



Response to Carbillon L et al. letter titled; “The imbalance of circulating angiogenic/anti-angiogenic factors is mild or absent in obese women destined to develop preeclampsia”

Sarosh Rana & S. Ananth Karumanchi

To cite this article: Sarosh Rana & S. Ananth Karumanchi (2014) Response to Carbillon L et al. letter titled; “The imbalance of circulating angiogenic/anti-angiogenic factors is mild or absent in obese women destined to develop preeclampsia”, *Hypertension in Pregnancy*, 33:4, 525-525, DOI: [10.3109/10641955.2014.940236](https://doi.org/10.3109/10641955.2014.940236)

To link to this article: <https://doi.org/10.3109/10641955.2014.940236>



Published online: 28 Jul 2014.



Submit your article to this journal [↗](#)



Article views: 382



View related articles [↗](#)



View Crossmark data [↗](#)

LETTER TO THE EDITOR

Response to Carbillon L et al. letter titled; “The imbalance of circulating angiogenic/anti-angiogenic factors is mild or absent in obese women destined to develop preeclampsia”

Sarosh Rana and S. Ananth Karumanchi

Beth Israel Deaconess Medical Center and Harvard Medical School, Boston,
MA, USA

Lionel Carbillon raises an interesting point that angiogenic abnormalities may not contribute to the pathogenesis of preeclampsia among obese subjects. Our study in which we demonstrated that preeclamptic women who have normal angiogenic profile tend to be more obese than preeclamptic women with an abnormal angiogenic profile (BMI 35.2 versus 31.1 in non-angiogenic versus angiogenic preeclamptics) (1) supports his hypothesis. These findings taken together with prior work by Loire et al. (2) and Suwaki et al. (3) suggest two potential models to explain preeclampsia among obese subjects. An obvious explanation is that there are still unidentified non-angiogenic pathways in obese subjects that mediate preeclampsia. Another possibility is that the majority of obese subjects may be misclassified as preeclamptics as they tend to have baseline hypertension and/or proteinuria from subclinical renal disease. Our finding that obese preeclamptics with normal angiogenic profile have no adverse maternal or fetal outcomes (1) supports the latter hypothesis. More studies are needed before we can draw definitive conclusions.

DECLARATION OF INTEREST

Dr. Karumanchi is a co-inventor on multiple patents in the area of preeclampsia markers and reports having served as a consultant to Roche, Siemens, Beckman Coulter, and has financial interest in Aggamin LLC. The remaining authors report no conflicts.

REFERENCES

1. Rana S, Schnettler WT, Powe C, et al. Clinical characterization and outcomes of preeclampsia with normal angiogenic profile. *Hypertens Pregnancy* 2013;32: 189–201.
2. Loire P, Vicaut E, Cruaud P, et al. Limited value of angiogenic factors in obese women. *Pregnancy Hypertens* 2012;2:368–70.
3. Suwaki N, Masuyama H, Nakatsukasa H, et al. Hypoadiponectinemia and circulating angiogenic factors in overweight patients complicated with pre-eclampsia. *Am J Obstet Gynecol* 2006;195:1687–92.