INTEGRATED SYSTEMS FOR INFRASTRUCTURE, ENERGY AND SECURITY

T-GENIUS CZECH S.R.O.

T-GENIUS

WE COMBINE
CAPABILITIES INTO READY
OPERATIONAL SYSTEMS.



WE DESIGN • **WE INTEGRATE** • **WE DELIVER** • **WE COMMISSION** • **WE SERVICE**

PROTECTION

people • facilities • critical systems

ENERGY

power • continuity • autonomy

MOBILITY

transport • positioning • relocation

INFRASTRUCTURE

industry • defence • local government

FROM AN OPERATIONAL REQUIREMENT
TO A READY SYSTEM

FIRST SCOPE. THEN DELIVERY.

T-Genius operates as a technology integrator and project operator. We combine client requirements, the right technologies, qualified delivery resources, logistics and service into one controlled delivery process.



MOBILE OPERATIONAL INFRASTRUCTURE

01 ASSESSMENT

Application, operating location, environmental conditions, loads, mobility and required delivery date.

02 TECHNICAL ASSUMPTIONS

System configuration, constraints, acceptance requirements, safety and key risks.

03 SCOPE AND SCHEDULE

We confirm scope of supply, responsibilities, exclusions, parameters, documentation and deadlines.

04 PRODUCTION AND INTEGRATION

We coordinate technologies, equipment, components, installations and quality control within one project.

05 TESTING AND ACCEPTANCE

We verify system functions, solution completeness and documentation before delivery.

06 DELIVERY AND SUPPORT

Transport, positioning, commissioning, training, warranty, service and further expansion.

ONE PROJECT. ONE COORDINATION. ONE POINT OF RESPONSIBILITY.

For projects requiring specialist authorisations, we use consortium structures and qualified, licensed delivery resources.

INTEGRATED T-GENIUS CAPABILITIES

ONE SYSTEM. SIX CAPABILITY AREAS.

T-Genius combines technology, mobility, energy, protection, logistics, commissioning and service into one ready operational system.

01 PROTECTION AND SECURITY



- Ballistic and anti-fragmentation systems
- Critical infrastructure protection
- Protected technical and operational modules

02 ENERGY



- Generator sets 60-2500 kVA
- Backup and mobile systems
- ATS, synchronisation, commissioning and service

03 MOBILE INFRASTRUCTURE



- Technical and power containers
- Command, medical and logistics
- Lifting and relocation systems

04 ACOUSTIC SYSTEMS



- Barriers at the noise source
- Fixed, folding and sliding walls
- Fixed, mobile and temporary solutions

05 FIELD INFRASTRUCTURE



- Inflatable tents and halls
- Command, medical and logistics
- Power, HVAC, lighting and service

06 EQUIPMENT, TRANSPORT AND DELIVERY



- Heavy construction equipment
- Low-loader transport, truck cranes and tipper trucks
- HDD and preparatory works

qualified delivery resources

WE DO NOT JUST COMBINE PRODUCTS.

WE COMBINE FUNCTIONS INTO A WORKING SYSTEM.

From technical requirements through integration and delivery to commissioning and service. One project. One coordination. One point of responsibility.

DEFENCE

CRITICAL INFRASTRUCTURE

ENERGY SECTOR

CIVIL PROTECTION

01 / PROTECTION AND SECURITY

PROTECTED MOBILE INFRASTRUCTURE.

We combine protection, mobility and operational function in one system designed for a specific task, operating conditions and acceptance requirements.



MOBILE OPERATIONAL MODULE

command • communications • medical • technical • power



MODULAR BALLISTIC WALL

Replaceable sections, steel frame and layered protection configuration. The system can be relocated and reused.

01 INTEGRATED PROTECTION

Protective layers can be incorporated into the container structure at the design stage.

02 OPERATIONAL MOBILITY

Transport, positioning and relocation using T-Genius mobile systems.

03 OPERATIONAL FUNCTION

Command, communications, medical, technical or power integrated on one platform.

04 VALIDATION

We select the protection configuration for the threat. Target parameters require testing of the complete system.

WE PROTECT THE FUNCTION, NOT JUST THE ENCLOSURE.

