

Figure 1. Colored vertebrae representing the strength of integration within each subaxial cervical vertebra. Top: integration from raw data; bottom: integration as calculated from residuals. All represented vertebrae are globally integrated (see the electronic supplementary material, Table S3). Red color represents strong integration and purple represents weaker integration. Gorillas display higher integration followed by chimpanzees and humans. A decreasing cranio-caudal pattern of integration can be observed, which is more evident when size is removed. Humans depart from this decreasing cranio-caudal pattern by showing lower integration values in the C3 than in more caudal elements. Results from residuals show lower values of integration in all subaxial cervical vertebrae in gorillas and chimpanzees, demonstrating that size has an important effect on integration in non-human hominines. In humans, results from residuals are very similar to those obtained from raw data, which means that size is not a factor of integration in this group. Different images are not to the same scale.

NOTAS PARA AIDA:

1-La figura de residuals y la de Raw de *H. sapiens* no tienen exactamente la misma orientación y de ahí las diferencias.¿Podrías mandarlas de nuevo?

2-¿Está bien el color de la C6 de los chimps de los residuals? En la tabla la diferencia es una milésima pero en la figura la diferencia de color es notable. ¿Podrías confirmar si está bien?



Figure 2. Contour line diagrams represent correlation fields across subaxial cervical vertebrae (C3-C7) in hominines based on raw data (top) and on residuals (bottom). The numerical values on which these figures are based are displayed in the electronic supplementary material, Table S6). Plots are symmetric such thus redundant information is represented in the upper-right and lower-left half of each plot. Red color represents strong integration between vertebrae and purple represents weak integration. Gorillas show the highest integration across all cervical vertebrae, whereas humans show lower values and only adjacent vertebral elements covary significantly. Size is not an important integration factor in humans and chimpanzees. In gorillas, however, removing size reduces the level of integration between non-adjacent elements, but increases the degree of integration of the C3 within the cervical spine.