Initially, we tried to take into account the estimation of spurious coincidences by adding it to the projection estimate in the denominator of the iteration step, which can be schematically written as

$$A^{n+1} = A^n \times \frac{1}{\tilde{c}I} \times \tilde{c}\frac{S}{cA^n + S_{sc}}, \text{Algorithm 1}$$

where A^n is the activity image estimate at step n, I the identity image, c the projection matrix, S the measured true-coincidence sinogram, and S_{sc} the estimation of the spurious-coincidence sinogram. The operation $+,—$ is performed ray-sum by ray-sum, and the operation $\times$ is performed voxel by voxel. Although this method preserves the reconstructed voxel positivity in an elegant, natural way, we observed that Algorithm 1 no longer correctly converges when the estimated term S_{sc} becomes too large (data not published). In ^{86}Y PET imaging, this was especially the case for corpulent patients. This method is currently implemented in the Gemini TF PET system (Philips) for correction of scatter and random coincidences (*4,5*). Care should thus be taken when imaging low-^{90}Y specific activity with this lutetium yttrium oxyorthosilicate–based system (*6*).

Finally, we decided to remove the negative pixels from the subtracted sinogram by transferring to them an appropriate number of counts from neighboring positive pixels (a detailed description of the method has been published (*2*)). The rationale of this strategy is that Poisson noise is characterized mainly by high-spatial-frequency positive–negative fluctuations. This transfer of counts was performed in a special way that avoids artifact generation in the reconstructed image. Phantom and patient studies showed that this method prevents bias in ^{86}Y PET imaging (*2*). The method could also be evaluated in ^{90}Y imaging with PET systems, allowing separated prompt- and random-coincidence acquisitions such as the one used by Tapp et al. (*1*).

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Erratum

In the article "In Vivo PET Imaging Demonstrates Diminished Microglial Activation After Fingolimod Treatment in an Animal Model of Multiple Sclerosis" by Airas et al. (*J Nucl Med.* 2015;56:305–310), the author line neglected to mention that Laura Airas and Alex M. Dickens contributed equally to the work. The authors regret the error.