PEOPLE • POWER • COMMUNICATIONS • CRITICAL EQUIPMENT • OPERATIONAL CONTINUITY

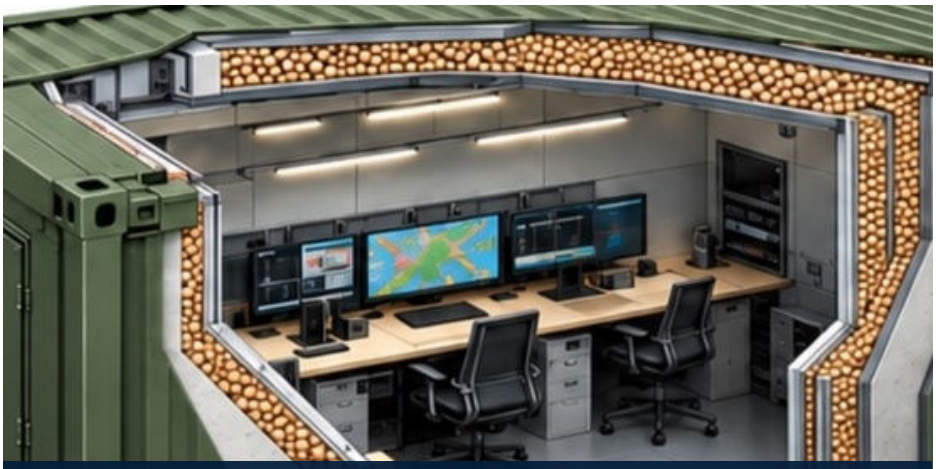
DEVELOPMENT

CONCEPT

Protection parameters require validation of the complete system.

PROTECTED OPERATIONAL MODULE. DESIGNED AS ONE SYSTEM.

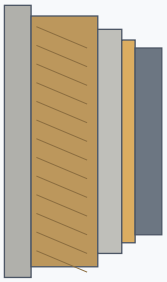
The container structure, protective layers, equipment and mobility are designed together for the requirements of a specific mission, operating environment and deployment method.



COMMAND CONTAINER - CONCEPT CROSS-SECTION

operator stations • communications • technical equipment

EXAMPLE LAYER CONFIGURATION



01 MgO 25 mm

02 Ceramic core

03 MgO 10 mm

04 Bonding layer

05 Steel sheet 0.7

REFERENCE FORMAT

20' ISO

6058 × 2438 × 2591 mm

Reference dimensions from concept material. Weight and protection parameters depend on the final configuration.

01 LAYERED PROTECTION

MgO, ceramic core and metallic layers are integrated as part of the designed protective partition.

02 MODULAR SERVICING

The concept provides for replaceable panels and service access to protective elements without rebuilding the entire module.

03 FUNCTION INTEGRATION

Command, communications, HVAC, power and technical equipment can be designed within one module.

04 OPERATIONAL MOBILITY

The container format can be combined with the T-Genius lifting, transport and relocation system.

PROTECTION IS NOT AN ADD-ON TO THE CONTAINER.
IT IS PART OF ITS ARCHITECTURE.

DEVELOPMENT

CONCEPT

Target protection parameters, weight and configuration require validation of the complete system.

POWER FOR CRITICAL MISSIONS. MATCHED TO THE ACTUAL LOAD.

T-Genius configures, integrates and commissions mobile and backup power systems for the military, critical infrastructure, industry and civil protection.



FROM POWER SOURCE TO A READY OPERATIONAL SYSTEM

configuration • automation • logistics • commissioning • service

60-2500 kVA

POWER RANGE

solutions matched to the load profile

PRP / ESP

OPERATING MODE

primary and backup power

ATS + SYNC

AUTOMATION

switching, synchronisation and integration

SYSTEM INTEGRATION

POWER IS PART OF THE INFRASTRUCTURE, NOT A STANDALONE DEVICE.

01 CONFIGURATION

Open, sound-attenuated and containerised versions are selected for the operating environment and acceptance requirements.

02 FUEL AND AUTONOMY

Larger tanks and refuelling systems can increase system autonomy.

03 CONTROL

Monitoring, remote communication and load management integrated with system automation.

