LOUVAIN NEW UNIVERSITY TOWN (BELGIUM). TOWARDS THE 21ST CENTURY

Pierre Laconte

Positions on the European City for

the 21st Century

Akademie der Künste, Berlin

5/9-22/11/2020

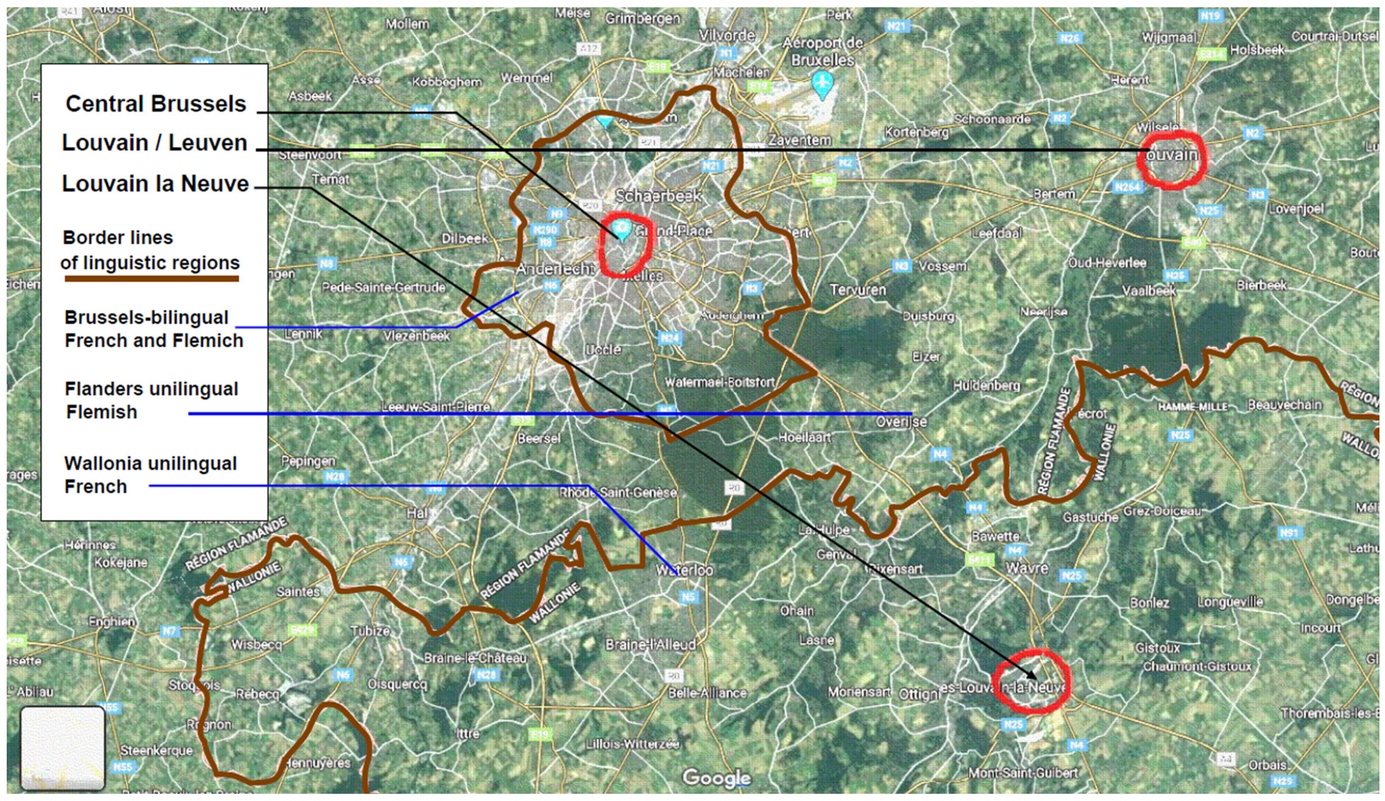
1 LOUVAIN NEW UNIVERSITY TOWN (BELGIUM) TOWARDS THE 21ST

1.

LOCATION IN BELGIUM

As a result of the Belgian institutional evolution, the French-speaking Louvain Catholic University (UCL) was obliged to leave the Flemish-speaking city of Louvain - Leuven in Flemish - see map. It decided to create a completely new university town rather than just a campus. In 1969 it acquired 920 hectares of agricultural and forest land 30 kilometres from central Brussels.

Credit: Google and André Mertens.



2.

THE SITE IN 1969

‘Think nature as well as city’ was the guiding principle of the development plan adopted in 1970. The central 400 ha of the site were to host the new university town.
The 200-ha forest was to be kept as a perpetual reserve, and the rest was mainly to become a research and development park.

Credit: UCLouvain.

3.

THE SITE IN 2019

The 400-ha central area is now largely developed and is embracing green projects for the 21st century. The non-university uses (housing, culture, commerce) are growing faster than the university related ones.
From the beginning the association of inhabitants has had an important participation role.

