Safety for trade, craftsmen & industry

BRODINGER

# IT Security Technology for Your Business

BRODINGER

AUSTRIA
MADE IN AUSTRIA

DIN
Geprüft

M 7135
GEPRÜFT

VdS

ÖN
Österreichisches Normungsinstitut
Austrian Standards Institute

RoHS
2002/95/EC
Compliant

www.brodinger.at

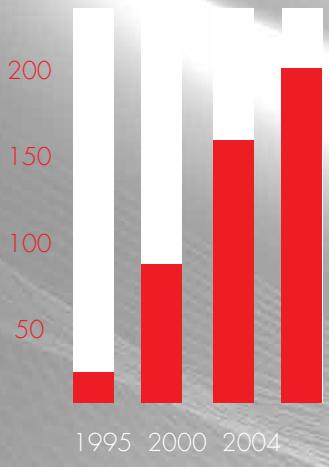
The fewer interfaces that are necessary, the more reliably complex projects can be handled. Make the most of the direct services from the "complete solution supplier" and you can rely on a straightforward project workflow – from initial conception through to day-to-day operation.

We look forward to working with you!

Roland Brodinger

# Your project: top priority from now on!

## Installed systems




**Experience & know-how**
Long years of experience with concepts which secure buildings and counter a wide range of different sources of danger allow our team to implement turnkey solutions which are customised to the requirements of your company.

**Professional complete solution**
Our company provides different services for customers. These start with fire protection and cover climate control and a reliable power supply as well as solutions preventing theft, sabotage and vandalism.

### Safety through planning & concept design
We will plan a future-proof IT-centre for you, from initial analysis of the location right down to the tiniest technical details. Our trained project managers are available for you.

### Safety during project execution
We have professionals both in the field and internally who will guarantee a smooth project workflow and try to incorporate your wishes at all times. Our assembly staff are always trained and certified to the current technical standard.

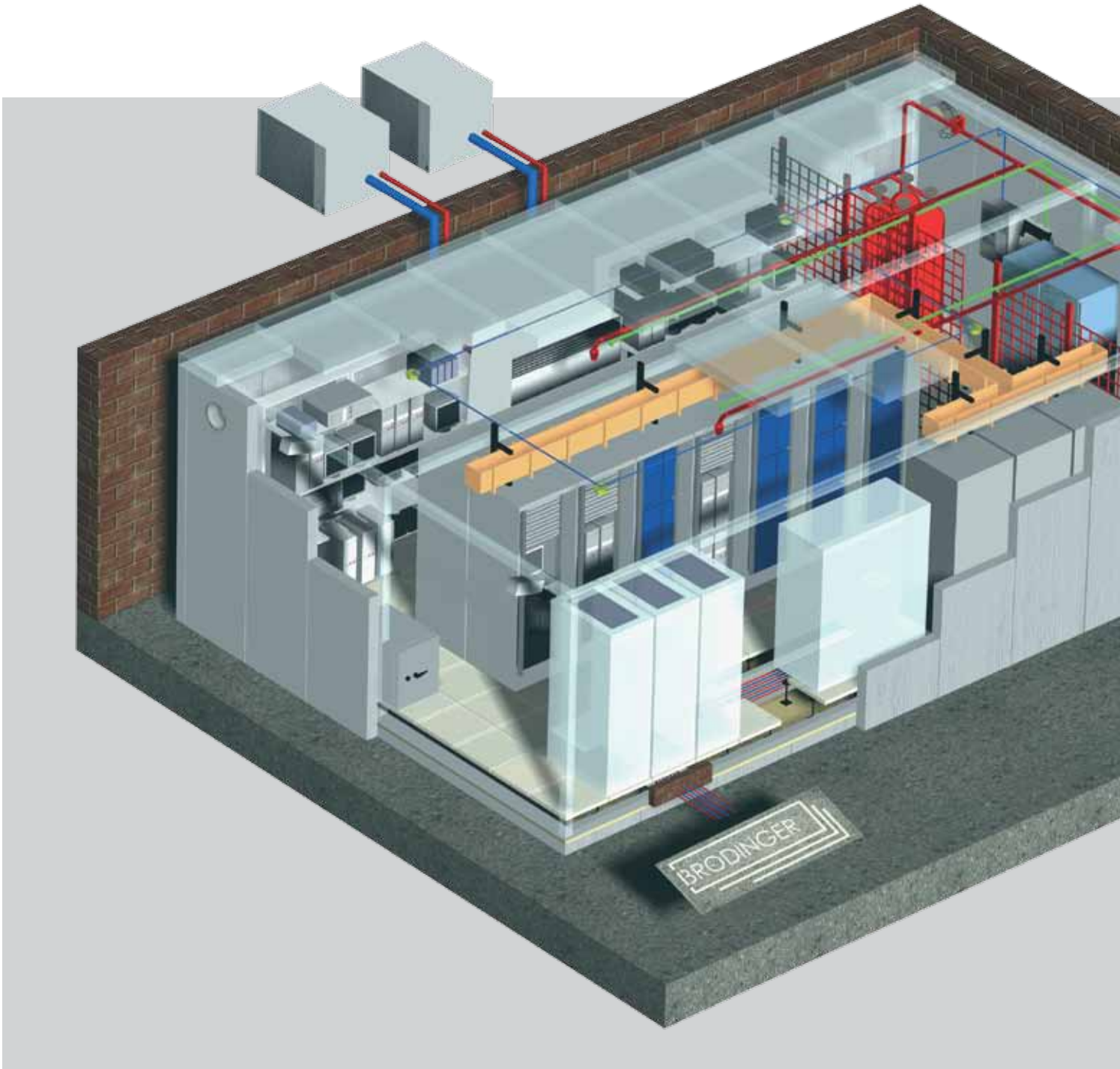
### Safety through certified products
We use only tested, high-quality products. These have been up and running problem-free for years in various projects. New products are tested thoroughly before delivery.

