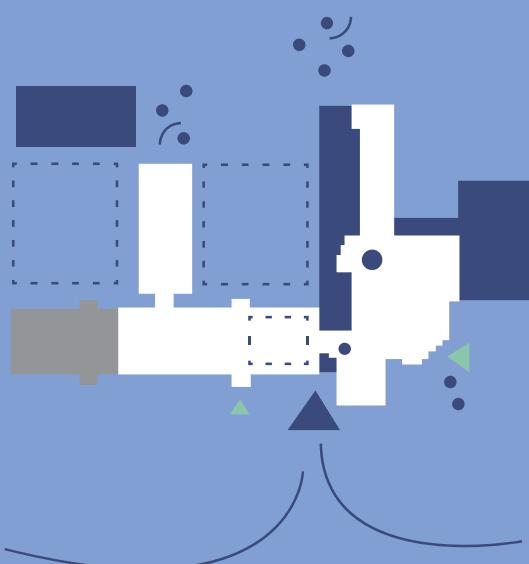


LET'S UPGRADE THE SCHOOL TOGETHER

*Methodological recommendations
for preparing and implementing
functional and spatial changes
in general education schools*



*The part of the project "20th Century
Architecture: Holistic Assessment and
Sustainable Preservation"*

INTRODUCTION

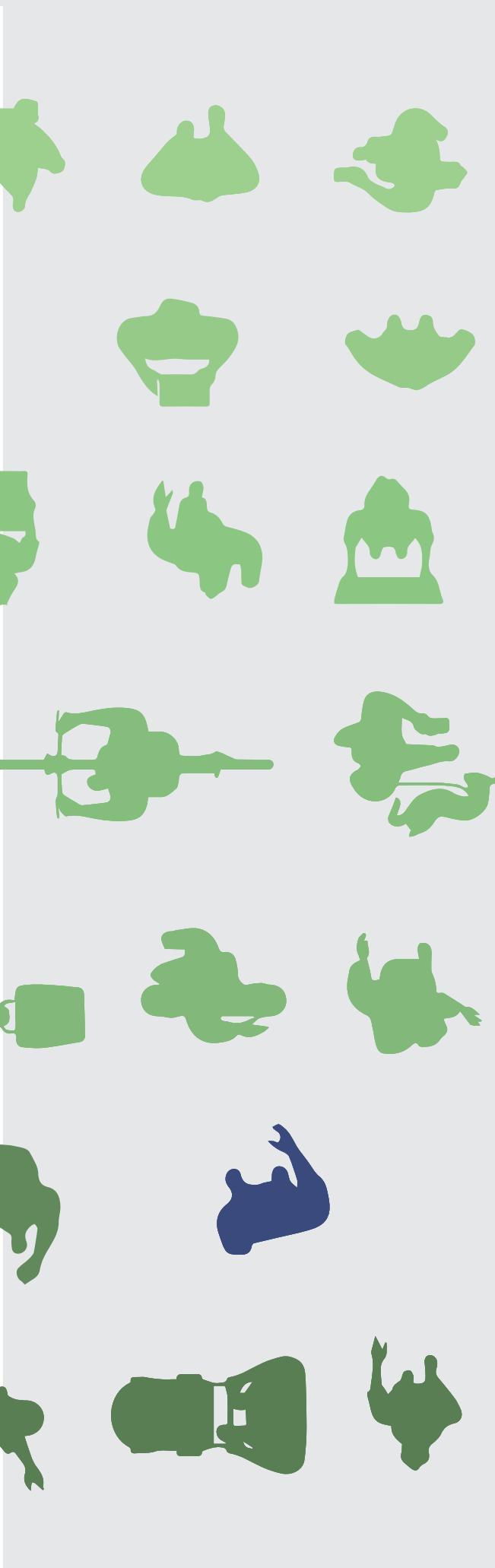
The publication is intended for general education school communities, administrators, and founders who are planning to renovate schools to meet the spatial and functional needs of modern education.

The recommendations have been prepared in light of the idea of a modern school, following national and international best practices, and the state's declared goals to implement high-quality education.

Here you will find recommendations on how to prepare for the school design stage by conducting a functional analysis of the building, assessing its compliance with current requirements, and suggestions on how to conduct staff and student surveys and creative workshops. Based on the 14 change programs presented, it is possible to assess the extent to which a particular school meets the physical learning environment characteristics typical of a modern school and to select priority areas for change. An example of the application of these recommendations is also provided using one of the public schools.

CHAPTER I

14 CHANGE PROGRAMS



SCHOOL FOR EVERYONE

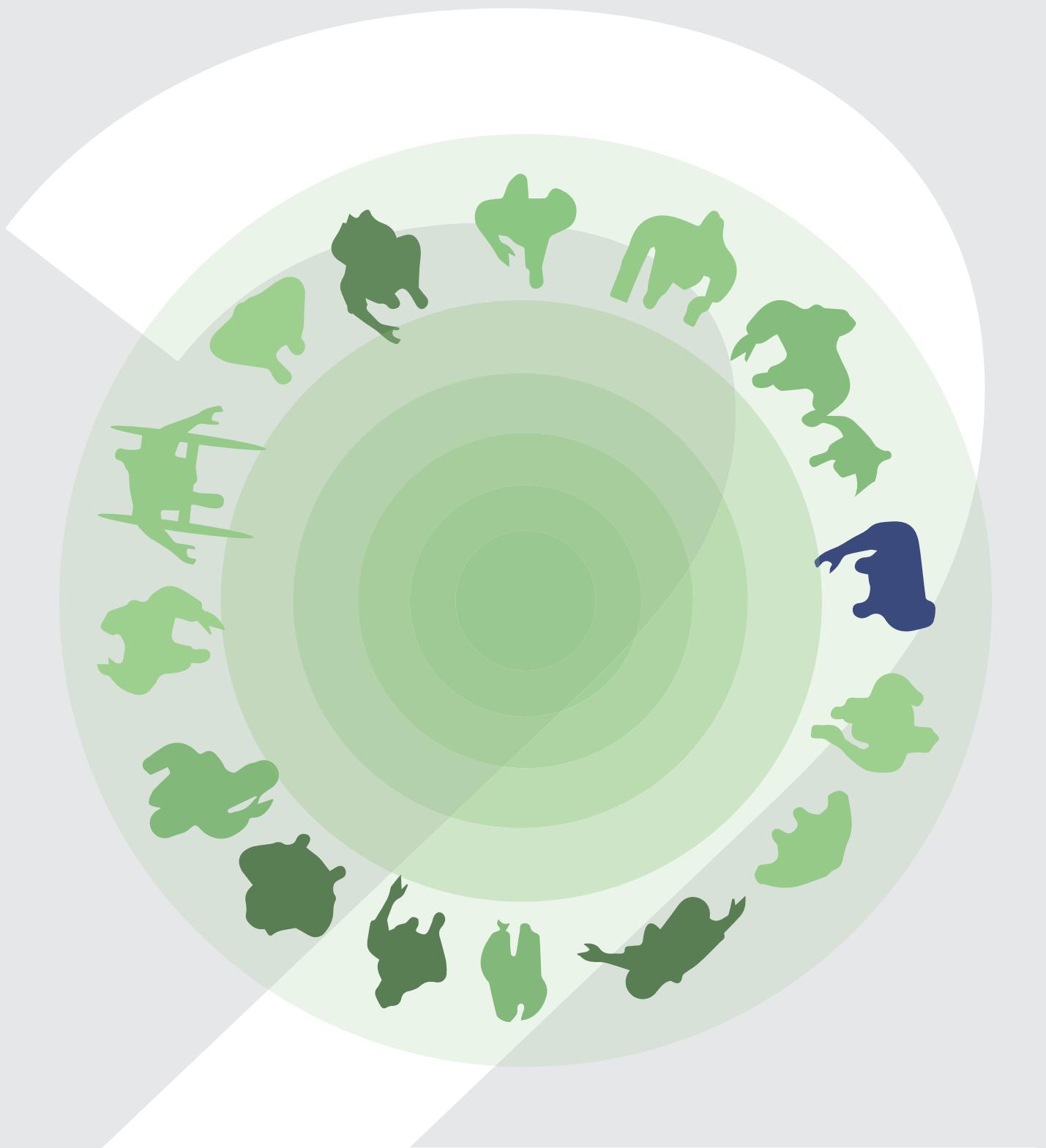
In 2010, Lithuania ratified the 2006 Convention promoting the full and equal enjoyment of all human rights and fundamental freedoms by disabled people and ensuring respect for their dignity. The school building and its surroundings should be designed to provide equal opportunities and the Education Act requires inclusive education in all schools.

This means the learning environment must be set up for all students to learn together, regardless of individual needs and disabilities. The rules for making school buildings accessible can be found in the national technical construction regulation "Accessibility of Buildings" and the adopted European standard "Accessibility and usability of the built environment".

It's vital that students with special educational needs and disabilities have access to individual learning/consultation areas, a well-developed working environment for student welfare specialists, sensory rooms, quiet areas, information tools to help people find their way around the building, good artificial and natural lighting, transparent doors/partitions (useful for people with hearing impairments but dangerous for people with visual impairments), no physical barriers or colours to mark them, alternatives for vertical movement in the building (stairs, ramps, elevators), and skin-colour contrast colours (useful when communicating in sign language).

All these functions and features are useful for students and staff without disabilities too. So, educational buildings should use universal design ideas (making things equal for everyone, being flexible, simple and easy to use, having the right information, being tolerant of failure, not needing a lot of physical effort, being the right size and having enough space) even before students with specific needs arrive.

To meet different needs, it's a good idea to have a variety of settings so that everyone can find a place to learn, experience or relax according to their needs or mood.



WE ARE A SCHOOL!

This change program is all about the unique identity of each school as a place where people learn together, and how that identity shows itself in the building. Each school is different, with its own values, attitudes, goals, and activities. While the usual curriculum is followed in most schools, each one can still develop its own culture and identity, which is important to express and represent in the school environment and its physical space.

Having an environment that clearly reflects the school's identity can motivate and encourage community members, giving them a sense of pride, calm, security, and identification with the school. How good a school is, really, depends on how well it shows what it stands for (what it believes in and what it wants to achieve). T

he school building has a clear function that meets educational needs, and the way its design expresses its mission, vision, and values promotes the aesthetic and social skills of students, teachers, parents, and the surrounding community.

You can create spaces that reflect the uniqueness of a school to express its identity. For example, if a school focuses on visual arts, they'll design art studios with specific equipment, a storage room for materials and tools, and exhibition spaces. If the school places particular importance on developing performing arts skills, they'll design a theatre or dance hall with the necessary additional functions and rooms. If the school is oriented towards the "green school" concept, they'll plan areas for growing plants, composting sites and equipment, and an experimental space for renewable energy sources.

A school's identity can also be expressed through environmental design, signs (e.g. name, small architecture, landscape elements), architecture (entrance, gates, portal, tower), art (sculptures, wall paintings, tapestries, installations), exhibitions of student achievements, graphics (mottos, logos, value concepts, orientation system), and inspiring, aesthetic design.



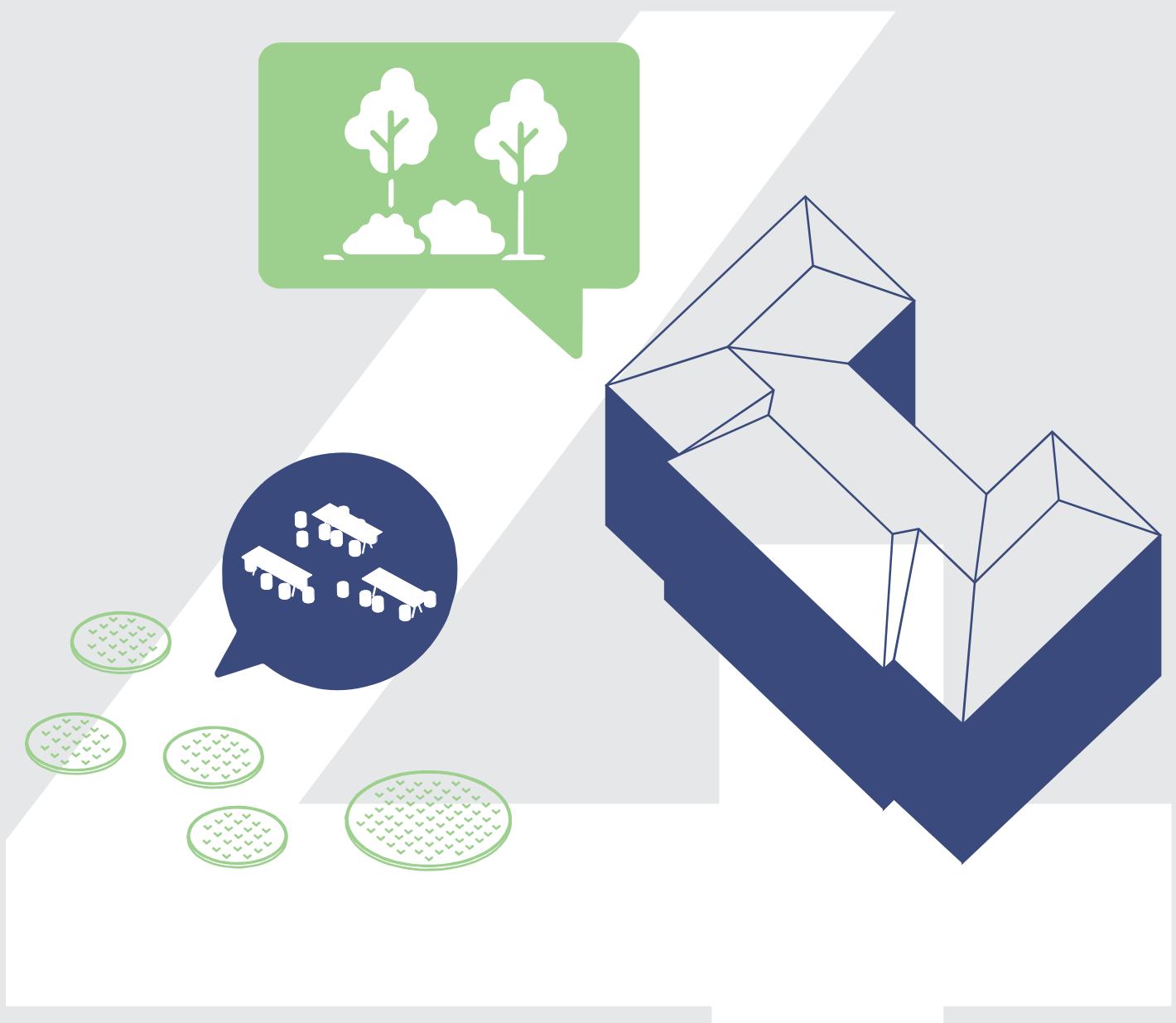
SUSTAINABILITY

The term "sustainability", first used in 1987 in a report, "Our Common Future", refers to ensuring long-term well-being for present and future generations. It is a long-term process to achieve long-term prosperity and development for present generations without compromising the ability of future generations to meet their own needs.