04 DEPLOYMENT

Transport, installation, commissioning, training and service planned as one process.

POWER MUST WORK WHEN THE REST OF THE SYSTEM CANNOT STOP.

Selection is preceded by analysis of the load profile, runtime, environmental conditions and installation acceptance method.

POWER ON SELF-UNLOADING LEGS. READY TO POSITION AND OPERATE.

T-Genius designs and manufactures a container platform with a self-unloading leg system, integrating the solution under its own delivery control, while selecting the generator for the actual load profile and client task.



OPERATING CYCLE

01 TRANSPORT
module arrives as an integrated unit

02 SELF-UNLOADING
leg system handles the positioning process

03 COMMISSIONING
source and automation prepared for the task

04 RELOCATION
module can be lifted and moved again

4
HYDRAULIC LEGS
independent support points

UP TO 32 t*
SYSTEM CAPACITY
depending on configuration

1.4 / 1.7 m*
LIFTING HEIGHT
depending on system variant

ONE MODULE. ONE RESPONSIBILITY FOR INTEGRATION.

01 PRODUCTION AND INTEGRATION
The structure, platform, leg system, assembly and solution integration remain under T-Genius control.

02 GENERATOR MATCHED TO THE TASK
Power, operating mode, automation and power-unit configuration are matched to the client load profile.

03 LESS DEPENDENCE ON A CRANE
The system enables unloading and positioning of the module without conventional crane infrastructure at the deployment site.

04 OPERATION ABOVE GROUND LEVEL
Raising the module supports service access and reduces equipment exposure to water and uneven terrain.

TRANSPORT. SELF-UNLOADING. POSITIONING. POWER.

* System parameters depend on configuration and are confirmed for each specific project.

WE SELECT THE POWER SOURCE FOR THE MISSION. WE BUILD THE SYSTEM AROUND ITS REQUIREMENTS.

One design platform can operate with different classes of power sources. T-Genius selects the configuration, automation, mobility and integration scope for the operating environment and load profile.

01



INDUSTRIAL

PRIMARY AND BACKUP POWER

Configurations for critical infrastructure, industrial plants, technical facilities and operational support areas.

ROLE IN THE SYSTEM

power continuity / infrastructure

02



MOBILE

POWER WHERE IT IS NEEDED

Chassis-mounted units for rapid relocation, temporary power backup and field operation.

ROLE IN THE SYSTEM

relocation / outage / temporary operation

03



HYBRID

SOURCE + ENERGY STORAGE

The architecture can combine a generator with energy storage, control automation and system monitoring.

ROLE IN THE SYSTEM

operating optimisation / flexibility

T-GENIUS INTEGRATES THE ENTIRE POWER CHAIN

FROM LOAD TO COMMISSIONING

01

LOAD PROFILE

power, load characteristics, runtime

02

CONFIGURATION

source, automation, enclosure, fuel

03

INTEGRATION

ATS / SYNC, monitoring, connections, module

04

COMMISSIONING

transport, testing, handover, service

WE DO NOT SELL A SINGLE CONFIGURATION.

We build a power system matched to the task, operating location and mode of use.

A COMPLETE SYSTEM. NOT JUST A TENT.

We combine the structure with power, HVAC, lighting, technical containers, transport, installation and service - from a single module to a complete operational base.

MODULAR FIELD COMPLEX



MEDICAL

Equipped interior of the medical module.



POWER | HVAC | LIGHTING | CONTAINERS | TRANSPORT | INSTALLATION | SERVICE

ONE PLATFORM. MANY OPERATING SCENARIOS.

OPERATIONAL FUNCTIONS

01
COMMAND
Workstations for coordination and communications.

02
MEDICAL
Medical points, clinics and sanitary facilities.

03
LOGISTICS
Space for equipment, supplies, personnel and service.

04
CIVIL PROTECTION
Shelter, crisis support and temporary infrastructure.

WE QUALIFY PARAMETERS FOR EACH SPECIFIC CONFIGURATION

Temperature, snow load, wind resistance and heating capacity parameters are confirmed for the selected model and configuration.

FROM A SINGLE MODULE TO A COMPLETE OPERATIONAL BASE.

