



UNIVERSITÄT **BONN**

Die Pflanzenwissenschaftlichen
Institute

Einladung zum Pflanzenwissenschaftlichen Kolloquium

Freitag, den 9. Mai 2025, 12 c.t.

Nussallee 9, Hörsaal X

Referent: Prof. Dr. Stephan Clemens

Lehrstuhl Pflanzenphysiologie, Universität Bayreuth

Thema: „The good and the ugly – element accumulation in plants“

Zinc (Zn) and iron (Fe) are essential for virtually every biological process. Our understanding of acquisition and distribution pathways for these micronutrients, however, is still limited. Relevant as environmental factors for plants are not only macro- and microelements, but also potentially highly toxic elements without biological function, e.g. cadmium (Cd) and arsenic (As).

Human well-being depends in many ways on the ionome of plants. Plant-derived food is a major source of micronutrients, and an estimated three billion people are threatened by Zn or Fe deficiency. Furthermore, most of the human cadmium intake and a large fraction of the arsenic intake is due to the consumption of plants. Thus, we need to better understand the pathways determining metal accumulation in plants. The talk will focus on two aspects, namely mechanisms controlling Zn accumulation in plants, and on thiolated arsenic species that potentially pose a food safety threat.

Diskussionsleitung: Prof. Dr. Andreas Meyer, INRES - Chemical Signalling, Universität Bonn

Zu diesem Vortrag und zu einer evtl. Nachsitzung sind Sie herzlich eingeladen