

# My research journey

Marta Bofill Roig

May 15, 2026



UNIVERSITAT POLITÈCNICA  
DE CATALUNYA  
BARCELONATECH

# Research journey – The start

2009-2014



**BSc in Mathematics**

2014-2016

**MSc in Statistics and Operations Research**

2016-2020



**PhD in Statistics and Operations Research**



**BGSMath**  
BARCELONA GRADUATE  
SCHOOL OF MATHEMATICS



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**Hypothesis testing, survival analysis and sample size calculations** for trial designs with multiple endpoints

- Endpoint selection and sample size for composite endpoints
- Design and analysis of trials with survival and binary endpoints



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M. Bofill Roig, G. Gómez Melis. (2018). Selection of composite binary endpoints in clinical trials. *Biometrical Journal*

M. Bofill Roig, G. Gómez Melis (2019). A new approach for sizing trials with composite binary endpoints. *Statistics in Medicine*

M. Bofill Roig, G. Gómez Melis (2021). A class of two-sample nonparametric statistics for binary and time-to-event outcomes. *Statistical Methods in Medical Research*

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## Meetings, workshops, conferences and others



# Research journey – The start

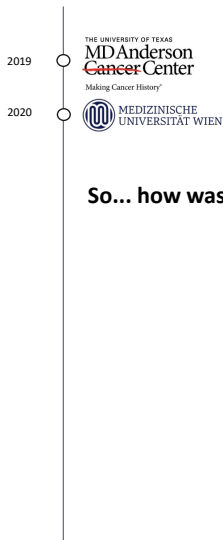


## Secondments and international collaborations

M. Bofill Roig, et al. (2021). Design of phase III trials with long-term survival outcomes based on short-term binary results. *Statistics in Medicine*

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**So... how was the PhD?**

# Research journey – The start



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## So... how was the PhD?



# Research journey – The maturity

2021-  
April 2023



## Postdoctoral position 1

**Multiple testing, Optimal Design** for the design and analysis of platform trials

- Methods for **Non-concurrent controls**
- Strategies on **Optimal allocation**
- Methods for **Online control**
- Statistical support on **disease-specific areas**



## WP2 Scientific, Regulatory and Operational Methodology

M. Bofill Roig, et al. (2022). On model-based time trend adjustments in platform trials with non-concurrent controls. *BMC Medical Research Methodology*

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April 2023-  
August  
2023



## Postdoctoral position 2

**Sequential testing, Multiple testing** for the design and analysis of a basket trial

- Master trial protocol
- Software: **Clinical Trial simulations**



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## WP1 Establishment of a master trial protocol and related documents

# Research journey – The maturity

2021-  
April 2023



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Sept 2023-  
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2024



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## Senior Postdoctoral position

### Austrian Science Fund ESPRIT Programme

- **Principal investigator** in the project “Methods for complex trial designs with shared controls” (2023-2026)



# Research journey

**So... how was the Postdoc?**

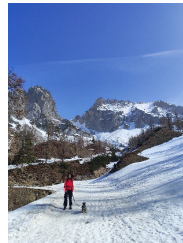
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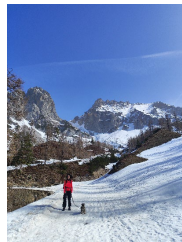
# Research journey

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# Research journey

So... how was the Postdoc?



Sept 2024 -



Serra Hünter Fellow

Back to the roots 😊



That's all folks!



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