### Safety in day-to-day operation
Our warranty conditions are sometimes valid for decades. Thanks to our comprehensive maintenance packages you only need one central contact.

A 24/7 hotline and fast response times in the event of an emergency guarantee almost 100 percent availability.

# The professional
# comprehensive solution

Complete handling from A-Z. Direct from the manufacturer



BRODINGER

- Complete room designs
- Redundant air-conditioning systems
- Fire protection inside and outside
- Permanent monitoring & alarm triggering
- 24/7 service

IT-safety cell F120

## Your benefits

**Complete room designs**
as a protective shell which protects the heart of your company from fire, extinguishing water, debris, access by unauthorised persons, theft, dust and soiling.

**Redundant air-conditioning systems**
A fail-safe room climate makes maximum service life possible for your components.

**Fire protection inside and outside**
protects your IT systems from loss of data in the event of a disaster.

**Permanent monitoring**
All safety-related factors in an IT security centre are registered and signalled in good time.

# Full service for your safety

From conception through turnkey delivery to ongoing support

## Planning & concept

**The solution for your technical infrastructure starts with single, backed-up server safety cabinets and leads via the equipment for your existing computer centre to a turnkey complete solution in the form of a fail-safe, tested computer centre.**

Since a company cannot afford either failure, interruptions in operation, hardware faults or loss of data in the computer centre, it is important to take sufficient professional precautions in good time.

Our safety projects are prepared very carefully, supported and operated long-term. The first steps cover the requirement analysis, which encompasses all the individual circumstances at the respective company, and include a strategic orientation plan and feasibility study.

Then we examine which parts of existing stock can be used and what other additional components are required to achieve the objective – comprehensive IT safety.

## Conversion and new building work

**Wherever existing rooms are to be converted to server rooms, we can perform all the construction work, depending on the security level required.**

We supply complete turnkey systems with perfectly matched components.

We provide a one-stop shopping service for you – from location acquisition through the entire technical work necessary for the room through to after-sales support.

We can upgrade existing server rooms which have a standard constructional design to the latest technical standard by providing accessories such as cable seals, partitions, fire protection doors, double floors etc., thus ensuring basic protection for the IT server landscape.

