

## Science on the Balearic Islands. A collection on the past that looks toward the future

Joan March Noguera

Research Group on the History of Health-University Institute for Research in Healthcare Science (GIHS-IUNICS-UIB)

Up until the last third of the 20th century, the history of science and technology was a subject yet to be examined in the historiography of the Catalan countries. Great dedication and means have gone and continue to go into supporting the Catalan language, even for the most insignificant of narrators and poets (in terms of the worthiness of their literary production). And up until relatively recently, we have lacked well elaborated studies on those scientists and cultivators or creators of technological instruments—in the broadest of interpretations—employed in the different Catalan-speaking territories.

Pioneers in these tasks were Professors Rafael Folch Andreu (1881–1961) and Guillem Folch Jou (1917–1987) both from the History of Pharmacy Department at Complutense University; Josep Maria Suñé Arbussà and Felip Cid Rafael, from, respectively, the History of Pharmacy and the History of Science Departments at the University of Barcelona; Professor José María López Piñero (1933–2010) and his colleagues from the Institute of the History of Science and Documentation, a joint center of the University of Valencia and the Spanish National Research Council (CSIC); and Professor Jacint Corbella Corbella, as Chairman at the University of Barcelona, under the auspices of which there have been numerous doctoral theses on the History of Catalan Medicine. These, in turn, have yielded a wealth of communications on the History of Health covering an ample spectrum of subjects and eras.

The void began to be systematically filled when the *Societat Catalana d'Història de la Ciència i de la Tècnica* (Catalan Society for the History of Science and Technology, SCHCT) was founded in 1991, as a subsidiary of the *Institut d'Estudis Catalans* (Institute for Catalan Studies, IEC). It is around the IEC that the current plethora of historians on the Science and Technology of the Catalan countries has developed. These researchers have fulfilled their calling with the publication of *La ciència en la història dels Països Catalans* (*Science in the History of the Catalan Countries*), published by the University of Valencia and the Institute for Catalan Studies with the participation of the *Caixa de Balears "Sa Nostra"*, the *Caja de Ahorros del Mediterraneo "CAM"* and the *Caixa de Sabadell* Foundation (Fig. 1).

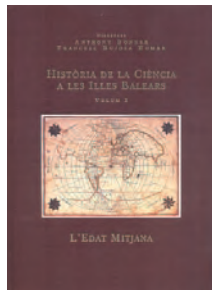
The idea of launching the collection *La Ciència a les Illes Balears* (*Science on the Balearic Islands*) was motivated by an awareness of the scarce knowledge that existed regarding the



**Fig. 1.** The three volumes of *La Ciència en la Història dels Països Catalans* are the work of more than 50 historians linked in one way or another to the SCHCT (Fig. 1).

scientific and technological activities on the Islands and their practical applications. This same sentiment was perceived at the beginning of the 1970s in relation to the recognized necessity of bringing to light the political past of our Community—a task realized in 1974, by the Majorcan historian Gregori Mir, under whose guidance *El mallorquinisme polític* (*Political Majorcanism*) was published, albeit outside of Spain. Its two volumes contain summaries of the political writings produced by Majorcans throughout the past centuries, with special attention given to those dating from the Second Republic. This book inspired the title of my own on the Majorcan doctor Jaume Salvà (1793–1855), a native of Algaida, *Jaume Salvà i el mallorquinisme científic* (*Jaume Salvà and Scientific Majorcanism*, 2001).

The presentation of that biography was celebrated in the Cultural Center of the Algaida Town Hall. Among the attendees were Francesc Antich, President of the Autonomous Government of the Balearic Islands; Jaume Oliver, Mayor of Algaida; Francesc Bujosa, Professor of the History of Science, and Isabel Moll, Professor of Contemporary History, both from the University of the Balearic Islands (UIB); and, relevant to the subject of this article, Enric Tortosa, General Manager of Research of the Council for Innovation and Energy, which at that time was run by Príam Villalonga. At that event, I set forth the challenge to bring scientific Majorcanism to light on the Islands just as had been done with political Majorcanism 26 years earlier. The challenge was taken up by Enric Tortosa and supported by Príam Villalonga. Their efforts lead to the launching of two great projects in 2000: the collective work *La història de la ciència de les Illes Balears* (*The History of Science of the Balearic Islands*) and the collection of books entitled *La ciència a les Illes Balears* (*Science on the Balearic Islands*).



**Fig. 2.** Volume 1 of *Història de la Ciència a les Illes Balears. L'Estat Mitjàna*.

### The History of Science of the Balearic Islands

This collection counted on a team of coordinators consisting of Francesc Bujosa as Director, Isabel Moll, Josep Miquel Vidal (Scientific Director of the Menorcan Institute of Studies), Joan March (Doctor of Pharmacy), and Miquel Marín (historian). This work arose within the framework of a cooperation agreement between the Government of the Balearic Islands and the University of the Balearic Islands and counted on the support of the *Caixa de Balears* “*Sa Nostra*”. In addition, it brought together a group of outstanding advisors, such as Professor Thomas Glick, from Boston University; Josep Pardo Tomàs, researcher at the CSIC; José M. Sánchez Ron, from the Autonomous University of Madrid; Antoni Roca Rosell, from the Technical University of Catalonia; Antoni Roig Muntaner, from the UIB; and Vicenç M. Roselló Verger, of the University of Valencia. This work, which was begun in the same spirit as its contemporary (*Science in the History of the Catalan Countries*), currently consists of three published volumes, a fourth in the process of being published, and two more in preparation (Fig. 2).

