

Presentation

This year marks the twentieth anniversary of the creation of the Statistical Institute of Catalonia (Idescat) and also the centenary of the birth of Joaquim Torrens-Ibern (1909-1975). Apart from their shared connection with the world of statistics, both events seem quite unconnected, but there is at least one important fact that suggests that they are. I am referring to the journal SORT or, even more specifically, to the third stage of the *Quaderns d'Estadística i Investigació Operativa* (Notebooks on Statistics and Operations Research - Qüestiió). Idescat has published this journal since 1992, but it owes its origins to the *Quaderns d'Estadística, Sistemes, Informàtica i Investigació Operativa* (Notebooks on Statistics, Systems, Computing and Operations Research - 1977-1991), which stemmed from the *Cuadernos de Estadística Aplicada e Investigación Operativa* (Notebooks on Applied Statistics and Operations Research), a publication founded in 1962 by Dr. Torrens-Ibern and other colleagues at the Escola d'Enginyers Industrials de Barcelona (Barcelona School of Industrial Engineers), and of which he was the director.

The SORT journal therefore represents a nexus between the two other ephemeredes, and enables us to make some reflections regarding the development of statistics in our country. Considering them to be two collective works in constant evolution, the creation of Idescat and the journal *SORT-Statistics and Operations Research Transactions* share inherent and highly significant features and objectives.

First of all, both represented relevant or decisive events in the progress of statistics in Catalonia that were based on already existing institutions. In the former case, I am referring to the defunct Consorci d'Informació i Documentació de Catalunya (Consortium on Information and Documentation of Catalonia) and previous bodies, while in the case of SORT there were the two earlier stages of Qüestiió and the *Cuadernos* themselves. So, these were not *ex novo* creations, but rather, both exploited previous experiences, whose legacy they could be considered to have inherited.

Secondly, the official statistical body of Catalonia (Idescat) and the most renowned official Catalan journal on statistics (SORT) can be considered platforms for the progress and consolidation of statistics in Catalonia, both which clearly local commitments but also a global outlook. In the case of Idescat, its articulation of official statistics seeks to satisfy the information needs of the country's public and private agencies, and is based on the utmost compatibility with surrounding statistical systems. In turn, SORT-Qüestiió has always striven to serve statistical research groups in our country, identifying their main lines of work and seeking to project them towards the rest of the scientific community on the basis of the international recognition of the quality of the articles they publish.

Finally, both Idescat and the SORT journal express the utmost institutional and also personal complicity in their respective fields. Therefore, the promulgation of the first

Statistical plan for Catalonia 1992-1995 by the Parliament of Catalonia was conceived as a series of objectives that a large number of institutions and bodies had to satisfy, under Idescat's coordination. The decentralisation of the production of official statistics in Catalonia has been progressively fortified and, at the same time, has accentuated institutional collaboration with other statistical systems. In terms of the progress of SORT-Qüestiió, the multiplicity of university bodies that supported it in the seventies and eighties led to the establishment of formal collaboration agreements with Catalan universities and specialised bodies, once Idescat had guaranteed their economic and logistical feasibility from 1992, the intention being to imply as many of the country's bodies as possible in the field of statistical research.

At the same time, the figure of an entrepreneur in the field of statistics, incarnated by Joaquim Torrens-Ibern, exemplifies, in personal terms, the desire to configure the conversion of a scientific activity into an essentially useful activity for society's progress. In this sense, Torrens-Ibern's constant concern for the application of advances in statistics to controls of the quality and efficacy of industrial processes led to an orientation towards applied statistics, as clearly shown by the case of SORT, and the characterisation of statistics as a public service, one which was absolutely interiorised in the case of Idescat. Both orientations help us to characterise much of Catalan statistics and also to explain its most recent developments.

That is why we wanted to postpone the commemoration of the thirty years of Qüestiió-SORT (1977-2007) until 2009, the year when the three aforementioned events coincide and, therefore, highlight these common traits in their respective trajectories.

Therefore, I would like to take the chance to look back at the institutional development of Qüestiió-SORT in this sense, and especially since Idescat took charge of publishing it. As Dr. Eduard Bonet remembered in a topical editorial published in Qüestiió in 1997 (issue 3, volume 21), one can distinguish between two different stages of Qüestiió. In the first, the journal, titled *Quaderns d'Estadística, Sistemes, Informàtica i Investigació Operativa*, was published from 1977 by the Polytechnic University of Catalonia (UPC) in collaboration with other institutions, especially the University of Barcelona. After the creation of Idescat in December 1989, the UPC proposed that the continuation of the journal should be passed to Idescat, in such a way that the latter would take charge of it but in collaboration with other institutions. The Commission in charge of these negotiations was formed by Jaume Pagès (vice rector of the UPC at the time), Jaume Barceló, Albert Prat, Narcís Nabona and Carles Cuadras for the Qüestiió Editing Council, and Jordi Oliveres, director of Idescat, and other members of his management team, such as his assistant director Enric Ripoll, who since then has maintained Idescat's operational links with the journal. In 1992 the rector of the UPC, Gabriel Ferraté, transferred the publishing rights for Qüestiió to Idescat. Publication of the journal resumed with volume 16 and now with the significant title of *Quaderns d'Estadística i Investigació Operativa* (Qüestiió) –second stage–, which involved the disappearance of the references to computing and systems. So the journal was now totally focused on statistics and operations research, the two most dynamic communities and which had such a differentiating feature of special connections with the development of statistics in other

countries, especially Anglo Saxon ones. As a consequence of the agreements reached, on December 1, 1994 and February 29, 1996, the rectors of the UPC and the UB, respectively, signed corresponding collaboration agreements with Idescat for the publication and distribution of *Qüestiió*, agreements that would later also be signed by the University of Girona (February 8, 1999) and the Universitat Autònoma de Barcelona (July 11, 2000).