With our equipment options we can transform a "damp basement room" into a high-tech, fail-safe computer centre.

BRODINGER

- Planning & concept
- Conversion and new building work
- Complete installation
- Maintenance & support

## Complete installation

**Our on-site professionals guarantee a smooth process, from the start of implementation through to turnkey delivery.**

We put up walls, line existing walls with facing, lay double floors and fit fire protection doors. We seal apertures fireproof, and install fire protection, air-conditioning systems, power supplies, alarm systems etc. depending on individual requirements.

Integration in day-to-day operation is carried out hand-in-hand with the customer.

All the products used by Brodinger must fulfil stringent requirements and run problem-free for years.

## Maintenance & support

**A 24/7 hotline and fast response times in the event of an emergency guarantee almost 100 percent availability.**

During the annual service we work closely with the customer to keep the safety concept in line with the very latest requirements. High quality of the services provided and technology used is essential for this to be achieved.

In addition, you benefit from having one central contact for all matters related to your project.

Warranty conditions are sometimes valid for decades. Our assembly staff are always trained to the latest technical standard.

# Room-in-room **safety cells**

High-availability server rooms for maximum system stability for your IT system

## An IT safety cell offers comprehensive protection against:

fire, extinguishing water, fumes,
water damage, building moisture, dust,
debris, electromagnetic interference, theft,
sabotage, overheating, system failure

## IT-safety cell room-in-room solutions

are a complete room-in-room design and protect the sensitive hardware inside against all kinds of physical damage that can occur.

are modular safety rooms resistant to fire, fumes and extinguishing water which deaden noise and prevent destruction caused by debris.

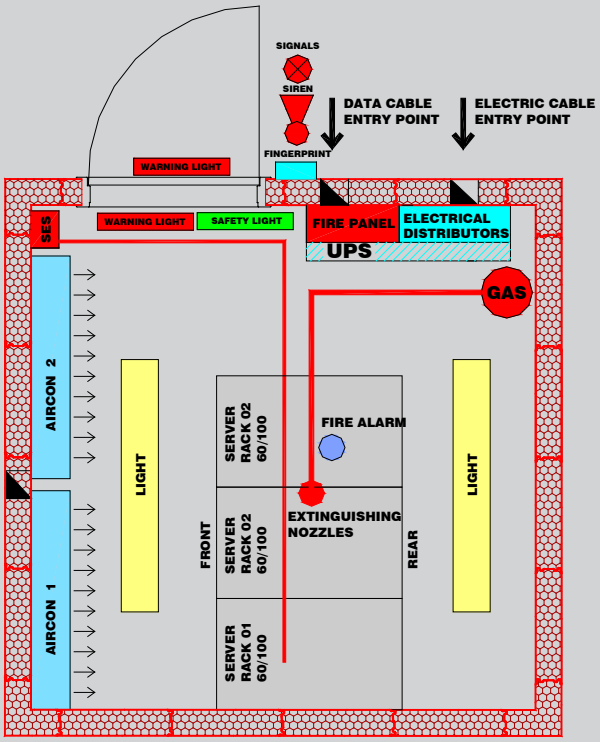
are installed in existing buildings in accordance with customer requirements. Their footprint is the result of the required number of server cabinets.

provide the possibility of equipping your server rooms with comprehensive accessories such as climate control, fire detection, gaseous fire suppression systems, UPS-systems, access control and much more besides.

EWE-Küchen, Wels/Austria

BRODINGER

- Hard server room
- Backup server room
- Telecommunication centre
- Backup computer centre
- Custom solutions




Fire behaviour up to F180

Resistance to water spray and extinguishing water IP

Fume protection in accordance with DIN 18095

Debris protection in accordance with DIN EN 14195

Burglary protection VDS-WK 2-3

Electrical engineering in accordance with E 8001

# IT-safety cell

## in accordance with DIN, ÖNORM or EN

Thanks to the comprehensive equipment options offered by our IT safety cells, we can offer customers an all-round solution for their server room design.

