Instituto Nacional de Estadística

MINISTERIO DE SANIDAD

2023 Spain Health Survey

(SHS 2023)

Methodology

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Contents

I Introduction

1 National need

The Spanish Health Survey (SHS-ESdE for its acronym in Spanish) arises from the need to respond, in a unique and comparable way, to the demand for information for the design of health policies at both national and international level, making it possible to obtain comparable series in all editions of health surveys and extending the availability of information on the health of the child population (0-14 years).

Spanish health policy needs to have, among other indicators, subjective information from individuals on their health status, the use of health services and the social, environmental and lifestyle determinants of health that go beyond the health system. These indicators are one of the key elements for public health planning and action and should be regularly collected as they are a fundamental tool in the evaluation of health policy.

Various statistical sources can be used to collect this information, some of them based on administrative registers such as morbidity, causes of death or health registers. But none of them, although they may be population-based or quasi-population-based, cover all aspects of health and generally cannot be related to socio-demographic variables or other determinants of health status. For this reason, other survey-based instruments have to be used.

2 International need

The EU Framework Regulation 2019/1700 of the Parliament and of the Council establishing a common framework for European statistics on individuals and households, based on individual data collected from samples, considers health surveys conducted every 6 years as necessary for the development of health policies at international level. Each edition shall adopt Implementing and Delegated Acts. The Regulation stresses the need for quality information in terms of accuracy, timeliness, functionality and accessibility to facilitate relevant policy action frameworks. This survey is the European Union's main source of information for health policies based on social inclusion and social protection, lifestyles, well-being, health inequalities, access to and quality of health systems.

3 Background and convergence of the National and European Health Surveys

The background of the Spanish Health Survey (ESdE) is the National Health Survey (NHS-ENSE for its acronym in Spanish) and the European Health Survey in Spain (EHS-EESE for its acronym in Spain), both of which are periodic statistical operations, included in different National Statistical Plans up to the current one and in the National Health System Information System. The responsible bodies are the Ministry of Health and the National Statistics Institute, respectively, with reciprocal collaboration in both operations since 2003. In the first editions of the ENSE (1987-2001), the survey was carried out by the Ministry of Health with the participation of the Sociological Research Centre (CIS for its acronym in Spanish). Since 2003, there have been 4 editions of ENSE (ENSE 2003, ENSE 2006, ENSE 2011 and ENSE 2017) and 3 editions of EESE (EESE 2009, EESE 2014 and EESE 2020). During these years, and especially since the EESE 2009, the

INE and the Ministry of Health have worked on the convergence of both the content and the objectives of both surveys.

Commission Regulation (EU) No 141/2013 and Commission Regulation (EU) 2018/255 established the regulatory basis for EESE 2014 and EESE 2020. The first edition of the European Health Survey was voluntary for Member States and was carried out between 2006 and 2009, with each country choosing the timing and method of implementation that best suited them, as well as the possibility of adapting the questionnaire. In Spain, this survey was carried out in 2009: EESE 2009.

Taking into account the European framework for health statistics and in line with the Proposals and Recommendations of the Higher Statistical Council for the 2021–2024 National Statistical Plan, the two surveys have been integrated into a single operation. This integration ensures the continuity and comparability of all health indicators, both those required to meet European demands and those necessary to address information needs within the National Health System.

The period established by the European Regulation does not provide information with the required and necessary frequency at national level. For this reason, the ESdE is planned as a triennial survey, thus satisfying both demands.

4 The Health Survey

To this end, the Spanish Health Survey is the result of said integration and is contemplated as a new periodic statistical operation in the National Statistical Plan 2021-2024 and in the National Health Services (SNS for its acronym in Spanish) Information System, which, in compliance with the latter, the Ministry of Health and the National Statistics Institute must jointly carry out.

The ESdE has national and regional representativeness, and constitutes a basic element of territorial cohesion for the population-based monitoring of the joint health strategies of the SNS: tobacco, obesity, diabetes, alcohol, mental health, cancer risk factors, ischaemic heart disease and other high-prevalence diseases.

It is also part of the National Health System Information System. It is a basic tool for citizens' health knowledge, planning and research. Data are widely used in health administration for monitoring and, above all, for evaluating major health strategies, allowing the assessment of progress towards national health goals. The data are also used for health, epidemiological and strategy analysis research on important issues such as barriers to access or appropriate use of health services or risk factors for chronic diseases.

As complementary information to the Spanish Health Survey, health information will be available through the Living Conditions Survey modules. The EU Framework Regulation 2019/1700 includes a three-year module on adult population health (years 2022, 2025), a three-year module on child population health (years 2024, 2027, etc.) and a six-year module on access to health care that primarily addresses the perspective of unmet need. These modules provide additional information but do not cover the demands for health information either at national or international level.

II Objectives of the ESdE 2023

The ESdE 2023 is a statistical operation whose general objective is to provide information on the health of the Spanish population that is harmonised and comparable on a European level, with the aim of planning and evaluating health-related initiatives both domestically and internationally.

Specific Objectives:

1. To provide information on the general health status and identify the main problems that citizens have (chronic diseases). To know the degree of access to and use of health services and their characteristics.
2. To know the physical and sensory limitations of the population and to estimate the number of people with limitations in performing activities of daily living.
3. Obtaining indicators on the mental health of the population through internationally harmonised instruments.
4. Knowing the degree of access to and use of health services and their characteristics, as well as unmet needs.
5. Investigating preventive testing.
6. Knowing health determinants: physical exercise, diet, tobacco and alcohol consumption.
7. Carry out research on the support and social relations of the population.

III Investigation Scope

Regulation (EU) No. 255/2018 establishes the basic areas of application of the European Health Survey. In the case of Spain, they are as follows:

– Population scope

  The research is aimed at all persons residing in main family households. Population living in collective residences is excluded.

– Geographical scope

  The geographical scope is the entire national territory.

– Temporal scope

  This is a structural statistical operation with a triennial periodicity. In order to collect data that may be affected by seasonality, the collection period is spread over one year.

  In the 2023 edition, the collection period has been from September 2023 to August 2024 and the data refer to that period.

IV Sample Design

1 Sample Type. Stratification

Three stage sampling with stratification of the first stage units has been used.

The first stage units are the census sections. The second stage units are the main family dwellings, with all households having their usual residence there being researched. Within each household, an adult (15 years or older) is selected to fill in the Adults Questionnaire and in the case of minors (0-14 years), a minor is also selected to fill in the Minors Questionnaire.

The framework used for the selection of the sample of both first and second stage units is the Georeferenced Address Framework (GADF). It is a structured and hierarchical information system made up of all the entities that are part of the territorial model: autonomous community, province, municipality, district, section, street and other elements of the postal address. All addresses contained in this framework are organised, have unique identifiers and a high degree of geo-referencing. In addition, each address is associated with the inhabitants registered in the census, and the territorial entities are aligned with the street map of the Electoral Census.

Likewise, the GRF is synchronized with the Spatial Data Infrastructure of the INE (SDIINE), which allows its visualization within said environment. This framework, in its January 2023 version, constitutes the time reference used for the selection of the sample.

First-stage units are grouped into strata according to the size of the municipality to which the sections belong.

The following strata are included:

Stratum 0: Municipalities with more than 500,000 inhabitants.

Stratum 1: Provincial capital municipality (except the above).

Stratum 2: Municipalities with more than 100,000 inhabitants (except the above).

Stratum 3: Municipalities from 50,000 to less than 100,000 inhabitants (except the above).

Stratum 4: Municipalities from 20,000 to less than 50,000 inhabitants.

Stratum 5: Municipalities from 10,000 to less than 20,000 inhabitants.

Stratum 6: Municipalities with less than 10,000 inhabitants.

An independent sample has been designed for each autonomous community to represent it, as one of the survey's objectives is to provide estimates at this level of disaggregation.

2 Sample size. Allocation

To meet the objectives of the survey of providing estimates with an acceptable degree of reliability at the national and Autonomous Community level, a sample of around 37,500 households distributed in 2,500 census sections has been selected. The number of households selected in each census section is 15.

The sample is distributed among Autonomous Communities, assigning a uniform part and another proportional to the size of the Community.

The distribution of the sample of sections by Autonomous Community is the following:

Autonomous Communities	**Sections**
01 Andalucía	304
02 Aragon	104
03 Asturias (Princ. de)	92
04 Baleares (Islas)	96
05 Canaries	126
06 Cantabria	85
07 Castile and León	142
08 Castilla-La Mancha	126
09 Catalonia	284
10 Valencian Community	206
11 Extremadura	94
12 Galicia	144
13 Madrid (Comunidad de)	248
14 Murcia (Región de)	105
15 Navarra (Com. Foral)	87
16 Basque country	126
17 La Rioja	83
18 Ceuta	24
19 Melilla	24
Total	**2,500**

3 Sample Selection

In the first stage, sections are selected within each stratum with probability proportional to their size as measured by the number of main family households. In the second stage, in each section, households with equal probability were selected through systematic sampling with random start. This procedure provides self-weighted samples in each stratum.

For the selection of the person to fill in the individual part of the questionnaire, a random procedure based on the Kish method is used, which assigns equal probability to all adult persons.

4 Distribution over time

The sample of sections is evenly distributed over the four quarters that make up the time scope of the survey. Within each quarter, an effort is also made to ensure that the distribution of the sample by reference week is as homogeneous as possible, so that any period of the year is equally represented.

5 Estimators

Ratio estimators calibrated to information from external sources were used.

The steps to develop the estimators were as follows.

A. Estimates of households (and resident persons)

1. *Estimator based on the sample design.*

$$\hat{Y}_d = \sum_h \sum_{i,j \in h} \frac{1}{K_h \cdot \frac{15}{V_h}} \cdot y_{hij} = \sum_h \sum_{i,j \in h} \frac{V_h}{v_h^t} \cdot y_{hij}$$

Where:

h: Stratum

i: Section

j: Household

y_{hij}: Value of the objective variable y in household j, section i, stratus h

K_h: Number of sample sections in stratum h

V_h: Number of dwellings in stratum h according to the 2018 framework

V_h^t: Theoretical number of households selected in stratum h. It is verified that: $v_h^t = K_h \cdot 15$.

The factor $K_h \cdot \frac{15}{V_h}$ is the probability of selection of a household from stratum h.

2. *Correcting the lack of response.*

It is corrected at the stratum level by multiplying the above elevation factor $\frac{V_h}{v_h^t}$ by the inverse of the estimated response probability within the stratum, i.e:

$$\hat{Y}_2 = \sum_h \sum_{i,j \in h} \frac{V_h}{v_h^t} \frac{v_h^t}{v_h^e} y_{hij} = \sum_h \sum_{i,j \in h} \frac{V_h^{(16)}}{v_h^e} y_{hij}$$

Where v_h^e is the effective sample of households in stratum h.

3. *Ratio estimator*

It uses as an auxiliary variable the population totals, from the Advanced Population Figures, with reference to the central moment of the survey. Its main objective is to improve the estimator obtained in the previous steps by updating the population used at the time of sample selection to the time of the survey. Its expression is:

$$\hat{Y}_3 = \sum_h \frac{\sum_{i,j\in h} \frac{V_h^{(16)}}{v_h^e} y_{hij}}{\sum_{i,j\in h} \frac{V_h^{(16)}}{v_h^e} p_{hij}} P_h = \sum_h \sum_{i,j\in h} \frac{P_h}{p_h^e} y_{hij}$$

where:

P_h is the Estimate of the Current Population at the mid-point of the survey period (1 March 2024) for stratum h.

p_h^e is the population of the effective sample of households (v_h^e)

Considering $F_j^{(1)} = \frac{P_h}{p_h^e}$

So:

$$\hat{Y}_3 = \sum_h \sum_{i,j\in h} F_j^{(1)} y_{hij}$$

4. *Calibration techniques*

The above factor is re-weighted to adjust the estimated distribution to external sources. This calibration has been carried out using the CALMAR macro of the French National Institute for Statistics and Economic Studies (INSEE for its acronym in French). In each Autonomous Community, the variables used in the adjustment process were as follows:

- Gender and age groups. Males and females distributed in the following age groups 0-4, 5-9,10-14,15-19, 20-24, 25-29, 30-34, 35-39, 40-44, 45-49, 50-54, 55-59, 60-64, 65-69, 70-74, 75 and over.
- Population totals by province
- Household totals by province
- Households by size: 1, 2, 3 and 4 or more members.

After applying the above steps, a final raising factor of $F_j^{(2)}$ is obtained for each household in the effective sample.

Thus the estimator of the total $\hat{Y}$ of a characteristic *Y* can be expressed by:

$$\hat{Y} = \sum_{j\in S} F_j^{(2)} y_j$$

where the sum extends to all households in sample S, y_j is the value of characteristic Y observed in household j.

The estimators of the proportions $P = \frac{X}{Y}$ are of the form $\hat{P} = \frac{\hat{X}}{\hat{Y}}$ where the estimates $\hat{X}$ and $\hat{Y}$ are obtained using the above formula.

The above household factor is also assigned to all household members for estimates of characteristics collected for all persons in the household.

B. Estimates based on information from selected respondents.

In addition to the estimates obtained from the characteristics of the household and all its members, it is necessary to consider the characteristics obtained from the information provided by the selected adult and minor who have completed the Individual Questionnaire. Analogous to section *A*, the factor is obtained in several steps.

