

Taking safety into account in urban development: challenges and methodology

Safety, an urban development challenge

The relationship between space and safety

When those involved in urban development are asked to name the types of safety problems they meet, they mention problems of management, functionality and use of space. They also speak of users' image-related problems, of their feeling of insecurity, and of a climate of tension or discomfort. Urban dysfunctions and questions relating to the atmosphere of urban life therefore have to be addressed alongside crime and fear of crime. At the same time, when analysing a given territory, we become aware of the link that exists between its distinguishing features and the insecurity that exists there. The problems are thus different in a large housing development, an area of green space or in a ribbon development along a secondary road on the outskirts of a town or city. Finally, it is evident that safety issues, whether imaginary or real, influence people's life styles and the dynamics of urban development. For example, safety concerns affect people's choice of place of residence or the attractiveness of industrial and business areas.

Providing "urban planning" responses to the need for safety

Safety represents a real urban planning challenge. Firstly, in matters relating to safety, urban development can offer more than just technical or technological measures to protect spaces or buildings, even if in certain situations such measures are indeed necessary. Secondly, urban and architectural forms designed exclusively to achieve maximum safety are likely to result in spaces being closed off and in the development of inward-looking communities and secured communities made up only of people



© IAURIF

with the same social profile. Such developments exacerbate the discontinuity of urban spaces and increase the risks of urban segregation and social division.

Consideration ought therefore to be given to the production of spaces that are both safe and "of good urban quality", providing high quality urban life and meeting the need for safety.

An analysis of urban projects and developments shows that taking safety into account in urban development often boils down to designing spaces in which users feel at ease and which are functional and easy to manage. In short, urban planning and design with safety in mind mean firstly improving the living environment and the atmosphere of urban life, because the spaces themselves turn out to be factors of safety or, conversely, insecurity.

This approach, focused on urban planning and design, is not exclusive. It forms part of an integrated approach to the "joint production of safety", combining the fields of policing, justice, employment, social services and education.



© C. Lardier-Malguyres / IAURIF

How can urban development meet the population's demand for safety and what solutions can be offered to urban development professionals faced with problems of insecurity?

What alternative ways are there of improving safety to methods that threaten the continuity of the urban fabric and how can one go beyond a purely technical vision of this geared solely to protecting public spaces? In other words, how can we reconcile urban quality with safety and security?

After analysing foreign and French experiences, IAURIF here sets out some topics for discussion and presents a methodology aimed at encouraging and helping those involved in urban development to consider safety as being part of their work.

Taking safety into account
in urban development:
challenges and methodology

Spatial design: a factor of safety

**What really matters: the
functionality and usefulness of
spaces**

Case studies and analysis of professional practices show that spatial design can influence four factors, in particular, which enhance safety and the sense of safety.

The “legibility” of spaces

The clear designation and structuring of the uses of space seem to be key determinants of safety in the eyes of urban developers, designers and managers. An expression often used is “spatial legibility”. Although difficult to define precisely, at the very least it is taken to mean consistency between the status of a given space (public or private ownership), its function (public space, residential), the uses to which it is put and the way it is managed. In any event, the physical management of the interface between two types of space, whether it be marked out, natural or symbolic, appears a minimum prerequisite for such “legibility”.



© D. Lacombe / IAURIF



© C. Loudier-Malgouyres / IAURIF

Spatial management

Spaces can be developed to facilitate their management. The aim is to foster the presence of spatial management players, thereby making for better surveillance and maintenance, to improve coordination and follow up, and to take concrete measures, such as informing people about by-laws and regulations.

Such actions improve the functioning of spaces and show that they are being looked after. They thus minimise the risk of greater safety problems, help to deter delinquents and reduce users’ feeling of insecurity.

Uses and activities

Space may be developed in such a way as to generate uses that contribute to safety: informal or natural (“eyes on the street”) surveillance; a sense of involvement in the «community»; the existence of a range of activities and mixed uses to encourage social interaction and social inclusion; making users feel they are active stakeholders by enhancing their sense of spatial ownership and involvement in the proper functioning of their space; finally, enhancing users’ sense of responsibility or respect for the space they are “using”.

The partnership dimension of urban projects

Those involved in urban projects and those in charge of safety are compelled to enter into a dialogue, since spatial design can contribute to action taken to prevent or deal with insecurity.

It is known that the configuration of space may facilitate or, conversely, hamper, police surveillance and intervention. It is also known that urban development projects may support the action taken to prevent delinquency, either directly by the provision of social and educational services, for example, or more indirectly by helping to achieve more balanced social and territorial development, notably in order to reduce areas of social exclusion.



© C. Loudier-Malgouyres / IAURIF

Safety and the quality of urban life

These four factors – the partnership dimension of urban projects and the “legibility”, management and uses of space – enable a less technical and more holistic or integrated approach to be adopted for spatial design to contribute to the enhancement of safety. This steers us clear of unproven ideas about crime-breeding urban planning or architecture that “incriminate” the urban shapes and forms that affect urban development processes. Ultimately, it is not so much urban and architectural forms that matter, but their impact on the functioning and use of space.

