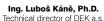


## **DEKPROJEKT s.r.o.**

DEKPROJEKT s.r.o. is part of the DEK group, offering highly specialised services in the area of building insulation, building engineering physics and energy, building certification, diagnostics and measurement of structures and development of construction software on the Czech and Slovak markets. Many employees of the company publish articles in professional media, lecture at conferences, teach in specialised schools and participate in the technical standardisation commissions. DEKPROJEKT s.r.o. is an expert institute appointed by the Ministry of Justice of the Czech Republic and an accredited international/European testing laboratory. The company also operates NEMOPAS. a service consisting of inspections of properties.







Ing. Ctibor Hůlka rector of DEKPROJEKT s.r.o.



Doc. Ing. Zdeněk Kutnar, CSc. Co-operating court expert

28+ years

On the market since 1997

Successfully completed projects

100000+

**70**+

20+

Services provided

Branches in the CZ and SK

DEKPROJEKT employees work closely with technicians associated with the ATELIER DEK brand, who provide technical support for the Stavebniny DEK product range to Stavebniny DEK customers and arrange specialized services offered by individual companies within the DEK group.

## DEK a.s.

Trade



DEK STAVEBNINY Slovenská republika



**Production** 





**DEKMETAL**\*





Service



**DEK** 



Callida







## **Specialized services**



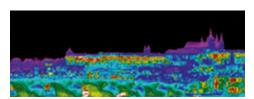
## 3D scanning of buildings

Precise laser scanning of interiors and exteriors of individual buildings and entire complexes.



## Structural surveys and diagnostics

Verification of the condition and composition of structures, diagnostics of reinforced concrete, steel, wooden and masonry structures.



## Thermal diagnostics and blower door test

Measuring surface temperatures and detection of thermal bridges using a thermal imaging camera. Accredited measurements of air-tightness using the blower-door method. Long-term measurements of air parameters (T, RV, CO<sub>2</sub>).



## **Expert and technical reports**

Preparation of expert and technical reports on defects and faults in buildings, with a focus on roofs and exterior cladding, swimming pools and wet areas, building insulation, and more.



## Specialized projects

Preparation of project documentation in the field of insulation technology (roofs, building envelopes, terraces and roof gardens, substructures, drainage, etc.).



## Fire safety

Design and expert reports of fire-safety design of structures, certification of products, compositions and structural systems for the market and room integrity testing.



## **Building services**

Design of heating systems (including control), cooling, solar thermal collectors and ventilation systems for new and existing buildings.



## Consultancy for obtaining NZÚ and OPŽP grants

Preparation of complete documentation and administration of applications for subsidies from the NZÚ, OPŽP, OP TAK and other grant programmes.



## Energy

Elaboration of energy documents (energy performance certificates, studies, audits, assessments) according to applicable legislation and elaboration of dynamic simulations.



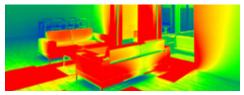
## **Energy integrator**

Comprehensive services leading to a reduction in the dependence of municipalities and their citizens on energy supplies from the public grid, a reduction in the carbon footprint of municipalities and citizens, and a reduction in energy prices.

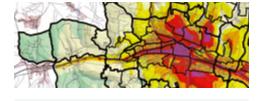


















## Lighting and sunlight

Shading and sunlight studies. Design and assessment of daylight and artificial lighting in buildings. Accredited measurement of artificial lighting.

## **Acoustics**

Accredited measurements of soundproofing, reverberation time and noise. Preparation of noise studies, designing and assessing soundproofing systems.

## Turnkey acoustic solutions

Comprehensive services in the field of room acoustics and noise reduction from stationary sources. From design to implementation.

## Thermal engineering

Design and assessment of composition and details in terms of heat and humidity distribution. Assessment of thermal stability in rooms during summer and winter.

## Building certification - BREEAM, LEED, SBToolCZ, WELL

Comprehensive certification of buildings in the BREEAM, LEED, SBToolCZ, and WELL systems, performing measurements and preparation of various documents for certification purposes.

