



Genuity Science is a contract genomics and data-sourcing, analytics and insights organization headquartered in Boston, Massachusetts, USA with offices in Dublin, Ireland and Reykjavik, Iceland. Genuity works in collaboration with clinicians, patients, academic researchers and global pharmaceutical companies to use the power of population genomics to discover pathways to new treatments and new diagnostics.

Genuity Science's Multiple Sclerosis (MS) Research Study Update

STUDY INFORMATION

5 YEAR Recruitment Period

2021 Expected Completion Date

22 Live Sites

1 Study Site Opening 2020

PARTICIPANTS TO DATE

2,175 Recruited

48 YEARS Average Age of Participants

71.5%

28.5%

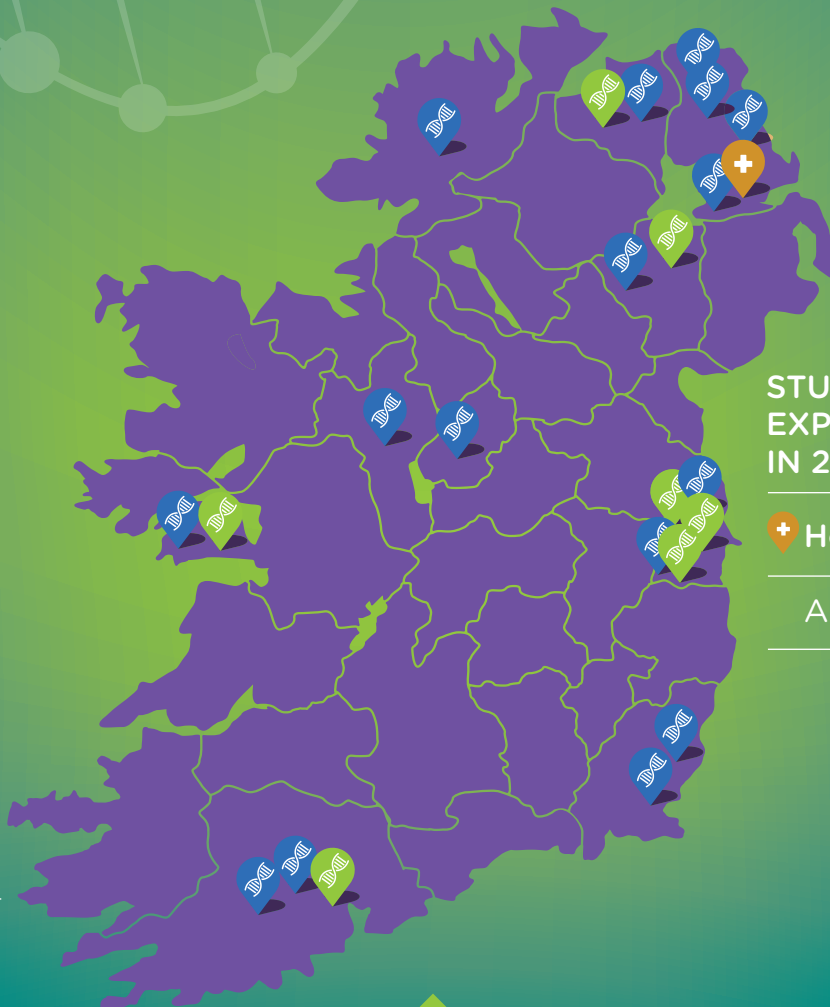
LIVE SITES BY COUNTY:

Hospitals

Dublin x3
Cork
Galway
Derry
Armagh

Primary Care

Dublin x2
Wexford x2
Longford
Cork x2
Roscommon
Antrim x4
Donegal
Derry
Armagh
Galway