By focusing on the management and operating methods of all interested parties (including those in charge of safety and security), on the uses and activities, and on urban design to enhance the “legibility” of space, taking safety into account in urban development can be seen as governed by a different logic, namely the production of high quality urban life.

Taking safety into account
in urban development:
challenges and methodology

The “legibility” of spaces

Between public and private space, the limit must be clearly or symbolically marked.



The spaces clearly stand out and lead to appropriate uses.



Spatial management

Designing spaces to facilitate their management : Enhancing accessibility and the presence of space managers for surveillance, maintenance and improved service delivery.



Uses of spaces

Generating substantial footfall and activity.



Encouraging people to become users: ownership of space.



Method: How can the safety issue be incorporated into urban planning?

Reasoning by Q&A

Identifying the safety factors does not necessarily provide the specific solutions that need to be implemented.

The question is: how can spatial development make users feel more responsible for the spaces they use, so that maintenance is made easier and the police can do their surveillance work there? North American and British theories, in particular, have led to the production of guides and manuals setting out the urban development and planning guidelines that most enhance safety. However, French urban planners and developers appear more reluctant to follow a list of principles: even though they are general, they seem to constrain urban planning and risk resulting in urban forms that are too systematic and focused on safety enhancement.

For these reasons, IAURIF prefers a Question & Answer ("Q&A") method, which, with the help of a grid built around the factors identified above, makes it possible to check whether existing spaces meet the required spatial development principles or enable planners and developers to imagine how urban planning may meet them.

Urban development principles or guidelines will follow from the answers to these questions and the urban development angle will thus be specific to each project and each case.

Helping to fight against crime

Allow security forces easy access to the spaces whatever their means of transport.



© C. Loudier-Malgouyres / IAURIF



© C. Loudier-Malgouyres / IAURIF

The underlying logic of the Question & Answer (Q&A) grid

It is up to each urban project manager to construct the various questions to suit his or her particular circumstances. The grid functions as a whole, but some of its questions will be inappropriate. It is a question of examining the project or site under consideration in terms of the four factors identified as safety enhancing.

- Spatial management: upkeep and maintenance, formal surveillance, monitoring and regulation.

In order to assess whether the space in question satisfies these concepts, it may be useful to see whether its configuration makes the space difficult to manage, due to its special architecture or its complex division into numerous spatial units requiring a large number of managers.

- Uses and activities: natural surveillance, frequency of use, sense of ownership, sense of responsibility.

Questions need to identify whether the space is actively used or not, whether the space is isolated or not, to see what impact these factors have on them (degree of deterioration, sense of insecurity, etc) and to explore the possibility of linking them physically or visually to public spaces in order to improve the scope for natural surveillance.

- The "legibility" of spaces: defined in its simplest form as the degree of consistency between the status, function, uses and management of spaces, which therefore requires clear allocation and hierarchy of space.

Among the issues that have to be addressed are: public road networks as a structuring factor, the demarcation between different types of space, the network of public spaces as a means of hierarchy, etc.

- The usefulness of the project to any action taken to prevent and fight insecurity.

Does the space or urban project facilitate the surveillance and intervention of those charged with maintaining law and order? For example, are the spaces accessible and visible to patrols? Does their configuration lend itself to community policing? Does the space or project support the measures taken to prevent delinquency? If need be, are there any facilities for the provision of social, educational and leisure services to the population? On a wider scale, does the treatment of the fringes of the area in question facilitate its integration into the environment or, conversely, does it break the existing pattern and create a separation? Etc.

Taking safety into account
in urban development:
challenges and methodology

Over the life of the project and with all of the parties concerned

The content of urban projects must contribute to the aim of enhancing safety. This calls for a special approach, based on two objectives:

- to organise a dialogue between those responsible for the urban development project and all those involved in safety and security enhancement;
- to guide the project owner (contracting authority) through a series of questions and answers that will enable it to focus the project's underlying urban development principles on concepts conducive to safety enhancement.

Above all, the approach must be flexible. There are no ready-made answers, just guidelines to be decided according to changing circumstances.

The institutionalisation of the relationship between urban development and safety

Since the 1990s, institutional projects, partly inspired by Anglo-US experience, have been emerging in France that feature the growing integration of safety issues into urban development processes, the most noteworthy examples of which are:

- Article 11 of the 1995 Public Safety Act (LOPS), which stipulates that public safety surveys should be carried out in advance of certain urban development projects, although this Act's implementing decree has yet to appear;
- Work currently being carried out by the European Committee for Standardisation on the *prevention of crime by urban planning and design*;
- The Peyrat Report published in 2001 for the Ministry of Housing on the subject of social housing safety, which recommends as an objective *the production ... of spaces that are manageable and defensible... i.e. preventing the construction of buildings that cause anxiety, preventing over-protection of land, and preventing excessive urban density and badly lit spaces.*

A framework and a strong controlling hand

In order to influence the urban project, create new habits, bring together parties from different fields and so on, the management of the project requires a legitimate and organised decision-making framework.