## **Ecology - EIA, dispersion studies**

Preparation of EIA studies and individual documents such as dispersion studies, noise studies, life cycle assessments (LCA), environmental product declarations (EPD), etc.

## Property inspection

Assessment of the technical condition of a building, where defects and risks of structural failure are evaluated based on visible signs, the inspector's experience, and the use of non-invasive measuring instruments.

## **Construction software**

Professional web applications for the construction industry. DEKSOFT offers applications for building energy performance, BIM design, thermal insulation of buildings, acoustics, technical building equipment.

## **Education**

Educating professionals with webinars and videos from various fields of construction industry.

# **DEKPROJEKT Expert** office

From 2012 to 2020, we were an expert institute. After change of the law in 2021, we have been named Expert office DEKPROJEKT, s.r.o. The field expertise of the expert office are residential, industrial and agricultural buildings, roofs, perimeter cladding, swimming pools and wet operations, building insulation and building physics. There are several expert witnesses in the expert office with different specializations.



# Accredited testing laboratory

The laboratory has accreditation from the Czech Accreditation Institute and operates in accordance with defined quality management system meeting the requirements of international standards.

The laboratory performs the following activities:

- sound proofing measurements
- reverberation time measurements
- noise levels measurements
- airtightness of buildings using the blower-door test method
- artificial lighting measurements
- artificial lighting in the outdoor environment (including interference lighting)
- artificial lighting of roads measurements



# **Real Estate inspection NEMOPAS**

NEMOPAS Real Estate inspection carries out an inspection and assessment of the technical condition of properties, not only in terms of their defects and faults, but also the risk of defects, i.e. cases where a defect is not visible on the property but may occur in the future.

## nemopas.cz









DEKSOFT is the software division of DEKPROJEKT, which has been developing professional programs for the construction industry since 2012. All programs work as web applications and no installation is required. To use the programs from any device, all you need is to create an account and for paid programs, purchase a license.

## Building library

with an extensive database of building materials, products or compositions from manufacturers across the construction market

## Requirements library

database of requirements from the construction industry, which is continuously expanded and updated

## programs for energy specialists

ENERGETICS, PHOTOVOLTAICS, NZÚ, VARIANTS etc.

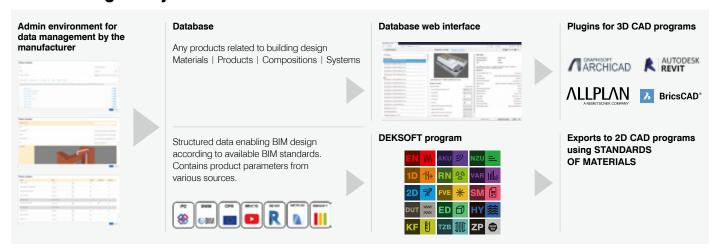
## programs for designers and heating engineers

THERMAL ANALYSIS 1D, 2D, CAVITY, COMFORT ANALYSIS

## programs for other fields

ACOUSTICS, ANTIRADON, WATERPROOFING, REAL ESTATE INSPECTIONS

## **DEK building library**



## **Application overview**



## **Energetics**

Program for calculation of energy performance of buildings and creation of building energy performance certificate.



## Thermal analysis 1D

Program for thermal engineering calculations and assessment of compositions.



## Thermal analysis 2D

Program for thermal engineering calculations and assessment of 2D details.



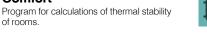
## Cavity

Program for calculating heat and humidity distribution in a ventilated air layer.



### Comfort

of rooms





### Real estate inspections

Program for creating house inspections using the NEMOPAS methodology.



## Acoustics

Program for acoustic calculations and assessment of compositions



Program for radon concentration calculations and design of anti-radon measures.



### **Photovoltaics**

Program for calculation and design of photovoltaic power plants.



## 3D editor

A program for using graphical models for energy calculations



## Heating and cooling

Program for calculating heat losses and dimensioning of heating systems.



### Requirements library

Structured database of requirements for construction industry in the Czech Republic.



Programme for the development of energy assessments for the New Green Savings grant programme.



Programme for economic and environmental evaluations and the production of energy assessments and energy audits.