### Science on the Balearic Islands

This collection of books was started in 2002 as well, with Joan March as Chief Editor. It came about with the goal of publishing scientific or technical texts written by people from the Balearic Islands or written about the Islands by people outside them. At the same time, the expertise of the authors was to be highlighted by including their biographies in the respective texts (Fig. 3).

### Other works

A work related to an emblematic institution in the history of science and technology on the Balearic Islands was chosen for the first volume of the collection, the *Laboratori de Biologia Marina de Porto-Pí* (Laboratory of Marine Biology of Porto-Pí), founded by Odón de Buen (1863–1945), Professor of Sciences at the University of Barcelona, and inaugurated in 1908. This first-rate center for scientific and technical research still functions today. Odón de Buen's son, eminent biologist and oceanographer, Rafael de Buen Lozano (1891–1966), also worked for a time at this institution. In 1915, he carried out interesting field work at the Laboratory, the results of which were published as a facsimile under the title *Estudio Batimétrico de la bahía de Palma de Mallorca* (*Bathymetric Study of Palma de*

*Majorca Bay*). A foldout map of the bay accompanied the text. The work appeared with a prologue by Boston University professor Thomas Glick.

That same year, the masterpiece on Majorcan public health was published, also in facsimile format. In *La ciutat de Palma* (*The City of Palma*), Majorcan engineer Eusebi Estada Sureda (1843–1917) advocated tearing down the walls of Palma, claiming that such a move was necessary if in the coming years the public was to enjoy a healthy and open city. This book—clearly influenced by the publication years earlier of a work by Pere Felip Monlau (1808–1871) *Abajo las murallas* (*Down with the Walls*), similarly concerning the walls of Barcelona—was released on two occasions over the last third of the 19th century and was one of the most influential books in the history of Majorca. Three exceptional authors each contributed a prologue, the architect Carlos García-Delgado; Miguel Seguí Aznar (1950–2009), Professor of Art History at UIB, who sadly passed away at a very young age; and the above mentioned professor from UIB, Francesc Bujosa. The book was presented in Palma by Vicent Salavert (1956–2007) of the University of Valencia, who also died prematurely.

In 2003, a collection of works related to the science of an exceptional pharmacist and chemist, Josep Sureda Blanes (1890–1984), was published. Sureda was in Munich in 1913, on a scholarship by the Board for Advanced Studies (JAE) Staundinger, and was a student of Henrich Otto Wieland (1877–1957), Nobel winner in Chemistry in 1927. In 1916, he went to Zurich to work with Hermann Staundinger (1881–1965), Nobel winner in Chemistry in 1953, also in Zurich, with a third Nobel Prize winner in Chemistry in 1939, Leopold Ruzicka (1887–1976). His aversion to enduring the tenure procedure without a mentor and his longing for Majorca prevented him from becoming an internationally renowned investigator. The book boasted a very special contributor, his son, Alfons Sureda Carrión, a high-level employee in the translation department at the UN in Geneva, who provided a thoughtful bibliography of his father. The book's prologue was by Àngel Terrón, Professor of Inorganic Chemistry at the UIB.

Volume number 4 of the collection came out in 2004 and was a facsimile of a work of exceptional beauty, the internationally triumphant *Apèndix al Sistema General de Toxicologia* (*Appendix of the General System of Toxicology*), from the Menorcan doctor Mateu Orfila (1783–1853). The newly published work was a reproduction of the English version from 1821 and boasted an introduction by Pere Ventanyol, Doctor of Pharmacy and an expert in designer drugs. Ventanyol authored a biography of Orfila as well as a thorough introduction on the genesis of Orfila's work. The success of the volume earned it the honor of a second edition in 2008.

Volume number 5, published in 2006, is the compilation of works on the history of marine science research carried out in the Balearic Islands from the 18th century until today. It was presented at the seminar on Marine Science and Technology of the Balearic Islands, celebrated in Palma in 2003. The volume was coordinated by Pere Oliver, current General Manager of Investigation, Technological Research and Innovation of the Council on Innovation, Interior and Justice of the Autonomous



**Fig. 3.** Titles from the collection *La ciència a les Illes Balears*. The aim of this collection is to make available facsimile editions of representative works of the scientific production carried out in the Balearic Islands throughout history.

Government of the Balearic Islands—the institution responsible for the survival of the collection. He is a magnificent example of the fact that science has been done on the Islands for centuries, evidencing the preservation of our language not only through its literature or in the service of tourism.

