THE URBAN ORDERING OF THE IRREGULAR SETTLEMENTS IN
PUEBLA, PUEBLA, MEX.

1. Definition of Regular and Irregular Settlement.

The Irregular Settlement defines "as the occupation of a human conglomerate in a place
determined without authorization and to the margin of the laws and the plans of urban
development, that generate a double problem, first, of urban character (by the lack of public
services such as water, drainage, public lighting system, roads, parks, schools, etc. also, by
the breach of minimum requirements in roads, surfaces of lots seated in ravines, zones of
federal and local restrictions, on ducts of petroleum, underneath cables of high tension, etc.)
and another one of legal, consisting of character the dispute by the possession of the
estates, without counting on a title of property ".

Of this one way, in synthesis, we can consider to the Irregular Settlement like, the set of
people who settle down themselves in a new land, without a legal title and in lands of nonapt
origin for the urban development.

The illegal appropriation of the land dominion or parachuting, constructing provisional houses
produces lost cities of greater size, located in lands of urban reserve, illegally invaded
uncultivated urban lands, lands of urban remainder, and of rights of via or of federal, state
and municipal infrastructure, the land invasion is made of fast and surprising way, but the
consolidation of the irregular Settlements has been a long and tedious time at the rate of the
internal fight of the social actors who conform it, for the obtaining of the services of the state
as they are it the infrastructure, equipment, as well as the land possession for the irregular
inhabitants of Settlements.

2. The ground in the city.

In order to understand the paper that has the urban ground in the processes of illegal or
informal occupation of the land and the state like legitimator agent of this occupation by
means of policies, it is necessary to analyze the factors that determine that the ground
becomes merchandise, being a nonreproducible, little and expensive good, to which the
popular sectors have difficulty to have access to a lot of land.

The urban sprawl develops its own contradictions and with them they appear the obstacles
that restrain the rational organization of the urbanization which they force the intervention of
the State

The city like a center of interchange, distribution and consumption of goods and services,
locks up in case a complex physical formation directly related to the ground, that in its growth
becomes a littler good, given its characteristics of nonreproducibility and high demand.

The amount of lands in the urban zones that seem to be sufficient to give fitted and comfort
to great populations, is not it; the urban land shortage, if really it exists, not must to physical
limitation of land, but to factors that turn the physical abundance in shortage practices as they are:

- the transports and routes of communication.
- not to be able to use those lands by mercantile, legal, of type financial, or institutional
  questions that give like result an elevated price of the land.
- the location of the land.
- the cost of the land that in many of the cases I determine myself by its urban asequibility and its constructive availability.
- By the speculation that offers to the proprietor a sensation of stability and familiar security.

In this context the formation and structures of the irregular Settlements causes extremely complex submarkets of ground, because "so that these areas are gotten up in decisive form to the formal real estate market, they are necessary nonsingle many years but that they operate several processes, between which they emphasize: the space revaluation and of the ground by means of communitarian work of the settlers, the regularization of the possession and the ground use, the real estate intervention of constructors and companies; and all it filtered by the action of the State that through his rectory and policies feels the bases for the formation and takeoff of the real estate market, in ample sense", which causes that the ground regularization and use play an important role, since changes the property regime, and incorporates to the real estate market a land that before was devalued.

The state, in its different levels from government, regulates the performance of the offerers and ground plaintiffs, according to the political conjuncture of the country and the specificity of each urban area therefore the modifications that can exert the state in each submarket, since usually they are determining.

The land located and equipped well with services is characterized by its high price, Nevertheless the access possibilities and the available services can be modified, often steeply, as a result of the measures that take the public authorities, that construct and extend communication routes, establish schools and parks and install networks of water supply, sewage system and electricity. Of this form, to the resulting basic characteristics of the location and the availability of services a special set of public measures, norms and other regulations are juxtaposed, as well as investments you publish that it determines the conditions in which is come to the use of earth. Since the increases of the price of the resulting land of those measures socially are induced, every time admits more than it is logical that the governments recover a part of the improvements to give a social use him.

3. The irregularity as form of access of the popular sectors to the urban land.

Because the urban ground is merchandise, the capacity is evident that from access to the ground this strongly determined by the entrance of the population. The capacity to generate an effective demand on the ground will depend on the amount and distribution of the familiar entrance and the structure on consumption.