1. *Design Factor:*

   Starting from household factor $F_j^{(1)}$ above (see Step 3), we obtain:

   - **The selected adult factor of household j**: $F_{jk}^{(3A)} = F_j^{(1)} A_j$ where subscript *jk* represents person (adult) *k* of household *j* who is required to complete the individual adults questionnaire and where A_j is the number of adults in household j.
   - **The factor of the selected minor of household j** (if there are minors in household j): $F_{jk}^{(3M)} = F_j^{(1)} M_j$ where the subscript jk represents, in this case, the person (minor) k of household j who has to fill in an individual minors questionnaire and M_j is the number of children in household j.

2. *Correction of non-response*

   Due to the existence of non-response of individual questionnaires, there are adults and minors who should have filled in the corresponding individual questionnaires but do not do so, it is necessary to correct the above factors.

   This correction is made in the following way:

   In the case of adults:

$$F_{jk}^{(4A)} = F_{jk}^{(3A)} \frac{\sum_{im \in CIAT_G} F_{im}^{(3A)}}{\sum_{im \in CIAE_G} F_{im}^{(3A)}}$$

   Where the sum of the numerator extends to the set of theoretical individual questionnaires of group G ($CIAT_G$), and the sum of the denominator to the set of actual individual questionnaires of the same group ($CIAE_G$). The subscript im represents the adult m of household i.

   In the case of minors:

$$F_{jk}^{(4M)} = F_{jk}^{(3M)} \frac{\sum_{lm \in CIMT_G} F_{lm}^{(3A)}}{\sum_{lm \in CIME_G} F_{lm}^{(3A)}}$$

expression analogous to the previous one, simply by changing A to M and extending the sums to the set of individual questionnaires for minors. The subscript lm represents the minor m of household l.

The G groups considered for both adults and minors were Autonomous Community and the groups by sex and five-year age groups up to 75 years and over.

3. *Calibration techniques*

Finally, calibration techniques have been applied to the above individual factors using CALMAR software. External sources refer to 1 March 2024.

- **Selected adult:**
  - Total population aged 15 and over, by nationality, Spanish or foreign
  - Sex and age groups: 15-24, 25-34, 35-44, 45-54, 55-64, 65-74, 75 years old and over.
  - Population aged 15 and over by province.
- **Selected minor:**
  - Total population under 15 years of age by nationality, Spanish or foreign.
  - Sex and age groups: 0-4, 5-9 and 10-14.
  - Total population under 15 years old by province.

6 Sampling Errors

To estimate the sampling errors, the **Jackknife method** has been used, which allows obtaining the estimate of the variance of the estimator of a characteristic *Y* through the expression:

$$\hat{V}(\hat{Y}) = \sum_{h} \frac{n_h - 1}{n_h} \sum_{i \in h} (\hat{Y}_{(hi)} - \hat{Y})^2$$

where:

$\hat{Y}$ the estimate of the total characteristic *Y* obtained with the complete sample

$\hat{Y}_{(hi)}$ the estimate of the total characteristic *Y* obtained after removing the units from section i of stratum h from the sample.

n_h is the number of sample tracts in stratum h.

To obtain the estimator$\hat{Y}_{(hi)}$, and for simplicity's sake, instead of recalculating the raising factors (with correction of non-response, calibration, etc...), the factors of the stratum where the tract has been removed are multiplied by the factor $\frac{n_h}{n_h - 1}$

Accordingly:

$$\hat{Y} = \sum_{l,j,k \in S} F_{ljk} y_{ljk}$$

$$\hat{Y}_{(hi)} = \sum_{l \neq h} F_{ljk} y_{ljk} + \sum_{\substack{l=h \\ j \neq i}} F_{ljk} \frac{n_h}{n_h - 1} y_{ljk}$$

Where F_{ljk} is the raising factor of unit k of tract j of stratum l in the complete sample S. That is to say, the available raising factor. Thus, the variance can be estimated without the need to recalculate the raising factors.

The tables publish the relative sampling error in percentage, coefficient of variation, whose expression is:

$$\widehat{CV}(\hat{Y}) = \frac{\sqrt{\hat{V}(\hat{Y})}}{\hat{Y}} \, 100$$

The sampling error allows obtaining a confidence interval, within which the true value of the estimated characteristic is found.

Sampling theory determines that in the interval

$$\left(\hat{Y} - 1{,}96\sqrt{\hat{V}(\hat{Y})} \; , \hat{Y} + 1{,}96\sqrt{\hat{V}(\hat{Y})} \right)$$

there is a 95 percent confidence that the true value of parameter X is found.

V Questionnaires and administrative information in the ESdE 2023

1 ESdE questionnaires

QUESTIONNAIRES

The survey information is collected through three questionnaires: Household questionnaire, Adults questionnaire (15+ years) and Minors questionnaire (0-14 years).

In this way, the persons in the selected household must answer the Household Questionnaire, and, depending on the composition of the household, an adult person will be selected to answer the adults questionnaire and, if there are persons under 15 years of age, one of them will be selected to answer the minors questionnaire. The individual questionnaires do not gather information on all persons, but only on those who have to answer the individual questionnaires.

The information gathered is structured in four modules:

1. Health Status Module
2. Healthcare Module
3. Health Determinants Module
4. Socio-economic variables module

Each of the specific health information modules contained sub-modules of questions adopting validated instruments or series of questions intended to specifically measure some aspect of health status, lifestyle or type of health resource demanded.

QUESTIONNAIRE PREPARATION

The development of these questionnaires has coincided with the work of the Task Force European Health Interview Survey (EHIS) in which the INE participates, and which is currently working on the variables to be included in the implementation act of the EU Framework Regulation 2019/1700 for the next edition of the European Health Survey that will have to be carried out in 2025.

This has made it possible to consider in the ESdE2023 questionnaires the variables from the previous edition of EHIS that Eurostat will maintain in the EHIS 2025 Regulation and to incorporate some variables of great interest, such as an additional instrument to measure mental health (WHO-5), which will be incorporated in the next Regulation.

The integration of the two surveys (the European Health Survey and the National Health Survey) makes it possible to obtain information on the child population in all editions, as previously, it was only provided with the National Health Survey. Hence the existence of a Children's Questionnaire in all editions.

INFORMED CONSENT

In order to collect the information from the individual questionnaires, which mainly contain health data, the express consent of the selected person is requested in accordance with the provisions of article 9.1 of Regulation (EU) 2016/679, according to which data relating to health are included within the special categories of data, these being of strictly voluntary contribution, in accordance with the provisions of article 25.2 of Organic Law 3/2018, of 5 December, on the Protection of Personal Data and Guarantee of Digital Rights (LOPDGDD, for its acronym in Spanish) and, in relation thereto, art. 11.2 of Law 12/1989 of 9 May, on the Public Statistical Function and, therefore, may only be collected with the free and express consent of the interested parties.

2 Integration of administrative data

MUNICIPAL REGISTER

The administrative information provided by the Register of Inhabitants has been used to obtain the theoretical sample, the postal addresses for contacting the selected households and for the extraction of some socio-demographic variables necessary for data processing.

REQUEST FOR DATA FROM THE STATE TAX ADMINISTRATION AGENCY (AEAT) AND THE NAVARRE REGIONAL TREASURY (HFN)

Reported income in general in household surveys has a high non-response rate and in many cases the amount reported is underestimated, thus hindering any kind of analysis. For this reason, in order to improve the quality of this variable, meet user demand and encourage the use of administrative registers to reduce the informant's burden, a request has been made to the State Tax Administration Agency (AEAT, for its acronym in Spanish) and the Navarre Regional Treasury (HFN, for its acronym in Spanish) concerning the net income of each household in the effective sample.

The request asks for the interval to which the household's net income belongs among 10 intervals provided by the INE.

The request to the AEAT is made within the framework of the‘Collaboration agreement between the AEAT and the National Statistics Institute on the exchange of information for statistical and tax purposes’.

The request to the HFN has been made through the Statistical Institute of Navarre on the income variable (similar to the request from the AEAT), by virtue of the ‘Agreement on Statistical Cooperation and Exchange of Information’, signed between the National Statistics Institute and the Statistical Institute of Navarre’.

VI Data Collection

1 Phases of the Interview

In the ESdE2023, the initial contact with the selected households was made by sending a letter informing them that they had been selected for the survey and of its confidential nature, requesting them to fill in the questionnaire online first, and also in a second letter to those who had not yet completed it, warning them of the forthcoming visit by a duly accredited interviewer.

In each selected household, it will be identified if there is more than one independent human group. In case there is more than one "household", the application will retain the group of the person to whom the letter is addressed ("Holder") if possible. Otherwise, one of the "households" will be selected randomly. For this "household" of the dwelling, the study is carried out in two phases, the first is identified with the Household Questionnaire and the second with the Adults Questionnaire (persons aged 15 years and over) and the Minors Questionnaire (persons aged 0 to 14 years).

PHASE ONE

In the first phase, an attempt is made to capture information on all the persons residing in the household, requesting, for each of them, information on some fundamental socio-demographic variables collected in the household questionnaire.

The Household Questionnaire should be completed by an adult able to report on the characteristics and composition of the household.

At this stage of the interview, the computer application randomly selects a person aged 15 years and over ("adult" person) living in the household to answer the adult health questionnaire. If there is a person under 15 years old living in the household, the computer application randomly selects one of them to answer the minor health questionnaire. This random selection implemented in the handheld device is carried out using a Kish grid. In this way it is not possible to exchange the selected adult or minor for others in the household to answer the respective questionnaires.

In addition, the identification of the reference person in the household is requested, and, in case it does not coincide with the selected adult person, information on additional socio-demographic variables is requested from them. Finally, there are questions on the characteristics of the dwelling and the household.

PHASE TWO

In the second phase, health information is collected from the selected person aged 15 years and over in the household and, if any, from the selected minor (aged 0-14 years).

The Adults Questionnaire will be completed directly by the selected person aged 15 and over. A person other than the selected person is only allowed to be the informant (proxy) if:

1. The selected person is admitted to a hospital or a nursing home
2. The selected person is unable to answer due to disability or serious illness
3. The selected person is unable to answer because of a language barrier

In these cases, another adult in the household or another adult who is not a member of the household is allowed to answer the questionnaire instead of the selected person. In the case that the reason for proxy is due to lack of knowledge of the language, the informant acting as a translator is allowed to be a minor, in case there is no other person of legal age who can act as an interpreter.

On the other hand, the information corresponding to the Minors Questionnaire is obtained indirectly, provided by the mother, father or guardian. If they are unable to provide the information due to illness, language, etc. or if they are absent for the whole time, another authorised person who is sufficiently informed about the data requested and able to do so may provide it.

Both questionnaires collect additional socio-demographic information to that obtained in the household questionnaire for each selected person, and all the questions of the three modules of the health variables.

2 Collection Method

The ESdE 2023 interviews are conducted using a multi-channel CAWI-CAPI system consisting of the following:

1. CAWI (Computer Assisted WEB interview): Initially, residents of the dwellings selected in the sample are invited by post to complete the questionnaire online.
2. CAPI (Computer Assisted Personal Interview): In a second instance, households that have not yet completed the questionnaire will be visited, with the aim of conducting the interview in person or, failing that, encouraging residents to complete the questionnaire online.

Precisely to support this objective, letters are sent to the households selected in the sample informing residents about the survey and requesting their collaboration. Any information that can be brought to the informant's attention will save further efforts and will predispose them to cooperate. This action, in addition to counteracting the possible excuse of those who claim to be unaware of their connection to the request, also serves to give the survey a sense of trust and official status, as well as justifying the presence of an interviewer at the home, if necessary.

Interviews are conducted in the selected households. Interviewing staff are assigned a regular work quota distributed according to the sample design. The interviewer must make at least 6 visits on three different days to the dwelling, until the household is contacted or the corresponding incident is reported.

The fieldwork (data collection, inspection, monitoring and initial filtering of the information) has been carried out by the company awarded the contract advertised by the Ministry of Health (MH), under the supervision of the INE.

Before starting the collection work, MH and INE officials give training courses to the area supervisors of the company in charge of the collection. They are also responsible for the training of the personnel under their charge in the respective zones. The first level training courses last 2 days, as do the second level courses, both in the morning and afternoon.

These courses explain the methodological concepts and theoretical considerations of the survey content, the handling of handheld devices and the rules for filling in the questionnaire. The procedure for administering the questionnaire, the rules for conducting the interview, the rules for carrying out the fieldwork (collection and inspection) and how to handle issues that may arise during data collection, all supported with practical case examples. The use of the fieldwork monitoring and control application, as well as the information downloading procedure, is also explained.

The training courses are supported by the ESdE2023 Manual for interviewers, which comprehensively incorporates the information collection procedure. Interviewers are also informed about the importance of their mission and the relevance in data collection of the correct conduct of the interview and the handling of those factors that influence people's collaboration and the quality of the answers they provide.

In order to check on the spot that the collection of information is going well, the company in charge of the collection periodically carries out inspections of the visits made by the interviewers.

In addition to these regular inspections, occasional inspections are carried out where collection problems or questions arise.

The main purpose of the inspection is to verify that the interviewers carry out their work correctly in the original interview, following the established rules, checking in particular that the assignment of incidents has been correct and correcting any errors that may have been made.

In addition to the above inspections carried out by the company in charge of the collection, telephone inspections are carried out in order to corroborate the quality of the data filled in and the fulfilment of the tasks for which the company awarded the tender is responsible.

