



Fakultät für Physik

Isotopenforschung und Kernphysik

EINLADUNG zum VERA-SEMINAR

von

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## The CARIBIC flying observatory and its applications

The troposphere can be considered as a complex chemical reactor reaching from the boundary layer up to the tropopause region, in which a multitude of reactions takes place driven by sunlight and supplied with precursors emitted by vegetation, wildfires, and obviously human activities on earth, like burning oil products. Research aircraft (say modified business jets) are far too expensive for a global view of this extensive atmospheric system that changes from day to night, season to season, year to year, and will keep changing. CARIBIC (www.caribic.de) is a logical answer; it is a flying observatory, a 1.5 ton freight container packed with over 15 instruments, for exploring the atmosphere on a regular basis using cargo space in a Lufthansa Airbus A340-600 on intercontinental flights. By means of various results obtained by CARIBIC, about among others volcanic eruptions, the monsoon and accompanying emissions of methane, and long range transport of pollution, we will show how some of the questions atmospheric research grapples with are being addressed, without having a fleet of business jets.

## Donnerstag, 14. Juni 2012, 16:30 Uhr 1090 Wien, Währinger Str. 17, "Kavalierstrakt", 1. Stock, Victor-Franz-Hess Hörsaal