The entrance is indicated by the real means wage expressed of life and services that arrange the worker. The magnitude of the real wage is determined by the dimension of the nominal wage and also by the level of the prices of the objects of consumption and service, thus, the reduction of real the minimum wage of the workers, established in numbers of the minimum wage, reflects a very slow growth in comparison with the growth of the cost of subsistence means, diminishing the capacity to have access to goods and services.

Before a tendency to the lost constant of the spending power of the wage, the social groups accede differently to the land market, conditioned by their levels of perception, as well as by the valuation and speculation of the urban ground; where the groups of lower income have problems to enter land markets.

Which it implies that the ejidal land when forming part of the urban real estate market, this available like a submarket nonofficial for this type of groups that tell on smaller resources,
therefore the process of irregularity to have access to the urban land constitutes the only form for the settlement of that type of population.


In the irregular settlement the following thing is noticed:

A) Lack of Planning. - It is the most important characteristic, since the plans and effective programs of urban development in the territorial zones are not within where they are based, thus nonsubject to being benefitted by the social programs so that do not have feasibility to count on the introduction services public, nor the use and destiny of the ground, are apt for room.

B) Legal Insecurity. - Since the possessors of lands do not count on a title of oponible property to third, nor they are subject of credit, for that reason, they are undressed easily, its possession is object of constant particular disputes or collective, they are forced to comprise of organizations of protective appearance when in fact they are of evident extorsion; the deficiency of a title does not allow the real estate legal transit.

C) Physical Insecurity. - The irregular settlements occur in nonapt zones for the development, are characterized to be located in the peripheries of the cities, normally in bordering hills or separated places where possibility does not exist of being taken care of in case of medical emergencies, salubrity, firemen or the police, because they do not let roads generally sufficiently wide to give access such, for that reason can with facility be imprisoned of any eventuality that puts in risk its physical integrity or its lives.

D) Lack of services. - The irregular settlement are characterized to be located in places where services are not had public nor counts basic urban equipment to have a good quality of life, nor its introduction is had predicted and where they are generally very expensive, indeed its irregularity, causes that they are not had legalized and the same are not register in the registers of the corresponding municipal treasury and evidently they do not pay right taxes; nevertheless, these establishments illegally demand elementary services without which the human coexistence is not possible, such as the potable water, drainage, public lighting system, police, roads, schools, centers of health, etc. which implies that the people of the irregular establishment, are imprisoned easy of the diseases, the insalubrity, the ignorance and the delinquents, in this one last aspect are areas with high incidence of criminality. In synthesis, they lack urban infrastructure, since the irregular settlements are made in clandestine form and to the margin of the law, in addition which are promoted almost always by people without scruples, nor capacity to make integral an urban development.

5. Case of Study

The process of occupation and urbanization of the South Zone of the City of Puebla, has been made of anarchical and disarticulated way, situation that a continuous deterioration of the environment has caused, and has generated risks for its inhabitants, contravening in many the technical and legal cases, dispositions in the matter of urban planning.

Combined to this serious situation, the irregularity of the land possession appears, that tends to cause social conflicts and prevents the dowry of the services public.

Before this problematic one, instrument a set of legal, technical and administrative actions, registered in a ampler effort of urban planning undertaken by the H. Ayuntamiento of the Municipality of Puebla, to deepen in the analysis of the Urban Structure of the South Zone, and to need the technical and administrative dispositions to obtain the urban improvement,
the regularization of the land possession and the ordering and ecological conservation, in benefit of the population, mainly of the more unprotected social groups.

In this context the denominated irregular settlements, Colonia Ampliación Union Antorchista, Colonia Cabañas de Santa Maria, Colonia Lomas de Atoyac, Colonia Lomas de San Valentín, Colonia Nueva Democracia, Colonia Nuevo Plan de Ayala and Colonia Union Antorchista (North Fraction) were originated by the irregular sale of lots of land, in please buying of good faith, unprotected economically, lacking these estates services public situation that has created irregular settlement aggravating the conditions of life of the families and future generations. Reason why it was necessary to regularize the land areas matter of this case of study, so that the City council, in fulfillment of the obligations that it has entrusted can provide the services municipal public, such as streets, roads and routes that facilitate the urban and suburban transit and the alignment of the same ones, thus integrating to before mentioned the planning, the development and urban ordering of the city of Puebla

5.1. General considerations in the matter of urban planning.

In the process of development of the population center, the subcomponent of the ground constitutes the physical space where the urban activities are made, conferring characteristic own, similarly it ready and it characterizes the forms in his use and advantage to them. It is the ground, in effect, the structural element that agglutinates all the components that conform the urban structure.