Server room equipment can also be installed in an existing server room without IT safety cell.

- Climate control
- Gaseous fire suppression system
- Early fire detection
- Avoidance of fire
- Uninterruptible Power Supply (UPS)
- Wiring
- Alarm system
- Access control
- Control centre technology
- Server racks
- OFC cables
- Video monitoring
- IT cabling

# IT-safety building

Building solutions – stationary or transportable containers

**Do you need a computer centre as a separate building structure on your company grounds or distributed among several sites?**

We can provide the turnkey all-round solution from a single source, and set up a future-proof, modern computer centre at an unbeatable price/performance ratio.

Since we carry out all the work for your project, the costs are much lower than costs for conventional work with individual job lots. You benefit from our long years of experience in constructing computer centres. We size all the major parameters, performances and reserves according to your requirements.

We provide a unique, long-year warranty for the completed all-round solution. You have one central contact for all matters connected to the project.

This saves you the time and energy you would otherwise require for organising, coordinating and chasing up construction companies and craftsmen.

## Our services include:

**Looking for the right site**
**Planning**
**Submission of planning documents**
**Execution of building construction work**
**Equipment with all technologies**
e.g. fire protection, climate control, energy supply, access control, alarm systems, data cables etc.
**Turnkey all-round solution**
**Complete maintenance**
**Extended warranty**

Forster, Waidhofen/Austria

BRODINGER

- Variable room design
- Modular room set-up
- Transportable structure
- Clean-room technology
- Turnkey

# IT-safety container

## Equipment options:

Electric controls
Power distribution
Air-conditioning systems
Alarm systems
Gaseous fire suppression systems
Access control
Video monitoring
19" server cabinets
Fire detection
UPS systems
Diesel units
etc.

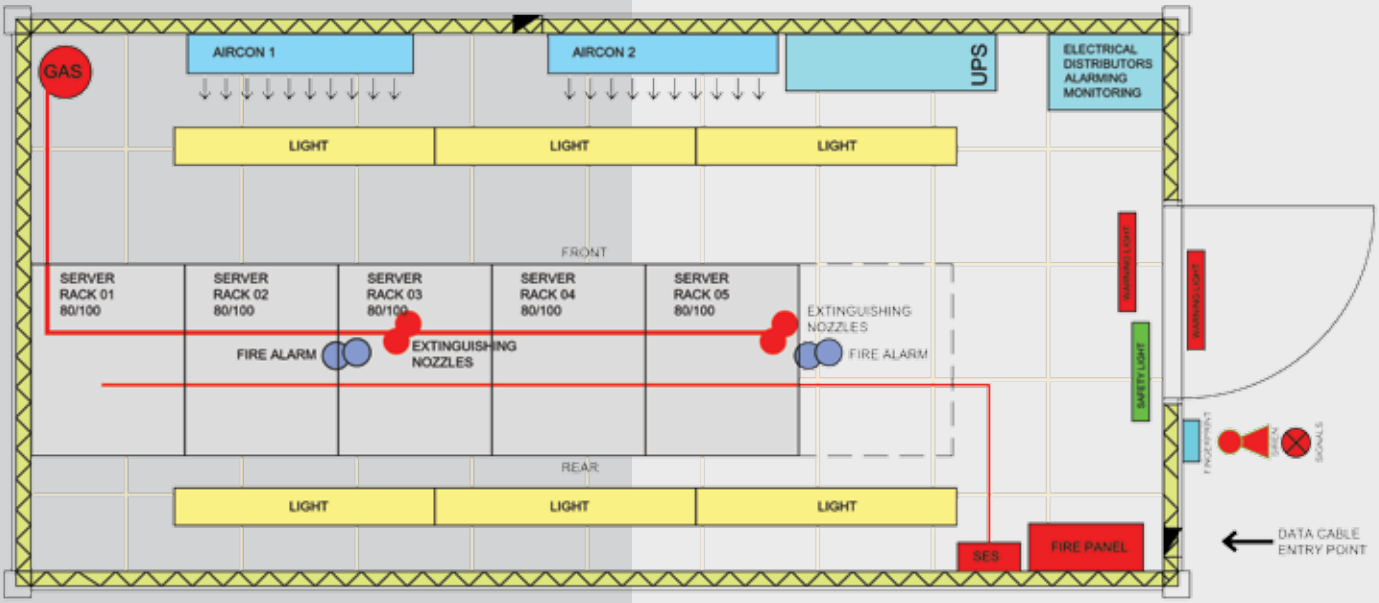
**Included in the scope of supply:**
Complete fireproof structure including floor, ceiling and walls. Independent, separate fire compartment with official building authority approval.