The United Nations' Sustainable Development Goals (SDGs) include reducing poverty, ensuring fair access to food, ensuring good health, ensuring good education, promoting gender equality, ensuring access to clean water and energy, reducing inequality, ensuring fair payment, promoting economic growth and new ideas, developing sustainable cities and their communities, ensuring responsible consumption, and even peace, justice and cooperation in pursuit of all these goals.

Most school communities constantly reflect on these goals and have integrated them into the school's educational process and everyday life (e.g., sorting, composting, nature laboratories, conscious consumption programs).

The change programme aims to show how the school's built environment meets these goals. Renovate and adapt existing buildings, not build new ones. Use renewable resources. Avoid air conditioning and install renewable energy production equipment. Plan school spaces to promote healthy lifestyles, equal opportunities, gender equality, harmony and cooperation. Schools should also be open to the local community.



EXTERNAL AND INTERNAL DIALOGUE

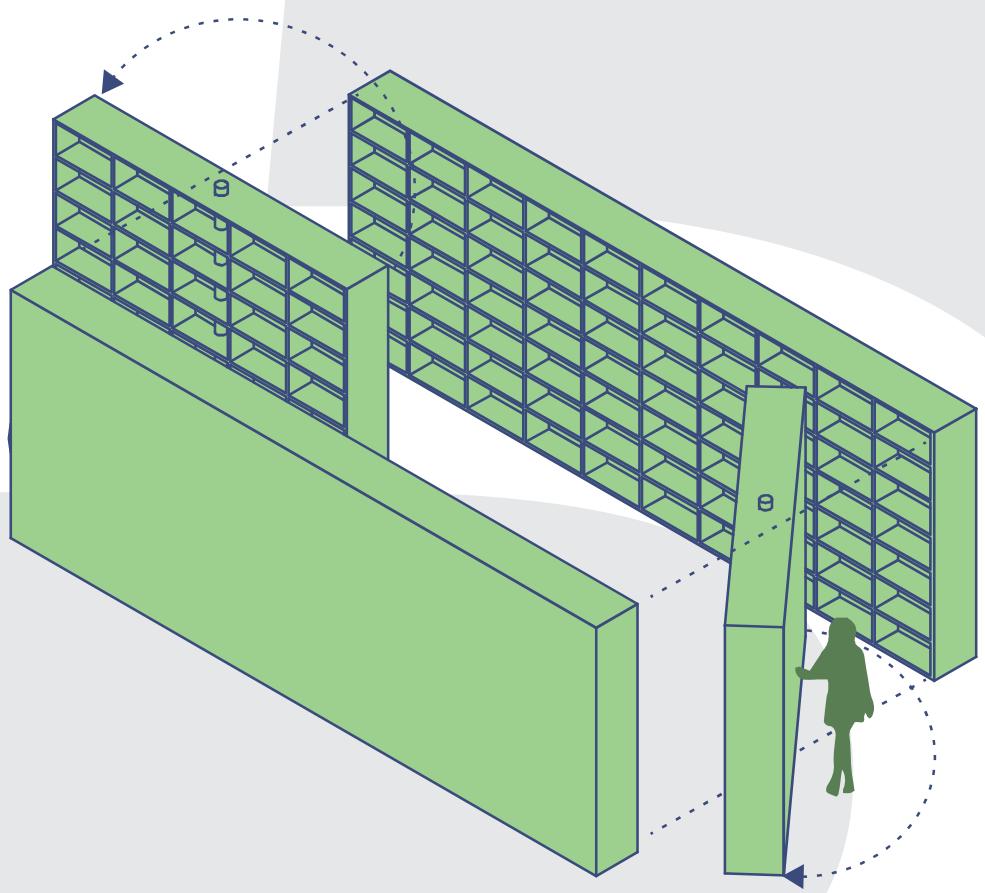
Educational and sports activities, as well as nature-based experiments, can take place on the school grounds. The grounds can also be used for recreation, socialising, greenery, wellness, and access. Service vehicle access and a utility area are required. Plot size depends on student numbers. The school community has more freedom to design the environment. A territory control system should be installed. The infrastructure should be used for education and for residents. At night, it should be protected from vandalism.

1. The playground should be 1,000-3,450 sq m big with a 100-m track, depending on student numbers and level of education. If the school starts in a non-purpose-built building, existing infrastructure elsewhere can be used. Heating and temporary structures are installed for all-year-round use.

2. Gardening, growing vegetables and flowers is a key part of school life, and is now being linked to education. However, keeping animals at school is not recommended because of modern animal rights and behavioural ethics.

3. The outdoor classroom environment must meet teaching needs and reflect the climate. Younger students like being outdoors, so put first-grade classrooms on the first floor and add an outdoor terrace. We could add outdoor classroom terraces or pavilions for older students closer to quiet areas. This way, the equipment can be used for both education and recreation.

4. Recreational spaces are divided into active and passive areas. Different age groups need different spaces. If possible, designate part of the school grounds as a public space to create closer ties between the school and the local community, and thus a safer environment for young people.



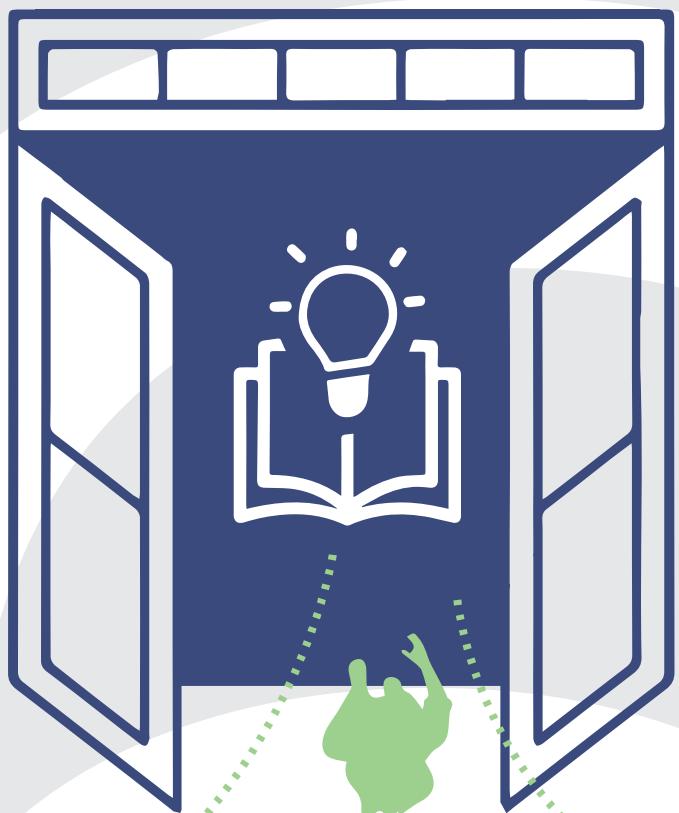
TRANSFORMERS

The outdoor classroom environment must meet teaching needs and reflect the climate. Younger students like being outdoors, so put first-grade classrooms on the first floor and add an outdoor terrace. We could add outdoor classroom terraces or pavilions for older students closer to quiet areas. This way, the equipment can be used for both education and recreation.

Teachers should be able to combine different working methods in lessons. Classrooms should be equipped with age-appropriate, ergonomic, easily movable, interlocking furniture that meets students' needs. When choosing a solution, it's worth thinking about using mobile, lightweight acoustic walls that can be placed on the floor or on tables.

Spaces are sometimes used differently at different times. In primary education, there are often different morning and afternoon use scenarios. Students can be given more space by transforming their permanent space. During morning classes, a classroom can be transformed with partitions. In the afternoon, it can be opened up to other spaces. The food technology room can be opened up to the canteen during lunch breaks or community meetings if it is located next to the canteen, and serve as an auxiliary kitchen.

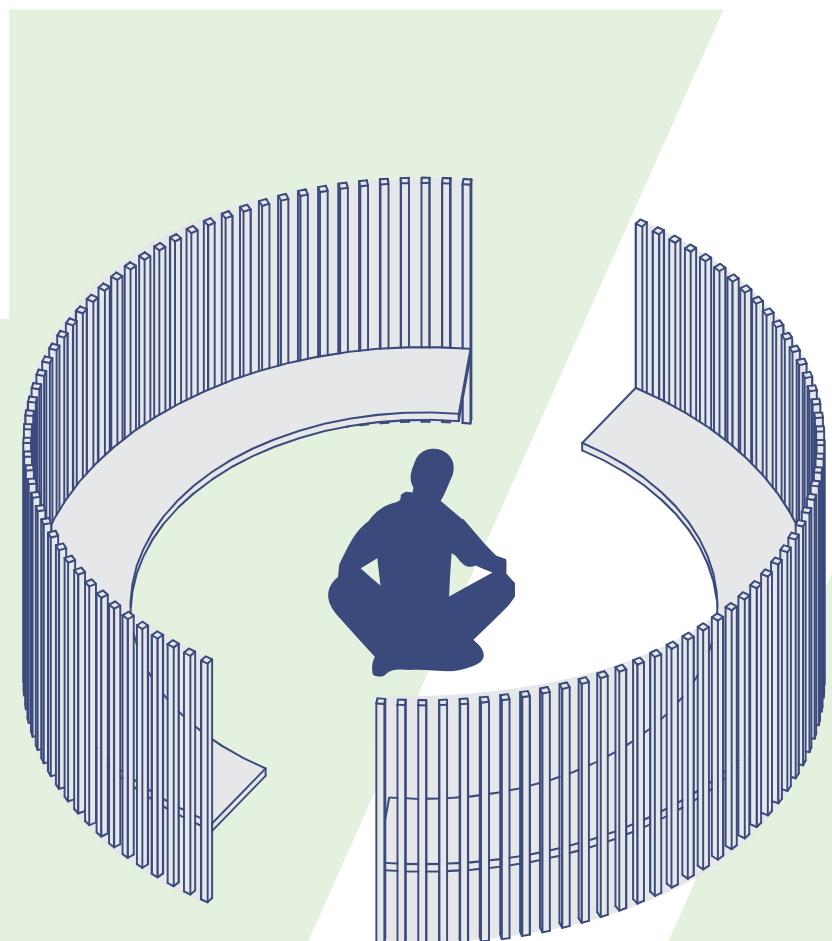
Schools often accept and accommodate groups of guests during the holidays. Some organise summer camps, others accept vacationers and event participants. Currently, buildings are often not adapted for this purpose. Assessing demand and possibilities for development could encourage schools to take social initiatives. In the event of natural disasters, school buildings could become part of the civil protection infrastructure.



OPEN SCHOOL

To make better use of public resources, give learners chances to develop on their own (like workshops and labs), and improve socialising (community spirit) and self-realisation (sports) for school and local community members, we suggest opening up state school spaces and making it easier to access their resources and equipment. Most of the school's indoor and outdoor spaces can be used not only for formal education, but also for informal education and the needs of the local community.

Management and usage agreements are essential to ensure fair and transparent resource sharing. Scenarios for different spaces are used to manage shared spaces after school. Separate entrances or internal space restrictions mean the local community can only access the spaces they need. The number and variety of activities determine which classrooms and offices will be used after school. All shared spaces on the same floor are more easily controlled.



PEACEFUL SPACES

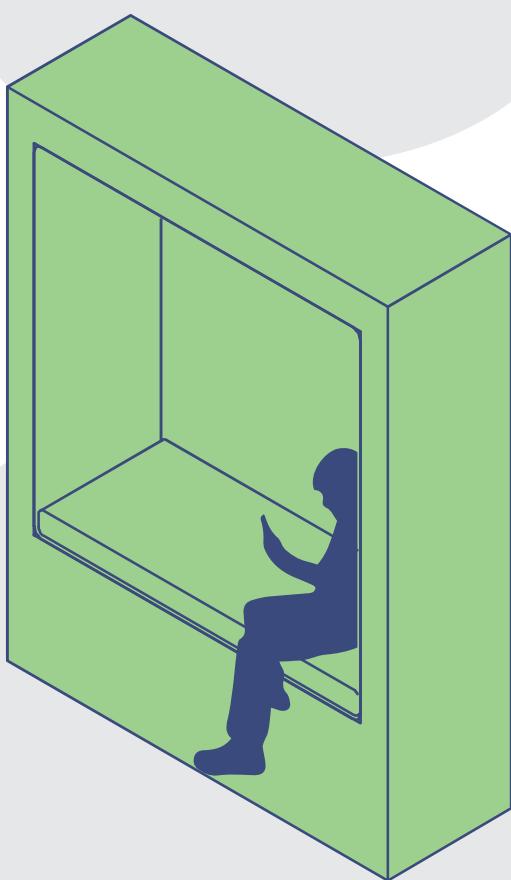
With the introduction of inclusive education in schools, spaces related to emotional health are being created, which improve the quality of the educational environment and benefit students who do not have individual needs.

