

# **GOLF COURSES AND ASSOCIATE OPERATIONS IN THE VALENCIAN COMMUNITY AND MURCIA REGION IN THE MEDITERRANEAN SEA (SPAIN): A NEW PERIPHERALISATION AT EUROPEAN LEVEL**

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## **Abstract**

*This paper presents a few results of a research carried out by the Department of Building and Urbanism of the University of Alicante thanks to an agreement with the Spanish Ministry of Environment. The aim is to analyse and understand the new strategies of golf courses operations (linked to houses, hotels, isolated, public, business, memberships, etc.) in the Mediterranean Sea (Valencian Community and Murcia Region) in Spain which have been proposed since the last decade and evolve a new dimension of the centre-periphery relations at European level.*

**Keywords:** golf, strategies, clusters, peripheralisation, Spain.

## **1. Introduction**

The justification of subject matter is the appearance of numerous operations including golf courses in the Valencian Community and Murcia Region; about 180 new operations in these regions whereas there are about 30 at present, and nearly 800.000 homes and 1.500.000 people on a territory with slightly over 6.000.000 inhabitants (Figure 1).

The analysis of these operations shows that new strategies to locate golf courses have been detected. Thus, in a first generation (from the middle of the twenty-century to the end of the twenty-century) golf courses were the result of the introduction of golf as sport and as complementary offer for the tourism, and, in a second generation (since the beginning of the twenty-first century) golf courses meet a standard pattern: businesses linked to houses, and located all over the territory connected to mayor road links.

This model of territorial occupation has become known as “new golf cluster” or “diffuse residential archipelago”: large housing development in an isolated area between 180 and 280 hectares, including the golf course, which normally has 18 holes and an area of 50 hectares, with a capacity for 2.500-3.500 houses and gross residential densities around 15-20 houses per hectare.

There are four reasons to explain the “new golf clusters”: land profitability, closeness to other golf courses, search for profitability in the real estate business and accessibility to airports. The last one is related to the growth of low cost airlines so that we could hypothesize the emergency of a new periphery at european level where car and motorway are replaced by airplane and airport in a new dimension of the centre-periphery relations.

In this sense and for checking these hypothesis, more than 1,500 opinion polls has been conducted to residents, players, tenants, etc. of the residential complexes according to their profile, reasons for buying or renting a house (for example, whether it has been

important the existence of many golf courses nearby, which is a golf cluster), accessibility and public transport, facilities...

Finally, according to the results of these polls and other ones regarding water and natural resources consumption, social cohesion and economic impact which were analysed in this piece of research as well, action recommendations will be proposed.