### Material standards

Specification of materials for public procurement design.



## Waterproofing

Program for the design of waterproofing structures.



## Preliminary building inspection

A program to identify the risks associated with a house solution.



### DEK building library

Complex database of construction materials. products, compositions and systems.

## dekprime.cz

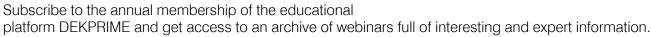


The DEKPRIME training platform covers a wide range of training needs for professionals in the construction industry.

## **DEKPRIME offers webinars:**

- from various fields of construction
- for designers
- for energy specialists
- thermal engineers
- acousticians
- · representatives of municipalities
- · real estate agents and appraisers
- owners of residential buildings
- and many others

All-day specialized webinars for designers and energy specialists cover the annual need for points for the CKAIT and SEI continuing education programs.



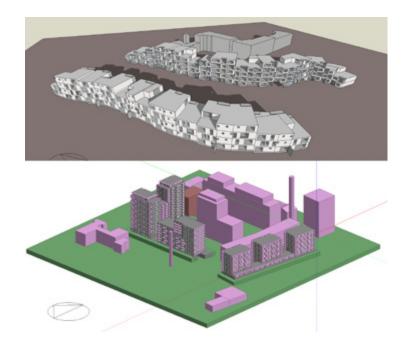
## **Educate yourself with DEKPRIME**

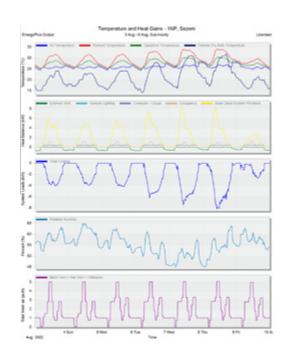
For more information about the subscription, please visit dekprime.cz



## designbuilder.cz

We are the official distributor of DesignBuilder for the Czech Republic, Slovakia, Poland and Hungary. DesignBuilder is a computational program for dynamic simulations and creation of 3D models. DesignBuilder contains 11 modules for different specializations. These modules can also be used independently.









BricsCAD® uses the well-known DWG-based CAD environment for 2D drawing, 3D modelling, BIM and mechanical design. It is suitable for planners, designers, architects and engineers. Hundreds of superstructures are running on BricsCAD in the fields of GIS, electrical, transportation construction, HVAC, etc. Designed for Windows, Mac and Linux operating systems.

## BricsCAD® Lite

powerful and affordable software for fast and efficient 2D drawing

## • BricsCAD® Pro

advanced 2D drawing and 3D modelling software supporting hundreds of third party applications

## BricsCAD® Mechanical

advanced mechanical engineering design tools using direct modelling

## BricsCAD® BIM

building information model software using artificial intelligence technology

## BricsCAD® Ultimate

BricsCAD Lite, Pro, BIM and Mechanical in one package

## • Communicator for BricsCAD®

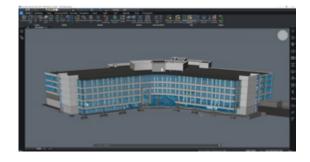
high quality import and export for 3D CAD

## • BricsCAD® Maintenance

keeps permanent product licenses up to date with all BricsCAD releases

## • BricsCAD® Shape

Simple user interface with all the tools you need to model in 3D





## protea.cz

DEKPROJEKT s.r.o. is an official distributor of BricsCAD. Activities related to BricsCAD are offered by DEKPROJEKT through its division PROTEA. Thanks to this, BricsCAD is localized into Czech language with Czech technical support. Protea organizes webinars, creates plugins and add-ons for BricsCAD with features according to Czech designing habits, especially lines, hatches, elevations, room legends, libraries, etc.

