Reviewer's report

Title: Induction of lung lesions in Wistar rats by 4-(methylnitrosamino)-1-(3-pyridyl)-1-butanone and their inhibitions by aspirin and phenethyl isothiocyanate.

Version: 1 Date: 20 September 2006

Reviewer: Katsumi Imaida

Reviewer's report:

General

There is no information regarding inflammatory changes by intratracheal instillation.

Is there more inflammatory changes by instillation than i.p treatment of NNK?

There are a few more questions regarding inflammatory changes as follows;

1.a COX-2 and PCNA could be observed by both tumorigenesis and inflammation. Were the COX-2 and PCNA induced by tumorigenesis or by inflammation?

1.b Aspirin and PEITC supressed tumorigenesis. Is this mechanism due to direct effect to tumor or indirect effect through inhibition of inflammation?

1.c About Fig.2, Fig.3 and Fig.9; photographs of histopathological changes are too small to distinguish between inflammatory changes or tumorigenic proliferation.

Major Compulsory Revisions (that the author must respond to before a decision on publication can be reached)

Minor Essential Revisions (such as missing labels on figures, or the wrong use of a term, which the author can be trusted to correct)

1. P4, L5 from the bottom; F344 rat is not a special strain in lung carcinogenesis model and do not have high incidence of spontaneous tumors. This phrase should be deleted.

2. P4, L3 from the bottom; there is a typographical error. "Wister" should be "Wistar".

3. It is better to add the information how authors decided the amount of NNK (25mg/kg it) and the period to sacrifice (92 days) after intratracheal instillation of NNK.

4. P9, L3 and L6; The font of "X" should be used the same font, and it is better to use the same expression, "X 40" and "40X".

5. P13, L9-16; It is better to use the same effective digits of the numbers of percentage.

Discretionary Revisions (which the author can choose to ignore)

What next?: Unable to decide on acceptance or rejection until the authors have responded to the major compulsory revisions

Level of interest: An article whose findings are important to those with closely related research interests

Quality of written English: Needs some language corrections before being published
Statistical review: Yes

Declaration of competing interests:

I declare that I have no competing interests.