Curriculum Vitae

Alessandro Feraldi

GENERAL INFORMATION

Spoken Languages Italian, English

EDUCATION

11/2018 - 05/2023	Ph.D. in School of Statistical Sciences - Demography Sapienza University of Rome, Rome (Italy) Dissertation: Gender Disparities in Health and Survival
05/2022 - 06/2022	Research Stay Abroad (Visiting) INED - Institut National d'Études Démographiques, Paris (France) Mortality, Health, and Epidemiology Unit Research: Association between Healthy Life Expectancy and Behavioural Risk Factors; Influence of Widowhood and Separation on the Incidence of Neurodegenerative Diseases
09/2018 - 07/2019	European Doctoral School of Demography (EDSD) Max Planck Institute for Demographic Research MPIDR, Rostock (Germany) Southern University of Denmark, Odense (Denmark) Research: Gender Gap in Life Expectancy - Age- and Cause-specific Decomposition of Ten Countries
10/2015 - 01/2018	Master Degree: Demographical and Economical Statistical Sciences Sapienza University of Rome, Rome (Italy) Dissertation: Probabilistic Dietary Exposure Assessment to DON of Italian Population
09/2015 - 02/2016	Study Abroad (Erasmus) Technische Universität Dortmund (TU), Dortmund (Germany) Study: Multivariate statistical modelling and sampling methods
09/2010 - 10/2014	Bachelor Degree: Statistics for data analysis University of Palermo, Palermo (Italy) Dissertation: Data Analysis of Insulin Pumps in the Treatment of Type 1 Diabetes Mellitus in Diabetic Subjects Aged 23 and Older

APPOINTMENTS

Academic Appointments

11/2022 -Tutor for Statistics Course for Bachelor Degree in Statistics 07/2023 Sapienza University of Rome, Rome (Italy) Teaching statistics and R software, correction and evaluation of exams Other Appointments Since Max Planck Institute for Demographic Research (MPIDR) 05/2023 Research Scientist (Post-Doc) at the Research Group of Labour Demography Research interests: Socioeconomic Inequalities and Unhealthy Behaviour-Related Differences in Healthy and Unhealthy Working Life Expectancy 03/2021 -Data Analyst and Researcher at National Institute for Environmental Research and Protection 03/2022 Department of Sustainable Development of Aquaculture in Inland, Transitional and Marine Coastal Waters ISPRA - Istituto Superiore per la Protezione e la Ricerca Ambientale, Rome (Italy) Tasks: Development and validation of a benchmarking system for the technical, production, health and environmental performance of the European Mediterranean Aquaculture Sector. Development of a Welfare Index to assess welfare of farmed Sea Bass and Sea Bream 01/2020 -Internship at Italian National Institute of Health 06/2020 Department of Cardiovascular, Endocrine-Metabolic diseases, and Ageing ISS - Istituto Superiore di Sanità, Rome (Italy) Research: Frailty Prevalence, Incidence, and Association with Incident Disability in the Italian Longitudinal Study on Aging 04/2018 -Junior Data Analyst 08/2018 InfoEdge Technology, Rome (Italy) Job: Development of web page for data collection (XML, HTML, SASECM) 01/2017 -Internship at Italian National Institute of Health (Istituto Superiore di Sanità) 01/2018 Department of Food Safety, Nutrition and Veterinary Public Health

ISS - Istituto Superiore di Sanità, Rome (Italy)

Research: Epidemiological analysis of population exposure to mycotoxins and probabilistic assessment of dietary exposure to deoxynivalenol (DON) of Italian population

04/2023 -Researcher for the Centre for Gender and Global Health, University College London (UCL)

05/2023 Research: Analysis of global datasets providing quantitative data along a care cascade and report on the

key findings of sex-disaggregated differences along the care cascade

01/2021 -Teaching Basic Statistics and R programming

10/2022

LYRIS (www.lyris.school/about) Teaching statistics and R software

SUMMARY OF SCIENTIFIC ACHIEVEMENTS

Non-bibliometric information

9 Number of publications: Number of publications in Class A: Number of books: 0 Total Impact factor: 2023 citations in 2022 papers = 5.0

Total Citations: 8

Average Citations per Product: 8 citations in 4 papers = 2.0

Hirsch (H) index: 2.0 (Scopus)

Normalized H index*: 2.0 (Scopus)

PUBBLICATIONS

Publications selected for the evaluation

- 1. Feraldi, A., Zarulli, V., Mazzuco, S., & Giudici, C. (2023). Functional data analysis approach in population studies: an application to the gender gap in life expectancy. *Quality & Quantity, 1-26*
- 2. Feraldi, A., De Santis, B., Finocchietti, M., Debegnach, F., Mandile, A., & Alfò, M. (2023). Evaluation of Statistical Treatment of Left-Censored Contamination Data: Example Involving Deoxynivalenol Occurrence in Pasta and Pasta Substitute Products. *Toxins*, 15(9), 521.
- 3. Galluzzo, L., Noale, M., Maggi, S., Feraldi, A., Baldereschi, M., Di Carlo, A., ... & ILSA Working Group. (2023). Frailty Prevalence, Incidence, and Association with Incident Disability in the Italian longitudinal study on aging. *Gerontology*, 69(3), 249-260.
- 4. Feraldi, A., and Zarulli, V. (2022). Patterns in Age and Cause of Death Contribution to the Sex Gap in Life Expectancy: A Comparison among Ten Countries. *Genus*, *78*(1), 1-22.
- Galluzzo L, Feraldi A, Gruppo di lavoro WP5 della Joint Action ADVANTAGE. Il quadro epidemiologico della fragilità dell'anziano dai risultati della Joint Action europea ADVANTAGE. Boll Epidemiol Naz 2020;1(1):19-23.