T-Genius integrates space, power, equipment, logistics and support into one working system.

ONE PLATFORM.
MANY MISSION CONFIGURATIONS.

The same modular infrastructure can be configured for medical, command, logistics, accommodation or civil protection - depending on the task, scale and operating conditions.

SCALABLE OPERATIONAL COMPLEX



MEDICAL FUNCTION

ready-to-use space



FOUR EXAMPLE CONFIGURATIONS

MATCHED TO THE TASK

01
MEDICAL AND RESCUE

Triage, medical points, staff facilities and space for equipment.

MODULARITY / EXPANSION

02
COMMAND AND COMMUNICATIONS

Mobile command posts, operational space and integration of technical systems.

MODULARITY / EXPANSION

03
LOGISTICS AND ACCOMMODATION

Personnel facilities, storage, technical support and base organisation.

MODULARITY / EXPANSION

04
CIVIL PROTECTION AND CRISIS RESPONSE

Temporary infrastructure for evacuation, mass-casualty events and emergencies.

MODULARITY / EXPANSION

FROM TRANSPORT TO OPERATIONAL READINESS

01
TRANSPORT
modules and equipment

→

02
DEPLOYMENT
positioning and connection

→

03
INTEGRATION
power / HVAC / lighting

→

04
READINESS
space for operations

INFRASTRUCTURE MATCHED TO THE MISSION.

Ready to expand with the scale of the task and operational requirements.

A CONTAINER THAT DOES NOT NEED A CRANE.

LIFT. UNLOAD. POSITION. OPERATE.



4
HYDRAULIC LIFTING POINTS

UP TO 32 t*
SYSTEM CAPACITY

1.4 / 1.7 m*
LIFTING HEIGHT

01
UNLOADING WITHOUT A CONVENTIONAL CRANE

The module is lifted and positioned using its own lifting system.

02
RAPID RELOCATION

Reduced reliance on heavy equipment when moving between locations.

03
OPERATION ABOVE GROUND LEVEL

Elevation supports positioning and can reduce exposure to water during local flooding.

04
ONE PLATFORM, MANY FUNCTIONS

Power, command, medical, communications, logistics or specialist equipment.


TRANSPORT


LIFTING


VEHICLE DEPARTURE


READINESS

MOBILITY DESIGNED INTO THE STRUCTURE.
NOT ADDED ON SITE.

* Parameters depend on the system configuration and must be confirmed for each project.

TWO SYSTEMS. ONE OPERATING PRINCIPLE.

The lifting system can be an integral part of the container or a mobile set serving successive compatible modules.



One set. Multiple containers.

- System mounted to a compatible container.
- The set can be used with successive modules.
- Operator solution for a larger fleet of containers.
- The lifting system does not have to remain with one module.



Mobility always stays with the module.

- The system is part of the container structure.
- It remains permanently available with the module.
- Lifting and positioning remain functions of the platform itself.
- Especially practical for operational modules requiring frequent relocation.

THE SYSTEM WORKS WHERE IT IS CURRENTLY NEEDED.

THE SAME GOAL

LIFT → UNLOAD → POSITION → OPERATE



FEATURE	SYSTEM 01 MOBILE SET	SYSTEM 02 INTEGRATED
Architecture	Mobile set	System integrated with the container

WE CONTROL NOISE AT THE SOURCE.

Industrial modular noise-reduction systems for energy, industry, infrastructure and construction.



TEST CONFIGURATION

21.2 dB
AVERAGE REDUCTION

46.7 dB
MAXIMUM REDUCTION

101 dB(A)
SOURCE LEVEL

Figures refer to a specific test configuration. Actual performance depends on system geometry, source position and installation.

ONE PLATFORM. MANY APPLICATIONS.

We select the system for the noise source, operating environment and duration of use.

01
BARRIERS AT THE NOISE SOURCE

Emission reduction directly at machines and processes.

02
MOBILE AND TEMPORARY SYSTEMS

Construction, maintenance, service zones and temporary enclosures.

03
ACOUSTIC WALLS AND ENCLOSURES

Fixed, sliding and modular systems for industry and infrastructure.

04
SALES / RENTAL / SERVICE

Design, installation, relocation and technical support matched to the project.