Fire protection doors with additional fume and burglary protection.

Anti-static and ground-protected floor.

Cable seals for power and data cables for modular assignment of up to 80 power cables.

Potential equalisation, service sockets, electric switchgears, cable routes etc.



# IT climate control

Controlled room climate for your server components

**We design your climate control system, select and install the right components and check day-to-day operation.**

A fail-safe, controlled room climate is one of the most important factors in IT rooms.

If hardware such as processors and network equipment overheat, this can result in system faults which trigger an often fruitless search elsewhere.

Damage to hard drives is often due to excessive operating temperature.

We dimension your air-conditioning system, ensure the right system is selected, handle the complete installation process and check the day-to-day operation of the climate control system.

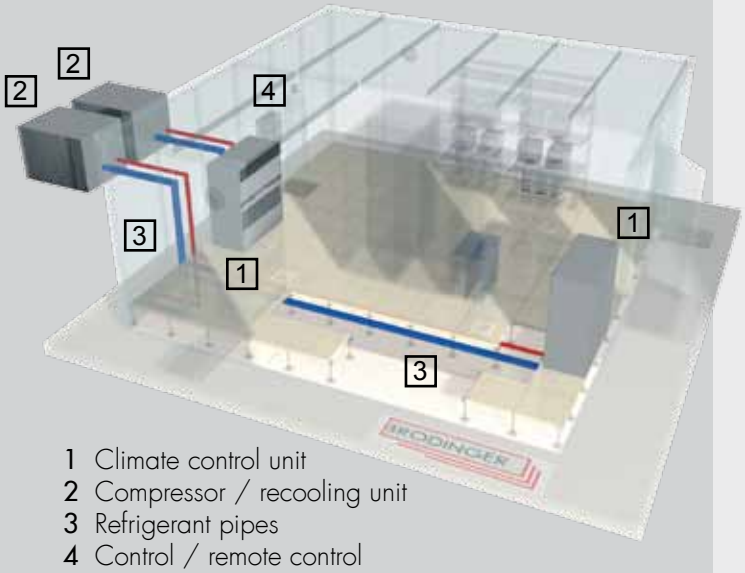
Our team has the necessary know-how and years of experience in designing climate control systems for complex IT systems.

Our service contracts guarantee you fail-safe operation throughout the year.

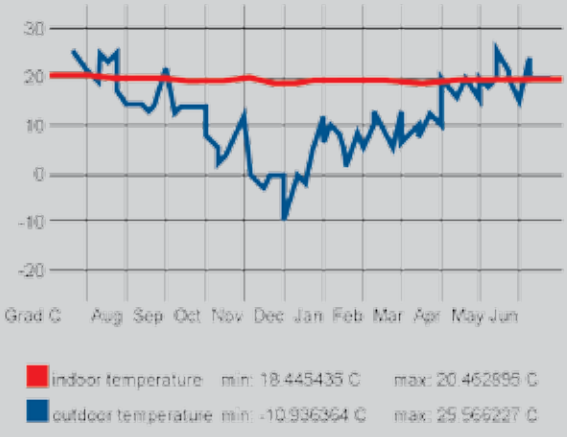
Red Cross, Graz/Austria

BRODINGER

- **Availability guarantee**
  through redundant systems
- **Low operating costs**
  thanks to correct dimensioning
- **Reduction of CO2 emissions**
  by using natural energy sources




1 Climate control unit
2 Compressor / recooling unit
3 Refrigerant pipes
4 Control / remote control




We keep your server climate constant using climate systems from 3 kW - single or redundant.