3 Basic units

The basic units needed to identify the surveyable human group in each interview are defined below.

FAMILY HOUSEHOLD

A family household is defined as any room or group of rooms and its outbuildings which occupy a building or a structurally separate part thereof and which, because of the way in which they have been constructed, reconstructed or converted, are intended to be inhabited by one or more households, and which at the date of the interview are not being used entirely for other purposes. Included in this definition are:

– Fixed households: enclosures that do not fully meet the definition of a family household because they are semi-permanent (huts, cabins), are improvised from waste materials such as cans and boxes (shacks), or were not originally conceived for residential purposes or refurbished to be used for these purposes (stables, haystacks, mills, garages, storehouses, caves, natural shelters), but nevertheless constitute the main and usual residence of one or more households.

– Family households within collective dwellings, provided that they are intended for the management, administrative or service staff of the collective establishment.

HOUSEHOLD

A household is defined as the person or group of people who jointly occupy a main family home or part of it, have a shared budget, and consume or share food or other goods with that same budget.

According to this definition, it should be noted that:

1. A household may consist of a single person (single-person household) or several persons (multi-person household) and the persons in the household may or may not be related to each other. Indeed, the household may be formed exclusively by unrelated persons, by a family together with unrelated persons or exclusively by a family.

2. A multi-person household is a group of persons who live in the same main family dwelling or part of it. Therefore, the group of people who live in a collective establishment (hospital, hotel, residence hall, etc.) does not constitute a household. However, bear in mind that within the premises of a collective establishment there may be a home, as would be the case of the director of a prison whose household is located within said premises.

3. A household is a group of people who share expenses, i.e. who have a common budget—‘budget’ being the common fund that allows the person(s) in charge of the administration of the household to cover the common expenses of the household (rent, gas, electricity, water, telephone, etc.). People who have a partially independent economy are not considered to form different households if they share most of the basic expenses with the other members of the household. In the case of a dwelling within a collective establishment, it is considered a household if it keeps its budget separate from that of the collective.

   Both those who contribute resources to the budget, collaborating to cover the household's common expenses and participating in them, and those who, not contributing resources, depend on the budget or common economy are generally understood to have a budget or common economy.

4. For the purpose of locating the number of households residing in the dwelling, it is considered in this survey that several households reside in the same dwelling only when these households maintain differentiated budgets, that is, separate economies among them (therefore having autonomy with respect to all relevant expenses: rent, gas, electricity, water, telephone, etc.) and occupy different and delimited areas of the dwelling, although they have some common room (for example, dwellings with re-letting, dwellings shared by two or more families that have independent economies, etc.).
5. For the purpose of considering the maximum number of households in a main dwelling, the following is considered:
    - When the same dwelling is only inhabited by persons who are independent of each other, who use one or more rooms on an exclusive basis and do not have a common budget (guests, re-tenants, etc.), each person shall be considered to constitute a private household, provided that the number of such persons residing in the dwelling is 5 or less than 5. In this case, each person will be considered as an independent household. When the number of persons with these characteristics residing in the dwelling exceeds 5, the dwelling is considered collective and the dwelling becomes "non-surveyable" (Example: A rooming house that has a single address with more than 5 "groups").
    - When, in the same dwelling, there reside persons who use one or more rooms exclusively and do not have a common budget (guests, re-renters, etc.) and there also reside other persons who do constitute a household and have a common budget, the household formed by the persons who do constitute a household will be considered on the one hand, and the other persons residing in the same dwelling will be considered as independent households if their number is 5 or less than 5, and the interviews must be conducted with each of them. On the other hand, if the number of these persons is more than 5, they will not be surveyed, although the group that makes up the household will be surveyed as it is considered a surveyable household.

HOUSEHOLD MEMBERS

Once the number of households in a dwelling has been determined, for the purposes of this survey, household members of the dwelling surveyed are considered to be all those persons who, sharing a common budget and goods at the expense of that budget, habitually reside in that dwelling.

To ensure that all usual residents are actually included, several questions are asked at the beginning of the questionnaire to record potential household members. From the information collected, the application establishes which persons are considered to be members of the household. The household respondent may consider a person eventually resident in the household as a member of the household, but the survey conditions do not consider them as such.

The conditions set for determining whether or not a person is a household member seek to avoid the possibility that the same individual may be interviewed in more than one household or, conversely, may not be interviewed in any household at all.

PRIMARY RESIDENCE

For the purpose of establishing who is a usual resident of a household, persons who live or spend most of their daily rest at the household's address are considered to be part of the household.

4 Incidents while collecting data their Management

From the initial sample of 37,147 dwellings selected for the ESdE2023, an effective sample of 21,085 households has been obtained. Dwellings in which it has not been possible to obtain information have been assigned an incident depending on the different situations that an interviewer may encounter in each one of them. The following is a description of the different incidents considered and the treatment defined for each of them.

A. INCIDENTS

There are three types:

– **I. Household incidents**

All households, according to their situation at the time of the interview, are classified into one of the following types:

- *I.1 Surveyable Household (E)*

  It is the one used all or most of the year as primary residence. The consideration of a dwelling as a surveyable household is the previous step to conduct the interview.

- *I.2 Unsurveyable household, which in turn might be a surveyable because it is one of the following:*

  - Empty household (V):

    The selected household is uninhabited, dilapidated or a seasonal dwelling.

  - Untraceable household (IL):

    The household cannot be located at the address given in the list of selected household, either because the address is not correct, no longer exists or for other reasons.

  - Households used for other purposes (OF):

    The selected household is entirely dedicated to purposes other than family residence, due to an error in the selection or because it changed its purpose and, therefore, does not form part of the population under study.

- *I.3 Inaccessible household (IN):*

  This is a household that cannot be accessed to conduct the interview due to climatic or geographic reasons, for example, when there are no passable roads to reach it.

- *I.4 Previously selected household (SA):*

  This is a household that has already been selected previously (less than three years ago) in the sample of any other INE survey aimed at households and having collaborated in the same, is now selected again.

– **II. Household incidents**

Once the interviewer has located the selected household and verifies that it is a main family household, i.e. it is a surveyable household, the following cases may occur as a result of the contact with the household:

- *II.1 Total respondent household (TE):*

  It is considered as such if the household agrees to provide the information and the completion of the Household Questionnaire, the Adults Questionnaire and, in the case of minors, the Minors Questionnaire is obtained.

  For the purposes of collaboration in the survey, the requirements for a household to be considered a total respondent will vary depending on whether or not there are minors in the household. Thus, a household without minor is considered to be fully surveyed when both the household questionnaire and the adults questionnaire are obtained and considered valid. In a household with children, the household questionnaire, the adults questionnaire and the minors questionnaire are considered as a total respondent when they have been obtained and are considered valid. For a questionnaire to be considered valid, it must contain a minimum of information.

- *II.2 Partial respondent household (PS)*

  This event will be assigned when a household with minors has managed to validly complete the household questionnaire and either the adults questionnaire or the minors questionnaire, but not both.

- *II.3 Non.respondent household*

  A household that is neither a full respondent nor a partial respondent will be considered as a non-respondent household, and will be affected by one of the following circumstances:

  - Negative (NH):

    The household as a whole or the person(s) contacted by the interviewer in the first instance refuses to cooperate in the survey.

  - Absence (AH)

    All household members are absent and will continue to be absent for the duration of the fieldwork in the section.

- Inability to answer (IH)

  All members of the household are unable to respond, whether due to old age, illness, lack of language skills or any other circumstance.

– **III. Incidents concerning a selected person**

These occurrences shall only be recorded in those cases where the household has the 'Partial respondent' incident and they will refer to the incident concerning the respondent whose questionnaire is missing (adults or minors questionnaire). It may be owing to the following reasons:

- *Refusal* (NP/NM)

  The person who is supposed to fill in the missing questionnaire refuses to provide the requested information.

- *Absence* (AP/AM)

  This occurs when the person selected to answer the missing questionnaire is absent and will remain so throughout the entire fieldwork period in the section.

- *Inability to answer* (IP/IM)

  The person selected to answer the missing questionnaire is unable to take part in the interview, whether due to disability, illness, lack of language skills or any other circumstance. In the case of disability or illness, this incident should be recorded when there is no other person who can answer the questionnaire as a proxy respondent.

B. HANDLING OF INCIDENTS

Each section starts with 15 incumbent households that must all be visited with the purpose of completing the survey.

There are no reserve households to replace any of the housing, household or personal incidents that occurred during the collection.

Regarding the households previously selected in another INE population survey, (SA), if this circumstance is detected in the field and the household is not willing to collaborate on this occasion, the SA definitive code is marked. If the human group wishes to collaborate, the interview will be carried out, and the corresponding collaboration incidence will be assigned.

Regarding Refusals, in the specific case that the selected person refuses to provide the information corresponding to the Adults Questionnaire, this information CANNOT be provided by any other person, nor will another person in the household be selected to fill in said questionnaire.

In the event that the minor's parents or guardian refuse to provide the minor's information, only another person in the household who is able to provide the information can be called upon, if the parents or guardian agree.

With regard to absences, in the case of the selected adult, if the absence is due to being hospitalised in a health establishment or due to incapacity, the data referring to said person may be provided another person in the household who is able to answer, and in this case there will be no impact on the household. In case of another reason for

absence, the information cannot be provided by another member of the household and the person cannot be replaced.

In the absence of those responsible for the selected minor, other sufficiently informed persons may answer the questionnaire, provided that permission is obtained from those responsible for the child.

5 Response Rate

The distribution of incidents in the households and the response rates were as follows:

Households Completed

Household total	Surveyable	Empty	Other Purposes	Unreachable	Inaccessible	Previously selected
37,147	33,782	2,222	238	768	129	8
100%	90.9%	6.0%	0.6%	2.1%	0.3%	0%

Completed households

Total Households	Respondents(ET/EP)	Household refusal	Household absence	Inab. to answer Household
33,782	21,085	5,237	7,158	302
100%	62.4%	15.5%	21.2%	0.9%

Adults questionnaires

Surveyed Households	Respondent Adult	Adult Refusal	Absent Adult	Inab. to answer Adult
21,085	21,040	19	24	2
100%	99.8%	0.1%	0.1%	0.0%

Of the 21,085 households surveyed, 3,928 included a minor among the residents, or 18.6% of the households surveyed.

Minors Questionnaires

Households Surveyed with a Minor	Respondent Minor	Minor Refusal	Absent Minor	Inab. to answer Minor
3,928	3,646	229	38	15
100%	92.8%	5.8%	1%	0.4%

Considering those households with all individual questionnaires completed (adults and minors questionnaire, if any) as ‘Surveyed Households’ and those households in which, having minors, only one of the 2 individual questionnaires has been obtained as ‘Partially Surveyed Households’, the following results are obtained:

Surveyed Households	20,758
Partially Surveyed Households	327
No Final Response	37.6%

VII Key concepts and characteristics under study

Description and structure

As mentioned above, information is collected from four different thematic modules through three questionnaires. In them, the objective variables of the statistical operation are collected, as well as the socio-economic classification variables necessary for the subsequent tabulation and analysis. The key concepts and definitions included in the survey in each module and in each questionnaire are detailed below.

As mentioned above, three questionnaires are available to collect this information:

– Household Questionnaire

– Adults Questionnaire, addressed to persons aged 15 and over

– Minors Questionnaire, addressed to persons aged 0-14 years (paediatric age).

Thus, when a household is contacted, it is asked to answer the household questionnaire, in which the composition of the household is determined, which is taken as the basis for choosing the adult person to answer the adult health questionnaire. If there are minors in the household, one of them is selected to answer the questionnaire for minors.

Therefore, a surveyed household will collect a household questionnaire with information on the persons in the household, an adults questionnaire with information on that person, and, if there are minors in the household, a minors questionnaire with the corresponding information.

The four information modules are:

1. Socio-economic variables,
2. Health status
3. Healthcare
4. Health determinants

Below we will describe the information and key features of the different modules.

1 Socio-economic variables module

This module is found in all three questionnaires: the Household Questionnaire collects socio-economic information relating to all household members and specific information regarding the reference person, and in the Adults and Minors Questionnaires, some socio-economic variables specific to the selected person that are not collected in the Household Questionnaire.

(I) In HOUSEHOLD QUESTIONNAIRE

– **Reference person (main breadwinner):** this is the household member who contributes most regularly (not occasionally) to the household budget, to cover the household's common expenses.

– **Highest level of education completed:** the highest level of education attained is obtained for each household member according to the following classification (the aim is to facilitate subsequent aggregate coding according to the National Classification of Education 2014 in levels of education attained (CNED14-A):

- *Not applicable: under the age of 10 years*

  These persons have not completed any stage of the school system and are therefore assigned this code directly.

- *Cannot read or write*

  Corresponds to code 01 of the CNED14-A

- *Incomplete primary education (attended school for less than 5 years)*

  Corresponds to code 02 of CNED14-A

- *Primary education (went to school for 5 or more years and did not reach the last year of compulsory education)*

  Corresponds to code 10 of CNED14-A.

