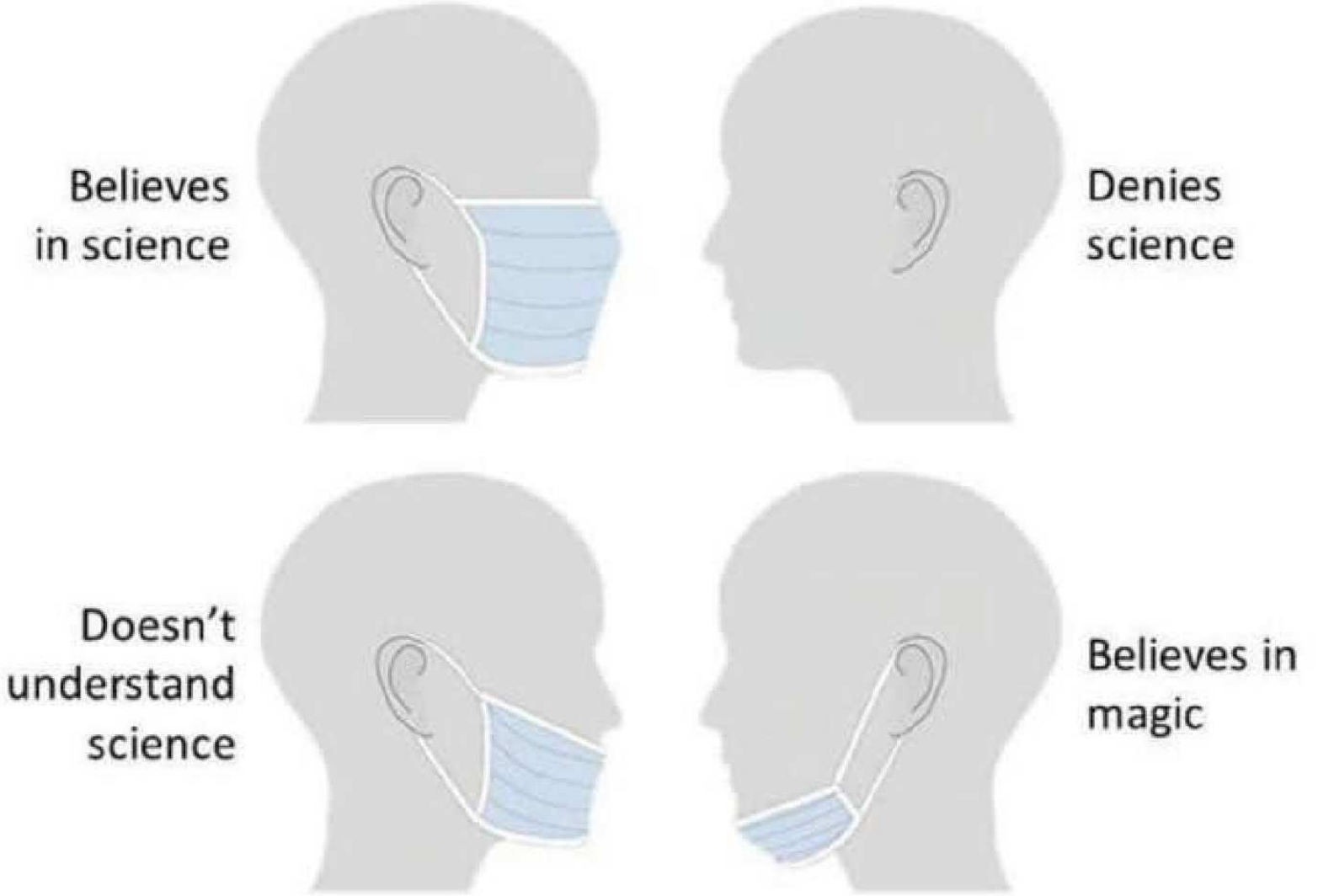
The Four COVID Personality Types

(*spotted at the local grocery store*)