STUDY SITES EXPECTED TO OPEN IN 2020

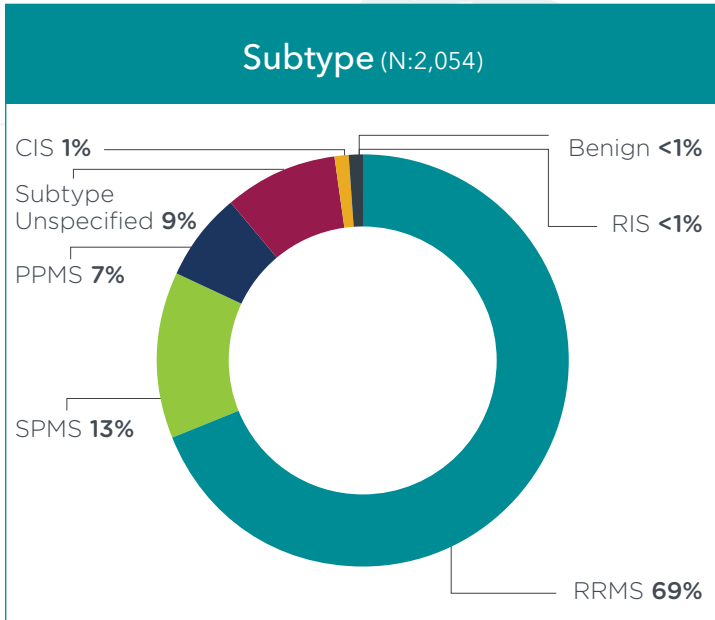
Hospitals

Antrim

Please visit our website at www.phi.genuitysci.com for more information

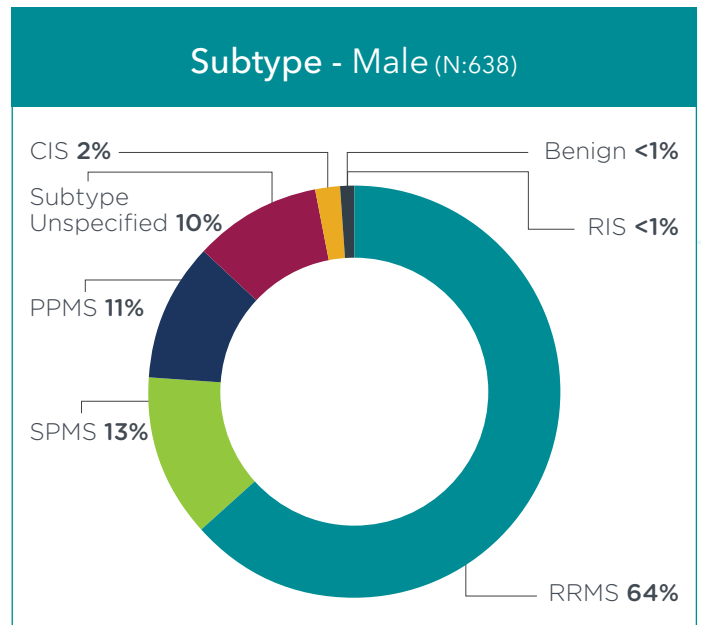
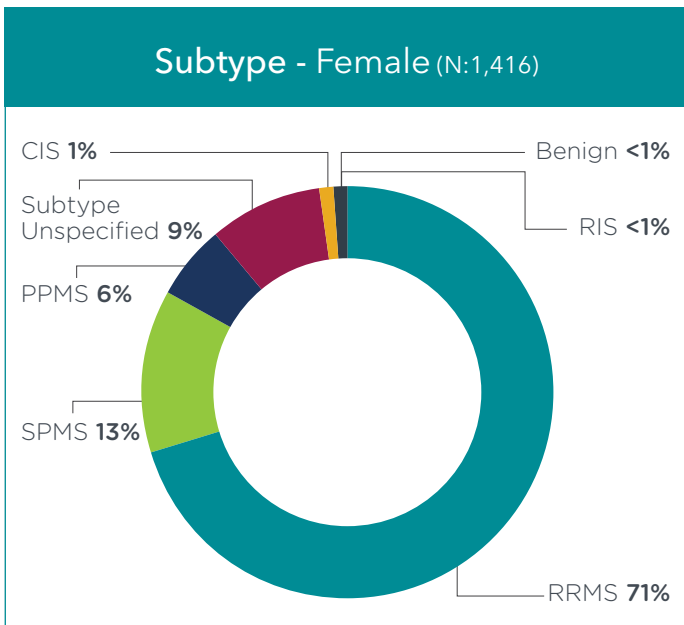
STUDY FINDINGS TO DATE

Average age at diagnosis: 37 years (Female: 36.5 years, Male: 38 years)



Glossary

	CIS: Clinically Isolated Syndrome
	RIS: Radiologically Isolated Syndrome
	RRMS: Relapsing Remitting MS
	PPMS: Primary Progressive MS
	SPMS: Secondary Progressive MS



All findings are based on preliminary data and are subject to change.