Other publications

- Sex gap in cancer-free life expectancy: the association with smoking, obesity and physical inactivity.
 Alessandro Feraldi, Cristina Giudici, and Nicolas Brouard
 52th Scientific Meeting of the Italian Statistical Society (SIS 2023) ISBN 9788891935618AAVV
- Depression-free life expectancy among 50 and older Americans by gender, race/ethnicity and education: the effect of marital disruption. Alessandro Feraldi and Cristina Giudici 51th Scientific Meeting of the Italian Statistical Society (SIS 2022) - ISBN 9788891932310
- 3. Analysing contributions of ages and causes of death to gender gap in life expectancy using functional data analysis. Alessandro Feraldi, Virginia Zarulli, Stefano Mazzuco, and Cristina Giudici 50th Scientific Meeting of the Italian Statistical Society (SIS 2021) ISBN 9788891927361
- 4. 4. Provenzano, V., Brancato, D., Scorsone, A., Fleres, M., Aiello, V., De Santis, M., Di Noto, A., Feraldi, A., Provenzano, F., Saura, G., & Spano, L. (2016). Insulin Pumps Are Effective and Durable in Adult-Onset Type 1 Diabetes. *Diabetes 2016; 65 (Supplement 1): A569*

Articles under review

1. Estimating Gender Gap in Depression-Free Life Expectancy among 50 and older American widowed:

An application using Interpolated Markov Chain Approach

Feraldi Alessandro, Giudici Cristina, and Brouard Nicolas

Submitted to Journal of Aging and Health (Class A) on August 16th, 2023

First revision: September 13rd, 2023

Third revision (minor): January 22nd, 2024

Ongoing publications

Socioeconomic Inequalities and Smoking-Related Differences in Healthy Working Life Expectancy: An Examination Using U.S. Population-based Estimates from the Health and Retirement Study at Age 50 *Alessandro Feraldi and Christian Dudel*

Unveiling the Data Gap: The Need for Sex-Disaggregated Data Along the Health Pathway for Hypertension, Diabetes, and HIV/AIDS

Alessandro Feraldi, Virginia Zarulli, and Angela Chang

Gender Gap in Cancer-Free Life Expectancy: The Association with Smoking, Obesity and Physical Inactivity Alessandro Feraldi, Cristina Giudici, and Nicolas Brouard

Depression-free life expectancy after widowhood, separation and divorce among community-dwelling elderly population in the US: Results from the US Health and Retirement Study *Alessandro Feraldi and Elisa Cisotto*

Comparison of programs for calculating health life expectancies: Imach, msm/elect (R), and SPACE (SAS) *Alessandro Feraldi, Cristina Giudici, and Nicolas Brouard*

PRESENTATIONS AT INTERNATIONAL CONFERENCES

- 1. Sex gap in cancer-free life expectancy: the association with smoking, obesity and physical inactivity Alessandro Feraldi, Cristina Giudici, Nicolas Brouard Proceeding conference - Population Association of America 2023 Annual Meeting. New Orleans, Louisiana - April 12-15, 2023
- 2. Sex gap in cancer-free life expectancy: the association with smoking, obesity and physical inactivity Alessandro Feraldi, Cristina Giudici, Nicolas Brouard Proceeding conference 33rd REVES Meeting Advances in international research on health and life expectancy in the Covid-19 era. Halifax, Nova Scotia, Canada September 21-23, 2022.
- Functional Data Analysis Approach in Population Studies: An Application to the Gender Gap in Life Expectancy
 Alessandro Feraldi, Virginia Zarulli, Stefano Mazzuco, Cristina Giudici
 Proceeding conference - Population Association of America (PAA) 2022 Annual Meeting, Atlanta, Georgia - April 7th, 2022
- 4. Sex gap in cancer-free life expectancy: the association with smoking, obesity and physical inactivity Alessandro Feraldi, Cristina Giudici, and Nicolas Brouard *Proceeding conference 52th Scientific Meeting of the Italian Statistical Society (SIS 2023)*
- Sex gap in cancer-free life expectancy: the association with smoking, obesity and physical inactivity
 Alessandro Feraldi, Cristina Giudici, and Nicolas Brouard
 Proceeding conference Population Days 2023 14th edition

6. Depression-free life expectancy among 50 and older Americans by gender, race/ethnicity and education: the effect of marital disruption