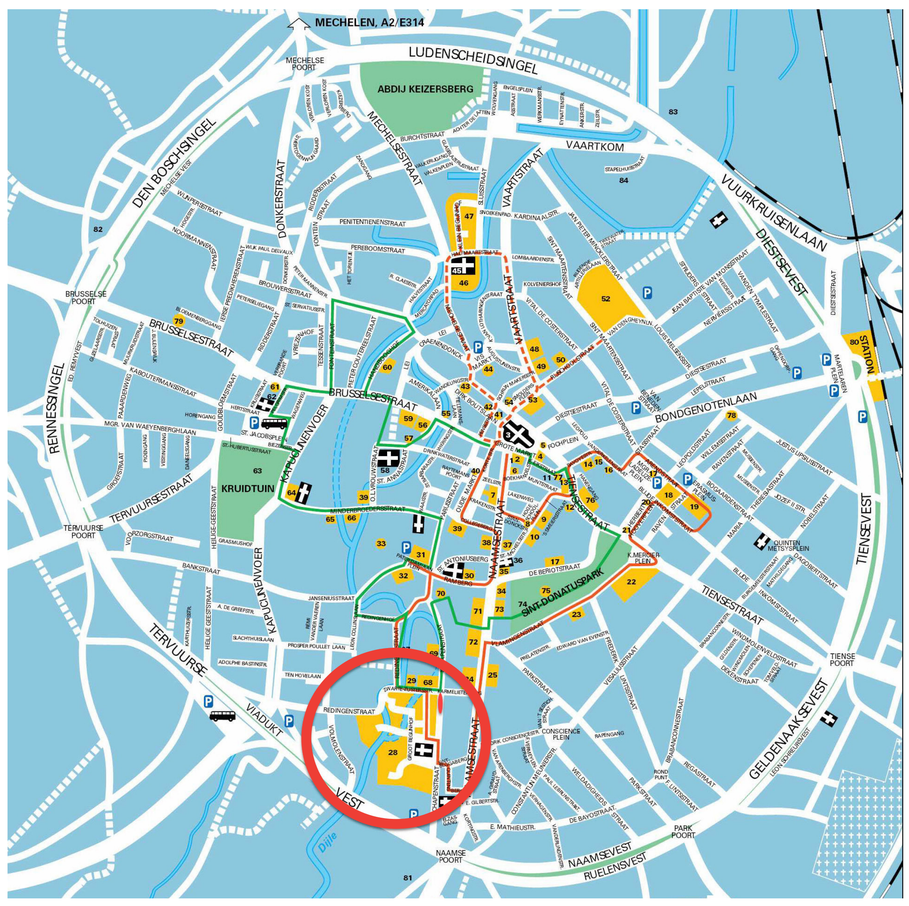
Credit: © Simon Schmitt - www.globalview.be

2 THE HISTORICAL MODEL FOR THE NEW UNIVERSITY TOWN: THE CITY OF LOUVAIN / LEUVEN

The old city was not only the original site of the university but also the inspiration for the new university town.

1.
View of the centre with Town Hall.
Credit: sedmak
iStock by Getty Images.

2.
View of university square and university headquarters from 1425 (former cloth market).
Credit: Flavio Vallenari
iStock by Getty Images.



3.
General plan of Louvain's old university town (ca 400 ha).
Its Beguinage district (see red circle) was restored in the 1960s by Raymond Lemaire and is listed as a World Heritage site.
Credit: city of Leuven.

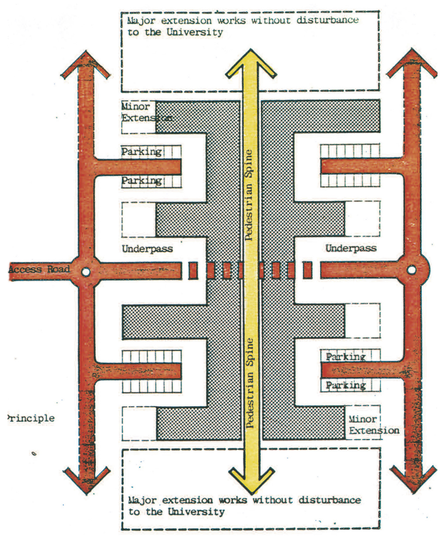
4.
View of the entrance to the Beguinage.
Credit: André Mertens.

5.
Street view in the Beguinage.
Credit: Adobe Stock.

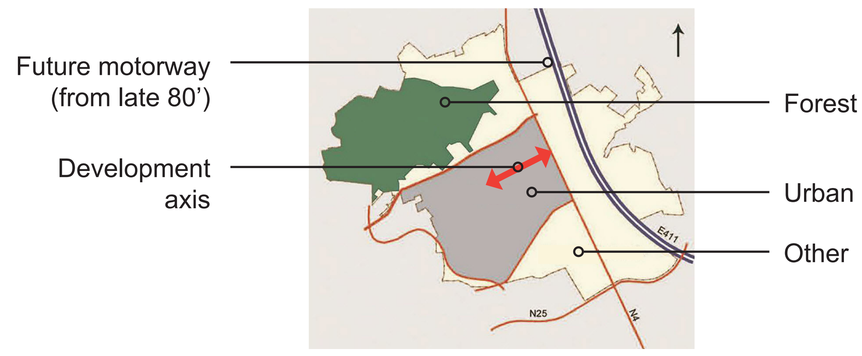
6.
Open space in the Beguinage.
Credit: Pierre Laconte.

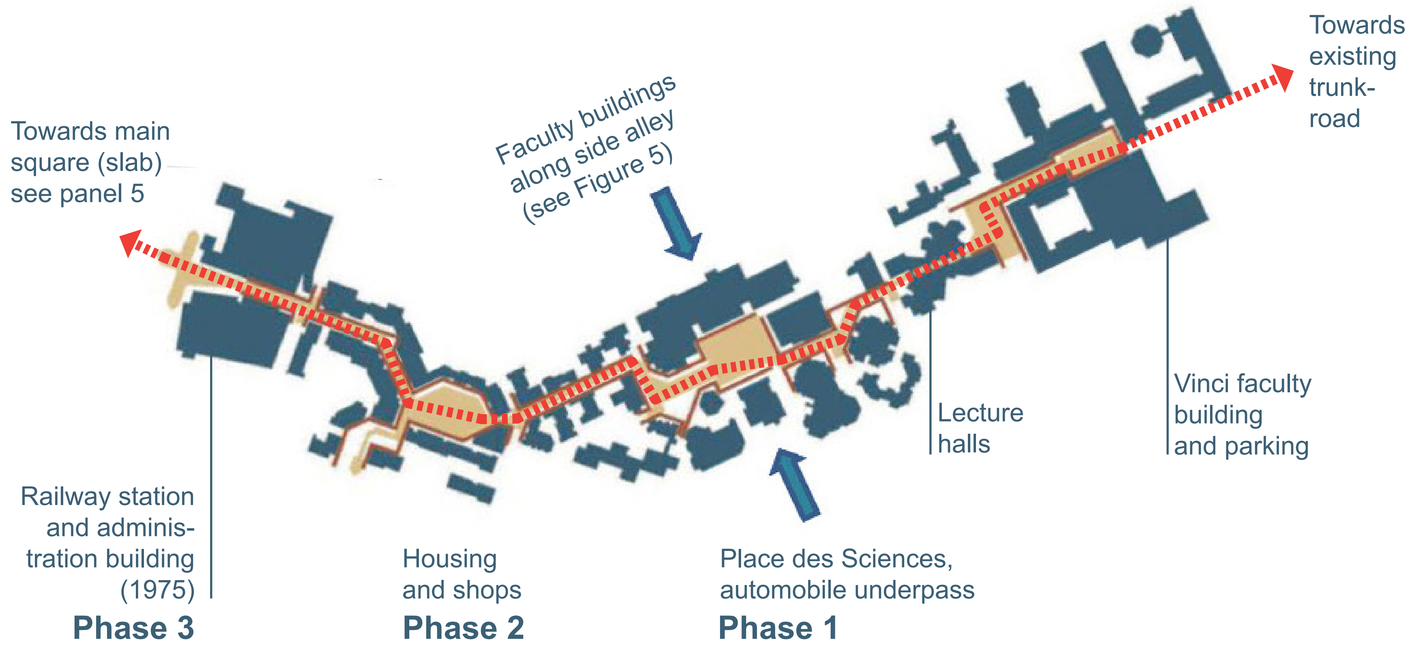
3 THE NEW SITE AND ITS DEVELOPMENT STRATEGY