17th MultiDark Workshop: LHC/DM subgroup

Sven Heinemeyer, IFT/IFCA (CSIC, Madrid/Santander)

virtual, 01/2021

Co-convenors: *Mario Gomez, Martin Hirsch*

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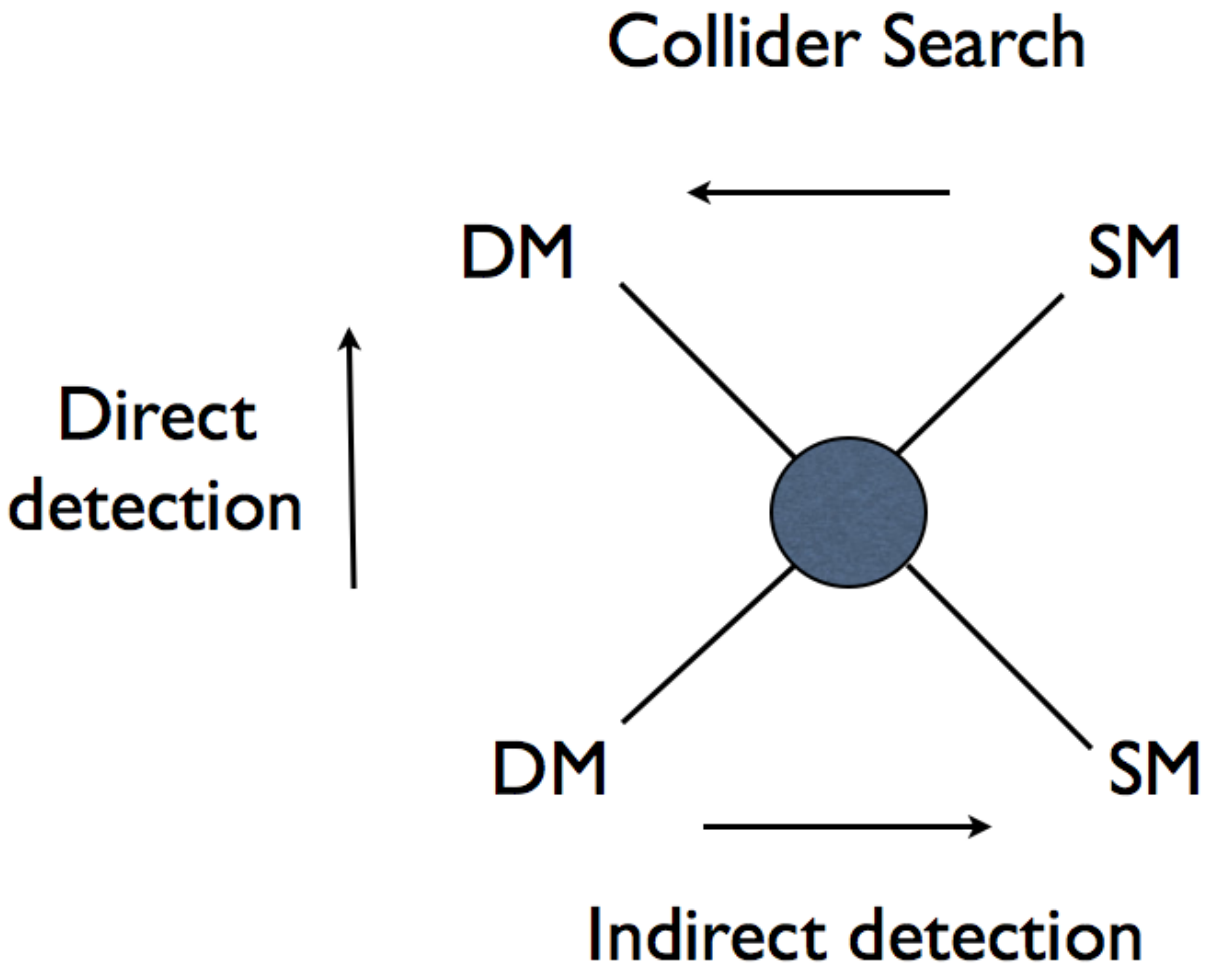
Most people have this picture in mind:



