch out from this panel to rack mount mains distribution units

(MDU) with on / off switch and individually fused outputs. All the branching power cables from the PCP to MDU is silicone type that withstands 800 degrees Celsius over an hour thus reducing fire risk.

**Daikin 18k BTU ACAir Condition System:**

Prepared for up to more than 50 degrees outside temperature: The capacity of the AC system is 18.000 BTU. The AC system is based on split compressor/inverter and air handling unit (AHU) type air conditioning device. The main unit has been positioned inside the top wind shield above the driver cab. The AHU is positioned directly above the equipment racks and sucks hot air directly above and through the racks. In case that the Sprinter is used in cold areas, it is possible to add diesel heater (Webasto 2kW or above) to provide heating and cooling independently.

**Racks, monitor walls and furniture:**

There is one dedicated rack group for all the main processing frames of audio, video, data and intercom systems which will be positioned towards the back of the OB Vehicle. The racks are made of aluminum to provide best of all worlds such as weight, size and reliability. The monitor walls frames will be simple frames secured to the internal reinforcing frame rather than walls to increase reliability and security of the implementation. The operational furniture is made from a combination of galvanized iron and plywood or MDF material. Any MDF or plywood surface is treated with high pressure laminate for extended life.

**Walls, Ceiling and Floors:**

All walls and ceiling is covered by industrial grade anti-static, flame retardant carpet. The floor is made from PVC mat coated plywood. The PVC mat is anti-static and anti-skid to provide superior operational comfort and safety compared to the carpet. Additional benefit of such PVC mat is inherent water proofing ability.

**Sound Isolation:**

A special sound isolation has been installed to insulate external noise as well as lessening cross talk between the operational areas.

**Lighting System:**

The interior lights are dimmable LED lights fed from main power distribution system. There are additional lights in each operational area as well as behind the racks that are powered from the main battery and DC power system of the truck to provide temporary and emergency lighting.

**Vehicle Stabilization:**

There are four hydraulic jacks to stabilize the vehicle. The control of these jacks is under the passenger seat on the front. There are security measures that prevent the vehicle to be moved while the hydraulic jacks have been engaged.

**First registration:**

First registration in April 2016

**Last service:**

February 2018 - next service will be done shortly

**MOT certificate:**

valid until January 2020

**Weight:**

4.200kg including all cabling

**Euro 6 emission norm:**

Euro diesel 6 engine

**Mileage:**

900km

**Stabilizing legs:**

HWH brand quad hydraulic stabilizing legs with auto fold function

**Side tent:**

Domestic side tent, 3.5 m x 2 m – manual winding

**Distribution Unit:**

10 x TSL Mains Distribution Units (1 in 14 IEC out)

**LCD monitoring:**

8 x 27" LCD monitors on main monitor wall

**Special two room design:**

**Video Production room for up to 5 people:**

Main production desk with 3 metre length

4 operational seats on the main production desk, 1 sideways sitting position for 5th operator

4 x 4 U angled racks on the main production desk

111 U space on main racks

Main racks depth up to 80 cm

Can hold camera cases, tripods and portable cable drums for up to 6 cameras

Fiberglass wind shield on the front covering main unit of the AC

Reinforced roof structure with extruded aluminium tube system for weight reduction and easy adaptation for changing needs

Added back step for easy entry and exit

Automatic side step for easy entry and exit

Mini tent system at the back for protected access to the back of the racks

Side wall boxes for power and Audio, Video & Data TP

**Audio production room for two people:**

Rotation mechanism for the driver and passenger seats

Technical table with 90 cm depth, suitable for any audio mixer with 90 cm x 90 cm foot print

Suspended rack with 2 x 12 U space

Right side rack can hold deep equipment, left side rack is for patch panel and shallow equipment

Additional storage space under the audio production table

**Pre-cabling:**

4 x Canare DV-24 video patch bays

2 x 32 port 6.5 mm TRS audio patch bays

Prewired for up to 8 cameras, 64x64 router, 3 ME - 24 input vision mixer and glue

All audio and video cables are from Belden & all BNC connectors are from Belden, XLR connectors from Neutrik

**External Cabinets and Access Doors:**

All storage cabinet doors and access doors that have vertical movement for opening or closing have gas springs to provide easy opening and closing as well as added operational safety. Any such vertically opening door has locking arms for additional safety during operation. All external doors regardless of orientation or purpose have watertight gasket seals providing full water proofing of the vehicle.