Because of the uncertain political and financial future, development started from the only pre-existing infrastructure, the Brussels-Luxemburg trunk road (the motorway was to come in the late 1980s). A linear growth scheme was adopted, in the form of a pedestrian axis with automobile access to the buildings through lateral alleys (Figures 1 and 2).



1.
Diagram of site development through a linear growth scheme, inspired by Lancaster university's development plan.
Credit: Gabriel Epstein.





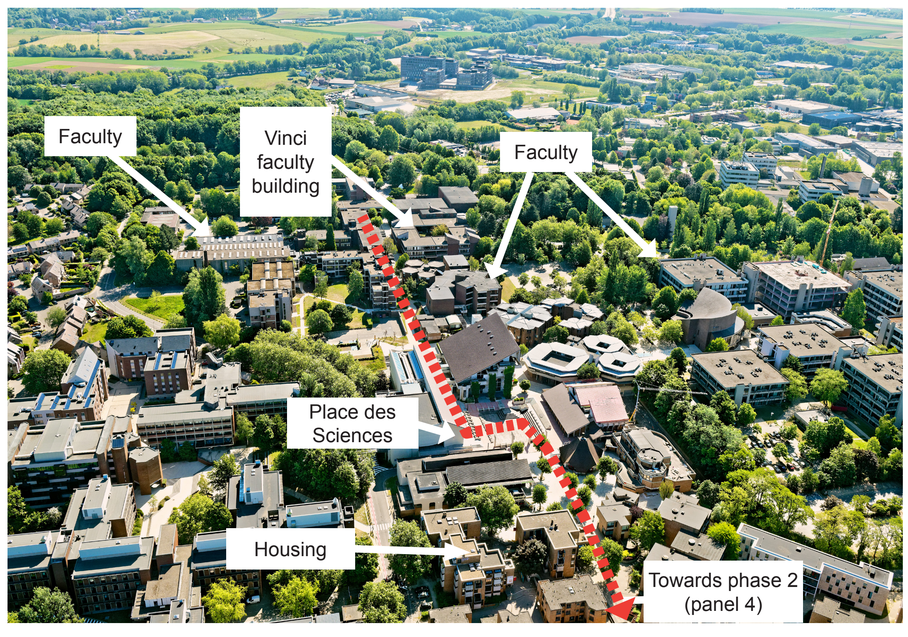
2.
Application of the **linear growth scheme** to the initial part of the pedestrian main street, showing the section starting from the trunk road and leading to the Place des Sciences built above an underpass and parking spaces, and continuing from there towards the station.

3.
Vinci faculty building on the main spine (architect: Gabriel Epstein).
Credit: Pierre Laconte.

Each phase was to be self-contained but potentially linked to the following one. The implementation of this axis is illustrated by the Vinci Architecture / Engineering faculty building, by architect Gabriel Epstein, London (Figure 4), and its car park planted with different types of trees (1972).

4.
Tree-planted car park of Vinci building.
Credit: Pierre Laconte.

5.
General view of the initial development phase.
Credit: Simon Schmitt - www.globalview.be.

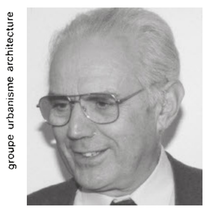


6.

Project owner: UCL. **General administrator:** Michel Woitrin, appointed in 1963.

Planning team: The **"Groupe Urbanisme Architecture"** was appointed by the university in Oct. 1969 (Raymond Lemaire, historian, Jean-Pierre Blondel, architect-planner and Pierre Laconte, jurist and economist). It was entrusted with preparing the development plan for the new town, and its architectural coordination.

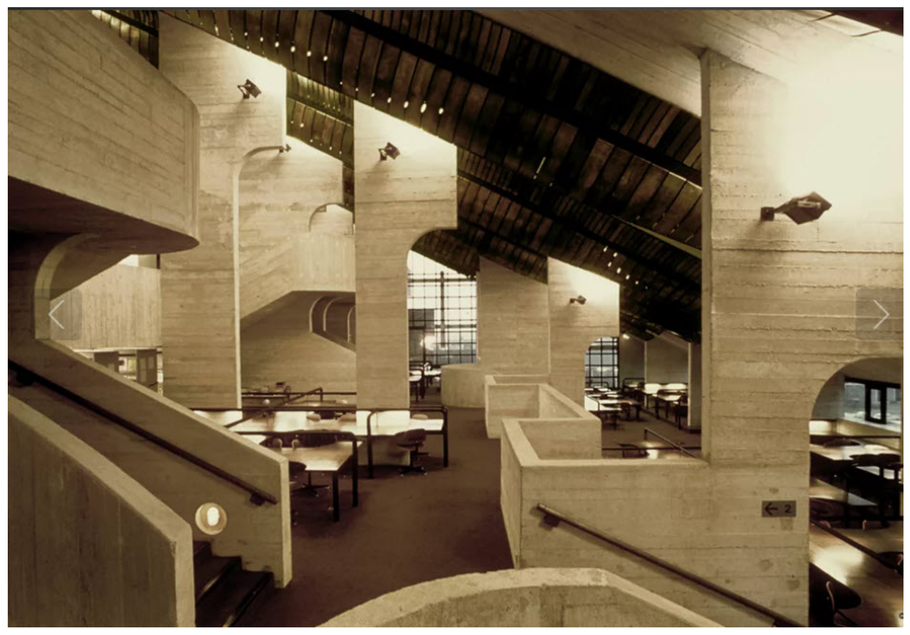
groupe urbanisme architecture



4 THE FIRST MIXED DEVELOPMENT PHASE AROUND PLACE DES SCIENCES AND SCIENCE LIBRARY (1972)

The library is a modernist (“brutalist”) building of exposed concrete, forbidding geometric structures and a predominantly monochrome colour palette, by André Jacqmain (1972). He also designed the wooden plaza, built above the first road underpass.
This first phase was followed by a second phase extending towards Place de l’Université through Place des Wallons (1972-1975).