- *First stage of Secondary Education, with or without a diploma (Year 2 ESO passed, EGB, Elementary Baccalaureate)*

  Corresponds to CNED14-A codes 21, 22, 23 and 24

- *Baccalaureate education*

  Corresponds to code 32 of CNED14-A

- *Intermediate vocational education or equivalent*

  Corresponds to CNED14-A codes 33, 34, 35, 38 and 41

- *Advanced vocational education or training or equivalent*

  Corresponds to CNED14-A codes 51 and 52

- *University qualifications or equivalent*

  Corresponds to CNED14-A codes 61, 62, 63, 71, 72, 73, 74, 75 and 81

– **Situation regarding the relationship with the economic activity:**

- *Working:*

  This includes persons who at the time of the interview have a contractual relationship for which they receive remuneration in cash or in kind, persons who are self-employed and members of production cooperatives working in them.

- *Unemployed*

  Unemployed, or seeking job, are all persons who are without work on the date of the interview, and who are also available for work within two weeks and are looking for work, i.e. have taken concrete steps during the last four weeks to find paid employment or to become self-employed.

- *Pensioner or early retiree*

  Persons in this situation are considered to be those who have had a previous economic activity and who have abandoned it due to age or other causes other than invalidity, their livelihood being the pensions and/or income obtained from their previous activity.

Persons receiving a non-contributory old-age/retirement pension are also included, i.e. a periodic benefit that is granted on account of age and does not derive from previous economic activity.

Persons receiving a pension derived from the contribution of another person (widowhood, orphanhood, etc.) are also considered under this heading.

Persons who **take early retirement** due to workforce downsizing (with a reduction of the normal pension amount) without meeting the general legal requirements for a retirement pension are also classified under this heading.

- *Studying*

  Persons are considered to be in this situation if, at the time of the interview, they are receiving instruction at any level of training.

- *Unable to work (including disability pension or permanent incapacity)*

  Persons are considered to be in this situation if they are indefinitely (not temporarily) incapacitated, whether or not they have previously worked, and whether or not they are receiving a disability pension.

- *Mainly engaged in housework (non-economic activity)*

  Persons who are mainly engaged in unpaid care of their own household (housekeeping, childcare, etc.) are considered to be in this situation.

- *Other situations*

  This category includes all persons who do not fall into any of the above categories, in particular the following: renters (persons who, without being employed or self-employed, receive income from property and/or other investment income); persons temporarily deprived of their liberty; and persons who, without being economically active, receive public or private assistance.

– **Professional Situation**

- *Employee.*

  An employee is a person who works for a public (public sector employee) or private (private sector employee) company or body and receives a salary, commission, bonus, performance-related payments or any other form of regulated remuneration in cash or in kind.

- *Businessman/woman or professional with paid employees.*

  This is any person who runs their own business, industry or trade (except for cooperatives) or engages on their own account in a liberal profession or trade and who, for this reason, hires one or more employees or workers who are paid a salary, daily wage, commission, etc.

- *Businessperson without employees or independent workers.*

  A person who runs their own business, industry, trade, agricultural holding or who is self-employed in a liberal profession or trade and does not employ salaried staff. This includes those who work in their own enterprise with the help of only family members without regulated remuneration.

- *Family assistance.*

  This situation applies to people who work without regulated remuneration in the company or business of a family member with whom they live.

- *Member of a cooperative.*

  Any member of a production cooperative who works there.

- *Other situations.*

  Persons who cannot be included in any of the previous sections

– **Type of income**

- *Self-employment or work as an employee.*

  Self-employment income is income earned as a self-employed person, entrepreneur or employer in the course of business, professional or artistic activities, whether such income derives from work done in previous periods or is an advance payment on future work.

- *Unemployment benefits and allowances*

  This is the income received by the unemployed for a certain period of time, after having worked for a certain contribution period (benefits) or after having exhausted the unemployment benefit and fulfilling one of the circumstances established by law (subsidies). Other unemployment benefits or allowances are also included.

- *Retirement, widowhood, orphanhood or other dependants' pension*

  The contributory retirement pension comprises the ordinary retirement pension and the various types of early retirement to which the pensioner is entitled.

  The non-contributory retirement pension is a financial benefit granted to those citizens who, being in a situation of retirement and in need of protection, have not contributed long enough to obtain the benefits of the contributory level.

  Widow's, widower's, orphan's and other dependants' pensions are benefits intended to compensate for the financial need that arises, for certain persons, from the death of another person, provided they meet the requirements.

- *Disability or incapacity pension*

  A financial benefit that aims to cover the loss of salary or professional income suffered by a person who is affected by a pathological or traumatic process derived from an illness or accident, and whose working capacity has been reduced or cancelled in a presumably definitive manner. It can be contributory (disability) or non-contributory (invalidity).

- *Financial benefits for dependent children or other economic benefits such as family benefits*

  The economic benefits for dependent children are the income received in the form of economic allowances for each child under 18 years of age, or older children affected by a disability to a degree equal to or greater than 65%, who are dependent on the beneficiary. The beneficiaries can also be the disabled themselves, provided they are orphans of both parents, as well as children abandoned by their parents, whether or not they are in foster care.

- *Housing-related benefits or grants*

  They involve the intervention by public authorities to help households meet the costs associated with housing, e.g. rent subsidies or resident owner-occupiers.

- *Education-related benefits or grants*

  Grants, scholarships and other study aids received by students.

- *Other regular income/Other regular allowances or social benefits (social integration wage, etc.)*

  This is the regular income received by the household without any labour consideration and not covered above.

(II) In ADULTS QUESTIONNAIRE

– **Highest level of studies completed by the selected adult:** the highest level of studies achieved by the selected adult is obtained, but this case with a 2-digit detail according to the CNED14-A

– **Type of working day:** This is the time that each worker spends performing the work for which they have been hired. It is counted by the number of hours that the employee has to perform their work activity within the period of time in question.

  - *Split shift:* This is the working day that includes at least 1 hour of rest which is not counted as time worked.

  - *Continuous working day:* This is the daily working day that is worked continuously for more than 6 hours, with a rest period of no less than 15 minutes, which is counted as time worked. During this period, work may be performed in the morning, in the afternoon or at night (**night work** is defined as work performed between 10 p.m. and 6 a.m.).

  - *Reduced working hours:* It is a shorter working day as a result of the particular physical circumstances in which the work is carried out.

  - *Shift work:* It is any form of organisation of work in a team whereby workers successively occupy the same jobs, according to a certain rhythm, continuous or discontinuous, which implies that the worker needs to provide his services at different times in a given period of days or weeks.

(III) In MINORS QUESTIONNAIRE

In the minors questionnaire, the Socio-demographic Variables Module is reduced to collecting information on the child's country of birth and nationality, and parents' country of birth.

2 Health Status Module

This module collects information on perceived health status, chronic diseases, accidents, activity restriction, absence from work due to health problems, physical and sensory limitations, limitations in performing activities of daily living and mental health.

(I) ADULTS QUESTIONNAIRE

– **Overall health status**

Person's perception of their overall health status in the last 12 months.

Five levels are distinguished in the self-assessment of health status:

- Very good
- Good
- Average
- Bad
- Very bad

– **Chronic or long-term illnesses**

The aim is to find out whether the respondent has a chronic or long-term illness or health problem, i.e. of a lasting or permanent nature, which may or may not require care over a long period of time. It may refer to isolated conditions, e.g. pain.

'Chronic or long-term' refers to illnesses or health problems lasting at least 6 months. Temporary problems are not considered, but seasonal or recurrent problems are.

– **Limitations due to health problems in carrying out normal activities. Degree of limitation and type of problem.**

The aim is to find out whether the person has been limited in their usual activities due to a health problem. It should be assessed against generally accepted public norms for the activities that people do on a regular basis.

Degrees of severity collected:

- Seriously limited
- Limited, but not severely
- Not at all limited

The **type of problem that caused the limitation(s)** in performing activities of daily living is investigated.

- *Physical* (causing difficulty in moving, speaking, seeing, hearing, as well as restrictions of bodily functions. They may be diseases of the nervous system (multiple sclerosis, essential tremor, chorea, etc.), muscular diseases (rheumatism), cerebro-vascular accidents (haemorrhages, thrombosis and cerebral embolisms), after-effects of trauma, congenital anomalies, etc.)
- *Mental* (where the difficulty in performing activities is caused by a mental illness and does not cause any physical limitation or problem. Example: Depression, dementia and, in general, psychosis and neurosis)
- *Both* (diseases of the nervous system that initially present with physical disorders, such as movement difficulties, but may have mental manifestations. Examples: Parkinson's disease, which initially presents movement disorders and may progress to dementia, some degrees of infantile cerebral palsy with mental

retardation, etc. It also includes mental illnesses with such a significant degree of impairment that they also cause physical problems)

– **Dental and oral health status**

  Person's perception of their dental and oral health status

  In the self-assessment of dental and oral health status, 5 levels are distinguished:

  - Very good
  - Good
  - Average
  - Bad
  - Very bad

– **Diseases and health problems**

  The aim is to investigate what kind of long-term illnesses or health problems the population has ever suffered from, which ones they have suffered from in the last twelve months and whether they have been diagnosed by a doctor.

  Types of diseases and health problems:

  - High blood pressure
  - Heart attack
  - Angina pectoris, coronary heart disease
  - Other heart diseases
  - Varicose veins in the legs
  - Osteoarthritis (excluding arthritis)
  - Chronic back (cervical) pain
  - Chronic (lumbar) back pain
  - Chronic allergy, such as rhinitis, conjunctivitis or allergic dermatitis, food or other allergy (excluding allergic asthma)
  - Asthma (including allergic asthma)
  - Chronic bronchitis, emphysema, chronic obstructive pulmonary disease (COPD)
  - Diabetes
  - Stomach or duodenal ulcer
  - Urinary incontinence or urine control problems
  - High cholesterol
  - Cataracts
  - Chronic skin problems
  - Chronic constipation
  - Cirrhosis, liver dysfunction

- Alzheimer's disease and other forms of dementia
- Depression
- Chronic anxiety
- Other mental problems
- Stroke (embolism, cerebral infarction, cerebral haemorrhage)
- Frequent migraine or headache
- Haemorrhoids
- Malignant tumours
- Osteoporosis
- Thyroid problems
- Kidney problems
- Prostate problems (men only)
- Problems of the menopausal period (women only)
- Permanent lesions or defects caused by an accident

– **Accident rate**

The aim is to find out whether the person has had an **accident** (a fortuitous and unforeseen event that happens to the individual and causes identifiable bodily harm) in the last 12 months of one of the following types:

- *Traffic accident***:** all accidents occurring on public roads, public or private car parks provided that the accident does not occur in the course of work. The accident can be as a driver, passenger or pedestrian. A vehicle must be involved in the accident.

  Accidents involving trains, aircraft or any type of vessel are not considered. Accidents occurring while commuting from home to work are considered traffic accidents.

- *Accident at home***:** Any accident occurring at home regardless of the activity being carried out. Accidents in the home are accidents that occur in the home or in external areas of the property (stairs, doorway, garden, garage, etc.). It can refer to one's own home or to someone else's home.

- *Accident during leisure time***:** These are accidents occurring in leisure time excluding those that are included in accidents at home or in traffic accidents.

– **Medical care following an accident.**

The type of medical care received is investigated in case of having had any of the above accidents in the last 12 months (and in case of having had several accidents, in the most serious one).

Types of medical care:

- I was admitted to hospital
- He/she went to an accident and emergency ward

- He/she sought medical advice from a doctor or nurse
- Did not seek any medical advice or intervention

– **Absenteeism due to health problems.**

The following information is collected:

- Absence from work due to health problems in the last 12 months
- Number of days absent from work due to health problems in the past 12 months

Only absence from work during full working days (including public holidays between working days of absence) is considered.

Absence from work does not have to be certified by a doctor. If the person did not work for a period of time and then returned to work gradually, only the days that they were completely absent should be counted.

– **Physical and sensory limitations**

The aim is to measure the functional limitations (physical and sensory) that affect the health status of the population in terms of ability to function, regardless of the reason that caused the limitation. The International Classification of Functioning, Disability and Health (ICF) has been adopted.

The characteristics under study are the following:

- *Vision* (research on difficulty seeing, even when wearing glasses or contact lenses)
- *Hearing* (research on the difficulty hearing in a quiet place as well as in a noisier place, even when wearing a hearing aid)
- *Walking* (research on the difficulty walking 500 metres on level ground without any assistance).
- *Problems going up and down flights of stairs* (research on difficulty going up or down 12 steps without any assistance)
- *Problems remembering or concentrating*
- *Problems biting or chewing food (people over 55 years old)*

The levels of difficulty considered were:

- No difficulty
- Some difficulty
- A lot of difficulty
- Unable to do so

– **Limitation in performing activities of daily life**

The aim is to measure the difficulties in carrying out activities of daily living in people aged 55 and over according to the International Classification of Functioning, Disability and Health (ICF), as well as the help received or the need for help to carry out these activities (both technical and personal help). This provides the first basic indicator on the prevalence of disability in the population.

Activities of daily living considered*:*

- *Feeding oneself***:** The interviewee is able to take food from the plate and bring it to their mouth, is able to bring a glass to their mouth, cut food, use a fork, a spoon, spread jam or butter on a slice of bread, salt food, etc.

  This activity excludes shopping and cooking.

- *Sitting down, getting up from a chair or getting out of bed, lying down***:** The interviewee should consider their difficulty in performing these activities without considering any kind of assistance; managing to stand up is included. In case the person has different degrees of difficulty in performing the two activities, the interviewer has to pick up the one that offers the higher degree of difficulty for the respondent.