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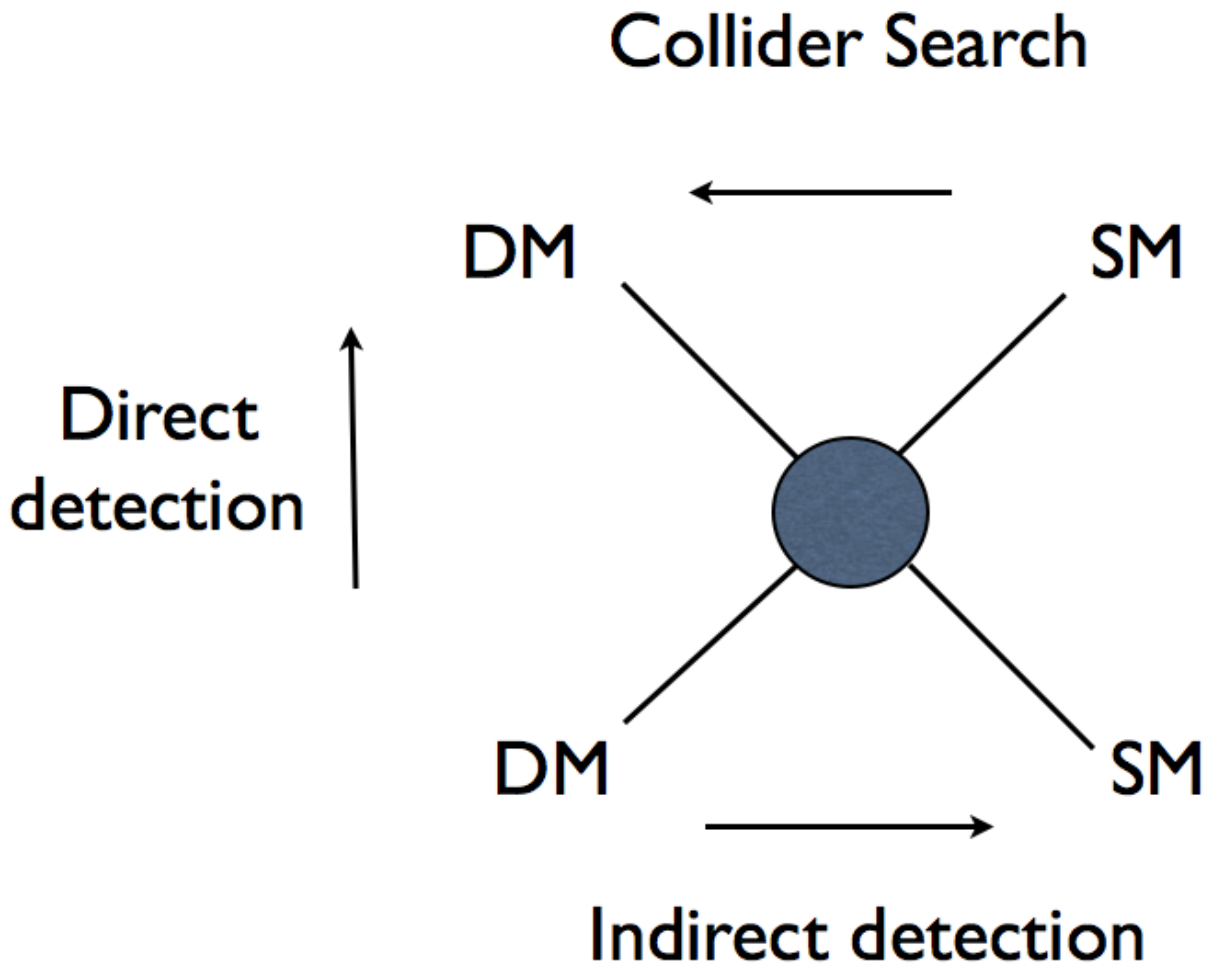

⇒ But there is so much more . . . !!