1.
Place des Sciences and science library building in modernist/ brutalist style (architect: André Jacqmain 1972).
Credit: Koen Raymaeckers.

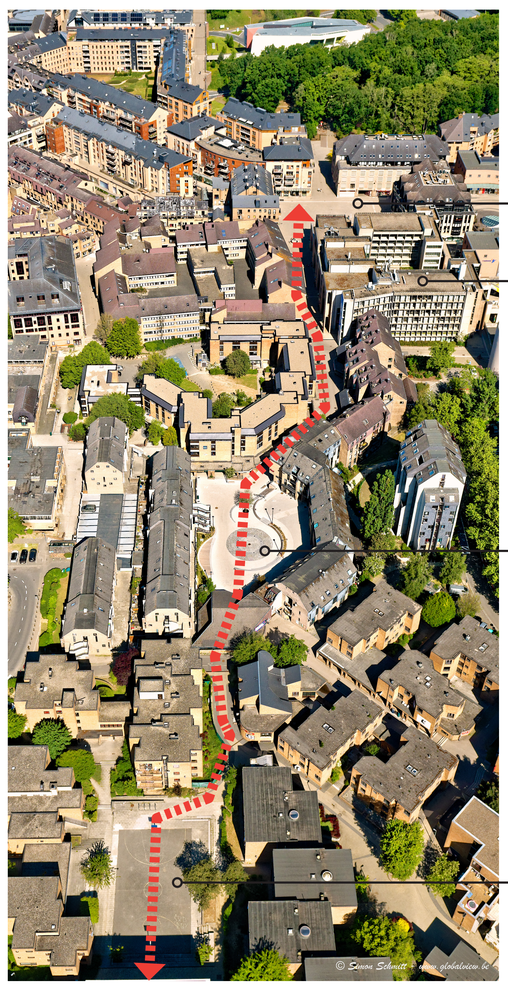


2.
Interior of library. It was to be transformed into an art museum in 2017.
Credit: Atelier d’Architecture de Genval.

3.
View of Place des Sciences and the library from terrace.
Credit: Pierre Laconte.

4.
Former post office.
Credit: EmDee, Wikipedia (fr).

5.
Adjacent to Place des Sciences: Place Galilée planted with trees, in contrast with concrete library architecture.
Credit: Pierre Laconte.

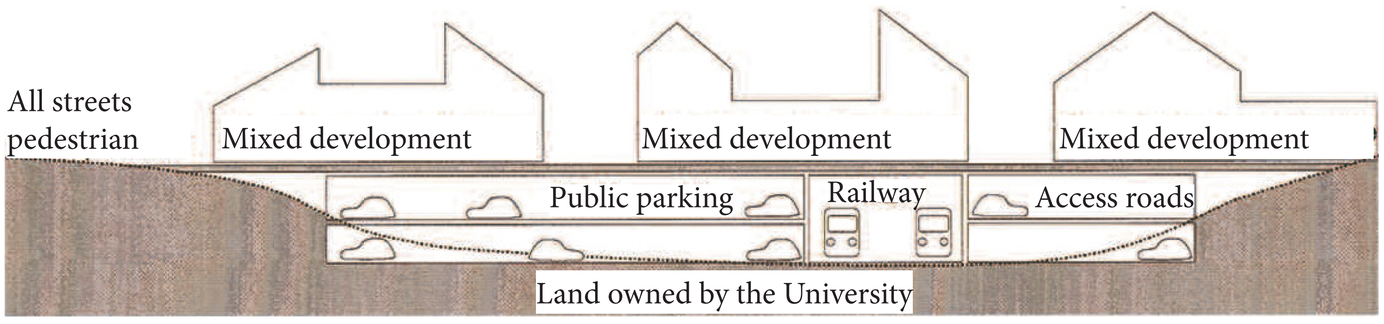


6.
Second phase: from Place des Sciences area to Place des Wallons and Place de l’Université.
Credit: Simon Schmitt www.globalview.be.

5 NEW UNDERGROUND STATION AND PARKING – GROUND LEVEL RESERVED FOR PEDESTRIANS (1975)

The Place de l'Université (Figure 2) and the university administration building (Figure 3) are located above the road access and the two-level parking structure.
The 3-ha covering slab has a mix of functions: university, shops and restaurants, cinemas and theatre. It is recognised as the largest pedestrian street network in Europe.

1. Diagram of the slab. Credit: André Mertens.



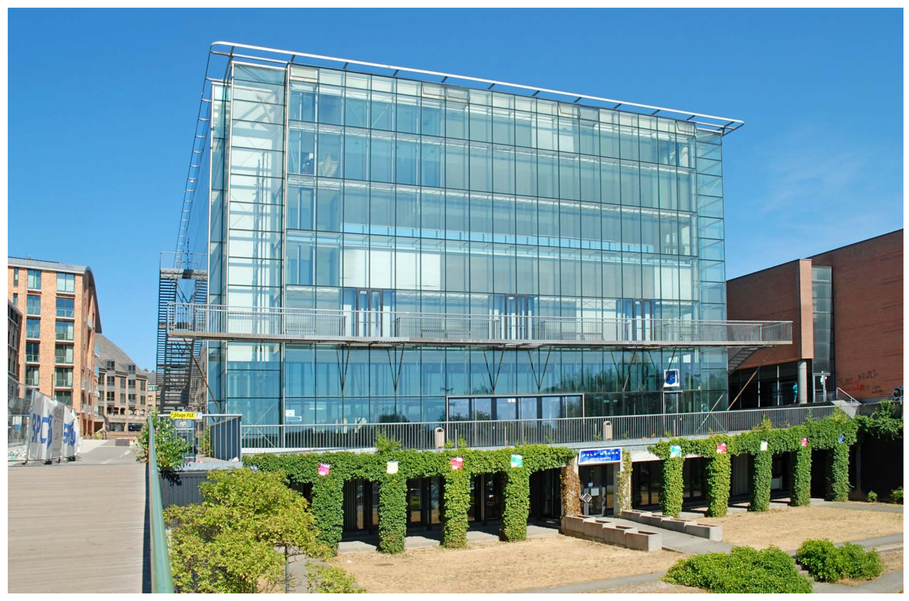
2. University administration above the rail tracks.
Credit: EmDee, Wikipedia (fr).