# High-capacity climate control units

**Our devices have been developed specifically for use in the IT field and are sensitive systems which can cope reliably with the heat load of temperature-sensitive components,**

keeping the temperature within the whole system to within tight limits.

Our range of products comprises several device types, each of which is available in a wide range of capacity ranges and with a comprehensive range of accessories.

Reduce energy costs:
we also offer you the optional possibility of lowering your energy costs through the use of existing resources – Green IT.

# IT fire protection

Fire-fighting or avoiding fire from the outside

## Early fire detection in IT server rooms

Aspirating smoke detectors are active systems. They do not wait for smoke to rise, they draw it in. This allows them to react much more quickly and sensitively than conventional solutions to fires as they arise.

Our aspirating smoke detector is an ideal combination of the advantages of a linear alarm system with those of a spot-shaped smoke detector.

It draws in even the tiniest amounts of smoke and evaluates them. This results in numerous possible uses to protect technical equipment.

## IT gaseous fire suppression system

Using inert gases to put out fires presents the optimum solution to protecting important areas of the company, since the extinguishing agent itself does not cause any additional damage.

Fire suppression is completely residue-free, which means for example that technical equipment remains functional and valuable data are retained.

Ivoclar, Italy

BRODINGER

- Fire detection as an early warning system
- Stops fires breaking out
- Avoids potential fires

## How it works

### Avoidance of fire

By reducing oxygen content, the system guarantees permanent protection in closed rooms. The oxygen share is kept to a fixed level by the controlled introduction of nitrogen.

A fire cannot break out in this atmosphere. All the areas protected by fire avoidance measures can be entered and guarantee unhampered process workflows.

**Areas of application:**

IT facilities

Central electrical control rooms

Archives (museums, data archives)

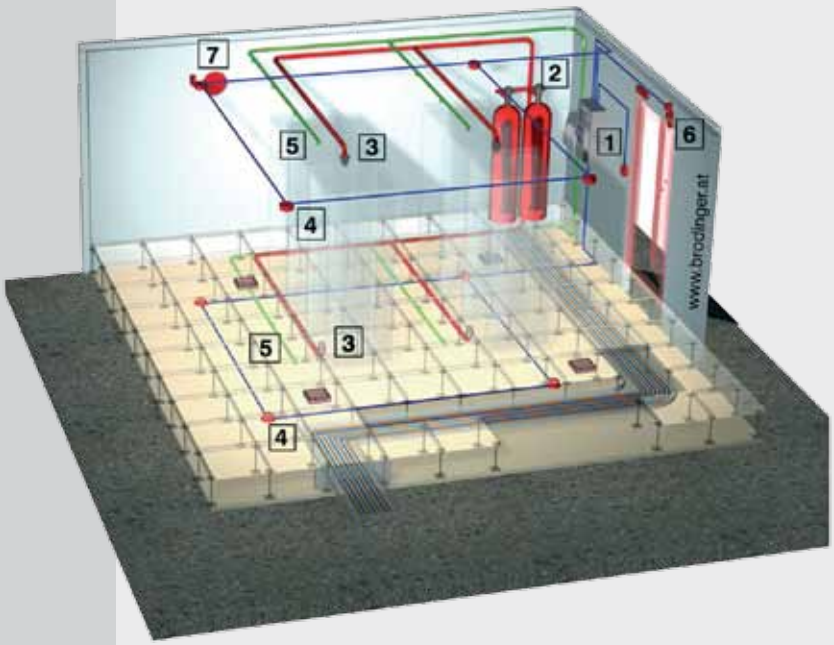
BRODINGER IT-safety cells

IT-safety container

## Room extinguisher system

**The most important components in an extinguishing system are:**

1 Fire extinguishing control unit
2 Fire extinguisher
3 Extinguishing nozzles
4 Fire alarm
5 Aspirating smoke detector system
6 Optical and acoustic alarm system
7 Excess pressure flaps



# IT power supply

Uninterruptible power supplies now also for problems with the mains supply

## Electric wiring and power distribution for IT systems in accordance with ÖVE/ONORM E 8001

A reliable power supply with maximum availability is one of the most important factors in an IT server room or computer centre. Unfortunately, power failures caused by the wrong or sub-standard fuses and electric cables are still a major problem in IT systems.