In this sense, the suitable occupation and use of the ground, cause the development of the cities, organize and hierarchize the activities, offering to each one the conditions for its better unfolding and are fundamental base of its economy. Additionally, it allows to offer the amount of ground consequently required by the population demand and, to eliminate the injurious practice of the speculation of the ground and high-priority way to have sufficient reserves in amount, quality and time, to absorb demands extraordinary of land, as well as to lodge in acceptable conditions to population of low resources, being avoided the irregular settlements and the ground occupation nonapt for the urban growth.

The disordered growth has occurred of important way towards the South part, pronouncing itself in the occupation of the ground of irregular way, with the appearance in all the urban area of 180 irregular settlements that have occurred of spontaneous form, mainly in ejidales lands, as well as in nonapt zones, like for example: federal zones of rights of via of the high tension cables of the C.F.E., as well as of the ductos of PEMEX and in the margins of the channels of the rivers Atoyac and Alseseca and ravines.

The tendencies of urban growth in the municipal territory, are mainly in the North and South part, with 32% and 52%, respectively, which altogether represents 84% of the total of the urban expansion, experimented in the last decade. To the south, it has grown on ground pertaining to old isolated localities, in agricultural lands in process of urbanization of ejidal regime, which means a reason for special attention for the municipal administration, due to the difficult one and taken process of integration to the existing urban structure

In 2000, 180 irregular settlements or in regularization process were recognized, that occupies 76.1 a total surface of Km2, representing 35% of total the urban area, of which the 42.0 Km2. (55%) they are located on lands of ejidal regime; the rest 34.1Km2. are located on ground of private regime.
Still with the efforts to incorporate this type of establishments to the formal urban structure, the cycle: irregular-regularization occupation tends to continue, of not modifying the present policy towards the preventive thing more than to the corrective thing.

In most of the urban area, the relative shortage and the high cost of the house within reach of the population immigrant, are reason for social conflicts, affect the health and prevent an integrated familiar development. The insufficient real estate supply to accessible prices, is determining cause of the irregular land occupation, frequent modality of a uncontrolled urban extension towards zones of high risk or environmental protection, whose urbanization and dowry of services originate very high costs and, frequently, irreversible ecological damages.

It emphasizes the fact that most of the population it does not count on the income sufficient to cover the basic satisfactors, among them the one of the house.

In the matter of ground, the cycle invasion-regularization has surpassed the possibilities of planning and creation of new territorial reserves. Parallelly, in certain cases the uncultivated urban estates do not take advantage of that tell to the equipment and infrastructure yet necessary to assure their habitational vocation. It must be identified and make sure a sufficient amount accessible ground for habitational use in each settlements, as well as intensify the regularization of the land possession and accelerate to the maximum the processes of desincorporation of lands of the federal patrimony and the regime of ejidal property, in order to make the reforms to 27 effective Constitutionalist Article.

The urban problems that appear with the growth of the city are innumerable, when it has mainly not anticipated operative mechanisms of regulation and control, that is to say, when they are not administered of suitable way. And this is what it has come happening in Puebla in the last forty years. The city grew enormous and the dowry of the services public to the poblana community, has been insufficient with the passage of the years.

5.2. Urban Equipment.

In the present economic conditions of the Country, the urban equipment shows a backward movement in the amount and quality of their services, because these have not grown to the same rate that the population, with the exception of the educative, cultural equipment, commercial and of services, that are concentrated in the central sector of the city, whereas in the popular colonies and new irregular settlements, located in the sectors of the periphery, shows deficits of the basic equipment, had mainly to the irregularity in the land possession, that corresponds to the population of limited economic resources, that have the necessity to make displacements towards central zones to satisfy its requirements, which causes complementary problems to the population.

