State-of-the-art NMR for structural and analytical chemistry *in situ*

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One of the unique properties of Magnetic Resonance (MR) has been its ability to non-invasively yield structural and analytical information from the test tube to in-situ applications in soil, materials, plants and even entire human organisms.

In recent years, innovative preparation methods and breakthrough technologies such as hyperpolarization and the advent of ultra-high field magnet systems offer a completely new range of application areas for NMR in life and material science. In our talk, we will discuss ongoing studies in our laboratory that make use and further develop such approaches for applications in biomolecules and (bio)materials. Our research is supported by uNMR-NL, the National Roadmap Large-Scale NMR Facility of the Netherlands.