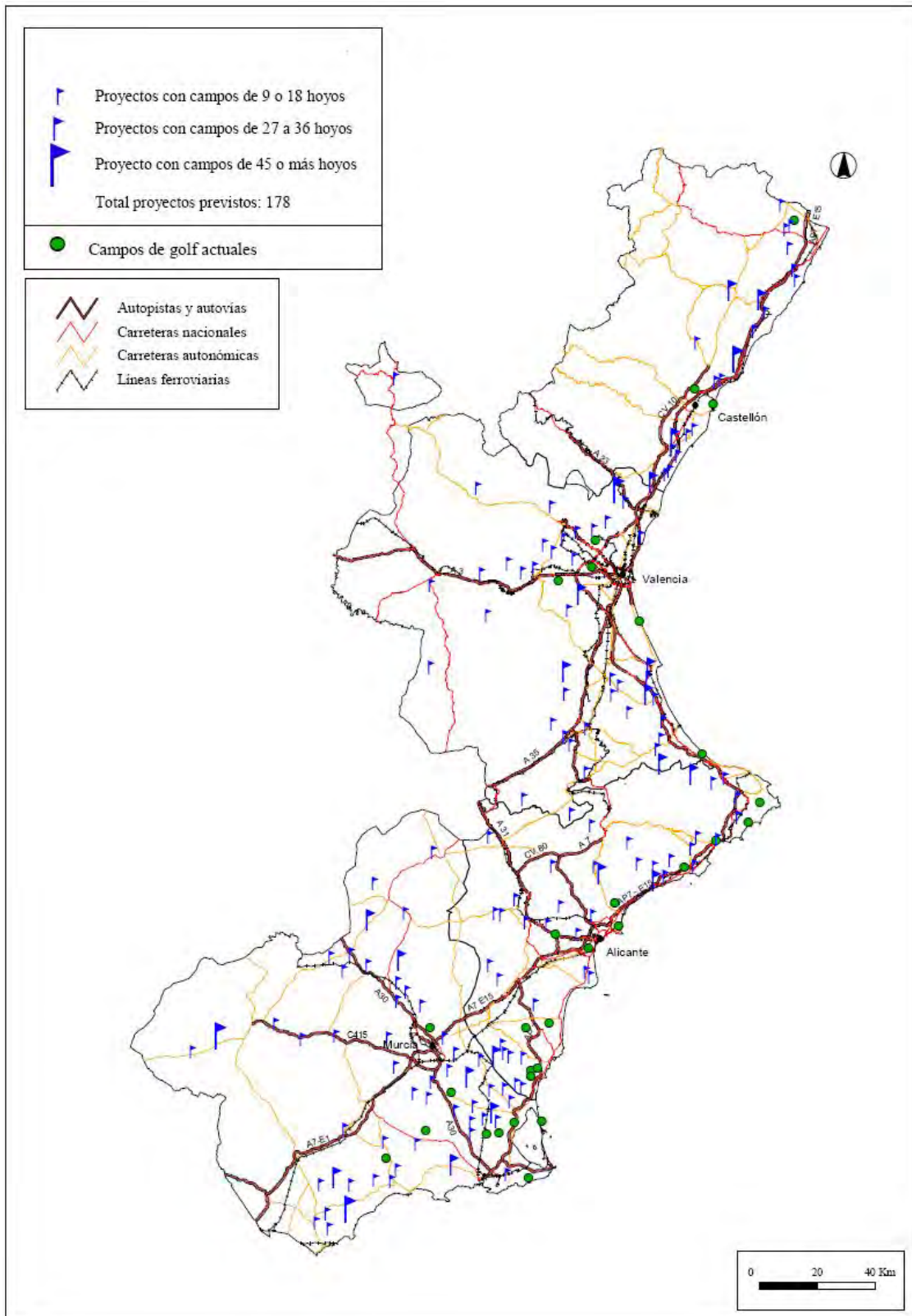


Figure 1: Possible operations (about 180) in 2008 in the Valencian Community and Murcia Region (blue flags) and golf courses at present (green circles). Source: Own research.

## **2. Golf courses typologies.**

Because it is different the impact over the territory, and over the tourism sector in particular, first of all is appropriate to define the distinct golf courses typologies according three main variables: morphology, management and location.

- According to morphology:
  - Isolated: building-free (without buildings surrounding the golf course).
  - Linked to houses: nearly 4.000 houses by operation and a residential gross density of 20 houses per hectare.
  - Linked to hotel resorts.
- According to management:
  - Public (public ownership, non-profit): play prices are affordable.
  - Business (private ownership): free-access to play paying.
  - Members (private ownership): you must be a member to play (right of admission reserved by the golf club).
- According to location:
  - Urban: within the existing urban weave.
  - Periurban-metropolitan.
  - Litoral region corridor: along the coast.
  - Rural environment: away from the main centres of population.

## **3. New golf courses to locate golf courses, causes and models**

In the evolution of golf courses site and typologies two generations can be distinguished:

- First generation: since the middle of the twenty-century to the end of the twenty-century (Figure 2).
  - It is the result of the introduction of golf as a sport and as a complementary offer for the tourism.
  - Located along the coast and in the vicinity of the main metropolitan areas, and following the location model of influence area (isochronal).
  - Mostly with private management, although some are public, linked to houses and also to hotels.