The South zone is a most extensive in its territory and its population, being observed high demand of educative spaces and insufficient supply, whereas the equipment are located in the consolidated colonies, being neglected the new colonies and the irregular settlements, mainly the located ones passing Peripheral Anillo in the direction of the Lake of Valsequillo.

The prognosis of the equipment registered in the area in that they are located to the Colonias Ampliación Unión Antorchista, Cabañas de Santa María, Lomas de Atoyac, Lomas de San Valentín, Nueva Democracia, Nuevo Plan de Ayala and part of Unión Antorchista, is a tendency to increase the deficit in the service that lend the diverse equipment, the capacity of such is not sufficient to satisfy the demand of the established population, if a population of 6.436 Inhabitants has itself, which this within a basic level within the Urban Hierarchy (from 5.001 to 10.000 hab.), therefore it is required of a greater metering of equipment.
Making a projection of population to 10 years with a rate of growth of 2.29% the annual one, esteem that this zone will have a growth of 8,070 inhabitants and if an occupation of the total of the estates is considered, of which at the moment 73% this occupied and have a vacated 27%, projects that a population of 11,933 inhabitants will reach approximately, which will demand of a greater number of equipment.

A deficit in the existing equipment, as well as the demand of new equipment appears. This deficit registers at level Education, Health and Commerce.

Deficits of existing equipment will have to be lowered, as well as all required equipment will have to be anticipated and because of the type of cover it can be established. For example, public markets, health centers, libraries, recreation and sportive areas, post office agencies, among others.

The equipment proposals are based on the registered necessities, reason why they will have to occur priority to the following ones:

- Health Center
- Primary School
- Secondary School
- High School
- Public Library
- Post Office Agency
- Public Market
- Parks and Gardens

5.3 Infrastructure

Because most of the urban expansion of the last decades has been made to the margin of regular processes of urbanization, important zones of the city, located generally in the urban periphery, lack of these networks and basic services. Having constituted as habitational areas in irregular conditions of possession or property of the ground or, by their original deficiency of networks and municipal connections, constitute one of the main problems of the contemporary urban development. Inadequate forms of occupation of the ground, particularly the ground occupation nonapt for the urbanization by their physical training conditions, as it is the case of rocky, inundables grounds, with pending forts, occupation of hills and ravines, make difficult and increase in price the dowry and extension of networks and services, in addition to the high risk that implies east type of occupation.

Particularly, in the zone in which the seven colonies are located that will describe themselves more ahead, lacks infrastructure for the services public or if exist, they are of deficient and partial way, which repels in direct form in the welfare of the population.

5.4 Diagnostic-Prognostic

The dynamics of the urban growth of the City of Puebla, has been developed with deficiencies in the cover of basic the urban infrastructure throughout Century XX. The areas of recent expansion, like the popular colonies, lack the networks and basic services and, the cover and dowry to these areas has depended on the institutional process of incorporation of the irregular settlements to the urban development of the Municipality of Puebla, orchestrated during the last decade. However, the attention to the deficiencies in the matter, follows behind the urban growth and deteriorates the quality of life of the inhabitants of the
city, specially in the urban periphery, who constitute themselves like precarious areas and with serious problems of salubrity.

The experienced urban expansion mainly by processes of irregular occupation that has characterized to the urbanization of the second decade of Century XX, unfavorably presses on the attention to the demands of infrastructure and basic services for new immigrants, who are based in the borders of the large city or which they occupy inadequate lands with pronounced slopes, channels of rivers, ravine slopes or rights of federal routes.

5.5 Strategy of the Program of Urban Development.

This Program contemplates policy of improvement urban, to elevate conditions of well-being of population and to repay effects negative which the natural and cultural surroundings have suffered, that will derive in actions to function again and rearranging to the city, by means of the most adapted advantage of its material elements.

Being immersed in this, the 180 irregular settlements, which they fulfill the normatively in the matter, for its incorporation and regularization, which will allow to count on colonies seated in apt grounds the urban development and to give to the population the certainty and security in the land possession, and this way to equip them with the services basic potable water public, drainage and sewage system, public lighting system, paving of the streets, construction of trimmings and sidewalks and electrical energy.