3. Underground station street level entrance.
Credit: Pierre Laconte.

At the edge of the slab

4. University Aula magna (Architect Samyn and partners 2001) seen from the slab towards the lake.
Credit: Simon Schmitt www.globalviews.be.

The abundance of pedestrian public space allows personal interactions unaffected by traffic noise, while respecting distance between people if needed for sanitary reasons.



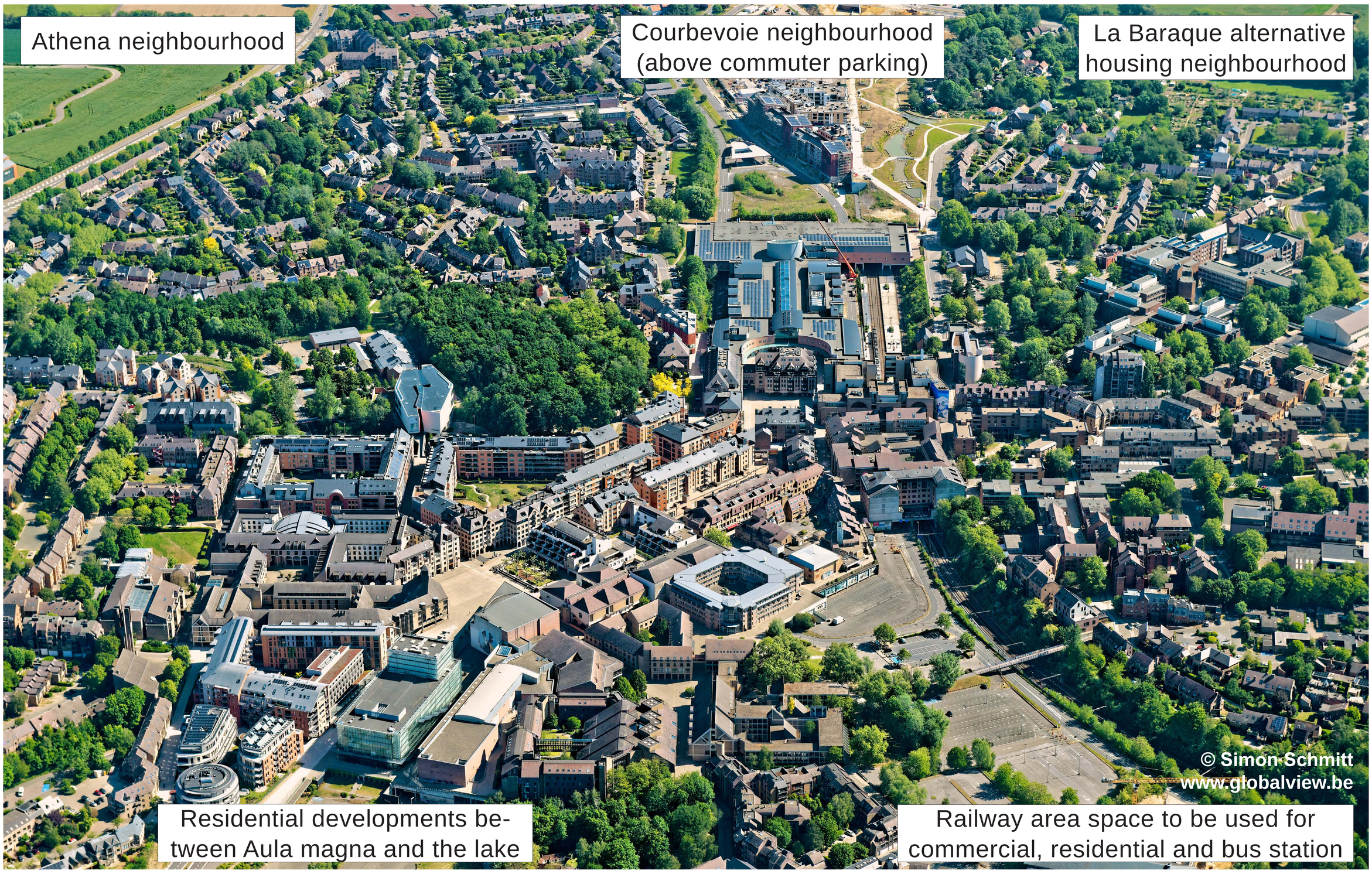
5. University Aula magna view towards the centre of the slab.
Credit: EmDee, Wikipedia (fr).

6. Hergé Museum 1992 (Architect Christian de Portzamparc) view towards the slab and the lake.
Credit: Simon Schmitt www.globalviews.be.

7. Hergé Museum view from the Station.
Credit: Pierre Laconte.

6 21ST CENTURY DEVELOPMENTS ON THE CENTRAL SLAB AND ITS EXTENSIONS

The railway station has been designated by Belgian Railways as the terminus of Brussels' future S-Bahn line 9, due to open in 2025.



View focusing on shopping mall L'Esplanade to be enlarged and rail track potentially to be covered

Credit: Simon Schmitt www.globalview.be.