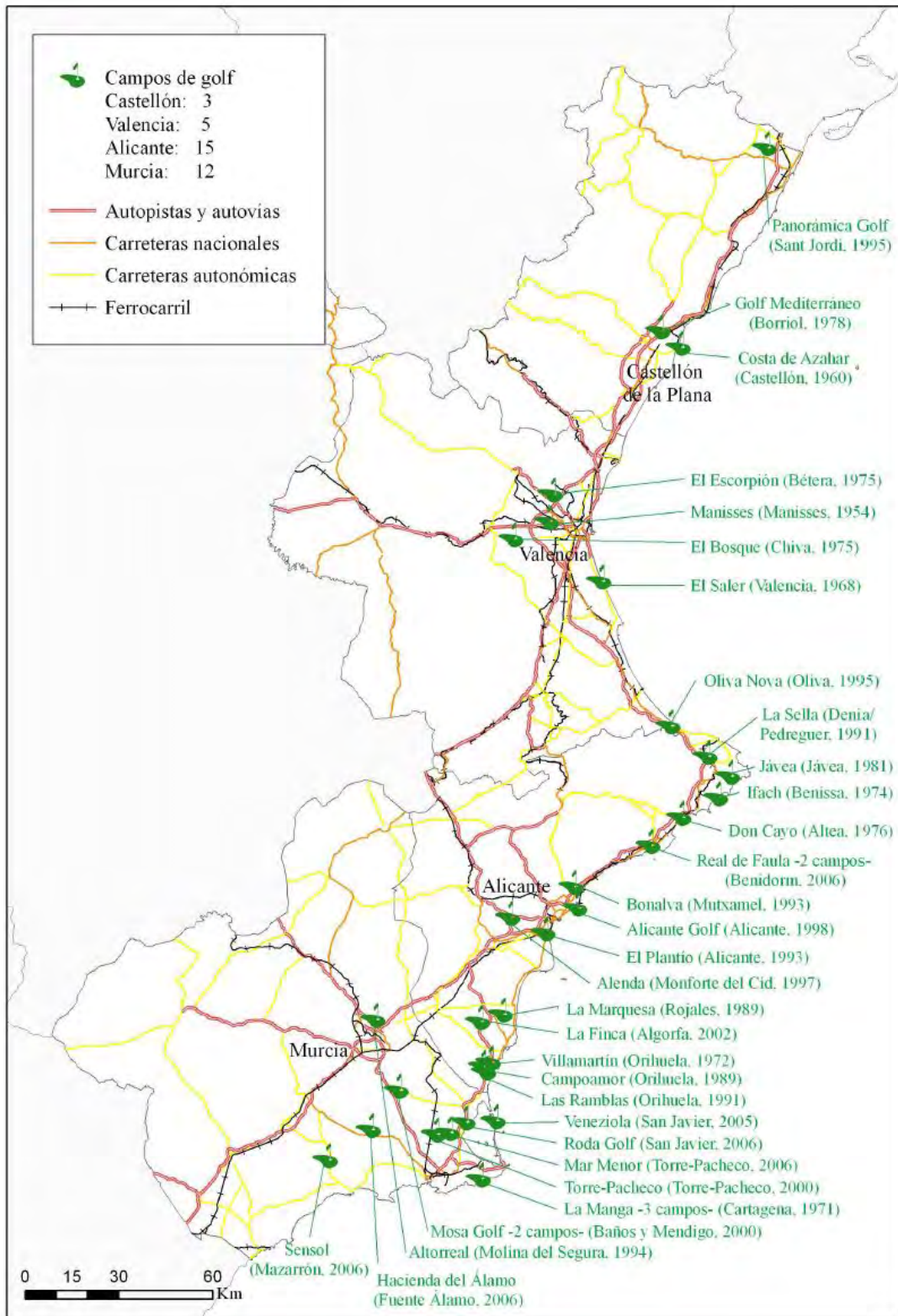


Figure 2: Existing golf courses in the first generation: since the middle of the twenty-century to the end of the twenty-century. Source: Own research.

- Second generation: since the beginning of the twenty-first century (Figure 1).
  - Typological homogeneity: business and linked to houses golf courses

- Located all over the territory following the main road links.

There are four reasons to explain the second generation:

1. Accessibility to airports: thanks to the growth of low cost airlines we could hypothesize the emergency of a new periphery at european level where car and motorway are replaced by airplane and airport in a new dimension of the centre-periphery relations.
2. Land profitability: profits by hectare from golf courses are much higher than those from the traditional forms of cultivation predominant in the environment (vineyard, tomatoes, potatoes, lettuces, oranges...), apart from protected garden cultivation (greenhouses) and ornamental flowers and plants. Therefore, the Figure 3 shows the location of golf courses surrounding areas of protected garden cultivations.
3. Closeness to other golf courses: in comparison to the model of location based on areas of influence, a “golf cluster” is proposed (Figure 4), thus the player prefers to play in several golf courses located close to each other. This model started in USA with the “Trent Jones Golf Trail” with twelve golf courses in the 80’s, but unlike the Spanish “clusters” linked to houses, the American ones are linked mainly to hotels.
4. Search for profitability in the real estate business: the almost complete saturation of the beachfront causes private agents to search for strategies that keep the profit margin provided by the locations along the coastline. We can state that there is an increase in the value of the plots (between 10-100%) and houses (5-50%) as they are closer to the “green”.