- *Dressing and undressing***:** includes taking clothes from the wardrobe or drawers, putting them on, buttoning clothes, tying shoes. In case the person has different degrees of difficulty in performing the two activities, the interviewer has to pick up the one that offers the higher degree of difficulty for the respondent.

- *Going to the toilet***:** refers to the following activities: using toilet paper, wiping, taking off and putting on clothes before and after toileting.

- *Showering or bathing:* refers to the following activities: washing and drying the whole body, getting in and out of the shower or bath. In case the respondent has different degrees of difficulty in these two activities, the interviewer should collect the one that is easier for the respondent.

The levels of difficulty considered were:

- No difficulty
- Some difficulty
- A lot of difficulty
- Unable to do so

– **Limitations in performing household-related activities.**

The aim is to measure in people aged 55 and over the difficulties in performing household-related activities according to the International Classification of Functioning, Disability and Health (ICF), as well as the help received or the need for help to perform these activities (both technical and personal help). It is the first basic indicator on the prevalence of disability in the population.

Household-related activities considered:

- *Preparing one's own food*: the person is able to prepare meals for themselves
- *Using the phone*: the person can make calls and answer the phone
- *Shopping*: the person can do the shopping without the help of another person.
- *Taking their medication*: the person does not need help to take their own medication. This activity only refers to the fact that the person is able to take their own medication and remember the dosage, not to the fact that they buy the medication from the pharmacy.

- *Light housework*: the person is able to carry out activities such as: cooking, washing dishes, ironing, childcare, etc.
- *Heavy housework*: the person is able to perform activities such as: carrying heavy shopping for more than 5 minutes, moving heavy furniture, general house cleaning, scrubbing floors with a brush, cleaning windows, etc.
- *Managing their own money:* e.g. Paying their own bills.

The levels of difficulty considered were:

- No difficulty
- Some difficulty
- A lot of difficulty
- Unable to do so

– **Pain**

It measures the intensity of physical pain experienced by the respondent (six levels) and the interference of the pain with daily activities (both in their usual work and in their leisure time).

Pain covers an important domain of health status, specifically in terms of physical state of well-being. The pain questions included are part of the SF-36. The time reference is the last 4 weeks.

– **Mental health**

The section on mental health includes information on mental well-being, depressive symptoms and stress at work.

– **WHO 5 Mental Well-being Index**

The aim is to capture, by means of a short questionnaire, the state of mental well-being in which the person has been in the last 2 weeks.

- I have felt cheerful and in a good mood
- I have felt calm and relaxed
- I've felt active and energetic
- I woke up refreshed and rested
- My daily life has been full of things that interest me

– **Mental Health in Adults PHQ-8 questionnaire**

The aim of the questions in the mental health sub-module is to assess the prevalence of depression according to the criteria of the Diagnostic and Statistical Manual of Mental Disorders, version 4. In order to do this, the questionnaire uses the instrument Patient Health Questionnaire (PHQ-8).

With the time reference of the previous two weeks, the person assesses the frequency with which they have experienced the following problems or situations:

- Little interest or joy in doing things.
- Feeling of being down, depressed or in despair.

- Trouble falling asleep, staying asleep, or sleeping too much.
- Feeling tired or having low energy.
- Poor appetite or over-eating.
- Feeling bad about oneself, feeling like one is a loser or that they have disappointed their family or themselves.
- Trouble concentrating on something, such as reading the newspaper or watching television.
- Moving or speaking so slowly that others may have noticed. Or the opposite: being so restless or agitated that you have been moving from side to side more than usual.

Possible answers to indicate frequency are:

- Never
- Several days
- More than half of the days
- Almost every day

(II) MINORS QUESTIONNAIRE

In addition to the variables already defined in the adult questionnaire, the following variables are collected:

– **Accident rate**

In addition to those variables included in the adult questionnaire, accidents at the place of study, school or nursery are also collected.

– **Diseases and health problems in the child population.**

The aim is to investigate what kind of long-term illnesses or health problems the population of 0-14 years old has ever suffered from, which ones they have suffered from in the last twelve months and whether they have been diagnosed by a doctor.

Types of diseases and health problems:

- Chronic allergy (excluding allergic asthma)
- Asthma
- Diabetes
- Malignant tumours (includes leukaemia and lymphoma)
- Epilepsy
- Behavioural disorder (including hyperactivity)
- Mental disorders (depression, anxiety, etc.)
- Permanent lesions or defects caused by an accident
- Autism or autism spectrum disorders (ASD) (only 3-14 years old).

– **Health-related quality of life in the child population.**

The objective is to assess the health-related quality of life in the child population, according to the child's perspective in terms of their physical, mental and social well-being, and to identify the population at risk in terms of their subjective health. A generic questionnaire is used for this purpose, the parent version of the KIDSCREEN-10 instrument[1] in the population aged 8-14 years. Although the informant is indirect, they answer what they think the child would answer. With the time reference of the previous week, the person assesses the frequency with which the child has had the following situations or problems:

- The child has been feeling fit and well
- The child has felt full of energy
- The child has felt sad
- The child has felt lonely
- The child has had enough time for themselves
- The child has been able to do the things they wanted to do in their free time
- The child had fun with friends
- The child has done well at school
- The child has been able to pay attention

Possible answers to indicate frequency are: Never, Almost never, Sometimes, Almost always, Always.

– **Mental health.**

The aim of the questions in the mental health sub-module is to assess the prevalence of risk of poor mental health in the population aged 4-14 years. The *Strengths and Difficulties Questionnaire* (SDQ) sub-module[2]is used for this purpose. With the time reference of the last six months, the person assesses their behaviour:

- Takes other people's feelings into account
- Is restless, hyperactive, can't keep still for long
- Frequently complains of headache, stomach ache, or nausea
- Frequently shares sweets, toys, pencils. etc. with other children
- Frequently has tantrums or a bad temper
- Is rather solitary and tends to play alone
- Is usually obedient, usually does what adults ask him/her to do
- Has many worries, often seems restless or worried

[1] The version adapted by the authors for the Eurobarometer is used, with one question less than the original version. *The KIDSCREEN Group Europe. The KIDSCREEN Questionnaire Handbook*. Lengerich, Germany. Pabst Science Publishers; 2006.

[2] Goodman R. *The Strengths and Difficulties Questionnaire: a research note*. J Child Psychol Psychiatry. 1997; 38:581-6.

- Offer help when someone is hurt, upset, or sick
- Is constantly fidgeting and rebellious
- Has at least one good friend
- Often gets into fights with other children or harasses them
- Often feels unhappy, demotivated or tearful
- Is generally popular with other children
- Is easily distracted, has a short attention span
- Is nervous or dependent when faced with new situations, easily loses confidence in him/herself
- Treats younger children well
- Often lies or misleads
- Other children pick on them or tease them
- Often offers to help (parents, teachers, other children)
- Think things through before doing them
- Steals at home, at school, or elsewhere
- Gets along better with adults than with other children
- Has many fears, is easily frightened
- Finishes what he/she starts, has good concentration

The response options to indicate their behaviour are: Not true, Somewhat true, Absolutely true.

3 Health care module

This module collects information on the type of health services received: medical consultations, health coverage, consultations with a stomatologist, diagnostic tests and other services, hospitalisations, day hospital and use of emergency services, unmet need for medical care, consumption of medicines and preventive practices.

3.1 MEDICAL CONSULTATIONS

The aim is to investigate the frequency of visits to primary and specialised outpatient medical consultations, place of the consultation, functional dependence of the doctor, reason for the consultation, waiting time, non-urgent tests, consultations with other health professionals and home care services.

The following characteristics of the consultations carried out are investigated:

– *Last time they consulted a general practitioner or family doctor:*

- In the last four weeks

- Between four weeks and twelve months
- Twelve months ago or more
- Never been to the doctor

– *Number of times they have consulted a general practitioner or family doctor in the last four weeks*

– *Last time they consulted a specialist:*

- In the last four weeks
- Between four weeks and twelve months
- Twelve months ago or more
- Never consulted a specialist

– *Number of times they have consulted a specialist in the last four weeks*

– *Place of last consultation within the last four weeks*

- Health Centre/Walk-in Centre
- Out-patient clinic/Medical specialities centre
- Hospital out-patient consultation
- Non-hospital A&E service
- Hospital A&E service
- Company doctor consultation
- Private doctor consultation
- Employer or workplace
- Interview subject's address
- Telephone consultation
- Other place

Definitions:

- **Medical consultation.** Any visit to a licensed medical professional (in person or by telephone) for diagnosis, examination, treatment, follow-up, advice or any other procedure. Medical check-ups and requests for prescriptions are also considered to be medical consultations.
- **Health Centre/Walk-in Centre**: Centres providing primary care assistance to Social Security beneficiaries. Care is provided by general practitioners, paediatricians and nurses, but they can also rely on a range of support services that deal with problems related to their own area of specialisation.
- **Out-patient clinic/Medical specialities centre***:* Centres providing specialised care for social security beneficiaries. In its outpatient modality, it covers all legally recognised medical and surgical specialities. The patient's access is, as a general rule, by indication of the primary care physician for outpatient care*.*

- **Hospital out-patient consultation***:* Consultations performed in the hospital itself for those patients who need diagnostic resources, treatment and/or rehabilitation that cannot be provided at the primary care level, including the performance of minor surgical procedures. They do not require hospital admission, but are performed on an outpatient basis.
- **Non-hospital A&E service***:* Service set up in the outpatient clinic with professionals who provide urgent assistance outside normal opening hours.
- **Hospital A&E service***:* A service constituted in the hospital, understood as a service with an organised staff of professionals that provides emergency care 24 hours a day.

– *Reason for consultation*

- Diagnosis of a disease or health problem
- Accident or assault
- Check-up
- Prescription dispensing only
- Record of discharge, confirmation or admission
- Other reasons

Definitions:

- ***Diagnosis of a disease or health problem****:* The reason for the consultation is a condition, discomfort or disease that requires medical examination for proper diagnosis and treatment, if appropriate.
- ***Accident or assault***: The reason for consultation is due to an eventuality in which a person is voluntarily or involuntarily injured.
- ***Check-up*****:** The reason for the medical consultation is the control and continuous monitoring of diseases or processes already diagnosed and under treatment.
- ***Prescription dispensing only***: The reason for the consultation is exclusively the request for medicines for treatments already in place.
- ***Record of discharge, confirmation or admission***: When the reason for the consultation is to obtain the sick leave report, its confirmation or the discharge report.
- ***Other reasons****:* For example: request for reports, certificates or other documents.

– *Functional dependence of the doctor*

It refers to the institution or system in which they perform their healthcare work

- Public Health Service (Social Security)
- Medical society
- Private consultation
- Other (company doctor, etc.)

Definitions:

- ***Public Health Service (Social Security):*** A doctor is considered to be a Social Security doctor when they depend on the National Health System, which includes the health services of the Autonomous Communities and the rest of the public entities such as councils, provincial councils, local corporations or National Institute of Health Management (INGESA for its acronym in Spanish).
- ***Medical society****:* This includes private healthcare companies (ASISA, ADESLAS, DKV, SANITAS, PREVIASA, etc.).
- ***Private consultation****:* This is a consultation by a private doctor (a doctor who, in the free exercise of his/her profession, receives direct remuneration from the patient for the medical act).
- ***Other****:* Includes company doctors, mutual insurance companies for work and occupational diseases, medical equalisation, traffic accident insurers, NGOs, etc.

– *Use of other services in the last 12 months*

Respondents are asked whether the following services have been visited:

- Physiotherapist
- Psychologist, psychotherapist, or psychiatrist
- Nurse and/or midwife

Definitions:

- ***Physiotherapist:*** specialist who treats bone, muscle, circulatory or nervous system problems for the recovery, rehabilitation and prevention of somatic dysfunctions or disabilities with movement therapy, therapeutic massage and application of physical stimuli, electrotherapy, hydrotherapy, balneotherapy, etc. Therapies can be carried out in public hospitals, private practices, day hospitals, schools, gyms, etc.
- ***Psychotherapist:*** a graduate in medicine or psychology who is professionally engaged in the application of psychotherapy, understood as scientific treatment of a psychological nature for physical or psychological manifestations.

– *Analysis carried out in the last 12 months*

– *Diagnostic tests performed in the last 12 months*

Respondents are asked whether the following tests have been carried out:

- X-ray
- CAT or scanner
- Ultrasonography
- Magnetic resonance

– *Visits to alternative medicine practitioners (homeopath, acupuncturist, naturopath, etc.) in the last 12 months*

– *Use of home care services in the last 12 months*

Respondents are asked whether the following social and health care services at home have been used

- House call by a nurse or midwife
- Home help for household chores or for the elderly
- Home-delivered meals for the elderly (only for people over 65 years of age)
- Special home transport services to attend a medical service, a day hospital, recreational activities, etc.
- Other home care services

Definitions:

- ***Home care****:* refers to both medical and non-medical care for people with some kind of physical or mental illness, with some kind of disability or for people who are unable to carry out personal care activities or household chores due to their advanced age. Includes home-based services provided by a nurse or midwife in a hospital, by agencies, associations or by volunteers.
- ***Home care provided by a nurse or midwife****:* refers to both medical and non-medical care provided by a nurse or midwife to persons with some form of physical or mental illness, with some kind of disability or to persons who, because of old age, are unable to perform personal care activities or household chores.
- ***Home help for housework or for the elderly****:* these services include tasks such as cleaning the house, preparing meals, doing the laundry, ironing, giving or reminding about medication, helping with household economic or financial tasks, shopping, etc. offered by local councils, private associations, NGOs, etc.
- ***Home-delivered meals for the elderly****:* a service that provides meals to people who cannot leave home to do their shopping or who have difficulty preparing their own food because they suffer from some kind of illness or disability or because their advanced age prevents them from doing so.
- ***Special home transport services*****:** services that enable people who are confined to their homes due to disability or old age to move around. Transport can be for a variety of reasons.
- **Other home care services***:* includes personal development support for people with physical or mental illnesses or disabilities who are isolated because of their situation.