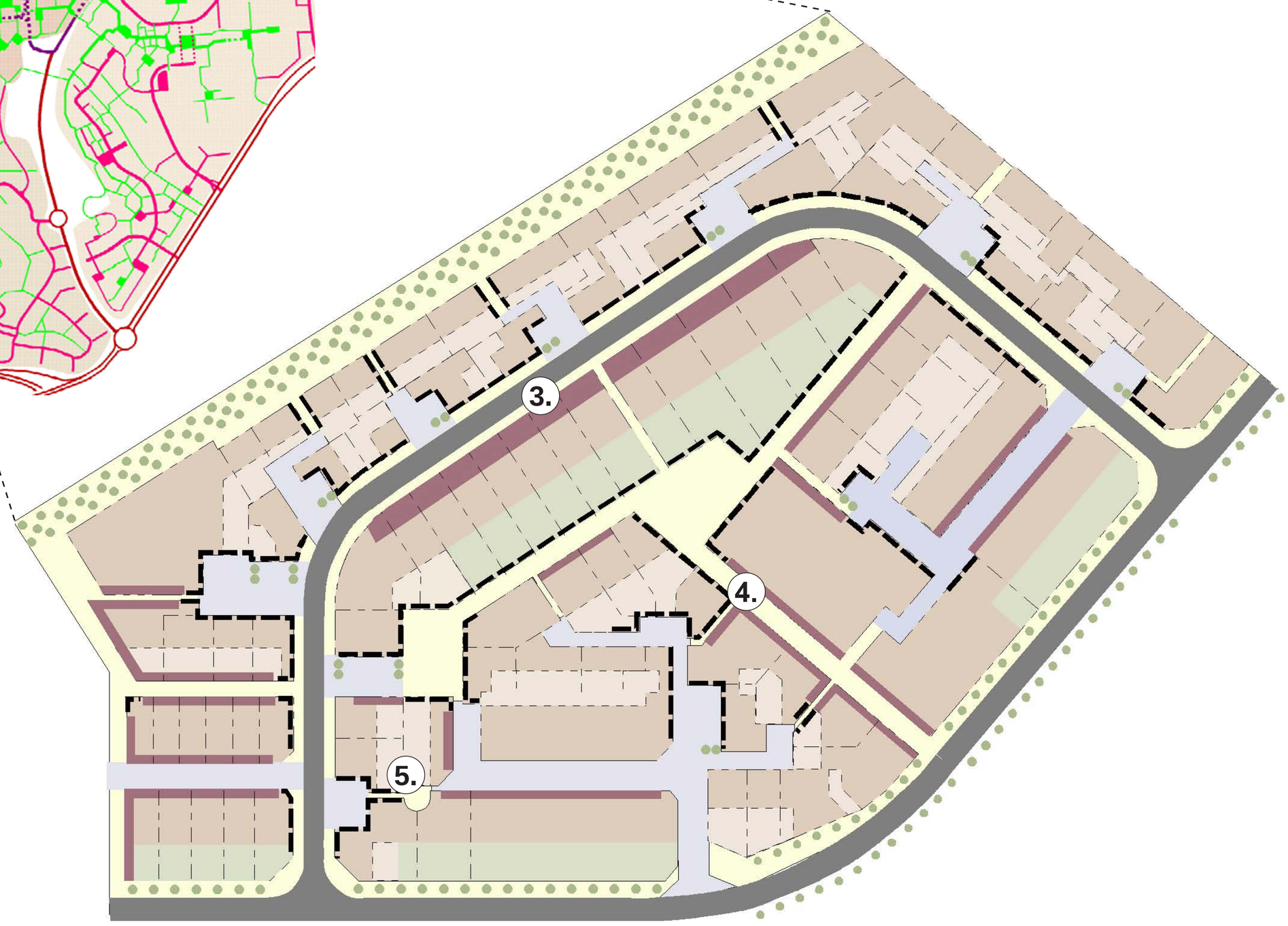
The university, which owns the air rights, is developing low rise apartment buildings and gardens on top of the future commuter parking, in several phases – see first phase of the Courbevoie quarter and gardens related to this extension and, by contrast, extending the adjacent self-built "alternative" quarter of "La Baraque".

7 RESIDENTIAL DEVELOPMENT IN THE FORM OF MANY SMALL NEIGHBOURHOODS MADE OF 100-200 M2 PLOTS

These plots are accessible by car but pedestrian oriented.
Example: the Hocaille neighbourhood.

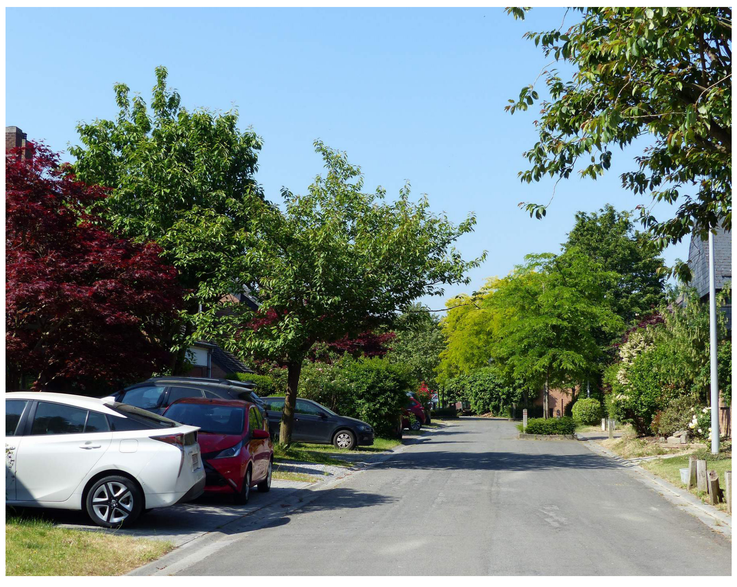
1.
General map of neighbourhoods.
Credit: André Mertens.

road
access road to housing
pedestrian path
standard housing plot
small housing plot
zone for private gardens
zone separating road from housing
border of enclose space
limits of plots



2.
Detailed map of Hocaille neighbourhood, accessible by car but pedestrian oriented.
Credit: André Mertens.

3.
View of Hocaille road.
Credit: André Mertens.



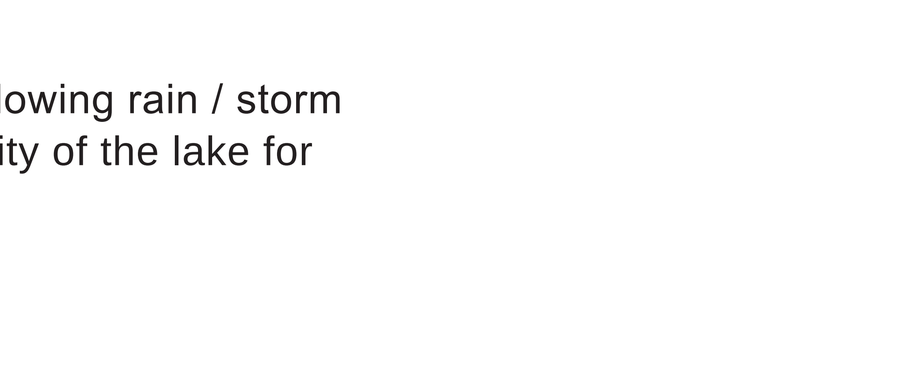
4.
View of access road to housing.
Credit: André Mertens.