STUDY FINDINGS TO DATE

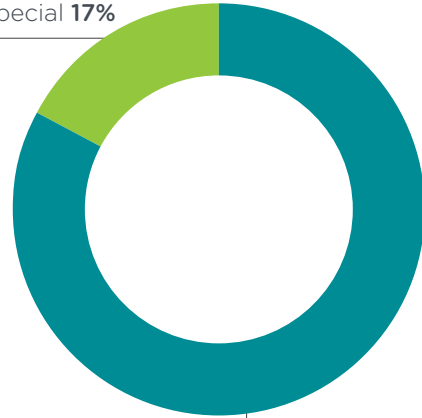
Of the individuals who follow a special diet:

DIET	%
Vegetarian/reduced meat intake	24.65
Low fat	23.53
Reduced gluten/gluten free	21.85
Low dairy/dairy-free	12.04
Low carb/low sugar/sugar-free	10.64
Low calorie	9.52
High protein	8.12
Diabetic	7.56
Vegan	7.00
Low salt	6.72
Low cholesterol	4.20

Note: Individuals may follow more than 1 diet

Diet (N:2,046)

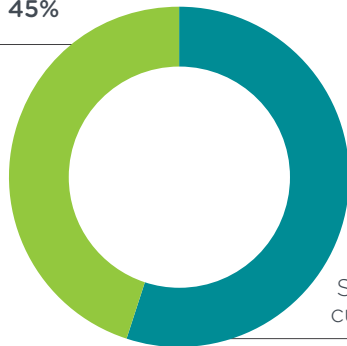
Follow Special **17%**



Do Not Follow Special Diet **83%**

Smoking (N:2,024)

Non Smoker **45%**



Smoker (ever/currently) **55%**

Comorbidities (N:2,054)

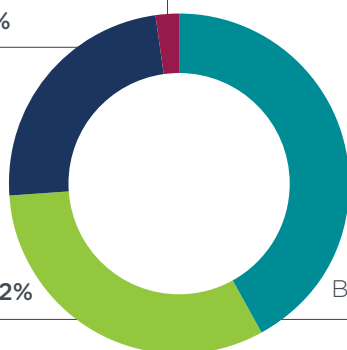
	%
Depression	21.76
Anxiety	20.69
High cholesterol	15.04
Chronic back pain	11.83
Hypertension	8.52
Thyroid disorder	7.59
Arthritis	7.25
High blood pressure	3.02
Migraine	2.82
Type 2 diabetes	2.63
Asthma	2.48

Note: Individuals may have more than 1 comorbidity

BMI (N:1,843)

BMI >30 **24%**

BMI <18 **2%**



BMI 25-30 **32%**

BMI 18-25 **42%**

Average BMI: 26.9

The preliminary findings align with the findings in other studies reporting on gender breakdown, smoking status, average BMI and subtypes.

We hope that building on this data will help strengthen our knowledge of MS and provide greater insight into future treatments.

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MEET THE TEAM



Name

Blánaid Ní Chuinneagáin

Position

Genuity Science
Programme Manager

How long have you been working on the study?

Since April 2019

Why do you do what you do? I have a passion for MS research and am interested in understanding why certain people develop the disease and in turn, why certain people develop different subtypes. I hope my contribution as Programme Manager and the work I do in collaboration with researchers and patient advocacy groups can help lead to a better understanding of MS.

MS STAKEHOLDER SUMMIT



The first MS Stakeholder Summit was held in January 2020.

The Summit brought together doctors, researchers, patients and patient advocacy groups to hear about the progress of the study to date and to provide their observations. The Summit enabled Genuity researchers to align the study and its future direction with patient, doctor and researcher feedback.



MS IRELAND BALL, MORRISON HOTEL, DUBLIN

Genuity was honoured to attend the MS Ireland Ball in May 2019. Great fun was had by all.



KISS GOODBYE TO MS

Genuity Science was delighted to be chosen as the 2019 entry for Ireland in the Kiss Goodbye to MS Lab Battle.

<https://www.kissgoodbyetomsglobal.org/lab-battle>

Genomics Medicine Ireland is now Genuity Science

On the 23rd June 2020 Genomics Medicine Ireland (GMI), the sponsor of this study, changed its name to Genuity Science. More information on the name change can be found [here](#).

Upcoming Study Plans

- Subject to normal research activities re-commencing post COVID-19, the study will continue to recruit patients diagnosed with MS from across the island of Ireland
- It is expected that 1 more Hospital Site will be opened up in 2020 to allow for additional recruitment
- Genuity Science will attend the annual MS Ireland conference, whether this be in person or virtually

Why do we need genomic research?

We do not know what causes MS but scientists believe that a combination of factors may be at play. There have been approximately 200 genetic variants (changes) identified that may increase a person's risk of developing MS. By exploring the relationship between genomics, the environment, and other supposed risk factors, Genuity hopes to better understand the possible causes of MS. Having a deeper understanding of the causes will accelerate the process of finding better diagnostics and more effective treatments for this complex disease.

If you'd like to learn more about participating in this study please visit our precision health initiative website www.phi.genuitysci.com