Two other books came out in 2008: volume number 6, *Bartomeu Darder i Pericàs, geòleg i mestre* (*Bartomeu Darder Pericàs, Geologist and Teacher*), publicized the work of the Majorcan geologist and pedagogue Bartomeu Darder (1895–1944), who published articles in magazines that today would be indexed. Darder corresponded with first-rate geologists from all over Europe. Many of his scientific articles have been published in facsimile. The editor of the volume was Joan Josep Fornós, Professor of Geology at the UIB, who did a tremendous job of gathering Darder's works. The book is complemented by a prologue from Ramon Homs, Professor of geology at the University of Barcelona and a close acquaintance of the Darder family.

The subject of volume number 7, the second book of the series to be released in 2008, is the multifaceted Ibizan doctor Enric Fajarnés, who left his mark on every field that caught his interest, especially demography and history. The title of the book is itself quite significant: *Enric Fajarnés i Tur entre la història i la demografia* (*Enric Fajarnés i Tur, Between History and Demography*). The book's biographical introduction was entrusted to an Ibizan historian, Ernest Prats, and to a Majorcan demographer, Doctor Joana Maria Pujades. The author of the prologue was Josep Bernabeu, Professor of the History of Science at the University of Alicante.

Within the set of books in the collection, the works published in 2009 deserve particular mention as they mark the beginning of the series' international success. The subject of volume number 8 is Vicenç Mut Armengol (1614–1687), historian, military engineer, and astronomer. He was also one of the most internationally famous Majorcan scientists active in the time before the University de les Illes was restored and the Mediterranean Institute of Advanced Studies (IMEDEA), the UIB-CSIC's joint center of investigation, was launched, in the last quarter of the 20th century. The book *Vicenç Mut Armengol (1614–1687) i l'astronomia* (*Vicenç Mut Armengol (1614–1687) and Astronomy*) covers his work as an astronomer. The retired Professor

of the History of Science at the University of Valencia, Victor Navarro, a specialist in Vicenç Mut, was asked to compile the book. Beyond the facsimile edition of Mut's works, it contains their translation into Catalan and a biography of its subject, both carried out by Victor Navarro himself. The book is complemented by prologues from two highly respected academics, Josep Lluís Ballaster, Professor of Astronomy and Astrophysics at UIB, and Ugo Baldini, Professor of Modern History at the University of Padua and a specialist in the great Italian astronomers with whom Vicenç Mut was scientifically associated, such as Giovanni Battista Riccioli (1598–1671). The book enjoyed a significant circulation, both within Spain and in Europe and North America.

Volume number 9 serves to rescue an exceptional Majorcan pedagogue and scientist from oblivion: Margalida Comas Camps. The book *Margalida Comas Camps (1892–1992) científica i pedagoga* (*Margalida Comas Camps (1892–1992) Scientist and Pedagogue*)—edited by Maria Àngeles Delgado, Doctor in Pedagogy and graduate in the sciences—is both a biography of Margalida Comas and an extensive collection of her scientific and pedagogical work, with considerable documentation of all her activities. A book on a person as remarkable as Margalida Comas, who left her mark in so many places, is surely worthy of several prologues. Thus we find contributions by Charly Ryan, senior lecturer at the University of Winchester (UK); María Lluïsa Penelas, responsible for re-awakening interest in Margalida Comas within the Catalan Countries; Bernat Sureda, Professor of the History of Pedagogy at UIB; and Miquel Àngel Limón, the Menorcan journalist and historian who has labored intensively to publicize the life and work of his compatriot. The book has had a vast circulation throughout Spain and Europe; in fact, 1500 copies have been on back order for months and a second edition will be released.

Currently, two books of very diverse subjects are, as noted above, en route to publication: the first, about the *Societat Econòmica d'Amics del País de Mallorca* (*Economic Society of the Friends of the Country of Majorca*), was edited by Isabel Moll, Professor Emeritus in Contemporary History at UIB. The second, about one of the founders of the *Institució Catalana d'Història Natural i la Societat Balear d'Història Natural* (*Cata-*

lan Institution of Natural History and the Balearic Natural History Society), Majorcan apothecary Llorenç Garcias Font (1884–1975), was prepared by UIB Professor Guillem Pons together with art historian Mireia Garcías.

The collection has established a clear mission for itself, presenting the Balearic Islands in a wide sense to European scientific society as not only a tourist destination but also a community with a rich scientific past that has been maintained and nurtured into the present, as evidenced by the investigators

currently working in our scientific institutions. The goals of the collection have been met thanks to the Editorial Board, which has brought together a wide range of scientific specialists, including the above-mentioned editor Basilio Baltasar, the Rector of the UIB, Camilo José Cela Conde; Felip Cirer, Doctor in Philology and historian; Carlos Duarte, Doctor in Biology and investigator at the CSIC; and Ricard Guerrero, Professor of Microbiology at the University of Barcelona and Scientific Secretary of the IEC.