This residential development model has become known as “diffuse residential archipelago”: big residential spaces isolated with an area between 180 and 280 hectares, including the golf course, which normally has 18 holes and an area of 50 hectares, with a capacity for 2.500-3.500 houses and residential densities around 15-20 houses per hectare.

An example of this archipelago we can observe in Vinalopó Valley (Figure 5).



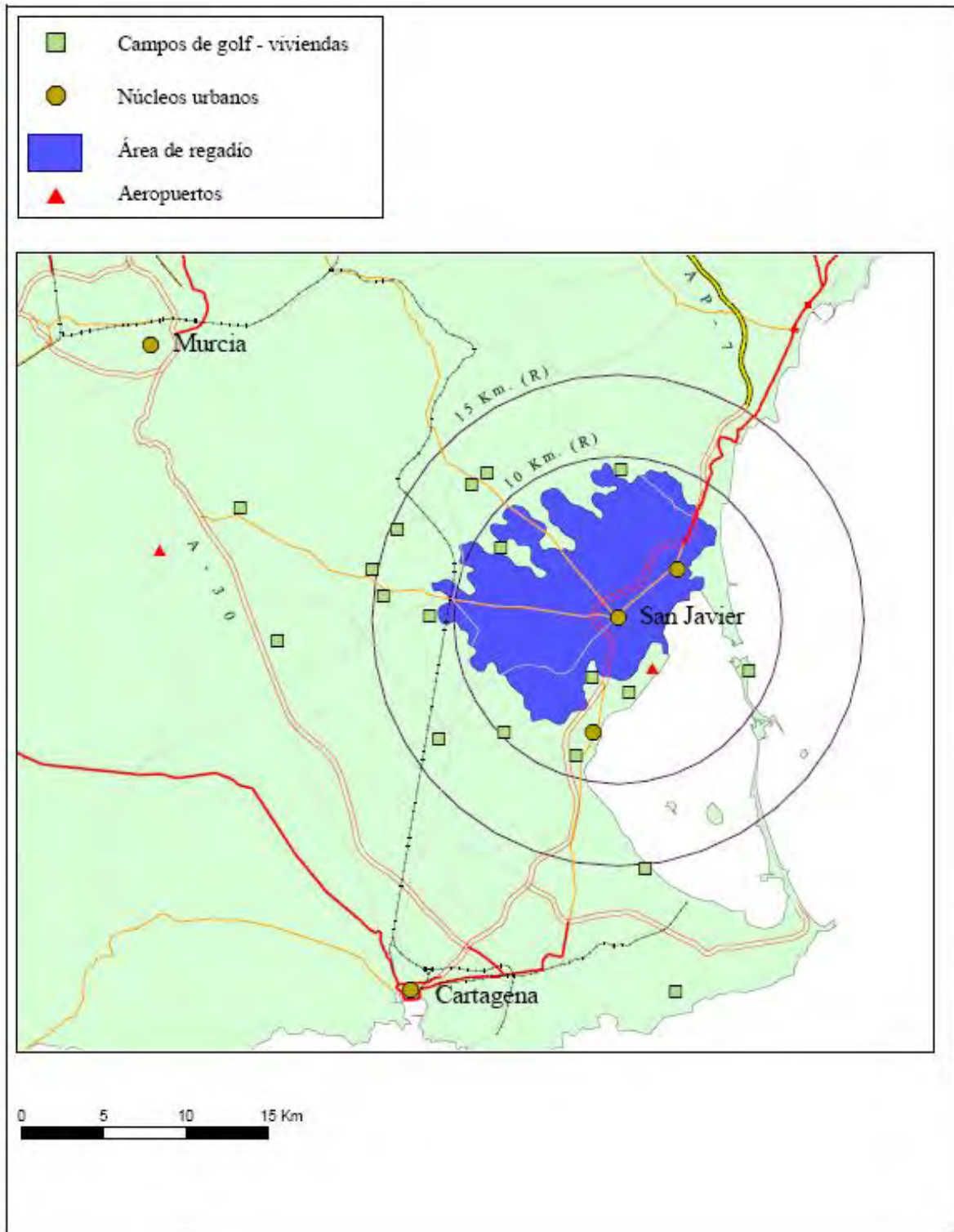


Figure 3: Location of golf courses -green square color- surrounding areas of garden cultivations under plastic (greenhouses, blue color) in Field of Cartagena (Murcia Region). Source: Own research.