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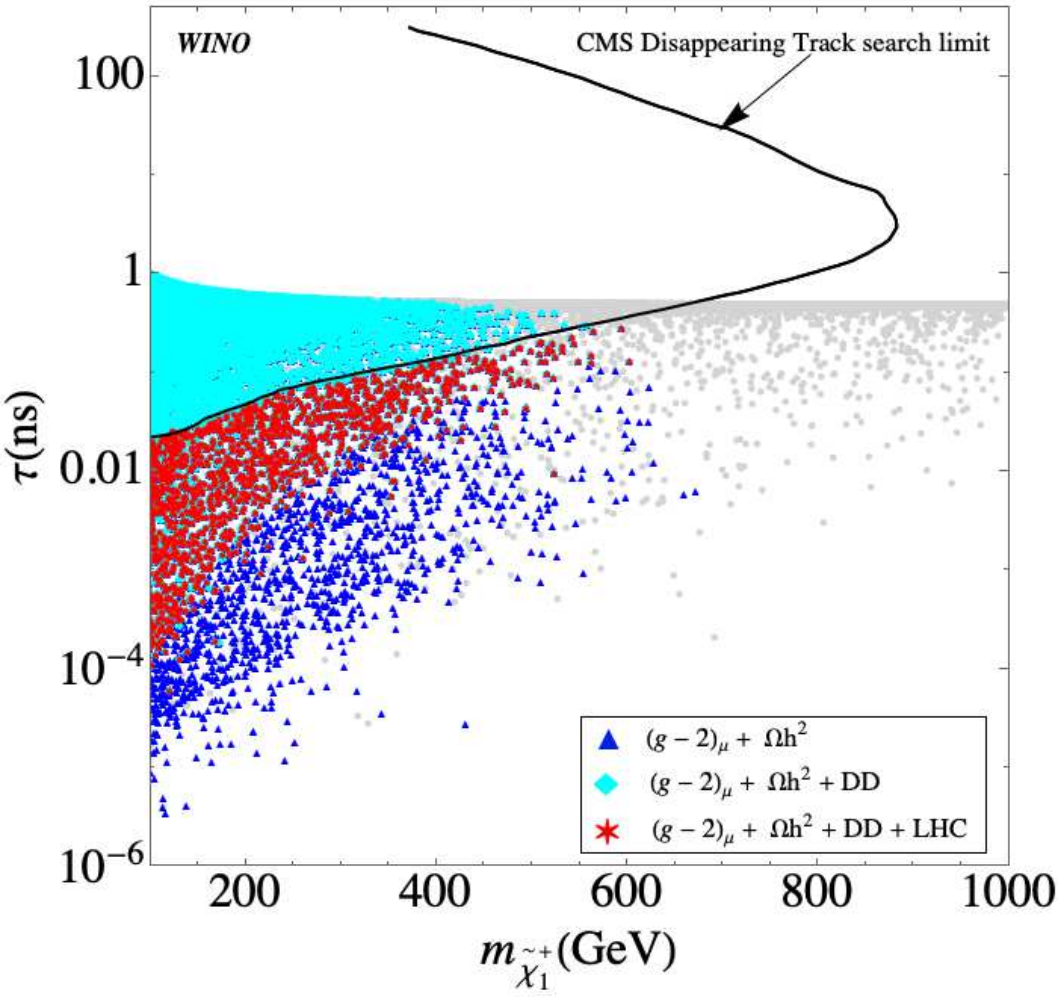
What did I miss? Tell me in the coffee break!

One example for the latter **Q**: [*M. Chakraborti, S.H., I. Saha –PRELIMINARY*]

SUSY, Wino DM ($m_{\tilde{\chi}_1^0} \approx m_{\tilde{\chi}_1^\pm}$), $m_{\tilde{\chi}_1^\pm}$-$\tau_{\tilde{\chi}_1^\pm}$ plane (with $(g-2)_\mu$ ok):



Cyan: LHC disap. track searches Blue: DD bounds Red: allowed points

$\Rightarrow$ allowed parameter space squeezed by DD limits and disapp. tracks

Our program:

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   The muon g-2, and the long lived particles from the LSPs at the LHC

2. Cem Un:
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$\Rightarrow$ Let's see what they tell us about our questions! :-)