1. Multi-sensory spaces are designed to stimulate various senses to help students relax, calm down, and at the same time pay attention to their surroundings, motivate them, and encourage exploration. These are controlled-access rooms designed to help students who are experiencing momentary emotional crises to regain their balance individually under supervision. The rooms are equipped with a set of tactile and visual devices that stimulate different senses of touch, hearing, sight, and smell. The goal is to have one space for several classes.

2. Pupils' retreats should be near their learning environments, but away from noise. For older pupils, they can also be in common areas. These are for individual learning, concentration and relaxation.

3. Quiet zones are often next to libraries. These are work and rest areas suitable for people of all ages where noise-generating activities are restricted. It is recommended to create visual isolation to avoid distraction, use comfortable furniture and partitions. Acoustic isolation should be addressed spatially and with sound-absorbing materials. Establish rules of conduct for this space.

4. Intimate spaces were usually designed for gender separation and mass service, leading to bullying. One option to consider is fully enclosed cabins for one person, grouped together in a space, with shared washbasins. Changing areas next to sports halls could include individual changing units, shared locker areas, gender-segregated or individual showers.



LEARN ON MY OWN

The biggest challenge in education is making sure that learners can learn at different speeds, depending on their abilities. So, the idea is to make education as individualised as possible these days.

Schools should have individual learning spaces where students can do assigned tasks or get ready for class without being disturbed. This space should be comfortable, well-lit and quiet enough for one person to work at a table. It could be in the form of an armchair with an acoustic wall and a small table for a computer or books. Furniture can be mobile or stationary, or part of a building.

Set up individual learning spaces in corridors, foyers and reading rooms. Use mobile partitions in classrooms if there's enough space. Teachers decide on the number of spaces and their locations based on student preferences. Spaces should be partially isolated from noise and sight. It's good to give teaching staff their own workspaces.



RESEARCH TEAM

Being able to work together helps you find solutions to complex problems, as well as get to know other people, learn to take responsibility, defend your beliefs and find compromises. So, this ability is really important for anyone living in a democratic society. You can also use the small group workspaces for team tasks, individual or small group consultations.

Spaces can also be used by teaching staff for consultations. The need for such spaces depends on the school's learning culture. Decisions should be made after assessing teaching methods and space use. These spaces can also be used by teaching staff for consultations.

How many of these spaces a school needs depends on its learning culture. So, the decision should be made after looking at the teaching methods of different subjects, as well as the specific features of space use determined by the age groups of learners.



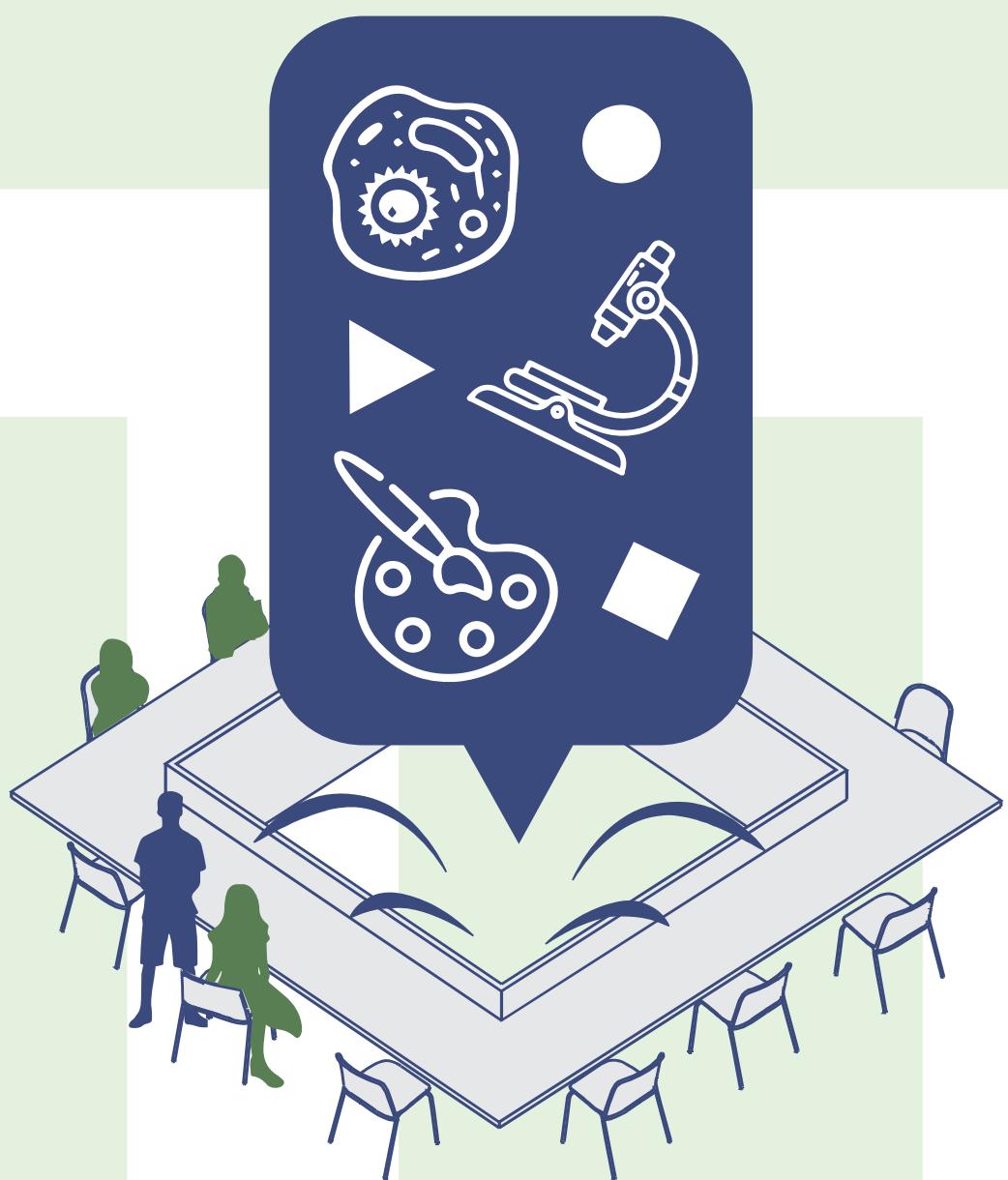
ROUND TABLE

The round table concept originates from legends about King Arthur and his knights, who would sit around a table becoming equal participants in the meeting.

A round table is a group for learning practical things in smaller groups. These spaces don't need tables, but should allow groups of up to 15 people to work and interact. Many schools have smaller classrooms (e.g. for language teaching).

This change program encourages the creation of such easily accessible and open spaces for all members of the school community. This can encourage the use of spaces for various activities, including meetings, informal discussions, and social initiatives.

These spaces should have furniture, multimedia, and teaching aids. They should be designed for group instruction, collaboration, discussion, debate, and presenting results.



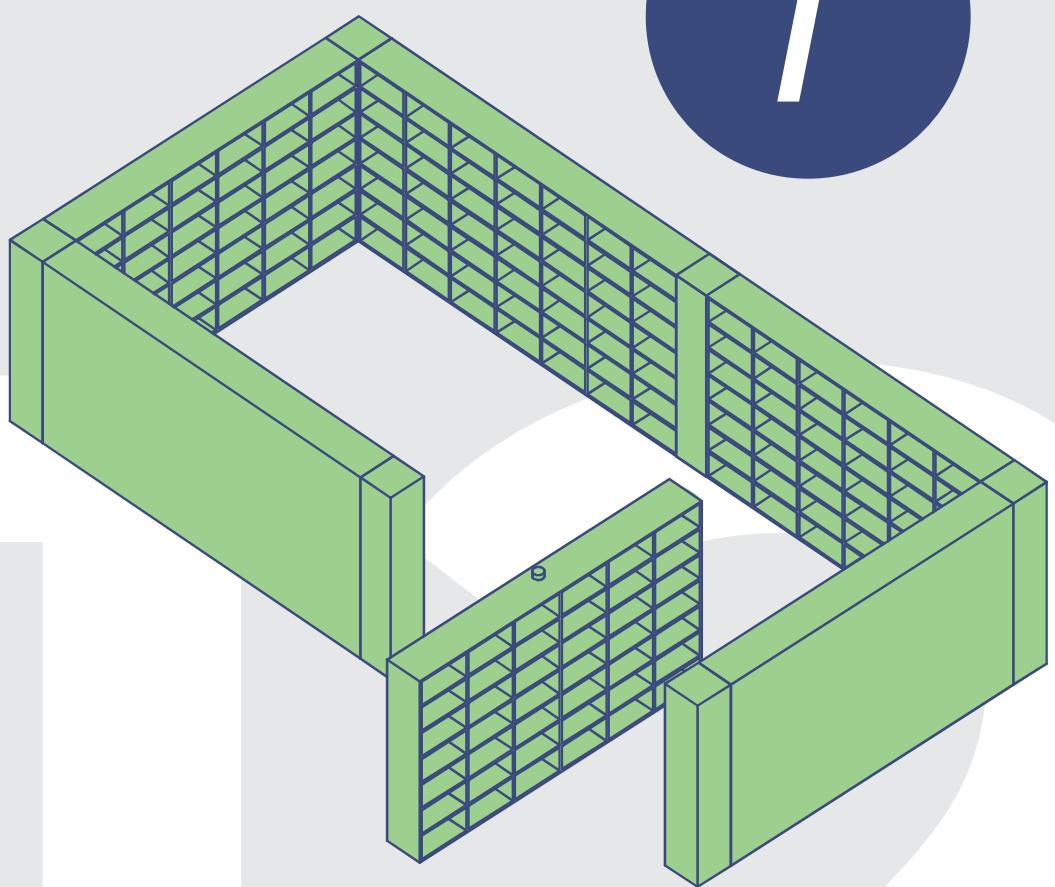
OASIS OF KNOWLEDGE

Oasis: a place where there is enough fresh water for trees and other plants to grow.

Organising the premises, equipment, tools, and materials of scientific groups into groups can make more efficient use of available resources. The layout of a building affects how you can organise these spaces. Some of the school buildings built in the second half of the 20th century were designed so that activities could be organised in clusters, but this feature was either not fully implemented or changed over time. Returning to the original architectural design can help initiate this change programme.

Oases consist of four types of organisation::

1. Class oases (2-6 classrooms share one space);
2. learning group oases (students split into 15-30 groups for specific subjects or interdisciplinary tasks);
3. Function-based zones (project groups select spaces based on needs – presentation rooms, laboratories, group or individual workspaces);
4. Open-plan oases (spaces adaptable for different uses). It is advisable to have designated work and rest areas, and sanitation facilities, for teachers.

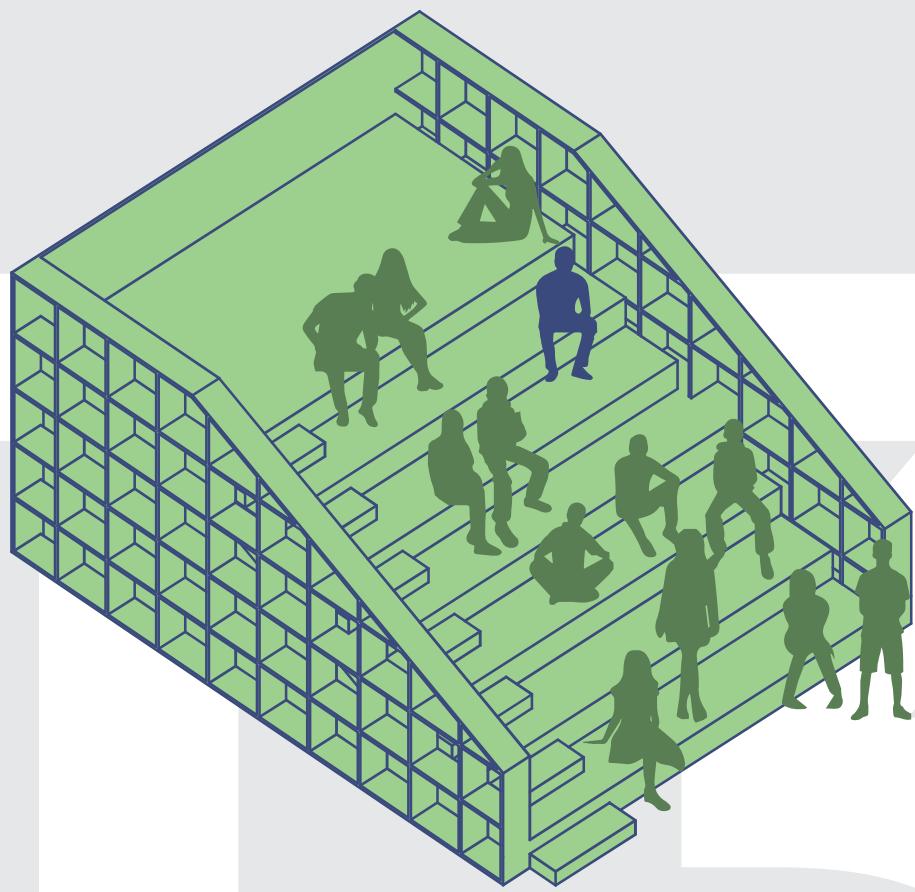


COMMUNICATION AND INFORMATION CENTER (CIC)

To increase the variety of work-learning and communication spaces, and optimise exhibition space management, related spaces should be gathered next to the library to form a CIC. This complex could consist of a library, a reading room, an online reading room, and a printing and digitisation centre.