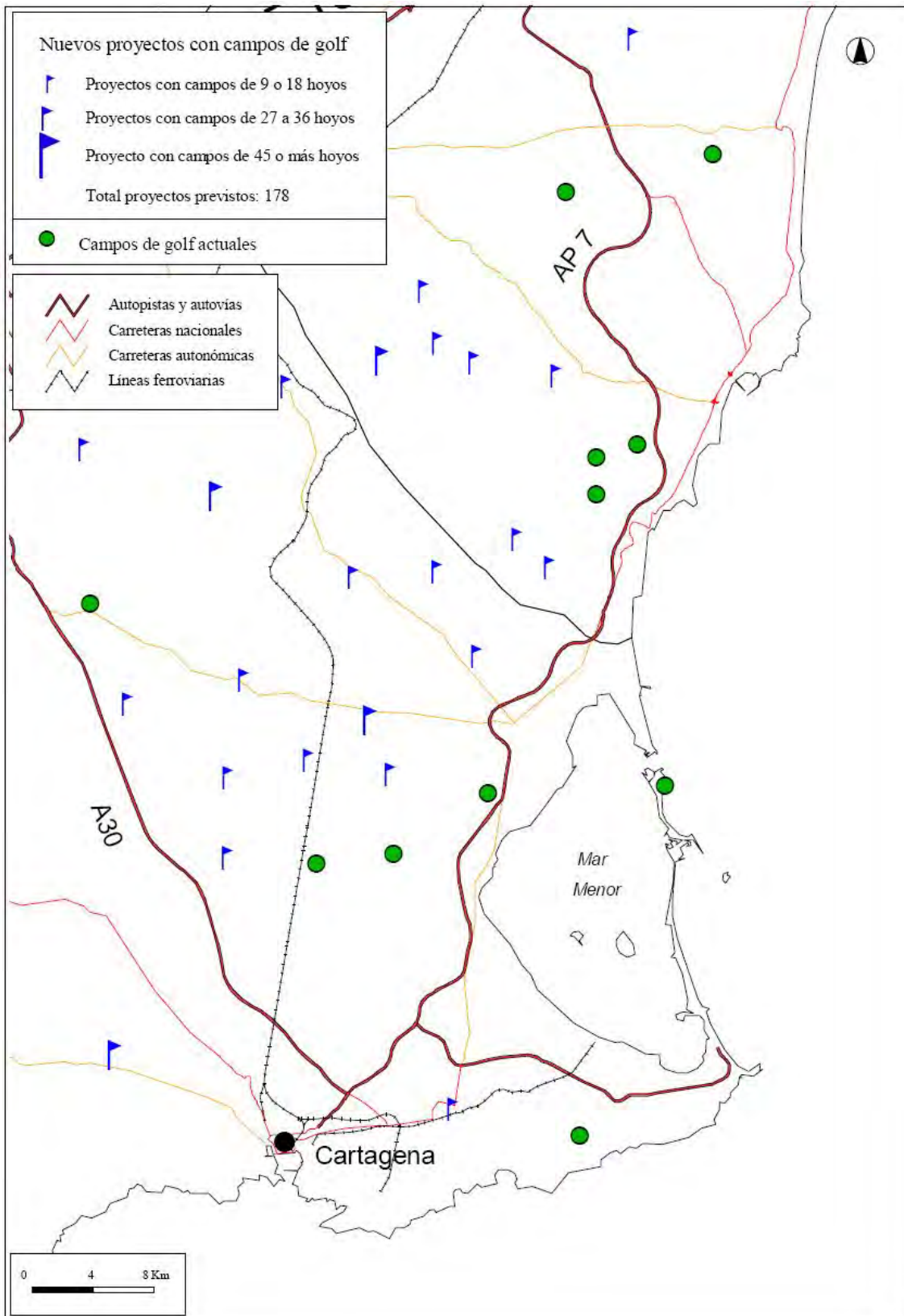


Figure 4: “Golf cluster” model in Field of Cartagena (Murcia Region). (New golf courses in green circles and new ones with blue flags). Source: Own research.