3.2 STOMATOLOGY, DENTIST AND DENTAL HYGIENIST CONSULTATIONS

The aim is to find out how long the person has been attending a stomatology consultation, the type of care received, the functional dependence of the practitioner seen and the condition of the person's teeth and molars.

The following characteristics are investigated:

– *Last visit to a dentist, stomatologist or dental hygienist*

- Three months ago or less
- More than three and less than six months ago
- Six or more years but less than twelve years ago
- Twelve months ago or more
- Never

– *Type of assistance*
  - Examination or check-up
  - Mouth cleaning
  - Fillings (obturations), root canals
  - Extraction of a tooth
  - Caps, bridges or other prostheses
  - Treatment for gum disease
  - Orthodontics
  - Fluoride application
  - Implants
  - Other care type

Definitions:

- **Consultation with the dentist***:* Any visit to a licensed professional (dentist, stomatologist or dental hygienist) for examination, advice, treatment or review teeth or mouth problems.
- **Check-up:** The reason for the consultation is the continuous monitoring and follow-up of diseases or processes already diagnosed and under treatment.
- **Mouth cleaning***:* Ultrasonic device to remove tartar and dirt from the teeth.
- **Filling***:* Treatment that consists of filling a tooth or molar affected by caries with paste.
- **Endodontics***:* Therapeutic techniques for dental nerve disorders.
- **Caps, bridges and other prostheses***:* A restoration that replaces or covers one or more teeth, supported, fixed, retained or stabilised by adjacent remaining tooth or gingival structures.
- **Treatment for gum disease**: Treatment of bleeding gums, shifting teeth, oozing pus ("pyorrhoea") or any other gum disease.
- **Orthodontics***:* Placement of appliances in the mouth to correct improper positions of teeth or molars.
- **Fluoride application***:* Fluoride application is defined as only fluoride applied by the dentist or hygienist (does not refer to fluoride contained in toothpaste).
- **Implants***:* Replacement of a missing tooth with a biocompatible artificial tooth permanently anchored in the jawbone.

– *Functional dependence of the professional*

- Public Health (Social Security, town or city council, private consultation financed by the autonomous government)
- Medical society
- Private consultation
- Other

Definitions (See definitions in the section on medical consultations).

– *Condition of teeth and molars*

- Has tooth decay
- Has had teeth/molars removed
- Has filled (obturated) teeth
- Their gums bleed when brushing their teeth or it happens spontaneously
- Their teeth/molars move
- Wears crowns, bridges, other types of prostheses or dentures
- Missing teeth/molars that have not been replaced by prostheses
- Has or keeps all of their natural teeth/molars

Definitions:

- **Caries***:* It consists of the erosion of the enamel and ivory of teeth and molars by the action of certain bacteria.

7.3 HOSPITALISATIONS, EMERGENCY SERVICES AND HEALTH INSURANCE

This sub-module covers both inpatient and day hospitalisation, as well as the use of emergency services. The type of health insurance the respondent has is also investigated.

HOSPITALISATIONS:

This section is aimed at people who have spent at least one night in hospital in the last twelve months.

The characteristics researched are:

– *Hospitalisation in the last twelve months, excluding deliveries or caesarean sections.*

Definitions:

- **Hospitalisation**: It is any admission to a hospital for medical or medical-surgical care that involves at least one overnight stay or an assigned bed. It is not considered hospitalisation to stay less than 24 hours in an emergency department or in another department for diagnostic or therapeutic tests. The stay of persons accompanying the sick person is also not considered hospitalisation, even if they occupy a bed and stay for more than one day.

- **Hospital:** Inpatient health establishment whose main purpose, regardless of its name, is to provide medical or medical-surgical care to patients admitted to it. This does not include old people's homes, orphanages, day-care centres, charity homes, etc.

– *Number of times hospitalised in the last twelve months, excluding deliveries or caesarean sections.*

– *Number of nights spent in hospital in the last twelve months*

– *Hospitalisation for childbirth or caesarean section (women under 50 years of age)*

– *Number of nights spent in hospital at last admission*

– *Reason for admission*

- Surgery
- Medical study for diagnosis
- Medical treatment without surgical operation
- Childbirth (including caesarean section)
- Other reasons

– *Hospitalisation costs to be borne by:*

- Public Health Service (Social Security)
- Mandatory mutual insurance food (MUFACE, ISFAS, etc.)
- Private medical society
- Paid for by you or by your household
- Paid for by other people, bodies or institutions

Definitions:

- **Hospitalisation costs to be borne by***:* It consists of finding out which body or institution is ultimately responsible for the costs of the interviewee's hospitalisation. In the case where the initial funder of these costs (e.g. ASISA) does so on the basis of an agreement with a compulsory mutual society (e.g. MUFACE), the category is "Mutual benefit".

<u>DAY HOSPITAL:</u>

The aim is to find out whether the person has been seen in a day hospital in the last twelve months, what was the reason for the last admission to a day hospital and the number of times they have visited the day hospital.

– Admission to a day hospital in the last twelve months for an operation, treatment or test. Number of days

Definitions:

- **Day hospital admission**: admission to a hospital bed for scheduled diagnosis and/or treatment and discharge before midnight of the same day. Admissions in bed or folding bed are included. Stays in A&E and under observation are not included.

EMERGENCY SERVICES:

The aim is to study whether the person has had to use any emergency service in the last twelve months for any problem or illness and the frequency, as well as, with respect to the last time they visited, the place where they were attended, the time from when they began to feel ill until they asked for assistance, the time from when they asked for assistance until they were attended and the type of department where they were attended.

– *Use of an emergency department in the last twelve months*

Definitions:

- **Emergency services**: These are services that deal with clinical processes, whatever their nature, that require urgent diagnostic and therapeutic guidance.

– *Number of times they used an emergency department in the last twelve months*

– *Place where they were treated*

- The place where he/she was at the time (home, school, kindergarten, etc.)
- In a mobile unit
- In an emergency centre or service

– *Type of emergency service*

- Public Health Hospital (Social Security)
- Non-hospital emergency centre or service of the Public Health system (Social Security). For example, health centre, outpatient clinic etc.
- Sanatorium, hospital or private clinic
- Private emergency service
- Homeless shelter or town or city council emergency service
- Other service type

Definitions:

- ***Non-hospital emergency centre or service of the Public Health system (Social Security)*:** A constituted emergency service, understood as a service that has a staff of professionals who provide urgent assistance. These services are located in primary care or outpatient centres with emergency care (points of continuous care) and operate outside the normal opening hours of primary care centres.

  They also include the medical emergency coordination centres (061, 112, etc.) which operate 24 hours a day and have specialised health teams for emergency assistance at home and in the street.

HEALTH INSURANCE:

The types of health insurance of which the person is a policyholder or beneficiary are investigated.

– *Types of insurance*

- Public Health Service (former Social Security)

- State Mutual Benefit Funds (MUFACE, ISFAS, MUGEJU) partnered with the Spanish Social Security Agency
- State Mutual Benefit Funds (MUFACE, ISFAS, MUGEJU) partnered with a private insurer
- Private medical insurance, arranged on an individual basis (medical societies, professional associations, etc.)
- Health insurance arranged by the employer
- I don't have medical insurance
- Other situations

Definitions:

- **Public health***:* This includes people who are entitled to be treated by the health services of the Social Security or the Health Service of the corresponding Autonomous Community. They are holders or beneficiaries of a Social Security card or health card because they are registered with the Social Security (active worker or pensioner, registered as unemployed, or without sufficient economic resources), or because they are foreigners protected by the Law on Foreigners, or EU citizens residing in Spain. Also included in this section are persons who contribute and are directly attached to the health service of the autonomous community in which they reside.

  This type of health cover is exceptionally compatible with that of *State Mutual Benefit Funds affiliated with Social Security* and *State Mutual Benefit Funds affiliated with private insurance*. For example, it is possible for a civil servant to have MUFACE health coverage with health benefits from the Social Security and at the same time have a business as a self-employed person and therefore be insured by the Social Security. A civil servant with MUFACE health coverage with Social Security health benefit does not appear in the Social Security option.

- **State Mutual Benefit Funds (MUFACE, MUGEJU, ISFAS) partnered with the Spanish Social Security Agency:** It includes civil servants, military and judicial civil servants of the State (affiliated to MUFACE, MUGEJU or ISFAS) and their respective beneficiaries, when they have chosen to receive health care from the public health system.

  This type of health coverage is exceptionally compatible with *Public Health coverage (Social Security).*

- **State Mutual Benefit Funds (MUFACE, MUGEJU, ISFAS) partnered with a private insurer**: It includes civil servants, military and judicial civil servants of the State (affiliated to MUFACE, MUGEJU or ISFAS) and their respective beneficiaries, when they have chosen to receive health care from private entities and organisations (ADESLAS, ASISA, DKV, SANITAS, etc.). This section includes users who, being affiliated to the civil servants' mutual insurance schemes and having chosen private insurance companies, because they live in rural areas and through special agreements, receive family or general medicine and paediatric care from the public health system.

This type of health cover is exceptionally compatible with the *public health system (Social Security)* and with the *State Mutual Funds covered by the Social Security system*.

- **Private medical insurance, arranged on an individual basis (medical societies, Professional Associations, etc.):** It includes persons who have personally purchased policies with insurance companies to receive health care in hospitals, centres and clinics that are private or dependent on the insurance companies with which they have taken out such policies.
- **Private health insurance arranged by the employer:** It includes persons who are entitled to receive health care through private companies contracted or arranged by the company in which they work. Generally, this private insurance covers workers and their families.
- **Uninsuranced:** This includes people who are not entitled to public health care, nor do they have any kind of insurance individually or by their employer with private companies, and when they need it, they are attended by doctors to whom they pay directly.

  This option is incompatible with any other option.
- **Other situations:** Persons referring to situations not covered in the previous sections, e.g. uninsured undocumented individuals will be included.

  This option is incompatible with any other option.

3.4 CONSUMPTION OF MEDICINES

The aim is to investigate whether the person has taken medication in the last two weeks, which ones they have taken and which ones were prescribed to them.

– *Use of medication prescribed by a doctor in the last two weeks.*

– *Use of medicines not prescribed by a doctor in the last two weeks.*

– *Type of medicine taken in the last two weeks and if prescribed by a doctor*

- Medicines for catarrh, flu, throat, bronchi
- Pain-killing medications
- Medications for reducing a fever
- Supplements such as vitamins, minerals, tonics
- Laxatives
- Antibiotics
- Tranquillizers, sedatives, sleeping pills
- Medication for allergy
- Medicines for diarrhoea
- Medicines for rheumatism
- Heart medicines

- Blood pressure medicines
- Medicines for the stomach and/or digestive disorders
- Antidepressants, stimulants
- Pills to prevent pregnancy (for women only)
- Hormones for menopause (for women only)
- Weight-loss medications
- Cholesterol-lowering medications
- Medication for diabetes
- Thyroid medications
- Homeopathic products
- Natural remedy products
- Other medicines

Definitions:

- **Medicines***:* Only proprietary medicinal products, magistral formulae, officinal formulae or preparations and ready-made medicinal products are medicinal products.

  Personal hygiene products, bandages and other dressings, food products, cosmetics, sweets, chewing gum, etc. are excluded.

- **Pharmaceutical speciality**: A medicinal product of defined composition and information, of defined pharmaceutical form and dosage form, prepared for immediate medicinal use, ready and prepared for dispensing to the public, with a uniform name, packaging, container and labelling, which is granted a health authorisation by the State Administration and entered in the Register of Proprietary Medicinal Products.
- **Master formula**: A medicinal product intended for an individual patient, prepared by or under the direction of the pharmacist, expressly to fulfil a detailed medical prescription for the medicinal substances it contains according to the technical and scientific standards of the pharmaceutical art, dispensed in their pharmacy or pharmaceutical service.
- **Officinal preparation or formulation**: A medicinal product prepared and guaranteed by or under the direction of a pharmacist, dispensed in his or her pharmacy or pharmaceutical service, listed and described by the National Formulary, intended for direct delivery to the patients supplied by that pharmacy or pharmaceutical service.
- **Prefabricated medicine:** A medicinal product that does not meet the definition of a pharmaceutical speciality and which is marketed in a pharmaceutical form that can be used without the need for industrial processing and which is granted a health authorisation by the State Administration and entered in the corresponding Register.
- **Personal hygiene product**: Product which, when applied directly to healthy skin or mucous membranes, is intended to combat the growth of micro-organisms and

to prevent or eliminate ectoparasites from the human body or to eliminate health risks arising from the use of therapeutic prostheses applied to the human body.

- **Homeopathic product:** Small doses of medicinal substances to activate the body's own defences and gently bring about the improvement or cure of diseases. In Spain, as in the rest of the European Union, homeopathic products are regulated medicines, prescribed by doctors and dispensed by pharmacists.
- **Natural remedy product:** Treatment based on the administration of herbal medicines.