The library environment is perfect for making changes to personalised and socialised education, so it makes sense to set up spaces for people to work on their own and in groups. Schools are increasingly opening their doors to local communities.

Library collections and the workspaces set up alongside them can become a really important place for the school and the local community. CICs should be set up so that the spaces are accessible after school. Deciding how many work and study spaces should be set up at the CIC requires considering: individual and team work encouragement; existing spaces for students and teachers; student transportation after school; and the local community's needs.



AGORA

Agorà (Greek) was the name given in ancient Greece to the assembly of free people, its location, the main square of the city (VLE).

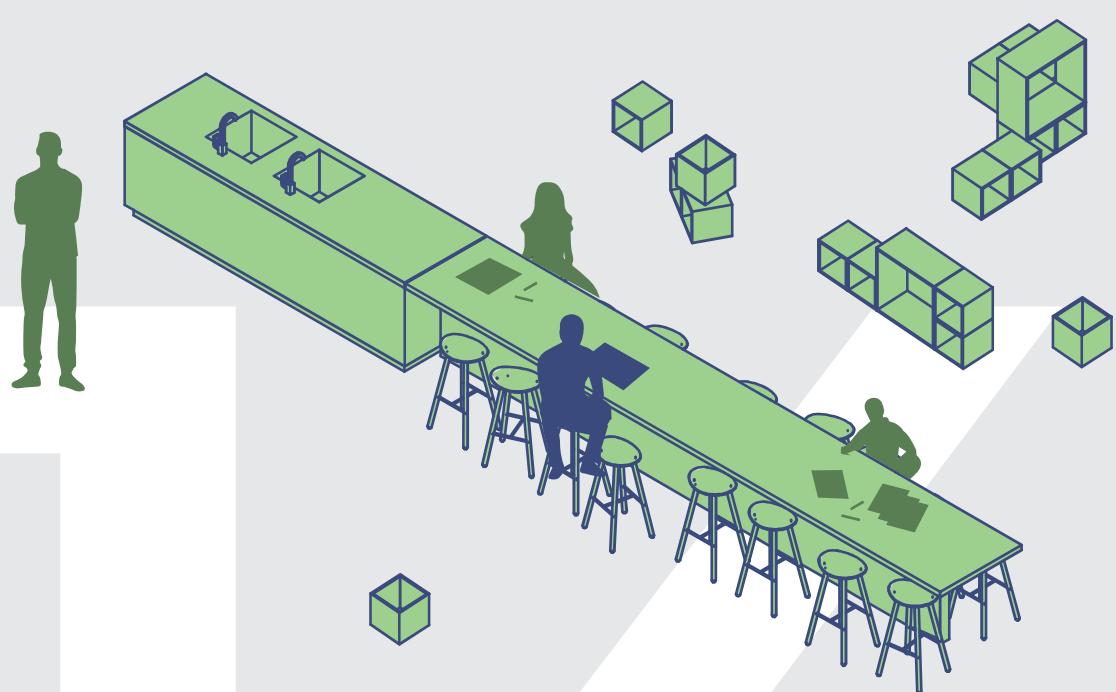
Democratic education of society is a political priority at the national level, and general education schools are one of the most important institutions implementing this policy. It is therefore important that the spatial and functional organisation of schools helps to achieve these objectives.

Historic school buildings are designed for single functions, with spaces that express the verticality of power. Such spaces do not lend themselves to unplanned initiatives.

To create a democratic atmosphere, we should make an open, community-use space for different activities. This should be a space where the community can hold daily meetings and special gatherings, with unrestricted access. Put this space near the entrance to also accommodate event attendees.

It'd be a good idea to connect the agora with other spaces where the community gathers, like the library and reading room, canteen, sports and dance halls, or other activity rooms.

The agora is also a venue for events, so we need to make sure there's seating and stage area with sound and lighting. These shouldn't get in the way of everyday business.



COMFORTABLE WORK AND REST FOR STAFF

Staff areas at the school include: workplaces for teachers and specialists; workplaces for administration; workplaces for service staff; meeting areas; areas for self-government and initiatives; and rest areas for employees.

The spatial solutions for school staff vary between traditional, inclusive, and all-day schools. A decision must be made as to the type of spaces to be created – concentrated or dispersed. All-day staff activities result in longer working hours and more employees, while individual student support needs different space.

Based on the nature of use, the following types of spaces can be distinguished: individual workplaces, which could be either mobile or not; meeting and conference spaces, which are usually smaller, located near to the admin or community cluster; and communication and relaxation spaces, which can be located next to individual workplaces.

Teachers' workplaces can be assigned to general teaching (learning) spaces and located as close as possible to learners, where it is possible to prepare, advise, and exchange information (e.g., primary school teachers' workplaces (staff room) are located next to primary classrooms; the main workplaces of science teachers are set up in the relevant oases (clusters).

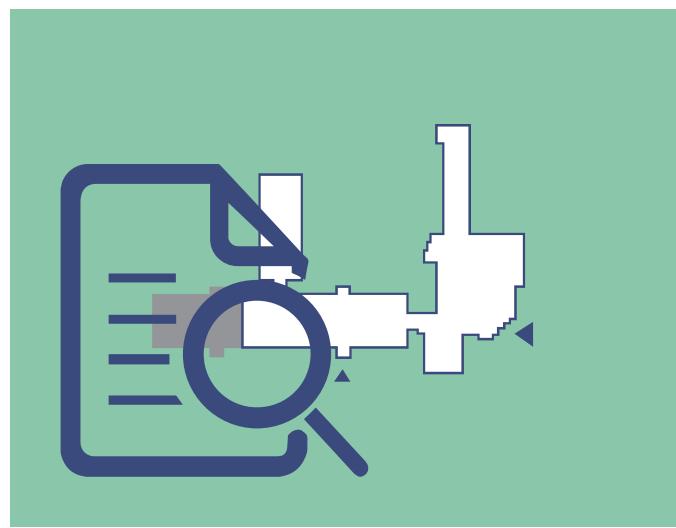
Student support specialist consultation rooms are for social pedagogues, psychologists, special pedagogues, speech therapists, teaching assistants and public health specialists. These specialists assist students, parents, teachers and other education providers. The layout of these rooms depends on the size of the school and the number of educational levels. However, visiting certain specialists is still stigmatised, so it is worth considering the possibility of setting up child welfare specialists' workplaces on the basis of an oasis (cluster) principle with a single main entrance. In this way, those visiting specialists can maintain a certain degree of anonymity.

CHAPTER II

METHODOLOGY

1. STEP. ANALYSIS OF SCHOOL DATA

The analysis of data about the school covers two areas. The first area looks at the size of the school building and grounds. The second area looks at the values of the school community.



1.1. We collect statistical data about the school to see if it's possible to expand. If you think the school is too small and you're thinking of expanding the building, you need to assess the development potential of the existing school building and plot.

First, we check that the building density and intensity of the school plot don't go beyond what the municipality's general plan allows. If the density and intensity indicators are lower than required, then the school buildings can be expanded.

Compare the free outdoor space at the school with the area we get by multiplying the number of students by 3 and adding 800. Should the available free plot area exceed the result of the multiplication process, expansion is possible.

1.2. Reviewing the official descriptions of the school's vision, mission, goals and values. Everyone at the school – students, teachers, admin staff and parents – may have their own expectations, attitudes and values, but as a school community, they declare their aspirations and expectations on the official website. So, to get to know the school community, it's important to see what the school's values and vision for the future are.

Ask yourself: Does the school show what makes it unique and distinctive? Do its values reflect inclusiveness and community spirit? Does it put quality education and well-being first? Does it support the principles of democracy and equal opportunities? I was just wondering whether it takes the challenges of sustainability into account.

2. STEP. SPATIAL ANALYSIS OF THE SCHOOL

The analysis of school spaces is done in two stages. First, it is checked that the groups of rooms with different purposes in the operating school meet the necessary construction and hygiene standards. Then, we look at how the school's indoor and outdoor spaces meet the needs of modern (21st century) learning spaces, and we study the layout of different areas of the school.

2.1. We've identified seven groups of indoor and outdoor spaces in the school and marked them with colours on the plans of the school building and territory. We've got all the sizes of the spaces down, and we've put them into six groups based on how they're used.

- General teaching (learning) spaces (classrooms, general teaching (learning) rooms, group work spaces of various sizes, individual learning spaces, decentralized all-day spaces, learning spaces on school site);
- Specialized teaching (learning) spaces (science classes, technology classes and workshops, art spaces, music classes, dance and theater spaces, laboratories, IT education classes, sports halls, sports fields)
- General school spaces (libraries/reading rooms, multifunctional spaces for communication and collaboration, relaxation areas, foyers, vestibules, atriums, amphitheater spaces)

| Mokymosi patalpų plotas | | | |
|-------------------------|-------------------------------------------------------------------------------------------|-------|------------------------------------------|
| | Bendrosios mokymosi erdvės | 640.1 | 1203.2 kv.m iš jų pradiniai kl. 229.5 |
| | Specializuoto mokymosi erdvės | 563.1 | |
| | Bendruju mokyklos erdvės plotas (aktų salė, valgykla, biblioteka, skaitykla, fojė, holai) | 552.9 | neįskaičiuota valgykla |
| | Pagalbiniai patalpų plotas (WC, drabužinės, persirengimo kambariai, virtuvė, sandėliai) | 427.6 | neįskaičiuoti WC ir virtuvė |
| | Administracijos, mokytojų, pagalbos specialistų kambarių ir poilsio kambarių plotas | 291.4 | |
| | Tik praėjimui skirtų koridorių ir laiptinių plotas | | |

- Staff areas (staff rooms, individual workplaces, meeting rooms, staff break rooms, administration offices, student support specialist work areas (social pedagogue, psychologist, special pedagogue, speech therapist, etc.), service staff areas).
- Auxiliary spaces (cloakrooms, changing rooms with showers (next to sports halls or swimming pools), storage rooms, archives, server rooms, technical rooms, food preparation rooms, laundries, engineering units, cleaning equipment rooms).
- Sanitary facilities (toilets for students, toilets for staff, adapted toilets for people with disabilities).
- Transit areas (corridors and staircases, elevators, ramps).

*Existing
situation*

VS

HN / STR

2.2. To see if certain areas are suitable, the current situation must be compared with construction and hygiene standards.



Divide the total area of general teaching spaces by the number of students. If the figure is higher than the required standard, there's enough space for a high-quality education. If it's lower than the standard, it means either insufficient space or too many students.

Each specialized teaching space must be divided by the number of students in each class to check compliance with the area standards. The standards depend on the level of education and the specific purpose of the space.

We compare the total area of common school spaces with the number of students and staff. There aren't any strict requirements, but 2 m² per community member is recommended. The hall, meeting rooms and auditorium should be proportionate to the community size.

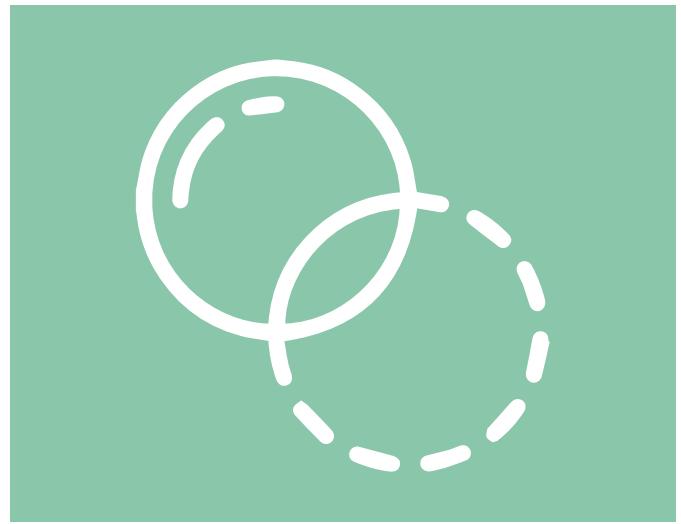
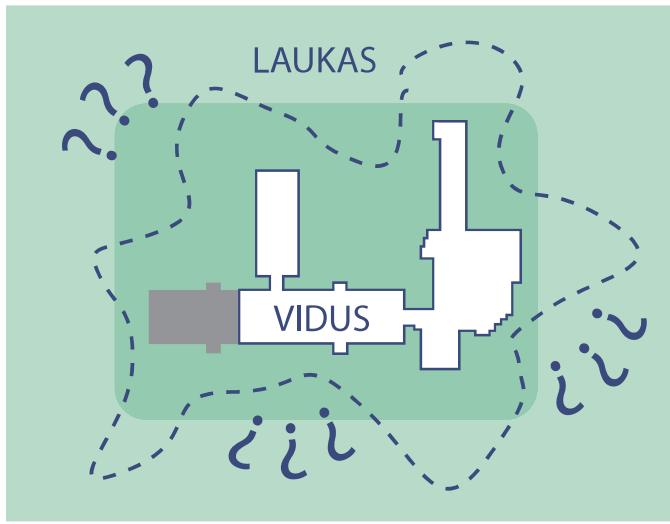


We compared staff areas with workplace requirements. According to office design rules, each employee should be given 8.5 m². It is important to provide staff with a rest and retreat area.