WE REDUCE NOISE WHERE IT IS GENERATED.

ONE PLATFORM. MANY CONFIGURATIONS.

We select the system architecture for the noise source, facility geometry, required mobility and operating mode.



01 | FOLDING WALLS T20 / T50

MAXIMUM MOBILITY

- T20 / T50 solutions for indoor and outdoor applications.
- Rapid opening of the work zone.
- Approx. 10% of the length when folded.
- Configuration matched to the facility and acoustic requirements.



02 | SLIDING WALLS

ACOUSTICS WITHOUT BLOCKING LOGISTICS

- Easy access for personnel and service.
- Opening transport routes.
- Indoor and outdoor solutions.
- Acoustic control while retaining full facility functionality.



03 | FIXED WALLS / FAST

PERMANENT ACOUSTIC SOLUTIONS

- High noise reduction and sound absorption.
- Can be reconfigured and reused.
- Configuration matched to workstation geometry.
- Indoor and outdoor applications.



04 | MOBILE / TEMPORARY SYSTEMS

RAPID DEPLOYMENT AND RELOCATION

- Solutions for construction sites, maintenance and service zones.
- Rapid installation and dismantling.
- Reusable.
- Flexible length and height configuration.

FROM NOISE SOURCE TO A CONTROLLED ZONE

1. ANALYSIS NOISE SOURCE > 2. SELECTION SYSTEM > 3. INSTALLATION AND COMMISSIONING > 4. CONTROLLED ACOUSTIC ZONE



FIXED

Long-term acoustic protection.



MOBILE

Flexibility and rapid relocation.



INDOOR

Solutions for operation inside facilities.



OUTDOOR

Resistance to outdoor conditions.

ACOUSTICS THAT ADAPT TO THE PROCESS.

NOT THE PROCESS TO THE ACOUSTICS.



QUALIFIED DELIVERY CAPABILITIES

We provide the full delivery chain - from transport and site preparation through to installation, integration and system commissioning.

01 HEAVY EQUIPMENT

PREPARATORY AND INFRASTRUCTURE WORKS



- Excavators and loaders
- Earthmoving equipment
- Infrastructure preparation
- Demolition and clean-up works
- Installation support
- Hard-to-access terrain

02 SPECIALIST TRANSPORT

SAFE AND EFFICIENT DELIVERY



- Low-loader transport
- Truck-mounted and mobile cranes
- Transport of containers and heavy modules
- Loading and unloading
- Domestic and international transport
- Project logistics support

03 SITE PREPARATION

EARTHWORKS AND INSTALLATION



- Earthworks and grading
- Directional drilling (HDD)
- Ground preparation
- Cable and piping infrastructure
- Utility drainage / routing
- Site adaptation to system requirements

04 INSTALLATION AND COMMISSIONING

INTEGRATION AND OPERATIONAL READINESS



- System delivery and positioning
- Mechanical installation
- Installation integration
- Connection and configuration
- Testing and commissioning
- User training
- Service and post-commissioning support

FROM DELIVERY TO OPERATIONAL READINESS

DELIVERY > PREPARATION SITE > POSITIONING > INTEGRATION > COMMISSIONING

ONE PROJECT. FROM TRANSPORT TO OPERATIONAL READINESS.

FROM AN OPERATIONAL REQUIREMENT TO A READY SYSTEM.

T-Genius integrates protection, energy, mobile infrastructure, field support, acoustics, logistics and commissioning into one delivery process.

We do not just combine products. We combine functions into a working system.

01



PROTECTION

protection systems and specialist modules

02



ENERGY

mobile and backup power sources

03



MOBILE INFRASTRUCTURE

containers, lifting and relocation

04



FIELD INFRASTRUCTURE

medical, logistics and crisis response

05



ACOUSTICS

modular noise-control systems

06



DELIVERY

transport, installation and commissioning

T-GENIUS

SYSTEM INTEGRATOR

ONE PROJECT. ONE COORDINATION. ONE RESPONSIBILITY.

WE DESIGN • WE INTEGRATE • WE DELIVER • WE COMMISSION • WE SERVICE

READINESS IS NOT AN ACCIDENT. WE DESIGN IT.

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