The existing Settlement, that are located on the rights of via of the lines of communication of electrical energy of the C.F.E., in the margins of the Atoyac river and ravines, will have to be reviewed and to be analyzed by the authorities of the three levels of government, to determine the technical viability to get up itself to the urban development, settling down the applicable restrictions in the matter.

In the Integral Programs the attention is contemplated to two types of specific zones of the city: the corresponding ones to the irregular settlements and the areas of urban growth, zones in which the impulse of actions in package for integral the urban development is considered.

In the first case, the regularization of possession of the land in the irregular settlements, continues considering itself like the axis of the program, with progressive and integral attention to the undevelopment in networks, urban services and basic equipment.

The works and actions in this matter, derive from the objective image for the city, the objectives raised for their urban development and the attachment lines in which they are specified. Agreed to the main programs, differentials, relative to the handling and the administration of the ground settle down like actions and integral urban attention in irregular establishments, popular colonies and areas of urban growth.

5.6 Integral Programs.

- Regularization of Irregular Settlements

- To extend the Program of Regularization of the Land Possession in Irregular Settlements until covering to all at the moment recognized.

- To continue the Program of Relocation of settlements in zones of risk.
- To create a Program of Relocation of settlers of nonviable irregular establishments, to zones of territorial reserve

- To inventory the Irregular settlements in formation and the new ones for its incorporation to the Programs of Regularization or Relocation, according to the case, and

- Progressive integral Dowry of networks and urban services and basic equipment.

5.7 Technical Opinion.

The urban policy of the present municipal administration, like expression of the planning process, is translated in actions of regulation and control of the urbanization process; as well as the operation of the average materials that allow it: infrastructure and equipment for the benefit of the services public.

In this sense, the strategy defined in the regularization procedure, tries the execution of viable, opportune and objective actions, to find agile and flexible solutions, to the problems that present/display the located urban colonies in the South zone of the city.

Within this context and within the framework of the attributions, functions and competitions conferred to the city councils by the laws in the matter, the Municipality of Puebla, has decided to exert this accumulation of responsibilities with fullness of faculties, being fortified an atmosphere of joint operation of the municipal government and society, by means of mechanisms and permanent processes of social participation.

In accordance with the physical characteristics, territorial and environmental of the South Zone of the City of Puebla, it is urgent and imperative the work execution and actions that entail to obtain the unrestricted application of the effective dispositions in the matter of urban planning; the regularization of the land possession and, integral the urban improvement of the settlements.

In this process of high-priority urban ordering, they were left the following urban colonies enrolled:

- Ampliación Unión Antorchista,
- Cabañas de Santa María,
- Lomas de Atoyac,
- Lomas de San Valentín,
- Nueva Democracia,
- Nuevo Plan de Ayala, y
- parte de Unión Antorchista.

In the strategy of zincification of the ground, established in the Program of Urban Development of the City of Puebla, the polygons of the mentioned colonies previously, are located in habitational zone with H2 densities (25 viv./ha.), H3 (35 viv./ha.), H4 (60 viv./ha.) and H5 (85 viv./ha.)
Reason by which technical foundation and legally, the work execution and actions of Regularization of the Possession of the land and Urban Improvement, that cause a better standard of life to the population.

Thus the polygons of the buildings in which the Colonias Ampliación Unión Antorchista, Cabañas de Santa María, Lomas de Atoyac, Lomas de San Valentín, Nueva Democracia, Nuevo Plan de Ayala and part of Union Antorchista; and taking like reference made the technical and topographic studies, they determined that they reunite the suitable and essential characteristics, for the fortification of the process of urban planning; the regularization of the land possession and, the work execution of urban improvement, benefiting with it to the resident population in the zone.

Reference

- Ateneo de Ciencias y Artes de México (1945) No.1, (Ene.)
- Programa Estatal para la Incorporación de los Asentamientos Irregulares al Desarrollo Urbano 1999-2005
- Programa de desarrollo urbano de la Ciudad de Puebla (1991)
- Programa para la Incorporación de Asentamientos Irregulares al Desarrollo Urbano para el Municipio de Puebla. (2000)
Graphics
The polygons that conform the referred colonies, are the following ones:

Total Area

Ampliacion Luis D. Colosio

Cabañas de Santa Maria