We're comparing the area of school auxiliary spaces with hygiene standards. Ensure changing rooms with showers and toilets for women and men near the sports hall. Group locker areas together in school common areas and make them easily accessible.

Sanitation facilities are regulated based on student and staff numbers. Toilets must be installed on each floor, with facilities for different genders and one toilet with a separate entrance for individuals with disabilities.

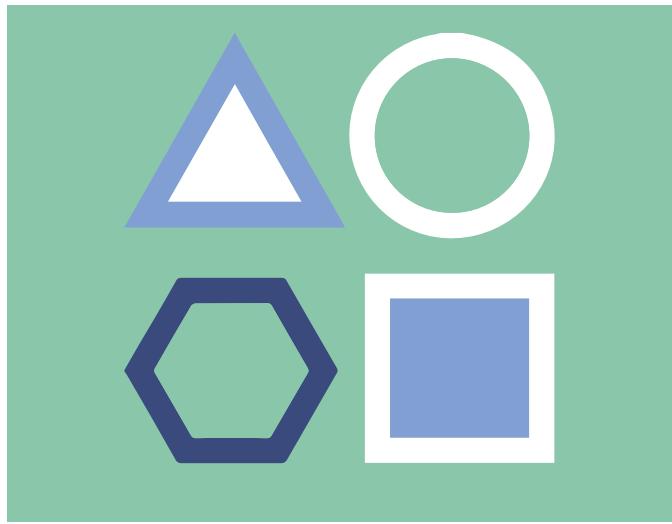
We assess how well school transit spaces comply with regulations. It's important to make sure that the corridors are at least 2.5 metres wide in the main areas of the school. You need an elevator for buildings with three or more floors, and at least one of them should be suitable for people with disabilities.



2.3. We need to understand how the indoor and outdoor spaces of the school meet the essential characteristics of a 21st-century learning space. We'll assess whether the school has these characteristics or not.

Spaces can be adapted due to flexibility and mobility. We explore whether school spaces can be rearranged, separated or combined to suit different learning styles, numbers of students or other needs.

Open, transparent spaces allow for different levels of visibility and views of the outside. Ask about visibility between spaces. This can encourage communication and collaboration, fostering openness and trust, while creating a sense of freedom and security.



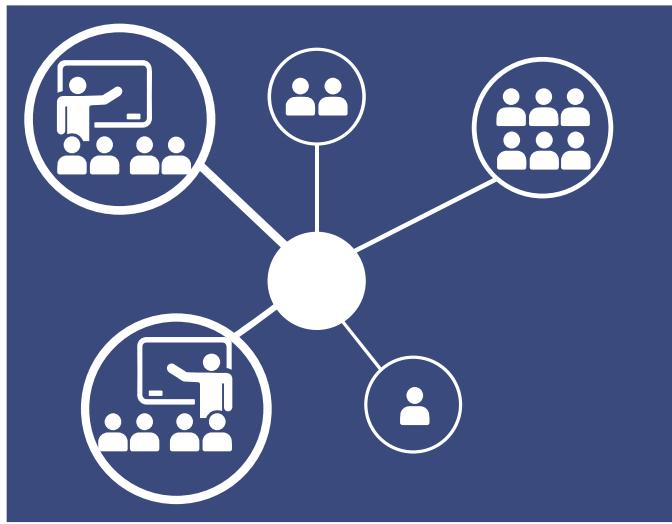
The variety of spaces includes spaces of different sizes, shapes, flexibility, transparency in the school and its surrounding area. It is important to find out whether the school has spaces for individual work, small group learning, seminars and other activities, retreat and quiet rest, active recreation and socialising.

A modern school is a stimulating environment. It looks nice and is made with cosy materials and colours. So, we look at how inviting and attractive the school environment is and how much it encourages students to get involved in learning.



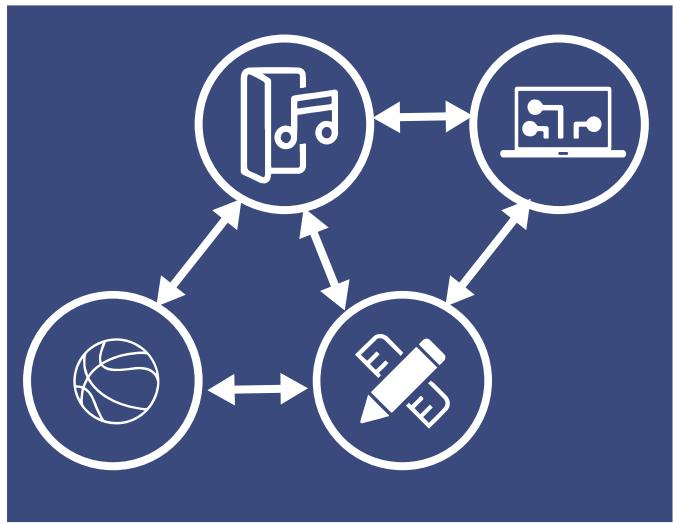
A space that represents the school's identity. We look at how the school and its site show what makes it special and what values are important to the community. Are there spaces that show the school's character in any special way?

Naturalness means having enough natural light, good acoustics, fresh air and ventilation, a balanced temperature and being able to see and connect with the natural world. Check whether all these aspects are working well in your school.



2.4. We're doing an analysis to see if the way the school's common learning spaces (classrooms) are set up makes sense for the different levels of education.

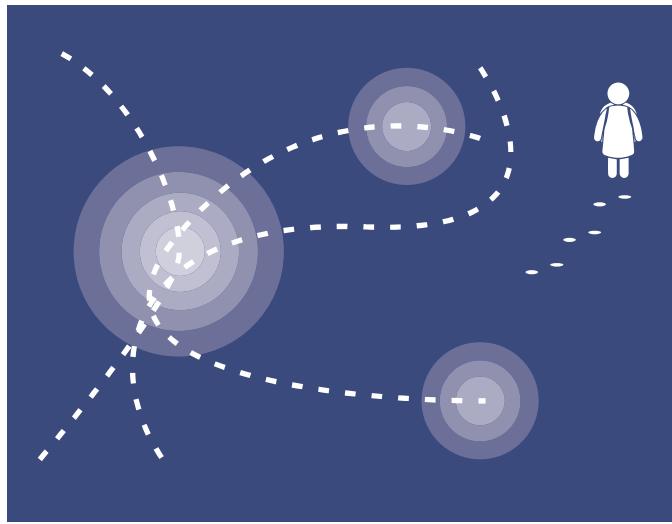
Do the primary classrooms have a nice outdoor space nearby? And are they on the first floor? We check if the general teaching rooms (classrooms) for primary and basic education are located separately (autonomously), on different levels or in different buildings. So, are secondary education classrooms grouped together, and are they in clusters? And are there individual, group or seminar learning spaces nearby?



2.5. We take a look at how specialised learning spaces are set up in the school building and on the site. We're looking into whether these spaces (like science classrooms and labs, tech workshops, teaching kitchens, art, music, dance, theatre studios, IT classrooms, sports halls, etc.) are easily accessible from the general learning areas.

We check if workshops, music and sports spaces are located away from other learning spaces because they generate more noise. It's important to check if special learning spaces have the latest tech and equipment that meets today's needs.

We're also looking into whether we can do both theoretical and practical teaching in these spaces, and whether they can be used for interdisciplinary projects. We then look at whether there are prerequisites for the formation of clusters (natural sciences, technology, sports, arts, etc.).



2.6. Have a look at how the common school spaces are arranged. Assess whether these spaces are big enough for the whole community to gather, and whether they should be organised as one school centre or several smaller ones.

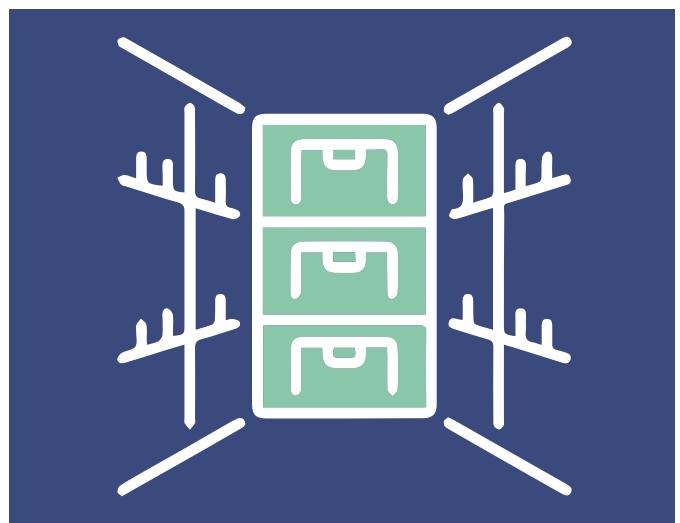
Think about whether the common areas are functioning as a centre and a place for moving people and things around, and how they help with orientation. Is it easy to move around the school?

We're assessing whether common areas in schools encourage communication, teamwork, and the building of a sense of community, or whether they provide opportunities for quiet, peaceful spaces for working and studying as well as for active communication and interaction.

2.7. We've analysed the layout of staff areas in the school. Teachers' rooms and administrative premises are checked for concentration and accessibility. Individual workplaces, meeting rooms and rest areas are investigated.

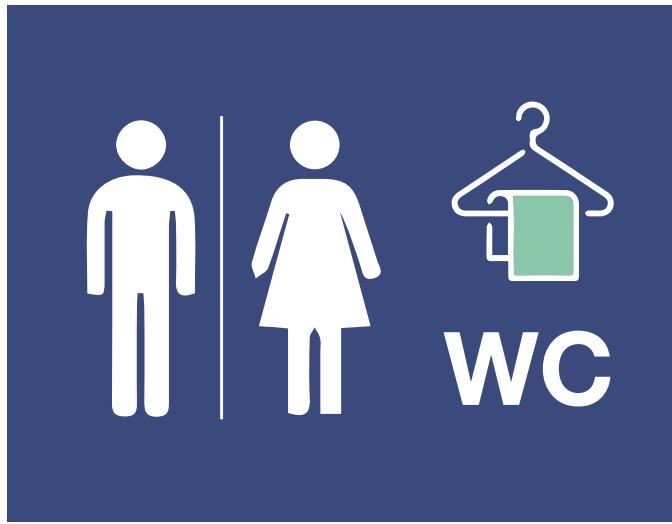
We also check that students and parents can easily get to see the specialists who help them (like psychologists, social workers and speech therapists).

It's important to answer the question of whether there are areas designated for service personnel and whether they're logically and purposefully arranged.



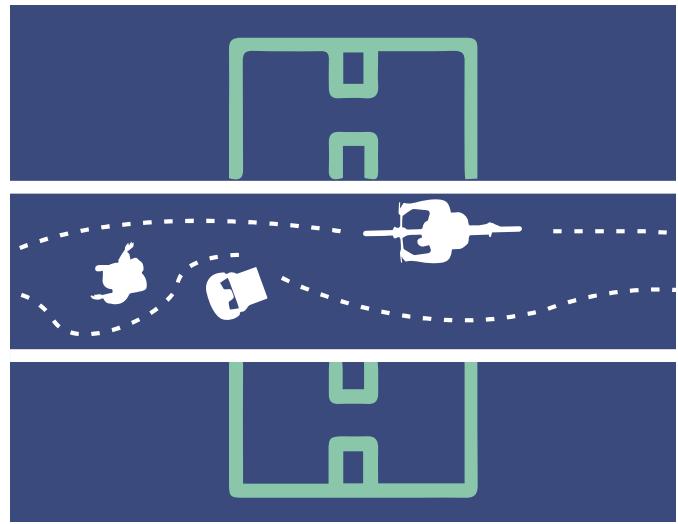
2.8. We're going to have a look at the layout of the school's auxiliary rooms. Is it being decided whether places like cloakrooms, changing rooms, storage rooms, technical rooms, etc. are arranged logically and purposefully and easily accessible?

It's really important to have changing rooms with showers and toilets near the sports areas. It is necessary to assess whether the rooms are functional and of sufficient size and whether they are safe and convenient to access.



2.9. We will check the layout of toilet facilities at the school and make sure they are suitable.

Is it clear whether there are toilets for students on each floor of the school and whether they are easily accessible (no more than 50 metres away)? Are there separate toilets for boys and girls, and for staff and disabled people?



2.10. Analysis of the layout of transit spaces in the school. It is necessary to determine whether the stairs and elevators are conveniently located throughout the building for easy access from all parts of the school.

Observe whether there are very long corridors in the school and record their length.

Find out if corridors are the only spaces used to connect the different areas of the building, or if halls and entrances are also used.

3. STEP. COMMUNITY SURVEY



The purpose of the community survey is to find out what are the spatial needs of adults who use the school building (teachers, parents of students, and school administration staff) and what they think about the change programs.

The aim of the survey is to reach as many respondents as possible, therefore it is proposed to use both an electronic and a paper questionnaire format.

The survey questions are designed to ascertain which school spatial change programs respondents consider to be the most significant and which, in their opinion, are not relevant to the school.

The analysis of the survey responses helps to rank 14 programs for spatial change according to their relevance.

It is beneficial to analyze the collected data in groups, summarizing the opinions of teachers, parents of students, and school administration staff separately. This is because their responses may differ and reveal distinct approaches to the use of the school.

4. STEP. WORKSHOP WITH SCHOOL COMMUNITY



Students and teachers, who use the school building the most, are the ones who take part in creative workshops. The objective of the workshops is to gain insight from students and educators regarding the most pertinent spatial change programs and spaces, which were evaluated during the community survey.