Alessandro Feraldi and Cristina Giudici

Proceeding conference - 51th Scientific Meeting of the Italian Statistical Society (SIS 2022) Caserta, Italia- June 23rd, 2022

7. Analysing contributions of ages and causes of death to gender gap in life expectancy using functional data

Alessandro Feraldi, Virginia Zarulli, Stefano Mazzuco, and Cristina Giudici

Proceeding conference - 50th Scientific Meeting of the Italian Statistical Society (SIS 2021) - June 21st, 2021

GRANTS & AWARDS

2022	Bando Avvio alla Ricerca, Sapienza University, Rome, Italy (2022)
2021	2nd best Flash talk - New data for the new challenges of population and society -
	Progetto di Eccellenza. University of Padua, Padua, Italy.
2015	Erasmus, Sapienza University, Rome, Italy
2012	Scholarship, University of Palermo, Italy
2011	Scholarship, University of Palermo, Italy

SOCIETY MEMBERBERSHIPS

Since 2021 Società Italiana di Statistica (SIS) Since 2022 Population Association of America (PAA)

IT SKILLS

IT	MS Office and OpenOffice	Advanced
	R	Advanced
	SPSS	Very good
	SAS	Very good (Certified Base Programmer SAS9)
	IMACH	Advanced
	LateX	Advanced
	JotForm	Good

RESEARCH ACTIVITIES

Gender disparities in	To shed light on the evolution of the gender gap in survival in the recent decades by
health and survival	examining patterns of contributions of ages and causes of death to the gender gap in life
	expectancy. The analyses cover a wide range of causes of death and include long time periods
	for several European and non-European countries. To investigate gender differences in the
	associations between health expectancy and social and behavioural risk factors, focusing on
	healthy life expectancy as life expectancy free from specific diseases (not commonly studied,
	e.g. cancer and depression), rather than disability-free life expectancy.
Age and causes-of-	Constructing summary measures of trend and dispersion of the contributions to the overall
death contributions	gender gap, for each cause of death, between and within age groups, to evaluate how each
to the gender gap	distribution of age-specific contributions behaved over time. This approach gives a new and

	non-conventional insight into the trends of the sex gap in life expectancy. The research shows that different patterns in terms of age groups and causes of death have contributed to the declining sex gap in life expectancy in the recent years. In addition, we uncover different patterns that specific causes have on the male–female mortality differences at various ages.
Functional data analysis	Functional Principal Component Analysis of the age profiles of cause-specific contributions, to identify the main components of the distribution of the age-specific contributions according to causes of death, and to summarize them with few components. The research show that in the most recent period the gender gap in life expectancy is affected by composition of the causes of death more than it was in previous periods and emphasises that Functional Data Analysis could prove useful to deepen our understanding of complex demographic phenomena.
Mental health expectancy and widowhood	To compare population-based estimates of depression-free life expectancy (namely the number of years of life an individual can expect to live without depression) of widowed as against married people, among recent U.S. older adults (from the Health and Retirement Study), assessing gender-specific differences. The research reveals that the difference in life expectancy between sexes widens in the context of widowhood. The gender gap in depression-free life expectancy widens by almost double when comparing widowed individuals to married individuals.
Cancer-free life expectancy and behavioural risk factors	Examine the association between smoking, obesity, and physical inactivity and cancer-free life expectancy in women and men, in a representative cohort of American older adults (from the Health and Retirement Study). The research highlights that smoking was associated with the shortest cancer-free life expectancy, whereas significantly shorten cancer-free life expectancy only in women. Notably, compared to men, women showed to lose a longer life expectancy free of cancer through the adherence to risky lifestyles.
Frailty prevalence, incidence, and associations	To provide population-based estimates of prevalence and incidence of frailty from the Italian Longitudinal Study on Aging (ILSA) and analyse the association with disability. The research shows that the prevalence and the incidence of (pre-) frailty were overall higher for women and increased with age. Additionally, frailty was a strong and independent predictor of disability.
Gender disparities in Health Pathway	Collecting sex- and age-disaggregated data along the health pathway (risk factor prevalence, disease prevalence, care cascade, and death rates) by sex and age for selected diseases, the research estimates the sex difference by age, income, and region, and provide an analysis of the associations with socioeconomic factors. Results show less progression in the care cascade, poorer health outcomes, and the higher prevalence of risk factors for males, with the exception of unsafe sex and obesity, which were more common among females.
Inequalities in Healthy Working Life Expectancy	Using U.S. Health and Retirement Study data, employing a multistate lifetable approach to model individual life courses, we examine disparities in healthy working life expectancy concerning race/ethnicity, education, and smoking habits at ages 50+. Findings reveal healthy working life expectancy disparities linked to socioeconomic factors and smoking behaviour, with men and non-smokers having longer healthy working life expectancy. The largest smoking differential is observed among American Indian/Alaskan Native, Asian/Pacific Islander, and individuals of other ethnicities, and Black Americans report the overall shortest healthy working life expectancy. Lower educated individuals report more than one-year shorter healthy working life expectancy than higher educated.