

TONiC-MS

# MERRY CHRISTMAS

*We hope your holidays are  
filled with laughter & love*

Thank you so much for your generous contributions to our TONiC study! We are very grateful for your ongoing partnership!

It is Christmas time once again and we wish you a merry Christmas and a Happy New Year!

## Winter Greetings!



The TONiC-MS study is now analysing information from over 6000 people who have completed at least one TONiC questionnaire pack. We are particularly grateful to the many people who have completed more than one pack, as this allows us to study how MS changes over time. **If you are willing to complete another pack, please contact the TONiC team** (contact details on page 3).

December 2023

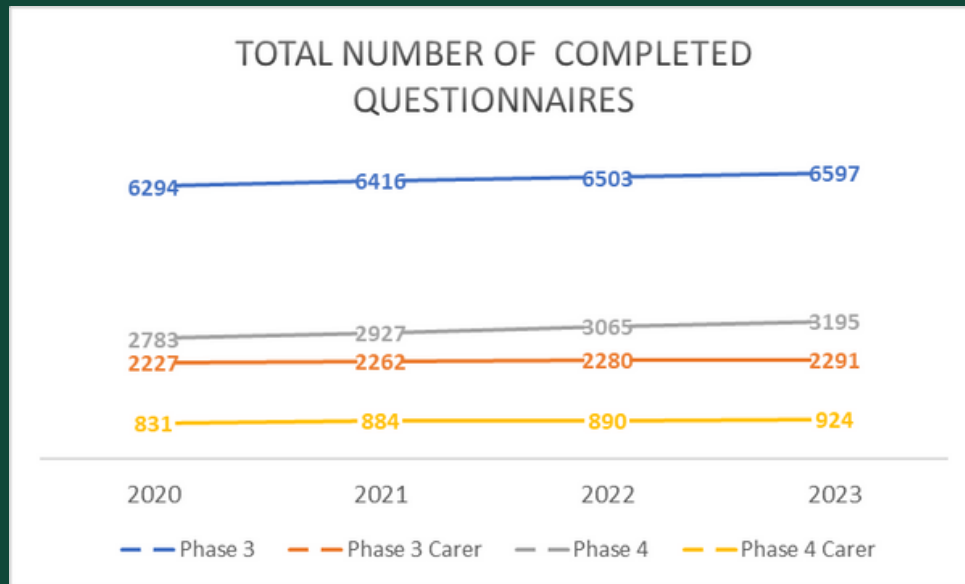
## TONiC Recruitment updates:

People with MS completing Phase 3 questionnaire = 6,597

Family or friends completing Phase 3 questionnaire = 2,291

People with MS completing the first questionnaire for Phase 4 = 3,195

Family or friends completing the first questionnaire for Phase 4 = 925



## Phase 7 - Roche TONiC Floodlight app

TONiC researchers are collaborating with the pharmaceutical company F. Hoffmann-La Roche Ltd (Roche) to combine smartphone app technology (Floodlight MS) with the TONiC study.

Floodlight is a smartphone app, which is designed to keep track of your MS by completing 5 simple tasks every week over at least 3 years. Participants also receive annual face-to-face clinic assessments during Phase 7. Phase 7 is only available at study centres in Liverpool Nottingham and North Midlands. We are in the process of opening Phase 7 in Salford.

### SOME FUN FACTORS

One of the 5 tasks on app is 'Pinch a Tomato' for fine finger movements. Participants are asked to *pinch* as many tomatoes as possible on the phone screen in 30 seconds. The total number of tomatoes squeezed is 522,020! This would produce a whopping 31,321 bottles of ketchup!



Another task involving dexterity is 'Drawing Shape' by tracing a line on the phone screen. The total length drawn by our participants has reached 39.2km, which is coming close to the distance of a marathon (42.195km)!



---

## Recent TONiC Publications

---

- ❄️ Young CA, Rog DJ, Sharrack B, Constantinescu C, Kalra S, Harrower T, Langdon D, Tennant A, Mills RJ; Trajectories of Outcome in Neurological Conditions (MS) Study Group. Measuring disability in multiple sclerosis: the WHODAS 2.0. *Qual Life Res.* 2023 Nov;32(11):3235-3246. doi: 10.1007/s11136-023-03470-6. Epub 2023 Aug 17. PMID: 37589773; PMCID: PMC10522513.
- ❄️ Rothman I, Tennant A, Mills RJ, Young CA. The association of health locus of control with clinical and psychosocial aspects of living with Multiple Sclerosis. *Journal of Clinical Psychology in Medical Settings.* Published online 6 Feb 2023. doi: 10.1007/s10880-023-09938-4
- ❄️ Young CA, Mills RJ, Langdon D, Rog DJ, Sharrack B, Kalra S, Majeed T, Footitt D, Harrower T, Nicholas RS, Ford HL, Woolmore J, Johnstone C, Thorpe J, Paling D, Ellis C, Hanneman CO, & Tennant A on behalf of the TONiC Study Group. Measuring coping in multiple sclerosis: The Coping Index-MS. *Multiple Sclerosis Journal.* 2022. 28(14):2274-2284. doi: 10.1177/13524585221114004. Epub 2022 Aug 24. PMID: 36000480.
- ❄️ Young CA, Mills R, Langdon D, Sharrack B, Majeed T, Kalra S, Footitt D, Rog D, Harrower T, Nicholas R, Woolmore J, Thorpe J, Hanemann CO, Ford H, Paling D, Ellis C, Palace J, Constantinescu C, Tennant A. The four self-efficacy trajectories among people with multiple sclerosis: Clinical associations and implications. *J Neurol Sci* 2022; 436:120188. doi: 10.1016/j.jns.2022.120188. Epub 2022 Feb 18. PMID: 35303502.
- ❄️ Ando H, Cousins R, Young CA. Understanding quality of life across different clinical subtypes of multiple sclerosis: a thematic analysis. *Qual Life Res.* 2022; 31(7):2035-46. doi: 10.1007/s11136-021-03041-7. Epub ahead of print. PMID: 34822047.

---

## More Findings:

---

Thanks to all our MS participants and their carers who have very kindly taken the time to complete the TONiC questionnaires.

TONiC findings are regularly updated on our website:  
<http://www.finders-study.org/research-papers>



For more information, please visit [www.finders-study.org](http://www.finders-study.org) (or simply scan the QR code on this page!)

Email: [wfft.tonic@nhs.net](mailto:wfft.tonic@nhs.net)

Phone: 0151 556 3693



---

*Looking forward to hearing from you  
in the New Year!*

