

***Interactive comment on “Multi-periodic climate dynamics: spectral analysis of long-term instrumental and proxy temperature records” by H.-J. Lüdecke et al.***

**H.-J. Lüdecke et al.**

moluedecke@t-online.de

Received and published: 24 September 2012

We thank K. Haustein for the suggestions which can in fact help to express more clearly our main points. K.Haustein has a point: Instead of: "the cause the periodicities is unknown" we should have written more correctly : "we are not aware of the causes of these periodicities" (Others may be aware?). We would be more than obliged to anyone who could indicate to us the causes for these periodicities. Lacking knowledge of such causes, we have CONJECTURED that the observed oscillations are intrinsic dynamics. This is the most plausible explanation for the dissipative system earth, on which intrinsic dynamics ( such as weather, atmospheric dynamics ( trade winds etc. )

C1679

is the rule. The observed period doubling is evidence for this conjecture.

Let us state, however, that a conclusion of lacking influence of CO<sub>2</sub> on global temperature is entirely independent of whether the periodicities are intrinsic or caused by forcing. What matters is that the periodicities ( no matter what causes them ) explain the temperature history without assumption of forcing by CO<sub>2</sub>.

---

Interactive comment on Clim. Past Discuss., 8, 4493, 2012.

C1680