5.
View of pedestrian path.
Credit: André Mertens.

8 SPECIFIC WATER / ENVIRONMENTAL MANAGEMENT INCLUDING SEPARATE WATER SYSTEM AND CREATION OF THE LAKE

The panel shows views of the lake (Ill. 1), the water management system (Ill. 3) and water access to the lake.

1.
View of the reservoir treated as a lake with variable water level and residential development on the slopes surrounding it.
Credit: Simon Schmitt - www.globalview.be.



2.
Rain/storm water is piped into the reservoir. It preserves water resources on the site and attracts residential development. The diagram shows the separation of the water flows.
Credit: Architecture et Climat, LOCI UCLouvain 2019.

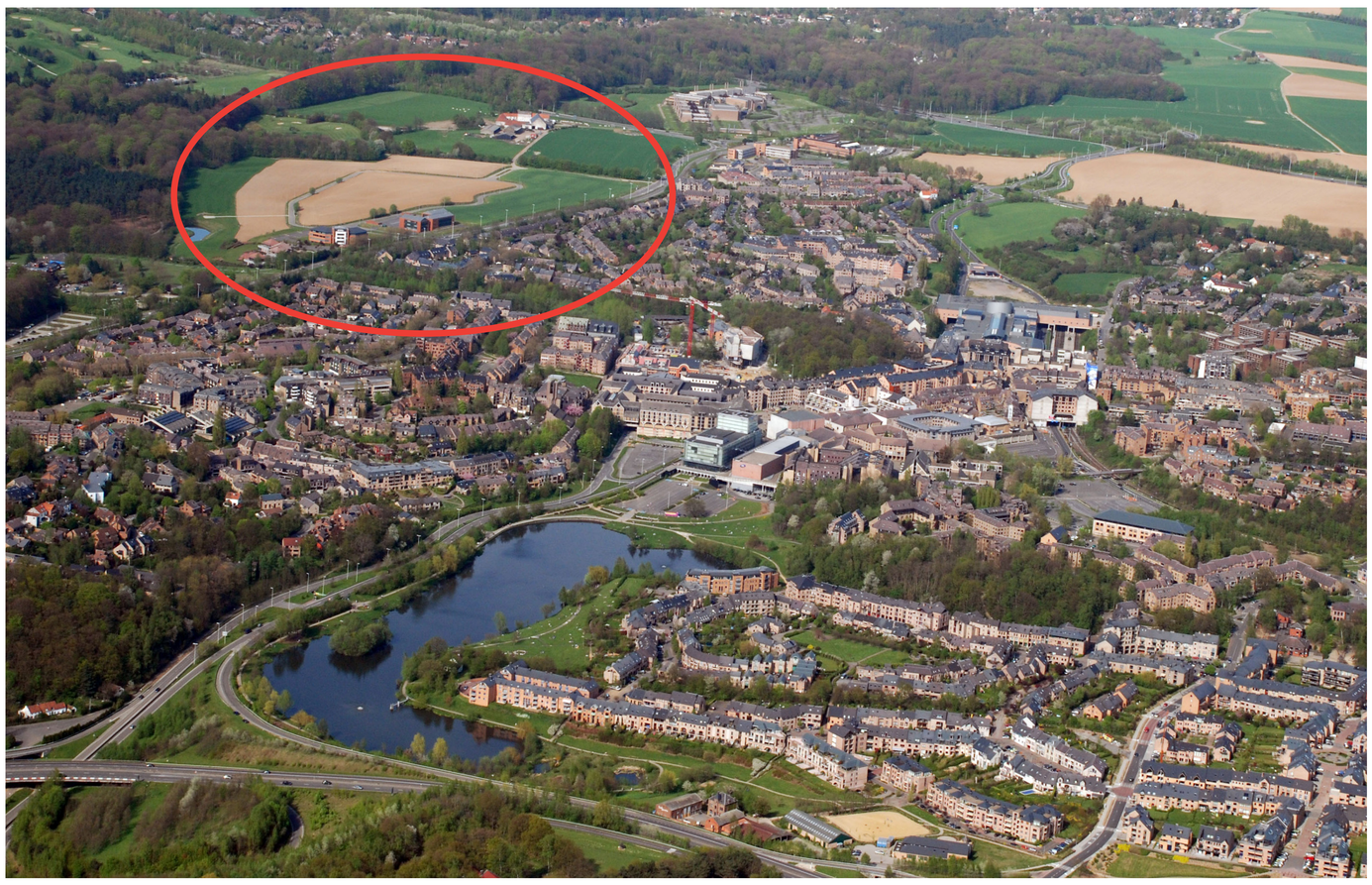
3.
Pre-monitoring of the inflowing rain / storm water to ensure the quality of the lake for fishing.
Credit: Pierre Laconte.

9

21ST CENTURY DEVELOPMENTS: THE NEW ATHENA NEIGHBOURHOOD

The panel shows its continuity with the existing urban area (see general map and aerial view), and a view of the existing farm which is to be dedicated to “urban farming”. In the background is the Monnet science building (see panel 11).

1.
Map of 400 ha and **pedestrian axis that crosses the entire new town** and Athena new neighbourhood. The Research & Development area is located east of the trunk road.
Credit: Jean Remy.



2.
Aerial view of the same area.
Credit: Simon Schmitt - www.globalview.be.

3.
Aerial view of the Athena neighbourhood and urban farming area.
Credit: Simon Schmitt - www.globalview.be.

4.
View of Ferme de Lauzelle towards Monnet centre (R&D park).
Credit: Simon Schmitt - www.globalview.be.

10 A LAND POLICY FOR THE 21ST CENTURY

Urban development through renewable long term leases of building land and community land trusts.