Together with our UPS systems we deliver reliable IT power for maximum availability of your systems. To achieve this, we use pure IT electric components in accordance with current standards and regulations (E 8001 in Austria or IEC 60364 internationally). We create the legally prescribed system log for every system, and carry out inspections during day-to-day operation.

## UPS system

UPS systems were designed to backup sensitive computers and servers which require a high capacity factor. For modern applications in the fields of IT, telecommunication, automation as well as in the health and financial sectors, central backup by means of UPS systems is a major aspect of IT infrastructure.

We deliver the all-round power solution to match your computer centre, starting with capacity requirement planning through routing the power cables to installing the UPS system. 48V / 230V / 380V AC or DC power supplies for your servers are dimensioned correctly with or without upstream uninterrupted voltage supply, labelled accordingly and fuse protected.

IT backup room, Linz/Austria

BRODINGER

- IT electric wiring in accordance with standard
- Automatic emergency power circuits
- Additional power supply with power generator
- Uninterruptible voltage supplies

# Emergency power generation
## with additional tank

# Supply units

Automatic emergency power supply in the event of mains failure

The power generator takes over power supply after only a few seconds, and switches back to the local utility company supply as soon as power returns to the grid.

With our products, complete installation – including protection – is built into the power generator. Single- and three-phase versions are available.

### Advantages:

Use possible throughout the world

Different capacity levels

Latest efficiency and engineering standard

Long years of manufacturing experience

Customised solutions

Design optimised in terms of fuel consumption

Comprehensive 24/7 services

# IT alarm management

Permanent monitoring and alarm signals

**All the safety-related factors in an IT safety centre are monitored permanently by different alarm packages.**

Potential hazards are registered and signalled in good time. Corresponding counter-measures can be initiated on site or through remote monitoring.

### Access authorisation:
Access to the server room is registered by appropriate movement detectors or door contact switches.

### Temperature:
This is monitored by analogue or digital means. A signal is issued if a threshold value is reached.

### Air humidity:
A hygrometer observes the relative humidity in % and signals a threshold value.

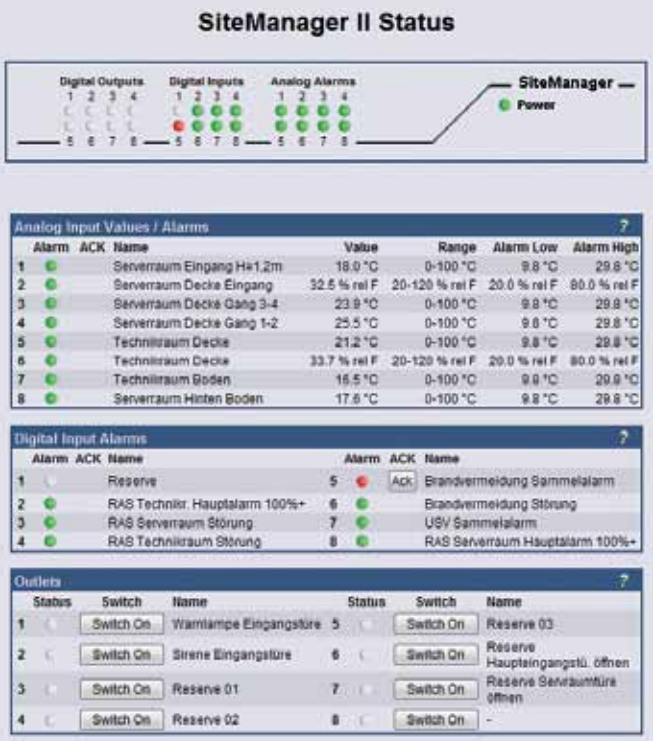
### Water penetration:
Water penetration can be monitored by means of a float switch or water leak system.