Steering and setting up a project is the responsibility of the project owner. The political will of local councillors, financial incentives or institutional frameworks (see box) provide possible levers or anchorage points.

The task is to ensure that security enhancement is taken into account over the whole life of the project and to get all the persons concerned involved in it: project stakeholders, managers of the spaces concerned, those responsible for safety (from law enforcement authorities to prevention bodies), etc.

Contractual and partnership tools, such as development charters, agreements etc, are to be preferred in order to put the approach on a formal footing.

Project contract specifications, master plans and working or resource guide are the technical documents that subsequently make it possible to organise and direct the action to be taken.

From project diagnosis to project monitoring

In terms of processes, safety must be taken into account at all stages of an urban development project. In addition, it benefits from being taken into account from the very inception of the project, in order to become part of it and not just an additional appendage.

At the project tender phase:

The safety enhancement objective can be mentioned in tenders and market research studies etc. It can be entrusted to a specialist or consultant within the project team.

At the preliminary study phase:

The diagnosis should highlight the link between the distinguishing spatial and urban features of the project location, the actual or potential safety problems and the existing dynamics, i.e. the operators, mechanisms and tools involved in the project and its territory. The four Q&A matrix factors thus provide a framework for spatial analysis.

This crosscutting and shared analysis involves a number of players (the police, local operators, residents, local authorities, etc.) and various sources of information. The lead role is therefore crucial for legitimising this collection of information and for organising it according to definitions shared by all the players involved.

Finally, the diagnosis must be updated throughout the project and at its later stages, since delinquency, safety problems and the sense of insecurity change over time and as circumstances evolve.

At the programming and design stages:

The results of the diagnosis will be used to draw up various strategies, namely, design strategies – focusing on the «legibility» of the spaces, their management and uses – and partnership strategies drawn up with the help of a Q&A matrix. These strategies will provide guidelines for making the urban development choices on which the project will be based and will therefore be specific to each project.

At the programming stage, they will enable the risks or benefits of the activities being scheduled to be assessed. At the spatial design stage, they will generate urban development guidelines. It will be up to the steering body to settle and manage any inconsistencies between these various guidelines themselves and between them and other parts of the project.

Taking safety into account
in urban development:
challenges and methodology

At the monitoring stage:

Management of spaces should be organised before delivery of the project. This means that the responsibilities the management work implies must be defined or identified, as well as the tools to be used (management team, local management agreements between all the parties involved) and the funding. This phase also enables urban planners and developers to react to changes in the situation and to ensure the sustainability of the project.

Review procedure

Safety may also be taken into account at the project approval stage, before planning permission is granted. Once the project has been initiated, the urban development decisions on which it is based must be assessed in order to determine its vulnerability or degree of exposure to safety problems. The question and answer (Q&A) method provides a tool for assessing this, as well as for consulting those involved in preventing and fighting against insecurity. The conclusions result either in the project actually being approved or a decision to review the project and some of its components, although in this case it will be necessary to consider to what extent this is possible given the progress of the project.

For further information:

Loudier-Malgouyres, Céline. Aménagement et sécurité. Observations sur quatre expériences, IAURIF, février 2004.

Loudier-Malgouyres, Céline. Aménagement et sécurité. Enjeux et éléments de méthode à l'usage des acteurs de l'aménagement, IAURIF, novembre 2004.

The applicability of this approach

- These approaches are clearly applicable to urban regeneration schemes, by virtue of their own specific challenges: urban regeneration projects, urban management at community level, etc.
- Public Safety schemes, including local safety and prevention of delinquency councils, provide worthwhile opportunities to foster the networking of all parties that have an interest in safety and urban development.
- Institutional laws and regulations, such as Art. 11 of the Public Safety Act of 1995 or the draft European standard, if it is adopted, offer considerable scope for

legitimising the type of approach presented in this paper.

• Finally, these approaches, by virtue of their objectives, may well be incorporated into urban planning documents and instruments, such as local land use plans and territorial development master plans. They seem particularly applicable to urban and sustainable development projects, since taking safety into account in urban development has less to do with laying down rules for the construction industry than with setting urban development goals to meet a challenge that is itself primarily urban, namely safety.

Urban projects

Various urban projects in France take safety into account in their development planning. The Val d'Europe project, Lyon city council policy and a number of major housing estate restructuring projects have already become benchmarks in this field. Today, more and more urban development professionals are incorporating safety into their working practices: for example, the Seine-Arche project, led by the Seine-Arche Urban Development Corporation, the Val Fourré urban regeneration project in Mantes-en-Yvelines etc. These projects were analysed, in particular, for the 4th edition of the symposium of the Club ville aménagement [Urban Development Club] in November 2004.

The Val d'Europe project in Marne-la-Vallée near Paris included a charter to adopt the objective of urban safety at the earliest stage of development of the new town centre.



© Agence d'urbanisme pour le développement de l'agglomération lyonnaise



© EPAFRANCE

In 2002, the city of Lyons set up a consultative "situational prevention" committee to assess the implications of various city construction and urban development projects focused on enhancing safety, peace and quiet. The aim was also to enhance the quality of public spaces in Lyon.