**SNG option:**

The OB Van can be upgraded to an SNG

The roof can accommodate a satellite dish up to 150 cm diameter

The roof is compatible with any brand as long as it does not go beyond 150 cm size

Outdoor type HPAs as this provides easier temperature control inside the vehicle is recommended

The previous antenna which was used had internal space in the housing for 2 x 400 W HPAs so a similar solution with a 120 cm or 150 cm antenna can be utilized

**Wave guides:**

If an outdoor type HPA is used, then there is no need for special exits for wave guides

There are already two cable exit holes that are rain proof on the roof.

If an indoor type HPA will be used, then drill transition holes for the hard wave guides are needed

There is cable exit hole that a flex waveguide can pass but this will increase the length of the waveguide and thus introduce more loss

**Possible locations for satellite gear:**

The recommended space for satellite gear (encoders, satellite antenna controller and satellite receivers) can be anywhere in the free area. If the end user chooses to use indoor HPAs then we highly recommend using the two 6U racks at the very top for those. This way it's possible to do some modification and create direct exhaust for the HPA's hot air output.

Inside Photos of the OB Van:

Video production room:

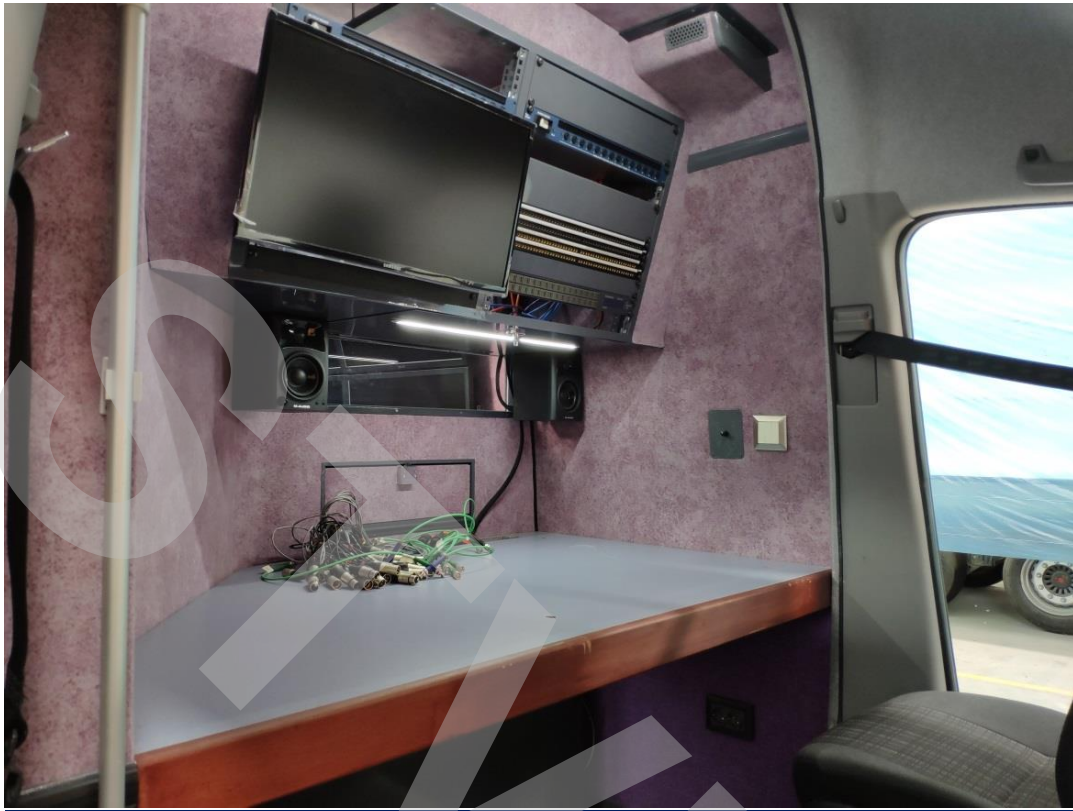


sports tv media  
distribution

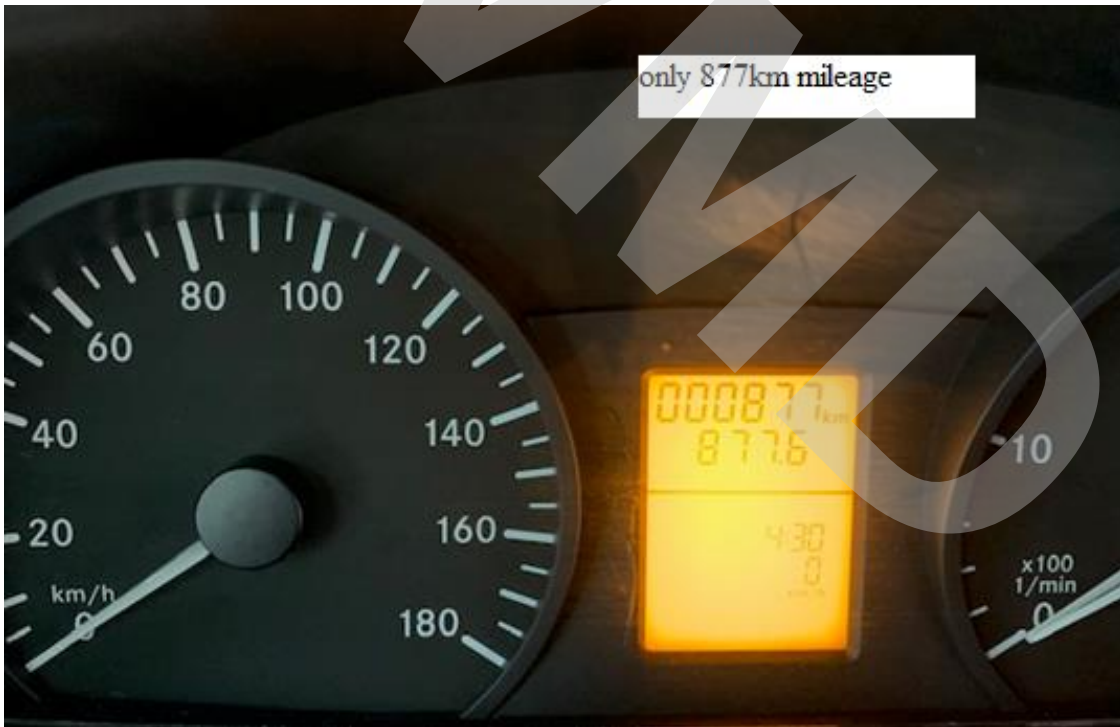
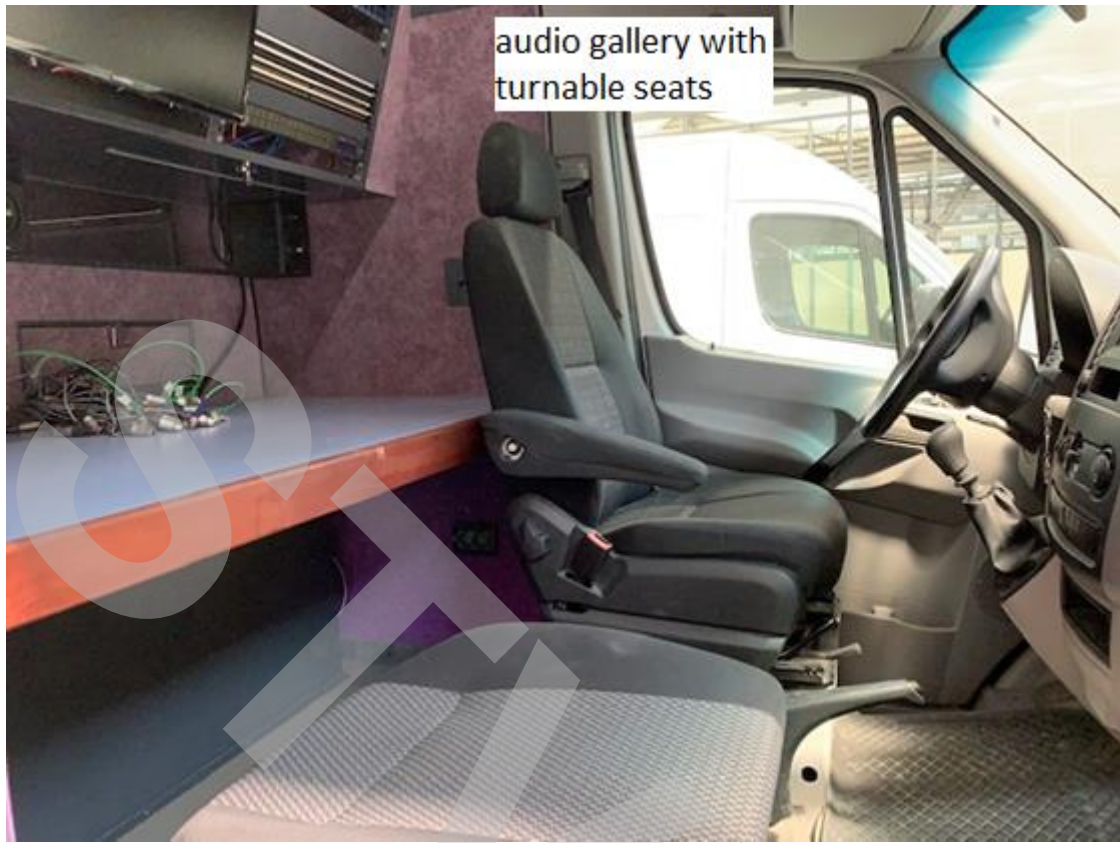
Paradeisergasse 9 • 9020 Klagenfurt, Austria  
Tel.: +43 463-90 8000 • Fax: +43 463-90 8000-99  
e-mail: stvmd@stvmd.com • <http://www.stvmd.com>