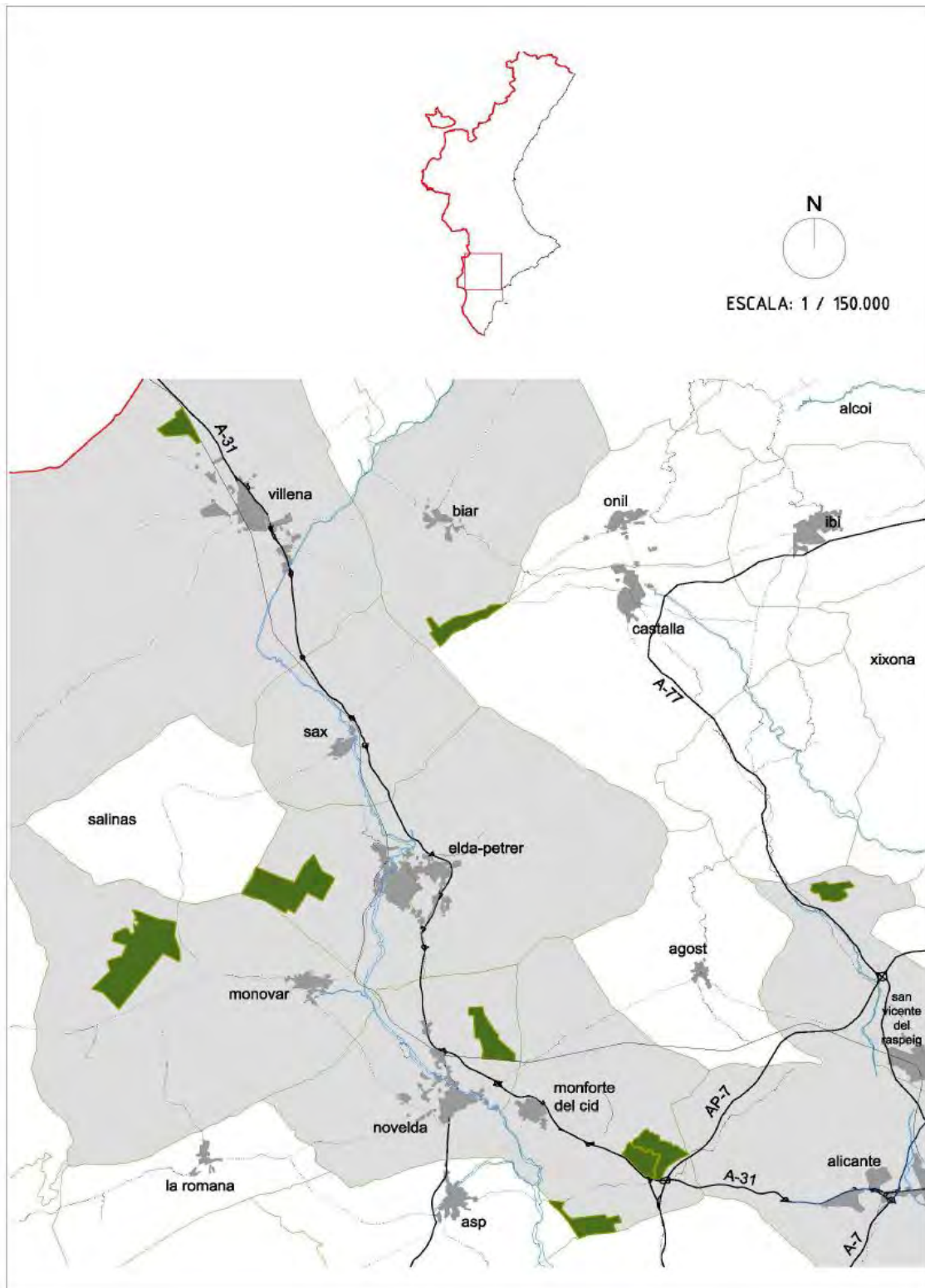


Figure 5: Location of the new golf residential complex operations proposed in the Area of Alicante and Vinalopó Valley. The total number of houses in the complex is around 30.000 with a capacity for 60.000 inhabitants on total population about 150.000. Source: Own research.

#### 4. Impact on water resources, mobility, social cohesion and the tourist activity

#### A. Impact on water resources:

- Regarding water consumption of a golf course throughout a year, the average is around 8.000 cubic meters per course hectare (main water consumptions are in summer).
- Regarding water requirements and productions in golf courses, we would need 3.000 houses built and one third of annual average occupation so that the golf course can be irrigated with waste water from the houses associated. This self-sufficient result must not be taken out of context thus to make decisions all the impacts must be taken into account.