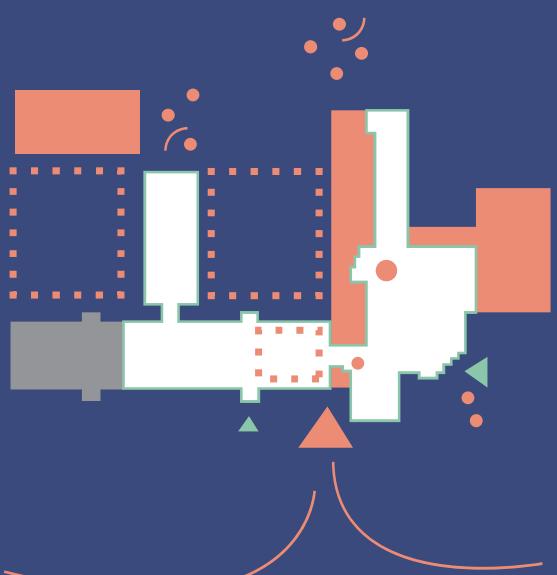
Separate workshops are conducted for teachers and students. The workshops are designed to accommodate various educational levels, including kindergartners, primary school students, and junior high school students.

The tasks are customized to the age of each group. The workshops consist of tasks that involve the development of ideas for specific school interior and exterior spaces (i.e., drawings, models, or atmospheric collages), their presentation, and discussion.

The gathered ideas are summarized, and the primary spatial requirements of the school's primary users are identified, as well as specific solutions for the physical environment. Designers are provided with a school change vision program that is developed in accordance with the results of the creative workshops.

5. STEP. SCHOOL CHANGE PLAN

- 1. SCHOOL FOR EVERYONE ✓
- 2. WE ARE A SCHOOL! ✓
- 3. SUSTAINABILITY
- 4. EXTERNAL AND INTERNAL DIALOGUE ✓
- 5. TRANSFORMERS
- 6. OPEN SCHOOL
- 7. PEACEFUL SPACES ✓
- 8. LEARN ON MY OWN ✓
- 9. RESEARCH TEAM
- 10. ROUND TABLE ✓
- 11. OASIS OF KNOWLEDGE ✓
- 12. COMMUNICATION AND INFORMATION CENTER
- 13. AGORA
- 14. PATOGUS PERSONALO DARBAS IR POILSIS



Once we had collected factual data on the composition and size of the building, we compared it with the applicable hygiene and construction requirements, examined how the building is currently used and how these functions have changed since its construction, and conducted a sociological study (interviews, surveys, discussions) to identify the expectations of the user community, we can decide which of the change programs presented in the model are currently most relevant to implement.

Then, by comparing the results of the architectural analysis and sociological research and based on the set of change programs, a school change plan is formed.

An important step is to present the school change plan to the school administration, founders, and community.

After discussion, adjust the plan if necessary.

CHAPTER III

THE CASE OF ŠIAURĖS PROGYMNASIUM

A 14 CHANGE PROGRAMME ADAPTED FOR ŠIAURĖS PROGYMNASIUM



STEP 1. ASSESSMENT OF REGULATIONS AND INDICATORS APPLICABLE TO THE PLOT

We've looked at the plot area and the building density and intensity indicators, and it seems like construction development can move forward on the school plot.

The school plot is spacious and not fully built up, so the outdoor space for students to relax exceeds the minimum requirements by six times.

There are not enough spaces for bicycles on the plot.

The sports infrastructure meets the requirements.

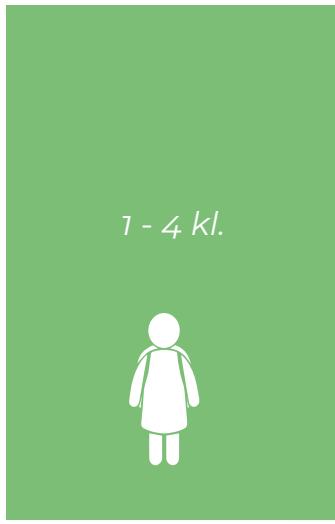
STEP 2. EVALUATION OF SCHOOL GOALS

The info came from the school community itself, who formulated the vision, mission, values, and goals.

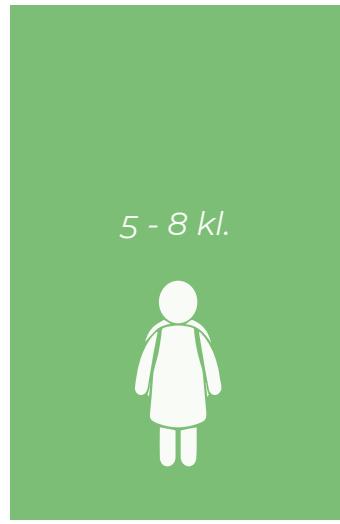
The school sees itself as a unique, constantly changing community that provides high-quality education. This shows that the school is willing to change and open to constant renewal. The school recognises what makes it special, but doesn't define what that is.

The school plans to pursue and achieve its goals by modernising the learning process, taking into account the individual abilities and needs of students, and creating a healthy, safe, and inspiring environment. This shows that the school is serious about using modern teaching methods, making sure that everyone is included and that the building is suitable.

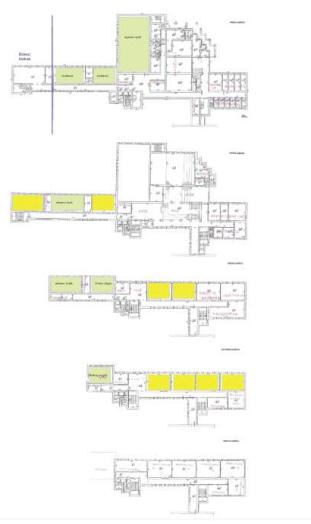
The school encourages everyone to work together, be friendly and be proactive in what they do. Community and respect are at the heart of the school, so the building should reflect that. We need community spaces, an atmosphere of transparency and clarity, and support spaces that promote equal opportunities and inclusion.



1 - 4 kl.



5 - 8 kl.



STEP 3. EVALUATION OF SCHOOL BUILDING USE

PRIMARY EDUCATION

Difficult access to the 5th floor classes.

Lack of space for breaks and places to relax.

No outdoor space.

Based on the current number of students in classes, the classroom area meets the minimum requirements.

Once the maximum number of students in classes (24) is reached, one classroom (31.3 sq. m) would not meet the minimum requirements.

There is no space for staff.

BASIC EDUCATION

Based on the current number of students, the basic education classrooms meet the space requirements. If the class size increased to 30 students, the minimum requirements would be met and 8 secondary school classes could be formed.

Based on the current number of students, the specialized education spaces meet the space requirements. If the classes were to grow to 30 students, the current space would not meet the minimum requirements.

The specialized teaching rooms are not optimally located, spread over four levels in the eastern part of the building.

Staff areas



LAYOUT OF SCHOOL STAFF AREAS

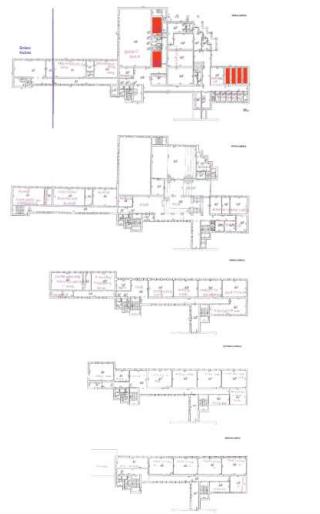
Staff areas are not concentrated.

Student support specialists' offices are located on three floors.

The staff room on the third floor is too small for a team of 37 teachers.

The administration area is on the second floor, concentrated in the western part of the building.

Auxiliary spaces



LAYOUT OF SCHOOL AUXILIARY SPACES

The cloakroom is located in the basement, which is unhygienic (damp, mold) and inconvenient to access.

There are no lockers for storing personal belongings.

As the school expands to 16 classes (432 students), the need for cloakrooms and individual lockers will be significantly greater, and the space currently allocated will not be sufficient.

WC



NUMBER AND LAYOUT OF SANITARY FACILITIES IN THE SCHOOL

Currently, the school has 18 washbasins, 15 toilets, and 8 urinals for students. These exceed the required standards.

With the expansion to 16 classes, 15 washbasins and 22 toilets are needed, or 15 washbasins, 18 toilets, and 7 urinals. There would be a shortage of 3 toilets.

There is a shortage of sanitary facilities for staff on the 3rd, 4th and 5th floors.

Physical education



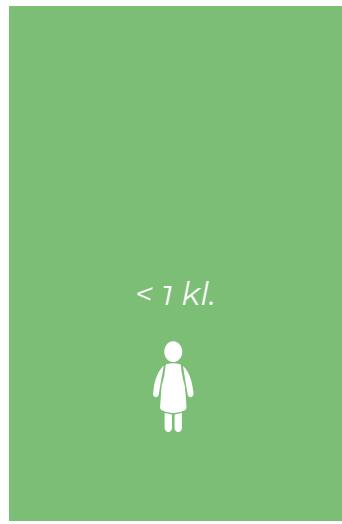
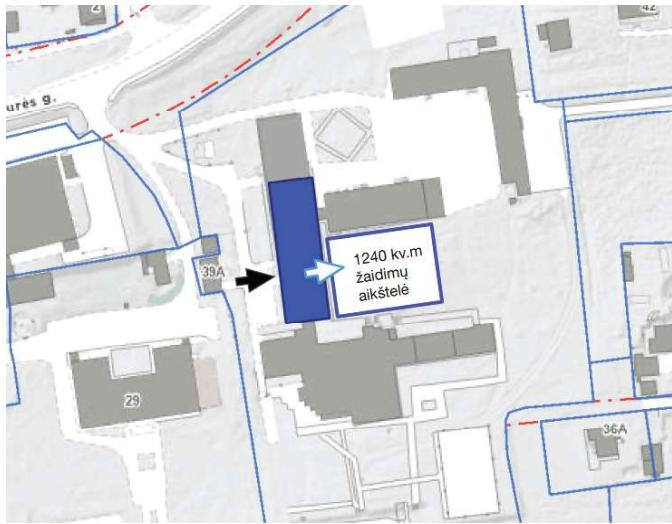
PHYSICAL EDUCATION SPACE AND CHANGING ROOMS

Currently, the school has 9 classes (mostly with 22 students per class). The gym is large enough for these classes to hold sports activities.

If 30 students from one class exercise in the existing sports hall, the hall is too small. This hall can accommodate 26 students at a time.

With the expansion to 16 classes (up to 432 students), the existing sports hall would not be sufficient, and another sports hall would be needed.

If 30 students are exercising at the same time, a total of 6 shower heads are needed (2 shower heads are missing).



KINDERGARTEN

The existing playground significantly exceeds the minimum requirements for the current number of kindergarteners.

Children of all age groups play together in one area of the playground.

The playground has gazebos, sandboxes, other play equipment, and is fenced in.

The kindergarten groups are located on the first and second floors; it is difficult to access the outdoor play area from the second floor.

Five kindergarten groups are (temporarily) located on the first floor, but in most cases the rooms are too small and there is not enough space for changing rooms, and the sanitary facilities are too small and inconveniently located.

Currently, the first and second floors of the former school dormitory do not have the capacity or conditions to educate 116 preschool children.

78% of parents and 70% of school staff agree that lessons could be conducted outside of the classroom. The rest would agree as long as safety and proper infrastructure were made sure of. Learning infrastructure is identified as the primary condition by 34% of parents and 55% of school staff, while a roof is identified by 26% of parents and 33% of school staff.

52% of parents and 66% of school staff are in favor of the sharing of school spaces with the local community. Those who are skeptical believe that it would be challenging to maintain safety and order. 73% of parents and 88% of school staff think the stadium would be the best shared space. An indoor sports hall and an event hall are additional potential shared spaces.

The concentration of spaces is regarded by 56% of parents as the most significant change to school spaces. Other significant changes include the indoor-outdoor connection (39%), zoning of spaces (39%), and diversity of spaces (43%). The concentration of spaces and universal design are the most relevant changes in school spaces, according to 48% of school staff. Other considerations include the diversity of spaces (33%), as well as the connection between indoor and outdoor spaces (37%). The zoning of spaces (11%) and transformation (14%) do not appear to be pertinent to the school community.

The outdoor classroom is considered a relevant learning environment for 43% of parents and 48% of school staff, the outdoor laboratory is relevant for 56% of parents and 40% of school staff, and individual work and learning spaces are relevant for 43% of parents and 48% of school staff. Large-group and seminar-style learning environments are not considered relevant to all participants.

The majority of parents (82%) regard active recreation areas as the most pertinent recreational (retreat) environments.

STEP 4. SUMMARY OF SURVEY RESULTS

A total of 13 questions are included in the survey, with an additional four questions specifically designed for the parents of students. Three questions on the questionnaire require the respondent to enter their response; all other questions have optional responses.

The survey was filled out by 50 people, including 23 parents of students and 27 school staff (11 teachers, 11 technical staff, 4 student support specialists, and 1 administrative staff member). 8% of the parents of students enrolled at the school and 26% of the school staff responded to the questionnaire.

Survey participants gave outdoor spaces an average rating of 8, while they gave indoor spaces an average rating of 6.5. Outdoor areas were perceived better than indoor areas by the majority of respondents. The school environment got better marks from parents than from school staff. The student support specialists assigned the lowest rating to the environment.

The primary advantage, as identified by 56% of parents and 48% of school staff, is the visible physical change in the school's outdoor spaces. Respondents identified the following criteria for assessing the spaces: whether they are organized, contemporary, and functional.