Audio gallery and drivers cabin:







Outside Photos:







**External Cabinets and Access Doors:**

All storage cabinet doors and access doors that have vertical movement for opening or closing will have gas springs to provide easy opening and closing as well as added operational safety. Any such vertically opening door will also have locking arms for additional safety during operation. All external doors regardless of orientation or purpose will have watertight gasket seals providing full water proofing of the vehicle.



**Back Area:**

The back of the van has additional inner panels to prevent rain coming into the vehicle when the back doors are open. The top side of the inner panels also acts as a sun/rain shield when engineers need to perform tasks behind the equipment racks.

# sports tv media distribution

Paradeisergasse 9 • 9020 Klagenfurt, Austria  
Tel.: +43 463-90 8000 • Fax: +43 463-90 8000-99  
e-mail: stvmd@stvmd.com • <http://www.stvmd.com>



The back of the racks are accessible through two vertically operating doors. The bottom half folds down and provides secure footing area for the operators and the larger top half holds up providing sun and rain coverage during technical work.



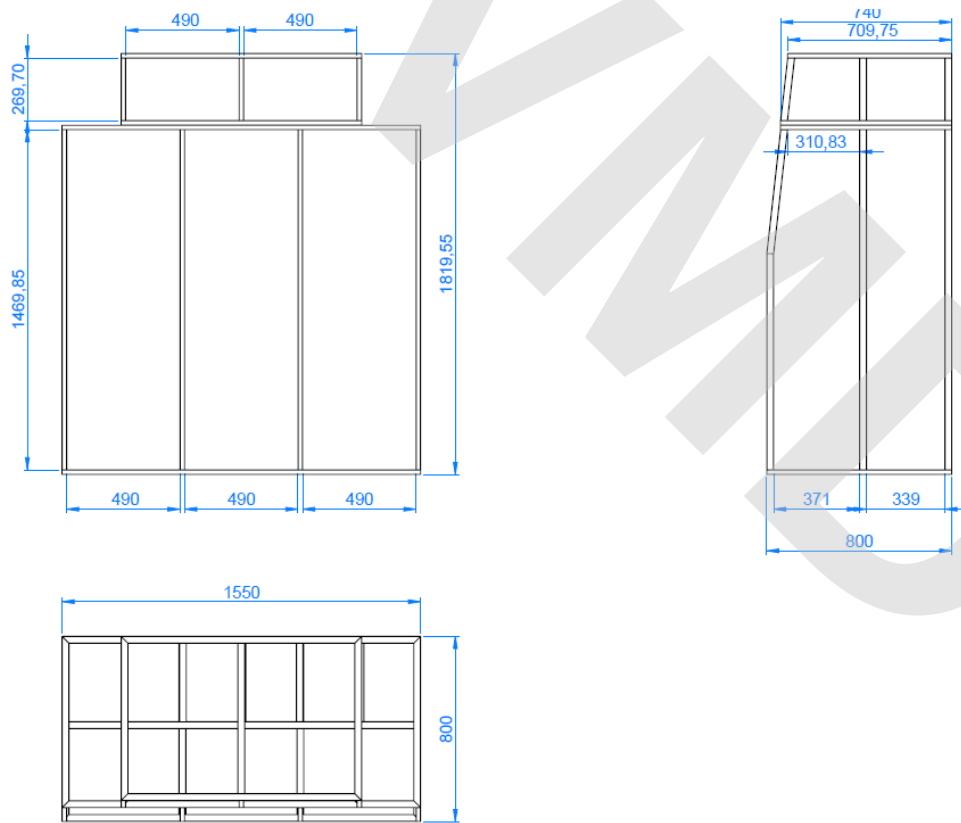
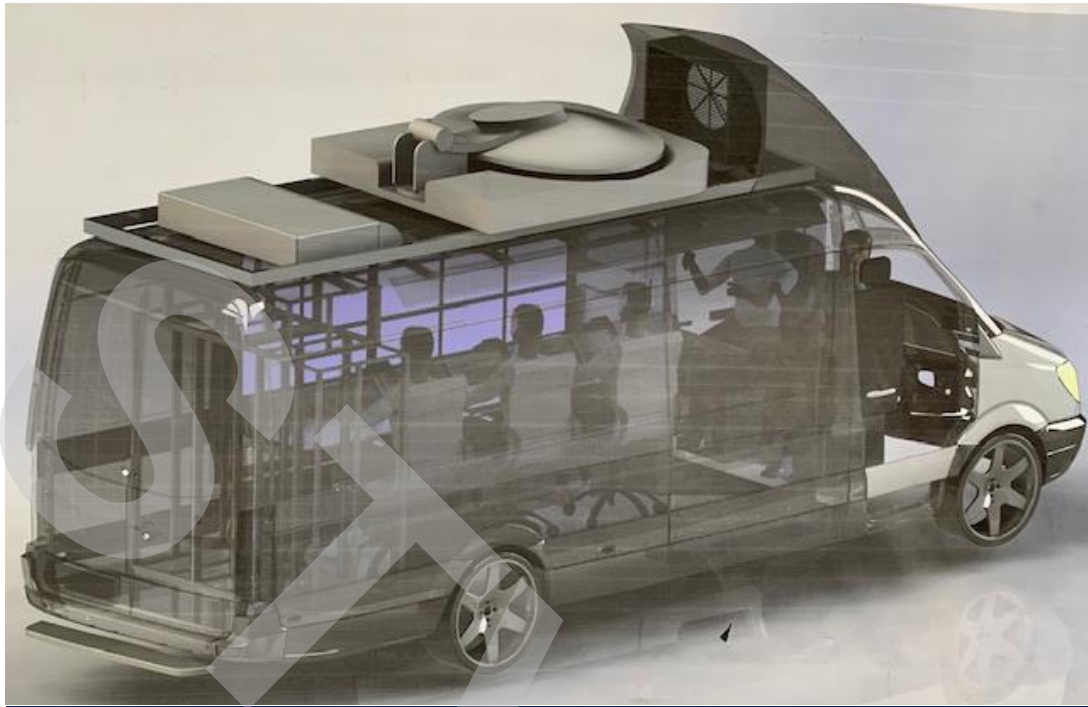
Top and side view of the truck and its layout