### Smoke development:
One or more optical smoke detectors (or an optional early fire detection system) monitor any smoke development.

### Vandalism:
Any vibrations caused by damage to windows, doors or wall elements is detected by corresponding sensors.

### Operating/fault signals:
Equipment in the server room such as climate control devices, fire extinguishing systems, UPS systems etc. can be triggered.

Alarm terminal, Graz/Austria




BRODINGER

- Timely detection of danger
- Registration and signalling
- Remote monitoring
- Keyless access control

# Access control
## by finger scan

# Tried-and-trusted technology

Biometric systems, which work through the recognition of unambiguous human features, have been in use for many years now.

Authentication by means of fingerprints is considered one of the safest methods available. The systems used today scan fingers optically, capacitively or thermally.

Alongside safety, convenience and costs are two other important factors. No cards have to be swiped, no passwords remembered.

Forgotten keys are a thing of the past. Biometric fingerprint scanners check every access easily and with maximum safety.

**Access control for server rooms increases user comfort and reduces administration costs at the same time!**

# IT server protection cabinets

Single- or multiple-cabinet solutions for smaller server landscapes

**The complete IT server protection cabinet package! With climate control and extinguishing systems, we cover all safety requirements in the server field.**

Use of this system does away with the need for complex constructional fire protection and room climate measures. The standard corresponds to one computer centre. It provides maximum convenience and flexibility thanks to a plug-and-play system. The service life of your hardware will be extended by ensuring an optimum cabinet climate.

19" gaseous fire suppression systems are installed on the inside, providing fire protection exactly where it is needed. They make straightforward, residue-free fire suppression possible, with a fire alarm system located directly in the IT server protection cabinet.

**Protection factors for server protection cabinets:**

- External fires
- Extinguishing water
- Debris
- Third-party access/theft
- Dust/soiling

**Server protection cabinets are equipped with numerous accessories:**

- Cabinet climate control
- Power distribution
- 19" gaseous fire suppression systems
- Alarm systems with remote monitoring
- UPS systems
- IT cabling

F90 server protection cabinet, Vienna/Austria

BRODINGER

- Complete computer centre up to 48 units
- Up to F90 fire resistance class
- Modular design for extension in series
- Basic protection with maximum availability
- Turnkey

# Server rack + climate control system
## and 19" gaseous fire suppression system

# Advantages

Maximum functionality retained in the event of a fire

No building moisture on the hardware inside

Mechanical stability

Available as a complete system with climate control technology

Unbeatable price/performance ratio

Compact design

Longer service life of the servers and other hardware

No need for any more complex construction measures

The IT server protection cabinet has been tested for fire safety by the MPA Stuttgart. The test was carried out following DIN 4102, Part 2, 11 and 12.

Conform with the sample guideline for fire protection requirements on cable systems, 13° Kelvin increase in temperature on the components on the interior, as well as 58% relative humidity after 90 minutes.

Fume penetration has been tested in accordance with DIN 4102 and water penetration in accordance with extinguishing water and splashwater protection IP54.

BRODINGER

# Contact: for your safety

Company headquarters, Ampflwang


**BRODINGER IT-Security Technology**
Bahnhofstrasse 9
AT-4843 Ampflwang im Hausruckwald

phone: +43(0)7675 20121
fax: +43(0)7675 20122

Support hotline (24/7)
+43(0)810 00 17 34

email: office@brodinger.at
web: www.brodinger.at

www.brodinger.at

Headquarter Austria

BRODINGER

BRODINGER IT-Security Technology
Bahnhofstrasse 9
AT-4843 Ampflwang im Hausruckwald

phone: +43(0)7675 20121
fax: +43(0)7675 20122

Support hotline (7x 24 h)
+43(0)810 00 17 34

email: office@brodinger.at | www.brodinger.at

your trading partner: