cerebellar contribution to motor and non-motor behaviour: **from simple to complex levels**

- Simple spike suppression is essential for the proper expression of the conditioned response and is at least driven by climbing fiber and molecular layer interneuron input. (this thesis)
- 2. Purkinje cells cooperate in functional ensembles that facilitate rapid integration of diverse sensory inputs contributing to sensorimotor integration in the whisker system. (this thesis)
- 3. The Erasmus Ladder can detect subtle phenotypes in cerebellar mutants, especially in challenging tasks under a time constraint. (this thesis)
- Cerebellar processing in motor control is particularly relevant when precise temporal accuracy is required, which also applies to cerebellar function in the non-motor domain. (this thesis)
- 5. Mice that lack plasticity mechanisms in the cerebellar cortex do not show deficits in tests that assess cognition or emotion. (this thesis)
- 6. By applying complicated instruments and simple statistics, neuroscientists can see meaningful brain activity anywhere even in a dead salmon.

 (Bennett et al, poster, 15th Annual Meeting of the Organization for Human Brain Mapping, June 2009)
- 7. Motor, auditory and visual regions in a musician's brain are different from the same regions in non-musicians.
 - (Gaser & Schlaug, J Neuroscience 23(27):9240-9245)
- 8. Science has become a self-referential system where quality is measured mostly in bibliometric parameters and where societal relevance is undervalued. (Science in Transition position paper, published on www.scienceintransition.nl)
- The use of open source software and hardware in neuroscience is something that needs to be more encouraged, but without proper coordination or research the wheel is too many times reinvented.
- 10. While in recent years there has been an explosion of studies carried out to study the mental abilities of a dog, research to study the intelligence of the cat is still in its infancy.
 - (John Bradshaw, NRC Handelsblad 28-06-2014)
- 11. From a problem-solving perspective there is no difference between a brain electrode and an endotracheal tube: if in doubt, take it out.