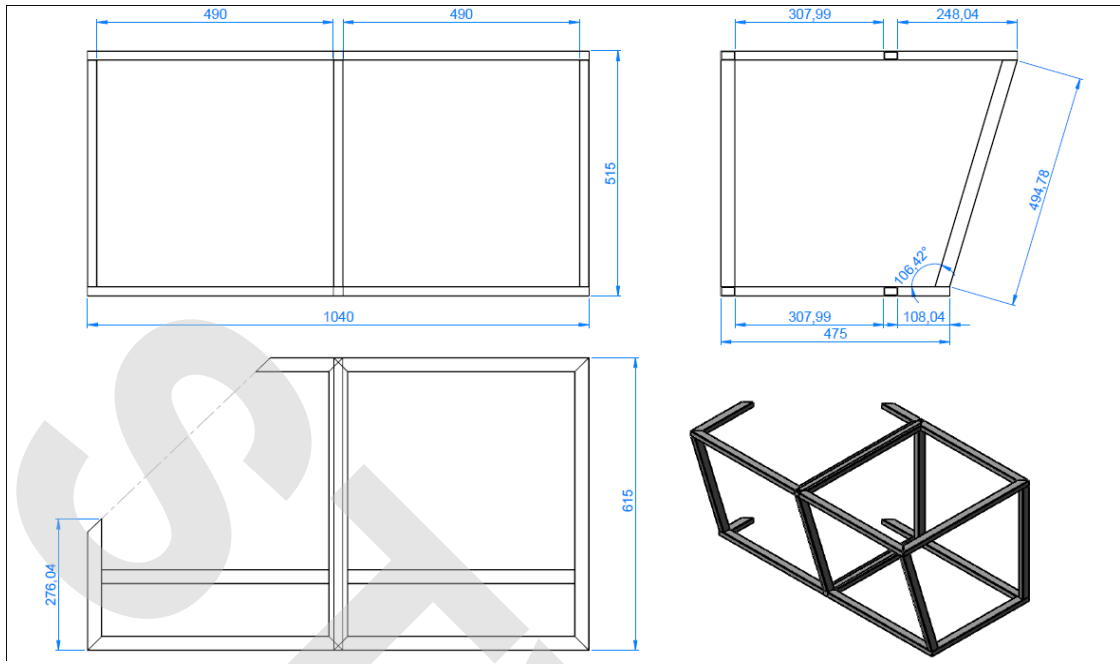


The front and back iso views of the truck and its layout

**please note that, subsequent change requests regarding the facility can be made easily**

Layouts of the OB Van:





**Rack Layout from the front:**

TSL MDU 1	TSL MDU 2	TSL MDU 4
	TSL MDU 3	
	Canare DV-24 Video Patch 1	
	Canare DV-24 Video Patch 2	
	Canare DV-24 Video Patch 3	
	Canare DV-24 Video Patch 4	
	Target area for Router	
	Target area for CCUs	
Slide out drawer - can relocate		Blocked due to desk
KVM - can relocate		
Target area for EVS		Target area for Vision Mixer
UPS 10 kVA		Target area for Glue Products



sports tv media  
**distribution**

Paradeisergasse 9 • 9020 Klagenfurt, Austria  
Tel.: +43 463-90 8000 • Fax: +43 463-90 8000-99  
e-mail: stvmd@stvmd.com • <http://www.stvmd.com>

**For more information please contact:**

sports tv media  
**distribution**

Otmar Valzachi  
sports tv media distribution GmbH

Paradeisergasse 9  
9020 Klagenfurt

Austria

Tel:+43 463 908000  
Fax:+43 463 908000 99  
Mobile:+43 676 848606211  
email: [ov@stvmd.com](mailto:ov@stvmd.com)  
<http://www.stvmd.com>