- the PROTEA division cooperates closely with the DEKSOFT division
- current price list and e-shop at protea.cz
- it is possible to purchase a permanent or annual license
- · students and schools get BricsCAD for free
- 30-day trial license for all



## Training, education, publications

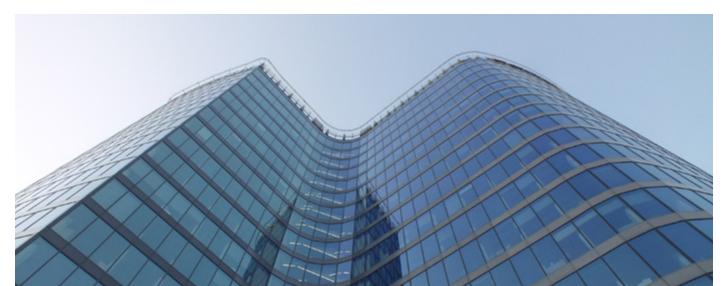
We regularly publish our experience from commercial contracts and internal research tasks on the company website dekprojekt.cz and in professional media. We give presentations at seminars and conferences. We teach at technical high schools and universities. We are supervisors of bachelor's and master's theses or prepare their oppositions. We participate in the activities of technical standardization committees and professional societies.



# BREEAM, LEED, SBToolCZ, WELL, comprehensive certification of buildings

BREEAM, LEED, SBToolCZ or WELL certification assesses the building comprehensively in terms of environmental impact and user comfort. We provide comprehensive certification or the preparation of sub-specialized documents to obtain the required credits.





# Energy integrator – the path to energy independence

Energy is becoming a key issue for municipalities and cities looking for a way out of energy price uncertainty and to reduce their dependence on fossil fuels. We offer a comprehensive range of services that lead to a reduction in the dependence of municipalities and their citizens on utility energy supplies, a reduction in the carbon footprint of municipalities and citizens, and a reduction in energy prices. We help small and medium-sized communities build efficient and renewable energy systems.

## Our process:

## 1. Analysis of the current state

We use available documents, MEK, audits, PENB and studies to get a detailed overview of the energy situation in a given location.

### 2. Data collection and evaluation

We collect information on energy consumption and production in a given area and create an accurate energy profile of the area.

## 3. Consumption Curve Modeling

If comprehensive data is not available, we will complete the energy consumption curves based on the appliances used and their usage. We validate the curves using shortterm measurements. The consumption curves will allow for planning the optimal use of renewable resources.

## 4. Finding suitable sites for renewables

We identify ideal locations for photovoltaic, wind, hydro or other renewable energy sources in the community.

## 5. Evaluation of constraints and possibilities for construction

We analyze the technical, legislative and spatial constraints for the construction of renewable energy sources so that the project is feasible and economically viable.

## 6. Energy system design

We will design the production of energy from local renewable sources and create a detailed economic model to show the return on investment.

## 7. Energy sharing and storage

We will assess the possibility of energy sharing between customers and design efficient storage systems that will increase the energy self-sufficiency of the territorial unit.

## 8. Financial model and grant support

To minimize initial investment costs, we can help you assess project financing and take advantage of grant opportunities.







## References



## Mill Colonnade, Karlovy Vary

Design documents and author's supervision in the restoration of the high-reliability composite insulation of a terrace (double waterproofing system).



## **Curling hall, Prague**

Thermal diagnostics and measurement of air tightness of a hall with the aim of localizing defects in the roof covering.



## **Aquapalace Cestlice**

Room and building acoustics from design to final measurements.



## **Aquacentrum Bohumin**

Expert report on the thermal and humidity characteristics of the roof covering. Design and author's supervision inrepair work.



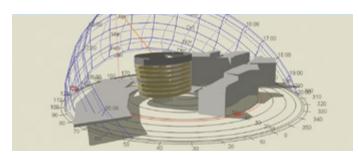
## Park D8, hall 6, stages I. a II., Zdiby

Comprehensive BREEAM certification for a logistic facility with an internal volume of 550000 m<sup>3</sup>.



### ČEVAK a.s.

Energy audits for energy management and for 48 buildings all over the Czech Republic.



## **GREEN POINT, Prague**

Preparation of the CFD analysis, dispersion study and structural physics calculations for a planned administrative building.



## Janáček Culture Centre, Brno

Expert report on the shading of the nearby residential, commercial and administrative buildings.

dekprojekt.cz 2025/09