PARENTS



TEACHERS



ADMINISTRATION

50

RESPONDENTS

Others include sensory rooms (52%) and peaceful recreation areas (65%); a shared kitchenette (8%) is considered irrelevant. 74% of school staff think that quiet recreation areas are the most important, all others are considered as equally pertinent (37-40%).

According to 56% of parents and 66% of school staff, the lobby is the most inspiring indoor space that brings the community together. According to 37% of school employees and 56% of parents, the sports field is the most motivating outdoor area. The entrance hall (34%), the indoor sports hall (34%), and the inner courtyard (43%), were also favorites of parents. Additionally, teachers identified the canteen (29%), the event hall (25%), and the entrance courtyard (25%).

47% of parents regard the physical renewal of school spaces as the most significant aspect of the institution, additionally, the school is described as small, with a positive atmosphere, inclusive environment, and a dedicated staff. The naturalness and spaciousness of the school's environment are deemed the most significant aspect by 36% of the staff, other distinctive characteristics mentioned were a welcoming atmosphere (20%) and an inclusive environment (24%). According to 16% of school employees, the school's distinctiveness lies in the large number of students with special needs. The majority of school personnel provide a positive description of the school.

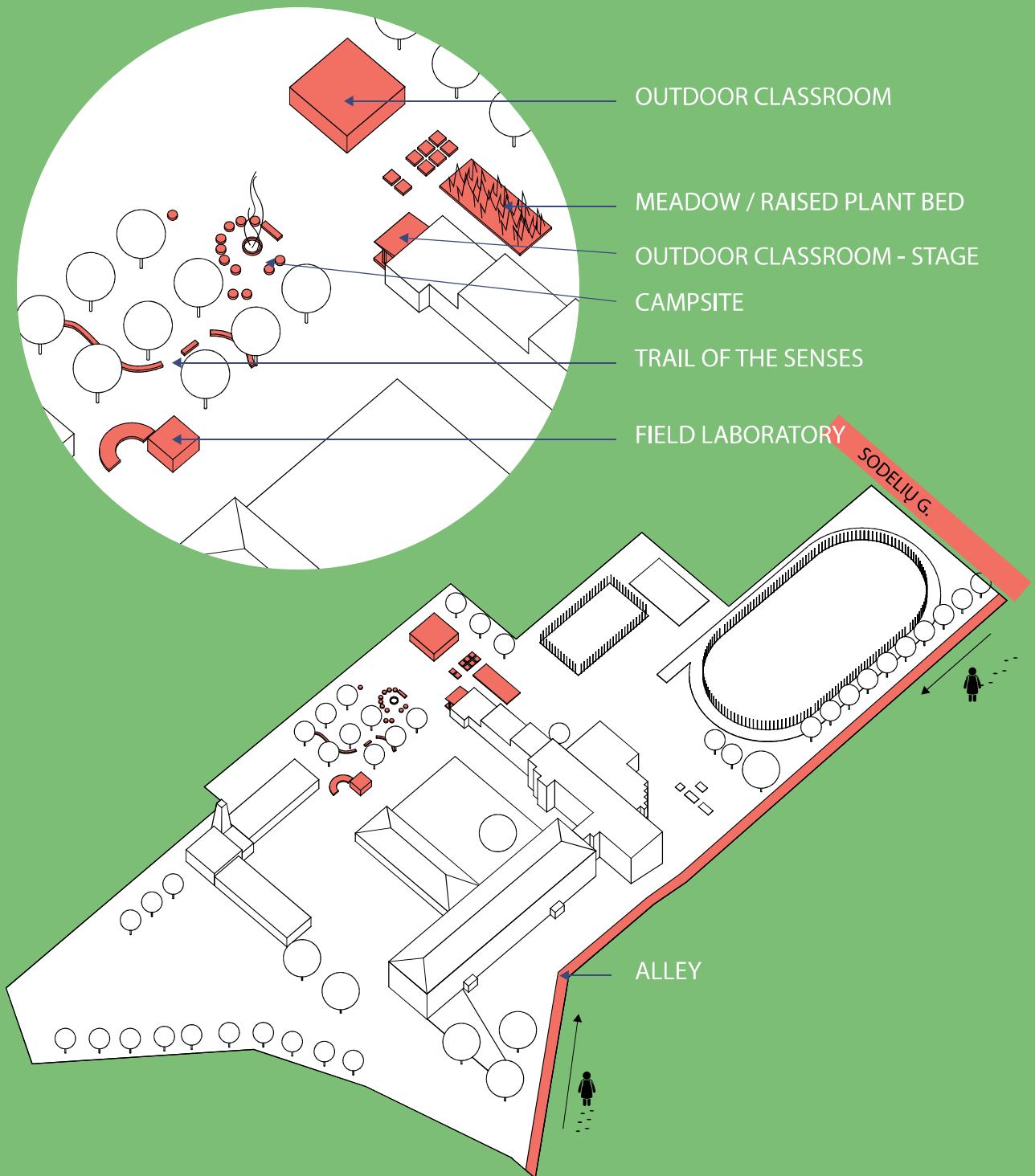
Of the parents who completed the survey, 63% have children enrolled in primary school (grades 1-4). 76% of parents who responded to the survey drive their kids to school by themselves. 23% of the children travel on their own, most of them by bus, and the remaining children travel on foot, bicycle, or scooter. 80% of students stay at school after school in some way (46% do homework, 35% wait for their parents to get home, or go to a club).



STUDENT SUPPORT
SPECIALISTS



TECHNICAL STAFF



STEP 5. THE MOST RELEVANT CHANGE PROGRAMS FOR SCHOOL AND ITS ARCHITECTURAL EXPRESSION

After summarizing the results of surveys, architectural research, and workshops with kindergarteners, schoolchildren, and teachers, we identified the community's priorities for renovating the school's physical environment. We used this knowledge to develop a plan for functional and spatial changes at the school. The progress and stages of the plan's implementation must be reviewed regularly and adjusted as necessary.

In stage 1, we focus on the school's outdoor spaces, where we aim to implement the change programs **SCHOOL FOR EVERYONE** and **INTERNAL AND EXTERNAL DIALOGUE, WE ARE A SCHOOL!**

We are appealing to Vilnius City Municipality to install the long-planned bicycle and pedestrian street in the southern part of the school grounds. The street, equipped with bicycle parking facilities, would encourage students and employees living in the neighborhood to come by bicycle, increasing the physical safety of these trips and the immediate surroundings of the school.

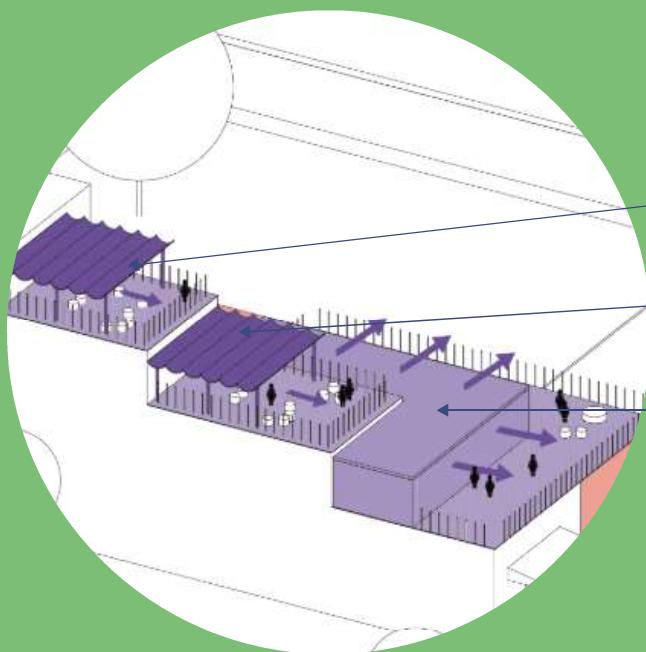
In the southern part of the plot, we are constructing a footpath for use by the school and local community members.

This will improve accessibility for people with mobility impairments to the school, which is located on a steep slope, and create different scenarios for school accessibility at different times of the day.

In the east, next to the school building, we are setting up a stage-outdoor classroom, and in the garden and meadow we are setting up different types of outdoor classrooms (e.g., a campfire site, a shelter with furniture), a nature laboratory, and a sensory trail.

The school community, through communication with each other, cooperation with the local community and other social partners, and exploration of its possibilities, will select certain areas of science or art as more important (e.g., nature studies, creativity, entrepreneurship, perhaps a combination of these) to shape their identity. A distinct identity would increase attractiveness, create recognition, and could lead to increased competitiveness, but it should also be responsive to current events and therefore constantly changing.

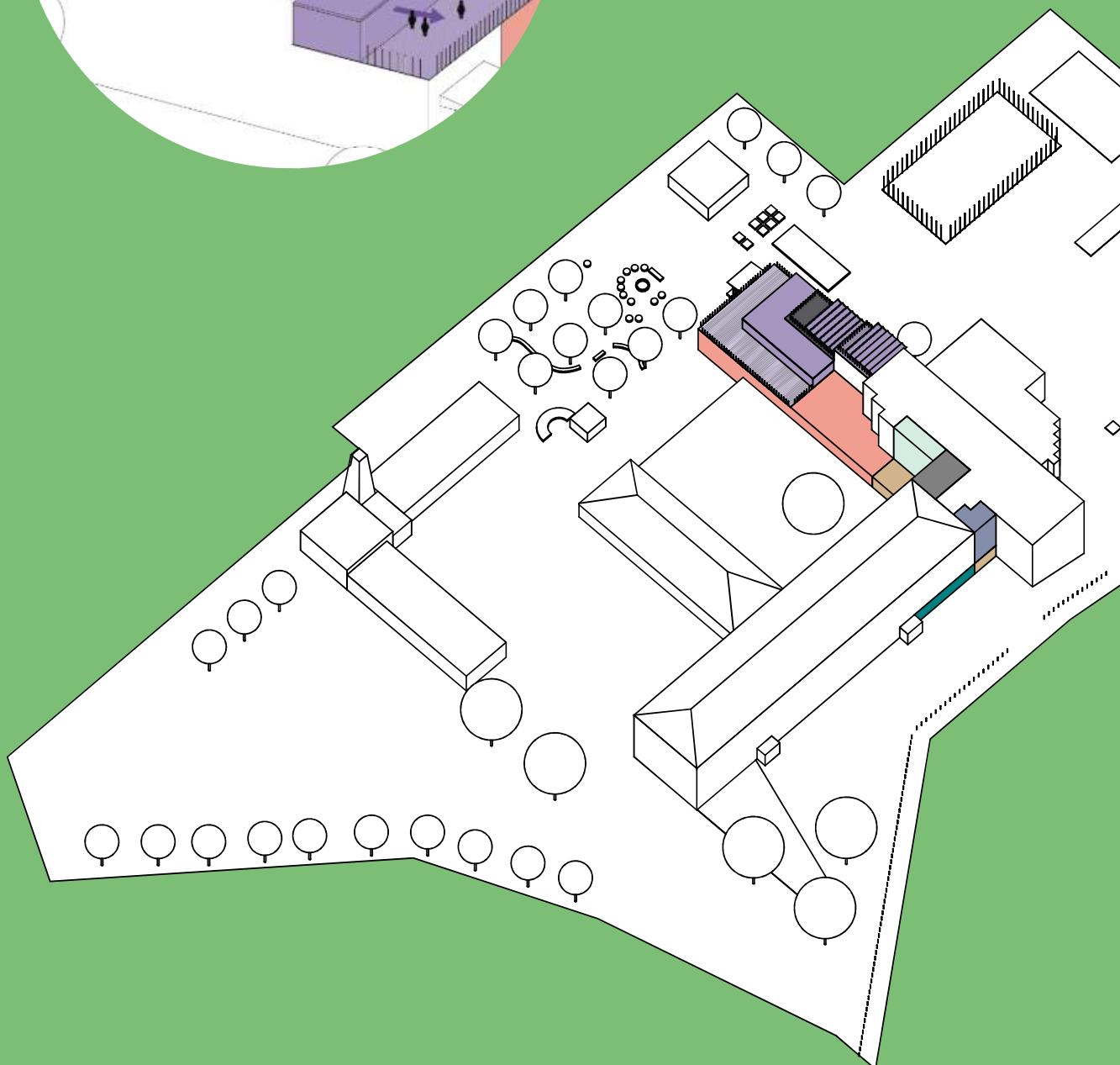
At the same time, we are continuing the ongoing adaptation of the former dormitory building for educational purposes. Where possible, we are installing direct access from classrooms to the outdoors (especially in the early years of education).