#### B. Impact on mobility:

- In the residential golf courses with low gross residential density (20 houses per hectare): the number of trips by person and working day are between 1,15 and 1,3, almost half of that of a traditional compact city. This is due to a greater coordination of the activities to be carried out in a single trip as any trip involves taking the car in contrast to the compact city.
- In any case, as almost all the trips in these operations are made by private vehicle (95%), the number of daily trips by vehicle is the same in both models.
- Public transport is marginal and in no way is able to compete with the private car.
- As the annual average occupation of the houses is one third, and the average occupation of each house is 2,2, there might be one trip per day and per built house.
- The number of trips generated / attracted by players and employees by sports complex is around 200 per day.

Therefore, the main effects on the mobility are related to the associated houses, whereas the ones related to the sports complex are not worrying.

#### C. Consequences on social cohesion:

- The “Diffuse Residential Archipelago” presents a form of gated communities (Figure 6): settlements based on private security, social exclusion and a private management that, as a whole, turn their back socially and spatially on the city and the land where they are set, and this is promoted by its isolated location and its segregation from the town core where they are set.
- Regarding the golf as a sport activity: the price for a 18-hole round (“green free”) in the public managed courses is around 20-25 € in private business courses around 70 € and in the ones for members (course under study) an initial membership fee of 30.000 € must be paid. So, this limits playing chances according to the spending power: public managed courses increase the sports and leisure offer in the municipality, whereas courses based on members might increase social and land fragmentation.



Figure 6: Golf residential complex operation isolated and gated. The surrounding fence is perfectly visible. Source: Advertiser of the developer of the operation.

#### D. Consequences on tourist markets:

- Summary of the results from the polls (1.500) made to residents in the complex:
  - o The average age is around 52 years.
  - o 43% of them are retired and 47% of the active ones are professionals or directors.
  - o 60% of the owners are foreigners, among them two thirds come from United Kingdom and more than 20% from Germany and Holland.
  - o 42% of the owners or tenants play golf.

#### Regarding factors relevant for buying the house:

- o For 50% of them the existence of a golf course has been the determining factor to buy the house.
  - o The landscape surrounding the golf course is highly taken into account by 80% of the owners.
  - o The accessibility to the complex is important or very important for more than 60%.
  - o The design of the house is important or very important for more than 70%.
- Regarding impact on the economy and employment

- Each hotel bed generates an economic activity around five times higher (10.000 €per year) than a residential bed.
- A hotel bed generates around four times more employment (an employment every six beds) than a residential bed.

## 5. Conclusions and action recommendations

- The expected operations in the Valencian Community and Murcia Region (mostly residential-golf) are about 180, with a potential capacity for more than 1.500.000 inhabitants.
- It is impossible to answer specifically to the question regarding advisability of building golf courses because there are different typologies.
- The location of the golf courses depend mostly on land profitability criteria; we have noticed the appearance of a relation center-periphery at european level and the configuration of “Golf clusters”.

A golf course might be appropriate to revitalize some municipalities with depopulation problems or to increase, in general, the sports or leisure offer of a place if the following is guaranteed:

- The insertion of a non-segregated course in the city core that guarantees its pedestrian accessibility and the possibility of connection by public transport modes (Figure 7).
- The continuity of the public spaces of the municipality and the ones of the course, at the same time, public transfers will be done within the perimeter and discontinuity transfers will be refused.
- It must not make it difficult or make a barrier in the spatial and formal articulation of the urban weave and its growing expectations.
- Siting that does not destroy quality agricultural land, although it is not being exploited.

Regarding public golf courses:

- 9-hole courses rather than 18-hole courses must be promoted so that the leisure offer as well as generation of wealth and employment is better distributed in the territory.
- Its location model must be of areas of influence, and, to guarantee its economic viability, about 50.000 inhabitants within half an hour radius should be considered.

Regarding business courses with hotel resorts (they generate more wealth and employment):

- The golf cluster model linked to hotel resort properly conected by public transport and well integrated in the environment might be positive.
- In any case, a detailed analysis of the environmental capacities of the area/region and national and international players’ demand should be carried out, therefore, it would be feasible in very specific locations.





Figure 7: Good practice example: golf course with an articulation-relation with the rest of de urban weave. Source: Advertising of the developer of the operation.

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