3.4 PREVENTIVE PRACTICES

Both preventive practices aimed at the general population and those specific to women are investigated.

GENERAL PREVENTIVE PRACTICES:

Coverage of influenza vaccination, the performance and frequency of blood pressure measurement, cholesterol level measurement, blood sugar measurement, faecal occult blood test and colonoscopy are studied.

Variables investigated:

– *Vaccination against flu in the last season*

Date (month and year) of last vaccination

– *Blood pressure measurement*

Respondent is asked when they last checked their blood pressure

- In the last 12 months
- 1 year ago but less than 2 years ago
- 2 or more years ago but less than 3 years ago
- 3 or more years ago but less than 5 years ago
- More than 5 years ago

Definitions:

- **Blood pressure measurement**: The measurement of systolic and diastolic blood pressure by a healthcare professional (includes pharmacies)

– *Cholesterol measurement*

Respondent is asked when they last measured their cholesterol

- In the last 12 months
- 1 year ago but less than 3 years ago
- 3 or more years ago but less than 5 years ago
- 5 or more years ago

Definitions:

- **Measurement of cholesterol levels:** This is the determination of serum total cholesterol levels

– *Blood sugar level measurement*

Respondent is asked about the last time their blood sugar level was measured

- In the last 12 months
- 1 year ago but less than 3 years ago
- 3 or more years ago but less than 5 years ago
- 5 or more years ago

– *Faecal occult blood test*

Respondent is asked about the last time they had a faecal occult blood test

- In the last 12 months
- 1 year ago but less than 2 years ago
- 2 or more years ago but less than 3 years ago
- 3 or more years ago but less than 5 years ago
- More than 5 years ago

Definitions:

- **Faecal occult blood test***:* a test used for the early detection of colon or colo-rectal cancer. It detects by laboratory analysis the presence of blood in one or more stool samples obtained by the patient according to the doctor's instructions.

– *Colonoscopy performance*

Respondent is asked how long it has been since they had a colonoscopy

- In the last 12 months
- 1 year ago but less than 5 years ago
- 5 or more years ago but less than 10 years ago
- 10 or more years ago

Definitions:

- **Colonoscopy:** A colonoscopy is an examination in which the inside of the colon (large intestine) and rectum are visualised using an instrument called a colonoscope. The colonoscope has a small camera attached to a flexible probe that can reach the entire length of the colon

<u>WOMEN'S PREVENTIVE PRACTICES:</u>

Mammography and cytology screening, frequency and reasons for screening are investigated.

Definitions:

- **Mammography:** Test used for the early detection of breast cancer. It consists of an X-ray of one or both breasts. It does not include breast ultrasound.
- **Vaginal cytology:** A test used for the early detection of cervical and vaginal cancer and certain infections. It also provides information on a woman's hormonal activity. It consists of taking a sample of cells that are analysed in the laboratory.
- **Human papillomavirus test:** The HPV test detects the infection that causes cervical pre-cancer or cervical cancer by examining a sample of cervical cells.

Characteristics researched:

– *The respondent is asked how long ago the last mammogram was performed*

- In the last 12 months
- 1 year ago but less than 2 years ago
- 2 or more years ago but less than 3 years ago
- More than 3 years ago

– *Cytology performance*

The respondent is asked how long ago she had her last Pap smear

- In the last 12 months
- 1 year ago but less than 2 years ago
- 2 or more years ago but less than 3 years ago
- 3 or more years ago but less than 5 years ago
- 5 or more years ago

– *Human papillomavirus screening test*

The respondent is asked how long ago the last test was performed

- In the last 12 months
- 1 year ago but less than 2 years ago
- 2 or more years ago but less than 3 years ago
- 3 or more years ago but less than 5 years ago
- 5 or more years ago

3.5 UNMET HEALTH CARE NEEDS

This is a measure of whether the person has needed medical care and has not received it in the last twelve months. The aim is to investigate whether the main reason for not obtaining assistance was a waiting list, a problem of transport or distance, or financial reasons.

– *Unmet need for medical care due to too long a waiting list*

– *Unmet need for medical care due to transport problems*

– *Unmet need for medical care due to economic problems*

- Medical treatment
- Dental treatment
- Prescription drugs
- Mental health care

4 Health determinants module

In this module, the aim is to investigate certain basic physical characteristics of the person interviewed, such as weight and height, as well as lifestyle habits that are considered to pose a risk to health, such as tobacco and alcohol consumption. Eating and exercise habits are also investigated. Environmental determinants, such as exposure to tobacco smoke and social support, are also investigated. A section is included to find out whether the respondent spends part of their time caring for other people with health problems.

(I) ADULTS QUESTIONNAIRE

4.1 PHYSICAL CHARACTERISTICS

The aim is to obtain data on self-reported weight and height in order to classify the respondent according to body mass index.

Definitions

- **Body Mass Index (BMI)***:* the ratio of an individual's weight (expressed in kilograms) to the square of the height (expressed in metres)

  The following is considered in the population aged 18 years old and over:

  - Underweight if BMI < 18.5 kg/m^2
  - Normal weight if 18.5 kg/m^2 < BMI < 25 kg/m^2.
  - Overweight if 25 kg/m^2 < BMI < 30 kg/m^2.
  - Obesity if BMI > 30 kg/m^2.

  In the population aged 15-17 years, the classification of BMI categories has been done for underweight, as proposed by: *Cole TJ, Flegal, KM, Nicholls D, Jackson AA "Body mass index cut offs to define thinness in children and adolescents: international survey". BMJ 2007;335:194-197*, and for obesity and overweight, according to: *Cole TJ, Bellizzi MC, Flegal KM, Dietz WH. "Establishing a standard definition for child overweight and obesity worldwide: international survey". BMJ 2000; 320: 1-6*.

4.2 PHYSICAL ACTIVITY

Information is collected on physical exercise performed during the main activity and in leisure time. The days and time the respondent spends walking to get around and

whether they use a bicycle for this purpose are investigated. Respondents are also asked how many days they spend on physical exercise to strengthen their muscles.

– *Type of physical activity at the workplace, educational institution, etc.*
  - Seated most of the day
  - Standing for most of the day without making large commutes, travel or efforts
  - Walking, carrying some weight, frequent commuting or travel
  - Performing tasks that require great physical effort
– *Type of physical activity during leisure time*
  - I don't exercise. I spend my free time in an almost exclusively sedentary way (reading, watching television, going to the cinema, etc.)
  - I do physical activity several times a month (walking or cycling, gardening, light gymnastics, recreational activities that required a light effort, etc.)
  - I do physical activity several times a month (sports, gymnastics, running, swimming, cycling, team games, etc.)
  - I do sports or physical training several times a week
– *Number of days per week that you walk at least ten minutes to get around and time spent.*
– *Number of days per week cycling at least ten minutes for commuting and time spent.*
– *Number of days per week spent doing sport for at least ten minutes and time spent.*
– *Number of days on which you engage in activities specifically aimed at strengthening muscles*

4.3 FOOD

The frequency of consumption of certain foods is collected. It is further investigated whether there is a daily consumption of fruit, either fruit pieces or fruit juice.

Food consumption frequency

Food	***Frequency***
- Fresh fruit (excluding juices)	- Once or more times a day
- Meat (chicken, veal, pork, lamb, etc.)	- 4 to 6 days a week
- Eggs	- Three times a week
- Fish	- Once or twice a week
- Pasta, rice, potatoes	- Less than once a week
- Bread, cereals	- Never
- Green vegetables, salads and root vegetables	
- Legumes	

- Sausages and cold cuts - Dairy products (milk, cheese, yoghurt, etc.) - Sweets (biscuits, pastries, jams, cereals with sugar, sweets, etc.) - Soft drinks containing sugar - Fast food (fried chicken, sandwiches, pizzas, burgers) - Appetisers or savoury snacks (chips, cheese puffs, crackers) - Fresh fruit or vegetable juice	

4.4 TOBACCO CONSUMPTION AND EXPOSURE TO TOBACCO SMOKE

Tobacco use

The aim is to investigate the prevalence of smoking among people aged 15 and over, type of smoker (daily, non-daily or ex-smoker), type of tobacco, frequency of cigarette consumption and age of initiation.

– *Type of smoker*

- Smokes on a daily basis
- Smokes, but not on a daily basis
- Doesn't currently smoke, but has smoked before
- Doesn't smoke and has never smoked regularly

Definition:

- **Smoker:** Person currently using cigarettes, cigars and/or pipes.

For daily smokers or former daily smokers, the following is investigated:

– *Number of cigarettes per day*

– *Age at first use of tobacco*

Exposure to tobacco smoke

For the general population, the number of passive smokers and the length of time they tend to be exposed to tobacco smoke in enclosed places are studied

– *Frequency of exposure to tobacco smoke in enclosed spaces*

- Every day
- At least once a week
- Less than once a week
- Never or hardly ever

– *E-cigarette use and frequency*

4.5 CONSUMPTION OF ALCOHOLIC BEVERAGES

The frequency of alcohol consumption during the last 12 months and the frequency of heavy drinking are investigated. For people with regular alcohol consumption, the type of drinks and units in a week of normal activity are investigated in detail.

– *Frequency of consumption in the last 12 months*

- Every day or almost every day
- 5-6 days a week
- 3-4 days a week
- 1-2 days a week
- 2-3 days in a month
- Once a month
- Less than once a month
- Not in the last 12 months; I have stopped drinking alcohol
- Never or just a few sips to try it during my life

– *Quantity/frequency of consumption. Number of servings of each type of beverage each day in a typical week*

– *Types of alcoholic beverages consumed*

- Beers with alcohol
- Wines, Cava
- Vermouth, fino, sherry and other alcoholic aperitifs
- Spirits, anise, *pacharán*
- Whisky, cognac, mixed drinks, rum, gin, vodka, orujo, cocktails and other distilled beverages, neat or in combination
- 'Local' drinks, cider, *carajillo*

– *Frequency of intensive consumption*

- Every day or almost every day
- 5-6 days a week
- 3-4 days a week
- 1-2 days a week
- 2-3 days in a month
- Once a month
- Less than once a month
- Not in the last 12 months
- Never in my life

Definitions:

- **Intensive health-risk consumption***:* Consumption on the same occasion of 6 or more standard drinks (for men), or 5 or more standard drinks (for women). A single occasion is defined as consumption in the same situation, in an approximate interval of 4-6 hours. In order for the respondent to be clear about the concept of a "standard drink", a card is provided with the most common examples of drinks that correspond to one or two standard drinks.
- **Equivalence of grams in pure alcohol**:
  - Alcoholic beer — 10 g per unit of drink
  - Wine or sparkling wine — 10 g per unit of drink
  - Alcoholic aperitifs (vermouth, fino, sherry) — 20 g per unit of drink
  - Liqueurs, aniseed, pacharán — 20 g per unit of beverage
  - Whisky, cognac, mixed drinks, etc. — 20 g per drink unit
  - Local beverages (cider, carajillo, etc.) — 10 g per drink unit

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4.6 SOCIAL SUPPORT

This section aims to measure social support. The *Oslo Social Support Scale (OSS-3)* is used for this purpose, which asks three questions:

– *Number of people you can count on in case of a serious personal problem.*
  - None
  - 1 or 2 people
  - 3 to 5 people
  - More than 5 people

– *To what extent are other people interested in what is happening to you?*
  - A lot
  - Some
  - Neither too much nor too little
  - Little
  - Nothing

– *How easy would it be for you to get help from neighbours if the need arose?*
  - Very easy
  - Easy
  - Possibly
  - Difficult
  - Very difficult

4.6 CARING FOR OTHER PEOPLE WITH HEALTH PROBLEMS

The aim is to investigate whether the interviewee takes care of people with health problems, whether it is a family member or not, and how many hours a week they spend caring for these people. Care provided as part of paid employment is excluded.

Variables investigated:

– *Care of elderly or chronically ill people*

– *Number of hours per week devoted to the care of these persons*

(II) MINORS QUESTIONNAIRE

In the minors questionnaire, in addition to variables already defined in the adults questionnaire, information is collected for the child population on self-perception of weight/height ratio, sleep habits (ages 0 to 14), sedentary leisure activities (ages 1 to 14), and breastfeeding characteristics (ages 0 to 4).

The list of medicines consumed is adapted to minors.

– *Type of medicine taken in the last two weeks and if prescribed by a doctor*

- Medicines for catarrh, flu, throat, bronchi
- Pain-killing medications
- Medications for reducing a fever
- Supplements such as vitamins, minerals, tonics
- Laxatives
- Antibiotics
- Tranquillizers, sedatives, sleeping pills
- Medication for asthma
- Medication for allergy
- Medication for diarrhoea
- Medication for nausea
- Medication for diabetes
- Homeopathic products
- Naturalistic products
- Other medicines

Number of hours of free time in front of a screen. The aim is to investigate the time spent by children over one year old in front of a screen, including computer, tablet, video, television, video games and mobile phone screens, from Monday to Friday and on weekends.

Breastfeeding at 6 weeks, 3 months and 6 months. The type of breastfeeding in these age groups is studied in the population under 5 years of age: exclusively breastfed, mixed or formula feeding.

Dental hygiene. The aim is to investigate into whether and how often the child habitually brushes their teeth

VIII Information Processing

As the information is collected via CAWI (web questionnaire) or CAPI (personal questionnaire), the data is first cleaned using errors implemented in the collection application, which allows inconsistencies to be detected and provides strange value warnings when responses are being entered. In this way, the correction/confirmation of the information is carried out at home and at the same time as the interview.