This new and second stage of *Qüestiió* made it possible to considerably strengthen the journal under the direction of Eduard Bonet, with the support of two executive editors, Carles M. Cuadras and Enric Ripoll, dealing in more depth with applied statistics, official statistics and biometry, as well as operations research itself. Meanwhile, the journal also reflected editorial developments and similar events in these fields, advances in statistical programming and the publication of problems and questions in the educational world. The journal's constant concern for the situation of Catalan statistics and its perspectives led to monographs and the occasional publication of *Qüestiió*. In this sense, I would like to highlight among other examples, the Catalan translation of the "Declaration of professional ethics", adopted by the International Statistical Institute in August 1985 and published in issue 3 of volume 17 (1993) of *Qüestiió*, or the extensive essay on the research of statistics in Catalonia, published in issue 3 of volume 26 (2002) of *Qüestiió* and the monographic issue of *SORT* in memory of Dr. Albert Prat, on occasion of the testimonial held on April 21, 2006.

Throughout the nineties, the structure and management of the journal was adapted to the changes imposed by the progressive specialisation of the assistant or executive editors in different fields, and also an increase in the number of collaborating institutions, such as the International Biometric Society section. This led the effective management of *Qüestiió* to gradually shift towards Dr. Carles M. Cuadras from 2001 towards. That said, a third stage of *Qüestiió* should now be added, which began in 2003 with the publication of *SORT (Statistics and Operations Research Transactions)* under the management of Dr. Cuadras, by which the aim was to obtain greater international recognition and to attain a higher scientific level by publishing this journal exclusively in English, having noted the increasing number and quality of research groups dedicated to Catalonia. Once this change had been completed, in mid 2006 the management of *SORT* was restructured, with Dr. Montserrat Guillén as the new director and a total of six executive editors. As Dr. Guillén said in her editorial in issue 1 of volume 30 (2006), the new editorial team was particularly enthused by articles that displayed innovation in the practical use of statistics and operations research in the areas of biology, medicine, psychology, economics and marketing, among others. Shortly after, *SORT* was indexed in the "Science Citation Index Expanded" by Thomson Scientific from volume 31 (1) onwards in 2007, which added an impact factor that accredited it a top class journal.

As said at the beginning, we have intentionally brought together the vital coincidences between Idescat, Joaquim Torrens-Ibern and *SORT-Qüestiió* in the form of the publication of a monographic edition of the journal, forming a connection between three so closely related events. The structure and content of this issue therefore seek to celebrate the thirtieth anniversary of *Quaderns d'Estadística i Investigació Operativa* and at the

same time also pay tribute to Professor Joaquim Torrens-Ibern, one of its co-founders, on the centenary of his birth. And all of this is part of the celebration of the first 20 years of the Statistical Institute of Catalonia (1989-2009).

In relation to the thirtieth anniversary of SORT, we have adopted the format used in previous celebrations (1987 and 1997), by publishing abstracts of articles that have been published over the last ten years and listing all of the articles of the last thirty years. On this occasion, it seemed appropriate to accompany this with a personal report by Dr. Carles M. Cuadras, who was the main person responsible for managing the transition from Qüestiió to SORT. Finally, we would also like to take the chance to express our gratitude for the indispensable efforts of a large group of evaluators and collaborators throughout this third stage of the journal as SORT (2003-2007), just as we were able to do in 1997 in relation to the 1987-1997 period, of which the acknowledgements up until 2007 can be considered a direct continuation.

In relation to the tribute to Joaquim Torrens-Ibern, this issue of SORT includes the inestimable collaboration of some of his most renowned disciples, in order to provide a necessarily multifaceted approach to his varied work. The articles by Manuel Martí-Recober, Jaume Bassa, Miquel Siguan and Josep M. Domènech are preceded by a brief recension published by the foundation that bears his name. Finally, in this issue of SORT it was considered appropriate to reproduce a relevant and characteristic article by Torrens-Ibern. Therefore, in the form of an annex, we are including the article "Statistical control methods in continuous industrial processes", published in two parts in 1963 in *Cuadernos de Estadística Aplicada e Investigación Operativa*, which he himself has helped to create.

We are therefore sure that Qüestiió-SORT readers and the statistical community in general in our country will reencounter on these pages some facts or elements of relevance to their own trajectories, perhaps because of their association with the work of Torrens-Ibern, or otherwise their own collaborations with the oldest Catalan statistics journal or their connection with official statistics in Catalonia. If that is the case, then I would like to take this opportunity to thank you once again, and in the name of Catalan statistics, for your efforts towards the progress and diffusion of statistics in our country.

Anna Ventura i Estalella
Director of the Statistical Institute of Catalonia
Barcelona, December 2009