1. LONG TERM LEASES OF BUILDING LAND

As a consequence of having to leave its original of site in Louvain, the university received a subsidy to buy some 900 ha of farmland on which to build a new campus. But this campus was to be limited to university-related buildings. Therefore the university could not sell land for non-university purposes such as housing or services.

It overcame this obstacle by developing the new university town exclusively through long term land leases (Emphyteusis / Erbpacht).

Such a lease allows its buyer to construct buildings, but they must revert to the landowner after a maximum of 99 years.

To circumvent this restriction, **the university planners devised a system by which the owner of the lease has the right, in the event of its sale, to allow the buyer to acquire a new lease.**

This makes it in effect perpetual. But the university, as landowner, remains in a position to impose uses in conformity with its development plan, throughout the succession of lease sales. It therefore retains **the long-term responsibility for urban planning.**

This system has proven successful as the yearly cost of leasing a plot of land is only a fraction of the amount payable for full ownership of a site.

This system has generated much interest within the development professions. The Brussels regional government for example now uses it for its own affordable housing programmes.

2. A LONG-TERM POLICY TO ENCOURAGE AFFORDABLE HOUSING: COMMUNITY LAND TRUSTS

In addition to selling individual leases, the university as sole landowner intends to sell housing rights to groups of applicants for housing. Plans are being drawn for an implementation from 2024.

Groups of people wishing to form a community of inhabitants, usually with shared services, can buy housing at a subsidized price. The allocation of these subsidised homes is based on income-related criteria.

The head leases have a duration of 50 years, but the owners of the houses can sell them at any time. In this case they have the right to allow the buyers to replace the initial deeds with new leases for 50 years. This effectively makes them perpetual.

The management of the houseowners' community is vested in a trust whose shareholders are the residents, but neighbouring associations and other institutions can be represented on the management board.

To prevent speculation, **if this affordable housing is sold, the owners receive only a quarter of the increased value of their dwelling.** The other three quarters of the increase in value is returned to the landowner for it to fund new Community Land Trusts and thus increase the total number of beneficiaries without requiring extra subsidies.

In 2012 the Brussels region successfully initiated its first Community Land Trust and association in a deprived neighbourhood, and so enhanced solidarity among the residents.

A Community Land Trust system is considered by Bezirk Friedrieschhein-Kreuzberg Berlin (2019).

11 21ST CENTURY RESEARCH & DEVELOPMENT PARK

230 ha of the university domain are reserved for science-related firms, or for services to such firms. These firms are often start-ups generated by university research and employing former students. Their lay-out is of lower density in order to accommodate temporary uses linked to experimental manufacturing projects (fab-labs). This R&D Park is presently in full international development (Figures 3 to 5), presently 260 firms.

1.
Overall view.
Credit: © Simon Schmitt
www.globalview.be.

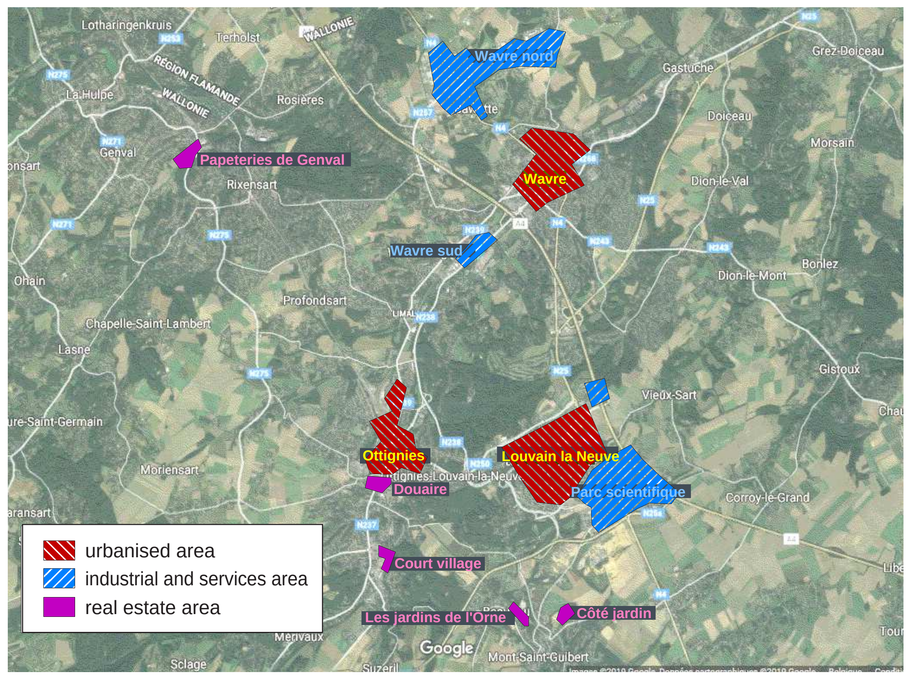
2.
Monnet complex
(rental labs).
Credit: Simon Schmitt
www.globalview.be.

3.
China Belgium Technology Center
(due to start operations in 2021).
Credit: Simon Schmitt
www.globalview.be.

4.
Clariant plastics
R & D building.
Credit: UCLouvain.

5.
New Tech Business Center.
Credit: UCLouvain.

6.
Map showing neighbouring municipality of Wavre and its industry parks hosting non university related firms.
Credit: Google and André Mertens.



SCAN ME

Further reading
Pierre Laconte and Jean Remy, Louvain-la-Neuve à la croisée des chemins, Louvain-la-Neuve: Academia L'Harmattan, 295 p., 2020. More on www.ffue.org

12 AN ARTIST'S PERCEPTION OF THE SUSTAINABLE CITY

Three posters by Hundertwasser illustrate the perception of a sustainable city by an artist: its compactness, its emphasis on public transport and its concern for citizens' quality of life what have been attempted by the Louvain-la-Neuve planners.

1. The first poster, "Use public transport Save the City", illustrates the planning vision of a sustainable city.

2. The second one illustrates the planning vision of urban transport corridors served by public transport.

3. The third one "Enjoy your city Use public transport" aims at promoting mobility for all.

Source:
These three posters were specially made for the International Public Transport Association (UITP).
Credits: archiv.office@harel.at