Once the information has been collected from the households corresponding to each census section, the information collected, in the case of personal interviews, is downloaded to the tablets in the zone head offices of the company in charge of the collection.

In the Central Services, we proceed to download the information by theoretical collection period for centralised processing. This processing consists of the following phases:

– *Coverage Phase*: It detects duplicates, compares the number of questionnaires theoretically collected (according to the computer application for monitoring fieldwork) and effectively received for each household.

– ***Quality Control Phase*:** It is verified that the information collected does not contain inconsistencies or serious errors detected in the questionnaire.

– ***Filtering and Imputation Phase**:* Consists of detecting inconsistencies that have not been included in the electronic questionnaire, as well as obtaining marginal tables, variable analysis tables, etc. The correction of possible mismatched or lost values is carried out automatically and, in exceptional occasions, manually.

Once all the sample information has been collected and refined, it is aggregated and results are obtained according to the previously designed tabulation plan.

To do this, several tasks are performed:

– ***Administrative data integration:*** If administrative data information on any variable is available, it is integrated with the relevant checks.

– ***Calculation of raising factors* and e*stimators***: Ratio estimators, to which re-weighting techniques will be applied, will be used to estimate the sample's characteristics. Additional information used will depend on the characteristic under study.

– *Tabulation of the results*: According to the theoretic tabulation plan initially designed as per the survey objectives, the raised table are obtained using the calculated factors. These tables are refined by adding categories, eliminating or deleting cells from the final tabulation in those tables that do not have enough sample information to provide estimates with a minimum of statistical reliability.

– ***Sample error calculation**:* Variation coefficients will be calculated for the main variables studied and disaggregation. These tables will be published, along with the methodology, in order to replicate their calculation and be able to apply it to any other variable.

– ***Analysis of non-response**:* In order to analyse the non-response of the EESE, a non-response assessment questionnaire is designed to obtain information on the basic characteristics of the units that do not collaborate in the survey. A non-response analysis report is elaborated with the results.

IX Dissemination of Results

The results of the Spanish Health Survey 2023 are published on the website of the National Statistics Institute (www.ine.es).

Results are published in May 2025.

The following publications will be available to users at the time of dissemination of the data:

1. Statistical tables covering the investigated variables classified by socio-demographic characteristics at national and regional level.
2. Sample error tables.
3. Analysis of non-response.
4. Methodology report.
5. Questionnaire.
6. Anonymised microdata from the survey.

ANNEX I. SOCIAL CLASS

LIST OF OCCUPATIONS AT THE THIRD-DIGIT LEVEL OF THE NATIONAL CLASSIFICATION OF OCCUPATIONS 2011 (CNO-11) INCLUDED IN EACH SOCIAL CLASS CATEGORY.[1]

The social class categories are taken from the proposal made by the Working Group on Determinants of the Spanish Society of Epidemiology - SEE[2], where social class is assigned according to occupation[3]. The different classes and codes according to the National Classification of Occupations 2011 (CNO2011) considered in the survey as proposed by the ESS are detailed below:

CLASS I - Directors and managers of establishments of 10 or more employees and professionals traditionally associated with university degrees	
1. **Directors and managers of establishments with 10 or more employees and professionals traditionally associated with university degrees.**	
111	Members of the executive and legislative bodies; managers of public administration and social interest organisations
112	CEOs and Executive Chairmen
121	Heads of administrative departments
122	Commercial, advertising, public relations and research and development managers
131	Production managers in agriculture, forestry, fishing, manufacturing, mining, construction, distribution and manufacturing industries
132	Information and communication technology (ICT) services and professional services company directors
211	Doctors
213	Veterinarians
214	Pharmacists
215	Other health professionals
221	Teachers in universities and other higher education (except vocational education and training)
223	Secondary school teachers (except for specific vocational subjects)
241	Physicists, chemists, mathematicians and related professionals
242	Natural science professionals
243	Engineers (except agricultural, forestry, electrical, electronic and ICT engineers)
244	Electrical, electronics and telecommunications engineers
245	Architects, town planners and geographic engineers
251	Judges, magistrates, lawyers and prosecutors
259	Other legal professionals
261	Finance specialists

[1] The 8 categories of the proposed comprehensive ESS classification CSO2012 have been grouped into 6 classes in order to allow comparability of the data with the previous ESS classification (CSO1995) used in the previous ENSEs.

[2] The group of "unclassifiable" occupations (codes 001, 002 and 283), have been assigned to class categories in the same way as in previous editions of the ENSE to allow comparison of the series.

[3] For codes 111, 112, 121, 122, 131, 132, 141, 142, 143 and 150 the SEE proposal assigns the social class according to the number of employees in the workplace. However, the same proposal mentions that in case this information is not available (case of the ENSE), the following considerations apply:

- In the absence of information on the number of employees, occupations 111 to 132 are assigned to social class I and occupations 141 to 150 to social class II.

- If information on the number of employees is available, occupations 111 to 150 are assigned to social class I when they are establishments with 10 or more employees and to social class II when they are establishments with less than 10 employees.

262	Management and organisation specialists
265	Other sales, marketing, advertising and public relations professionals
271	Software and multimedia analysts and designers
281	Economists
282	Sociologists, historians, psychologists and other social science professionals
291	Archivists, librarians, curators and related professionals
292	Writers, journalists and linguists
283	Priests of different religions

CLASS II - Directors and managers of establishments with fewer than 10 employees, professionals traditionally associated with university degrees and other technical support professionals. Sportsmen and artists	

2. Directors and managers of establishments with less than 10 employees, professionals traditionally associated with university degrees and other technical support professionals. Sportsmen and artists.

141	Directors and managers of accommodation companies
142	Directors and managers of catering companies
143	Directors and managers of wholesale and retail trade
150	Directors and managers of other service undertakings not elsewhere classified
212	Nursing and midwifery personnel
222	Vocational training teachers (specific subjects)
224	Primary school teachers
225	Early childhood teachers and educators
231	Special education teachers and technicians
232	Other teachers and education professionals
246	Technical engineers (except agricultural, forestry, electrical, electronic and ICT engineers)
247	Technical engineers in electricity, electronics and telecommunications
263	Technicians of tourism companies and activities
264	Technical and medical sales professionals (except ICT)
248	Technical architects, surveyors and designers
272	Database and computer network specialists
293	Creative and performing artists
311	Draughtsmen and technical draughtsmen
315	Maritime and aeronautical navigation professionals
316	Quality control technicians in the physical, chemical and engineering sciences
333	Practitioners of alternative therapies
362	Customs, tax and related agents working in public administration tasks
372	Athletes, coaches, sports instructors; recreational activity monitors
373	Technicians and support professionals in cultural, artistic and culinary activities
001	Officers and non-commissioned officers of the armed forces

CLASS III - Intermediate occupations and self-employed persons	
3. Intermediate occupations: administrative type employees and support professionals for administrative management and other services.	
331	Laboratory, diagnostic testing and prosthetics health technicians
332	Other health technicians
340	Finance and mathematics support professionals
351	Agents and sales representatives
352	Other commercial agents
353	Real estate agents and other agents
361	Administrative and professional assistants
363	Law enforcement technicians
371	Legal and social services support professionals
381	Information technology operations and user assistance technicians
382	Computer programmers
383	Audiovisual recording, broadcasting and telecommunications technicians
411	Accounting and finance employees
412	Material registration, production support services and transport employees
421	Library and archives employees
422	Postal, coding, proofreading and personnel services employees
430	Other clerical staff without front-office duties
441	User information clerks and receptionists (except in hotels)
442	Travel agency employees, hotel receptionists and telephonists/telephone operators
443	Survey Agents
444	Counter and related clerks (except ticket-takers)
450	Clerical workers with customer service duties not elsewhere classified
582	Travellers, tour guides and related workers
591	Civil Guards
592	Police officers
593 002	Fire-fighters Troops and sailors of the Armed Forces
4. Self-employed workers	
500	Waiters and cooks who are owners
530	Commercial store owners
584	Workers owning small accommodation

CLASS IV - Supervisors and Workers in Skilled Technical Occupations	
5. Supervisors and workers in skilled technical occupations.	
312	Technicians in the physical, chemical, environmental and engineering sciences
313	Process and installation control technicians
314	Natural science technicians and related auxiliary professionals
320	Supervisors in manufacturing, construction and mining engineering industries
521	Section managers in shops and warehouses
581	Hairdressers and specialists in aesthetic, wellness and related treatments
713	Carpenters (except joiners and fitters of metal structures)
719	Other structural construction workers
721	Plasterers and applicators of paste and mortar coatings
722	Plumbers and pipe fitters
723	Painters, wallpaperers and related workers
725	Refrigeration and air-conditioning mechanics-installers
731	Moulders, welders, sheet metal workers, metal fitters and related workers
732	Blacksmiths, toolmakers and related trades workers
740	Machinery mechanics and fitters
751	Construction and allied trades electricians
752	Other installers and repairers of electrical equipment
753	Installers and repairers of electronic and telecommunication equipment
761	Precision metal mechanics, ceramists, glaziers and artisans
782	Cabinetmakers and related workers
783	Textile, garment, leather, fur and footwear workers
789	Gluers, divers, product testers and other miscellaneous workers and artisans
831	Train drivers and related professionals

CLASS V - Skilled workers in the primary sector and other semi-skilled workers	
6. Skilled primary sector workers and other semi-skilled workers	
511	Salaried cooks
512	Salaried waiters
522	Salespersons in shops and warehouses
541	Kiosk or market vendors
543	Petrol station forecourts
549	Other sellers
550	Cashiers and tellers (except banks)
561	Nursing assistants
562	Pharmacy assistants, health emergency technicians and other health care workers in health services
571	Personal home care workers (except childcare workers)
572	Childminders
589	Other personal service workers
594	Private security staff
599	Other workers in protection and security services
611	Skilled workers in agricultural activities (except in orchards, greenhouses, nurseries and gardens)
612	Skilled workers in orchards, greenhouses, nurseries and gardens

620	Skilled workers in livestock activities (including poultry, beekeeping and similar activities)
630	Skilled workers in mixed agricultural and livestock activities
641	Skilled workers in forestry and environmental activities
642	Skilled workers in fisheries and aquaculture activities
643	Skilled workers in hunting activities
711	Concrete workers, formworkers, ironworkers and related workers
712	Bricklayers, stonemasons, sawyers, stone cutters and engravers
724	Floor layers, parquet layers and related workers
729	Other finishing workers in construction, installation (except electricians) and related trades
762	Graphic arts workers and operators
770	Workers in the food, beverage and tobacco industry
781	Wood and related workers
811	Operators in mineral extraction and exploitation installations
812	Metal processing plant operators
813	Operators of chemical, pharmaceutical and photosensitive materials plants and machines
814	Operators in installations for the treatment and processing of wood, the manufacture of paper, paper and rubber products or plastic materials
815	Textile, leather, fur and leather goods machinery operators
816	Food, beverage and tobacco processing machine operators
817	Laundry and dry-cleaning machine operators
819	Other fixed plant and machinery operators
820	Factory assemblers and fitters
832	Operators of mobile agricultural and forestry machinery
833	Operators of other mobile machinery
841	Car, taxi and van drivers
842	Bus and tram drivers
843	Truck drivers

CLASS VI

7. Unskilled workers

542	Telemarketing operators
583	Building maintenance and cleaning supervisors, caretakers and housekeepers
834	Deck, engine and allied seamen
844	Motorbike and moped drivers
910	Domestic workers
921	Cleaning staff in offices, hotels and other similar establishments
922	Car, window and hand-cleaning staff
931	Kitchen assistants
932	Fast food preparers
941	Street vendors
942	Advertising distributors, shoeshiners and other street workers
943	Orderlies, baggage handlers, delivery drivers and related workers
944	Refuse collectors, waste sorters, sweepers and related workers
949	Other elementary occupations
951	Agricultural labourers

952	Livestock labourers
953	Farm workers
954	Fishing, aquaculture, forestry, and hunting laborers
960	Mining and construction labourers
970	Manufacturing labourers
981	Transport workers, unloaders and related workers
982	Replenishers

The correspondence between the occupational social classes of the abridged CSO-1995 and those of the grouped CSO-2012 is as follows:

CSO-1994		**CSO-2012**	
I	**Managers in public administration and in companies with 10 or more employees. Professions associated with 2nd and 3rd cycle university degrees**	CLASS I	**Directors and managers of establishments with 10 or more employees and professionals traditionally associated with university degrees**
II	**Managers in public administration and in companies with less than 10 employees. Professions associated with a 1st cycle university degree. Senior Technicians. Artists and sportsmen and women**	CLASS II	**Directors and managers of establishments with less than 10 employees, professionals traditionally associated with university degrees and other technical support professionals. Sportsmen and artists**
III	**Administrative and professional support staff for administrative and financial management. Personal and security services workers Self-employed workers. Supervisors of manual workers**	CLASS III	**Intermediate occupations and self-employed workers**
IVa	**Skilled manual workers**	CLASS IV	**Supervisors and workers in skilled technical occupations**
IVb	**Semi-skilled manual workers**	CLASS V	**Skilled primary sector workers and other semi-skilled workers**
V	**Unskilled workers**	CLASS VI	**Unskilled workers**