Reviewer's report

**Title:** B-Mode Ultrasound Common Carotid Artery Intima-Media Thickness and External Diameter: Cross-Sectional and Longitudinal Associations with Carotid Atherosclerosis in a Large Population Sample

**Version:** 3  **Date:** 5 February 2008

**Reviewer:** Michele Masini

**Reviewer's report:**

The manuscript is elegant, important, original and well written, providing clear evidence that carotid lumen and wall remodelling provide additional prognostic information in risk stratification. I have only a suggestion to clarify the very important content of the manuscript with 2 additional figures: one figure showing (possibly in the methods, as new fig. 1) the B-mode images of the 4 main patterns described (with long and short axis view): 1) normal (normal diameter and thickness); 2) eccentric (lumen) remodelling (diameter increase, normal thickness); 3) concentric (wall) remodelling (normal diameter, increased thickness); 4) diffuse (wall and lumen) remodelling (increased diameter, increased thickness).

Figure 1 (very nice) would become figure 2.

In the Discussion, I would again emphasize this very important message showing schematically the 4 patterns with the indication of relative risk. A proposed outline of the figure 3 is enclosed.

**What next?:** Accept after minor essential revisions

**Level of interest:** An article of importance in its field

**Quality of written English:** Acceptable

**Statistical review:** No, the manuscript does not need to be seen by a statistician.