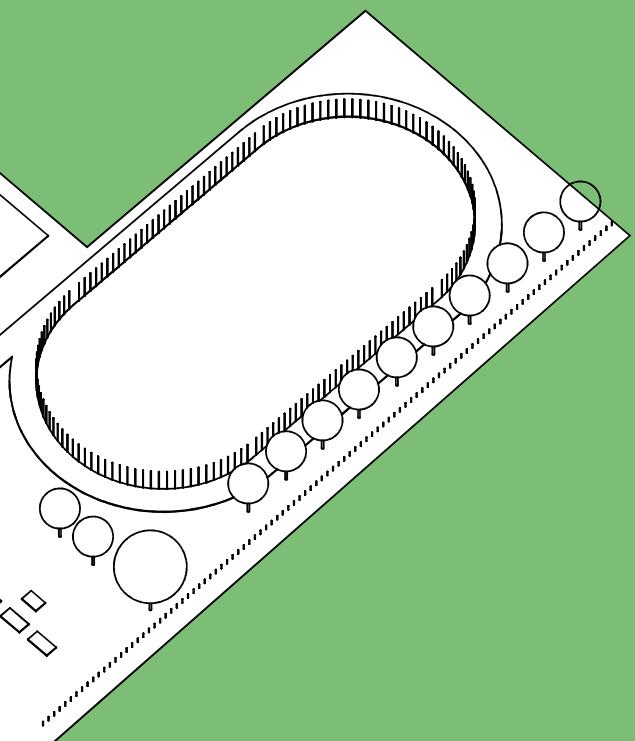


OUTDOOR TERRACE

OUTDOOR TERRACE

NATURAL SCIENCES
LABORATORY

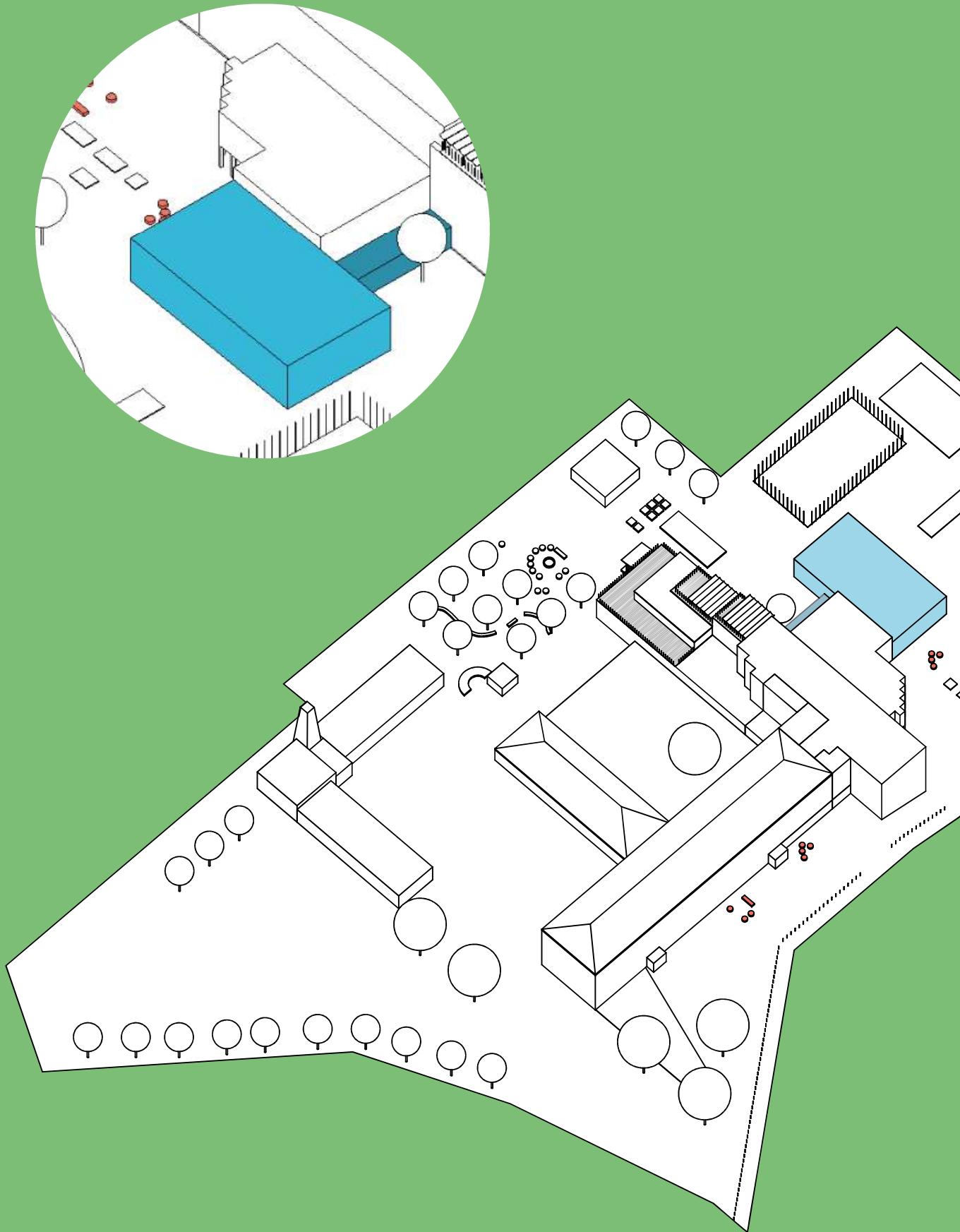


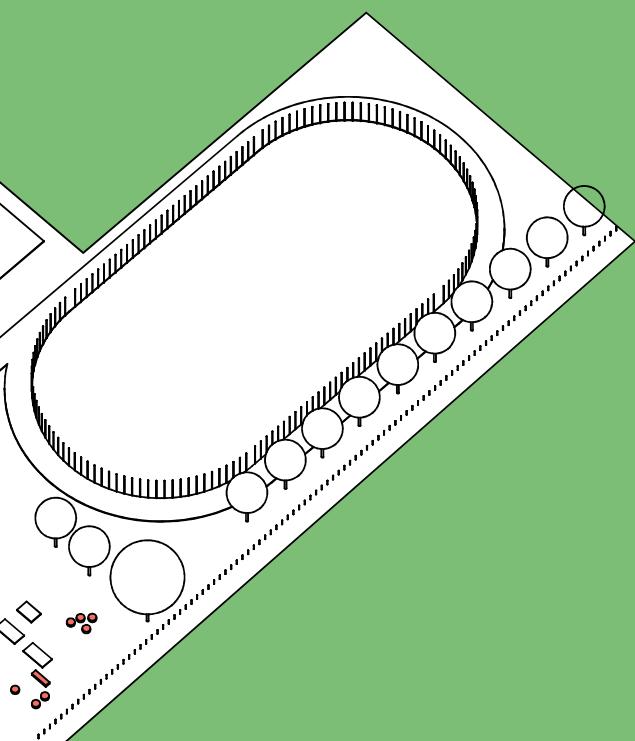


In stage 2, in order to implement the change programs OASIS OF KNOWLEDGE, RESEARCH TEAM, LEARN ON MY OWN, SPACE FOR CALM, COMFORTABLE WORK AND REST FOR STAFF, INTERNAL AND EXTERNAL DIALOGUE, we are renovating the school's classroom building.

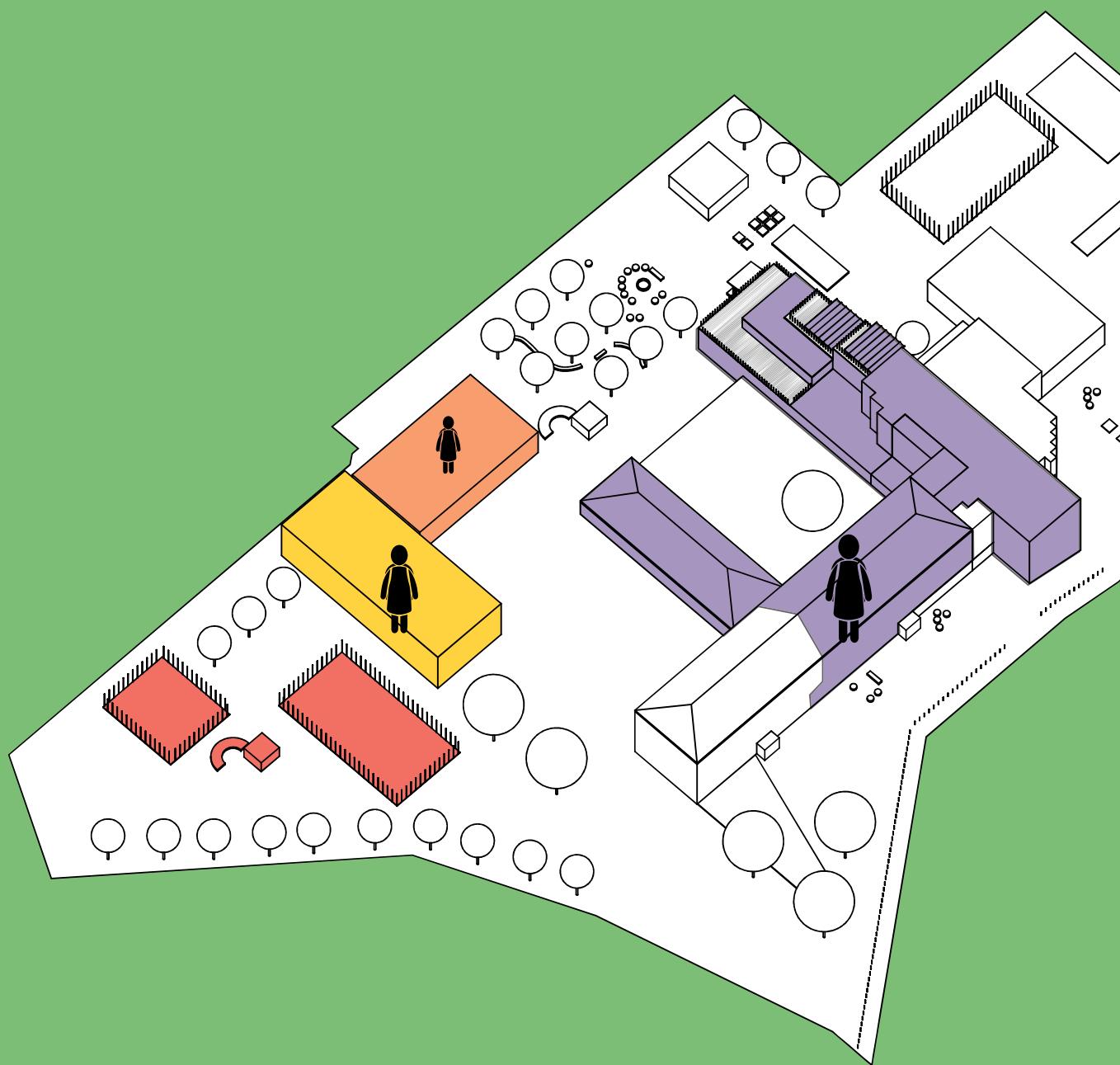
We are installing a new entrance at the junction of the former dormitory and classrooms. On the courtyard side, parallel to the classroom building, we are constructing an extension, on the first floor of which we are installing a vestibule, a canteen, kitchen, and elevator on all floors, new-generation sanitary facilities, quiet rest and independent and small group learning spaces, and individual work and rest spaces for staff. We are installing a natural science laboratory and outdoor classrooms on the roof terraces.

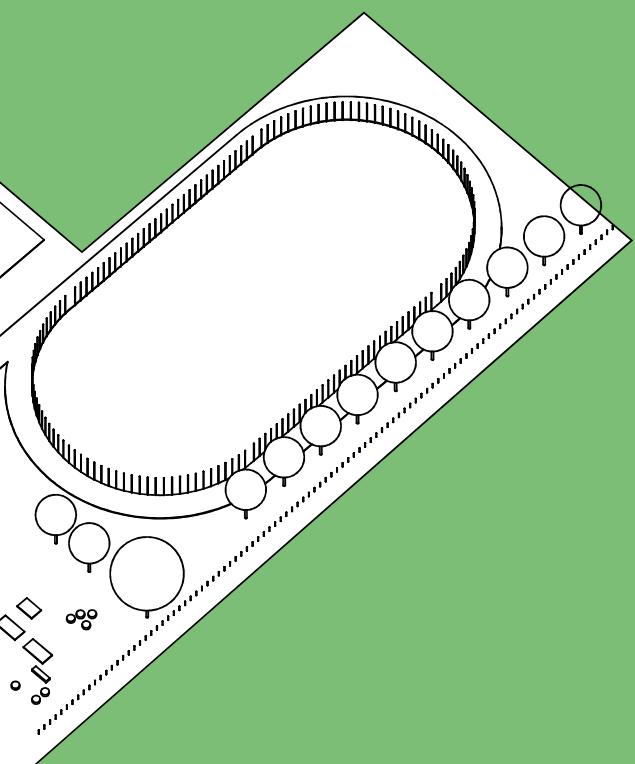
We will install a kindergarten in the cafeteria building and adapt its former premises for primary education. On the first floor of the former dormitory, we will install a communication center with a library, a reading room with individual and group work areas, and adapt the former lobby for small events. At this stage, the different levels are located in their own adapted buildings, with the kindergarten and school connected by the communication center and the different levels of the school connected by the cafeteria. The communication center is located next to the entrance, so it can also be accessed by the local community.





In stage 3, we are focusing on improving the sports and workshop infrastructure. We are building a new sports hall in the south of the school with a full-size basketball court and spectator seating, as well as an extension for additional changing rooms. We are converting the current workshop and boxing club premises into different sports halls – for aerobics, dance, and training equipment. We are setting up workshops in place of the former cloakrooms.





In stage 4, we are launching an architectural competition and building a new school and kindergarten building on the site of the farm buildings in the north. We are adapting their former premises for higher education.

TEAM



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Architecture (PhD)

I teach architecture and landscape architecture students at Vilnius Gediminas Technical University, researching 20th century architectural heritage and educational architecture.



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I teach architecture students at Vilnius Gediminas Technical University, researching architecture for education.



MARGARITA KAUČIKAITĖ
Architecture (BA), Sociology (MA)

Independent architect, project manager for architectural dissemination and education. Interested in creating architecture with non-architects (youth, local residents), sociology of space.



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Architecture (MAarch/MSarch)

I combine research and practice in the creation of physical environments together with communities. I implement non-formal education projects according to the do-it-with-others principle, so that architectural knowledge is accessible to the general public.

The booklet "LET'S UPGRADE THE SCHOOL TOGETHER. Methodological recommendations for preparing and implementing functional and spatial changes in general education schools is part of the project "20th Century Architecture: Holistic Assessment and Sustainable Preservation"



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Vilnius

2025

